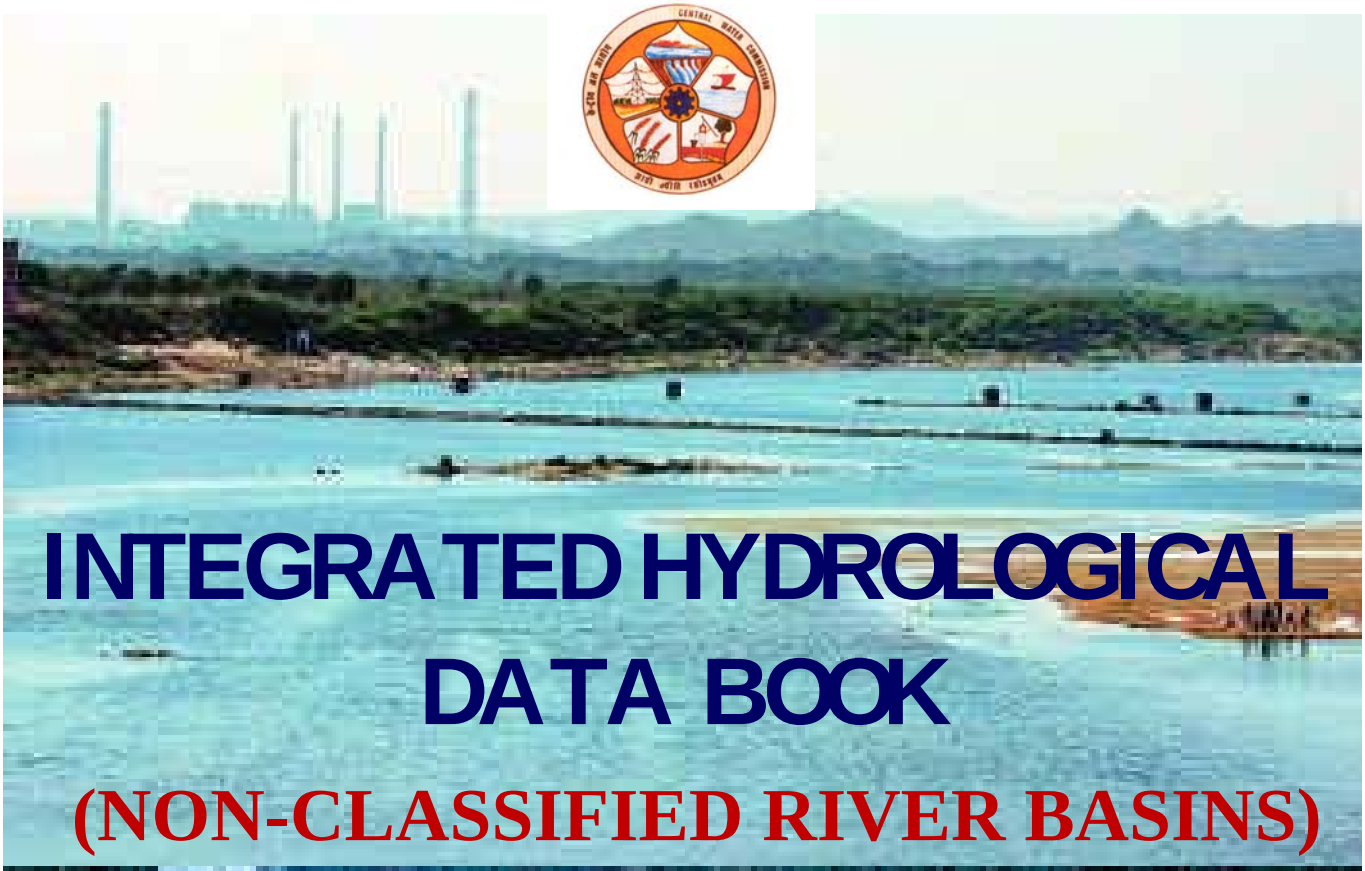
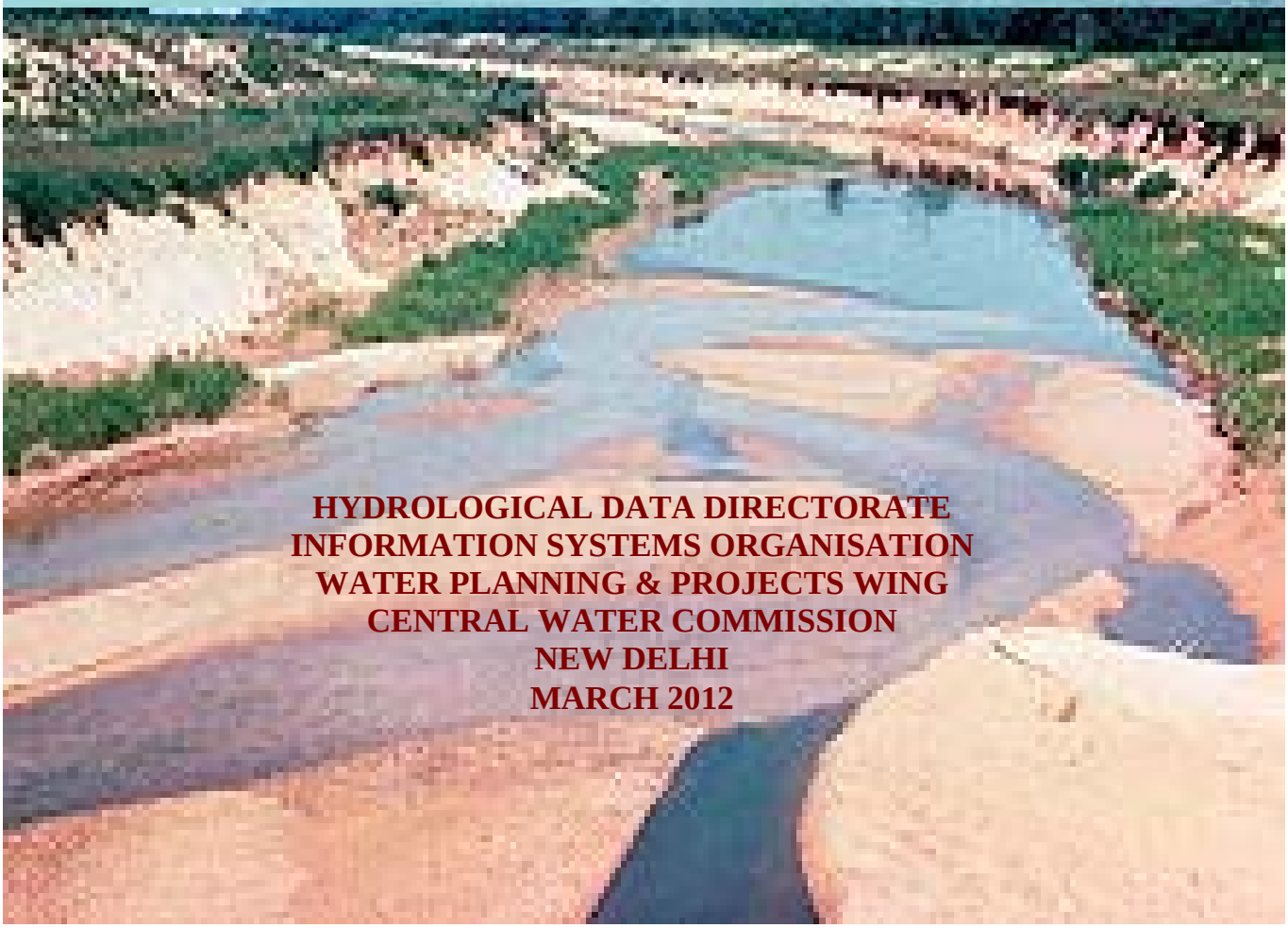


INTEGRATED HYDROLOGICAL DATA BOOK

(NON-CLASSIFIED RIVER BASINS)



HYDROLOGICAL DATA DIRECTORATE
INFORMATION SYSTEMS ORGANISATION
WATER PLANNING & PROJECTS WING
CENTRAL WATER COMMISSION
NEW DELHI

MARCH 2012

सरकारी प्रयोग के लिए
For Official Use

संगठित जल वैज्ञानिकीय आँकड़ा पुस्तक

(अवर्गीकृत नदी कछारें)

INTEGRATED HYDROLOGICAL DATA BOOK

(NON-CLASSIFIED RIVER BASINS)

HYDROLOGICAL DATA DIRECTORATE
INFORMATION SYSTEMS ORGANISATION
WATER PLANNING & PROJECTS WING
CENTRAL WATER COMMISSION
NEW DELHI

March, 2012

FOREWORD

Water Resources planning requires time series data on hydrological aspects. The hydrological observation stations of CWC collect and process the basic hydrological data on gauge, discharge, silt, sedimentation and water quality on a regular basis for onward transmission to the CWC regional field offices, who document it in the form of Water Year Book, Sediment Year Book and Water Quality Year Book. Integrated Hydrological Data Book is a compendium of important hydrological information on major basins consolidated at the national level.

The present issue of the data book provides updated basin/site-wise data for 12 non-classified basins covering aspects such as location, drainage area, population, temperature, average runoff, seasonal water flow, historical water levels, average sediment load, water quality parameters and land use statistics.

It is expected that the updated information would be of use to researchers, policy makers and the public at large.

(R.C. Jha)

New Delhi
March, 2012

Chairman
Central Water Commission

PREFACE

Planning and operation of water resources projects requires hydrological data. The basic data on gauge, discharge, silt content, sedimentation and water quality are collected regularly at hydrological observation stations of CWC and are processed. Thereafter the authenticated data is transmitted to the CWC regional field offices who document it in the form of Water Year Book, Sediment Year Book and Water Quality Year Book. At macro level a centralized computerized databank of important hydrological data of twelve non-classified basins is being maintained by CWC.

This publication presents salient features of 12 non-classified basins relating to location, drainage area, population, soil characteristics, type of industries, principal minerals, rainfall, temperature, climate, average annual run off, seasonal water flow, historical water levels, live storage capacity, annual flow of water into river basin, dependable flow of water in different river basins, ten daily and monthly sediment load for different river basins, critical absolute values of water quality parameters, land use statistics etc. in four Chapters. This compilation contains data from 2006-07 to 2009-10 on above aspects.

The compilation and collation of the data and finalisation of the publication were done by the Hydrological Data Directorate of Information System Organisation in WP&P Wing of CWC. Shri R.K. Gupta, Dy. Director, Smt. R.K. Beniwal, Assistant Director assisted by staff members of the Hydrological Data Directorate have done excellent job under the able guidance of Shri D.P. Mondal, Adviser, ISO in preparation of this publication and giving it a presentable shape.

Any Suggestion for improvement of the contents and presentation of the publication will be highly appreciated.

(Chetan Pandit)
Member (Water Planning & Projects)
Central Water Commission

New Delhi
March, 2012

List of Officers Associated with the Publication

Sl. No.	Name	Designation
1.	Sh. D.P. Mondal	Advisor
2.	Sh. R.K. Gupta	Deputy Director
3.	Smt. R.K. Beniwal	Assistant Director
4.	Sh. Thakur Singh	Private Secretary
5.	Sh. Jagat Singh	D.E.O. Gr.`B’
6.	Sh. Bhim Singh	D.E.O. Gr.`B’
7.	Sh. Bhushan Dutt	D.E.O. Gr.`B’
8.	Smt. Harinder Kaur	D.E.O. Gr.`B’
9.	Sh. Gyan Chand	Scanning Machine Operator

Acronyms

-	:	Anion
+	:	Cation
^{0}C	:	Degree Centigrade
BCM	:	Billion Cubic Meter
BOD	:	Bio-Chemical Oxygen Demand
cumec	:	Cubic Meter per Second
CWC	:	Central Water Commission
DO	:	Dissolved Oxygen
G		Gauge Sites
GD	:	Gauge & Discharge sites
GDQ	:	Gauge, Discharge and Water Quality Sites
GDS	:	Gauge, Discharge & Sediment sites
GDSQ	:	Gauge, Discharge, Sediment and Water Quality Sites
m	:	Meter
m.e./litre	:	Milli equivalent per Litre
max	:	Maximum
MCM	:	Million Cubic Meter
mg/l	:	Milligram per Litre
mhos/cm	:	Micro mhos per Centimeter
min	:	Minimum
mm	:	Millimeters
MPN	:	Most Probable Number
N.A.	:	Not Applicable
NF	:	No flow
pH	:	Negative logarithm of hydrogen ion concentration
ppm	:	Part per million
Q	:	Water Discharge per Second
RD	:	River Dry
RSC	:	Residual Sodium Carbonate
SAR	:	Sodium Absorption Ratio
SNR	:	Sample Not received
Sod % age	:	Sodium percentage
Sq Km	:	Square Kilometers
TDS	:	Total Dissolved Solids
W YEAR	:	Water Year
WQ	:	Water Quality

Contents

For International/State boundaries and Coast-Line refer to Survey of India maps.

Chapter 1

Introduction

1.0 The Annual precipitation including snowfall is the main source of water in India and is estimated to be of the order of 4000 cu km. The total water resource potential of the country, which occurs as natural run off in the rivers is estimated at 1869 cu km considering both surface and groundwater into account. Due to various constraints of topography, uneven distribution of resource over space and time, it has been estimated that only about 1123 cu km be put to beneficial use – out of which only 690 cu km is surface water. However, 370 cu km of estimated utilizable surface water comes from the non-classified river basins.

1.1 As per the distribution of water resources potential in the country, the national per capita annual availability of water is 1731 cu m (estimated as on 1st March 2004). The average availability in Brahmaputra and Barak basin is as high as 14057 cu m while it is as low as 308 cu m in Sabarmati basin in 2000. Brahmaputra and Barak basin with 7.6 % of geographical area and 5.2 % of population of all the basins in the country has 31 % of the annual water resources. Per capita annual availability for rest of the country excluding Brahmaputra and Barak basin works out to about 1345 cu m. An availability of less than 1000 cu m per capita is considered by international agencies as scarcity condition. Cauvery, Sabarmati, East flowing rivers and west flowing rivers are some of the basins which fall into this category.

1.2 Background

1.2.1 Central Water Commission (CWC), an apex organization in the country in the field of Water Resources came into existence as "Central Waterways, Irrigation and Navigation Commission" in 1945. It was merged with the "Central Electricity Commission (CEC)" in 1951 and separated from CEC in 1974. At present Central Water Commission functions as an "Attached Office" of the Ministry of Water Resources.

1.2.2 Information System Organisation (ISO) of Water Planning & Projects Wing (WP&P) in CWC is a statistical unit of CWC entrusted in compiling data collected by CWC field offices and bringing out publications for backing up data for planning and policy formulation and researchers relating to water resources. Among these publications the present one is on Hydrological data entitled "Integrated Hydrological Data Book". The first issue of this publication was brought out in 2002. The current one is the fourth in the series.

1.2.3 River management is one of the key issues for political and economical affairs of the country. For designing and execution of water resource projects in the country, planners and policy makers require a comprehensive and reliable time series data on hydrological aspects. The primary objective of this data book is to provide those data

1.3 The scope of this publication is limited to non-classified river basins. It contains data pertaining to non-classified river basins only. In the country there are 3 classified river basins, namely, (1) Indus, (2) Ganga, Brahmaputra and Barak, (3) Minor river draining into Myanmar and Bangladesh. These are excluded from this publication. The rest of the river basins are treated as non-classified basins. The non-classified basins for the purpose of this publication are listed below.

1. Mahanadi
2. Subarnarekha, Burhabalang & Baitarani
3. Brahmani
4. Rushikulya, Vamsadhara, Sarada & Nagavali
5. Godavari
6. Krishna
7. Cauvery
8. East Flowing Rivers between Mahanadi to Kanyakumari
9. West Flowing Rivers from Kanyakumari to Tapi
10. Tapi
11. Narmada
12. Mahi, Sabarmati & other West Flowing

The physical features of these non-classified basins are described in Chapter II.

1.4 The nation-wide data collection network of CWC is spread over 878 hydrological observation stations covering both classified and non-classified river basins. Out of these, 282 operational sites are located in non-classified river basins. The distribution of the sites by river basin has been presented in Table 3. The data here are restricted to non-classified river basins only. In these sites hydrological data on gauge, discharge, silt, sedimentation, water quality and water flow are collected regularly.

1.5 Based on the data collected in the field, three water year books for gauge and discharge, sediment and water quality are prepared by CWC field office at divisional level. All these books along with some relevant land use statistics collected by the Ministry of Agriculture are integrated in this data book.

1.6 This book contains data for 2009-10 Wherever time series data are presented, it covers a period of ten years from 2000-01 to 2009-10 However, there are some basins for which latest data are not available due to unavoidable reasons. The data are provided up to 2006-07 or 2007-08 or 2008-09 as the case may be.

Content of this Publication:

1.7 In this publication, Chapter I gives the introduction while Chapter II describes the physical features of river basins. Chapter III deals with water and related Statistics covering storage capacity, salient features and flow of water. Chapter IV presents the data on sedimentation. In Chapter V, the water quality parameters are given. And, in Chapter VI, summery of land use statistics related to non-classified river basins are provided.

Chapter 2

Description of different river basins

2.0 There are fifteen river basins of which three river basins are classified and rest are non-classified. This chapter gives a detailed account of non-classified river basins. It covers salient features like geographical location, topology, topography, major tributaries, soil characteristics, availability of minerals, major industries, urban centres and important irrigation projects including observation sites. Basin-wise detailed information is presented in Table 2 of Appendix.

2.1 Mahanadi Basin

2.1.1 Location: The basin is physically bounded in the North by Central India hills, in the South and East by the Eastern Ghats and in the West by Maikala hill range. The Chiroli Hills form the watershed dividing the Wainganga valley from the Mahanadi Basin, the upper portion of which is designed as the Chhattisgarh Basin. The Mahanadi basin lies encompassed within geographical co-ordinates of $80^0$30' to $86^0$50' east longitudes and $19^0$20' to $23^0$35' of north latitudes running a total length of about 851 km. The total catchment area of the basin is 141600 sq km spreading over five States viz. Chhattisgarh, Orissa, Madhya Pradesh, Jharkhand and Maharashtra of which more than 99% is in Chhattisgarh and Orissa.

2.1.2 The river Mahanadi is one of the major inter-state east flowing rivers in peninsular India. It originates at an elevation of about 442 m above Mean Sea Level (msl) near Pharsiya village and Nagri town in Raipur district of Chhattisgarh. The total length of the river from its origin to confluence at the Bay of Bengal is about 851 km, of which 357 km is in Chhattisgarh and the balance 494 km in Orissa. During its traverse, a number of tributaries join the river on both the banks. There are 14 major tributaries of which 12 are joining upstream of Hirakud reservoir and 2 downstream of it.

2.1.3 On the Left Bank six tributaries namely the Seonath, the Hasdeo, the Mand, the Ib, the Kelo and Borai drain into main channel upstream of Hirakud reservoir. The drainage system in upstream of Hirakud reservoir is more extensive on the left bank of Mahanadi as compared to that on the Right Bank. On the Right Bank six tributaries namely the Pairi, the Jonk, the Sukha, Kanji, the Lilar and the Lath join upstream of Hirakud reservoir and two tributaries namely Tel and Ong join downstream of it. The three major tributaries namely the Seonath and the Ib on the Left Bank and the Tel on the Right Bank together constitute nearly 46.63% of the total catchment area of the river Mahanadi. The Seonath, which is the largest tributary of Mahanadi, rises in village Kotgai, District Durg (Chhattisgarh) and cater irrigation need of three districts of Chhattisgarh namely Durg, Rajnandgaon and Bilaspur. The Tel, which is the second largest tributary of Mahanadi River, rises in village Jorigam of Koraput district of Orissa and drains four districts of Orissa namely Koraput, Kalahandi, Balangir and Phulbhani. The Ib, which is the third largest tributary of Mahanadi, rises in village Pandrapat, District Raigarh (Chhattisgarh) and drains Raigarh district of Chhattisgarh and two districts of Orissa, namely Sundergarh and Sambalpur. The monsoon is the principal rainy season, when over 75% of the annual rainfall is received over a major portion of the basin with July/August as the

rainiest month. The average rainfall of the basin is of the order of 1400 mm. The temperature of the basin varies from 13^0C to 49^0C.

2.1.4 Irrigation Projects: The Major Projects namely Tandula, Mahandi main Canal, Kharang Tank, Manairi Tank, Hasdeo Bengo Right Bank Canals, Tairi and Kodar are in the State of Chhattisgarh. Mahandi Delta, Salaki, Mahanadi Birupa Barrage and Ong Diversion are the Major Irrigation Projects in the State of Orissa. There are 17 Medium Irrigation Projects each in the States of Chhattisgarh and Orissa respectively in the catchment areas of the Mahanadi river basin. The Major Projects, namely, Hirakund Dam, Mand Diversion Project, Ib Diversion Scheme and Sunder Dam also fall in the catchment areas of the river basin.

2.1.5 Urban Centres: Three important urban centres in the basin are Raipur, Durg & Cuttack.

2.1.6 Industries: Mahanadi, because of its rich mineral reserve and adequate power resource, has a favorable industrial climate. The important industries presently existing in the basin are iron & steel plant at Bhilai, aluminum factories at Hirakund and Korba paper mill near Cuttack and cement industries at Sundargarh. Other industries based primarily on agricultural produce are sugar, textile and oil mills. Mining of coal, iron and manganese are other industrial activities.

2.1.7 Hydrological Sites: The Central as well as State Governments carried out hydrological observations. The CWC maintains 23 gauge discharge sites in the basin and in 16 of these stations sediment observations are also made.

2.2 Subarnarekha, Burhabalang, & Baitarni basin

2.2.1 Subarnarekha

2.2.1.1 Location: The Subarnarekha is one of the longest east flowing inter-state rivers. It covers large areas of Jharkhand and some parts of Orissa and West Bengal. The basin lies between north latitudes of $21^0$33' to $23^0$32' and east longitudes of $85^0$09' to $87^0$27' situated in the northeast corner of the peninsular India. It is bounded on the northwest by the Chhotanagpur Plateau, in the south west by Brahmani Basin, in the south by Burhabalang basin and in the south-east by the Bay of Bengal. This river originates near Nagri village in Ranchi district of Jharkhand at an elevation of 600 m. The total length of the river is about 395 km. Its principal tributaries are Kanchi, Kharkai, Karkari and Dulang. The basin is generally influenced by South-West monsoon, which breaks in the month of June and extended upto October.

2.2.1.2 Irrigation Projects: The Kanchi Irrigation Schemes is the only Major Project. Besides, there are ten Medium Irrigation Projects in the catchment areas of the river basin in Jharkhand.

2.2.1.3 Urban Centres: The important cities/ towns in the basin are Jamshedpur, Ranchi and Muri.

2.2.1.4 Industries: Important industries in the basin are tobacco products in Chakradharpur, cement, asbestos sheets, glass and ceramics at Chaibasa. Locomotives and coaches, automobiles, agricultural equipment, wires and cables, iron and steel machinery, metal tubes and conduits, copper and brass, chemicals (acids) and caustics, fertilizers and Soaps at Jamshedpur.

2.2.1.5 Minerals: The important minerals found in the basin are Coal, Iron ore, Bauxite, Copper, uranium, chromium, gold, vanadium, limestone, dolomite, asbestos, china clay, talc and building stones besides iron and aluminum.

2.2.1.6 Hydrological Sites: There are 6 sites. All 4 types of data – gauge, discharge, sedimentation and water quality - are collected from 3 of these sites: Ghatsila, Jamshedpur and Adityapur. In one site at Muri data are collected for gauge, discharge and water quality. At site Fekoghat, data are collected for gauge, discharge and flood forecasting. And in site jamsholaghat, gauge & discharge adta are collected. Besides these 6 sites there are 3 water quality sample collection points (without any regular CWC set-up).

2.2.2 Burhabalang

2.2.2.1 Location: The Burhabalang is one of the east flowing medium rivers situated in the northern part of Orissa State. It is bounded by the geographical co-ordinates of north latitudes between 21^0 22' to 22^0 20' and east longitudes 86^0 20' to 87^0 05'. It drains parts of the areas in Mayurbhanj and Balasore districts of Orissa with a total catchment area of 4800 sq km. This is a flashy river having a source at an elevation of 800 m and drops into the sea after traversing a total distance of 125 km. The basin is greatly influenced by the South-West monsoon, which sets in June and withdraws in middle of October.

2.2.2.2 Urban Centres: The important towns in the basin are Baripada and Balasore.

2.2.2.3 Industries: The basin has no large industry. Recently some medium and small scale industries have been established in and around Balasore and Baripada.

2.2.2.4 Minerals: The basin has no significant mineral resources. Iron ore, china clay, quartz and soap stone are found in limited areas in the Mayurbhanj portion of the basin. Limestone is seen in the Similipal hill ranges.

2.2.2.5 Hydrological Sites: Gauge discharge, sedimentation and water quality observations are made at Govindpur station.

2.2.3 Baitarni

2.2.3.1 Location: The Baitarani is one of the important east flowing rivers of peninsular India, flowing eastward and joining the Bay of Bengal. The river raises in the hill ranges of Keonjhar District of Orissa near Mankarancho village at an elevation of about 900 m above msl. The river flows through Jharkhand and Orissa states. . On its way, many tributaries join the river

from both banks. The total catchment area of this basin is 10,982 sq km. More than 93% of the catchment area falls in Orissa. The basin is situated approximately between east longitudes of $85^0$10' to $87^0$03' and between north latitudes of $20^0$35' to $22^0$15'. The basin is surrounded by the Brahmani on the South and West, the Subernarekha on the north, the Burhabalang and the Bay of Bengal on the east. The river is flashy in nature having a total length of 355 km with the upper reach up to Anandpur is in the hilly region. There is a considerable fall in geographical gradient from RL 367m at Champua to RL 28m at Anandpur. The basin receives most of the rainfall from the South-West monsoons during the period from June to October. The forest area of the basin is more than 40% of the total catchment of the basin.

2.2.3.2 Irrigation Projects: The Baitarni System, Akhuapada Irrigation System, Salandi, Anandpur Barrage and Kanpur Irrigation System are the Major Irrigation Projects and another 15 Medium Irrigation Projects of Orissa are in the catchment Area of the Baitarni River Basins.

2.2.3.3 Urban Centres: The important towns in the basin are Joda, Champua, Karanjia, Keonjhar, Anandpur and Jaipur.

2.2.3.4 Industries: The basin is backward from the industrial point of view. There are three medium scale industries in the basin viz. (i) Ferro-Manganese Plant (ii) The sponge Iron Plant at Joda and (iii) The Orissa Sponge Iron Plant. There are few small scale industries also in the basin.

2.2.3.5 Minerals: The basin is rich in mineral wealth. Iron ore, copper, chromites, asbestos, manganese, atomic minerals, china clay and soap stone are available in Cuttack, Keonjhar and Mayurbhanj districts of Orissa and in Singhbhum district of Bihar.

2.2.3.6 Hydrological Sites: Water quality, gauge, discharge and sedimentation observations are made at Anandpur and Champua sites. There are 3 sites exclusively for guage data and one site for rainfall only.

2.3 Brahmani Basin

2.3.1 Location: The Brahmani is the major inter-state east flowing river among the peninsular rivers in India. This basin is situated within the geographical co-ordinates of north latitude 20^0 -28' to 23^0 - 35' and east longitude 83^0-52' to 87^0-03' approximately. This basin is bounded in the north by Chhotanagpur plateau, in the west and south by Mahanadi basin and in the east by the Bay of Bengal. The basin covers Jharkhand, Chattisgarh, and Orissa States and its catchment area is 39033 sq km.

The Brahmani is known as the South Koel in the upper reaches. It originates near Nagri village in Ranchi District of Bihar at an elevation of about 600m. The total length of its run is about 799 km. The principal tributaries of this river are Sankh, Tirka and Karo. The climate of the basin is tropical with a fairly hot summer and moderately cold winter. The basin is influenced by south west monsoon from June to October.

2.3.2 Irrigation Projects: There is no major project but ten medium irrigation projects were completed and four medium irrigation projects are ongoing in the catchment areas of the river basin.

2.3.3 Urban Centres: The important towns of the basin are Rourkela, Talcher, Angul, Dhenkanal, Jajpur and Rajgangpur.

2.3.4 Industries: It has two prominent industrial belts, one at Rourkela and the other at Talcher. At Rourkela, besides the Steel Plant, there exist a number of other industries like fertilizers, cement, explosives, chemicals and machine tools. The Talcher industrial area has the National Aluminum Company at Angul, the Fertilizer Plant and other small industries. The basin is rich in mineral resources like coal, iron ore, copper, bauxite, chromites, limestone, manganese, dolomites, lead, fire-clay and china clay, etc.

2.3.5 Hydrological Sites: Gauge-Discharge, Sedimentation and Water Quality observation are being conducted at four sites namely Jenapur, Panposh, Jaraikela and Tilga.

2.4 Rushikulya, Vamsadhara, Sarada & Nagavali Basin

2.4.1 Rushikulya

2.4.1.1 Location: The Rushikulya River is the medium sized east flowing rivers in peninsular India. It is an important river of Orissa state and covers entire catchment area in the districts of Phulbani and Ganjam. The river flows through Purushottampur, Pratappur and joins with the Bay of Bengal at Ganjam district. The river Rushikulya originates at an elevation of about 1000 m near Matabarhi village in Phulbani in Kandhmal district and lies within the geographical co-ordinates of 19^0 07' to 20^0 19' north latitude and 84^0 01' to 85^0 06' east longitude. The total catchment area is 7700 sq km. The Barhandi, Ghodapada, baghua and Pathama are the main principal tributaries.

2.4.1.2 Irrigation Projects: The Rushikulya Irrigation System is the only Major Irrigation Project and another 11 Medium Irrigation Projects of Orissa are in the catchment area of the Rushikulya River Basins.

2.4.1.3 Urban Centres: Berhampur is the only city situated in the basin and other important towns are Chhatrapur, Ganjam, Aska, Bhajanagar and Sarada.

2.4.1.4 Industries: A number of large scale industries have been set up in the basin. Among them are M/s Jayashree Chemical Industries, Aska Co-operative Sugar Industries Ltd., Aska Spinning Mills, Monorama Chemical Works Ltd., Orissa Tubes Pvt. Ltd., etc. There are about 3360 numbers of small scale industries of different categories mainly food and allied, forest & wood based, rubber and plastic products and glass and ceramics. There is enough scope for setting up forest based industries. A major steel plant is proposed near Gopalpur.

2.4.1.5 Minerals: The basin is rich in mineral wealth. The major economic minerals are clay, lime stone, manganese, sand talc, black sand and grinding materials.

2.4.1.6 Hydrological Sites: Gauge Discharge, sediment and water quality observation are made at Purushottampur observation station.

2.4.2 Vamsadhara

2.4.2.1 Location: The Vamsadhara River is an important east flowing river between Mahanadi and Godavari. The river originates near Lanjigarh village in Kalahanadi district in Orissa and traverses a total distance of about 254 km before it joins the Bay of Bengal at Kalingapatnam in Andhra Pradesh. It has five principal tributaries viz. Chauldua, Phalphalia, Ganguda (Harbhangi), Sanna Nadhi and Mathendrathanaya; all are on the left side of the river. Most of its catchment area falls on the left. The basin is narrow and full of undulations. It is situated within the geographical co-ordinates of 18^0 15' to 19^0 55' north latitudes and 83^0 20 to 84^0 20' east longitudes. The total catchment area of this basin works out to 10830 Sq km.

2.4.2.2 Urban Centres: Srikakulam, Narasannapeta, Patapatnam, Tekkali, Palasa, Sompeta, Parlakhemundi, Gunupur, Kashinagar, Bissam and Cuttack are the important towns in the basin.

2.4.2.3 Industries: There is no large scale industry in the basin but there are a number of agro and forest based small scale industries in Srikakulam district of Andhra Pradesh and Koraput & Kalahandi district of Orissa.

2.4.2.4 Minerals: The important minerals found in the Vamsadhara basin are manganese, graphite, quartz, limestone, mica and bauxite besides building materials. Manganese ore is available extensively in Srikakulam and Koraput districts.

2.4.2.5 Hydrological Sites: Water quality, Gauge discharge and sediment observations are done at Kashinagar station. Gauge discharge observation is also made at Gunupur.

2.4.3 Sarada

2.4.3.1 Location: The Sarada River, an east flowing medium sized river, lies in the district of Visakhapatnam of Andhra Pradesh. The geographical co-ordinates of the river are north latitude 17^0 25' to 18^0 17' and east longitude 82^0 32' to 83^0 06'. The basin is surrounded by Nagavali in the north, Gostari, Gambi Ramgedda, Megadnigedda in the east, Bay of Bengal in the South and Machhkund sub-basin of the Godavari in the west. The catchment area of the basin is 2665 sq km. It rises at an elevation of 1000 m and traverses a distance of 122 km. before joining the sea.

2.4.3.2 Urban Centres: Visakhapatnam is the main important town in the basin.

2.4.3.3 Industries: There are many large scale industries like Visakhapatnam Steel plant, Bharat Heavy Plates and Vessels Limited, Hindustan Shipyard Ltd. etc.

2.4.3.4: Minerals: Important minerals found in the basin are manganese, quartz, graphite, mica, bauxite, aluminums and fire clay.

2.4.3.5 Hydrological Sites: Gauge & discharge observations are made at Anakapali observation station.

2.4.4 Nagavali

2.4.4.1 Location: The Nagavali river is a medium sized east flowing river in peninsular India and lies within the geographical co-ordinates of north latitude 18^0 10' to 19^0 44' and east longitudes of 82^0 53' and 84^0 05'. It is surrounded by Vamsadhara in the north, Champavathi and Peddagedda in the south, Godavari in the west and the Bay of Bengal in the east. It drains parts of the districts of Kalahandi, Rayagada, Koraput of Orissa and Srikakulam, Vijayanagaram and Visakhapatanam of Andhra Pradesh state. The total catchment area is 9510 sq km.

The Nagavali river originates near the Lakhbahal in Kalahandi district at an elevation of about 1300m. The total length of the river run is 256 km out of which the first 161 km are in Orissa and the rest in Andhra Pradesh. The important tributaries are Barha, Baldiya, Satklnala, Sitagurha, Srikona, Janjhvati, Gumidigedda, Vottigedda, Suvarnamukhi, Vonigedda, Vagavathi and Relligedda.

2.4.4.2 Irrigation Projects: The Thotapally, Narayanpuram and Jaiyavathi are the major projects besides another one medium irrigation projects in the catchment areas of the river basin.

2.4.4.3 Urban Centres: The important towns in the basin are Amadalavalasa, Rayagada, Parvatipuram, Palkonda, Veeragattam and Bobbili.

2.4.4.4 Industries: The basin has no large scale industry. The existing small scale industries are mostly oriented to forest and agricultural produce and are located in the Srikakulam.

2.4.4.5 Minerals: Manganese, quartz, mica, graphite, limestone, bauxite and construction materials are found in abundance in the Basin.

2.4.4.6 Hydrological Sites: Gauge discharge, sediment and water quality observations are made at Srikakulum observation station.

2.5 Godavari Basin

2.5.1 Location: The Godavari River, the largest of the peninsular rivers and third largest in India, covers drains about 10% of India's total geographical area. The catchment area of the river is 3,12,812 sq km and is spread in the States of Maharashtra (48.6%), Andhra Pradesh (23.4%), Madhya Pradesh (10.0%), Chhattisgarh (10.9%), Orissa (5.7%) and Karnataka (1.4%). The basin lies in the Deccan Plateau and is situated between latitude 16^0 16' North and

22^0 36' North and longitude 73^0 26' East and 83^0 07' East. The Godavari river rises in the Nasik district of Maharashtra, about 80 km from the Arabian sea at an elevation of 1,067 m after flowing for about 1,465 km in a generally south-east direction, through Maharashtra and Andhra Pradesh it falls into the Bay of Bengal. The Godavari basin is bounded on the north by the Satmala Hills, the Ajantha Range and the Mahadeo Hills on the south and the Eastern Ghats on east and the Western Ghats on the west. The basin is roughly triangular in shape and the main river itself runs practically along the base of the triangle.

2.5.2 The western edge of the basin is an almost unbroken line formed by the Sahyadri range of the Western Ghats, from 600 to 2100 m height. It has the heaviest rainfall and the dampest climate in the basin. Hardly 50 to 60 km east of the Western Ghats lie the sparsely cultivated and undulating plains of the Deccan, with a dry climate.

2.5.3 About 64 km from its source, the Godavari receives the waters from Dharna, on its right bank and short distances lower down the Kadana joins it from the left. The combined waters of the Pravara and Mula which rise in the hills of Akola join the river about 217 km from its source, About 338 km lower down, while still in Maharashtra, the river receives the combined waters from the Purna and Dudhna rivers and after a further 138 km at the border of Maharashtra and Andhra Pradesh, the waters of the Majira river joins it from the south. At this point, Godavari flows at an elevation of about 329 m.

2.5.4 The Pranhita river, conveying the combined waters of the Penganga, the Wardha and Wainganga, which drain Nagpur and southern slopes of the Satpura ranges, falls into Godavari about 306 km below its confluence with the Majira. Forty eight km lower, the waters of the Indravathi join the river. Both the Pranhita and the Indravathi are major rivers in their own right. The last major tributary is the Sabari from Orissa, which falls into the Godavari, 100 km above Rajahmundry.

2.5.5 The largest tributary of the Godavari is the Pranhita with about 34.9% coverage of drainage area. The Pravara, Manjira and Maner are notable right bank tributaries covering about 16.1%, the Purna, Pranhita, Indravathi and Sabari are important left bank tributaries, covering nearly 59.7% of the total catchment area of the basin. The Godavari in the upper, middle and lower reaches make up for the balance of 24.2%. The Godavari basin as whole receives 84% of the annual rainfall on an average, during the southwest monsoon, which sets in mid June and ends by mid October.

2.5.6 Irrigation Projects: The Sriram Sagar and Kaddam Major Irrigation Project and 13 Medium Irrigation Projects of Andhra Pradesh are in the catchment area of Godavari Basin. The Wainganga Canal and Sarathi System Major Irrigation Projects and 17 Medium Irrigation Projects of Madhya Pradesh are also in the catchment area of Godavari Basin. The Kodwa, Godavari (Darna), Pravara, Purna, Girna, Pus, Gangapur Stage-I & II, Bagh Pench, Kalisara and Mula Major Projects and 129 Medium Irrigation Projects of Maharashtra are in the catchment area of Godavari Basin. There are several prominent Major Irrigation Projects like Waghed, Ozarkhed, Karanjawan, Pallakhed and Madmeswar, Jayakwadi Stage-1, Bhandaradara, Maner, Adhole, SRS Projects Stage-I, Nizamsagar, Lower Maner, Maner Project, Manjira, Dhuti weir, Idiadoh, Cotton Barrage, Puma and Lakhnavaram are also in the catchment areas of the river basin. There are three Medium Irrigation Projects of Chhattisgarh

also in the catchment areas of the river basin. This basin is working since pre-independence era and a number of interstate agreements exist among basin states on sharing of water of the basin and very often court cases arise on this issue.

2.5.7 Urban Centre: Nagpur is the most important urban centre in the basin. Other important towns are Nasik, Aurangabad, Warangal, Rajahmundry, Akola, Amravati, and Ahmednagar.

2.5.8 Industries: Rich in forests, agricultural and mineral resources and the industrial potential of the Godavari basin is high. A small part of the enormous forest wealth of the basin is at present utilized as timber and in the manufacture of paper and other timber products. Industries based on agricultural produce are the processing of agricultural commodities like rice milling, cotton ginning, processing, spinning and weaving, manufacture of sugar, manufacture of textiles, extraction of oil from groundnut and other oil seeds. Mining of coal, manganese and other ores are important activity in the districts rich in minerals. Most of the ores are at present being exported. Small engineering industries are spread all over the area.

2.5.9 Minerals: The Godavari basin has a rich variety of mineral wealth spread over vast areas. The principal minerals found are bauxite, manganese, iron ore and coal. Other minerals like lead, zinc, corundum, refractory minerals and kaolin are also found in small quantities in different parts of the basin.

2.5.10 Hydrological Sites: There are 18 water quality measurement sites on the basin and as many as 17 of them are for sediment measurements also. In addition, there are 29 gauge discharge observation stations in the basin. In all there are 47 Hydrological sites and gauge & discharge observations are made at all these sites.

2.6 Krishna Basin

2.6.1 Location: The Krishna basin extends over an area of 2,58,948 Sq km out of which 26.8% is in Maharashtra, 43.7% is in Karnataka and 29.5% falls in Andhra Pradesh. The basin lies between east longitudes 73^0 21' to 81^0 09' and north latitudes 13^0 07' to 19^0 25' in the Deccan plateau. The Krishna rises in the Western Ghats at an altitude of 1337 m just north of Mahabaleshwar, about 64 km from the Arabian Sea and flows from west to east through the States of Maharashtra, Karnataka and Andhra Pradesh to join the Bay of Bengal. The total length of the river from the sources to its outfall in the sea is about 1,400 km of which 612 km are in Andhra Pradesh, 306 km in Maharashtra and 483 km in Karnataka. Together with its tributaries, the river drains about 708 km of the Western Ghats, which is its chief source of supply. The Ghataprabha, the Malaprabha, the Bhima, the Tungabhadra, Muneru and Musi are the principal tributaries. The Krishna Basin's predominant land use is agriculture.

2.6.2 The Krishna basin is bounded in the north by the ridge separating it from the Godavari basin in the south and in east by the Eastern Ghats and in the west by the Western Ghats. The basin is roughly triangular in shape with its base along the Western Ghats, the apex at

Vijayawada and the Krishna itself forming the median. All the major tributaries draining the base of the triangle fall into the river in the upper two-thirds of its length.

2.6.3 The interior of the basin is a plateau, the greater part of which is at an elevation from 300 to 600 m. Its general slope is eastwards. Great undulating plains, divided from each other by flat-topped ranges of hills are the main characteristics of this plateau. To the south of the Krishna, the Eastern Ghats comprises parallel ranges, which are the successive outcrops of an ancient series of stratified rocks. The delta of the Krishna formed by deposits at the mouth of the river over the ages consists of a wide belt of river-borne alluvium. The process of silt deposition at the mouth of the river is still continuing and the delta is gradually extending into the sea.

2.6.4 About 137 km from the source, it receives the Koyna a main tributary from the western side of the Mahabaleshwar hills. Lower down, the river Yerla falls into the Krishna from the left and then the Varna, the Panchganga and the Dudhganga from the right. Just near its confluence with Dudhganga and about 306 km from its source, the Krishna enters Karnataka State. At this point, the bed level of the river at an altitude of about 533 m and the river has emerged from the heavy rainfall zone of the Western Ghats. After flowing for 201 km in Karnataka territory, the Krishna receives water of the Ghataprabha from its right, and 35 km lower down, those of the Malaprabha. Both these tributaries have their sources in the Western Ghats.

2.6.5 A short distance downstream of its confluence with the Malaprabha, the Krishna drops about 122 m from the tableland of the Deccan plateau to the alluvial lands of Raichur. The Krishna receives its two major tributaries, the Bhima and the Tungabhadra, the former on its left at 789 km from its source and the 129 km further downstream near Kurnool from its right. Both the Bhima and the Tungabhadra drain large area of the Western Ghats and both are major rivers in its own right.

2.6.6 From a short distance below its confluence with the Tungabhadra, the Krishna runs in a deep gorge through a series of hills, for nearly 290 km before emerging into the coastal belt a pulichintala, at an elevation of about 37 m above sea level. Beyond this point, the river flows for about 80 km before it spreads into the delta. Vijayawada is at the head of the delta. The Dindi and the Musi join the Krishna from its left between Kurnool and Pulichintala and two more tributaries namely Palleru and Muneru also from the left, fall into the river between Pulichintala and Vijayawada. The South West Monsoon sets in by middle of June and withdraws by the middle of October. About 90% of annual rainfall is received during the Monsoon months, of which more than 70% occurs during July, August and September.

2.6.7 Irrigation projects: Radhanagari, Ghod, Khadakwasla Stage-I, Vir Dam, Konya Dam, Tungabhadra, Bhadra, Ghataprabha Stage-I and Stage-II, Upper Krishna, Musi Project, Nagarjuna Sagar, Sri Sailam, P.D.Jurala and Prakashan Barrage are the major projects in the catchment areas of the river basin. Krishna Barrage, Kurnool Cuddaph Canal, Tungabhadra Right Bank Lower Level Canal, Tungabhadra High Level Stage-I and Rajouli Bunda Diversion major projects and fifteen other minor irrigation project of Andhra Pradesh are in the catchment areas of the river basin. Similarly Vijaynagar Channels, Vanivilas Sagar, Ghataprabha Stage-I and Stage-II, Tungabhadra RBC & LBC and Bhadra LBC Major Irrigation projects and 29 other medium irrigation projects of Karnataka are also in the

catchment areas of the river basin. Neera RBC & LBC, Ghod, Vir, Radhanagari and Tulsi major irrigation projects and 39 other minor irrigation projects of Maharashtra are in the catchment areas of the river basin.

2.6.8 Urban Centres: The major cities in the basin are Pune, Hyderabad & Vjayawada.

2.6.9 Industries: There are many large, medium and small-scale industries in the catchment. The main industries in the catchment are Textiles, Sugar, Chemical, Cement factories, Automobiles, Engineering goods, Extraction of Gold, Indian Aluminums Company Belgaum, Bharat Heavy Electrical Limited (Hyderabad), Hindustan Machine Tools Limited (Hyderabad), Nuclear Fuel Complex (Hyderabad), Hindustan Cables Limited (Hyderabad), Indian Drugs and Pharmaceuticals Limited (Hyderabad), Bharat Dynamics Limited (Hyderabad), Bharat Electricals Limited (Hyderabad), etc. Among the small-scale industries, engineering works, ferrous and non-ferrous foundries and cotton ginning are important. There are also cottage industries like weaving, carpentry, leather, rope making, tiles, pottery, copper and brass works in the catchment.

2.6.10 Minerals: The important minerals found in the catchment are gold, bauxite, lime stone, iron ore, manganese ore, quartz, copper, red oxide, soapstone, etc.

2.6.11 Hydrological Sites: At Present there are 23 water quality observation stations in the basin. Sediment observations are also made at 13 stations. In addition, there are 13 gauge discharge observation stations in the basin.

2.7 Cauvery Basin

2.7.1 Location: The Cauvery river originates at Talakaveri in Coorg District of Karnataka in Brahmagiri Range of hills in the Western Ghats at an elevation of 1,341 m and drains a total of 81,155 Sq km area of which 34,273 Sq km lies in Karnataka, 43,856 sq km in Tamil Nadu, 2,866 sq km in Kerala and 160 sq km in the Union Territory of Puducherry. The Cauvery basin is bounded by Tungabhadra sub-basin of Krishna basin in the northern side and Palar sub-basin in the Southern side. The Western Ghats from the Western boundary, the Nilgiris hills an offshore of Western Ghats, extend eastwards to the Eastern Ghats and divide the basin into two natural and political regions i.e. Karnataka plateau in the North and the Tamil Nadu plateau in the South. In Tamil Nadu, the Eastern part of the basin is in the elevation range of 0 to 150 m sloping gently up from the sea.

2.7.2 At Shivanasamudram, the river branches off into two parts and falls through a height of 91 m. in a series of falls and rapids. The falls at this point is utilised for power generation. The power station at Shivanasamudram was built as early as 1902. The two branches of the river join after the falls and flows through a wide gorge which is known as "Mekedatu" (Goats leap) and continues its journey and forms the boundary between Karnataka and Tamil Nadu States for a distance of 64 km. At Hogennekkal Falls, it takes southernly direction and enters the Mettur Reservoir, which was constructed in 1934. A tributary called Bhavani joins Cauvery on the right bank about 45 km below Mettur Reservoir, thereafter it takes easterly course to enter

the plains of Tamil Nadu. Two more tributaries Noyil and Amaravathi join on the right bank and here the river widens with sandy bed and flows as "Akhanda Cauvery".

2.7.3 Immediately after crossing Tiruchirappalli district, the river divides into two parts, the northern branch being called "The Coleron" and southern branch remains as Cauvery and from here the Cauvery Delta begins. After flowing for about 16 km, the two branches join again to form "Srirangam Island". On the Cauvery branch a Grand Anicut is said to have been constructed by a Chola King in 1st Century AD. Below the Grand Anicut, the Cauvery branch splits into two, Cauvery and Vennar. These branches are divided and sub-divided into small branches and forms a network all over the delta.

2.7.4 The total length of the river from the origin to its outfall into the sea is 800 km of which 320 km is in Karnataka, 416 km in Tamil Nadu and 64 km form the common border between the Karnataka and Tamil Nadu states. The Cauvery basin is fan shaped in Karnataka and leaf shaped in Tamil Nadu. The run-off does not drain off quickly because of its shape and therefore no fast raising floods occur in the basin. In the Cauvery basin, four distinct seasons occur i.e. (i). Cold weather, (ii). Hot weather, (iii). South West Monsoon and (iv). North-East Monsoon. The basin receives rainfall mainly from the South West Monsoon and partially from North East Monsoon in the Karnataka. The basin in Tamil Nadu receives good flows from the North- East Monsoon.

2.7.5 The Cauvery river system consists of 21 principal tributaries each with catchment area exceeding 250 sq km. The largest of all of them of Catchment area are Shimsha, lying wholly in Karnataka, the Amaravathi rising in Kerala but lying mostly in Tamil Nadu and the Kabini rising in both Kerala and Tamil Nadu but lying mostly in Karnataka. The Bhavani is the fourth largest and the second longest rises in Kerala and Karnataka but lies mostly in Tamil Nadu. The longest tributary, the Hemavathi (245 km) is the fifth largest river in catchment area and lies wholly in Karnataka. From the point of view of flow contribution to the system, apart from the head reach of the Cauvery main, the most important tributaries are i) the Hemavathi, ii) the Kabini and iii) the Bhavani. There are disputes in sharing of this river water among states.

2.7.6 Irrigation Projects: Krishnaraja Sagar, Hemavathi, Mettur, Bhawani Sagar Reservoir and Kabini are the major projects in the catchment areas of the river basin. The Cauvery Anicut channels and Vanivilas Sagar major irrigation projects and 9 medium irrigation projects of Karnataka are in the catchment area of Cauvery basin. The Cauvery Delta, Kalingirayan Anicut, Kodivery Anicut, Lower Coleroon Anicut, Kattalai, Cauvery Mettur major projects and 46 other Minor irrigation projects of Tamil Nadu are in the catchment area of Cauvery river basin.

2.7.7 Urban Centre: Important cities on the basin are Coimbatore, Bangalore & Tiruchirapalli.

2.7.8 Industries: Some of the main industries in the basin are Paper mills, Sugar mills, Chemical Factories, Cotton mills, Steel & Cement factories. Mining activity in the basin includes Stone mining for building construction works.

2.7.9 Hydrological Sites: There are 32 Water Quality observation stations in the basin. Sediment observations are also made at 15 of these stations. In 33 sites gauge & discharge observation are also made.

2.8 East flowing rivers Basin

2.8.1 Location: The basin of east flowing rivers consists of all small independent rivers of peninsular India lying to the south of Krishna basin except Cauvery basin. It lies within 8^0 12' to 15^0 46' north latitude & 77^0 15'to 80^0 10' east longitude. All these rivers are draining into the Bay of Bengal.

2.8.2 The basin of East flowing rivers covers large areas in the states of Andhra Pradesh, Tamil Nadu and a small area in the state of Karnataka. There are twelve river sub-basins of which the Pennar, Palar and Ponnaiyar are more important and covers a large drainage area..Other river sub-basins are the Gundlakamma, Pellar, Swarnamukhi, Kalingi, Varahanadi, Vellar, the Vaigai, the Vaippar, and the Tambraparani. The normal annual rainfall in the basins varies from region to region. The coastal areas of the basins get heavier rainfall than western parts. Brief descriptions of these river basins are given below.

2.8.3 Gundlakamma: The Gundlakamma river rises near Iskagundam village in Kurnool district at an elevation of 600 m from the eastern slopes of the Nallamala hills at north latitude 15^0 38' and east longitude 78^0 47' and flows in a north-east, east and southern direction for a total length of 220 km to join the Bay of Bengal. The total area drained by this river is 8,494 sq km. The Kandleru is its important left bank tributary.

2.8.4 Paleru: The Paleru river rises near Gogulapalle village in Nellore District at an elevation of 325m at North Latitude 15^0 17' and East Longitude 79^0 13' and flows in an easterly direction for a total length of 104 km to join into the Bay of Bengal. The Paleru drains an area of 2,483 sq km.

2.8.5 Pennar: The Pennar River is one of the major East Flowing Rivers in Southern India. It rises in the Thenanahesava hill of the Nandidurg range in Karnataka, flows in the north westerly direction through Kolar and Tumkur districts of Karnataka; it enters Andhra Pradesh in the Hindupur taluk of Anantapur district, runs eastwards before draining into the Bay of Bengal near Nellore. The Basin lies between east longitude 77^0 04' to 80^0 10' and north latitude 13^0 16' to 15^0 52'. The Somashila is the only major project in the catchment area of the river basin The total length of the river is 597 km. 4 hydrological observation sites lies in the basin and out of these 1 sites is recording Gauge/Discharge, sedimentation and water quality observations.

2.8.6 Swarnamukhi: The Swarnamukhi is an East Flowing river basin having a small catchment Area of 3,225 sq km. It rises at an elevation of 300 m in the Eastern Ghat ranges near Pakala village in Chittur district of Andhra Pradesh at North latitude 13^0 28' and east longitude 79^0 09'. It runs generally in north eastern direction passing through the famous Tirupati hills before joining into the Bay of Bengal. Its total length is 130 km. This Independent river has no major tributaries and therefore its flow depends only on rainfall in its upper catchment.

2.8.7 Kalingi: The Kalingi River is one of the East flowing rivers in Andhra Pradesh. It originates near Kalashasti in Andhra Pradesh and drains completely in Andhra Pradesh and joins in Pulicat lake after Sulurpeta. The catchment area of Kalingi River is 5,927 sq km and the length is 76 km. The important tributary is Kalleru river which joins Kalingi River after Sulurpet town. At present there are two medium irrigation projects in this basin namely (1) Kalingi Reservoir and (2) Thanyali Anicut which irrigate an area of 4,650 acres and 10,000 acres respectively.

2.8.8 Palar: The Palar basin is an important basin among the 12 basins lying between the Pennar and the Cauvery basin. This basin is divided into three major topographical divisions namely, (i) the hill ranges of Eastern Ghats (ii) the plateau region and (iii) the coastal plains. Though most of the drainage area lies in Tamil Nadu, its drainage area extends to cover the southeast and southwest parts of Karnataka and Andhra Pradesh respectively. The shape of the basin is rhombus and lies approximately between 12^0 $39^{'}$ and 12^0 $54^{'}$ north latitudes. The basin finds its outlet into Bay of Bengal. The Palar drains an area of 17,871 sq km out of which nearly 57 percent lies in Tamil Nadu and the balance in the states of Karnataka and Andhra Pradesh.

2.8.9 Ponnaiyar: The Ponnaiyar basin is the second largest interstate East Flowing river basin among the 12 basins lies between the Pennar and the Cauvery basins. It covers a large area in the state of Tamil Nadu, besides the areas covered in the states of Karnataka and Andhra Pradesh. It lies between the east longitudes 77^0 $33^{'}$ to 79^0 $47^{'}$ and north latitudes 11^0 $45^{'}$ to 13^0 $30^{'.}$ This basin is bounded in the northwest and south by various ranges of the Eastern Ghats like the Velikonda range, the Nagari hills, the Javadu hills, the Shevaroy hills, the Chitteri hills and the Kalrayan hills and in the east by the Bay of Bengal. The Ponnaiyar basin is elongated in shape and finds its outlet into the Bay of Bengal. The Ponnaiyar drains an area of 16,019 Sq km out of which nearly 77 percent lies in Tamil Nadu. The Ponnaiyar or the Dakshina Pinakini river rises near Hongashenhalli village at an elevation of about 900m above msl at north latitude 13^0 $25^{'}$ and east longitude 77^0 $58^{'}$ in the Kolar district of Karnataka state. From its origin, the river Ponnaiyar generally flows in the southern direction through Kolar and Bangalore districts of Karnataka to a length of 79 km before entering the Dharmapuri district of Tamil Nadu. The river flows another 247 km generally in the south east direction in the districts of Dharmapuri, Vellore, Tiruvannamalai, Cuddalore and Villupuram districts. Then, the river flows in the eastern direction below the Tirukoyilur anicut for another 70 km before finding its way into the Bay of Bengal. The river Ponnaiyar branches into two, the Gadilam near Cuddalore and the Ponnaiyar near the Union Territory of Pondicherry. On its way, the river Ponnaiyar receives a number of small streams and rivulets. Krishnagiri and Sathanur Reservoir are the major projects in the catchment areas of the river basin.

2.8.10 Vellar: The Vellar River rises at an elevation of 900 m near the village of Tumba in the Chittori hills, of the Eastern Ghats in the Salem district of Tamil Nadu. It flows generally in an easterly direction for a total length of 210 Km through Salem and Cuddalore districts in Tamil Nadu and finally out falls into the Bay of Bengal near Porto Nova in Cuddalore district. It drains a total catchment area of about 8,922 sq km. The catchment area lies entirely in Tamil Nadu. The Gomukinadhi and Manimukthanadi are the important left bank tributaries and Swetanadhi and Chinnar are the right bank tributaries of the Vellar.

2.8.11 Vaigai

2.8.11.1 The Vaigai basin is an important basin among the 12 basins lying between the Cauvery and Kanyakumari. The basin is bounded by the Varushanadu hills, the Andipatti hills, the Cardaman hills and the Palani hills on the west and the Palk Strait and Palk Bay on the east. The basin lies between 9^0 17' to 10^0 22' north latitudes approximately. This basin is divided into two major topographical divisions namely (i) the hilly areas and (ii) the plains. The basin is elongated in shape and drains into the Palk Bay. The Vaigai drains an area of 7,741 sq km which entirely lies in the state of Tamil Nadu.

2.8.11.2 The Vaigai river on the western slopes of the Varushanadu hills at an elevation on 1,200m above msl near Kottamalai in the Madurai district at a north latitude 9^0 32' and east longitude 77^0 23' and flows in the northernly and north easternly directions up to its confluence with the Varushanadhi and then takes a turn towards east and south east to flow through Madurai, Sivakangai and Ramanathapuram districts. After traversing about 258 km, the river Vaigai discharges into Ramnad big tank and some other tanks. The surplus water from the tanks finally discharges into the Palk Bay near Mandapam. On its way, the Vaigai receives two important tributaries namely the Suruliyar and the Manjalar on its left bank, besides a large number of small streams and rivulets. The river has been dammed downstream of its confluence with the Suruliyar.

2.8.11.3 The Suruliyar and the Manjalar, the two important left bank tributaries together account for nearly 20 percent of the total catchment area of the Vaigai. The Suruliyar is the principal tributary of the Vaigai also rises in the eastern slopes of the Varushanadu hills and flows in the north and north eastern direction. It receives Theniar on its left bank just before its confluence with the Vaigai. The Manjalar another major tributary rises in the Palani hills and flows generally in the easterly direction before joining the Vaigai below the Vaigai dam. The Vaigai also receives another minor tributary namely the Varshanadhi on its left bank below the Vaigai dam. The Vaigai Reservoir is the only major project in the catchment area of the river basin.

2.8.12 Vaippar: The Vaippar River rises on the eastern slopes of the Varushanadu hill ranges of the Western Ghats near Sivagiri in Thirunelveli district in Tamilnadu at an elevation of about 900m. It flows generally in an easterly direction for a length of about 125 km through Thirunelveli, Virudhunagar and Tuticorin districts in Tamilnadu and joins the Gulf of Mannar near Kalattur. The river basin is located on south of Vaigai. It drains a total catchment area of 5,069 sq km. The catchment area lies entirely in Tamilnadu. The Arjuna-nadhi and Vijanadhi are the important tributaries on the left bank. There are four anicut in the basin. No large storages exist in this basin.

2.8.13 Tambraparani: The Tambraparani river rises on the eastern slopes of the Western Ghats at an elevation of about 1,400m at north latitude 8^0 46' and east longitude 77^0 15' near Alwarkurichi village in Thirunelveli district of Tamilnadu to flow in a generally easterly direction for a total length of 130 km and joins the Gulf of Mannar. The Chittar and Manimuthar are the left & right bank tributaries of this river. The total area drained by the

Tambraparani is 5,482 sq km. There are number of anicuts across this river of which the more important are the Marudur and the Srivaikuntam anicut systems. Papanasam Hydro Electric Project and Manimuthar Dam are two important storages in this river.

2.8.14 Industries: Agriculture based industries are located on this basin area.

2.8.15 Hydrological Site: There are 24 water quality observation stations in the basin. Sediment observations are also made at 7 of these stations. In addition, one gauge discharge observation station is also there in the basin.

2.9 West flowing rivers Basin

2.9.1 Location: The basin of West flowing rivers consists of all small independent river basins of peninsular India lying to the south of Krishna basin, except Cauvery basin. There are about 22 rivers basins and they are located within 9^0 10' to 19^0 42' North latitude and 72^0 45' to 77^0 15' East longitude. These rivers are draining into the Arabian Sea.

2.9.2 The basin of the West Flowing Rivers located in the South West corner of the peninsular India covers areas in the states of Maharashtra, Karnataka, Tamilnadu and Kerala. There are a number of medium and minor river basins in this region. All the rivers originate from the high mountains of the Western Ghats and exhibit similar characteristics. They have steep high banks, which rarely overflow or cause floods.

2.9.3 Important west flowing river sub-basins are described as under.

2.9.3.1 Ulhas: The Ulhas River is one of the West Flowing rivers in Maharashtra falling into the Arabian Sea. The boundary of the basin consists of the main Sahyadri hills on the east, western off shoots on the north and south and on the west, a narrow opening at the end leading to the sea. The Ulhas basin lies between north latitudes of 18^0 44' to 19^0 42' and east longitudes of 72^0 45' to 73^0 48'. The Ulhas drains an area of 4,637 sq km and lies completely in Maharashtra. The Thane, Raigad and Pune districts fall in the basin. The Ulhas rises from Sahyadri hill ranges in the Raigad district of Maharashtra at an elevation of 600m above msl. The total length of the Ulhas from its origin to its outfall in to the Arabian Sea is 122 km. The basin receives most of the rainfall from South-West monsoon during June to October. The important tributaries of the Ulhas River are Pej, Barvi Murbari, Kalu, Shari, Bhasta, Salpe, Poshir and Shilar. The Kalu and Bhasta are the major right bank tributaries which together accounts for 55.7% of the total catchment area of Ulhas. There are mainly two completed projects on the tributaries of the Ulhas River on Bhivapuri and on Barvi. Two ongoing projects are on Bhasta and Poshir.

2.9.3.2 Netravathi: The Netravathi rises between Kudermukh and Ballalaryan Durga in the Dakshina Kannada district of Karnataka at an elevation of about 1000m at 75^0 20' East longitude and 30^0 10' North latitude flows generally in north-south direction for 40 km up to Gohattu, where it takes a turn towards the west and flow in east-west direction practically up to its outfall into the Arabian Sea near Mangalore. The climate of the basin is characterized by heavy rainfall, high humidity and opperasive weather in hot season. The hot season from March to May is followed by the South West monsoon from June to September. The

Kumaradhara, a major left-bank tributary joins it near the village Uppinangadi. The total length of the Netravathi is 103 km from its source to the outfall. The river drains an area of 3,657 sq km. No major project is in existence in this basin. However, the investigations for the project titled multi-purpose Netravathi Anicut Scheme have been completed.

2.9.3.3 Valapatanam: The Valapatanam river rises south of Ammatti village in the district of Coorg in Karnataka State at 75^0 $52^{'}$ east longitude 12^0 $13^{'}$ north latitude at an elevation of 900m above msl. The river has a total length of 101 km from its source to its fall into the Arabian Sea. The river drains an area of 1,867 sq km of which 546 sq km lies in Karnataka and rest in Kerala. The climate of this basin is characterized by heavy rainfall, high humidity and opperasive weather in hot season. The Kattampally multipurpose project at Kattampally, and Pazhassi project at Valiambra are the main irrigation Projects in this basin. The Kattampally project has been planned in two stages. The stage I will not only prevent saline water intrusion and reduction of flood but also provide irrigation benefits to an area of 1,280 ha. The second stage of the project is expected to irrigate an additional area of 1,650 hectares. The Pazhassi project is proposed to irrigate 16,110 hectares of land.

2.9.3.4 Chaliyar: The Chaliyar, known in the lower reaches as the Beypore, is one of the major rivers of Kerala. The main river starts from the Elambalari hills at an altitude of 2,067m above msl. It is formed by the confluence of numerous streams and rivers. Its important tributaries are the Cherupuzha, the Kurumbanpuzha, the Kanhirapuzha, The Punnapuzha, the Karimpuzha, the Vadapurampuzha and the Chaliyarpuzha. The Chaliyar flowing for a total length of about 169 km and finally joins the Arabian Sea at Beypore. The river drains a total area of about 2,933 sq km of which 2545 sq. Km lies in Kerala.and 388 sq. Km in Tamilnadu. Good rainfall and humid temperature throughout the year are the characteristic of the basin. The climate along the coastal area of the basin is generally hot with high humidity.

2.9.3.5 Bharathapuzha: The Bharathapuzha River is the second longest west flowing river that drains into the Arabian Sea in Kerala State. This basin is bounded in the east by the Cauvery basin and in the west by the Arabian Sea. The basin lies approximately between 10^0 $26^{'}$ and 11^0 $13^{'}$ north latitudes and 75^0 $53^{'}$ to 77^0 $13^{'}$ east longitudes. Its drainage area is spread in Tamilnadu and Kerala states. The basin is elongated in shape and finds its outlet into the Arabian Sea. The total drainage area of the basin is 6,186 sq km out of which nearly 71 percent lies in the Kerala State. The Bharathapuzha basin receives copious rainfall during the south West monsoon ad it falls in the rain shed region of the Western Ghats.

2.9.3.6 Chalakudi: The Chalakudi River has its origin in the Annamalai hills of Western Ghats. It is formed by the confluence of five streams namely the Parambikulam, the Kuriarkutty, the Sholayar, the Karappara and the Anakayam. The river has a length of 130 km. The total drainage area of the river is 1,704 sq km of which 1404 sq. Km lies in kerala and the rest in Tamil Nadu. Good rainfall and humid atmosphere are felt throughout the year. The climate along the coastal area of this basin is generally hot with high humidity. The Chalakudi river diversion scheme with a weir across the Chalakudi river at Thumburmuzhi is the only Major irrigation scheme in existence in the basin. Presently the project is irrigating an area of 13,500 hectares of land and has a potential to irrigate 19,696 hectares ultimately in the Karuvannur, Chalakudi and Periyar basins. Next to the Periyar and Pamba basin the Chalakudi basin offers the maximum scope for hydel power development.

2.9.3.7 Periyar: The Periyar River is 244 km in length and the longest river of Kerala and drains an area of 5,398 sq km. It rises at the forest land Sivagiri peak 80 km south of Devikulam at an elevation of 2,438m above msl and traverses the steep mountainous terrain before it is joined by the Mullaiyar, 16 km downstream. The river then turns west and continues to flow in the direction for about 16 km in a sandy bed. After a winding course of about 13 km, the river reaches Vandiperiyar and passes through a second narrow gorge below which the Perumthura joins it. Further down, it is joined by six tributaries of which the important tributary Edmala joins the Periyar. Passing Malayattur and thereafter taking a meandering course, the river reaches Alwaye where it divides itself into two branches. The upper branch joins the Chalakudi River at Punthenvelikara and then expands into a broad sheet of water at Munambham. The other branch taking a southerly course is broken up into a number of small channels, which fall into the Vembanad Lake as Varapuzha.

2.9.3.8 Pamba: The Pamba, 176 km in length, is the third longest river in Kerala. It is formed by the confluence of the Pamba Aar, Kaki Aar, Arudhai Aar, Kakkad Aar and Kall Aar. The Pamba Aar rises in the Peermedu Plateau at an elevation of 1,670m. The Kaki Aar, which forms the major tributary of the Pamba River, is a much larger stream at the beginning than the main river. The Pamba River, after receiving the Kaki Aar, flows in a Westerly direction till the Arudhai Aar joins it. At Narayanamuzhi, it turns and follows a south-eastern direction until the Kakkad Aar joins it. Beyond the confluence, the river flows in a southerly direction up to Vadasserikkara where it is joined by the Kall Aar, which has its origin in the Valanjakkatti Malai. The catchment area of the river is 2,235 sq km. At Pandanad, the river bifurcates and one branch taking a western course. The Manimala joins the Pamba in its Neeretupuram branch. The river thereafter flows northwards and falls into the Vembanad Lake through several branches. At present there are two completed structures in Pamba basin. The basin experiences good rainfall, moderate temperature and humid atmosphere. The south west and north east monsoon have great influence over the climatic condition of the basin.

2.9.3.9 Kallada: The Kallada River is formed by the three rivers i.e. Kulathupuzha, Chendurni and Kalthuruthy joining together near Parappar. The river has its origin in Papanasam range south of Kulathupuzha in Quilon district of Kerala State at an altitude of 900m above msl. The river has a length of 121 km and drains an area of 1,699 sq km before confluence with the Ashtamudilake. The Kallada irrigation project is the one existing major project in the basin. The releases from Kallada dam are used to generate electricity. There are other small 13 river basins on west flowing rivers and their drainage area varies from 165 sq km to 1,550 sq km. The basin experiences good rainfall and humid atmosphere throughout the year. The climate along the coastal region of this basin is generally hot with high humidity.

2.9.4 Irrigation Projects: The Anjunem in the sub-basin of Mandovi, Swarna Dam in the sub-basin of Swarna, Kattampally & Pazhassi in the sub-basin of Valapatanam, Malampuzha, Chitturpuzha and Kanhirapuzha Reservoir in the sub-basin of Bharathapuzha, Chalakudi River Diversion Scheme stage-I & II, Sholayar, H.E.S & Peringilkuthu Left Bank Scheme in the Sub_basin of Chalakudi, Periyarvalley Project, Edamalayar & Idukky Hydel Project are in the Sub-basin of Periyar, Pamba Hydel Project in the Sub-Basin of Pamba, Kalada Irrigation Project in the Sub-basin of Kallada are the major projects in the catchment areas of the river

basin. Other major projects like Peechi, Chinmony and 7 Medium Irrigation projects of Kerala are also in the catchment area of the river basin.

2.9.5 Industries: Mainly agriculture based industries are located in these basins.

2.9.6 Hydrological Sites: There are 31 Water Quality observation stations in west flowing river basin. Sediment observations are also made at 17 of these stations. In addition, there are five gauge discharge observation stations in the basin.

2.10 Tapi Basin

2.10.1 Location: The Tapi River is the second largest westward draining interstate river basin. It covers a large area in the State of Maharashtra besides areas in the states of Madhya Pradesh and Gujarat. The Tapi Basin is the northern-most basin of the Deccan plateau and is situated between latitudes 20^0 N to 22^0 N approximately. The Satpura range forms its northern boundary whereas the Ajanta and Satmala hills form its southern extremity. Mahadeo hills form its eastern boundary. The basin finds its outlet in the Arabian Sea in the west. Bounded on the three sides by the hill ranges, the river Tapi, along with its tributaries, more or less flows over the plains of Vidharbha, Khandesh and Gujarat. The Tapi River drains an area of 65,145 sq km out of which nearly 80 percent lies in Maharashtra state.

2.10.2 The Tapi river originates near Multai in Betul district at an elevation of 752m above msl. The total length of this west flowing river from its origin to its out fall into the sea is 724 km. For the first 282 km the river flows in Madhya Pradesh, out of which 54 km forms the common boundary with Maharashtra State. It flows for 228 km in Maharashtra before entering Gujarat. Traversing a length of 214 km in Gujarat, the Tapi River joins Arabian Sea in the Gulf of Cambay after flowing past the Surat city. The river receives tidal influence for a length of about 25 km upstream from the mouth.

2.10.3 The Tapi river receives several tributaries on both the banks. There are 14 major tributaries having a length more than 50 km. On the right bank, 4 tributaries namely the Vaki, Gomai, Arunavati and Aner join the Tapi River. On the left bank, 10 important tributaries namely the Nesu, Arunavati, Buray, Panjhra, Bori, Girna, Waghur, Purna, Mona and Sipna drain into the main channel. The drainage system on the left bank of the Tapi river is, therefore, more extensive as compared to the right bank area.

2.10.4 The Purna and the Girna, the two important left bank tributaries together account for nearly 45 percent of the total catchment area of the Tapi River. The Purna is the principal tributary of the Tapi River originating in Betul district in Gawilgarh hills of the Satpura range, mostly drains the three districts Amravati, Akola and Buldhana of Vidharbha Region. The Girna, another major tributary, rises in the Western Ghats and drains Nasik and Jalgaon districts of Maharashtra. The south-west monsoon sets in by the middle of June and withdraws by mid October. About 90% of total rainfall is received during the monsoon months, of which 50% is received during July and August. The temperature of the basin varies from 5^0 to 48^0 C.

2.10.5 Irrigation Projects: The Ukai Dam, Kate Purna, Nalganga, Girna and Kakrapar Weir are the major projects in the catchment areas of the river basin. There are 3 medium projects of Gujarat, 2 medium projects of Madhya Pradesh and 28 medium projects of Maharashtra are in the catchment area of Tapi river basin.

2.10.6 Urban Centres: Surat is the most important city in the area. Other cities are Amravati, Malegaon, Akola, and Jalgaon.

2.10.7 Industries: Important industries in the basin are textile factories in Surat and newsprint factory at Nepanagar. Other industries are machine tools, drugs & pharmaceuticals, plastics, paper & sugar mills, Dal, Oil & Shaw Mills.

2.10.8 Hydrological Sites: There are 3 Water Quality observation sites are in the basin. Gauge & Discharge and Sediment observations are also made at these stations.

2.11 Narmada basin

2.11.1 Location: The Narmada is the largest west flowing and seventh largest river of India. It drains an area of 98,796 sq km out of which nearly 87% lies in Madhya Pradesh besides some areas in the states of Maharashtra and Gujarat. The Narmada basin lies between east longitudes 72^0 32' to 81^0 45' and north latitudes $21^0$20' to $23^0$45'. It flows through Deccan trap in between Vindhya and Satpura ranges of hills before flowing into the Gulf of Cambay in the Arabian Sea.

2.11.2 The Narmada rises from a Kund (spring) at an elevation of 1057m at Amarkantak in the Maikal hill in Shahdol district of Madhya Pradesh and flows through Madhya Pradesh, Maharashtra and Gujarat between Vindhya and Satpura hill ranges before falling into the Gulf of Cambay in the Arabian Sea about 10 km north of Bharuch district of Gujarat. The total length of this west flowing river from its origin to its outfall into the Sea is 1,312 km. For the first 1,079 km, it runs in Madhya Pradesh and thereafter it forms the common boundary between Madhya Pradesh & Maharashtra for 35 km and Maharashtra & Gujarat for 35 km. In Gujarat State, it stretches for 159 km. There are 41 important tributaries to the Narmada River. Significant among them are Burhner, Banjar, Hiran, Tawa, Chhota Tawa, Orsang and Kundi which are major tributaries having catchment area of more than 3,500 sq km each. The remaining tributaries are having catchment areas ranging from 500 to 2,500 sq km. Temprature of Narmada basin is like any other part of Central India. The upper Narmada basin records lower temperature as compared to middle basin.

2.11.3 Irrigation Projects: Karjan, Sukhi, Sardar Sarover, Jobat, Man, Upper Beda, Maheshwar, Narmada Sagar, Sukta, Kolar, Tawa, Varna, Bargi, Samrat Ashoksagar (Halali), Matiyari and Thanwar are the major projects in the catchment areas of the river basin. There are 2 medium irrigation projects of Gujarat and 21 medium irrigation projects of Madhya Pradesh in the catchment area of Narmada basin.

2.11.4 Urban Centres: Jabalpur town is the main city in this basin. The second largest urban pocket in the Narmada Basin is Bharuch of Gujarat. Other urbanized centers are Khandawa and Dewas of Madhya Pradesh.

2.11.5 Industries: There are about 40 large scale and 70 small-scale industries in the area. But compared to other basins, industrialization is thin in this area.

2.11.6 Minerals: Important minerals found in the basin are Bauxite, Clay, coal, dolomite, graphite, iron ore, manganese, talc & limestone, etc.

2.11.7 Hydrological Sites: There are 18 Water Quality observation sites in the basin. Sediment observations are also made at 11 of these stations. Further, there are 31 gauge and discharge sites being maintained by State Government of Gujarat in Narmada basin.

2.12 Mahi, Sabarmati, Luni and other West Flowing River Basins

2.12.1 West flowing river basins consist of 14 rivers namely Mahi, Sabarmati, Luni and other small river basins, excluding those of Narmada & Tapi basins. The salient features of major 8 basins are explained below.

2.12.1.1 Mahi: The Mahi River is one of the major west flowing interstate rivers of India, draining into the Gulf of Cambay. The basin is bounded on the North and the North - West by Aravalli hills, on the East by the ridge separating it from the Chambal Basin, on the South by the Vindhyas and on the West by the gulf of Cambay. The basin has a maximum width of about 250 km. The river Mahi originates on the Northern slope of Vindhyas at latitude 22^0 $35^{'}$ N and longitude 74^0 $58^{'}$ E near the village of Sardarpur in the Dhar District of Madhya Pradesh at an elevation of 500m above msl. Its length is 583 kms and it traverses through states of Madhya Pradesh, Rajasthan and Gujarat. The river Mahi drains an area of 34,842 sq km. Initially the river flows Northwards through Dhar and Jhabua districts of M.P. and then turns left and passes through the Ratlam district of M.P., then turning to North - West, it enters the Banswara district of Rajasthan and flows in South-West directions and thereafter enters the Panchmahal district of Gujarat state. Then the river continues to flow in the same direction through Kheda district of Gujarat and finally falls into Gulf of Cambay in Arabian Sea. The Mahi Bajaj Sagar, Kadana Reservoir, Wanakbari Weir, Panam, Bhadar, Jakham and Somkamlamba major projects and 94 Medium irrigation projects are in the catchment areas of the Mahi sub-basin. The basin contains two climatic regions, the northern part of the basin comprises sub tropical wet climate (generally basin area occupied by Rajasthan). The major part of the basin comprises tropical wet climate, caused mainly due to existence of Vindhyas and the Western Ghats.The temperature of the basin varies from 3^0 to 48^0C

2.12.1.2 Sabarmati: The Sabarmati River is one of the major West flowing interstate rivers in India, draining into the Gulf of Cambay. The basin is bounded by Aravalli hills in the North and North-east. The ridge separating it from basins of minor streams and draining into Rann of Kutchh and Gulf of Cambay in West and by Gulf of Cambay in South. The basin has a maximum length of 300 km and maximum width of 105 km. It is triangular in shape with the

main river as the base and the source of the Watrak as the apex point. It originates in the Aravalli hills at latitude 24^0 $40^{'}$ N and longitude 73^0 $20^{'}$ E in the Rajasthan State at an elevation of 762m above msl. The river Sabarmati drains an area of 21,674 sq km with a total length of 371 kms. The Sabarmati River, with its origin in Rajasthan, flows generally in south west direction. It enters the Gujarat State and passes through the plains and continues to flow in the same direction and joins the Gulf of Cambay in the Arabian Sea. The Dharoi Dam, Watrak, Meshwa Reservoir, Meshwa Canal, Sabarmati, Moti fatewati and Hathmati major projects and 1 medium project are in the catchment areas of Sabarmati sub-basin. The basin contains two climatic regions, the northern part of the basin comprises sub tropical wet climate (generally basin area occupied by Gujarat). The major part of the basin comprises tropical wet climate, caused mainly due to existence of Aravalli and the Western Ghats.The temperature of the basin varies from 2^0 to 48^0C

2.12.1.3 Luni: The Luni is the only significant river basin in Western Rajasthan which forms the bulk of arid zone. Luni originates from Western slopes of the Aravalli ranges at an elevation of 772m above msl near Ajmer flowing in South West direction and traversing a course of 511 km in Rajasthan before it finally flows into the Rann of Kutchh. Its total catchment 32879 sq km area falls in Rajasthan. Luni basin is situated in between 24^0 $11^{'}$ to 26^0 $43^{'}$ North latitude and 70^0 $37^{'}$ to 74^0 $39^{'}$ East longitude approximately. The peculiarity of this river is that it tends to increase its width rather than deepening the bed because the banks are of soils which are easily erodable whereas beds are of sand. The floods develop and disappear so rapidly that they have no time to scour the bed. The Aravalli ranges forms its East boundary whereas main course of river in Barmer district itself forms North boundary and mostly Banas and initial reach of Chambal River form its Southern boundary. Luni receives all the main tributaries on its left bank except one i.e. Jojari (Mithri) on the right bank. Luni receives ten tributaries namely Lilari, Guhiya, Bandi (Hemawas), Sukri (Hemawas), Sukri, Mithri, Jawai, Khari Bandi, Sukri Bandi and Sugi. Hence the drainage on the left bank of Luni is, therefore, more extensive than on Right Bank. The Luni drains an area of 32,879 sq Km in Rajasthan State only. The rainfall in the basin is erratic and its distribution is uneven in the catchment. The temperature of the basin ranges from 5^0 to 46^0C.

2.12.1.4 Banas: The river Banas originates from Aravalli hills and descends in a South-Western direction through Rajasthan state and travels through Banaskantha and Mehsana district of Gujarat before it drains into little Rann of Kutchh. The Banas basin is the Northern basin and is situated between 23^0 $30^{'}$ & 24^0 $55^{'}$ north latitudes and 71^0 $15^{'}$ to 73^0 $15^{'}$ east longitudes approximately. Saraswati and Luni basins form the Southern and Northern boundaries of this basin. The Aravalli hills form its eastern extremity. The Banas drains an area of 8,674 sq km out of which nearly 37.69% lies in Rajasthan state and remaining 62.31% falls in Gujarat state. The Banas River rises near Pindwara of Sirohi district of Rajasthan at an elevation of 372.51m above msl. Little Rann of Kutchh is the outfall of Banas river. Sipu is the only right bank tributary of Banas River which drains into the main channel. There are 6 tributaries on the left bank of Banas River namely the Batria, the Sukli, the Sewaran, the Suket, the Balaram and the Khari which drain into the main channel. Hence the draining system on the left bank of the Banas River is more extensive as compared to the right bank area. The Sipu and the Khari are the two important right and left bank tributaries which together drain nearly 37% of the total catchment area of Banas. The Sipu Dam, Panam and Dantiwada Dam are the major projects in the catchment areas of Banas sub-basin.

2.12.1.5 Shetrunji: The Shetrunji is one of the major rivers of Saurashtra. The Shetrunji basin is the Eastern most basin of Saurashtra and is situated in between 21^0 $00^{'}$ to 21^0 $47^{'}$ North latitude and 70^0 $50^{'}$ to 72^0 $10^{'}$ East longitude. The river Shetrunji originates at Chechai hills in Gir forest of Junagadh district at an elevation of 380m above msl and flows towards East direction till its confluence with Gulf of Cambay near Santhrampur port. The river Shetrunji fertile the Amerli and Bhavanagar districts and a small area of Junagadh district of Saurashtra. The Shetrunji drains an area of 5,514 sq km out of which more than 50% is in Amerli district. The total length of the river from its origin to the outfall into the Gulf of Cambay is 182 km. This river receives tidal influence for a length of 5 km from mouth. The Shetrunji receives several tributaries on both banks. There are 9 tributaries having lengths more than 15 km out of which Safara, Shel, Khari and Talaji are the 4 tributaries on the right bank of Shetrunji and the remaining 5 tributaries namely Stali, Thebu, Gagadia, Rajwal and Kharo are on left bank. The drainage system on left bank of Shetrunji is more extensive as compared to the right bank area. The Stali, Theli and Gagaria are important tributaries feeding from left bank of Shetrunji and drain nearly 34% of total catchment area of river Shetrunji. The Shetrunji Irrigation Scheme is the only major project in the catchment areas of the river basin.

2.12.1.6 Bhadar: Bhadar is one of the major rivers of Saurashtra and it drains about $1/7^{th}$ of the area of Saurashtra. The Bhadar basin is the South Western basin and situated between 21^0 45' to 22^0 $10^{'}$ North latitude and 69^0 $45^{'}$ to 71^0 $20^{'}$ East longitude. The river Bhadar originates at an elevation of 261m above msl in Vaddi about 26 km North-West of Jasdan in Rajkot district and flows towards South upto Jasdan village and then turns towards South-West upto village Jetpur and finally changes its direction towards West till its confluence with Arabian sea at Navibandar (Porbandar). The Bhadar River, from Jetpur to Porbandar, fertiles Rajkot, Jamnagar, Amreli and Junagadh district of Saurastra. The river drains an area of 7,094 sq km out of which 706 sq km is in hill and the rest in plain regions of Saurashtra. The total length of this South West flowing river from its origin to its outfall into the sea is 198 km. For the first 150 km, the river flows in Rajkot district and the rest of 48 km in Junagadh district. The river receives tidal influence for a length of about 26 km from mouth in Junagadh district. The river Bhadar receives several tributaries on both the banks. There are 9 major tributaries having a length of more than
25 km out of which 6 tributaries namely Gondali, Chapparwadi, Phopal, Utawali, Moj and Venu are feeding from right and the remaining 3 tributaries namely Vasavadi, Surwa and Galolia from left. The drainage system on the right bank of river Bhadar is more extensive as compared to the left bank. The Bhadar Irrigation Scheme is the only major project in the catchment areas of the river basin.

2.12.1.7 Vaitarna: The Vaitarna River originates from hilly terrains of Maharashtra at Trimbak, district Nasik. After running for 120 km in Maharashtra towards West, it falls in the Arabian Sea. The Catchment area of the basin is 2019 sq km. The complete catchment area is located between East longitude of 72^0 45' to 73^0 35' and North latitude of 19^0 30' to 20^0 20'. The main tributaries of this river are Pinjal, Ganjal, Surya, Daharji and Tansa.

2.12.1.8 Dhadar: The Dhadar River is one of the West flowing rivers in Gujarat state. It originates from Pavagadh hills of Gujarat state and flows through Vadodara and Bharuch districts. The river Dhadar, after flowing 87 km, receives Vishwamitri tributary from right

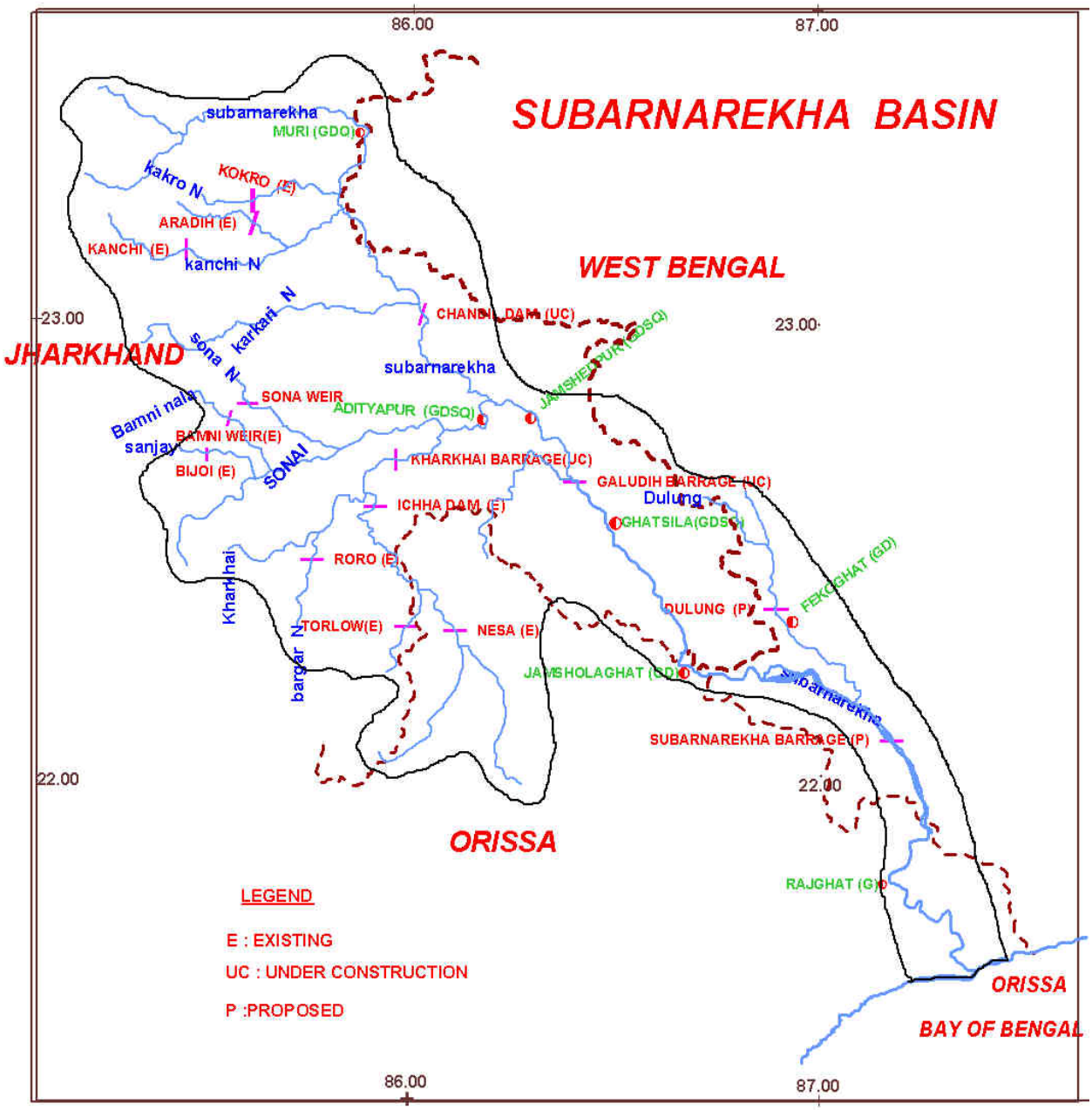
bank at Pingalwada village. After flowing 55 km it falls into the Gulf of Cambay. The total catchment area of Dhadar basin is 3,423 sq km. It lies between east longitude 72^0 30' and 73^0 45' and north latitude 21^0 45' and 22^0 45'. The important tributaries of Dhadar are Vishwamitri and Rangav. The Damanganga Reservoir & Madhuban Dam Major projects are in the sub-basin of Damanganga and Watrak major project is in the sub-basin of Watrak River basin.

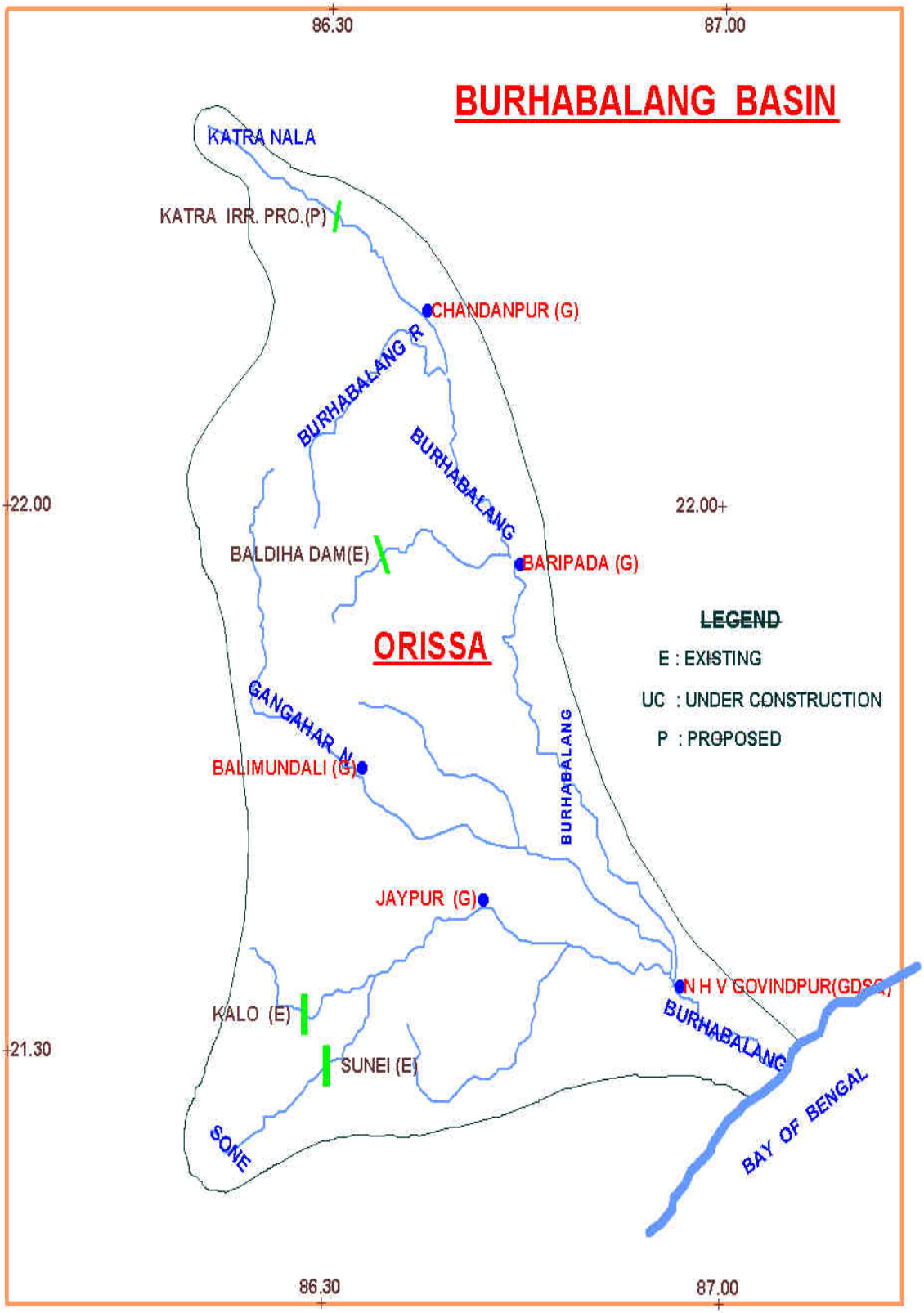
2.12.2 Urban Centre: Ahmadabad & Vadodara are two important cities on west flowing rivers basin.

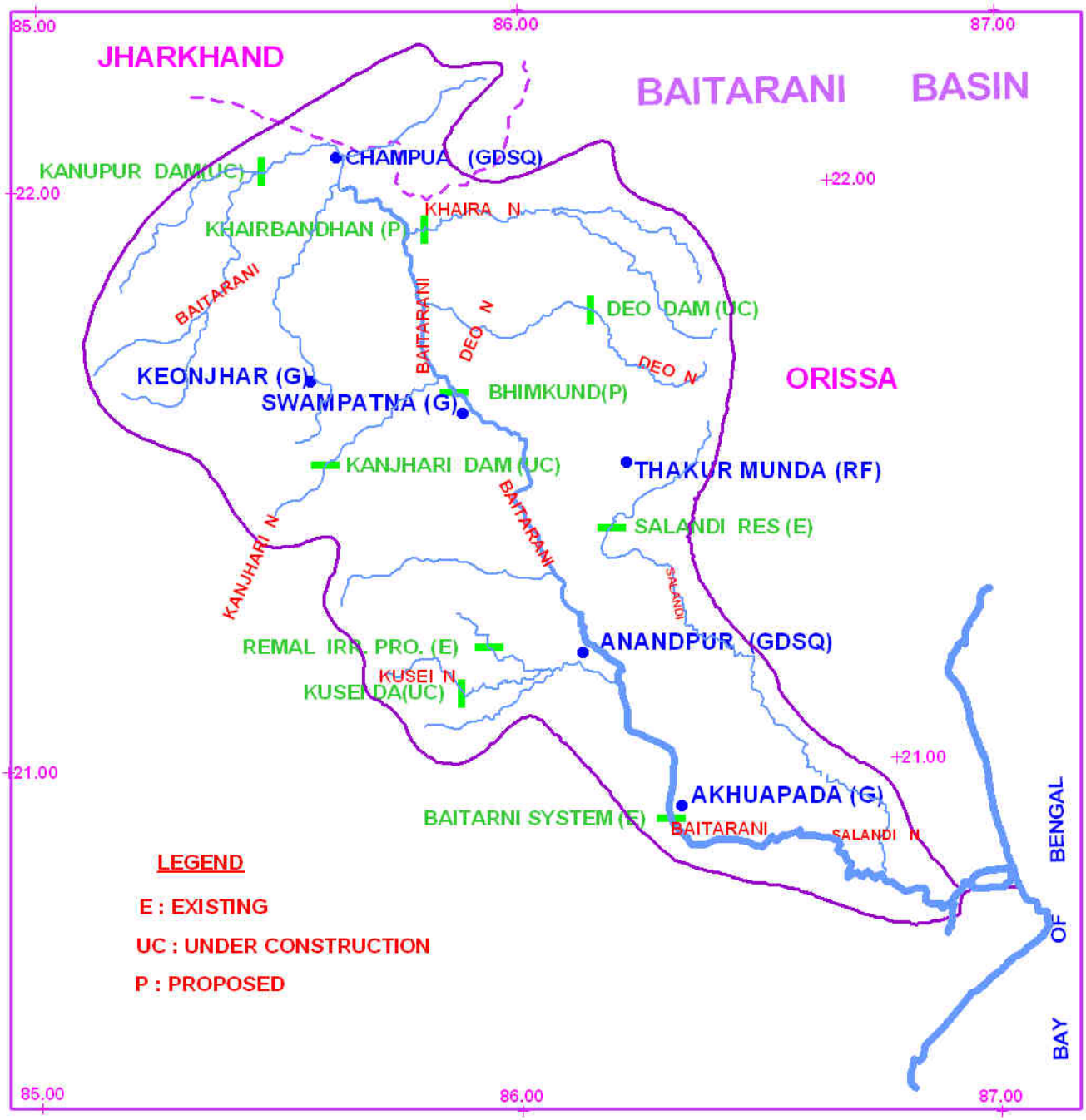
2.12.3 Industries: In addition to agriculture based industries, there are important industries of textile, leather & leather goods, plastic, rubber goods, paper, newsprint, automobile, machine tools, drugs, Pharmaceuticals etc.

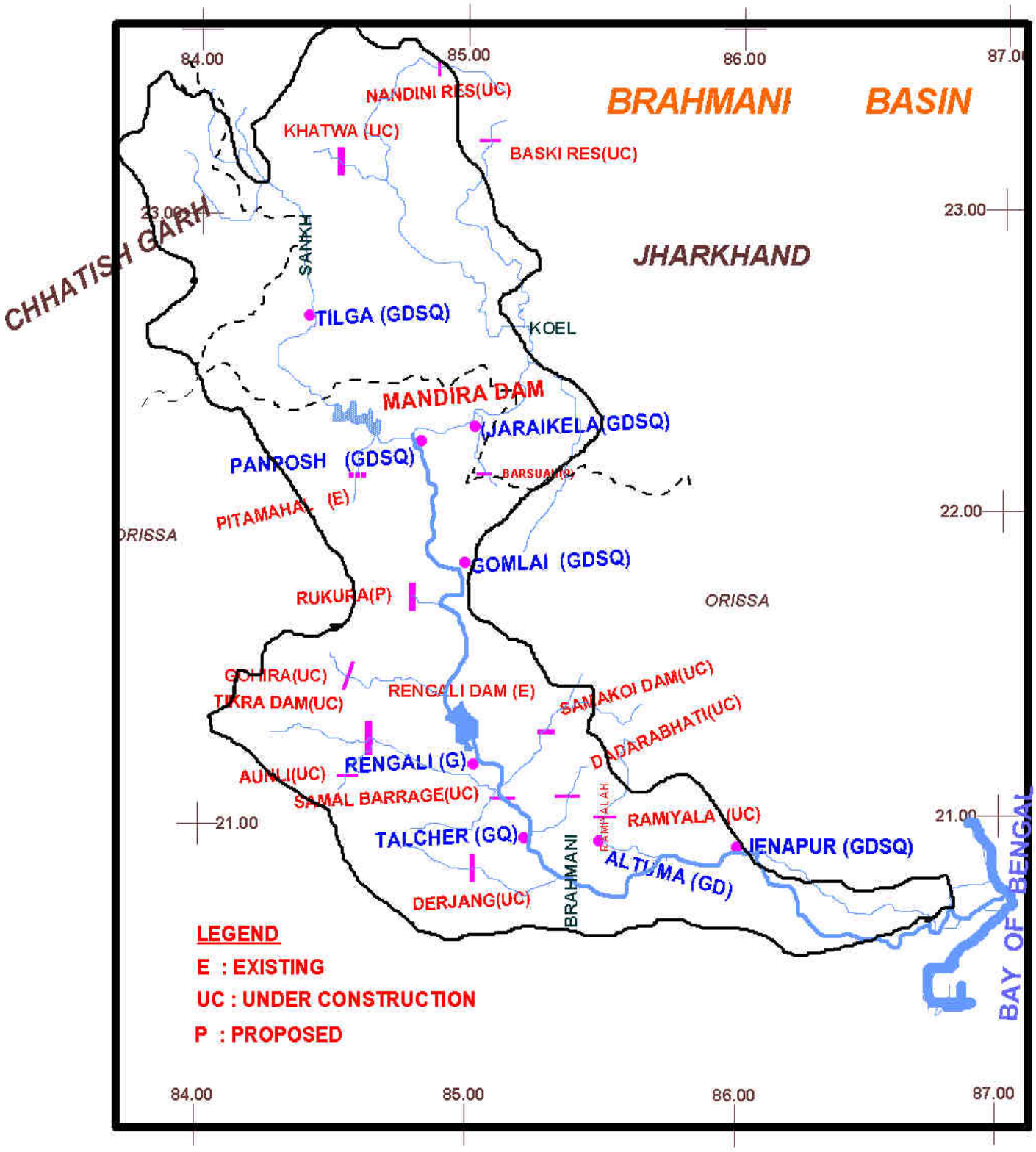
2.12.4 Hydrological Sites: There are 14 Water Quality observation centers in this basin. Sediment observations are also made at 9 of these stations. In addition there are 13 gauge discharge observation stations in the basin.

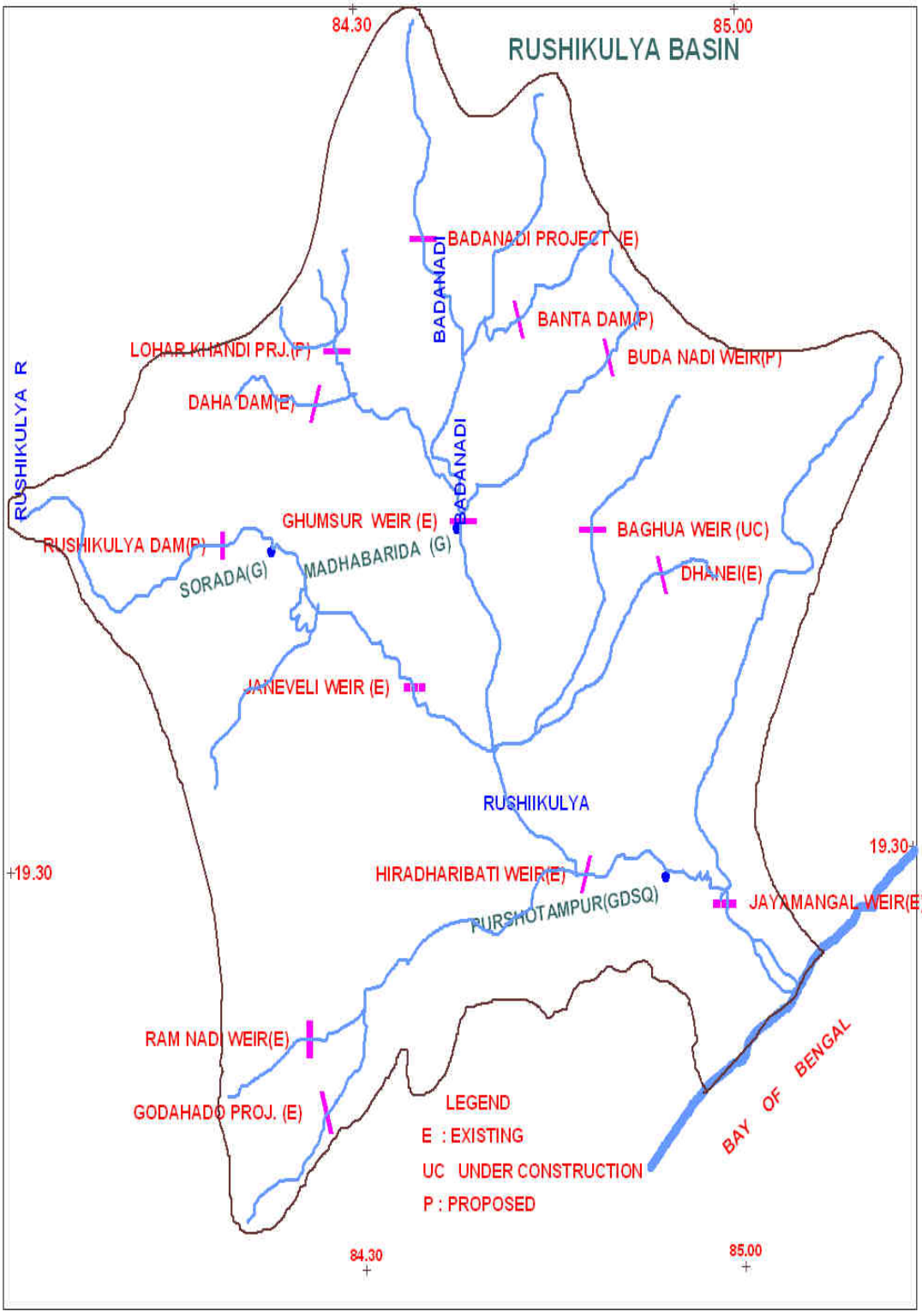

MAHANADI BASIN
INDIA
BIHAR
MADHYA PRADESH
ORISSA
MAHARASHTRA
BAY OF BENGAL
N
81 E
82
83
84
85
86
87
23 N
22
21
20
CENTRAL WATER COMMISSION
PLATE NO. CWC/NBO/B8
Projection: International (Polyconic)
Map not to scale
For international/State boundaries and Coast lines refer to Survey of India maps

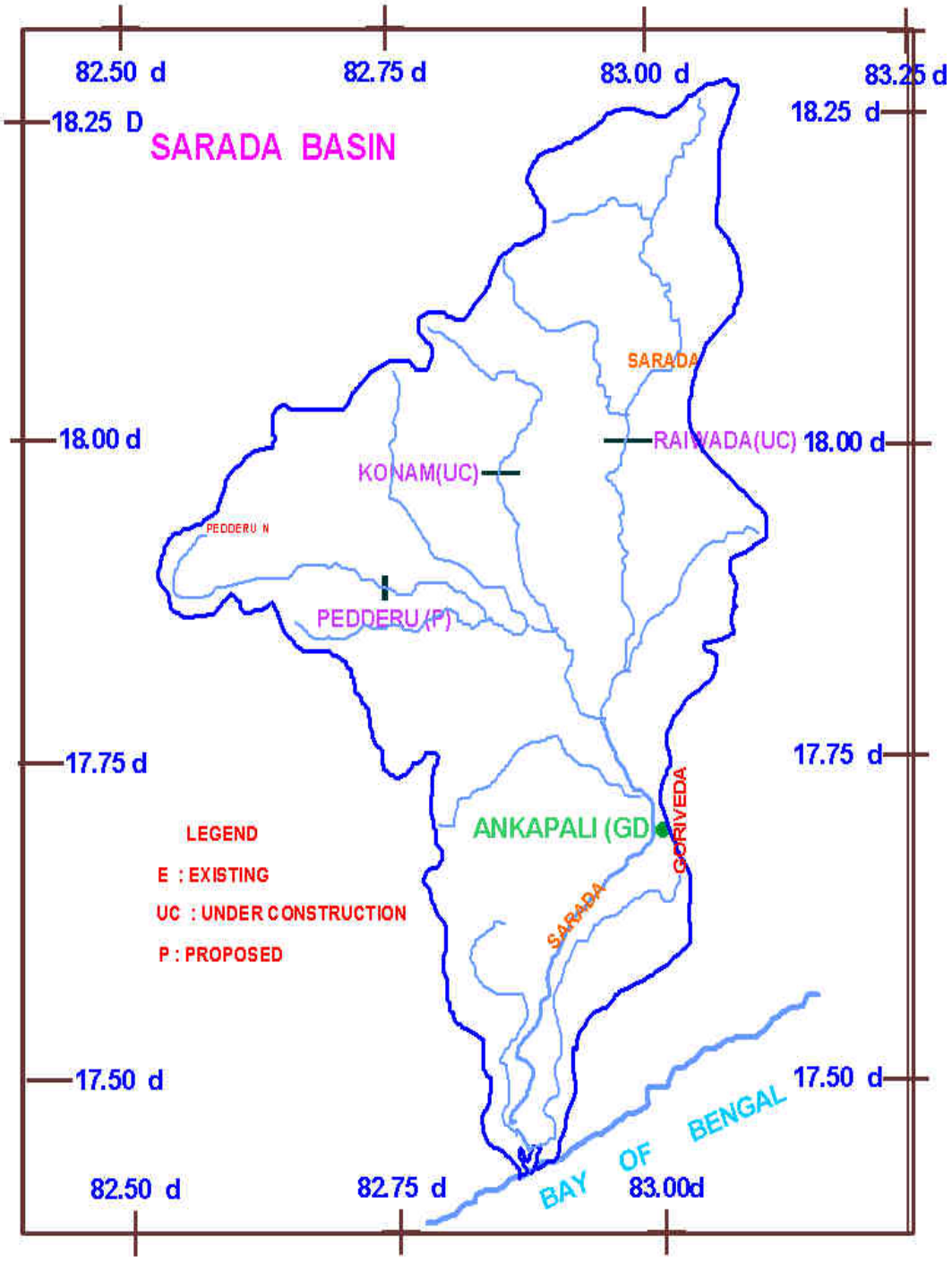

SUBARNAREKHA BASIN
86.00
87.00
23.00
22.00
JHARKHAND
WEST BENGAL
ORISSA
BAY OF BENGAL
subarnarekha
MURI (GDQ)
kakro N
KOKRO (E)
ARADIH (E)
KANCHI (E)
kanchi N
karkari N
sona N
CHANDIL DAM (UC)
JAMSHEDPUR (GDSQ)
SONA WEIR
ADITYAPUR (GDSQ)
Bamni nala
BAMNI WEIR(E)
sanjay
BIJOI (E)
SONAI
KHARKHAI BARRAGE(UC)
GALUDIH BARRAGE (UC)
Dulung
ICHHA DAM (E)
GHATSILA(GDSQ)
RORO (E)
Kharkhai
TORLOW(E)
NESA (E)
bargar N
DULUNG (P)
FEKGHAT (GD)
JAMSHOLAGHAT (GD)
SUBARNAREKHA BARRAGE(P)
RAJGHAT (G)
LEGEND
E : EXISTING
UC : UNDER CONSTRUCTION
P :PROPOSED

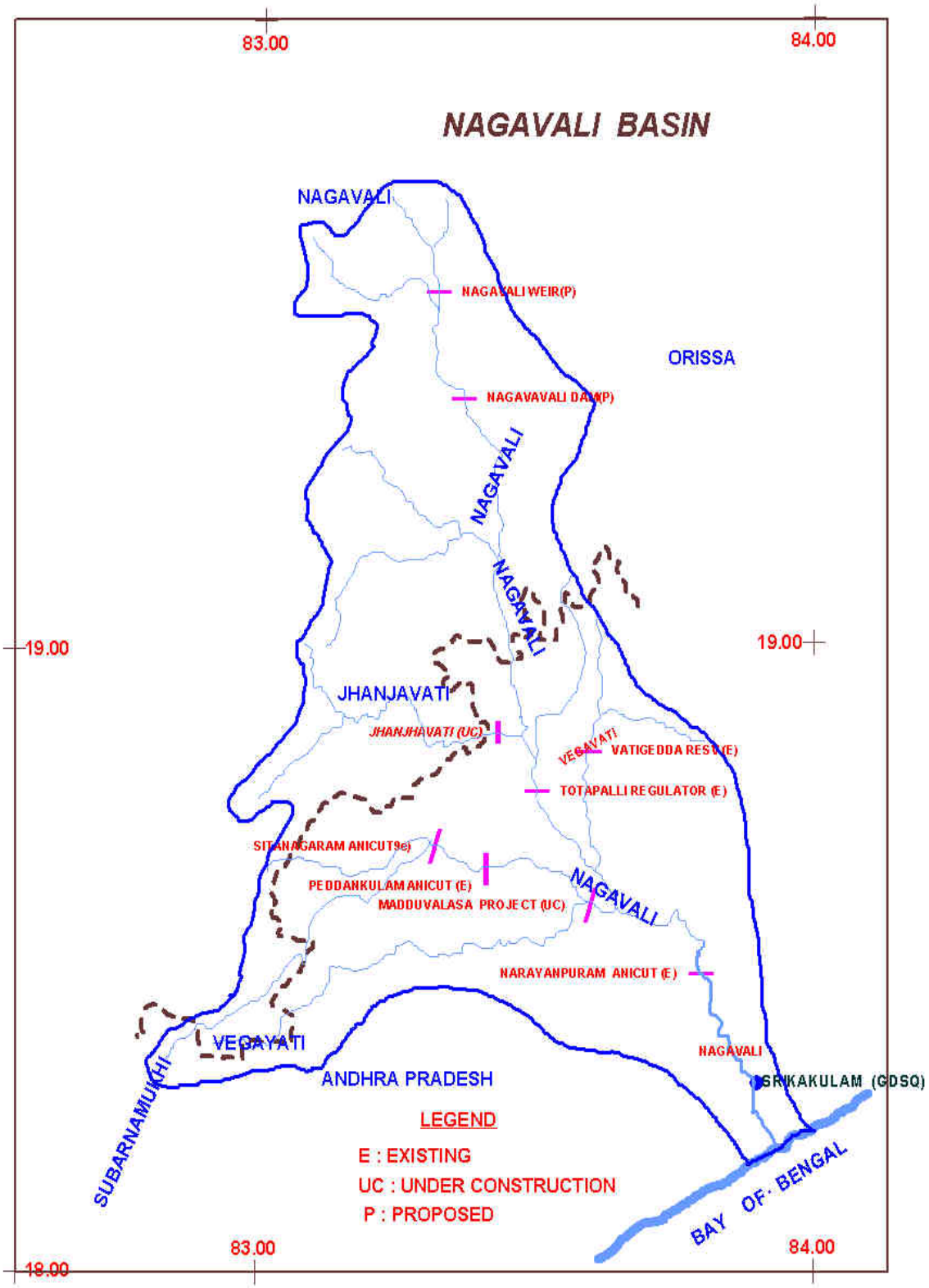

86.30
87.00
BURHABALANG BASIN
KATRA NALA
KATRA IRR. PRO.(P)
CHANDANPUR (G)
BURHABALANG R
BURHABALANG
22.00
22.00
BALDIHA DAM(E)
BARIPADA (G)
LEGEND
E : EXISTING
UC : UNDER CONSTRUCTION
P : PROPOSED
ORISSA
GANGAHAR N
BALIMUNDALI (G)
BURHABALANG
JAYPUR (G)
N H V GOVINDPUR(GDSC)
KALO (E)
BURHABALANG
21.30
SUNEI (E)
SONE
BAY OF BENGAL
86.30
87.00

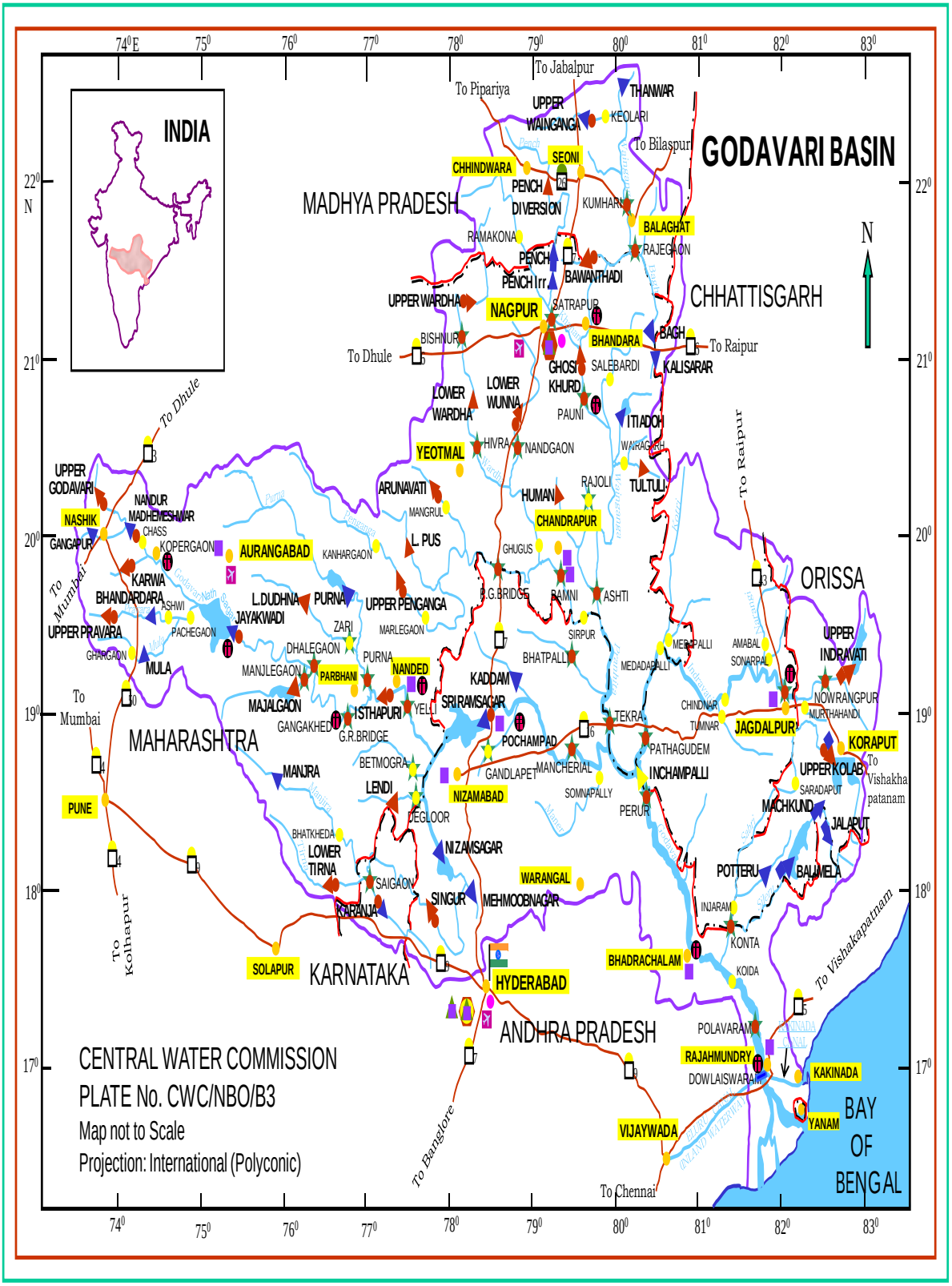

85.00
86.00
87.00
JHARKHAND
BAITARANI BASIN
KANUPUR DAM(UC)
CHAMPUA (GDSQ)
22.00
KHAIRA N
KHAIRBANDHAN (P)
BAITARANI
BAITARANI
DEO N
DEO DAM (UC)
DEO N
KEONJHAR (G)
SWAMPATNA (G)
BHIMKUND(P)
ORISSA
KANJHARI DAM (UC)
THAKUR MUNDA (RF)
KANJHARI N
BAITARANI
SALANDI RES (E)
SALANDI
REMAL IRR. PRO. (E)
ANANDPUR (GDSQ)
KUSEI N
KUSEI DA(UC)
21.00
AKHUAPADA (G)
BAITARNI SYSTEM (E)
BAITARANI
SALANDI N
BENGAL
OF
BAY
LEGEND
E : EXISTING
UC : UNDER CONSTRUCTION
P : PROPOSED


BRAHMANI BASIN
CHHATISH GARH
JHARKHAND
ORISSA
ORISSA
BAY OF BENGAL
84.00
85.00
86.00
87.00
23.00
22.00
21.00
NANDINI RES(UC)
KHATWA (UC)
BASKI RES(UC)
SANKH
TILGA (GDSQ)
KOEL
MANDIRA DAM
JARAIKELA(GDSQ)
PANPOSH (GDSQ)
BARSUA(P)
PITAMAHAL (E)
GOMLAI (GDSQ)
RUKURA(P)
GOHIRA(UC)
TIKRA DAM(UC)
RENGALI DAM (E)
SAMAKOI DAM(UC)
DADARABHATI(UC)
AUNLI(UC)
RENGALI (G)
SAMAL BARRAGE(UC)
RAMIYALA (UC)
TALCHER (GQ)
IENAPUR (GDSQ)
ALTUMA (GD)
DERJANG(UC)
BRAHMANI
LEGEND
E : EXISTING
UC : UNDER CONSTRUCTION
P : PROPOSED

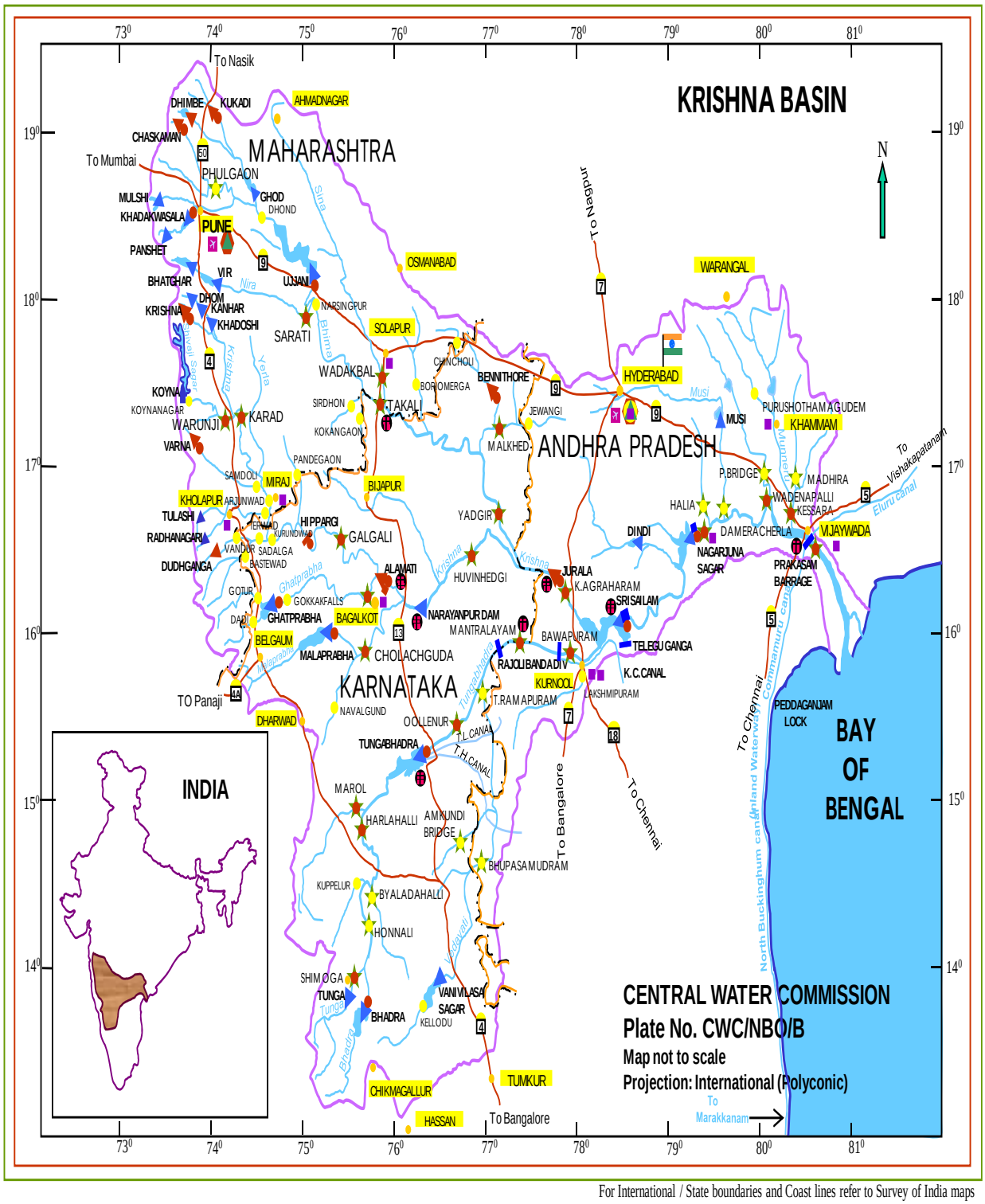

RUSHIKULYA BASIN
84.30
85.00
19.30
BADANADI PROJECT (E)
BADANADI
BANTA DAM(P)
BUDA NADI WEIR(P)
LOHAR KHANDI PRJ.(P)
DAHA DAM(E)
RUSHIKULYA R
BADANADI
GHUMSUR WEIR (E)
BAGHUA WEIR (UC)
RUSHIKULYA DAM(P)
SORADA(G)
MADHABARIDA (G)
DHANEI(E)
JANEVELI WEIR (E)
RUSHIIKULYA
HIRADHARIBATI WEIR(E)
PURSHOTAMPUR(GDSQ)
JAYAMANGAL WEIR(E)
RAM NADI WEIR(E)
GODAHADO PROJ. (E)
LEGEND
E : EXISTING
UC UNDER CONSTRUCTION
P : PROPOSED
BAY OF BENGAL


82.50 d
82.75 d
83.00 d
83.25 d
18.25 D
18.25 d
SARADA BASIN
SARADA
18.00 d
RAIVADA(UC)
18.00 d
KONAM(UC)
PEDDERU N
PEDDERU (P)
17.75 d
17.75 d
LEGEND
E : EXISTING
UC : UNDER CONSTRUCTION
P : PROPOSED
ANKAPALI (GD)
GORIVEDA
SARADA
17.50 d
17.50 d
BAY OF BENGAL
82.50 d
82.75 d
83.00d

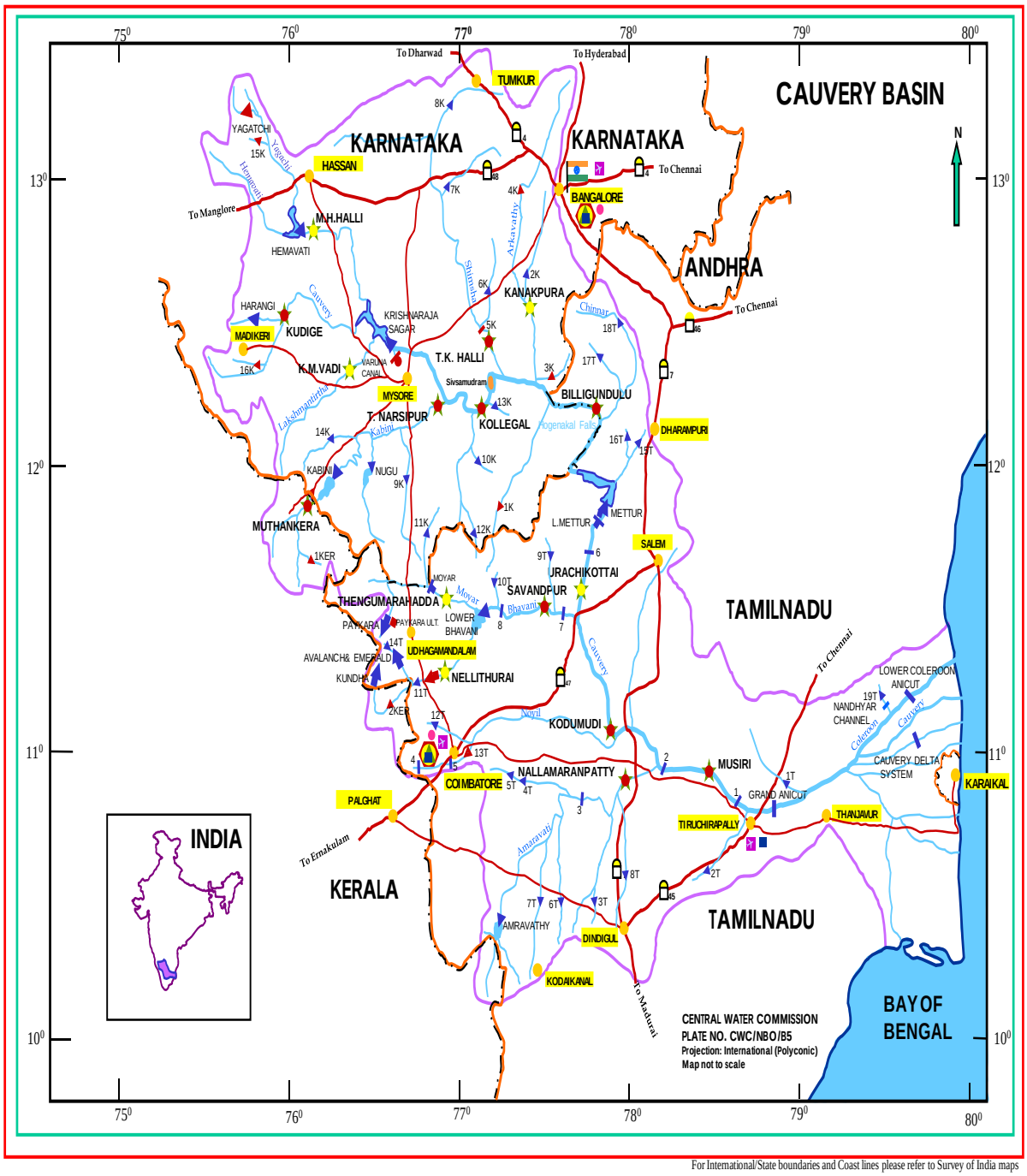

83.00
84.00
NAGAVALI BASIN
NAGAVALI
NAGAVALI WEIR(P)
ORISSA
NAGAVAVALI DAM(P)
NAGAVALI
NAGAVALI
19.00
19.00
JHANJAVATI
JHANJHAVATI (UC)
VEGAVATI
VATIGEDDA REST.(E)
TOTAPALLI REGULATOR (E)
SITANAGARAM ANICUT9e)
PEDDANKULAM ANICUT (E)
MADDUVALASA PROJECT (UC)
NAGAVALI
NARAYANPURAM ANICUT (E)
VEGAYATI
NAGAVALI
SRIKAKULAM (GDSQ)
ANDHRA PRADESH
SUBARNAMUKHI
LEGEND
E : EXISTING
UC : UNDER CONSTRUCTION
P : PROPOSED
BAY OF BENGAL
18.00
83.00
84.00

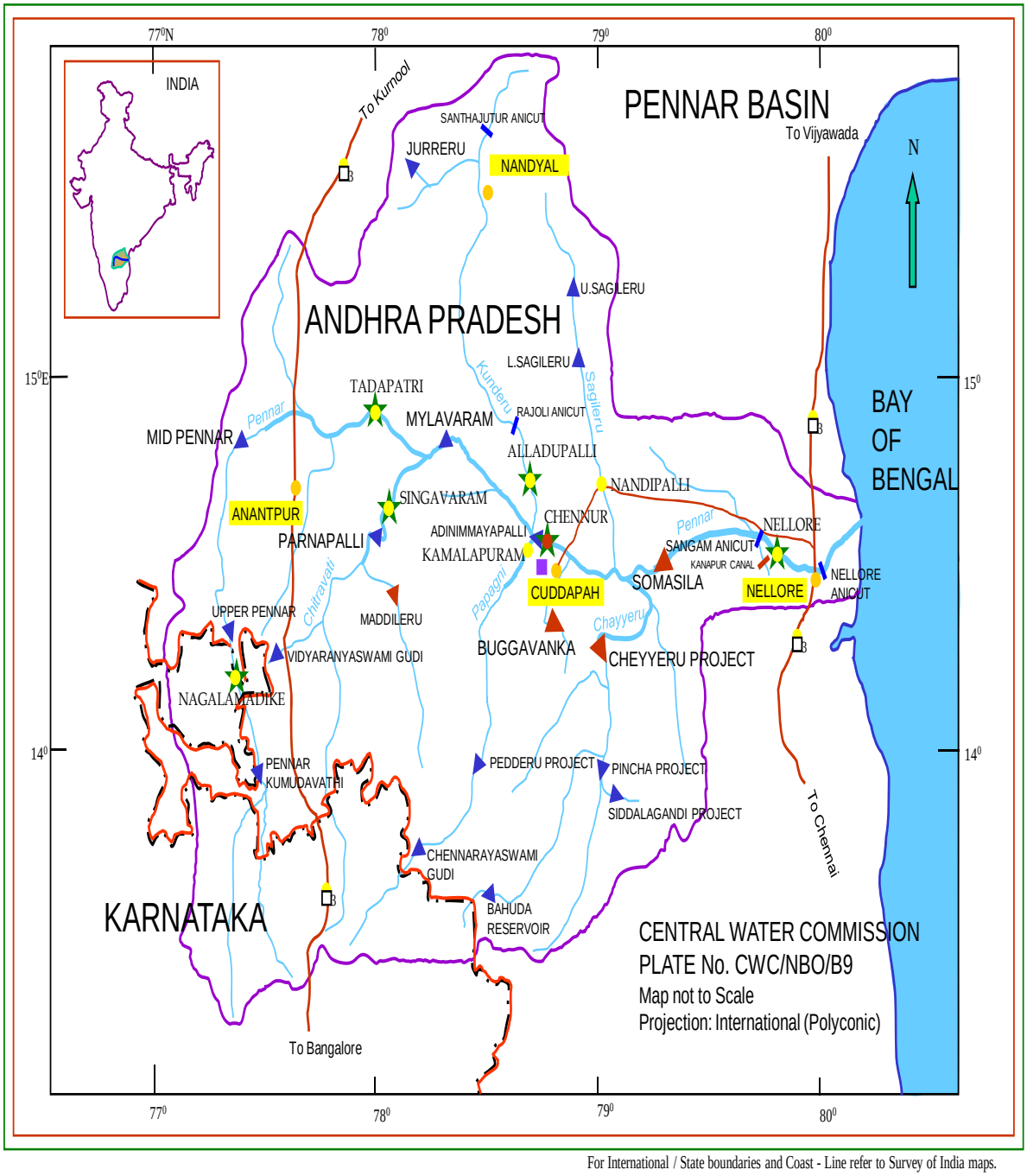


For International / State boundaries and Coast lines refer to Survey of India maps

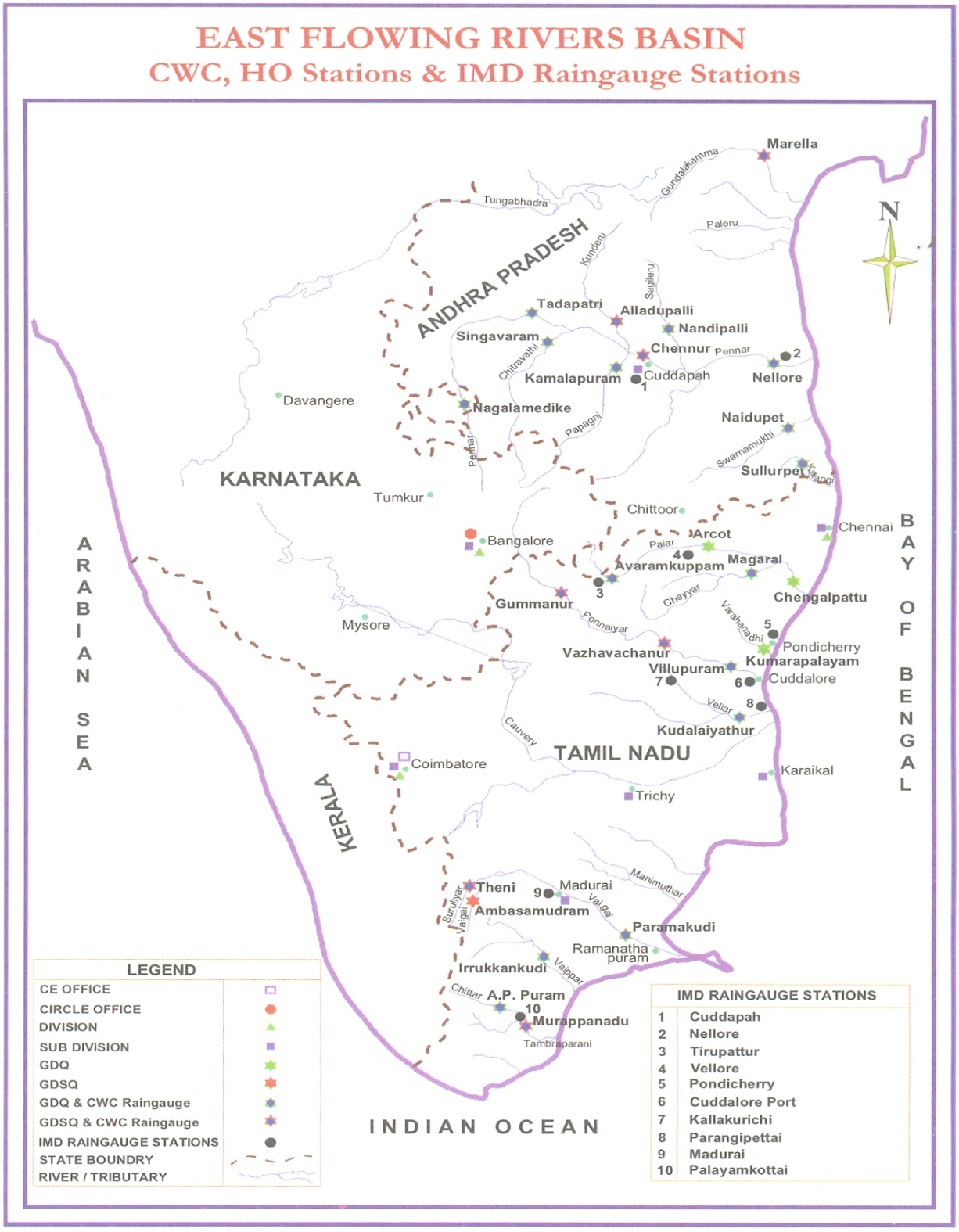


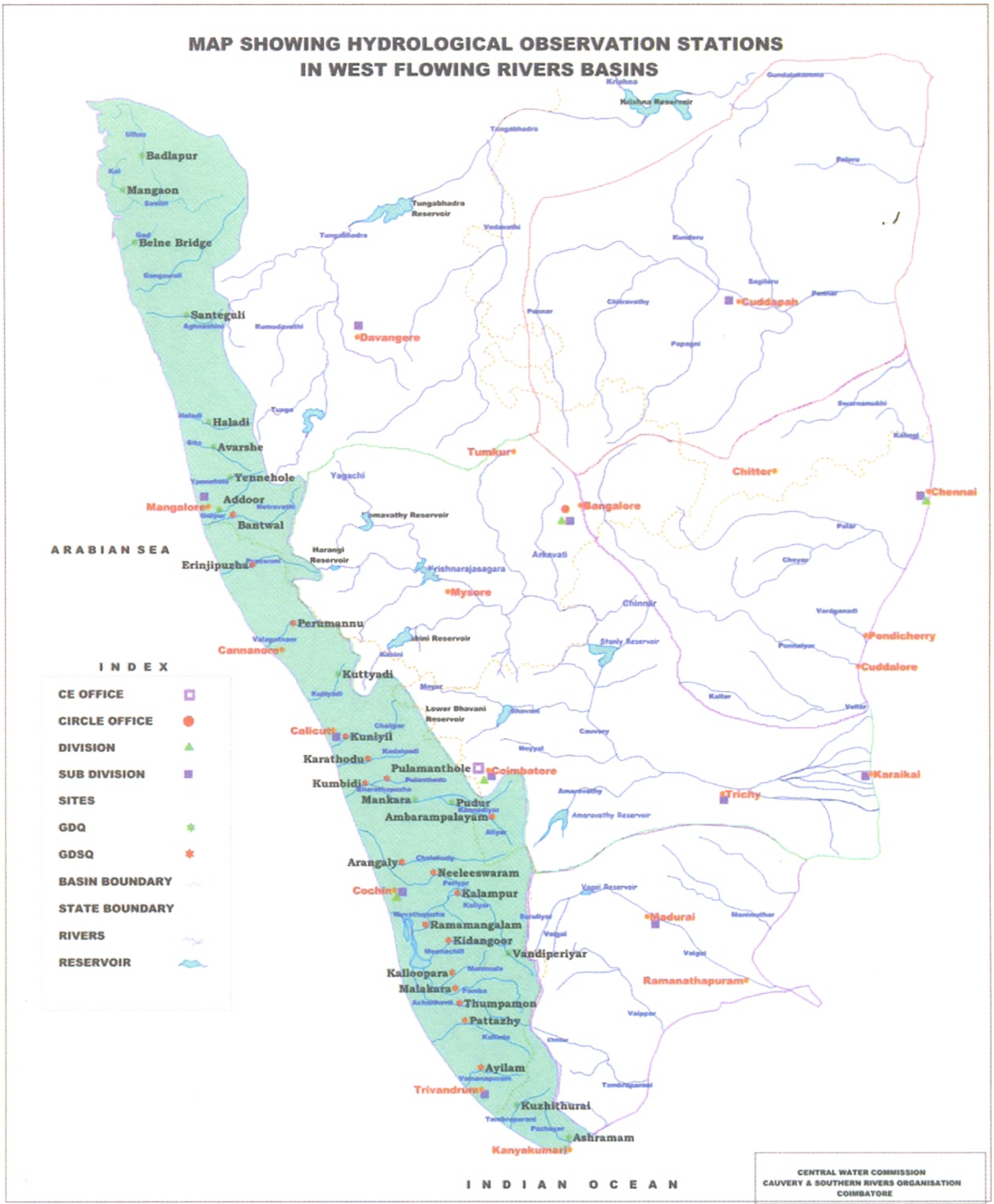
For International / State boundaries and Coast lines refer to Survey of India maps

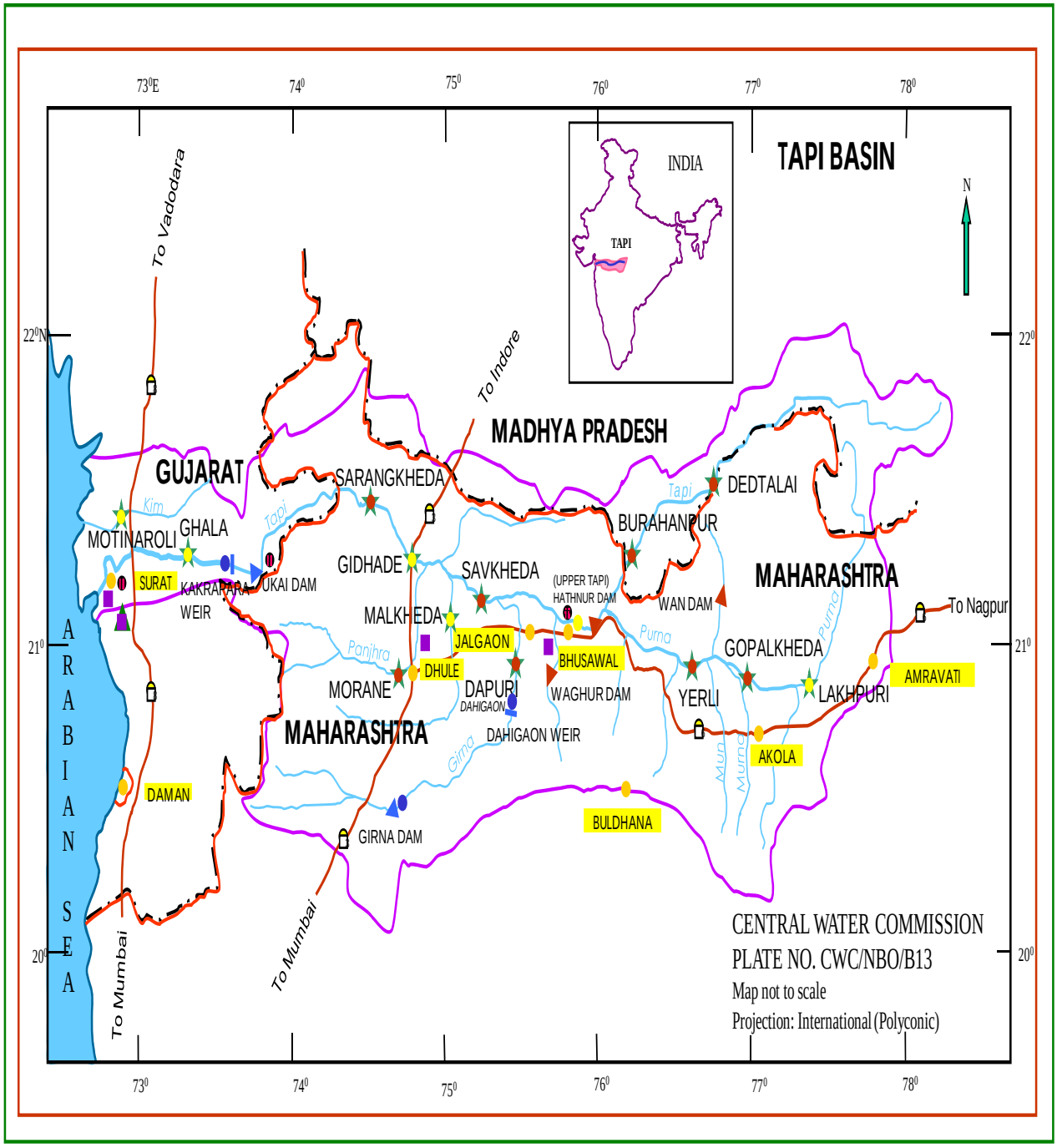

CAUVERY BASIN
KARNATAKA
KARNATAKA
ANDHRA
TAMILNADU
KERALA
TAMILNADU
BAY OF BENGAL
INDIA
TUMKUR
BANGALORE
HASSAN
M.H.HALLI
HEMAVATI
KANAKPURA
KRISHNARAJA SAGAR
T.K. HALLI
MYSORE
T. NARSIPUR
KOLLEGAL
BILLIGUNDULU
DHARAMPURI
METTUR
SALEM
JRACHIKOTTAI
SAVANDPUR
THENGUMARAHADDA
UDHAGAMANDALAM
NELLITHURAI
KODUMUDI
NALLAMARANPATTY
COIMBATORE
PALGHAT
MUSIRI
GRAND ANICUT
TIRUCHIRAPALLY
THANJAVUR
KARAIKAL
DINDIGUL
KODAIKANAL
AMRAVATHY
MUTHANKERA
KUDIGE
MADIKERI
HARANGI
K.M.VADI
NUGU
KABINI
To Dharwad
To Hyderabad
To Chennai
To Manglore
To Ernakulam
To Madurai
CENTRAL WATER COMMISSION
PLATE NO. CWC/NBO/B5
Projection: International (Polyconic)
Map not to scale
For International/State boundaries and Coast lines please refer to Survey of India maps



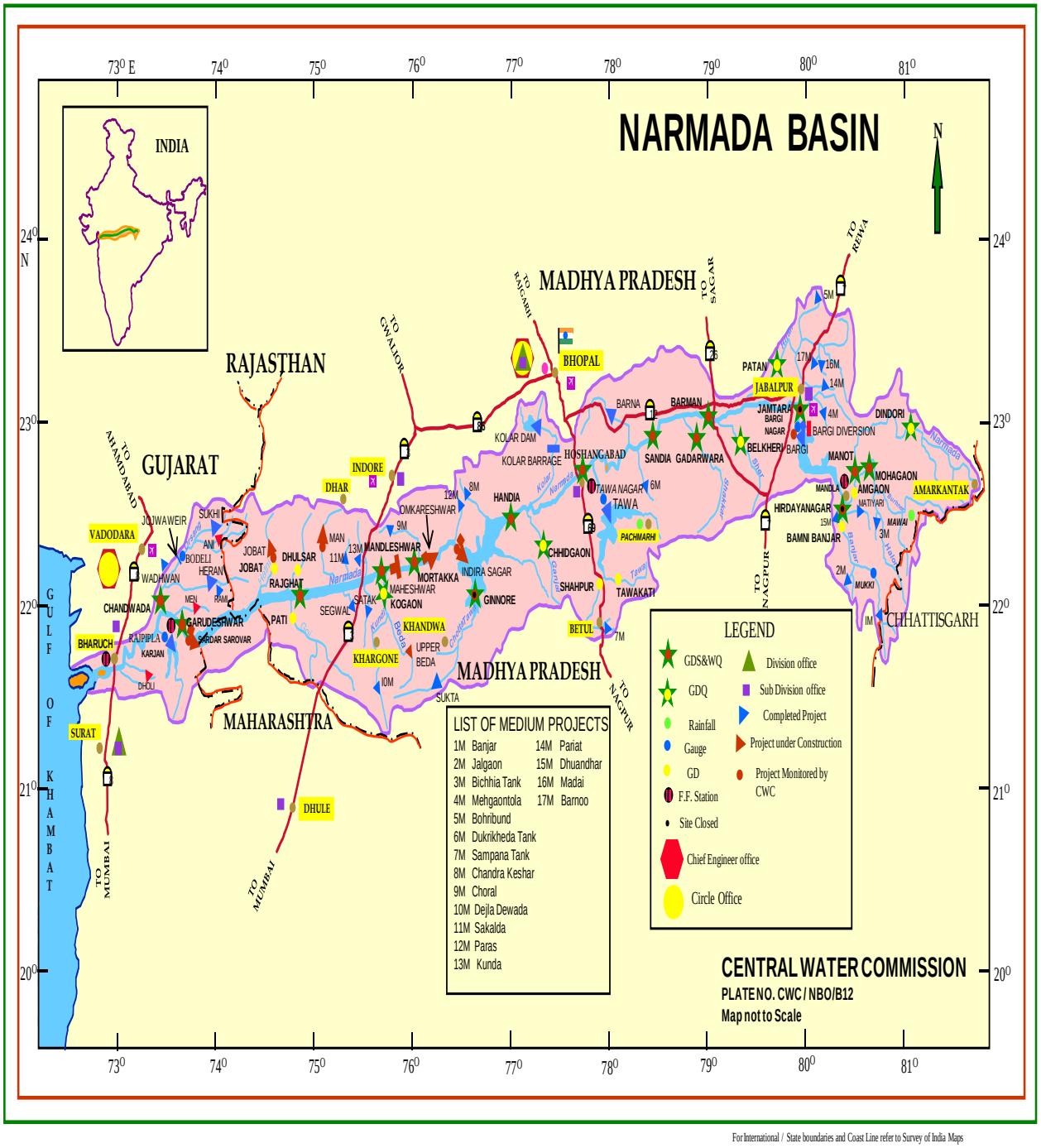
For International / State boundaries and Coast - Line refer to Survey of India maps.


EAST FLOWING RIVERS BASIN
CWC, HO Stations & IMD Raingauge Stations
ANDHRA PRADESH
KARNATAKA
TAMIL NADU
KERALA
ARABIAN SEA
BAY OF BENGAL
INDIAN OCEAN
N
Marella
Gundalakamma
Tungabhadra
Paleru
Kunderu
Sagileru
Tadapatri
Alladupalli
Nandipalli
Singavaram
Chennur
Pennar
Nellore
Chitravathi
Kamalapuram
Cuddapah
Davangere
Nagalamedike
Papagni
Penna
Naidupet
Swarnamukhi
Sullurpet
Vaagni
Tumkur
Chittoor
Chennai
Bangalore
Palar
Arcot
Avaramkuppam
Magaral
Cheyyar
Chengalpattu
Gummanur
Mysore
Ponnaiyar
Varahanadhi
Pondicherry
Vazhavachanur
Kumarapalayam
Villupuram
Cuddalore
Vellar
Kudalaiyathur
Cauvery
Coimbatore
Karaikal
Trichy
Manimuthar
Theni
Madurai
Suruliyar
Vaigai
Ambasamudram
Paramakudi
Ramanatha puram
Irrukkankudi
Vaippar
Chittar
A.P. Puram
Murappanadu
Tambraparani
LEGEND
CE OFFICE
CIRCLE OFFICE
DIVISION
SUB DIVISION
GDQ
GDSQ
GDQ & CWC Raingauge
GDSQ & CWC Raingauge
IMD RAINGAUGE STATIONS
STATE BOUNDRY
RIVER / TRIBUTARY
IMD RAINGAUGE STATIONS
1 Cuddapah
2 Nellore
3 Tirupattur
4 Vellore
5 Pondicherry
6 Cuddalore Port
7 Kallakurichi
8 Parangipettai
9 Madurai
10 Palayamkottai

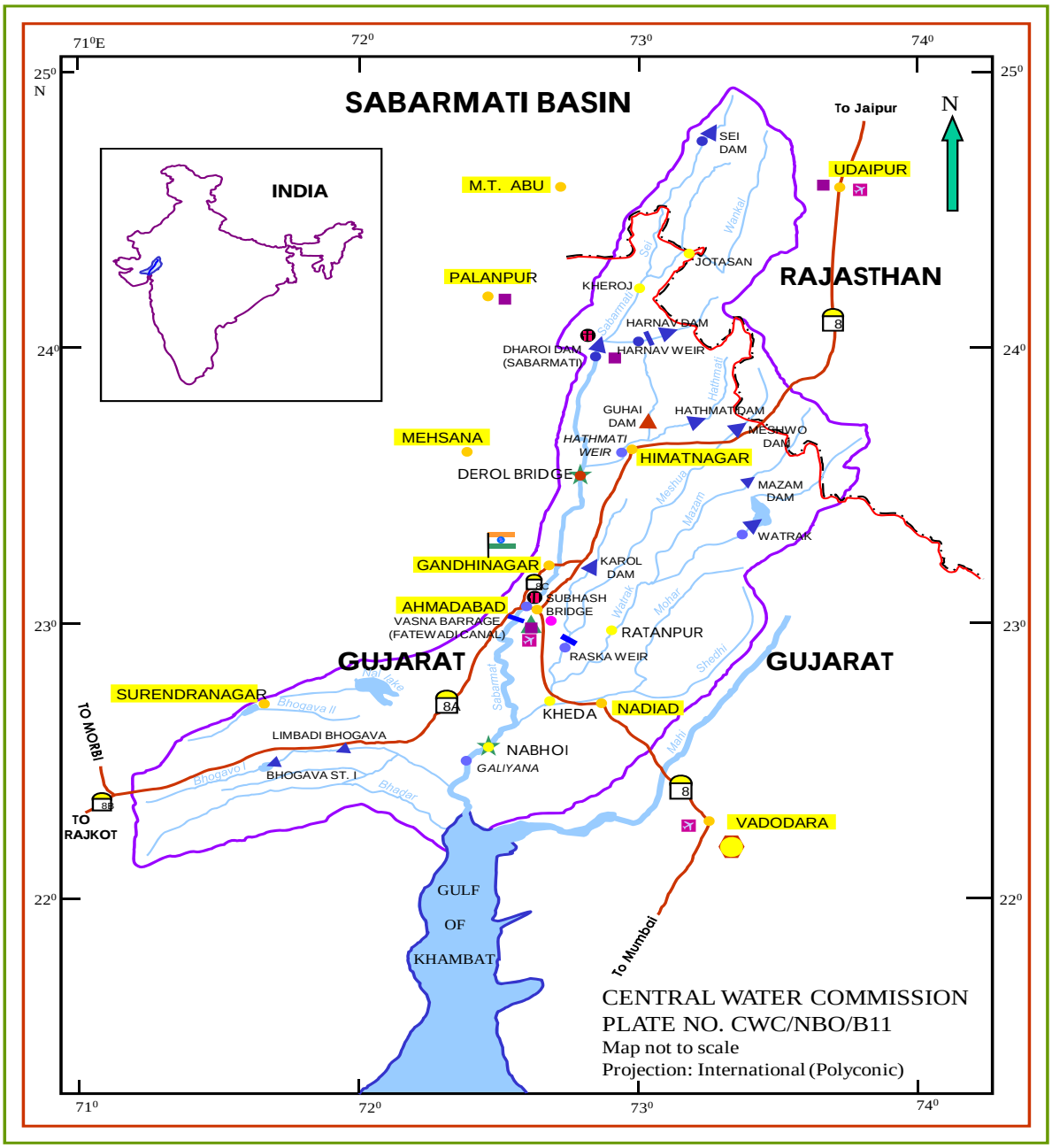

MAP SHOWING HYDROLOGICAL OBSERVATION STATIONS
IN WEST FLOWING RIVERS BASINS
ARABIAN SEA
INDIAN OCEAN
INDEX
CE OFFICE
CIRCLE OFFICE
DIVISION
SUB DIVISION
SITES
GDQ
GDSQ
BASIN BOUNDARY
STATE BOUNDARY
RIVERS
RESERVOIR
Badlapur
Mangaon
Belne Bridge
Santeguli
Haladi
Avarshe
Yennehole
Addoor
Mangalore
Bantwal
Erinjipuzha
Perumannu
Cannanore
Kuttyadi
Calicut
Kuniyil
Karathodu
Kumbidi
Pulamanthole
Mankara
Pudur
Ambarampalayam
Coimbatore
Arangaly
Neeleeswaram
Cochin
Kalampur
Ramamangalam
Kidangoor
Vandiperiyar
Kalloopara
Malakara
Thumpamon
Pattazhy
Ayilam
Trivandrum
Kuzhithurai
Ashramam
Kanyakumari
Davangere
Tumkur
Bangalore
Mysore
Chittor
Chennai
Cuddapah
Pondicherry
Cuddalore
Karaikal
Trichy
Madurai
Ramanathapuram
Tungabhadra Reservoir
Krishnarajasagara
Harangi Reservoir
Lower Bhavani Reservoir
Amaravathy Reservoir
Vagai Reservoir
Stanly Reservoir
Krishna Reservoir
CENTRAL WATER COMMISSION
CAUVERY & SOUTHERN RIVERS ORGANISATION
COIMBATORE



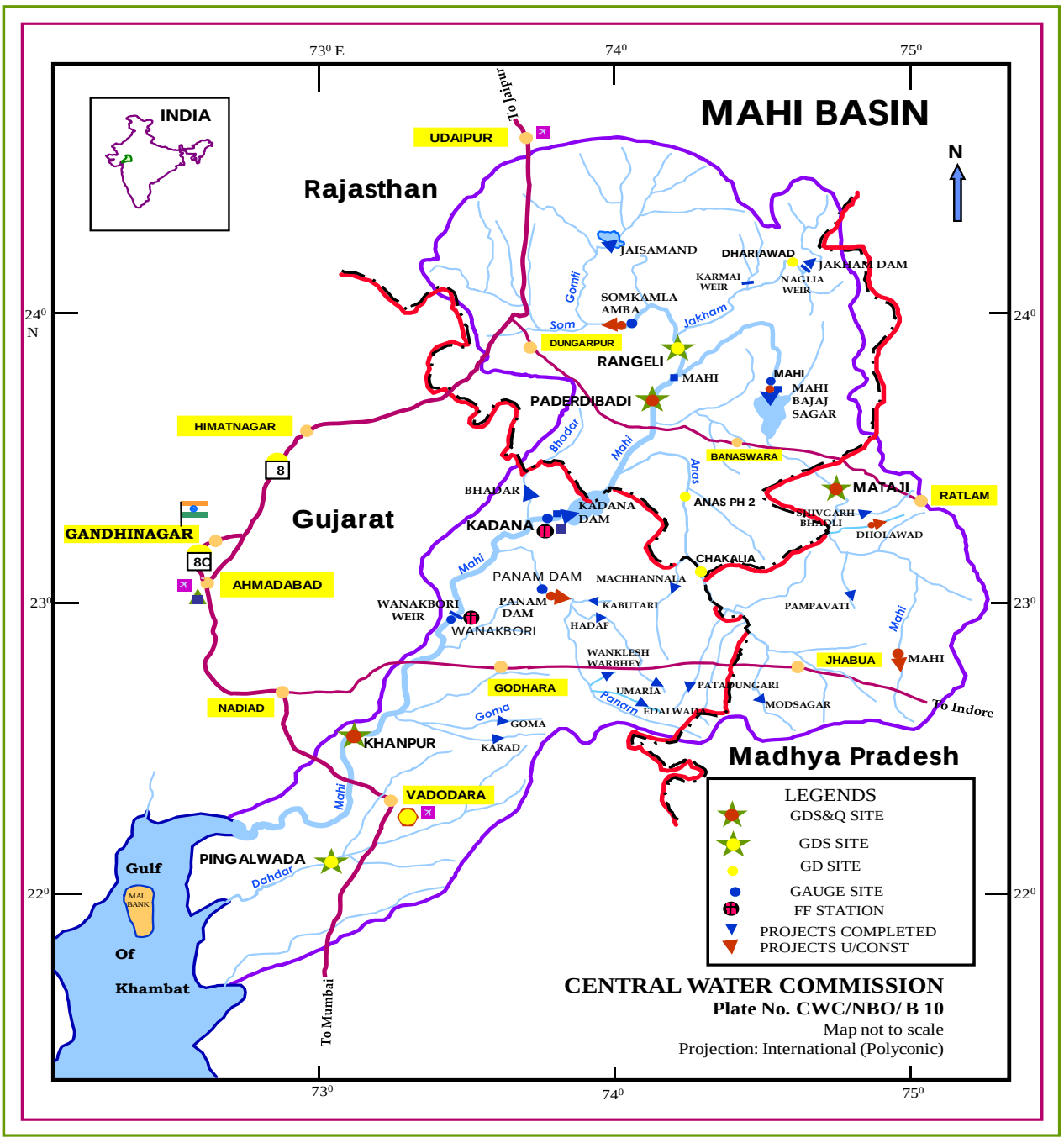
For International / State boundaries and Coast lines refer to Survey of India maps



For International / State boundaries and Coast Line refer to Survey of India Maps



For International / State boundaries and Coast lines refer to Survey of India maps



For International / State boundaries and Coast line refer to Survey of India maps

Chapter 3

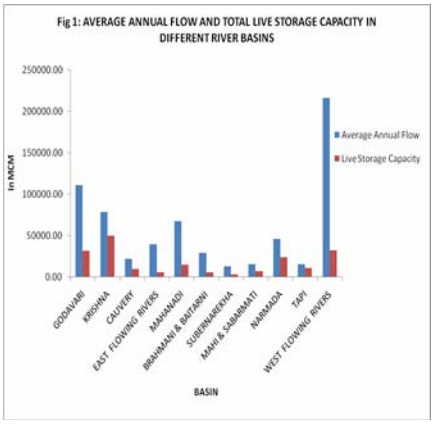
Water and Related Statistics

3.0 This chapter presents some important characteristics relating to non-classified river basins of the country. These characteristics are physical features and geo-climatic conditions of the river basins and other features like storage capacity, soil characterises, major and medium irrigation projects and flow of water, etc.

3.1 Surface Water Storage

3.1.1 In India, a total storage capacity of 225.14 BCM has so far been created. Besides, storages of 63.89 BCM are under construction and storages of 107.54 BCM are under consideration. Therefore expected storage capacity after completion of planned projects would be 396.57 BCM against total availability of 1869.35 BCM of water in the river basins of this country.

3.1.2 Live storage capacities in respect of different river basins along with average annual flow in cubic kilometer are given in Appendix Table 1. Among the non-classified basins the Krishna basin leads in term of storage capacity (49.55 BCM) followed by Godavari basin (31.33 BCM) and Narmada basin (23.60 BCM). Pennar basin leads (76%) in terms of storage capacity planned as percentage of average annual flow followed by Tapi basin (71%) which even otherwise has requirement for higher storage capacity as it covers the semi desert areas of Madhya Pradesh, Maharashtra & Gujarat. The West Flowing Rivers of Kutch, Shaurashtra including Luni, Krishna, Narmada and Brahmani & Baitarni basins exceed 50% capacity of their respective average annual flow. The storage percentage is, however, less than 25% in few basins viz. EFR from Mahanadi to Godavari and Krishna to Pennar, WFR from Tapi to Tadri and WFR from Tadri to Kanyakumari and hence there is a scope for increasing storage potential, particularly, for those basins for which the annual average flow is higher. The total storage capacity created as percentage of average annual flow of the basins is less than 25%, which may be increased to solve the scarcity of water up to some extent. This publication presents data on average annual runoff at terminal sites of all basins with catchment area upto the site.



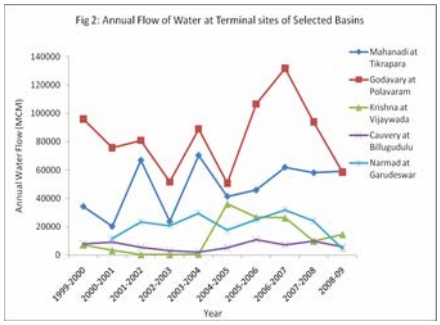
3.2 Drainage/catchment area and population distribution.

3.2.1 The salient features presented in Appendix Table 2 include drainage area, population and average annual flow of water in columns 4, 14 and 16. Accordingly, the 12 non-classified river basins cover an estimated population of 50 crores on 1 March 2007 accounting for 46% of total population of India. The drainage areas of these basins are accounted for 43% of the total

geographical area of the country. The Godavari basin has the highest drainage area of 312812 sq km followed by Krishna basin with drainage area of 258948 sq km and Mahanadi basin with drainage area of 141600 sq km. The river basins of Rushikulya (7700 sq km), Vamsadhara (10830 sq km), Sarada (2665 sq km) and Nagavali (9510 sq km) together have the least total drainage area of 30705 sq km. The basins of Mahanadi, Godavari and Krishna constitute more than 50% of the drainage area of the total drainage area of the twelve non-classified basins

3.2.2 The estimated population as on 1st March 2007 of east flowing rivers have the highest population of 8.30 crores followed by Krishna (7.11 crores), Godavari with 6.18 crores and west flowing rivers (6.16 crores). The estimated population as on 1st March 2007 of Brahmani was the least. It was 0.97 crores. West flowing rivers have the maximum population density of 1410 persons per sq km followed by Cauvery 392 persons, Subarnarekha 319 persons and East Flowing rivers 608 persons per sq km. Mahanadi basin has the least population density of 135 persons per sq km followed by Narmada basin with 185 persons, Brahmani basin with 249 persons and Godavari basin with density of 197 persons per sq km.

3.2.3 The average annual potential/average annual runoff in non-classified river basins is maximum at 131 BCM in Godavari river basin followed by 61.95 BCM at Mahanadi, 33.77 BCM at Narmada basin and 26.74 BCM at Krishna basin. The run off at terminal site is, however, maximum at Polavaram in Godavari 307.80 BCM, followed by 251.36 BCM in Krishna at Vijaywada and 124.45 BCM in Mahanadi Basin at Tikrapara. The site wise distribution is given in Appendix Table 2.



3.3 Hydrological Observation sites

3.3.1 Appendix Table 3 gives the distribution of hydrological observation sites by types of sites and non-classified river basin. Observations on water discharges, volume of sediments deposited on the flow areas & examinations of water qualities are made at different water releasing points of the river basins. Geographical locations of observation sites, types of experiments done on those sites and dates of commencement of experiments are also given for understanding distribution of waters on participating States. There are 47 such sites on Godavari basin out of 327 sites and 41 sites in Krishna basin. Rushikulaya & other small three rivers altogether have only 12 observation centers. Frequency of Monitoring of Water Quality varies from once to thrice in a month in these non-classified basins.

3.4 Peak Water Level

3.4.1 The historical observations over a long reference period on peak water level at different terminal sites along with latitude, longitude, stage record, drainage area are presented by site in Appendix Table 4. However, a uniform reference period could not be used as the dates of inception of the sites are different. It covers a period of 1964 to 2010. The peak water level varies widely from basin to basin and also within sites of a basin. The highest water level of 908.665 m is observed in the terminal site "Thimmanahalli'" of Cauvery basin on 14.08.2008 while the lowest water level of 3.24 m is also found in the same basin against the terminal site "Gopurajapuram" on 8.11.2005

3.4.2 Basin wise description is as follows:

3.4.2.1 Mahanadi Basin: There are 19 observation sites in the basin for which information is given. The reference period varies site to site starting from 1971 to 2010. The maximum drainage area 1, 24,450 sq km is covered by Tikrapara site in the basin while Mahendragarh site covers minimum drainage area i.e. 1100 sq km. The maximum stage of peak water i.e. 420.44 m is observed at Mahendragarh site on 12.07.1990 during the reference period 21.06.1987 to 31.05.2010. On the other hand, Tikrapara site has registered minimum peak water level i.e. 73.83 m on 19.09.2008.

3.4.2.2 Subarnarekha, Burhabalang & Baitarni: This basin contains the information in respect of 11 sites and there is a vast variation in peak water level which varies from 376.9 m to 8.9 m during the reference period 16.03.1971 to 31.05.2010.

3.4.2.3 Brahmani Basin: 7 observation sites have been reported in the basin and Jaraikela is the oldest site established on 1.8.1972. Gaug/Discharge observations are being recorded since then. Maximum Peak water i.e. 378.625 m was reported at Tilga on 28.8.1987 during the reference period April, 1978 to May, 2010.

3.4.2.4 Rushikulya, Vamsadhara, Sarda & Nagavali: There are five sites reported in the basin and only three sites are recording the Gauge/Discharge, Sedimentation and Water Quality figures at different intervals of time. There is no significant observation of Peak water level.

3.4.2.5 Godavari Basin: This is a large basin in area in respect of drainage area. It has 47 historical sites which are maintaining the information on observations in respect of at least two or more types of data: Gauge/Discharge, Sedimentation and Water Quality. Tekra is the oldest site in the basin and established on 15.07.1964 for collecting data on Gauge/ Discharge, Subsequently, the scope has been extended to observe data on sedimentation and water quality. Among its sites, the maximum water level was observed at Nowrangpur (560.636 m) site on 29.07.1969 during the reference period June 1971 to May 2010. The Polavaram site in the basin had peak water level of the order of 28.017 m on 16.08.1986, which was the minimum peak water level as compared to other sites of the basin.

3.4.2.6 Krishna Basin: It has 36 sites in all for hydrological observations. In these sites, peak water level varied from 18.22 m to 649.22 m at Vijaywada and Kellodu sites respectively during the reference period 1965-2010.

3.4.2.7 Cauvery Basin: In Cauvery basin it is remarkable to note that four sites i.e. MH Halli, Thimmanahalli, Sakleshpur and Kudige out of 34 reported sites have registered peak water level above 800 m during the period 1974 to 2010. The peak water level has increased with the increase in the value of latitude with some exceptional cases.

3.4.2.8 East Flowing Rivers from Mahanadi to Kanyakumari: Most of the sites have not registered significant peak water level in the basin. Only seven sites have registered 200 m or above peak water level out of 27 sites during the reference period 1979 to 2009. The maximum peak water level was observed at Naglamadike site (549.55 m) on 12.09.1988, which is highly significant as compared to observations made at other reporting sites of the basin

3.4.2.9 West Flowing Rivers from Kanyakumari to Tapi: This basin has reported information inrespect 37 sites. The peak water level of the sites remains in two digits barring two sites. At Vandperiyar site the water level touched 793.62 m on 27.07.2005.

3.4.2.10Tapi Basin: Tapi basin has reported only 5 sites which do not have any significant peak water level during the reference period 1959 to 2010.

3.4.2.11Narmada Basin: This basin contains 19 sites and has interesting fact that Dindori site which is situated at highest latitude and longitude registered the highest peak water level of the order of 669.64 m on 23.08.1991 during the reference period 1988-2010.

3.4.2.12 Mahi and Sabarmati: Ganod, Lowara, Gungan and Mahuwa are the oldest sites out of the 29 sites reported in the basin, which were established in late 1970 to make the observations of Gauge/Discharge, Sediment and Water Quality. There is not much significant peak water level reported in 29 sites except 3 to 4 sites during the reference period 1971 to 2010.

3.4.3 The data on seasonal (Monsoon and Non-Monsoon) and annual flow of water for last ten years over sites of twelve non-classified basins are provided in Appendix Table 5. The reference period of ten years is based on the latest information available. It is natural that the flow will vary from site to site. But, the data given in the table do not reveal any trend of water flow in either season or annually in the sites.

3.4.4 To have an understanding of the flow of water in a basin a measure based on average of water flows at all the observation sites under the basin over a period of nine to eleven years has been worked out. In Statement 1, the average water flow for each of the 12 non-classified basins for seasonal and annual flow per site along with minimum and maximum flow have been presented. It shows that the flow of water was maximum in Godavari Basin followed by Narmada basin while the minimum has been observed at Mahi basin. In monsoon season, the maximum flow was in Godavari basin and minimum flow in Tapi Basin while in non-monsoon season the Tapi and Mahi basins have observed minimum water flow - less than 50 MCM.

3.4.5 In Statement – 1, minimum and maximum average water flow during the reference period has also been presented. It shows similar pattern of water flow as in the case of overall average of water flow as indicted in para 3.4.4. It has also been attempted to calculate the total average flow in 12 non-classified basins and it comes 45698 MCM annually during the period of nine to eleven years and monsoon season shows average water flow around 7.5 times of non-monsoon season.

Statement 1: Average Water Flow by Basin

(MCM)

Basin	Average			Minimum			Maximum		
	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual
(1)	(2)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)
Mahanadi	5574	740	6314	2230	403	2682	8634	1121	10331
Subernrekha etc.	2922	327	3249	1859	174	1896	5441	690	5696
Brahmani	5601	737	6337	3611	393	4206	8481	1175	9146
Rushikulia etc.	1529	121	1650	514	34	547	3774	280	3967
Godavari	7593	414	8007	3941	219	4186	13587	593	11760
Krishna	4033	243	4276	1030	134	1189	8513	335	8770
Cauveri	963	411	1373	322	213	535	1703	819	2390
East Flowing Rivers	1471	262	1733	502	51	553	3602	560	3967
West Flowing Rivers	1924	338	2262	1196	195	1391	2746	604	3350
Tapi	1917	45	1962	670	19	702	2376	48	2407
Narmada	6140	1672	7813	3222	736	4186	10670	2634	13108
Mahi, etc.	676	47	723	46	5	51	3405	85	3487
TOTAL	40341	5357	45698	19143	2576	22124	72932	8944	78379

3.4.6 The maximum and minimum observed water levels and discharges are presented in Appendix Table 6 by sites over a long but varying reference period for which the data are available. The dates of extreme observations are spread over the years.

3.4.7 Expectation of availability of required amount of water is of paramount importance for any plan or project in water sector for irrigation etc. With this view Appendix Table 7 has been presented. It provides dependable flow of water at 10 equal percentile levels for each site. The percentiles have been calculated taking into consideration the whole period of releases of water from the sites from the day of its opening.

3.4.8 Monthly average flow of water per unit drainage area is presented in Appendix Table 8 over the calendar months of a long but varying reference period. The reference period has been taken separately on the basis of age of the sites. This would help in understanding expected water availability in different months of a year. It is observed that all non-classified basins except East Flowing Rivers (EFR) have reached the maximum monthly average flow per unit drainage area during the month of August, while in sites of EFR this phenomenon occurred in the months of September or October. There is a positive skewed tendency of data.

3.4.9 Monthly average flow of water per unit drainage area over the whole basin has been calculated and given in Statement 2. The calculation is based on the assumption that the hydrological observation sites are spread over the basin and they formed a representative sample for the basin. The statement shows wide variations of monthly average flow per unit drainage area over the calendar months and basins. It is less than 1 mm for Tapi, EFR and Mahi basins during pre-monsoon period while it is more than 20 cm in WFR basin during monsoon season.

Statement 2 : Monthly average flow per unit drainage area by river basin

Unit : Millimeter

Sl. no.	Basin	JUN	JUL	AUG	SEP	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY
(1)	**(2)**	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)
1	Mahanadi	15.08	74.37	129.00	87.81	30.38	10.69	5.52	4.30	3.59	3.30	3.01	2.94
2	Subernrekha etc.	32.70	93.35	160.51	133.61	62.85	22.11	8.84	5.58	3.86	2.78	2.38	3.98
3	Brahmani	25.84	108.32	145.90	114.06	49.65	20.20	13.24	12.56	9.58	8.93	7.30	7.38
4	Rushikulia etc.	10.03	36.20	69.83	69.99	62.77	23.17	8.50	4.23	2.29	1.53	1.54	6.22
5	Godavari	6.66	43.54	93.13	61.63	25.62	6.67	3.61	2.50	1.98	1.83	1.45	1.40
6	Krishna	5.26	30.76	55.83	31.52	21.54	5.35	2.43	1.90	1.61	1.82	1.47	1.39
7	Cauveri	10.07	33.08	45.67	29.11	25.59	18.80	13.54	9.96	4.00	3.15	3.03	3.49
8	EFR	1.07	1.52	3.13	6.33	11.42	10.95	6.63	1.70	0.80	0.62	0.28	0.37
9	WFR	232.33	507.13	435.10	222.00	187.07	112.79	38.49	20.96	13.75	13.47	15.88	33.82
10	Tapi	8.05	29.25	68.92	46.14	12.99	2.30	1.87	0.75	0.59	0.40	0.24	0.24
11	Narmada	12.18	71.27	145.65	99.37	28.02	11.97	10.51	7.80	6.98	5.99	4.86	4.03
12	Mahi, etc.	2.54	13.41	40.33	18.85	3.98	1.31	1.21	0.88	0.68	0.85	0.60	0.66

Chapter 4

Sedimentation statistics

4.1 Water flow (natural or artificial) tries to scour its surface whenever it flows in a channel. Silt or gravel or even larger boulders are detached from its bed or banks. The moving water sweeps these detached particles downstream. Silting and scouring in channels is not very uncommon and must be avoided by proper designs. The full supply level of water gets reduced by scouring and causes loss of command. It may also cause damage to canal banks and foundations of irrigation structures. Silting interferes with the proper functioning of a channel as the channel section gets reduced by silt, thereby reducing its discharging capacity.

4.2 Development and construction of projects formulated by harnessing the available water resources during last three to four decades has ushered in an era of prosperity. Development and construction of projects has been instrumental in bringing the Green Revolution that has essentially made India to achieve self-sufficiency in food grains. However, these projects are seriously threatened by sedimentation due to the silt carried by various rivers and streams up to the point of their interception. Sediment is also threatening denudation of forests.

4.3 The sediment in a canal is a burden to be borne by the flowing water and is, therefore, designated as sediment load. The sediment may move in water either as bed load or as suspended load. Bed load is that in which the sediment moves along the bed with occasional jumps into the main river. While the suspended load is one in which the material is maintained in suspension due to the turbulence of the water flow.

4.4 Sediment is one of the major obstructions on the flow line or channel of water and unmanageable quantity of it shorten longevity of channels. Moreover, it causes soil-erosion. Therefore, study of sediments and nature of its deposits on downstream are very important for preparation of any water supply projects. Sound database on sediments are essential tools for policy making and planning purposes.

4.5 The analysis of suspended sediment is carried out for three different grades of sediments, namely, coarse sediment, having particles with diameter above 0.2 mm, medium sediment with diameter ranging from 0.075 to 0.2 mm and fine sediment with diameter less than 0.075 mm.

4.6 The water sample from each group is passed through 100/72 mesh sieve (B.S.S). The residue on the sieve is washed with clear water several times, transferred to a crucible and its oven dry weight is measured. This gives the coarse sediment from which the sediment intensity in gm/litre for the group is worked out.

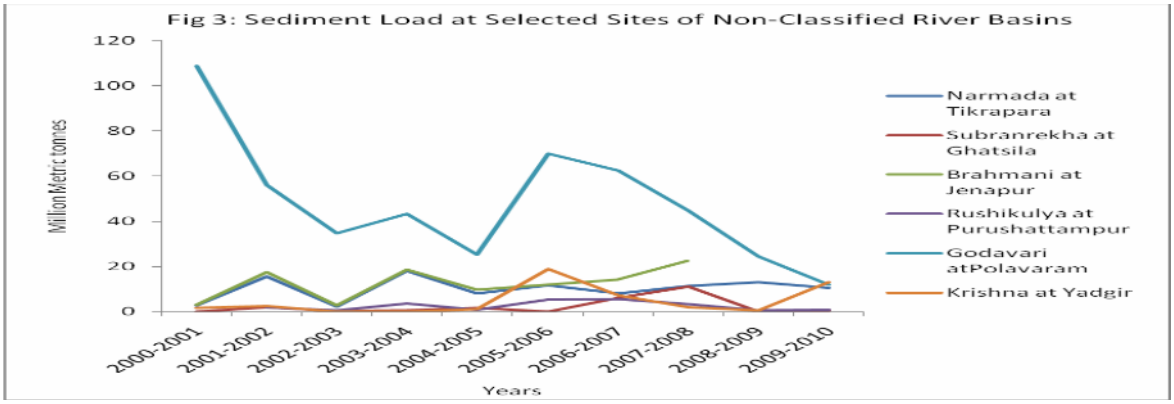
4.7 After the removal of coarse sediment by filtration and washings, the residual contains the medium and fine sediment which is passed through 200 mesh sieve (B.S.S). Sediment particles retained on the sieve are medium sediment and part of the fine sediment. So, the residue in the sieve is thoroughly washed with clear water several times, transferred to a crucible and its oven dry weight is measured. Medium grade sediment intensity in gm/litre is worked out, as is done for coarse sediment.

4.8 The filtrate and washings after separation of coarse and medium grade of sediment the water contain only fine grade of sediment in suspension. The filtrate and washings obtained from all the groups are combined together in an enameled bucket and kept overnight for settlement. About 5 to 10 ml of 10% alum solution is added to hasten the coagulation of colloidal silt. After the settlement is complete, the supernatant liquid is siphoned off carefully and the reduced volume of suspension is filtered through a dried and pre-weighted Whitman No.2 grade filter paper. Extra washings with clear water are given to remove excessive alum, if used. The filter paper along with the residue is dried to its constant weight and weighed to determine weight of the fine sediment in gm/litre. The intensity of fine silt, in gm/ litres so obtained, is the amount of the sediment for the entire cross section.

4.9 The total sediment load of the river along the cross-section is evaluated from the coarse and medium sediment concentration obtained group-wise and the sediment for the entire cross section. In this chapter detailed information on quantity of average sediment deposits on the streams/ rivers at terminal sites are presented separately for all sites on seasonal and annual basis for last 10 years in Appendix Table 9. The frequency of sediment observation is taken daily during monsoon season and once in a week during the lean period. Data for non-observed days is interpolated from the relationship of discharge vs. sediment load prepared on the basis of observed sediment concentration and weighted mean discharge during the same year. There is no consistency in sediment load among different sites of basins. However, sediment load in monsoon season is quite high compared, as expected, to non-monsoon season. There is significant sediment load observed at Polavaram and Perur sites of Godavari basin as compared to other sites of Godavari basin as well as sites of other basins.

4.10 Sediment concentration in gm/litre (coarse, medium and fine) is recorded in the daily flow tables. The sediment load reported in the 10 daily tables indicates average sediment load. The summary of sediment load of the Ten Daily and monthly figures are given in Appendix Table 10 showing average sediment load per day. In Ten daily and monthly summary tables, sediment load is rounded off to whole integer. In ten-daily summary tables, Ten daily average values are rounded off to nearest whole integer when more than 1000, nearest first decimal figure when it is between 100-999 and nearest two decimal figures when it is less than 100. The annual/ seasonal sediment yield in millimetre is the notional depth of soil over the catchment area equivalent to annual/ seasonal suspended sediment runoff calculated at the sediment observation station. It is computed using the relation.

Sediment yield (mm) = total suspended sediment load (T)/1400*catchment area (sq km)



Chapter 5

WATER QUALITY STATISTICS

5.1 Water is a prime necessity for human survival and growth of agriculture as well as industrial development. Effective management of water resource, monitoring and control of its quality are becoming increasingly important for sustainable development and human welfare. Pollution of water and maintaining water quality at acceptable levels has become a universal phenomenon in present day context; Environmental Protection Act also includes, as one of its objectives, protection of water from pollution. Now-a-days greater emphasis is given to water quality because of concern of environmentalists. Degradation of water quality is not only caused by increasing inflow of domestic and industrial waste into water course but also from the abstraction of water from rivers rendering them dry or with meager flow leading to concentration of pollution.

5.2 World Health Organization (WHO) has classified inland water uses in five classes and has fixed tolerance limits of all polluting factors of water. Bureau of Indian Standards (BIS) has also fixed tolerance limits of water quality in Indian context following the tolerance limits of WHO. These limits are given in Appendix Table 11. The Bureau of India Standards has identified 42 water quality parameters and fixed tolerance limit for each parameters. The Mahanadi, Brahmani, Baitarni, Rushikulya, Subarnarekha, Vamsadhara and Burhabalang river basins have reported the tolerance limit for 11 water quality parameters only. The Godavari and the Narmada basins have reported tolerance limit for 33 and 20 water quality parameters respectively. Similarly, Mahi, Sabarmati, Tapi and Other West Flowing River basins have reported tolerance limit for 24 water quality parameters. The tolerance limit for a few water quality parameters are at variance among some river basins but BIS standards for tolerance limit must be consistent across the country. The tolerance limit for water quality parameters of Mahi, Sabarmati, Tapi and Other West Flowing River are at variance for many water quality parameters in these river basins. The standard tolerance limit criteria of 26 water quality parameters have been reported by Krishna, Cauvery, East & West Flowing River basins.

5.3 Considering importance of water quality, an attempt has been made to present detailed information about the quality of water being supplied from different reservoirs in India. The values of water quality parameters are presented in Appendix Table 12 which exceeding tolerance limits. Further, maximum and minimum values of as many as 42 water quality parameters are presented in Appendix Table 13 for reviewing the kind of water being discharged/ supplied for different purposes.

5.4 From Appendix Table 12 the following facts are observed. The critical absolute values of water quality parameters for Mahanadi basin exceeded tolerance limit during the winter season of 2009-10. The prominent parameters which have crossed the tolerance limits frequently are Dissolved oxygen (DO) and Biochemical Oxygen Demand (BOD). In

the Subernarekha and Baitarni Basins the value of pH (Negative logarithm of Hydrogen ion concentration) have crossed the tolerance limits at different sites during summer season. The critical absolute value of Cl has crossed tolerance limit significantly at Elnuthimanglam site of Cauvry basin during summer season of 2008-09. The critical absolute values of water quality parameters for Godavari, Krishna basins are crossing tolerance limit throughout the year i.e. in all seasons. Regarding East Flowing Rivers the quality of water was within the tolerance limits during winter season excepting for Murappandu site during 2009-10. The value of BOD & DO have crossed the tolerance limits throughout the year in Mahi and Sabarmati basin especially at Vautha and Pingalwada sites. The water is not useful for any purpose of human consumption at these sites.

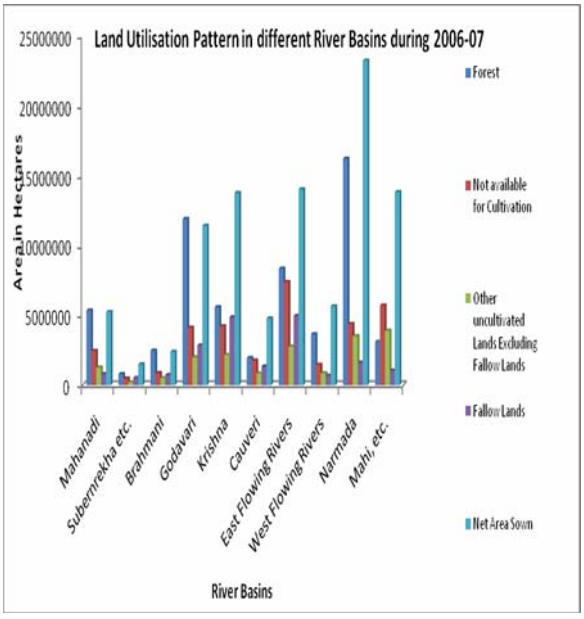
Chapter 6

Land use statistics

6.0 Land use pattern is a fairly useful indicator in understanding the environmental set up, socio-economic status, infrastructural facilities and climatic conditions of an area. The land use pattern is an outcome of the interaction and interplay of the various physical conditions of the area. It gives not only the land coverage but also an insight into the nature of environmental degradation in the catchment area of the basins. Hence it is considered very important in the environmental study of any area. Various Government Departments for their respective administrative units such as Blocks/Tehsils/Districts mostly compile the information. But information is not available for districts/areas under different basins. It may be possible to work out estimated district and basin wise area but the available district wise information on land use pattern is available for either for 2006-07/2007-08/2008-09 or in some cases for all these three years as published by the Ministry of Agriculture & cooperation. In this issue land use statistics have confined to analysis of information at state and basin-wise. The basin wise land utilisation has been estimated as sum total of estimated land use for different classifications in the area of district in a particular state falling within a basin. The data on district and state-wise land use pattern as published by the Directorate of Economics and Statistics, Department of Agriculture & Co-operation, Ministry of Agriculture has been used for the purpose. However, estimation of area of land under different categories of land classification can be made using the proportion of district areas in the basin and assuming land utilisation pattern is uniform over the district.

6.1 The data has been classified into (i) forest area (ii) area not available for cultivation (iii) other uncultivated lands excluding fallow land (iv) fallow land (v) net area sown (vi) area sown more than once and (vii) total cropped area.

6.2 The land utilization pattern by district of each basin is presented in Appendix Table 14 for the non- classified river basins. These basins cover 158367 thousand hectares area of the states. The Narmada river basin has the highest total cropped area of more than 50% of its basin area followed by Mahi etc. Subarnrekha etc. basins with 44% and 35% respectively. Similarly Narmada river basin has highest net sown area of 38 % followed by Mahi etc.river basin 34.6 %.



6.3 Areas under forests have been reported highest in Godavari Basin. However it can be seen that around 11% of areas of all basins together are covered under uncultivated lands including fallow land. Among these basins the Narmada river basin has the highest of about 38% net area sown of total basin area.

6.4 The land use classification reported during 2006-07/2007-08/2008-09 as per Ministry of Agriculture for the State is adopted for the catchment area of twelve non-classified river basins. The district-wise area under catchment of the basin is reported and land use under forest coverage, not available for cultivation, other uncultivated land, follow land and net area shown under the river basin have been indicated under land use statistics. Gross Area Irrigated and net area irrigated within the river basins by source such as canals, tanks, wells and other sources are presented in Appendix table 15 and Appendix Table 16 respectively. In Appendix table 14 to 16, all figures pertain to whole district and not restricted to basin area. To get basin level estimate one has to multiply the cell figures with the ratio of district basin area by district area. The Statements 3 to 5 are prepared on this assumption.

Stratement 3: Land utilisation pattern by river basin and State during 2006-07

Sl. No.	Basin/State/ District Name	District Area	District Basin Area	Reporting Area For Land Utilisation	Classification of Reporting Area					Area Sown more than once	Total Cropped Area
					Forest	Not available for Cultivation	Other uncultivated Lands Excluding Fallow Lands		Net Area Sown		
1	2	3	4	5	6	7	8	9	10	11	12
1	Mahanadi	31671000	13979200	6263636	2362088	1083370	556865	348263	2314713	818909	3133622
2	Subernrekha etc.	5820700	3027400	1825747	410817	251841	110809	274353	777927	278467	1056394
3	Brahmani	11885900	4986900	2928629	1040213	363667	214274	306071	1004404	525757	1530161
4	Rushikulia etc.	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
5	Godavari	51755300	31432100	19077593	7234443	2507095	1217007	1735175	6936535	2250030	9186565
6	Krishna	50978800	25894900	15562852	2843092	2146696	1102458	2471327	6999279	1687198	8686477
7	Cauveri	17385181	8537700	5255600	961988	871578	413923	658841	2349171	487614	2836785
8	EFR	61378276	25716500	15716372	3499444	3096946	1161787	2078087	5880108	1405420	7285528
9	WFR	20953800	10591300	6218577	1845879	740710	433184	344703	2854101	734157	3588257
10	Tapi	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
11	Narmada	23129300	10028500	7906940	2481390	747836	573943	272375	3831399	1219385	5050784
12	Mahi, etc.	39951700	24172800	16695075	1882331	3449527	2362188	633449	8368185	2244766	10612951
TOTAL		314909957	158367300	97451021	24561685	15259265	8146439	9122644	41315822	11651702	52967524

Statement 4 : Gross area irrigated by Sources by river basin during 2006-07

(Area in hectares)

Sl.	State/District	**District**	Basin	Canals		Total Canals	Tanks	Wells		Other	Grand
No.		Area	Area	Government	Private			Tubewells	Other Wells	Sources	Total
1	2	3	4	5	6	7	8	9	10	11	12
1	Mahanadi	31671000	13979200	551558	166	551725	14882	155682	49373	141381	913043
2	Subernrekha etc.	5820700	3027400	57427	0	57427	526	74162	4185	27432	163732
3	Brahmani	11885900	4986900	186894	18	186911	3988	97456	28041	74668	391065
4	Rushikulia etc.	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
5	Godavari	51755300	31432100	1066712	82	1066794	248937	715227	543219	142697	2716874
6	Krishna	50978800	25894900	1274013	N.A.	1274013	291041	961286	525794	193981	3246114
7	Cauveri	17385181	8537700	294577	275	294852	110356	189368	197542	8004	800121
8	EFR	61378276	25716500	1451473	-	1451473	371654	887652	382330	143527	3236637
9	WFR	20953800	10591300	260206	283	260489	54933	123110	239244	113980	791755
10	Tapi	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
11	Narmada	23129300	10028500	399688	59	399746	45704	475547	575242	232448	1728688
12	Mahi, etc.	39951700	24172800	530839	N.A.	530839	117645	1913125	2584098	114015	5259722
TOTAL		314909957	158367300	6260102	910	6261012	1281067	5433390	4778524	1245559	18999552

Staement 5 : Net area irrigated by Sources by river basin during 2006-07

(Area in hectares)

	State/District		Basin	Canals		Total Canals	Tanks	Wells		Other	Grand
No.		Area	Area	Government	Private			Tubewells	Other Wells	Sources	Total
1	2	3	4	5	6	7	8	9	10	11	12
1	Mahanadi	31671000	13979200	441752	166	441918	14634	103338	32973	90197	683060
2	Subernrekha etc.	5820700	3027400	47490	N.A.	47490	383	38192	2616	13456	102137
3	Brahmani	11885900	4986900	141645	18	141663	3363	56059	16105	38560	255750
4	Rushikulia etc.	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
5	Godavari	51755300	31432100	731801	81	731882	207649	472130	425620	114029	1951310
6	Krishna	50978800	25894900	926459	N.A.	926459	248944	728328	415081	167380	2486191
7	Cauveri	17385181	8537700	280589	1179	282043	110195	172684	234300	26509	825730
8	EFR	61378276	25716500	1087612	97	1087709	336395	650042	301102	104867	2480115
9	WFR	20953800	10591300	276379	2198	278578	71497	115528	267148	156666	889416
10	Tapi	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
11	Narmada	23129300	10028500	130582	33	130615	4290	57158	100177	6470	298710
12	Mahi, etc.	39951700	24172800	428944	N.A.	428944	105666	1006067	1869062	104456	3514194
TOTAL		314909957	158367300	4617947	3826	4622054	1120032	3308401	3359612	825344	13235442

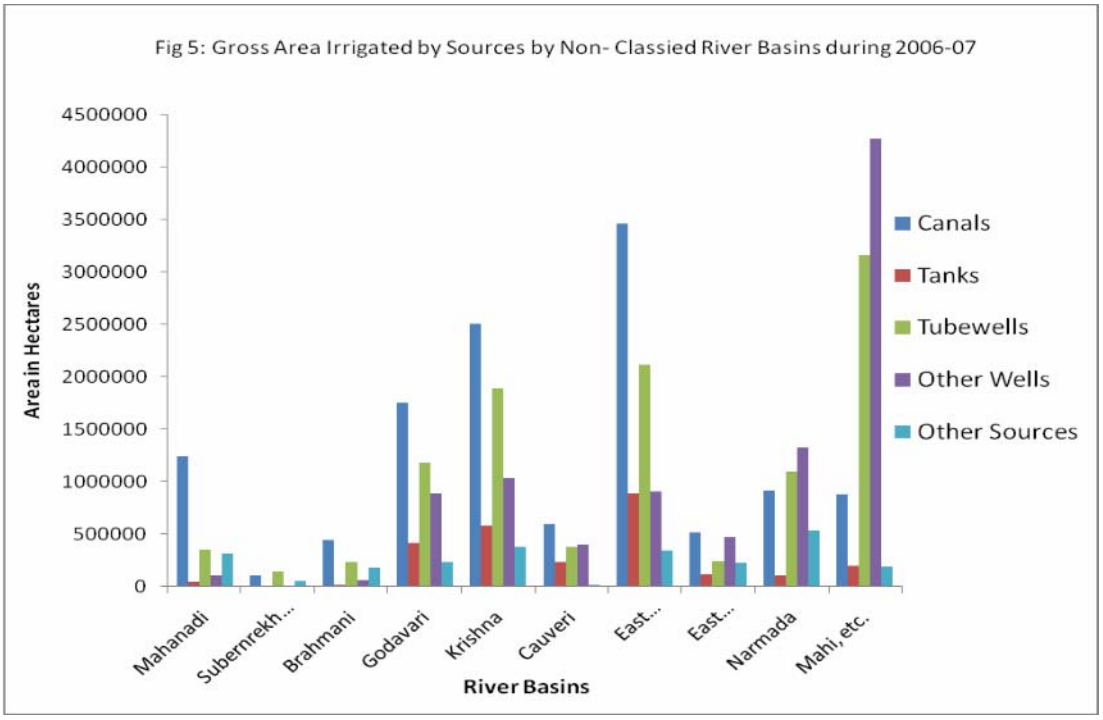


Fig 5: Gross Area Irrigated by Sources by Non- Classied River Basins during 2006-07
4500000
4000000
3500000
3000000
2500000
2000000
1500000
1000000
500000
0
Area in Hectares
Canals
Tanks
Tubewells
Other Wells
Other Sources
Mahanadi
Subernrekh...
Brahmani
Godavari
Krishna
Cauveri
East...
East...
Narmada
Mahi, etc.
River Basins

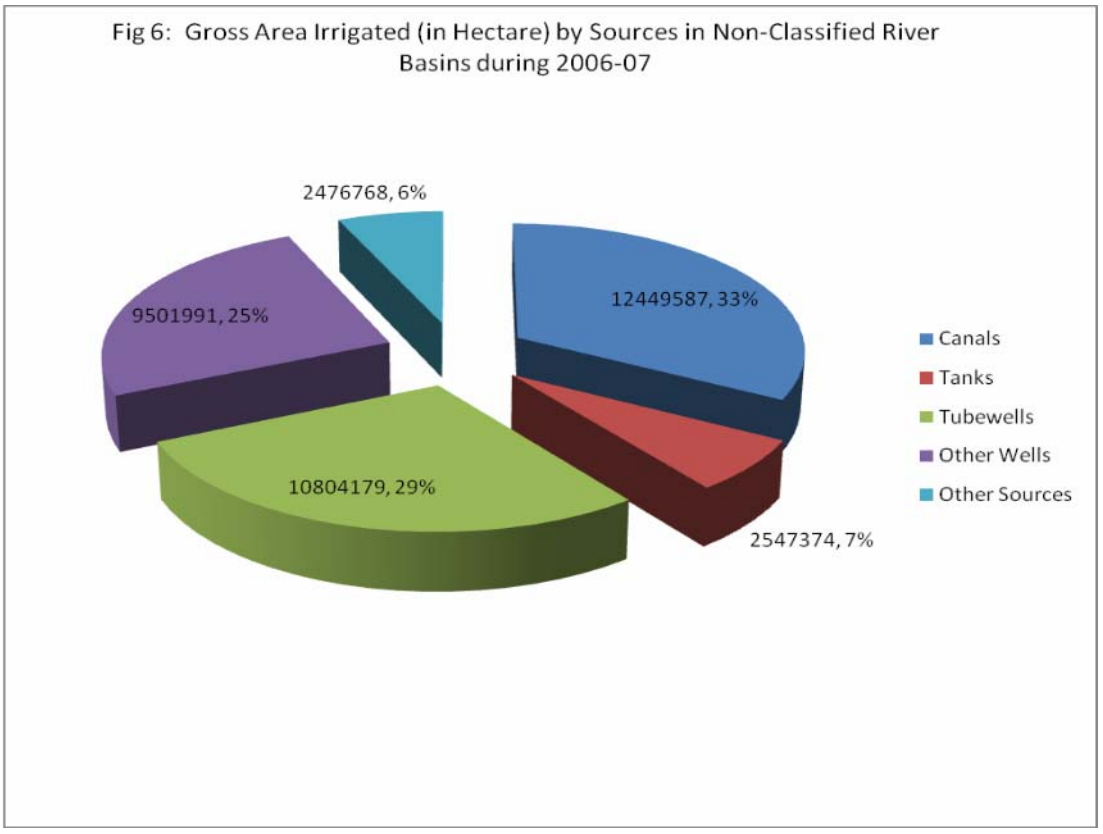


Fig 6: Gross Area Irrigated (in Hectare) by Sources in Non-Classified River Basins during 2006-07
2476768, 6%
12449587, 33%
9501991, 25%
10804179, 29%
2547374, 7%
Canals
Tanks
Tubewells
Other Wells
Other Sources

Fig 7: Net Area Irrigated by Sources by Non- Classied River Basins during 2006-07

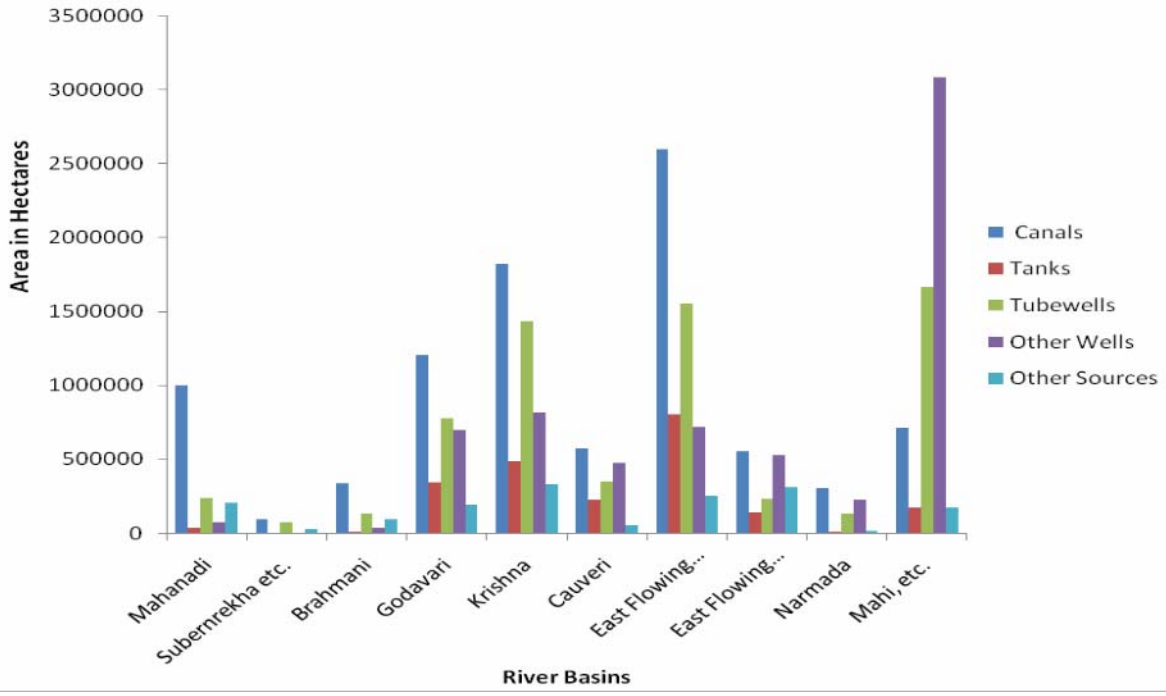
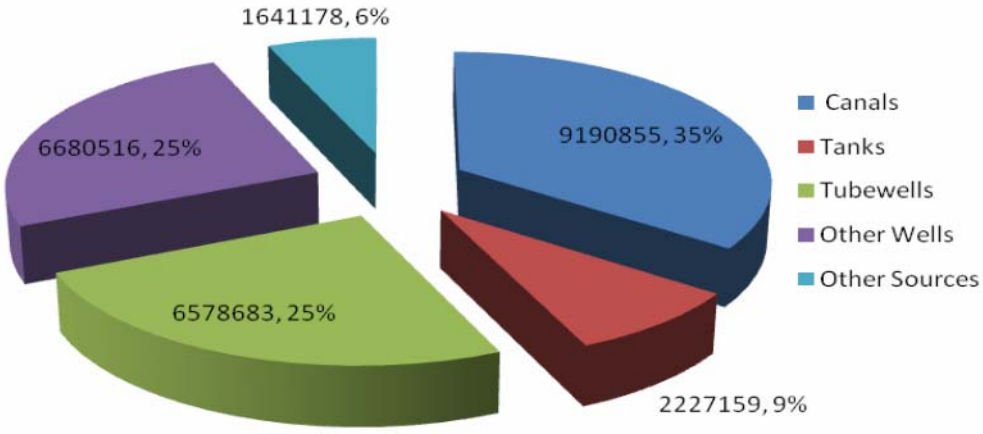


Fig 8: Net Area Irrigated (in Hectare) by Sources in Non-Classified River Basins during 2006-07



APPENDIX A

Tables on Hydrology and Land Use Statistics in River Basins

Table 1 : Storage capacity by river basin

(Projects Having Live Storage Capacity of 10 MCM & above)

Unit: MCM

Sl. No.	Basin	Average Annual Flow	Live Storage Capacities upto July, 2007				Percentage of Likely Average Annual Flow ((Col.6+Col.7) /Col.3)*100
			Completed Project	Project Under Construction	Total	Project Under Considera-tion	
1	2	3	4	5	6	7	8
1	INDUS	73305.00	16285.90	282.53	16568.43	2576.39	26.12
2	a) GANGA	525023.00	42060.20	18600.18	60660.38	30083.92	17.28
	b) BRAHMAPUTRA & BARAK	585597.00	2326.92	9353.64	11680.56	41262.88	9.04
3	GODAVARI	110540.00	25124.60	6205.79	31330.39	5841.16	33.63
4	KRISHNA	78124.00	41803.98	7743.54	49547.52	1127.84	64.87
5	CAUVERY	21358.00	8597.20	269.82	8867.02	261.99	42.74
6	PENNAR	6316.00	2649.40	2170.71	4820.11		76.32
7	EFR FROM MAHANADI TO GODAVARI AND KRISHNA TO PENNAR	22520.00	1601.44	1424.97	3026.41	945.29	17.64
8	EFR B/W PENNAR AND KANYAKUMARI	16458.00	1838.41	68.49	1906.90	-	-
9	MAHANADI	66879.00	12334.80	1873.00	14207.80	10094.20	36.34
10	BRAHMANI & BAITARNI	28477.00	4648.09	875.60	5523.69	8721.19	50.02
11	SUBERNAREKHA	12368.00	672.02	1650.19	2322.21	1380.50	29.94
12	SABARMATI	3809.00	1306.77	60.77	1367.54	99.33	38.51
13	MAHI	11020.00	4722.60	261.43	4984.03	11.81	45.33
14	WFR OF KUTCH, SAURASHTRA INCLUDING LUNI	15098.00	4726.92	797.23	5524.15	2849.06	55.46
15	NARMADA	45639.00	16979.50	6625.10	23604.60	465.73	52.74
16	TAPI	14879.00	9408.37	847.42	10255.79	286.92	70.86
17	WFR FROM TAPI TO TADRI	87411.00	11268.03	3464.38	14732.41	81.69	16.95
18	WFR FROM TADRI TO KANYAKUMARI	113532.00	10236.16	1317.54	11553.70	1453.31	11.46
19	AREA OF INLAND DRAINAGE OF RAJASTHAN	-	-	-	0.00	-	-
20	MINOR RIVER BASINS DRAINING INTO MYANMAR AND BENGLADESH	31000.00	312.00		312.00	1.47	1.01
21	MEDIUM PROJECTS EACH HAVING A CAPACITY OF LESS THAN 10 MCM FOR WHICH BASIN WISE BREAKUP IS NOT AVAILABLE.	-	6241.00	-	-	-	-
GRAND TOTAL IN MCM		**1869353.00**	**225144.31**	**63892.33**	**289036.64**	**107544.68**	**21.21**
GRAND TOTAL IN BCM		**1869.35**	**225.14**	**63.89**	**289.04**	**107.54**	**21.21**

Source : WM Directorate, Central Water Commission.

NOTE: Under column No. 4 only completed projects in the River Basins (Sl. No. 1 to 20) having Live Storage more than 10 MCM are included.

BCM: BILLION CUBIC METRE EFR: East Flowing Rivers

MCM: MILLION CUBIC METRE WFR: West Flowing Rivers

Table : 2 : Salient Features of Different River Basins

Sl. No.	Name of the Basin (Origin, Altitude & Length of the River)	State	Drainage Area (Sq.Km)	Principal Tributries & their Catchment Area		Basin Location		Number of Hydrological Observation Site	Climate Details		
				Tributary	Area (Sq.Km)	Latitude (a^{o}-$b^{'}$)	Longitute (x^{o}-$y^{'}$)		Temprature Variation (Centigrade) (^{o}C)	Average Annual Rainfall (mm)	Evapo-ration (mm)
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
1	**Mahanadi**										
	Mahanadi Rises from Pharsiya village near Nagri Town in Raipur Distt. of Chhattisgarh at an elevation of 442 m. Length 851 Km.	Madhya Pradesh	130	Mahanadi	48230	19-20 to 23-35	80-30 to 86-50	G =20 GD = 3	13 to 48.8	1400	Monthly range 40 in Winter to 360 in Summer
				Pairi	3503			GDQ =1			
		Chhattishgarh	74970	Seonath	30761			GDSQ=16			
		Orissa	65600	Jonk	3673						
		Jharkhand	650	Hasdeo	9803						
		Maharashtra	250	Mand	5237						
				Ib	12447						
				Ong	5128						
				Tel	22818						
		Total	141600	Total	141600						

(Contd.)

Table : 2 : Salient Features of Different River Basins

Sl. No.	Basin Name	Principal Minerals	Estimated Population (Lakh) (as on March 2007)	Major Industries	Average Annual Runoff (MCM) (at terminal Site with Catchment Area)	Soil Characteris-tics	Major Projects			
							Name	Gross Storage (MCM)	Live Storage (MCM)	Water withdrawal (MCM)
(1)	(2)	(13)	(14)	(15)	(16)	(17)	(18)	(19)	(20)	(21)
1	**Mahanadi**	Iron Ores, Coal, Lime stone, Quartzite, Copper Ores, Silver, Lead, Mica, Bauxite, Galena & Graphite	190.72	Iron Steel Copper Cement Paper and Aluminium	43420 2009-2010 Tikarapara (124450)	Black Red Yellow Brownish red to Yellowish red Dark Gray Coastal alluvial	Hirakud Tandula Hasdeo Bango Dam Mand Diversion Project Ib Diversion Scheme Sunder Dam Barupa Barrage Mahanadi Main Canal Kharang Tank Manairi Tank, Tairi Kodar Mahandi Delta Ong Diversion Salaki	8141.00 312.07 7901.21 - - 4700.00 - 160.23	5892.00 302.09 - - - 4440.00 - 148.91	14195.00 310.00 2532.71 111.62 199.00 65.69 2300.84 -

(Contd.)

Table : 2 : Salient Features of Different River Basins

Sl. No.	Name of the Basin (Origin, Altitude & Length of the River)	State	Drainage Area (Sq.Km)	Principal Tributries & their Catchment Area		Basin Location		Number of Hydrological Observation Site	Climate Details		
				Tributary	Area (Sq.Km)	Latitude (a^{o}-$b^{'}$)	Longitute (x^{o}-$y^{'}$)		Temprature Variation (Centigrade) (^{o}C)	Average Annual Rainfall (mm)	Evapo-ration (mm)
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
2	**Subernarekha, Burhabalang and Baitarni**										
2.1	**Subernarekha** Rises from Nagri village in Ranchi Distt. of Jharkhand at an elevation of 600 m. Length 395 Km.	Jharkhand	13590	Subernarekha	7383	21-33 to	85-09 to	GD =2 GDQ =1	9 to 32	1800	-
		Orissa	3201	Kanchi	1096	23-32	87-27	GDSQ =3			
		West Bangal	2160	Karkari	1341						
				Kharkai	6611						
				Raru	680						
				Garru	640						
				Dulang	1200						
		Total	18951	Total	18951						
2.2	**Burhabalang** Rises near Bishaldanga, Mayur Bhanj Distt. of Orissa at an elevation of 800 m. Length 125 Km.	Orissa	4800			21-22 to 22-20	86-20 to 87-05	GDSQ =1	08 to 49	1800	-
		Total	4800								

(Contd.)

Table : 2 : Salient Features of Different River Basins

Sl. No.	Basin Name	Principal Minerals	Estimated Population (Lakh) (as on March 2007)	Major Industries	Average Annual Runoff (MCM) (at terminal Site with Catchment Area)	Soil Characteristics	Major Projects			
							Name	Gross Storage (MCM)	Live Storage (MCM)	Water withdrawal (MCM)
(1)	(2)	(13)	(14)	(15)	(16)	(17)	(18)	(19)	(20)	(21)
2	**Subernarekha, Burhablang and Baitarni**		110.81							
2.1	Subernarekha (water withdrawals during 1997-99)	Coal Iron Ore Bauxite Copper Chromium Gold Vanadium Lime Stone Dolomite Asbestos Chinaclay Talc and Building Stone		Tobacco Products, Cement, Asbestos Sheets, Ceramics, Glass, Coaches & Locomotive , Automobiles, Agricultural Equipment, Wires & Cables, Iron & Steel Machinary, Metal Tubes & conduits, Copper & Brass, Chemical Acids & Caustics, Fertilizer, Soaps	10278 (2006 to 2007) Gatshila (14176)	Gravelly Sandy Loams Alluvium & Black Clays Laterite Red etc.	Kanchi Irrigation Scheme	-	-	-
2.2	**Burhabalang** (water withdrawals during 1997-99)	Iron ore, China Clay, Quartz, Soap stone & Lime stone found in limited areas.		NIL	3656 (2006 to 2007) Govindpur (4495)	Red & Yellow Soil Laterite Soil Alluvial Soil	-	-	-	-

(Contd.)

Table : 2 : Salient Features of Different River Basins

Sl. No.	Name of the Basin (Origin, Altitude & Length of the River)	State	Drainage Area (Sq.Km)	Principal Tributries & their Catchment Area		Basin Location		Number of Hydrological Observation Site	Climate Details		
				Tributary	Area (Sq.Km)	Latitude (a^o-$b^'$)	Longitute (x^o-$y^'$)		Temprature Variation (Centigrade) (^oC)	Average Annual Rainfall (mm)	Evapo-ration (mm)
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
2.3	**Baitarni** Rises in the hill ranges of Keonjhar Distt. of Orissa near Manka-rancho village at an elevation of 900 m. Length 355 Km.	Jharkhand	736			20-35 to	85-10 to	G = 3 GDSQ =2	12 to 38	1450	-
		Orissa	10246	Salindi	1793	22-15	87-03				
				Kusai	870						
				Orarai	821						
				Kangira	458						
				Deo	723						
				Kanjhari	498						
				Sita	505						
				Kusal	531						
				Others	4783						
		Total	10982	Total	10982						
3	**Brahmani (South Koel)**Rises from Nagri village in Ranchi Distt. of Jharkhand at an elevation of 600 m. Length 799 Km.	Jharkhand	15769	Brahmani	26831	20-28 to	83-52 to	G =1 GD =1	10 to 43	1460	Average Monthly Evaporation varies from 18 to 135
		Orissa	22364	Karo	2741	23-35	87-03	GDQ =1 GDSQ =4			
		Chhatisgarh	900	Sankh	6933						
				Tikra	2528						
		Total	39033	Total	39033						

(Contd.)

Table : 2 : Salient Features of Different River Basins

Sl. No.	Basin Name	Principal Minerals	Estimated Population (Lakh) (as on March 2007)	Major Industries	Average Annual Runoff (MCM) (at terminal Site with Catchment Area)	Soil Characteristics	Major Projects			
							Name	Gross Storage (MCM)	Live Storage (MCM)	Water withdrawal (MCM)
(1)	(2)	(13)	(14)	(15)	(16)	(17)	(18)	(19)	(20)	(21)
2.3	**Baitarni**	Iron Ore, Copper, Chromite, Asbestos, Manganese, Atomic Minerals, China Clay & Soap Stone		Ferro - Manganese Plant Sponge Iron Plant	5474 (2006-2007) Anandpur (8570)	Red & Yellow Laterite Alluvial	Akhuapada Kanupur Irrigation Project Salandi Baitarni System Anandpur Barrage	- 242.65	- 184.15	451.46 581.09
3	**Brahmani**	Iron Ore, Copper, Chromite, Coal, Manganese, Lime stone, Dolomite, Lead, Fire-Clay, Bauxite & China-Clay	97.01	Steel Plants Cement Aluminimum Explosive Chemical Machine Tools Fertilizer Plant	14810 (2006-2007) Jenapur (33955)	Red & Yellow Mixed Red & Black Red Sandy Red Loamy & Coastal Alluvium		-	-	-

(Contd.)

Table : 2 : Salient Features of Different River Basins

Sl. No.	Name of the Basin (Origin, Altitude & Length of the River)	State	Drainage Area (Sq.Km)	Principal Tributries & their Catchment Area		Basin Location		Number of Hydrological Observation Site	Climate Details		
				Tributary	Area (Sq.Km)	Latitude (a^{o}-$b^{'}$)	Longitute (x^{o}-$y^{'}$)		Temprature Variation (Centigrade) (^{o}C)	Average Annual Rainfall (mm)	Evapo-ration (mm)
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
4	**Rushikulya, Vamsadhara, Sarada & Nagavali**										
4.1	**Rushikulya** Rises from Matabarhi village of Kandhamal Distt. of Orissa at an elevation of 1000 m. Length 162 Km.	Orissa	7700	Rushikulya	2798	19-07 to	84-01 to	G =7	12 to 44	1360	-
				Baghua	736	20-19	85-06	GDSQ =1			
				Barhanadi	2353						
				Pathama	663						
				Ghodapada	1150						
		Total	7700	Total	7700						
4.2	**Vamsadhara** Rises from Near Lanjigah village in Kalahandi Distt. of Orissa Length 254 Km.	Orissa	8015	Vamsadhara	5458	18-15 to	83-20 to	GDSQ =1	12 to 43	1300 to 1500	-
		Andhra Pd.	2815	Harbhangi (Ganguda)	1689	19-55	84-20	GD =1			
				Sanna Nadhi	1276						
				Mahendrathanaya	1115						
				Chauldua	768						
				Phalphalia	524						
		Total	10830	Total	10830						
4.3	**Sarda** Elevation of Origin is 1000 m. Length 122 Kms.	Andhra Pradesh	2665			17-25 to18-17	82-32 to83-06	GD =1	18 to 42.5	1000	-
		Total	2665								
4.4	**Nagavali** Rises from Near Lakhbahal village in Kalahandi Distt. of Orissa at an elevation 1300 m.Length 256 Km.	Orissa	4462	Nagavali	5704	18-10 to	82-53 to	GDSQ =1	16 to 40	1000	
		Andhra Pd.	5048	Janjhavati	606	19-44	84-05				
				Suvarnamukhi	1275						
				Vegavathi	994						-
				others	931						
		Total	9510		9510						

Contd/…

Table : 2 : Salient Features of Different River Basins

Sl.No.	Basin Name	Principal Mineerals	Estimated Population (Lakh) (as on March 2007)	Major Industries	Average Annual Runoff (MCM) (at terminal Site with Catchment Area)	Soil Characteristics	Major Projects			
							Name	Gross Storage (MCM)	Live Storage (MCM)	Water withdrawal (MCM)
(1)	(2)	(13)	(14)	(15)	(16)	(17)	(18)	(19)	(20)	(21)
4	**Rushikulya, Vamsadhara, Sarda & Nagavali**		158.39							
4.1	**Rushikulya** (water withdrawals during 1997-99)	Clay, Lime Stone, Manganese, Sand Talc, Black Sand & Grinding Material		Chemical Sugar Spining Mills	2912 (2006-2007) Purshottampur (7112)	Red & Yellow Laterite Alluvial Saline	Rushikulya System	-	-	-
4.2	**Vamsadhara** (water withdrawals during 1997-99)	Manganese, Grayphite, Lime Stone, Bauxite, Mica & Quartz		No large scale Industries.	6422 (2006-2007) Kashi Nagar (7820)	Red & Black Red Sandy Balck Laterite Yellow		-	-	-
4.3	**Sarada** (water withdrawals during 1997-99)	Manganese Grayphite Aluminium Bauxite & Mica		Steel Plant	650 (2006-2007) Anakapalli (2090)	Red & Coastal Sands Laterite Alluvial Forest		-	-	-
4.4	**Nagavali** (water withdrawals during 1997-99)	Manganese Grayphite Lime Stone Bauxite & Mica		There is no large scale Industries.	4666 (2006-2007) Srikakulam (9500)	Coastel Sand Red Mixed Laterite Forest	Thotapally Narayan Puram Jaiyavathi	- - -	- - -	189.73 79.97 113.27

(Contd.)

Table : 2 : Salient Features of Different River Basins

Sl. No.	Name of the Basin (Origin, Altitude & Length of the River)	State	Drainage Area (Sq.Km)	Principal Tributries & their Catchment Area		Basin Location		Number of Hydrological Observation Site	Climate Details		
				Tributary	Area (Sq.Km)	Latitude (a^{o}-$b^{'}$)	Longitute (x^{o}-$y^{'}$)		Temprature Variation (Centigrade) (^{o}C)	Average Annual Rainfall (mm)	Evapo-ration (mm)
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
5.	**Godavari** Godavari Rises in the western Ghat near Thriambak hills in the Nasik distt. of Maharashtra at an elevation of 1067 m. Length 1465 Km.	Andhra Pradesh Karnataka Madhya Pd. Maharashtra Orissa Chhatisgarh Total	73198 4380 31280 152027 17830 34097 312812	Godavari Pravara Purna Manjira Maner Pranhita Indravathi Sabari Pen Ganga Wardha	33502 6537 15579 30844 13106 61093 41665 20427 23898 24087 312812	16-16 to 22-36	73-26 to 83-07	GD =29 GDQ = 1 GDSQ =17	15 to 40	600 to 3000	Mean daily evaporation varies from about 5 mm near coastal region to 16.6 mm in uper region.

(Contd.)

Table : 2 : Salient Features of Different River Basins

Sl. No.	Basin Name	Principal Minerals	Estimated Population (Lakh) (as on March 2007)	Major Industries	Average Annual Runoff (MCM) (at terminal Site with Catchment Area)	Soil Characteristics	Major Projects			
							Name	Gross Storage (MCM)	Live Storage (MCM)	Water withdrawal (MCM)
(1)	(2)	(13)	(14)	(15)	(16)	(17)	(18)	(19)	(20)	(21)
5.	**Godavari**	Bauxite Manganege Iron Ore Coal Lead Zinc Corundum	617.59	Paper Other Timber Product Rice Milling Cotton Ginning processing Spinning & Weaving Manufacture of various textile Extraction of Oil from Ground Nut & other Oil Seeds Small Engineering Industries	29034 (2009-2010) Polavaram (307800)	Black Red Laterite Alluvium Mixed Saline & Alkaline	Waghed	76.48	70.00	24.72
							Ozarkhed	67.96	62.50	20.56
							Karanjawan	175.56	166.22	54.82
							Palkhed	21.24	21.24	44.43
							Gangapur	215.8	203.8	538.98
							N.Madmeswar	-	-	-
							Jayakwadi Stage-I	2909.00	2170.00	225.20
							Puma	934.46	809.3	127.95
							Mula	735.8	636.8	245.13
							Bhandaradarn	312.6	307.53	219.20
							Maner	67.68	49.27	87.28
							Adhole	30.00	27.6	17.57
							S.R.S. Project Stage-I	3172.00	2322.00	392.80
							Kaddam	186.80	137.1	-
							Nizam Sagar	841.30	724.92	6654.70
							Lower Maner	-	-	-
							Maner Project	85.52	69.66	-
							Manjira	-	-	21.02
							Dhuti Weir	15.43	7.79	-

(Contd.)

Table : 2 : Salient Features of Different River Basins

Sl. No.	Name of the Basin (Origin, Altitude & Length of the River)	State	Drainage Area (Sq.Km)	Principal Tributries & their Catchment Area		Basin Location		Number of Hydrological Observation Site	Climate Details		
				Tributary	Area (Sq.Km)	Latitude (a^{o}-$b^{'}$)	Longitute (x^{o}-$y^{'}$)		Temprature Variation (Centigrade) (^{o}C)	Average Annual Rainfall (mm)	Evapo-ration (mm)
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
6.	**Krishna** Rises from near Mahabaleshwar about 64 Km. from Arabian Sea at an elevation of 1337 m. Length 1401 Km.	Andhra Prd	76252	Ghatprabha	8829	13-7 to	73-21 to	G = 5	15 to 39	784	-
		Maharashtra	69425	Malaprabha	11549	19-25	81-9	GD =13			
		Karanataka	113271	Bhima	70614			GDQ =10			
				Tungabhadra	71417			GDSQ =13			
				Musi	11212						
				Palleru	3263						
				Muneru	10409						
				koyna	4890						
				Panchganga	2575						
				Dudhganga	2350						
				Dindi	3490						
				Peddavagu	2343						
				Halia	3780						
				Others	52227						
		Total	258948	Total	258948						

Source : Godavari Basin, Daily Stage-Discharge Data (Vol. I) (June 2009 - May 2010).

(Contd.)

Table : 2 : Salient Features of Different River Basins

Sl. No.	Basin Name	Principal Minerals	Estimated Population (Lakh) (as on March 2007)	Major Industries	Average Annual Runoff (MCM) (at terminal Site with Catchment Area)	Soil Characteristics	Major Projects			
							Name	Gross Storage (MCM)	Live Storage (MCM)	Water withdrawal (MCM)
(1)	(2)	(13)	(14)	(15)	(16)	(17)	(18)	(19)	(20)	(21)
6	**Krishna**	Bauxite Manganege Iron Ore Copper Gold Coal Lime Stone Lead Zinc Corundum Ilmenite Refractory minerals & Kaolin	710.89	Textile Chemical Cement Automobiles Engineering Goods Extrataction of Gold Alluminum Electrical Dynamic	14510 Vijaywada 251360	Forest Deep Black Medium Black, Coarse Shallow Black, Mixed Red & Black, Red, Red Loamy, Red Sandy, Redish Brown, Laterite, Deltaic Alluvium	Bagh Idiadoh Cotton Barrage Lakhnavaram Radha Nagri Ghod Khadakwasla Stage-I Vir Dam Pony Dam Tungabhadra Bhadra Ghatprabha Stage-I Stage-II Upper Krishna Rajoulibunda Diver.	269.00 - - 60.46 - - - - - - 3767.00 2023.00 - - 1066.00 -	241.00 - - 47.39 - - - - - - - 1780.00 - - 863.00 -	254.54 209.84 161.86 - Major & Medium projects - 20363 through Poni Hudro-electric power project. Tungbhadra Dam, Nagarjun Sagar project and Prakashan Barrage - 12666 for export to other basins : Total withdrawal 3329 import from Godavari Basin to Sri Ram Sagar project-986

Source : Krishna Basin, Daily Stage-Discharge Data (Vol. I) (June 2009 - May 2010).

(Contd.)

Table : 2 : Salient Features of Different River Basins

Sl. No.	Name of the Basin (Origin, Altitude & Length of the River)	State	Drainage Area (Sq.Km)	Principal Tributries & their Catchment Area		Basin Location		Number of Hydrological Observation Site	Climate Details		
				Tributary	Area (Sq.Km)	Latitude (a^{o}-$b^{'}$)	Longitute (x^{o}-$y^{'}$)		Temprature Variation (Centigrade) (^{o}C)	Average Annual Rainfall (mm)	Evapo-ration (mm)
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
7.	**Cauvery** Originate at Talakavasi in Georg Distt. of Karnataka at an elevation of 1341 m. Length 800 Kms.	Karnataka Tamil Nadu Kerala Pondicherry Total	34273 43856 2866 160 81155	Harangi Hemavathi Lakshmana-Tirtha Kabini Shimsha Arkavathi Bhawani Amravathi Others Total	717 5410 1690 7040 8469 4150 6154 8380 39145 81155	10-05 to 13-30	75-30 to 79-45	G = 1 GD= 1 GDQ= 17 GDSQ=15	20 TO 30	500 to 3800	Annual 1500 to 2500

(Contd.)

Table : 2 : Salient Features of Different River Basins

Sl. No.	Basin Name	Principal Minerals	Estimated Population (Lakh) (as on March 2007)	Major Industries	Average Annual Runoff (MCM) (at terminal Site with Catchment Area)	Soil Characteristics	Major Projects			
							Name	Gross Storage (MCM)	Live Storage (MCM)	Water withdrawal (MCM)
(1)	(2)	(13)	(14)	(15)	(16)	(17)	(18)	(19)	(20)	(21)
							Musi Project	-	-	
							Naga-Arjun-Sagar	11559.00	6767.00	
							Sri Sailam	8716.00	-	
							Prakashan Barrrage	-	-	
							Kurnool Cuddaph Canal	-	-	
							Krishna Barrage			
							Tulsi	-	-	
							Neera Right Bank Canal	-	-	
							Neera Left Bank Canal	-	-	
							Vijay Nagar Channels	-	-	
							Vani Vilas Sagar	-	-	
							Tungbhadra High Level	-	-	
							Stage-I	-	-	
							Tungbhadra Right BankLow Level Canal	-	-	
7.	**Cauvery** (water withdrawals during 1996-99)	Stone Mining	318.15	Paper Mills Sugar Mills Chemical Factory Cotton Mills	12558 2005-2006 Musiri (66243)	Black Cotton Red Laterite Alluvial Forest	Krishnaraja Sagar	1400.35	1275.69	-
							Hemavathi	1050.62	1012.60	-
							Mattur	2708.79	2646.77	-
							Bhawani Sagar Reservoir	928.80	907.80	-
								552.74	453.06	

(Contd.)

Table : 2 : Salient Features of Different River Basins

Sl. No.	Name of the Basin (Origin, Altitude & Length of the River)	State	Drainage Area (Sq.Km)	Principal Tributries & their Catchment Area		Basin Location		Number of Hydrological Observation Site	Climate Details		
				Tributary	Area (Sq.Km)	Latitude (a^{o}-$b^{'}$)	Longitute (x^{o}-$y^{'}$)		Temprature Variation (Centigrade) (^{o}C)	Average Annual Rainfall (mm)	Evapo-ration (mm)
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
8.	**East Flowing Rivers from Mahandi to Kanyakumari**										
8.1	**Gundlakama** Rises near Iskagudem Village in Kurnool Distt. of Andhra Pd. at an elevation of 600 m. Length 220 Km.	Andhra Pd.	8494	Kandleru		15-38	78-47	GDSQ = 1	-	-	-
		Total	8494								
8.2	**Paleru** Rises from near Gogulapalle Village in Nellore Distt. of Andhra Pradesh at an elevation of 325 m. Length 104 Km.	Andhra Pd.	2483			15-17	79-13	GD = 1	-	-	-
		Total	2483								
8.3	**Pennar** Rises from Chennakesava Hills of Nandidurg range in Karnataka Length 597 Km.	Karnataka	6937	Jayamangali	1282	13-16 to	77-04 to	GDQ = 7	15.2 to	508 to 988	-
		Andhra Pd.	48276	Chitravathi	5908	15-52	80-10	GDSQ= 1	40.9		
				Kunderu	8057						
				Papagini	7423						
				Sagileru	3077						
				Cheyyeru	7325						
				Others	22141						
		Total	55213	Total	55213						

(Contd.)

Table : 2 : Salient Features of Different River Basins

Sl. No.	Basin Name	Principal Minerals	Estimated Population (Lakh) (as on March 2007)	Major Industries	Average Annual Runoff (MCM) (at terminal Site with Catchment Area)	Soil Characteristics	Major Projects			
							Name	Gross Storage (MCM)	Live Storage (MCM)	Water withdrawal (MCM)
(1)	(2)	(13)	(14)	(15)	(16)	(17)	(18)	(19)	(20)	(21)
8.	**East Flowing Rivers from Mahandi to Kanyakumari**									
8.1	**Gundlakamma**		830.23		701 Marella N.A.			-	-	-
8.2	**Paleru**				N.A.			-	-	-
8.3	**Pennar**	Guvalacheruvu Quartzite, Vempallydolamite , Lime Stone			155 Nellore 50800	Red, Black, Sandy	Somashila	2093.00	- -	- -

(Contd.)

Table : 2 : Salient Features of Different River Basins

Sl. No.	Name of the Basin (Origin, Altitude & Length of the River)	State	Drainage Area (Sq.Km)	Principal Tributries & their Catchment Area		Basin Location		Number of Hydrological Observation Site	Climate Details		
				Tributary	Area (Sq.Km)	Latitude (a^{o}-$b^{'}$)	Longitute (x^{o}-$y^{'}$)		Temprature Variation (Centigrade) (^{o}C)	Average Annual Rainfall (mm)	Evapo-ration (mm)
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
8.4	**Swarnamukhi** Rises from Pakada village in Chittur Distt. of Andhra Pd. at an elevation of 300 m. Length 130 Km.	Andhra Pd.	3225			13-28	79-09	GDQ = 1	22.5 to 32	762 to 1270	-
		Total	3225								
8.5	**Kalingi** Rises near Kalahasti in Andhra Pradesh Length 76 Km.	Andhra Pd.	5927	Kalleru	-	-	-	GDQ = 1	-	-	-
		Total	5927								
8.6	**Palar** Rises beyond Talag- rore village in Kolar Distt. of Karnataka at an elevation of 900 m Length 348 Km.	Karnataka	3044	Poini	2400	12-39 to	78-32 to	GDQ = 4	22.5 to 32.5	762 to 1270	-
		Andhra Pd.	4681	Cheyyar	1953	12-54	79-56				
		Tamil Nadu	10146	Others							
		Total	17871		13518 17871						
8.7	**Ponniar (Dakshinna Pinakini)** Rises near Hongashenhalli Village in Kolar Distt. of Karnataka at an elevation of 900m. Length 396 Km.	Karnataka	3530			11-45 to 13-30	77-33 to 79-47	GDQ = 1 GDSQ = 2	25 to 30	762 to 1270	-
		Andhra Pradesh	210								
		Tamil Nadu	12279								
		Total	16019								

(Contd.)

Table : 2 : Salient Features of Different River Basins

Sl. No.	Basin Name	Principal Minerals	Estimated Population (Lakh) (as on March 2007)	Major Industries	Average Annual Runoff (MCM) (at terminal Site with Catchment Area)	Soil Characteristics	Major Projects			
							Name	Gross Storage (MCM)	Live Storage (MCM)	Water withdrawal (MCM)
(1)	(2)	(13)	(14)	(15)	(16)	(17)	(18)	(19)	(20)	(21)
8.4	**Swarnamukhi**				60 Naidupeta (2650)			-	-	-
8.5	**Kalingi**				76 Sullurpet (5927)			-	-	-
8.6	**Palar**				50 Chengalpattu (16230)			-	-	-
8.7	**Ponniar**	Lime Stone, Sand Stone, Quartzite			6 Villupuram (12900)		Krishnagiri Sathanur Reservoir	66.10 228.91	-	-

(Contd.)

Table : 2 : Salient Features of Different River Basins

Sl. No.	Name of the Basin (Origin, Altitude & Length of the River)	State	Drainage Area (Sq.Km)	Principal Tributries & their Catchment Area		Basin Location		Number of Hydrological Observation Site	Climate Details		
				Tributary	Area (Sq.Km)	Latitude (a^{o}-$b^{'}$)	Longitute (x^{o}-$y^{'}$)		Temprature Variation (Centigrade) (^{o}C)	Average Annual Rainfall (mm)	Evapo-ration (mm)
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
8.8	**Vellar** Rises near village Tumba in Chottori Hills of Eastern Ghats in Salem Distt. of Tamil Nadu at an elevation of 900 m. Length 210 Kms	Tamil Nadu	8922				-	GDQ = 1	-	-	-
		Total	8922								
8.9	**Vaigai**Rises in Western slopes of Varusha- nadu Hills near Kottaimalai in Madurai Distt. of Tamil Nadu at an elevation of 1200 m. Length 258 Km.	Tamil Nadu	7741	Mangalar	375	9-17 to	77-23	GDQ = 1	25 to 35	635 to 1270	-
				Suruliyar	1210	09-32		GDSQ = 2			
				Varahanadi	380						
				Others	5776						
		Total	7741	Total	7741						

(Contd.)

Table : 2 : Salient Features of Different River Basins

Sl. No.	Basin Name	Principal Minerals	Estimated Population (Lakh) (as on March 2007)	Major Industries	Average Annual Runoff (MCM) (at terminal Site with Catchment Area)	Soil Characteristics	Major Projects			
							Name	Gross Storage (MCM)	Live Storage (MCM)	Water withdrawal (MCM)
(1)	(2)	(13)	(14)	(15)	(16)	(17)	(18)	(19)	(20)	(21)
8.8	**Vellar**				206 Kudalaiyathur (7890)			-	-	-
8.9	**Vaigai**				16 Parmakudi (6796)		Vaigai Reservoir	194.78	-	-

(Contd.)

Table : 2 : Salient Features of Different River Basins

Sl. No.	Name of the Basin (Origin, Altitude & Length of the River)	State	Drainage Area (Sq.Km)	Principal Tributries & their Catchment Area		Basin Location		Number of Hydrological Observation Site	Climate Details		
				Tributary	Area (Sq.Km)	Latitude (a^{o}-$b^{'}$)	Longitute (x^{o}-$y^{'}$)		Temprature Variation (Centigrade) (^{o}C)	Average Annual Rainfall (mm)	Evapo-ration (mm)
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
8.10	**Vaippar** Rises on the Eastern slopes of the Varushandu Hill ranges of Western ghat near Sivagiri in Thirunelveli Distt. in Tamil Nadu at an elevation of 900 m. Length 125 Km.	Tamil Nadu	5069	Arjunanadhi		-	-	GDQ = 1	-	-	-
				Vijayanadhi							
		Total	5069								
8.11	**Tambraparani** Rises on Eastern slopes of Westernghat near Alwarkurichi village in Thirunelve Distt. of Tamil Nadu at an elevation of 1400 m. Length 130 Km.	Tamil Nadu	5482	Chittar		8 - 46	77 - 15	GDSQ = 1	-	-	-
				Manimuthar					-	-	-
		Total	5482								
8.12	**Varahanadi** originated from northern parts of Pakkammalai Hills at an elevation of 566 m past of Gingee Taluk. Length 78.5 Km.	Tamil Nadu	2564								

(Contd.)

Table : 2 : Salient Features of Different River Basins

Sl. No.	Basin Name	Principal Minerals	Estimated Population (Lakh) (as on March 2007)	Major Industries	Average Annual Runoff (MCM) (at terminal Site with Catchment Area)	Soil Characteristics	Major Projects			
							Name	Gross Storage (MCM)	Live Storage (MCM)	Water withdrawal (MCM)
(1)	(2)	(13)	(14)	(15)	(16)	(17)	(18)	(19)	(20)	(21)
8.10	**Vaipar**				0 (Dry Bed) 2005-2006 Irrukkankudi (3721)			-	-	-
8.11	**Tambraparani**				463 2005-2006 Murappandu (4380)			-	-	-
8.12	**Varahanadi**				13 Kumaragalaya m (2208)	Granulite Magnetitequartzite Charnockite				

Source : Water Year Book (June 2009 - May 2010) East Flowing Rivers Basin Vol.I, Stream Flow & Suspended Sediment Data.
Note : N.A. : Not avilable.

Table : 2 : Salient Features of Different River Basins

Sl. No.	Name of the Basin (Origin, Altitude & Length of the River)	State	Drainage Area (Sq.Km)	Principal Tributries & their Catchment Area		Basin Location		Number of Hydrological Observation Site	Climate Details		
				Tributary	Area (Sq.Km)	Latitude (a^{o}-$b^{'}$)	Longitute (x^{o}-$y^{'}$)		Temprature Variation (Centigrade) (^{o}C)	Average Annual Rainfall (mm)	Evapo-ration (mm)
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
9.	**West Flowing Rivers from Kanyakumari to Tapi**										
9.1	**Ulhas** Rises from Sahyadri Hills in Raigad Distt. of Maharashtra at an elevation of 600 m. Length 122 Km.	Maharashtra	4637	Pej		18-44 to	72-45 to	GD = 1	12.4 to 38.9	2943	-
				Bhafta		19-42	73-48	GDQ = 2			
				Barvi							
				Salpe							
				Bhivapuri							
		Total	4637								
9.2	**Kal** Rises from Sahyadri Hills in Raigad Distt. of Maharashtra at an elevation of 652 m. Length 40 Km.	Maharashtra	670			18-05 to 18-25	73.10 to 73.13	GDQ = 1	-	2795	-
		Total	670								
9.3	**Kajavi** Rises in the Vishal Ghat region of Sahayadri Hills. Length - N.A.	Maharashtra	315				-	GD = 1	-	-	-
		Total	315								
9.4	**Gad**Rises from Sahayadri Hills, ranges in Sindhudurg Distt.of Maharashtra at an elevation of 600 m. Length 66 Km.	Maharashtra	890	Kasal		16-0 to 16-20	73-30 to 74-00	GDQ = 1	-	2600	-
		Total	890								

(Contd.)

Table : 2 : Salient Features of Different River Basins

Sl. No.	Basin Name	Principal Minerals	Estimated Population (Lakh) (as on March 2007)	Major Industries	Average Annual Runoff (MCM) (at terminal Site with Catchment Area)	Soil Characteristics	Major Projects			
							Name	Gross Storage (MCM)	Live Storage (MCM)	Water withdrawal (MCM)
(1)	(2)	(13)	(14)	(15)	(16)	(17)	(18)	(19)	(20)	(21)
9.	**West Flowing Rivers from Kanyakumari to Tapi**		616.13							
9.1	**Ulahas**				1883 Badlapur (785)			-	-	-
9.2	**Kal**				634 Mangaon (259)		Kal	-	-	-
9.3	**Kajavi**				919 Anjanari (315)	Sandy mixed with Gravel.		-	-	-
9.4	**Gad**				1625 Belne Bridge (605)			-	-	-

Contd/…

Table : 2 : Salient Features of Different River Basins

Sl. No.	Name of the Basin (Origin, Altitude & Length of the River)	State	Drainage Area (Sq.Km)	Principal Tributries & their Catchment Area		Basin Location		Number of Hydrological Observation Site	Climate Details		
				Tributary	Area (Sq.Km)	Latitude (a^{o}-$b^{'}$)	Longitute (x^{o}-$y^{'}$)		Temprature Variation (Centigrade) (^{o}C)	Average Annual Rainfall (mm)	Evapo-ration (mm)
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
9.5	**Mandovi** Rises in the Jamboti Ghat in Karnataka at an elevation of 600 m Length 62 Km.	Goa	1550	Sarang Mahainada Udel		15-15 to 15-40	73-15 to 73-45	GD = 2	9.3 to 42.6	3484	-
		Total	1550								
9.6	**Agnashini** Rises from Western Ghat of Karnataka at an elevation 676 m. Length 117 Km.	Karnataka	1350			-	-	GDQ = 1	20 to 32.7	2028 to 5465	-
		Total	1350								
9.7	**Haladi (Varahi)** Rises near Someswara in the reserved forest of Karnataka at an elevation of 870 m. Length 70 Km.	Karnataka	781			-	-	GDQ = 1	21.7 to 32.4	5516	-
		Total	781								
9.8	**Swarna(Yennehole)** Rises fromWestern Ghat of Dakshin Kannada Distt. Length 61 Km.	Karnataka	165	Kaudhole		-	-	GDQ = 2	21.7 to 32.4	4436	-
		Total	165								

(Contd.)

Table : 2 : Salient Features of Different River Basins

Sl. No.	Basin Name	Principal Minerals	Estimated Population (Lakh) (as on March 2007)	Major Industries	Average Annual Runoff (MCM) (at terminal Site with Catchment Area)	Soil Characteristics	Major Projects			
							Name	Gross Storage (MCM)	Live Storage (MCM)	Water withdrawal (MCM)
(1)	(2)	(13)	(14)	(15)	(16)	(17)	(18)	(19)	(20)	(21)
9.5	**Mandovi**				2984 2005-2006 Ganjim (880)		Anjunem	-	-	-
9.6	**Agnashini**				3112 Santeguli (1090)			-	-	-
9.7	**Haladi**				2362 Haladi (583)			-	-	-
9.8	**Swarna**				1703 Yennehole (327)		Proposed Dam Site	370.95	108.65	-

(Contd.)

Table : 2 : Salient Features of Different River Basins

Sl. No.	Name of the Basin (Origin, Altitude & Length of the River)	State	Drainage Area (Sq.Km)	Principal Tributries & their Catchment Area		Basin Location		Number of Hydrological Observation Site	Climate Details		
				Tributary	Area (Sq.Km)	Latitude (a^{o}-$b^{'}$)	Longitute (x^{o}-$y^{'}$)		Temprature Variation (Centigrade) (^{o}C)	Average Annual Rainfall (mm)	Evapo-ration (mm)
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
9.9	**Netravati** Rises between Kudermukh of Ballalaryan Durga in Dakshina Kannada Distt. of Karnataka at an elevation of 1000 m. Length 103 Km.	Karnataka	3657	Kumaradhara		-	75-20	GD = 1 GDSQ = 1	16 to 42	2002 to 5277	-
		Total	3657								
9.10	**Payaswani** Originate from Pattighat reserved forest in Coorg Distt. of Karnataka at an elevation of 1350 m. Length 105 Km.	Karnataka	581			-	-	GDSQ = 1	-	-	-
		Kerala	957								
		Total	1538								
9.11	**Valapatanam** Rises from South of Ammatti Village in the Distt. of Coorg of Karnatak at an elevation of 900 m. Length 101 Km.	Karnataka	546			12-13	75-52	GDSQ = 1	22 to 32.9	2369 to 4268	-
		Kerala	1321								
		Total	1867								

(Contd.)

Table : 2 : Salient Features of Different River Basins

Sl. No.	Basin Name	Principal Minerals	Estimated Population (Lakh) (as on March 2007)	Major Industries	Average Annual Runoff (MCM) (at terminal Site with Catchment Area)	Soil Characteristics	Major Projects			
							Name	Gross Storage (MCM)	Live Storage (MCM)	Water withdrawal (MCM)
(1)	(2)	(13)	(14)	(15)	(16)	(17)	(18)	(19)	(20)	(21)
9.9	**Netravathi**				11907 Bantwal (3184)			-	-	-
9.10	**Payaswani**				2022 Erinjipuzha (957)			-	-	-
9.11	**Valapatanam**				3623 Perumannu (1070)		Kattampally	-	-	-

(Contd.)

Table : 2 : Salient Features of Different River Basins

Sl. No.	Name of the Basin (Origin, Altitude & Length of the River)	State	Drainage Area (Sq.Km)	Principal Tributries & their Catchment Area		Basin Location		Number of Hydrological Observation Site	Climate Details		
				Tributary	Area (Sq.Km)	Latitude (a^{o}-$b^{'}$)	Longitute (x^{o}-$y^{'}$)		Temprature Variation (Centigrade) (*C)	Average Annual Rainfall (mm)	Evapo-ration (mm)
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
9.12	**Chaliyar (Beypore)**Rises from Elambalari Hills in Kerala State at an elevation of 2067 m. Length 169 Km.	Kerala	2545	Cherupuzha		-	-	GDSQ = 1	25.8 to 29.4	1289 to	-
		Tamil Nadu	388	Vadapurampuzha				GDSQ = 1		5042	
				Iringipuzha							
				Chaliyarpuzha							
		Total	2933								
9.13	**Kadalundi(Karmpuzha/ Oruvanpurampuzha)** Rises from East of Karuvarukkundu Village in Calicut Distt. in Kerala at an elevation of 900 m. Length 130 Km.	Kerala	1112			11-18	76-15	GDSQ = 2	25.8 to 29.4	1289 to 5042	-
		Total	1112								
9.14	**Bharathapuzha (Ponnani/Aliyar/Kannadipuzha)**Rises in the Eastern slopes of Anamalai Hills of Western Ghat in Tamil Nadu at an elevation of 2250 m. Length 209 Km.	Tamil Nadu	1786	Palar		10-26 to	75-53 to	GDQ = 3	22.2 to 37.4	2000 to	-
		Kerala	4400	Kalpathipuzha		11-13	77-13	GDSQ = 2		3000	
				Gayathripuzha							
				Pulanthode							
		Total	6186								
9.15	**Chalakudi** Rises from Anamalai Hills of Western Ghat Length 130 Km.	Kerala	1404			-	-	GDSQ = 2	25.9 to 28.7	1494 to	-
		Tamil Nadu	300							4588	
		Total	1704								

(Contd.)

Table : 2 : Salient Features of Different River Basins(Contd.)

Sl. No.	Basin Name	Principal Minerals	Estimated Population (Lakh) (as on March 2007)	Major Industries	Average Annual Runoff (MCM) (at terminal Site with Catchment Area)	Soil Characteristics	Major Projects			
							Name	Gross Storage (MCM)	Live Storage (MCM)	Water withdrawal (MCM)
(1)	(2)	(13)	(14)	(15)	(16)	(17)	(18)	(19)	(20)	(21)
9.12	**Chaliyar (Beypore)**				4477 Kuniyil (1876)			-	-	-
9.13	**Kadalundi**				1399 Karathodu (750)			-	-	-
9.14	**Bharathapuzha**				4908 Kumbidi (5755)		Malampuzha Res. Tirumurthi Aliayar	228.40	226.96	-
9.15	**Chalakudi**				1789 Arangaly (1342)		Chalakudi River Diversion Scheme Sholayar H.E.S. Peringilkuthu Left Bank Scheme	443.50	299.50	-

(Contd.)

Table : 2 : Salient Features of Different River Basins(Contd.)

Sl. No.	Name of the Basin (Origin, Altitude & Length of the River)	State	Drainage Area (Sq.Km)	Principal Tributries & their Catchment Area		Basin Location		Number of Hydrological Observation Site	Climate Details		
				Tributary	Area (Sq.Km)	Latitude (a^{o}-$b^{'}$)	Longitute (x^{o}-$y^{'}$)		Temprature Variation (Centigrade) (^{o}C)	Average Annual Rainfall (mm)	Evapo-ration (mm)
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
9.16	**Periyar**Rises at the forest Sivagiri Peak 80 Km. South of Devikulam at an elevation of 2438 m. Length 244 Km.	Kerala	5398	Edamala		-	-	GDSQ = 1 GDQ = 2	25.9 to 28.7	Good Rainfall Max.8656	-
		Total	5398								
9.17	**Muvattupuzha** Rises from the East of Erattupetta village in Distt. Of Kottayam in Kerala State at an evelation of 1200 m Length 121 Km.	Kerala	1554	Thodupuzha Aar Kaliyar Kothmangalam Aar		9.43	76-53	GDSQ = 2	25.9 to 28.7	2779 to 4526	-
		Total	1554								
9.18	**Meenachil River** in the Distt. Kottayam of Originate at East of Errattupata Kerala State at an evalation 900 m. Length 78 Km.	Kerala	1272	Kadapuzha Aar Karipadthode Trikovil Aar Poonzan Aar		9-40	76-52	GDSQ = 1	26.2 to 29.4	2420 to 4686	-
		Total	1272								
9.19	**Pamba** Rises in the Peermedu Plateau at an elevation 1670 m. Length 176 Km.	Kerala	2235	Kaki Aar		-	-	GDSQ = 2	22.6 to 32.7	2276 to 4275	-
		Total	2235								

(Contd.)

Table : 2 : Salient Features of Different River Basins(Contd.)

Sl. No.	Basin Name	Principal Minerals	Estimated Population (Lakh) (as on March 2007)	Major Industries	Average Annual Runoff (MCM) (at terminal Site with Catchment Area)	Soil Characteristics	Major Projects			
							Name	Gross Storage (MCM)	Live Storage (MCM)	Water withdrawal (MCM)
(1)	(2)	(13)	(14)	(15)	(16)	(17)	(18)	(19)	(20)	(21)
9.16	**Periyar**				6686 Neeleshwaram (4234)		Periyarvalley Project Edamalayar Idukky Hydel Project	453.50 1089.80 1996.30	299.35 1017.80 1489.50	- 1824.00 2027.90
9.17	**Morathupuzha**				4616 Ramamangalam (1208)			-	-	-
9.18	**Meenachil**				1303 Kidangoor (615)			-	-	-
9.19	**Pamba**				3287 Malakkara (1713)		Pamba Hydel Project	487.30	471.68	1046.80

(Contd.)

Table No.1.2 : Salient Features of Different River Basins(Contd.)

Sl. No.	Name of the Basin (Origin, Altitude & Length of the River)	State	Drainage Area (Sq.Km)	Principal Tributries & their Catchment Area		Basin Location		Number of Hydrological Observation Site	Climate Details		
				Tributary	Area (Sq.Km)	Latitude (a^{o}-$b^{'}$)	Longitute (x^{o}-$y^{'}$)		Temprature Variation (Centigrade) (^{o}C)	Average Annual Rainfall (mm)	Evapo-ration (mm)
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
9.20	**Achankovil** Rises from South of the Devermalai in the Quillon Distt. of Kerala State at an elevation of 1500 m. Length 128 Km.	Kerala	1484			09-10	77-15	GDSQ = 1	26.1 to 29.1	2520	-
		Total	1484								
9.21	**Kallada** Rises in Papanasam range South of Kulathupuzha in Quillon Distt. of Kerala State at an elevation of 900 m. Length 121 Km.	Kerala	1699			-	-	GDSQ = 1	26.1 to 29.1	2225 to 4038	-
		Total	1699								
9.22	**Vamanapuram** Originates in the Chemunji Motai at an elevation of 1860 m. Length 88 Km.	Kerala	687			-	-	GDSQ = 1	26.2 to 28.8	1836 to 4651	-
		Total	687								

(Contd.)

Table : 2 : Salient Features of Different River Basins(Contd.)

Sl. No.	Basin Name	Principal Minerals	Estimated Population (Lakh) (as on March 2007)	Major Industries	Average Annual Runoff (MCM) (at terminal Site with Catchment Area)	Soil Characteristics	Major Projects			
							Name	Gross Storage (MCM)	Live Storage (MCM)	Water withdrawal (MCM)
(1)	(2)	(13)	(14)	(15)	(16)	(17)	(18)	(19)	(20)	(21)
9.20	**Achankovil**				754 Thumpamon (810)			-	-	-
9.21	**Kalada**				1112 Pattazhy (1210)		Kalada Irrigation Project	-	-	-
9.22	**Vamanapuram**				480 Ayilam (540)			-	-	-

Source : Water Year Book (June 2009 - May 2010) West Flowing Rivers Basin Vol.I, Stream Flow & Suspended Sediment Data.

Table : 2 : Salient Features of Different River Basins

Sl. No.	Name of the Basin (Origin, Altitude & Length of the River)	State	Drainage Area (Sq.Km)	Principal Tributries & their Catchment Area		Basin Location		Number of Hydrological Observation Site	Climate Details		
				Tributary	Area (Sq.Km)	Latitude (a^{o}-$b^{'}$)	Longitute (x^{o}-$y^{'}$)		Temprature Variation (Centigrade)(*C)	Average Annual Rainfall(mm)	Evapo-ration (mm)
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
10	**Tapi** Rises from Near Multai in Betul Distt. of Madhya Pradesh at an elevation of 752 m. Length 724 Km.	M.P.	9804	Tapi(Main)	22522	20.00 to	72.45 to	G = 5	05 to 48	830	
		Maharashtra	51504	Gomai	1148	22.00	78.15	GD = 2			
		Gujarat	3837	Arunavati	935			GDSQ = 3			
				Buray	1419						
				Panjhra	3257						
				Bori	2580						
				Aner	1702						
				Girna	10061						
				Waghur	2592						
				Purna	18929						
		Total	65145	Total	65145						
11	**Narmada** Originates from Amarkantak of Shehdol Distt. of Madhya Pradesh at an elevation of 1057 m. Length 1312 Km.	Madhya Pradesh	85859	Burhner	4228	21-20 to	72-32 to	GD = 1	7.5 to 41.9	674 to 1623	Lower Zone 12.0 to 28.0
		Maharashtra	1538	Hiran	4795	23-45	81-45	GDQ = 7			Middle Zone 4.0 to 7.0
		Gujarat	11399	Tawa	6338			GDSQ = 11			Upper Zone 6.0 to 10.0
				Chhota Tawa	5055						
				Kundi	3973						
				Orsang	3946						
				Banjar	3282						
				Others	67179						
		Total	98796	Total	98796						

(Contd.)

Table : 2 : Salient Features of Different River Basins

Sl. No.	Basin Name	Principal Minerals	Estimated Population (Lakh) (as on March 2007)	Major Industries	Average Annual Runoff (MCM) (at terminal Site with Catchment Area)	Soil Characteristics	Major Projects			
							Name	Gross Storage (MCM)	Live Storage (MCM)	Water Withdrawal (MCM)
(1)	(2)	(13)	(14)	(15)	(16)	(17)	(18)	(19)	(20)	(21)
10	**Tapi**	Coal	208.34	Paper Mills Sugar Mills Cotton Spinning Mills Dal Miils Oil Mills Wood Cutting Mills	3071 Sarankheda (158480)	Shallow Black Medium Black Black Cotton Light Brown to Redish Brown Dark Yellow & Redish	Ukai Dam	8510.00	7092.00	Information
							Kate Purna	97.67	86.35	not available
							Nalganga	76.20	69.32	
							Kakrapar weir	51.51	36.51	
							Girna			
							Hathnur Dam		255	
11	**Narmada**	Bauxite, Clay, Coal, Dolomite , Graphite, Iron Ore Manganese Talc & Lime Stone	184.24	Therefew Large Scale & Medium Scale Industries. Industries are low as compared with other Basins.	6744.0 2004-2005 Garudeshwar (87892)	Shallow Black, Medium Black, Medium Deep Black, Mixed Red & Black Sandy Laterite	Karjan	630.00	-	5516.06
							Sardar Sarover	9460.00	5760.00	-
							Jobat	77.84	70.04	-
							Man	145.03	120.87	-
							Upper Beda	91.82	76.24	-
							Maheshwar	-	-	-
							Indira Sagar	12220.00	9750.00	
							Sukta	89.30	78.05	78.96
							Kolar	270.00	265.00	124.17
							Tawa	2310.00	2050.50	1478.04
							Barna	539.00	455.00	315.24
							Bargi	3920.00	3180.00	22.28
							Matiyari	56.80	51.12	
							Sukhi	-	-	
							Tanwar	-	-	49.37

Source : Water Year Book of Tapi Basin for year 2009-2010,

Table : 2 : Salient Features of Different River Basins

Sl. No.	Name of the Basin (Origin, Altitude & Length of the River)	State	Drainage Area (Sq.Km)	Principal Tributries & their Catchment Area		Basin Location		Number of Hydrological Observation Site	Climate Details		
				Tributary	Area (Sq.Km)	Latitude (a^{o}-$b^{'}$)	Longitute (x^{o}-$y^{'}$)		Temprature Variation (Centigrade) (*C)	Average Annual Rainfall (mm)	Evapo-ration (mm)
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
12	**Mahi and Sabarmati**										
12.1	**Mahi** Rises from Near village Sardarpur in Dhar Distt. of Madhya Pradesh at an elevation of 500 m. Length 583 Km.	Madhya Pradesh	6695	Som	8707	22-35	74-58	GD = 3	5 to 48.50	785	-
		Rajasthan	16453	Anas	5604			GD = 2			
		Gujarat	11694	Panam	2470			GDSQ = 2			
				Others	18061			GDQ = 1			
		Total	34842	Total	34842						
12.2	**Sabarmati** Originates in Aravali Hills in Rajasthan at an elevation of 762 m. Length 371 Km.	Rajasthan	4124	Sei	946	24-40	73-20	G = 5	4 to 45	787.5	-
		Gujarat	17550	Wakal	1625			GD = 4			
				Harnav	972			GDSQ = 1			
				Hathmati	1526			GDQ = 1			
				Watrak	8638						
				Others	7967						
		Total	21674	Total	21674						
12.3	**Luni** Western Slope of Aravali Hills near Ajmer in Rajasthan at an elevation of 772 m. Length 511 Km.	Rajasthan	32879	Guhiya & Sukri	4126	24-11 to	70-37 to	G = 2	5 to 47	251 - 386	-
				Bandi	3016	26-43	74-39	GD = 2			
				Sukari	3280						
				Jawai	2701						
				Mithri	2637						
				Khari Bandi	2671						
				Others	14448						
		Total	32879	Total	32879						

(Contd.)

Table : 2 : Salient Features of Different River Basins

Sl. No.	Basin Name	Principal Minerals	Estimated Population (Lakh) (as on March 2007)	Major Industries	Average Annual Runoff (MCM) (at terminal Site with Catchment Area)	Soil Characteristics	Major Projects			
							Name	Gross Storage (MCM)	Live Storage (MCM)	Water Withdrawal (MCM)
(1)	(2)	(13)	(14)	(15)	(16)	(17)	(18)	(19)	(20)	(21)
12	**Mahi and Sabarmati**		507.74							
12.1	**Mahi**	Phyllites, gneisses Quartzite & Granite		Engg., Handicraft, Stonework, Cement, Chemical, Liquier, Sugar, Tex and Wools etc.	553 Khanpur (32,510)		Mahi Bajaj Sagar	2180.00	1712.00	-
							Kadana Res.	1542.00	1203.00	-
							Wanakbari Weir	41.88	36.22	
							Somkamblamba	126.06	120.83	
							Jakham	141.90	131.60	
							Panam	730.80	679.20	
							Bhadar	46.72	40.06	
							Jaisamand	414.60	296.10	
12.2	**Sabarmati**	- do -		- do -	914 Nabhoi (20149)		Dharoi Dam	907.88	731.99	-
							Watrak	176.90	154.30	-
							Maheswar Res.	82.00	77.00	
							Sabarmati			
							Moti Fatewadi			
							Hatmati	161.00	153.00	
							Guhai	62.34	57.04	
							Mazam	48.86	36.58	
12.3	**Luni**	-		-	0 (Dry Bed) Gandhav Gandhav					

(Contd.)

Table : 2 : Salient Features of Different River Basins

Sl. No.	Name of the Basin (Origin, Altitude & Length of the River)	State	Drainage Area (Sq.Km)	Principal Tributries & their Catchment Area		Basin Location		Number of Hydrological Observation Site	Climate Details		
				Tributary	Area (Sq.Km)	Latitude (a^{o}-$b^{'}$)	Longitute (x^{o}-$y^{'}$)		Temprature Variation (Centigrade) (*C)	Average Annual Rainfall (mm)	Evapo-ration (mm)
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
12.4	**Banas** Rises from village Pindwara of Sirohi Distt. in Rajasthan at an elevation of 372.51 m. Length 266 Km.	Rajasthan	3269	Sipu	1420	23-30 to	71-15 to	GD = 2	7 to 44	543.6	-
		Gujarat	5405	Sukli	438	24-55	73-15	GD = 1			
				Khari	1391			GDQ = 1			
				Others	5425			GDSQ = 1			
		Total	8674	Total	8674						
12.5	**Shetrunji** Originates at Chchai Hills in Gir Forest of Junagarh Distt.of Gujarat at an elevation of 380 m. Length 182 Km.	Gujarat	5514	Satali	651	21-00 to	70-50 to	GDSQ = 1	7 to 44	604.52	-
				Theli	484	21-47	72-10				
				Gagaria	754						
				Kharai	665						
				Others	2960						
		Total	5514	Total	5514						
12.6	**Bhadar** Rises from Near Vaddi village of Rajkot Distt. of Gujarat at an elevation of 261 m. Length 198 Km.	Gujarat	7094	Vasavadi	583	21-45 to	69-45 to	GDSQ = 1	7 to 45	625	-
				Gondali	513	22-10	71-20				
				Venu	953						
				Others	5045						
		Total	7094	Total	7094						
12.7	**Machhu** Rises from near village Khokhara in Surendra Nagar Distt. of Gujarat at an elevation of 220 m. Length 142 Km.	Gujarat	2515	Beti	236	22-10 to	70-40 to	G = 1	7 to 45	533	-
				Maha	508	23-10	71-15	GD = 1			
				Others	1771						
		Total	2515	Total	2515						

(Contd.)

Table : 2 : Salient Features of Different River Basins

Sl. No.	Basin Name	Principal Minerals	Estimated Population (Lakh) (as on March 2007)	Major Industries	Average Annual Runoff (MCM) (at terminal Site with Catchment Area)	Soil Characteristics	Major Projects			
							Name	Gross Storage (MCM)	Live Storage (MCM)	Water withdrawal (MCM)
(1)	(2)	(13)	(14)	(15)	(16)	(17)	(18)	(19)	(20)	(21)
12.4	**Banas**				43 Kamalpur (6960)		Sipu Dam Dantiwada Dam	177.80 464.00	156.00 444.00	-
12.5	**Shetrunji**				177 Lowara (3953)		Shetrunji Irrigation Scheme	350.00	309.00	-
12.6	**Bhadar**				201 Ganod (6266)		Bhadar Irrigation Scheme	238.00	221	-
12.7	**Machhu**				7 Gungoan (2137)		**Machhu -I** **Machhu**	72.74 100.55	70.80 90.80	-

(Contd.)

Table : 2 : Salient Features of Different River Basins

Sl. No.	Name of the Basin (Origin, Altitude & Length of the River)	State	Drainage Area (Sq.Km)	Principal Tributries & their Catchment Area		Basin Location		Number of Hydrological Observation Site	Climate Details		
				Tributary	Area (Sq.Km)	Latitude (a^{o}-$b^{'}$)	Longitute (x^{o}-$y^{'}$)		Temprature Variation (Centigrade) (^{o}C)	Average Annual Rainfall (mm)	Evapo-ration (mm) (mm)
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
12.8	**Rupen** Originates from Taranga Hill ranges near Kheralu taluka of Mehsana Distt. of Gujarat at an elevation of 180 m. Length 156 Km.	Gujarat	2500	Khari	180	23-25 to	71-30 to	G = 1	13 to 44	555	-
				Pushvati	446	24-00	72-46	GD = 1			
				Others	1874						
		Total	2500	Total	2500						
12.9	**Purna** Rises from Satpura Hills near village Chinchi in Maharashtra Length 180 Km.	Gujarat	2373			20-41 to	72-45 to	GDSQ = 1	8 to 47	1591	-
		Maharashtra	58			21-05	74-00				
		Total	2431								
12.10	**Ambica** rises from Satpura Hill range near vill. Kotambi in the Nasik Distt. Of Maharashtra Length 136 Km.	Gujarat	2613			20-31 to	72-48	GDSQ = 1	11 to 40	1751	-
		Maharashtra	102			20-57	73-52				
		Total	2715								
12.11	**Vaitarna** Originates from Hill terrains of Maharashtra at Trimbak Distt. Nasik Length 120 Km.	Maharashtra	2019			19-25 to	72-45 to	GDSQ = 1	12 to 46	2520	-
						20-20	73-35				
		Total	2019								

(Contd.)

Table : 2 : Salient Features of Different River Basins

Sl. No.	Basin Name	Principal Minerals	Estimated Population (Lakh) (as on March 2007)	Major Industries	Average Annual Runoff (MCM) (at terminal Site with Catchment Area)	Soil Characteristics	Major Projects			
							Name	Gross Storage (MCM)	Live Storage (MCM)	Water withdrawal (MCM)
(1)	(2)	(13)	(14)	(15)	(16)	(17)	(18)	(19)	(20)	(21)
12.8	**Rupen**			-	19 Sapawada (2125)			-	-	-
12.9	**Purna**			Spinning & Textile Ginning& Pressing and Brick Manuf., Trap/Basalt crushing unit	571 Mahuwa (1995)	Lateritic, Deep black, Coastal Alluvial		-	-	-
12.10	**Ambica**			- do -	704 Gadat (1510)	- do -		-	-	-
12.11	**Vaitarna**			Mining of Granite Stone	2076 Durvesh (2019)	Red coarse, Alluvial	Vaitarn Hyd. Elec. Project Surya Proj.	301.60 285.31	295.80 276.35	-

(Contd.)

Table : 2 : Salient Features of Different River Basins

Sl. No.	Name of the Basin (Origin, Altitude & Length of the River)	State	Drainage Area (Sq.Km)	Principal Tributries & their Catchment Area		Basin Location		Number of Hydrological Observation Site	Climate Details		
				Tributary	Area (Sq.Km)	Latitude (a^{o}-$b^{'}$)	Longitute (x^{o}-$y^{'}$)		Temprature Variation (Centigrade) (^{o}C)	Average Annual Rainfall (mm)	Evapo-ration (mm) (mm)
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
12.12	**Dhadar** Originates from Pavagarh Hill of Gujarat Length 142 Km.	Gujarat	3423			21-45 to 22-45	72-30 to 73-45	GDQ = 1	8 to 39	851.70	-
		Total	3423								
12.13	**Damanganga** Originates from Sahyadri hill in Nasik Distt. of Maharashtra at an elevation of 930 m. Length 131 Km.	Maharashtra	1408			19-54 to 20-28	72-50 to 73-38	G = 2 GD = 2	8 to 46	2200	-
		Gujarat	495								
		Dadar-Nagar, Haveli & Daman	415								
		Total	2318								
12.14	**Kim** Rises from Satpura Hill ranges in Bharuch Distt. of Gujarat. Length 107 Km.	Gujarat	1286			21-19 to 21-38	72-40 to 73-27	GDQ = 1	11 to 44	957.26	-
		Total	1286								

(Contd.)

Table : 2 : Salient Features of Different River Basins

Sl. No.	Basin Name	Principal Minerals	Estimated Population (Lakh) (as on March 2007)	Major Industries	Average Annual Runoff (MCM) (at terminal Site with Catchment Area)	Soil Characteristics	Major Projects			
							Name	Gross Storage (MCM)	Live Storage (MCM)	Water withdrawal (MCM)
(1)	(2)	(13)	(14)	(15)	(16)	(17)	(18)	(19)	(20)	(21)
12.12	**Dhadar**		11.23	Chemical & Petrolium Production Spinning Textile, rubber and Plastic, Electrical Mechinary etc.	116 Pingalwada (2400)			-	-	-
12.13	**Damanganga**				658 Nanipalsan (764)	Reddish Brown Deep black, Coastal Alluvial	Madhuban Dam Damanganga	567.00	-	-
12.14	**Kim**				192 Motinaroli (804)			-	-	-

Source : Water Year Book (June 2009-May 2010), Mahi, Sabarmati and Other West Flowing Rivers.

Table 3 : Number of Hydrological Observation Sites by type of sites & Non- Classified River Basins

Sl. No.	Basin Name	Type of Sites					Frequency of Water Quality Monitoring
		Guage (G)	Guage & Discharge (GD)	Guage, Discharge & Water Quality (GDQ)	Guage, Discharge, Sediment & Water Quality (GDSQ)	Total no. of Sites	
1	2	3	4	5	6	7	8
1	**Mahanadi**	20	3	1	16	40	Once in a month
2	**Suberanrekha, Burhabalang & Baitarni**	3	2	1	6	12	-do-
3	**Brahmani**	1	1	1	4	7	-do-
4	**Rushikulya,Vamsdhara, Sarada & Nagavali**	7	2	0	3	12	-do-
5	**Godavari**	0	29	1	17	47	Thrice a month
6	**Krishna**	5	13	10	13	41	Once in Two months.
7	**Cauvery**	1	1	17	15	34	Once in a month
8	**East Flowing Rivers from Mahanadi to Kanyakumari**	0	1	17	7	25	Once in a months
9	**West Flowing Rivers from Kanya Kumari to Tapi**	0	5	14	18	37	Once in Two months.
10	**Tapi**	5	2*	-	3	10	Monthly/Once in Two months
11	**Narmada**	0	1*	7	11	19	Once in a month
12	**Mahi and Sabarmati**	16	13	5	9	43	Monthly/Once in Two months
	Total	**58**	**73**	**74**	**122**	**327**	

* : One site records Sediment Observation also.

Source : Water Year Books of differernt Basins for the year 2008-2009 & 2009-2010.

Table 4 : Important Historical Observations by sites and River Basin

I **Basin : Mahanadi**

Sl. No.	Site Name	Drainage Area (Km^2)	Latitude	Longitude	Zero of Gauge (m)	Stage Record		Reference Period	Date of Establishment		
						Peak Water Level (m)	Date of Occurrence		Discharge (MCM)	Sediment	Water Quality
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
1	**Baronda**	3225	20°54'45"	81°53'10"	283.000	289.330	18.09.1980	12.07.1977 to 31.05.2010	06.12.1977	29.06.1980	02.06.1980
2	**Rajim**	8760	20°58'25"	81°52'48"	275.000	282.680	30.08.1994	01.06.1971 to 31.05.2010	01.02.1971	04.12.1972	01.09.1972
3	**Seorinarayan**	48050	21°43'00"	82°35'48"	209.500	224.310	30.08.2003	01.06.1985 to 31.05.2010	09.12.1985	to 05/2010	-
4	**Basantpur**	57780	21°43'36"	82°47'17"	206.000	219.320	20.09.1980	01.02.1971 to 31.05.2010	11.05.1971	07.04.1973	01.09.1972
5	**Kotni**	6990	21°14'10"	81°14'50"	268.000	279.610	12.07.1994	20.09.1977 to 31.05.2010	30.09.1978	-	-
6	**Pathardih**	2511	21°20'28"	81°35'38"	271.000	279.630	01.07.2007	12.06.1987 to 31.05.2010	05.06.1989	-	01.06.1995
7	**Simga**	30761	21°37'54"	81°41'16"	244.000	257.590	13.07.1994	29.07.1971 to 31.05.2010	09.09.1971	30.12.1972	01.09.1972
8	**Andhiarkhore**	2210	21°50'02"	81°36'21"	252.000	258.930	09.08.1979	27.09.1978 to 31.05.2010	29.11.1977	12.07.1980	01.06.1980
9	**Ghatora**	3035	22°03'24"	82°13'15"	246.000	253.500	21.07.1994	15.10.1977 to 31.05.2010	17.09.1979	01.11.2000	01.11.1991
10	**Jondhra**	29645	21°43'30"	82°20'50"	219.000	230.570	14.07.1994	24.06.1980 to 31.05.2010	21.07.1979	11.10.1980	02.06.1980
11	**Rampur**	2920	21°39'06"	82°31'10"	219.000	229.655	29.08.2003	29.01.1971 to 31.05.2010	20.02.1971	05.07.1976	15.01.1972
12	**Manendragarh**	1100	23°12'10"	82°13' 05"	411.000	420.440	12.07.1990	21.06.1987 to 31.05.2010	21.06.1989	09.07.1993	01.10.1992
13	**Bamnidhi**	9730	21°53'55"	82°43'02"	223.000	228.883	22.08.1972	29.01.171 to 31.05.2010	18.02.1971	01.05.1973	01.09.1972
14	**Kurubhata**	4625	21°59'15"	83°12'15"	215.000	219.960	05.08.2005	23.10.1977 to 31.05.2010	01.04.1978	22.07.1980	01.07.1980
15	**Sundergarh**	5870	22°06'55"	84°00'40"	214.000	222.600	23.06.1996	07.08.1977 to 31.05.2010	30.12.1977	21.07.1980	02.06.1980
16	**Salebhata**	4650	20°59'00"	83°32'22"	130.000	139.580	29.08.2003	23.07.1971 to 31.05.2010	12.11.1971	01.05.1973	15.09.1972
17	**Kesinga**	11960	20°11'51"	83°13'30"	166.000	178.500	04.07.2006	10.11.1971 to 31.5.2010	07.11.1978	22.09.2006	01.06.2001
18	**Kantamal**	19600	20°39'00"	83°43'55"	118.000	132.700	19.09.2008	08.08.1971 to 31.05.2010	26.08.1971	22.07.1976	01.10.1972
19	**Tikarapara**	124450	20°38'00"	84°37'08"	50.000	73.830	19.09.2008	13.09.1972 to 31.05.2010	28.05.1972	01.06.1973	01.12.1972

Source : Water Year Book, (June, 2009 to May, 2010) Mahanadi Basin.

Table 4 : Important Historical Observations by sites and River Basin

II **Basin : Subarnarekha, Burhabalang & Baitarni**

Sl. No.	Site Name	Drainage Area (Km2)	Latitude	Longitude	Zero of Gauge (m)	Stage Record		Reference Period	Date of Establishment		
						Peak Water Level (m)	Date of Occurrence		Discharge (MCM)	Sediment	Water Quality
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
1	Champua	1710	22°03'57"	85°40'56"	367.000	376.895	20.08.2007	01.02.1980 to 31.05.2010	20.07.1990	09.08.2001	08.09.2001
2	Anandpur	8570	21°12'34"	86°07'23"	28.000	40.625	19.08.1975	07.03.1972 to 31.05.2010	07.03.1972	01.06.1972	01.09.1972
3	Muri	1330	22°48'56"	86°12'47"	231.000	237.500	24.09.2006	20.08.1988 to 31.05.2010	01.11.1989	-	01.05.1991
4	Adityapur	6309	22°47'29"	86°10'06"	125.000	137.560	20.08.1975	23.08.1971 to 31.05.2010	22.11.1971	06.02.1975	01.01.1976
5	Jamshedpur	12649	22°47'00"	86°12'00"	111.000	126.255	03.09.1973	24.09.1972 to 31.05.2010	01.02.1972	27.11.1972	01.09.1972
6	Ghatsila	14176	22°34'49"	86°20° 08"	72.000	85.050	17.08.1974	16.03.1971 to 31.05.2010	16.03.1971	30.12.1972	01.09.1972
7	Fekoghat	700	22°18'28"	86°55° 11"	41.480	47.660	28.06.1997	18.06.1988to 31.05.2010	18.06.1988	-	-
8	Ghatsila Road Bridge	-	-	-	-	-	-	-	-	-	01.06.1990
9	Baridhi Nala	-	-	-	-	-	-	-	-	-	01.04.1991
10	Kulpatanga	-	-	-	-	-	-	-	-	-	01.04.1991
11	NH-5 Govindapur	4495	21°32'52"	86°55'14"	0.000	8.900	31.10.1999	22.08.1978 to 31.05.2010	07.03.1992	21.03.2003	01.05.2003

Sources: Water Year Book, (June, 2009 to May, 2010) Baitarni, Subernarakha & Burhabalang Basin.

Table 4 : Important Historical Observations by sites and River Basin

III **Basin : Brahmani**

Sl. No.	Site Name	Drainage Area (Km2)	Latitude	Longitude	Zero of Gauge (m)	Stage Record		Reference Period	Date of Establishment		
						Peak Water Level (m)	Date of Occurrence		Discharge (MCM)	Sediment	Water Quality
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
1	Tilga	3160	22°20'00"	84°30'00"	372.000	378.625	28.08.1987	04/1978 to 05/2010	15.06.1979	21.07.1980	01.06.1980
2	Jaraikela	9160	22°19'08"	85°06'19"	185.000	194.010	06.08.1997	07/1971 to 05/2010	01.08.1972	01.06.1975	01.09.1975
3	Panposh	19448	22°16'19"	84°51'07"	170.500	179.680	22.07.2001	08/1977 to 05/2010	21.06.1996	01.08.1996	01.11.1990
4	Gomlai	21950	21°50'16"	84°56'33"	135.000	147.270	20.08.2007	08/1977 to 05/2010	21.01.1979	17.07.1980	17.07.1980
5	Jenapur	33955	20°53'23"	86°00'51"	13.000	23.475	18.08.1984	08/1977 to 05/2010	20.07.1979	09.07.1980	01.03.1980
6	Altuma	830	20°55'48"	85°31'20"	44.000	50.000	31.10.1999	06/1993 to 05/2010	25.07.1990	N.A.	N.A.
7	Tallcher	29750	20°57'00"	85°15'00"	N.A.	N.A.	N.A.	08/1977 to 05/2010	16.08.1985	16.08.1985	16.08.1985

Sources: Water Year Book, (June, 2009 to May, 2010) Brahmani Basin.

Table 4 : Important Historical Observations by sites and River Basin

IV **Basin : Rushikulya, Vamsadhara, Sarada & Nagavali**

Sl. No.	Site Name	Drainage Area (Km2)	Latitude	Longitude	Zero of Gauge (m)	Stage Record		Reference Period	Date of Establishment		
						Peak Water Level (m)	Date of Occurrence		Discharge (MCM)	Sediment	Water Quality
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
1	Gunupur	6740	19°05'00"	83°49'00"	80.250	85.950	07.08.2007	19.04.1978 to 31.05.2010	01.06.2001	-	-
2	Kashi Nagar	7820	18°50'49"	83°57'04"	51.000	57.850	07.08.2007	23.09.1972 to 31.05.2010	28.04.1971	13.10.1972	01.09.1972
3	Purushottampur	7112	19°31'00"	84°53'00"	12.000	17.940	08.10.2003	14.07.1978 to 31.05.2010	14.06.1989	15.01.2001	08.10.2001
4	Srikakulam	9500	18°18'48"	83°53'18"	6.650	14.085	04.08.2006	16.02.1988 to 31.05.2010	25.08.1990	27.06.2001	27.06.2001
5	Ankapali	2090	17°41'00"	83°01'08"	20.400	25.200	16.11.1998	01.12.1987 to 31.05.2010	16.08.1989	-	-

Source : Water Year Book, (June, 2009 to May, 2010) Rushikulya Basin.

Table 4 : Important Historical Observations by sites and River Basin

V **Basin : Godavari**

Sl. No.	Site Name	Drainage Area (Km^2)	Latitude	Longitude	Zero of Gauge (m)	Stage Record		Reference Period	Date of Establishment		
						Peak Water Level (m)	Date of Occurrence		Discharge	Sediment	Water Quality
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
1	**Polavaram**	307800	17°15'07"	81°38'53"	10.897	28.017	16.08.1986	09/66 to 5/10	01.01.1966	25.10.1966	25.10.1966
2	**Bhadrachalam**	280505	17°40'05"	80°52'47"	32.610	45.010	12.08.2008	08/07 to 5/10	11.07.2007		03.10.2006
3	**Konta**	19550	17°47'56"	81°23'18"	30.430	49.910	17.08.1986	09/66 to 5/10	28.10.1965	01.01.1968	05.05.1968
4	**Potteru**	1120	18°11'23"	81°47'52"	120.500	131.990	04.08.2006	08/97 to 5/10	20.05.1997	-	-
5	**Saradaput**	3047	18°36'43"	82°08'36"	225.465	239.530	04.08.2006	08/70 to 5/10	05.09.1970	-	-
6	**Sangam**	1565	18°37'13"	79°48'10"	53.000	58.250	21.09.2005	09/96 to 5/10	24.08.1996	-	-
7	**Perur**	268200	18°35'14"	80°26'10"	83.000	87.420	15.08.1986	09/66 to 5/10	17.09.1965	24.02.1968	24.10.1968
8	**Pathagudem**	40000	18°49'00"	80°21'00"	85.750	103.500	05.08.2006	09/65 to 5/10	20.07.1964	21.07.1965	01.01.1972
9	**Tumnar**	1700	19°00'30"	81°14'20"	315.007	325.977	14.06.2004	08/92 to 05/10	09.12.1991	-	-
10	**Chindnar**	17270	19°05'00"	81°18'00"	327.150	340.100	05.07.2006	07/72 to 5/10	07.12.1971	-	-
11	**Cherribeda**	890	19°38'23"	81°29'07"	564.400	573.900	04.07.2006	07/96 to 5/10	13.11.1996	-	-
12	**Amabal**	1968	19°17'00"	81°47'20"	534.000	542.450	05.07.2006	07/93 to 5/10	30.10.1993	-	-
13	**Sonarpal**	1523	19°16'00"	81°52'00"	534.356	542.570	04.07.2006	07/92 to 05/10	05.12.1991	-	-
14	**Jagdalpur**	7380	19°06'30"	82°01'30"	544.595	544.551	15.08.1986	07/65 to 5/10	21.09.1965	21.09.1965	01.12.1979
15	**Kosagumda**	1635	19°16'37"	82°14'00"	547.000	556.150	20.08.2001	08/98 to 5/10	13.11.1996	-	-
16	**Murthahandi**	N.A.	19°03'00"	82°17'00"	533.600	544.440	06.09.1994	08/89 to 5/10	01.12.1988	-	-
17	**Nowrangpur**	3545	19°12'00"	82°31'00"	550.716	560.636	29.07.1969	09/66 to 5/10	20.06.1971	21.06.1971	01.01.1972
18	**Tekra**	108780	18°58'42"	79°56'49"	95.090	114.600	15.08.1986	06/64 to 5/10	15.07.1964	01.07.1965	15.06.1966
19	**Bhatpalli**	3100	19°19'50"	79°"30"14	156.000	168.500	02.10.1988	08/87 to 5/10	01.10.1986	07.10.1988	04.01.1988
20	**Sirpur**	47500	19°33'41"	79°36'48"	148.500	161.950	08.08.2006	08/68 to 5/10	01.02.1968	-	-
21	**Bamni**	46020	19°48'53"	79°22'46"	157.970	176.320	15.08.1986	09/66 to 5/10	16.10.1965	13.12.1965	03.06.1966

Contd/…

Table 4 : Important Historical Observations by sites and River Basin

V **Basin : Godavari**

Sl. No.	Site Name	Drainage Area (Km^2)	Latitude	Longitude	Zero of Gauge (m)	Stage Record		Reference Period	Date of Establishment		
						Peak Water Level (m)	Date of Occurrence		Discharge	Sediment	Water Quality
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
22	**P.G.Bridge**	18441	19°49'03"	78°34'40"	198.630	217.920	07.08.2006	07/65 to 5/10	21.07.1965	19.10.1965	31.05.1966
23	**Mangrul**	2500	20°11'19"	77°59'12"	279.375	290.375	26.08.2002	06/93 to 5/10	09.11.1992	-	-
24	**Kanhargaon**	3515	19°57'40"	77°08'53"	465.015	474.965	02.09.2002	09/92 to5/10	20.07.1992	-	-
25	**Nandgaon**	4580	20°32'00"	78°49'33"	198.000	212.550	13.07.1994	08/86 to5/10	21.07.1986	13.07.1988	01.01.1988
26	**Hivra**	10240	20°32'52"	78°19'30"	230.000	246.310	07.09.1994	08/87 to5/10	11.08.1987	26.06.1990	16.12.1987
27	**Asthi**	50990	19°41'12"	79°47'13"	141.420	155.100	13.07.1994	09/65 to5/10	14.07.1965	14.03.1966	01.06.1966
28	**Rajoli**	1900	20°11'37"	79°39'59"	229.000	239.615	14.08.1986	08/86 to5/10	25.06.1986	-	-
29	**Wairgarh**	2600	20°25'19"	80°05'30"	208.705	215.905	07.08.2007	08/93 to5/10	07.08.1992	-	-
30	**Salebardi**	1800	20°54'44"	79°55'40"	224.300	233.520	15.09.2005	08/96 to5/10	21.06.1986	-	-
31	**Satrapur**	11100	21°13'00"	79°13'59"	264.300	277.610	06.09.1994	08/86 to5/10	30.05.1986	01.08.1988	09.12.1987
32	**RamaKona**	2500	21°43'12"	78°49'27"	338.000	349.500	30.07.1991	08/87 to5/10	21.11.1986	-	-
33	**Rajegaon**	5380	21°37'32"	80°15'14"	272.000	284.200	15.09.2005	08/86 to5/10	26.07.1986	22.06.1990	15.01.1988
34	**Kumhari**	8070	21°53'03"	80°10'36"	289.000	304.335	18.08.2002	02/87 to 5/10	01.12.1986	10.09.1988	01.01.1988
35	**Keolari**	2970	22°22'50"	79°54'00"	425.000	440.500	21.07.1994	08/87 to5/10	29.06.1987	-	-
36	**Somanpally**	12691	18°37'12"	79°48'12"	121.444	127.344	24.07.1989	08/67to5/10	17.03.1967	-	-
37	**Mancherial**	102900	18°50'08"	79°26'41"	124.316	137.846	12.08.1983	09/66 to5/10	01.06.1966	01.06.1966	01.12.1979
38	**Gandlapet**	1360	18°49'44"	78°26'12"	312.000	317.900	30.08.1990	11/87 to5/10	10.09.1986	-	31.07.1988
39	**Betmogra**	2105	18°42'18"	77°32'42"	347.500	356.200	16.10.2005	10/97 to5/10	03.07.1997	-	15.07.1997
40	**Degloor**	1900	18°33'43"	77°34'59"	352.000	363.850	24.08.2000	09/88 to5/10	17.07.1987	01.01.1994	15.09.1988
41	**Saigaon**	9960	18°04'33"	77°03'09"	542.723	554.443	17.08.1990	09/67 to 5/10	10.11.1967	19.07.1973	16.08.1973
42	**Yelli**	53630	19°02'38"	77°27'10"	334.300	354.200	07.08.2006	07/78 to 5/10	22.04.1978	01.06.1978	01.07.1978
43	**Purna**	15000	19°10'33"	77°00'50"	358.000	371.800	27.07.2005	09/69 to 5/10	02.09.1969	10.10.1972	01.11.1972
44	**Zari**	5550	19°23'43"	76°46'15"	373.000	385.710	27.07.2005	10/87 to 5/10	18.06.1987	-	01.08.1988
45	**G.R.Bridge**	33934	19°01'20"	76°43'45"	364.000	378.370	14.08.2006	07/77 to 5/10	19.06.1976	01.07.1976	01.07.1976
46	**Dhalegaon**	30840	19°13'13"	76°21'52"	386.575	399.855	13.08.2006	08/65 to5/10	16.08.1964	11.07.1971	01.07.1972
47	**Pachegaon**	5800	19°32'07"	74°50'01"	475.000	481.580	26.08.1997	09/83 to 5/10	23.07.1983	-	-

Source : Water Year Book, (June, 2009 to May, 2010) Godavari Basin.

Table 4 : Important Historical Observations by sites and River Basin

VI **Basin : Krishna**

Sl. No.	Site Name	Drainage Area (Km^2)	Latitude	Longitude	Zero of Gauge (m)	Stage Record		Reference Period	Date of Establishment		
						Peak Water Level (m)	Date of Occurrence		Discharge	Sediment	Water Quality
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
1	**Vijayawada**	251360	16°30'04"	80°37'30"	8.152	18.217	07.10.1983	1965 to 05/2010	01.06.1965	01.02.1965	01.01.1972
2	**Keesara**	9854	16°42'53"	80°19'13"	28.585	36.810	20.05.1969	1965 to 05/2010	01.06.1965	02.07.1965	01.01.1972
3	**Madhira**	1850	16°55'05"	80°21'32"	44.500	50.820	21.09.2005	1985 to 05/2010	07.06.1984	-	01.06.1992
4	**Wadenapally**	235544	16°47'39"	80°04'23"	22.054	41.144	16.10.1998	1965 to 05/2010	10.12.1964	01.12.1966	01.01.1972
5	**Dameracherla**	11501	16°44'21"	79°40'11"	56.000	61.335	27.07.1968	1968 to 05/2010	21.07.1968	-	01.01.1980
6	**Halia**	3100	16°47'25"	79°20'19"	127.900	133.507	22.09.1991	1984 to 05/2010	11.07.1984	-	01.06.1992
7	**Bawapuram**	67180	15°52'57"	77°57'26"	271.825	280.445	19.11.1992	1965 to 05/2010	01.04.1964	01.06.1965	01.01.1972
8	**Mantralayam**	60630	15°56'43"	77°25'38"	308.340	315.670	19.11.1992	1972 to 05/2010	01.06.1972	26.07.1977	01.08.1977
9	**T.Ramapuram**	23500	15°39'40"	76°57'56"	349.368	354.318	19.09.2007	1965 to 05/2010	23.08.1964	-	01.01.1980
10	**Kellodu**	4320	13°45'00"	76°20'00"	647.750	649.220	03.11.2006	1991 to 05/2010	11.07.1990	-	01.07.1994
11	**Hoovinahole**	2585	13°58'57"	76°45'06"	93.500	95.820	06.09.2008	2005 to 05/2010	02.10.2001	-	01.06.2008
12	**Marol**	4901	14°56'20"	75°37'05"	508.831	517.459	18.11.1992	1966 to 05/2010	01.02.1966	16.09.1972	01.02.1973
13	**Hariahalli**	14582	14°49'50"	75°40'33"	507.436	518.109	18.11.1992	1967 to 05/2010	01.12.1966	01.11.1972	01.11.1972
14	**Byaladahalli**	2300	14°26'00"	75°46'47"	530.400	537.430	17.11.1992	1985 to 05/2010	11.06.1985	10.12.1997	02.06.1986
15	**Kuppelur**	1850	14°30'00"	75°37'45"	533.400	541.840	08.08.2007	1991 to 05/2010	24.07.1990	-	01.07.1994
16	**Honnali**	7075	14°14'18"	75°39'30"	533.900	546.400	16.07.1994	1980 to 05/2010	01.06.1980	15.09.1995	02.06.1986
17	**Shimoga**	2831	13°56'08"	75°34'41"	556.500	564.760	03.08.1982	1972 to 05/2010	22.01.1972	14.09.1972	01.01.1973
18	**Holehonnur**	2990	13°58'33"	75°41'06"	88.500	96.390	14.08.2008	2004 to 05/2010	01.07.2003	-	01.07.2003
19	**Yadgir**	69863	16°44'15"	77°07'31"	350.503	361.873	07.09.1969	1965 to 05/2010	11.11.1964	01.06.1965	01.01.1972
20	**Malkhed**	7650	17°12'12"	77°09'23"	390.000	398.270	15.10.1998	1991 to 05/2010	15.08.1990	08.09.1992	01.06.1992
21	**Wadakbal**	12092	17°32'03"	75°53'06"	418.883	428.538	29.09.1989	1965 to 05/2010	06.08.1964	01.06.1965	01.09.1972
22	**Takli**	33916	17°24'51"	75°50'52"	410.778	423.653	12.08.2006	1965 to 05/2010	10.08.1965	01.12.1966	01.09.1972

Contd/…

23	**Narsingpur**	22856	17°58'17"	75°08'21"	448.243	462.383	10.08.2006	1967 to 05/2010	22.02.1966	-	-
24	**Sarati**	7200	17°54'43"	75°00'27"	468.128	476.089	02.08.1976	1965 to 05/2010	16.08.1965	01.06.1966	01.09.1972
25	**Phulgaon**	2205	18°40'01"	74°00'08"	81.000	91.475	27.07.2005	1992 to 05/2010	21.07.1992	-	02.08.1993
26	**Huvinhedgi**	55150	16°29'25"	76°55'23"	342.240	356.350	08.08.2005	1976 to 05/2010	01.02.1976	01.06.1976	01.02.1976
27	**Talikot**	2486	16°29'01"	76°17'03"	496.000	55.840	08.10.2001	1996 to 05/2010	21.09.1995	-	-
28	**Cholachagudda**	9373	15°52'43"	75°43'16"	522.500	534.300	20.09.2007	1982 to 05/2010	01.06.1982	01.06.1982	01.06.1982
29	**Gokakfalls**	2770	16°11'24"	74°47'29"	536.004	546.514	16.07.1994	1972 to 05/2010	14.07.1971	-	-
30	**Sadalga**	2322	16°33'44"	74°31'42"	526.160	538.950	29.06.1983	1969 to 05/2010	24.06.1969	-	-
31	**Terwad**	2425	16°40'31"	74°34'30"	520.000	540.390	06.08.2005	-	22.08.1979	-	-
32	**kurundwad**	15190	16°41'01"	74°36'11"	519.455	539.750	06.08.2005	1972 to 05/2010	01.06.1972	06.08.2003	01.07.2003
33	**Arjunwad**	12660	16°46'51"	74°37'59"	523.225	543.680	05.08.2005	1969 to 05/2010	12.01.1969		-
34	**Samdoli**	1948	16°51'18"	74°29'50"	529.594	546.324	05.08.2005	1967 to 05/2010	01.12.1966	-	-
35	**Karad**	5462	17°17'40"	74°11'25"	549.962	566.075	30.07.2006	1965 to 05/2010	21.06.1965	22.06.1965	01.09.1972
36	**Warunji**	1890	17°16'20"	74°09'54"	550.937	566.937	30.07.2006	1967 to 05/2010	01.01.1966	01.06.1974	01.06.1974

Sources: Water Year Book , (June, 2009 to May, 2010) Krishna Basin.

Table 4 : Important Historical Observations by sites and River Basin

VII **Basin : Cauvery**

Sl. No.	Site Name	Drainage Area (Km^2)	Latitude	Longitude	Zero of Gauge (m)	Stage Record		Reference Period	Date of Establishment		
						Peak Water Level (m)	Date of Occurrence		Discharge	Sediment	Water Quality
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
1	**Gopurajapuram**	-	10°51'00"N	79°48'00"E	13.000	3.240	8.11.2005	11/1979 to 05.2010	01.02.1999	-	01.10.2005
2	**Annavasal**	-	10°58'20"N	79°45'20"E	4.250	5.985	24.11.1999	11/1979 to 05.2010	01.02.1999	-	01.09.2005
3	**Nallathur**	-	10°59'30"N	79°44'35"E	0.000	5.665	28.11.2008	10/2006 to 05/2010	01.06.2006	-	01.09.2008
4	**Menaangudi**	-	10°56'50"N	79°42'20"E	4.280	7.940	10.11.1997	11/1997 to 05/2010	21.08.1996	-	01.09.2005
5	**Porakudi**	-	10°54'10"N	79°42'30"E	3.000	5.780	21.12.2007	11/1999 to 05/2010	01.02.1999	-	01.09.2005
6	**Peralam**	-	10°58'00"N	79°39'50"E	6.000	9.835	27.11.2008	11/1999 to 05/2010	01.02.1999	-	01.09.2005
7	**Thengudi**	-	10°55'00"N	79°38'30"E	5.000	9.110	11.12.1998	12/1999 to 05/2010	02.07.1997	07.11.2003	01.09.2005
8	**Musiri**	66243	10°56'36"N	78°26'06"E	82.000	86.650	25.10.2005	10/1973 to 05/2010	01.06.1972	31.03.1973	01.06.1978
9	**Nallamaranpatty**	9080	10°52'51"N	77°59'05"E	129.000	134.850	19.11.1979	12/1978 to 05/2010	23.01.1978	10.12.1978	16.08.1978
10	**Elubthimangalam**	3386	11°01'54"N	77°53'32"E	129.000	132.050	24.10.1999	10/1999 to 05/2010	07.08.1998	-	03.10.2000
11	**Kodumudi**	53233	11°04'52"N	77°53'27"E	121.570	127.830	25.10.2005	12/1972 to 05/2010	21.06.1971	11.07.1972	01.06.1978
12	**Savandapur**	5776	11°31'18"N	77°30'36"E	180.000	186.878	20.11.1979	11/1978 to 05/2010	17.07.1978	24.04.1979	02.04.1979
13	**Thengumarahada**	1370	11°34'20"N	76°55'15"E	336.650	341.075	30.10.1991	08/1979 to 05/2010	01.06.1979	01.06.2002	01.06.1979
14	**Nellithurai**	1475	11°17'16"N	76°53'35"E	301.000	307.780	14.07.1994	11/1979 to 05/2010	01.06.1979	01.07.2002	01.06.1979
15	**Urachikottai**	44100	11°28'40"N	77°42'05"E	155.000	165.830	06.07.1980	08/1979 to 05/2010	01.06.1979	04.01.2001	01.06.1979
16	**Thevur**	1248	11°31'38"N	77°45'10"E	168.000	172.530	01.12.2000	12/2000 to 05/2010	24.09.1999	-	01.10.2001
17	**Sevanur**	258	11°33'18"N	77°42'54"E	170.000	171.570	30.11.2000	11/2000 to 05/2010	20.09.1999	-	01.10.2001
18	**Thoppur**	362	11°56'14"N	78°03'18"E	320.000	325.810	24.11.2005	12/2000 to 05/2010	21.10.1999	-	01.11.2001
19	**Kudlur**	709	11°50'26"N	77°27'50"E	433.000	438.555	19.04.2001	02/2000 to 05/2010	06.03.1999	-	02.02.2001
20	**Hogenakkai**	1636	12°07'15"N	77°47'07"E	252.000	256.350	24.10.2005	11/1997 to 05/2010	05.10.1996	-	01.11.2004
21	**Billigundulu**	36682	12°10'48"N	77°43'48"E	255.000	265.560	30.07.1991	12/1972 to 05/2010	30.08.1971	01.06.1972	01.06.1978
22	**T.Bekuppe**	3500	12°31'00"N	77°26'00"E	604.000	606.700	12.07.2004	7/2004 to 05/2010	24.11.2003	-	01.12.2003

Contd/…

23	**Bendgahalli**	1900	12º00'03"N	77º05'15"E	631.000	634.700	22.10.2007	11/2006 to 05/2010	18.08.2005	-	01.04.2008
24	**T.K.Halli**	7890	12º25'00"N	77º11'36"E	580.000	585.925	03.10.1984	10/1979 to 05/2010	12.06.1978	01.06.1985	02.06.1979
25	**Kollegal**	21082	12º11'21"N	77º06'00"E	622.000	629.750	29.07.1991	6/1971 to 05/2010	06.02.1971	15.03.1972	01.06.1978
26	**T.Narasipur**	7000	12º13'48"N	76º53'46"E	635.000	643.187	29.07.1991	5/1972 to 05/2010	12.03.1971	20.03.1972	01.06.1978
27	**Muthankera**	1260	11º50'00"N	76º07'00"E	705.000	712.737	22.06.1992	6/1973 to 05/2010	01.06.1973	15.02.1974	01.06.1978
28	**K.M.Vadi**	1330	12º20'45"N	76º17'18"E	766.500	772.190	04.07.1980	7/1980 to 05/2010	26.06.1979	-	01.07.1979
29	**Akkihebbal**	5236	12º36'10"N	76º24'10"E	745.000	752.245	02.08.2005	2/2003 to 05/2010	23.01.2002	-	02.09.2002
30	**M.H.Halli**	3050	12º49'06"N	76º08'00"E	838.000	846.477	28.07.1991	8/1979 to 05/2010	16.10.1978	01.06.1994	01.07.1980
31	**Thimmanahalli**	1010	12º59'00"N	76º02'21"E	902.425	908.665	14.08.2008	6/2001 to 05/2010	29.06.2000	-	02.09.2002
32	**Sakleshpur**	617	12º57'12"N	75º47'09"E	882.000	892.930	01.07.2007	8/2002 to 05/2010	05.04.2002	-	02.09.2002
33	**Chunchunkatte**	2995	12º30'24"N	76º18'03"E	748.000	756.440	14.08.2008	8/2002 to 05/2010	19.07.2008	-	03.10.2008
34	**Kudige**	1934	12º30'09"N	75º57'43"E	809.000	820.410	03.07.1980	7/1974 to 05/2010	01.11.1973	01.11.1973	01.06.1978

Source : Water Year Book, (June, 2009 to May, 2010) Cauvery Basin.

Table 4 : Important Historical Observations by sites and River Basin

VIII **Basin : East Flowing Rivers from Mahanadi to Kanyakumari**

Sl. No.	Site Name	Drainage Area (Km^2)	Latitude	Longitude	Zero of Gauge (m)	Stage Record		Reference Period	Date of Establishment		
						Peak Water Level (m)	Date of Occurrence		Discharge	Sediment	Water Quality
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
1	**Marella**		15°52'55"N	79°54'36"E	95.00	101.42	21.06.2010	2007 to 2010	28.06.2007	01.08.2007	01.09.2007
2	**Thammavaram**	7889	15°56'00"N	79°57'08"E	13.365	16.275	01.11.2006	2006 to 2007	09.09.1977	01.06.1979	01.06.1979
3	**Nellore**	50800	14°28'10"N	79°59'20"E	43.500	51.215	18.11.1991	1988 to 2010	28.08.1987	-	01.09.1988
4	**Nandipalli**	2486	14°42'50"N	79°01'20"E	95.000	102.430	19.10.1996	1990 to 2010	18.06.1990	-	01.06.1994
5	**Chennur**	37981	14°34'20"N	78°48'00"E	115.805	123.375	24.08.2000	1990 to2010	13.07.1989	08.08.1989	01.09.1989
6	**Kamalapuram**	7187	14°34'50"N	78°40'40"E	135.650	139.200	20.10.1996	1991 to 2010	16.06.1990	-	01.06.1994
7	**Alladupalli**	8758	14°42'40"N	78°42'40"E	132.955	142.085	24.06.2007	1966 to 2010	21.08.1985	11.07.1996	01.07.1987
8	**Tadapatri**	12482	14°55'20"N	78°01'10"E	227.500	230.340	04.11.1975	1972 to 2010	12.12.1971	-	01.09.1979
9	**Nagalamadike**	5050	14°11'20"N	77°22'20"E	544.550	549.545	12.09.1988	1979 to 2010	17.07.1978	-	01.06.1980
10	**Singavaram**	6262	14°35'50"N	78°01'00"E	256.465	260.355	12.09.1988	1980 to 2010	25.09.1979	-	15.09.1981
11	**Naidupeta**	2650	13°56'50"N	79°53'50"E	42.000	44.340	26.11.1979	1979 to 2010	01.12.1978	-	01.12.1980
12	**Sulurpet**	5927	13°42'40"N	80°00'30"E	13.000	19.235	15.11.1991	1989 to 2010	05.10.1988	-	01.12.1988
13	**Chengalpet**	16230	12°39'00"N	79°56'50"E	26.000	29.220	14.11.1985	1979 to 2010	01.10.1978	-	01.06.1979
14	**Magaral**	1803	12°42'30"N	79°45'00"E	58.000	62.280	16.12.1996	1972 to 2010	25.11.1971	-	01.11.1983
15	**Arcot**	10174	12°54'50"N	79°20'00"E	159.000	161.047	18.11.1991	1980 to 2010	20.09.1979	-	01.06.1988
16	**Avarankuppam**	3300	12°41'03"N	78°32'13"E	365.275	368.450	11.09.1981	1979 to 2010	07.06.1978		01.08.1979
17	**Kumarapalayam**	2208	11°59'00"N	79°40'50"E	8.500	12.300	26.11.2008	2005 to 2010	02.11.2004	-	12.12.2005
18	**Villupuram**	12900	11°52'14"N	79°27'34"E	43.000	45.700	13.11.1977	1973 to 2010	09.10.1972	-	01.01.1987
19	**Vazhavachanur**	10780	12°03'55"N	78°58'42"E	133.000	138.782	17.11.1991	1978 to 2010	21.07.1978	19.10.2001	01.08.1978
20	**Gummanur**	4620	12°33'18"N	78°08'20"E	490.000	495.600	24.10.2005	1979 to 2010	20.09.1978	26.08.1981	20.09.1978
21	**Kudalaiyathur**	7890	11°25'20"N	79°28'20"E	41.000	48.892	05.12.1993	1990 to 2010	15.11.1989	-	01.06.1993
22	**Paramakudi**	6796	09°33'11"N	78°35'10"E	38.000	41.385	20.11.1979	1972 to 2010	03.11.1971	-	05.11.1989
23	**Theni**	1200	09°59'58"N	77°29'06"E	281.650	287.950	19.11.1979	1978 to 2010	01.06.1978	29.01.1979	15.07.1978
24	**Ambasamudram**	850	09°55'32"N	77°30'46"E	296.500	298.775	21.03.2008	1999 to 2010	05.01.1999	09.10.2002	01.08.1999
25	**Irrukkankudi**	3721	09°19'26"N	77°59'25"E	46.000	51.000	14.12.1998	1900 to 2010	25.11.1989	-	01.06.1993
26	**Murappanadu**	4380	08°42'52"N	77°50'11"E	14.025	21.350	14.11.1992	1978 to 2010	23.11.1977	15.02.1979	15.08.1978
27	**A.P.Puram**	1095	08°54'04"N	77°38'55"E	63.000	67.823	14.11.1992	1980 to 2010	01.12.1979	-	01.06.1993

Source : Water Year Book, (June, 2009 to May, 2010) East Flowing Rivers Basin.

Table 4 : Important Historical Observations by sites and River Basin

IX **Basin : West Flowing Rivers from Kanyakumari to Tapi**

Sl.No.	Site Name	Drainage Area (Km^2)	Latitude (N)	Longitude (E)	Zero of Gauge (m)	Stage Record		Reference Period	Date of Establishment		
						Peak Water Level (m)	Date of Occurrence		Discharge	Sediment	Water Quality
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
1	**Pen**	125	18°44'12"	73°06'39"	7.000	14.730	25.07.2005	07/96 to 05/10	17.09.1996	-	-
2	**Nagothane**	420	18°31'09"	73°09'23"	2.000	12.420	16.07.1999	07/96 to 05/10	25.09.1996	-	-
3	**Badlapur**	785	19°09'44"	73°15'16"	9.017	21.097	27.07.2005	06/82 to 05/10	27.06.1981	-	02.07.1993
4	**Mangaon**	259	18°13'53"	73°17'01"	3.905	10.255	24.07.1989	12/86 to 05/10	27.06.1980	-	02.07.1993
5	**Anjanari**	315	16°56'04"	73°30'50"	11.000	18.245	26.07.2005	07/87 to 05/10	08.08.1991	-	-
6	**Belne Bridge**	605	16°13'18"	73°35'40"	8.500	18.01	10.08.2008	06/02 to 05/10	16.06.2000	-	03.07.2000
7	**Ganjim**	880	15°28'16"	74°05'58"	0.000	12.510	29.07.1982	05/71 to 05/10	20.01.1979	-	-
8	**Collem**	117	15°20'20"	74°14'55"	65.000	71.550	01.08.2008\	05/71 to 05/10	15.12.1979	-	-
9	**Santeguli**	1090	14°26'00"	74°35'10"	8.000	18.090	13.07.2000	05/88 to 05/10	09.06.1988	-	01.09.1993
10	**Haladi**	583	13°34'52"	74°51'09"	-2.000	21.666	09.08.1986	07/84 to 05/10	30.12.1985	-	01.09.1993
11	**Avershe**	253	13°31'18"	74°52'48"	8.780	95.670	02.08.2005	06/03 to 05/10	25.06.2002	-	02.09.2002
12	**Yennehole**	327	13°17'35"	74°58'50"	15.000	24.650	06.07.2009	07/89 to 05/10	24.07.1989	-	01.09.1993
13	**Addoor**	688	12°55'49"	74°57'11"	-1.000	15.480	04.08.2004	06/04 to 05/10	17.07.2003	-	02.09.2002
14	**Bantwal**	3184	12°53'04"	75°02'35"	1.000	12.650	26.07.1974	10/70 to 05/10	01.11.1970	22.06.1972	15/06/1978
15	**Erinjipuzha**	957	12°29'00"	75°08'50"	9.100	18.790	18.07.1999	07/84 to 05/10	25.06.1985	13.06.1988	01.07.1988
16	**Perumannu**	1070	11°58'10"	75°35'15"	3.470	14.530	17.07.2007	05/84 to 05/10	26.06.1985	26.07.1986	02.06.1986
17	**Kuttyadi**	238	11°37'30"	75°46'00"	0.000	7.790	18.07.2009	05/00 to 05/10	13.03.2000	-	01.10.2002
18	**Kuniyil**	1876	11°14'26"	76°01'32"	0.000	12.530	18.08.1981	06/78 to 05/10	04.01.1979	21.01.1979	15.01.1979
19	**Karathodu**	750	11°03'25"	76°02'18"	2.000	93.615	09.07.1987	12/85 to 05/10	20.06.1986	22.06.1989	01.12.1988
20	**Kumbidi**	5755	10°51'00"	76°02'00"	2.000	9.610	27.06.1985	06/78 to 05/10	08.01.1979	24.06.1980	03.12.1979
21	**Pulamanthole**	940	10°53'50"	76°11'50"	10.400	90.145	09.08.1986	05/85 to 05/10	17.02.1986	28.08.1986	02.06.1986

Contd/…

22	**Mankara**	2775	10º45'40"	76º29'20"	45.000	50.971	14.11.1992	05/84 to 05/10	21.06.1985	-	02.06.1986
23	**Pudur**	1313	10º46'20"	76º34'30"	58.000	64.930	08.11.2009	06/85 to 05/10	02.09.1985	-	02.06.1986
24	**Ambarampalyam**	950	10º37'49"	76º56'50"	217.000	224.780	08.11.2009	09/77 to 05/10	09.03.1978	01.08.2002	01.08.1978
25	**Arangaly**	1342	10º16'50"	76º18'55"	0.000	7.580	27.06.1985	02/78 to 05/10	27.04.1978	08.07.1980	01.08.1978
26	**Neeleswaram**	4234	10º11'00"	76º30'00"	-3.000	9.750	25.06.1971	01/71 to 05/10	16.03.1971	26.09.1972	15.06.1978
27	**Vandiperiyar**	712	09º34'30"	77º05'30"	789.000	793.620	27.07.2005	06/00 to 05/10	07.06.2000	-	01.10.2002
28	**Ramamangalam**	1208	09º50'00"	76º28'00"	0.000	8.300	28.06.1985	02/78 to 05/10	25.04.1978	20.02.1979	15.08.1978
29	**Kalampur**	405	09º59'25"	76º37'50"	5.000	94.955	26.08.87	11/85 to 05/10	23.06.1986	01.06.1988	01.06.1988
30	**Kidangoor**	615	09º40'30"	76º36'20"	-1.200	7.900	03.08.1994	06/85 to 05/10	07.02.1985	01.06.1987	02.06.1986
31	**Kallooppara**	731	09º24'10"	76º39'00"	0.000	9.050	03.08.1994	06/85 to 05/10	19.06.1985	19.05.1986	02.06.1986
32	**Malakkara**	1713	09º19'45"	76º39'50"	-1.000	7.790	10.07.2001	05/84 to 05/10	19.06.1985	18.06.1986	01.07.1986
33	**Thumpamon**	810	09º13'40"	76º42'00"	5.000	13.735	07.11.1978	12/77 to 05/10	28.01.1978	23.03.1981	15.10.1978
34	**Pattazhy**	1210	09º04'00"	76º45'40"	-2.000	13.702	15.11.1992	04/78 to 05/10	20.04.1978	25.09.1980	15.10.1978
35	**Ayilam**	540	08º42'55"	76º51'15"	0.000	10.367	10.10.1992	06/78 to 05/10	18.12.1978	26.12.1978	02.01.1979
36	**Kuzhithurai**	841	08º18'08"	77º11'19"	0.000	4.715	30.10.2006	06/01 to 05/10	01.11.2000	-	02.12.2002
37	**Ashramam**	258	08º09'30"	77º27'36"	1.000	4.855	09.11.2002	06/01 to 05/10	21.09.1999	-	02.12.2002

Source: Water Year Book, (June, 2009 to May, 2010) West Flowing Rivers.

Table 4 : Important Historical Observations by sites and River Basin

X **Basin : Tapi**

Sl. No.	Site Name	Drainage Area (Km^2)	Latitude	Longitude	Zero of Gauge (m)	Stage Record		Reference Period	Date of Establishment		
						Peak Water Level (m)	Date of Occurrence		Discharge	Sediment	Water Quality
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
1	Burhanpur	8487	21º17'12"N	76º13'18"E	213.000	239.500	29.08.1978	1973 to 2010	14.09.1972	23.12.1972	01.06.1977
2	Gopalkheda	9500	20º52'35"N	76º59'14"E	236.000	252.100	10.08.1979	1977 to 2010	17.02.1977	30.07.1979	01.08.1979
3	Yerli	16517	20º56'11"N	76º28'27"E	213.000	233.540	07.08.2006	1959 to 2010	01.03.1972	09.04.1973	01.06.1977
4	Gidhade	54750	21º17'45"N	74º48'45"E	119.000	141.650	08.08.2006	1991 to 2010	19.06.1990	-	01.09.1990
5	Sarangkheda	58400	21º25'55"N	74º31'37"E	108.000	126.000	08.08.2006	1977 to 2010	19.10.1977	13.07.1984	01.01.1980

Sources : Water Year Book, (June, 2009 to May, 2010) Tapi Basin.

Table 4 : Important Historical Observations by sites and River Basin

XI **Basin : Narmada**

Sl. No.	Site Name	Drainage Area (Km^2)	Latitude	Longitude	Zero of Gauge (m)	Stage Record		Reference Period	Date of Establishment		
						Peak Water Level (m)	Date of Occurrence		Discharge	Sediment	Water Quality
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
1	**Chandwada**	3846.0	22°01'48"	73°25'30"	18.000	33.550	07.09.1994	1979 to 05/2010	01.11.1979	01.08.1988	15.03.1980
2	**Gurudeshwar**	87892.0	21°53'00"	73°39'00"	10.000	39.780	07.09.1994	1972 to 05/2010	23.03.1972	21.03.1973	15.06.1977
3	**Pati**	2151.0	21°57'00"	74°45'30"	187.000	195.850	05.08.2001	2008 to 05/2010	15.06.2008	-	01.07.2008
4	**Dhulsar**	787.0	22°12'00"	74°52'00"	151.000	155.100	05.08.2004	2008 to 05/2010	15.06.2008	-	01.08.2008
5	**Mandaleshwar**	72809.0	22°10'06"	75°39'36"	138.000	157.230	06.09.1994	1971 to 05/2010	28.08.1971	14.04.1972	18.06.1979
6	**Kogaon**	3919.0	22°06'00"	75°41'00"	151.000	161.850	03.09.2002	1978 to 05/2010	01.07.1978	-	15.09.1986
7	**Handia**	54027.0	22°29'18"	77°00'00"	258.000	273.580	19.08.1984	1977 to 05/2010	26.04.1977	11.12.1977	01.08.1979
8	**Chhidgaon**	1729.0	22°25'00"	77°20'00"	287.000	301.810	08.07.2007	1976 to 05/2010	22.12.1976	-	16.09.1986
9	**Hoshangabad**	44548.0	22°46'36"	77°43'00"	282.000	300.805	20.08.1974	1972 to 05/2010	16.09.1972	29.12.1972	15.07.1979
10	**Sandia**	33953.5	22°55'00"	78°21'00"	297.000	316.890	19.09.1999	1978 to 05/2010	18.04.1978	09.08.1978	15.09.1979
11	**Gadarwara**	2270.0	22°54'30"	78°54'30"	321.000	332.470	18.09.1999	1977 to 05/2010	01.02.1977	15.06.1978	16.08.1979
12	**Barmanghat**	26453.0	23°01'36"	79°00'54"	306.000	330.455	30.08.1973	1971 to 05/2010	20.11.1971	27.08.1972	01.06.1979
13	**Belkheri**	1508.0	22°54'54"	79°20'24"	340.000	359.950	21.07.1994	1977 to 05/2010	16.03.1977	-	01.09.1986
14	**Patan**	3950.0	23°18'30"	79°39'45"	341.500	356.800	06.07.2005	1979 to 05/2010	30.08.1979	-	01.09.1986
15	**Bamni**	1864.0	22°29'00"	80°22'00"	440.000	446.930	15.09.2005	1999 to 05/2010	30.11.1999	01.07.2002	01.07.2002
16	**Mohgaon**	3919.0	22°45'42"	80°37'30"	447.000	467.300	08.08.2004	1977 to 05/2010	13.01.1977	27.08.1992	16.09.1986
17	**Manot**	4667.0	22°44'00"	80°31'00"	442.000	459.650	18.08.1984	1976 to 05/2010	16.12.1976	09.11.1979	01.01.1980
18	**Dindori**	2292.0	22°57'00"	81°05'00"	660.000	669.640	23.08.1991	1988 to 05/2010	01.08.1988	-	15.03.1990
19	**Bijora**	14561.0	22°55'30"	79°55'30"	366.000	377.000	07.08.2005	1967 to 05/2010	01.06.1967	01.06.1980	-

Source Water Year Book, (June, 2009 to May, 2010) Narmada Basin.

Table 4 : Important Historical Observations by sites and River Basin

XII **Basin : Mahi and Sabarmati**

Sl. No.	Site Name	Drainage Area (Km^2)	Latitude	Longitude	Zero of Gauge (m)	Stage Record		Reference Period	Date of Establishment		
						Peak Water Level (m)	Date of Occurrence		Discharge	Sediment	Water Quality
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
1	**Khanpur**	32510	22°31'55"N	73°08'27"E	8.22	26.820	12.08.2006	8/1979 to 5/2010	21.12.78	01.05.88	01.01.79
2	**Chakaliya**	3121	23°02'58"N	74°19'14"E	215.0	226.900	11.8.2006	7/1991 to 05/2010	13.02.91	-	-
3	**Paderdibadi**	16247	23°46'02"N	74°08'12"E	131.0	147.525	19.08.2006	8/1978 to 05/2010	24.06.78	21.07.80	01.07.78
4	**Rangeli**	8329	23°52'22"N	74°13'25"E	150.0	158.240	19.08.2006	8/1979 to 05/2010	15.07.78	-	01.07.88
5	**Dhariawad**	1510	24°04'43"N	74°28'02"E	203.0	209.350	11.08.2006	8/1988to 05/2010	01.06.88	-	-
6	**Mataji**	3880	23°20'57"N	74°43'31"E	295.0	307.000	04.10.1988	8/1982 to 05/2010	21.07.82	21.07.82	21.07.82
7	**Voutha**	19636	22°38'59"N	72°32'08"E	12.0	20.660	10.07.2007	8/2001 to 05/2010	24.06.2000	-	01.01.2000
8	**Kheda**	7550	22°44'45"N	72°40'49"E	19.75	28.200	25.08.1990	8/1989 to 05/2010	10.07.89	-	-
9	**Ratanpur(Gadvel)**	2916	22°58'31"N	72°53'02"E	39.1	44.980	12.08.2006	8/1991 to 05/2010	11.07.89	-	-
10	**Derol Bridge**	6724	23°34'24"N	72°48'25"E	89.0	94.730	20.08.1994	9/1992 to 05/2010	01.06.91	25.09.92	15.07.92
11	**Kheroj**	3650	24°13'45"N	73°00'26"E	211.68	215.450	01.06.2006	9/1992 to 05/2010	22.06.92	-	-
12	**Jotasan(Kotra)**	1421	24°21'20"N	73°10'05"E	285.0	291.550	20.08.2006	9/1995 to 05/2010	14.06.95	-	-
13	**Gandhav**	32010	24°59'22"N	71°40'47"E	31.0	38.880	19.07.1979	9/1974 to 05/2010	24.06.1974	-	-
14	**Balotra(Jasol)**	19000	25°49'19"N	72°13'23"E	102.0	107.150	06.07.1990	7/1990 to 05/2010	05.07.1990	-	-
15	**Kamalpur**	6960	23°47'59"N	71°45'00"E	34.0	38.010	08.09.1992	10/1971 to 05/2010	25.07.71	25.08.73	01.06.77
16	**Chitrasani**	345	24°17'20"N	72°29'54"E	184.0	186.750	08.09.1992	7/1990 to 05/2010	01.06.90	-	15.07.88
17	**Sarotry**	2200	24°22'04"N	72°32'48"E	186.0	190.780	08.09.1992	7/1989 to 05/2010	01.06.90	-	-
18	**Abu Road**	1600	24°29'38"N	72°47'30"E	254.85	258.397	08.09.1992	8/1989 to 05/2010	01.06.90	-	01.07.88
19	**Lowara**	3953	21°26'36"N	71°33'42"E	56.0	66.930	09.11.1982	9/1971 to 05/2010	29.11.70	29.11.70	29.11.70
20	**Ganod**	6266	21°39'53"N	70°10'52"E	26.0	34.100	22.06.1983	8/1971 to 05/2010	14.11.70	07.07.73	01.07.73
21	**Gungan**	2137	22°57'42"N	70°45'52"E	8.0	16.000	24.06.1997	7/1971 to 05/2010	09.12.70	-	-
22	**Sapawada**	2125	23°32'54"N	72°00'52"E	36.0	43.000	27.06.1997	8/1990 to 05/2010	31.08.89	-	-
23	**Mahuwa**	1995	21°00'52"N	73°08'25"E	9.0	23.490	04.08.2004	8/1971 to 05/2010	12.11.70	18.06.73	15.06.77
24	**Gadat**	1510	20°51'22"N	72°59'05"E	1.5	13.010	29.06.2005	8/1979 to 05/2010	12.03.79	01.02.85	01.04.80
25	**Durvesh**	2019	19°42'45"N	72°55'50"E	0.0	15.220	17.09.1998	9/1971 to 05/2010	26.01.71	26.01.71	01.06.77
26	**Pingalwada**	2400	22°06'37"N	73°04'44"E	2.0	19.050	09.09.1994	8/1989 to 05/2010	30.06.89	-	15.03.90
27	**Ozerkheda**	640	20°06'01"N	73°16'16"E	80.1	90.390	03.08.2004	7/1991 to 05/2010	01.06.91	-	-
28	**Nanipalsan**	764	20°12'00"N	73°17'00"E	95.0	103.925	03.08.2004	7/1991 to 05/2010	01.06.91	-	-
29	**Motinaroli**	804	21°24'16"N	72°57'48"E	5.0	36.980	01.08.1991	8/1991 to 05/2010	17.10.90	-	01.07.91

Source: Water Year Book, (June, 2009 to May, 2010) Mahi, Sabarmati & Others West Flowing River.

Table 5 : Flow of Water by season site and river basin

I Basin Mahanadi Unit : M.C.M.

Sl. No.	Site Name	Season	1998-1999	1999-2000	2000-2001	2001-2002	2002-2003	2003-2004	2004-2005	2005-2006	2006-2007	2007-2008	2008-2009
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
1	Andhiarkhore	Monsoon	411	440	99	301	276	379	267	645	215	193	82
		Non-Monsoon	88	48	8	32	12	66	36	38	11	15	5
		Annual	499	488	108	332	288	445	303	683	225	209	87
2	Bamnidhi	Monsoon	3779	3334	1489	5684	2268	5753	3388	2982	2145	1850	1402
		Non-Monsoon	1550	1694	944	2388	821	1529	1022	1328	1033	573	400
		Annual	5329	5028	2433	8072	3089	7282	4410	4310	3178	2424	1802
3	Baronda	Monsoon	349	565	163	2047	156	2515	1153	1335	1937	2865	1808
		Non-Monsoon	49	29	7	20	5	103	26	24	30	14	13
		Annual	398	594	171	2067	162	2618	1179	1359	1966	2879	1821
4	Basantpur	Monsoon	13640	17351	6670	26951	7542	28343	15692	23939	22301	23560	12357
		Non-Monsoon	4351	3211	895	2969	803	3453	1967	2259	1864	1330	1136
		Annual	17991	20562	7564	29920	8345	31796	17659	26198	24165	24891	13493
5	Ghatora	Monsoon	1000	1048	331	1121	344	1002	538	949	485	622	485
		Non-Monsoon	159	67	8	34	11	86	24	44	23	31	14
		Annual	1159	1115	339	1155	356	1089	562	993	508	654	499
6	Jondhra	Monsoon	5578	7459	2159	9099	2809	11976	5906	12296	7295	9897	3384
		Non-Monsoon	959	518	37	233	94	754	369	504	229	420	108
		Annual	6537	7977	2195	9332	2903	12729	6274	12800	7523	10316	3493
7	Kantamal	Monsoon	3038	5403	4771	20351	3391	12920	10453	7991	19257	14881	16395
		Non-Monsoon	583	1472	1638	2286	634	2515	2076	1715	1815	1873	1534
		Annual	3621	6874	6409	22637	4025	15434	12529	9706	21072	16753	17929
8	Keloatraigarh	Monsoon	494	553	230	687	547	747	722	801	391	575	843
		Non-Monsoon	-	-	-	-	-	-	-	-	-	-	-
		Annual	494	553	230	687	547	747	722	801	391	575	843

9	Kesinga	Monsoon	1996	4030	3054	13715	1864	10262	7148	5322	12932	10740	8858
		Non-Monsoon	353	976	1527	1870	490	2094	1468	1421	1731	1649	1355
		Annual	2349	5006	4581	15585	2354	12356	8616	6743	14664	12388	10214
10	Kotni	Monsoon	763	1456	741	2578	446	2848	1067	2602	2166	2730	659
		Non-Monsoon	103	39	0	10	5	47	75	60	25	48	196
		Annual	866	1494	741	2588	450	2894	1141	2662	2191	2778	855
11	Kurbhata	Monsoon	2716	3384	1038	3544	1767	2705	1768	1814	1559	1736	1988
		Non-Monsoon	258	260	40	178	106	261	291	139	71	133	112
		Annual	2974	3644	1079	3723	1873	2967	2059	1953	1630	1870	2100
12	Manendragarh	Monsoon	376	344	278	511	206	434	269	362	243	151	297
		Non-Monsoon	32	74	10	34	10	30	25	67	15	6	12
		Annual	408	419	288	545	216	464	294	429	259	157	309

Table 5 : Flow of Water by season site and river basin

I Basin Mahanadi Unit : M.C.M.

Sl.No.	Site Name	Season	**1998-1999**	**1999-2000**	**2000-2001**	**2001-2002**	**2002-2003**	**2003-2004**	**2004-2005**	**2005-2006**	**2006-2007**	**2007-2008**	**2008-2009**
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
13	Parmanpur	Monsoon	-	-	-	3797	1009	2528	1001	1705	1674	1919	1763
		Non-Monsoon	-	-	-	-	-	-	-	-	-	-	-
		Annual	-	-	-	3797	1009	2528	1001	1705	1674	1919	1763
14	Pathardih	Monsoon	453	795	370	1058	309	1148	886	1701	1148	1101	560
		Non-Monsoon	71	35	0	12	6	34	35	32	20	26	6
		Annual	524	830	370	1069	314	1182	921	1733	1168	1128	566
15	Rajim	Monsoon	781	1507	646	5049	687	5944	3126	2725	4704	3972	2741
		Non-Monsoon	86	77	15	99	60	259	74	45	48	66	48
		Annual	867	1585	661	5147	746	6203	3201	2770	4753	4037	2790
16	Rampur	Monsoon	550	934	130	1369	451	3973	878	952	2127	1779	1033
		Non-Monsoon	85	18	0	9	1	68	8	20	12	19	2
		Annual	635	952	130	1378	453	4041	886	972	2139	1798	1035

Contd/..

17	Salebhata	Monsoon	1102	1263	218	3049	908	4843	1583	1025	3593	1706	1952
		Non-Monsoon	94	27	15	6	16	102	48	44	42	51	26
		Annual	1196	1290	232	3055	925	4945	1631	1069	3636	1757	1978
18	Seorinarayan	Monsoon	9763	12431	4306	21719	6029	24854	14825	21779	19514	12990	10186
		Non-Monsoon	1652	961	96	336	216	1250	779	665	437	623	323
		Annual	11415	13392	4402	22055	6245	26103	15603	22445	19951	13613	10509
19	Simga	Monsoon	2330	3930	1737	4601	1858	6784	3074	9069	5868	7209	1970
		Non-Monsoon	368	226	17	73	60	314	242	204	130	229	45
		Annual	2698	4156	1754	4674	1918	7098	3316	9273	5998	7439	2015
20	Sukma	Monsoon	224	310	43	692	149	-	-	-	11	-	-
		Non-Monsoon	7	0	0	0	0	-	-	-	-	-	-
		Annual	231	310	43	692	149	-	-	-	11	-	-
21	Sundergarh	Monsoon	5178	3884	2158	4163	2079	3276	2172	1588	2100	3052	1629
		Non-Monsoon	393	211	87	157	98	441	85	128	97	201	100.589
		Annual	5570	4095	2246	4321	2177	3717	2257	1716	2197	3253	1730
22	Tikapara	Monsoon	25680	25435	16201	57871	18385	60183	35644	39061	54486	47219	49608
		Non-Monsoon	8832	8923	4146	9033	5414	10133	5775	6876	7459	10888	9655
		Annual	34512	34358	20348	66904	23799	70317	41420	45937	61945	58107	59263

Source :River Data Directorate, Central Water Commission.

Table 5 : Flow of Water by season site and river basin

II Basin : Subarnarekha, Burhabalang & Baitarni Unit : M.C.M.

Sl.No.	Site Name	Season	1997-1998	1998-1999	1999-2000	2000-2001	2001-2002	2002-2003	2003-2004	2004-2005	2005-2006	2006-2007	2007-2008
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
1	ADITYAPUR	Monsoon	4385	1310	4098	1396	3729	1761	1402	1969	1088	3705	4424
		Non-Monsoon	474	277	294	57	85	117	195	95	113	99	66
		Annual	4859	1587	4391	1453	3814	1878	1597	2065	1201	3804	4490
2	FENKOGHAT	Monsoon	662	272	700	258	695	413	353	669	306	618	605
		Non-Monsoon	-	-	-	-	-	-	-	-	-	-	-
		Annual	662	272	700	258	695	413	353	669	306	618	605
3	GHATSHILA	Monsoon	9987	3899	8956	3150	7553	4192	3464	4418	2658	9536	10344
		Non-Monsoon	1355	1251	916	341	384	519	719	557	389	1135	728
		Annual	11342	5150	9872	3491	7937	4711	4184	4975	3048	10671	11072
4	GOVINDPUR	Monsoon	2746	1680	3746	2961	3870	1932	2659	2869	2606	3413	4691
		Non-Monsoon	406	496	1188	305	335	325	515	265	469	243	327
		Annual	3152	2176	4934	3266	4205	2257	3174	3134	3075	3656	5018
5	JAMSHEDPUR	Monsoon	11403	3741	9604	3067	7065	3815	3147	4316	2014	8461	8041
		Non-Monsoon	1565	811	978	273	778	764	696	299	444	702	542
		Annual	12968	4552	10582	3340	7843	4578	3843	4615	2457	9162	8583
6	JAMSHOLAGHAT	Monsoon	-	-	-	-	-	-	-	4350	3352	2548	9411
		Non-Monsoon	-	-	-	-	-	-	-	-	232	-	3
		Annual	-	-	-	-	-	-	-	4350	3584	2548	9414
7	MURI	Monsoon	645	430	682	322	277	248	281	263	202	594	573
		Non-Monsoon	339	306	259	66	112	204	236	241	32	134	114
		Annual	984	735	942	387	389	452	517	504	234	727	688

Source :River Data Directorate, Central Water Commission.

Table 5 : Flow of Water by season site and river basin

III Basin : Brahmani Unit : M.C.M.

Sl.No.	Site Name	Season	1998-1999	1999-2000	2000-2001	2001-2002	2002-2003	2003-2004	2004-2005	2005-2006	2006-2007	2007-2008	2008-2009
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
1	ALTUMA	Monsoon	326	837	275	836	252	991	240	747	500	698	578
		Non-Monsoon	70	168	87	56	51	74	55	84	64	72	74
		Annual	396	1005	363	892	303	1065	294	831	565	770	652
2	ANANDPUR	Monsoon	2339	8209	3243	4536	1677	4125	3088	4746	5060	-	-
		Non-Monsoon	603	1311	257	349	246	568	339	539	414	-	-
		Annual	2942	9520	3500	4885	1923	4693	3427	5286	5474	-	-
3	CHAMPUA	Monsoon	596	1631	666	1153	385	732	756	989	1055	-	-
		Non-Monsoon	181	321	104	150	93	198	135	155	124	-	-
		Annual	777	1951	770	1302	478	930	891	1144	1179	-	-
4	GOMLAI	Monsoon	8854	13859	6837	15587	7325	9132	7687	6278	10322	15203	12904
		Non-Monsoon	1322	876	387	419	411	1174	482	543	460	910	443
		Annual	10176	14735	7224	16006	7735	10306	8169	6821	10782	16113	13347
5	JARAIKELA	Monsoon	3613	5897	3596	5207	2869	3711	3287	2312	4024	5397	4649
		Non-Monsoon	659	438	185	191	202	528	253	274	323	404	202
		Annual	4272	6336	3781	5397	3071	4239	3540	2585	4347	5801	4851
6	JENAPUR	Monsoon	10476	18236	8956	24875	7564	16400	9391	13722	12291	19291	17049
		Non-Monsoon	4824	4567	1664	3600	3210	5038	3119	2823	2519	3245	2826
		Annual	15301	22803	10621	28474	10774	21438	12510	16546	14810	22536	19875
7	PANPOSH	Monsoon	9936	12324	6380	13178	7358	8328	7041	6483	9391	12766	11613
		Non-Monsoon	1392	827	382	442	446	1192	556	600	488	815	501
		Annual	11328	13151	6762	13621	7804	9519	7598	7083	9879	13580	12114
8	TILGA	Monsoon	2110	2596	1119	2475	1457	1906	1558	1657	1483	1714	1916
		Non-Monsoon	345	181	76	115	100	330	126	111	105	150	71
		Annual	2455	2777	1195	2590	1556	2236	1684	1768	1588	1864	1987

Source :River Data Directorate, Central Water Commission.

Table 5 : Flow of Water by season site and river basin

IV **Basin : Rushikulya, Vamsadhara, Sarada & Nagavali** Unit : M.C.M.

Sl.No.	Site Name	Season	1996-97	1997-98	1998-99	1999-2000	2000-01	2001-02	2002-03	2003-04	2004-05	2005-06	2006-07
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
1	**Purushottampur**	Monsoon	1063	1429	2540	1485	978.8	2239	825.9	3100	1072	2650	2876
		Non-Monsoon	14.78	198.5	147.0	83.80	10.71	66.43	14.28	269.1	25.58	87.70	35.83
		Annual	1078	1628	2687	1569	989.5	2305	840.2	3369	1098	2748	2912
2	**Gunupur**	Monsoon	-	-	-	-	1066	1892	627.4	2761	1759	2071	4967
		Non-Monsoon	-	-	-	-	90.09	165.6	53.39	337.9	1478	309.5	218.9
		Annual	-	-	-	-	1156	2058	680.8	3099	1907	2381	5186
3	**Kashi Nagar**	Monsoon	1178	1330	1631	1363	1069	2008	605.5	3135	2582	2337	6047
		Non-Monsoon	118.5	276.1	202.2	160.2	74.13	155.1	32.93	324.7	166.9	312.8	374.4
		Annual	1297	1606	1833	1523	1143	2163	638.4	3460	2749	2650	6422
4	**Srikakulam**	Monsoon	2363	1118	2319	1122	1240	1807	478.5	1992	1612	1761	4388
		Non-Monsoon	169.7	114.0	171.2	75.26	58.13	143.0	67.13	340.5	129.0	157.5	276.8
		Annual	2533	1232	2490	1197	1298	1950	545.6	2333	1741	1919	4665
5	**Ankapali**	Monsoon	1106	90.81	1357	177.1	254.5	232.7	30.65	200.1	282.0	884.2	591.8
		Non-Monsoon	37.31	14.05	57.73	4.233	2.425	23.82	0.1700	125.6	45.54	108.0	59.04
		Annual	1143	104.9	1415	181.3	256.9	256.5	30.82	325.7	327.6	992.2	650.9

Source : The Superintending Engineer, Wainganga Division, Central Water Commission

Table 5 : Flow of Water by season site and river basin

V Basin : Godavari Unit : M.C.M.

S.No.	Site Name	Season	1999-2000	2000-2001	2001-2002	2002-2003	2003-2004	2004-2005	2005-2006	2006-2007	2007-2008	2008-2009	2009-2010
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
1	Ambabal	Monsoon	919	503	1297	315	1129	734	545	1521	1109	711	473
		Non-Monsoon	7	3	7	85	24	14	4	9	5	1	1
		Annual	926	505	1304	400	1153	748	549	1529	1113	712	474
2	Betmogrra	Monsoon	244	341	419	111	221	26	439	210	44	15	0
		Non-Monsoon	3	1	1	0	2	2	5	4	5	0	0
		Annual	248	342	419	111	223	27	444	214	49	15	0
3	Bhadrachalam	Monsoon	-	-	-	-	-	-	-	-	70604	48106	25079
		Non-Monsoon	-	-	-	-	-	-	-	-	2752	1051	977
		Annual	-	-	-	-	-	-	-	-	73356	49157	26056
4	Cherribeda	Monsoon	508	181	962	230	1162	803	595	1197	941	366	372
		Non-Monsoon	15	3	11	4	30	23	11	20	11	5	3
		Annual	524	184	974	234	1191	826	606	1216	952	371	374
5	Chindnar	Monsoon	7534	5177	11651	3318	8190	8554	7642	15295	10513	6603	4484
		Non-Monsoon	96	116	130	30	275	193	117	129	99	50	86
		Annual	7630	5294	11782	3348	8464	8747	7759	15424	10612	6654	4570
6	Degloor	Monsoon	258	714	230	100	359	110	500	385	65	78	25
		Non-Monsoon	0	0	0	0	0	0	3	1	0	0	0
		Annual	258	714	230	100	359	110	503	386	65	78	25
7	Dhalegaon	Monsoon	702	1681	222	274	59	122	3629	6550	886	1034	172
		Non-Monsoon	17	10	0	0	0	0	5	12	4	0	0
		Annual	719	1691	222	274	59	122	3633	6562	890	1034	172
8	G.R.Bridge	Monsoon	1075	2640	593	528	144	106	4601	7075	887	1048	65
		Non-Monsoon	0	83	0	0	1	5	44	0	69	0	0
		Annual	1075	2723	593	528	145	111	4644	7075	956	1048	65

9	Gandlapet	Monsoon	169	193	36	7	3	3	23	100	0	0	0
		Non-Monsoon	0	0	0	0	0	0	0	0	0	0	0
		Annual	169	193	36	7	3	3	23	100	0	0	0
10	Jagdalpur	Monsoon	2580	1968	3769	1127	3169	2317	1730	3471	3056	1824	1342
		Non-Monsoon	40	65	47	40	87	57	75	61	63	44	64
		Annual	2620	2033	3816	1167	3256	2374	1805	3532	3119	1868	1406
11	Konta	Monsoon	13007	13000	10003	5090	13796	11720	10218	19994	15951	10692	6090
		Non-Monsoon	3638	1981	3080	1683	4243	2755	3523	3109	3575	2342	1482
		Annual	16645	14981	13083	6773	18039	14475	13741	23103	19526	13034	7572
12	Kosagumda	Monsoon	723	712	1219	304	1146	1029	724	1324	1281	970	583
		Non-Monsoon	19	10	0	1	33	31	26	21	16	7	9
		Annual	742	722	1219	306	1178	1061	750	1345	1297	977	592
13	Mancherial	Monsoon	5819	10929	3564	2451	3203	262	10898	14815	925	2171	431
		Non-Monsoon	455	377	365	122	117	28	243	300	185	169	34
		Annual	6275	11306	3929	2573	3320	290	11141	15115	1110	2340	464
14	Murthahandi	Monsoon	1255	1218	1756	789	1360	1076	859	1622	1456	947	828
		Non-Monsoon	125	129	137	50	168	138	130	149	220	150	141
		Annual	1380	1348	1893	839	1528	1214	989	1771	1676	1097	969
15	Nowrangpur	Monsoon	1372	1568	1975	440	1552	917	716	2181	1541	660	583
		Non-Monsoon	43	35	22	40	82	53	63	61	140	115	105
		Annual	1415	1604	1997	479	1635	971	779	2242	1682	775	689

Contd/…

Table 5 : Flow of Water by season site and river basin

V Basin : Godavari Unit : M.C.M.

S.No.	Site Name	Season	1999-2000	2000-2001	2001-2002	2002-2003	2003-2004	2004-2005	2005-2006	2006-2007	2007-2008	2008-2009	2009-2010
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
16	Pachegaon	Monsoon	322	76	115	24	37	347	1277	2423	1414	950	18
		Non-Monsoon	1	0	0	0	0	0	0	0	0	0	0
		Annual	323	76	115	24	37	347	1277	2423	1414	950	18
17	Pathagudem	Monsoon	26372	18078	34355	11082	30839	18820	21365	36592	24520	18300	11128
		Non-Monsoon	402	196	299	103	654	446	354	480	428	172	140
		Annual	26774	18274	34654	11185	31493	19266	21719	37072	24948	18472	11268
18	Perur	Monsoon	70732	62775	63538	43073	63632	31796	82213	106875	63327	40177	22493
		Non-Monsoon	2343	1143	1319	953	1980	1415	1926	2011	1605	919	857
		Annual	73075	63918	64857	44027	65612	33212	84139	108886	64931	41097	23350
19	Polavaram	Monsoon	89710	72847	77047	49256	82402	45441	98327	124623	88589	55646	26655
		Non-Monsoon	6197	2845	3827	2216	6599	5144	8276	7245	5255	2834	2368
		Annual	95906	75692	80874	51472	89001	50584	106603	131868	93844	58479	29023
20	Potteru (Seasonal)	Monsoon	1764	1259	1361	622	1926	1674	1117	2319	2495	1302	992
		Non-Monsoon	1198	586	835	474	1155	776	925	927	0	520	0
		Annual	2962	1846	2196	1095	3081	2450	2042	3246	2495	1822	992
21	Purna	Monsoon	1376	1717	1262	2023	482	215	2680	5532	281	343	227
		Non-Monsoon	5	4	0	27	18	0	10	66	13	0	0
		Annual	1382	1721	1262	2050	500	215	2689	5598	294	343	227
22	Saigaon	Monsoon	622	1549	166	20	86	24	953	675	438	917	39
		Non-Monsoon	173	0	0	0	0	0	1	0	0	0	0
		Annual	796	1549	166	20	86	24	954	675	438	917	39
23	Sangam	Monsoon	361	331	118	147	278	404	437	229	164	260	22
		Non-Monsoon	4	7	2	1	15	2	13	18	36	11	19
		Annual	365	338	120	148	293	406	450	247	200	271	41

Contd.

24	Saradaput	Monsoon	5049	3900	4711	2948	4965	4825	3106	6754	6227	3416	2446
		Non-Monsoon	628	304	651	250	993	771	690	846	907	549	302
		Annual	5677	4204	5362	3198	5958	5596	3796	7600	7134	3965	2748
25	Somanpally (Seasonal)	Monsoon	1257	1909	521	446	259	11	754	2039	703	1117	117
		Non-Monsoon	27	41	50	10	17	0	29	45	-	1	2
		Annual	1284	1950	571	456	276	11	783	2084	703	1118	119
26	Sonarpal	Monsoon	779	531	938	362	1188	784	632	1102	801	619	487
		Non-Monsoon	6	11	4	10	26	10	5	5	1	10	2
		Annual	785	543	941	372	1215	794	637	1107	803	629	489
27	Tumnar	Monsoon	1668	841	1225	492	1712	1285	817	1799	1957	1092	577
		Non-Monsoon	37	25	40	15	83	41	54	38	57	39	33
		Annual	1705	867	1265	506	1795	1326	871	1837	2014	1131	610
28	Yelli	Monsoon	3676	4800	2853	2727	1262	185	9014	12960	1784	1707	511
		Non-Monsoon	65	15	18	19	3	2	11	15	0	0	0
		Annual	3741	4815	2871	2746	1265	187	9025	12974	1784	1707	511
29	Zari	Monsoon	480	424	330	470	108	47	672	764	123	139	161
		Non-Monsoon	0	0	0	0	0	0	0	1	0	0	0
		Annual	480	424	330	470	108	47	672	765	123	139	161

Source : SE, Godavari Circle, Central Water Commission, Krishna Godavari Bhawan, Hyderabad.

Table 5 : Flow of Water by season site and river basin

VI Basin : Krishna Unit : MCM

S.No.	Site Name	Season	1999-2000	2000-2001	2001-2002	2002-2003	2003-2004	2004-2005	2005-2006	2006-2007	2007-2008	2008-2009	2009-2010
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
1	**Arjunwad (Seasonal)**	Monsoon	8115	2874	3398	2946	2697	7776	18332	17640	9962	5794	4811
		Non-Monsoon	0	0	0	0	0	0	0	0	0	0	0
		Annual	8115	2874	3398	2946	2697	7776	18332	17640	9962	5794	4811
2	**Bawapuram**	Monsoon	5119	5422	3277	786	495	1528	5931	4472	10818	5341	9946
		Non-Monsoon	142	156	128	53	177	167	198	86	708	160	467
		Annual	5261	5578	3405	839	672	1695	6129	4558	11526	5501	10414
3	**Cholachguda (Seasonal)**	Monsoon	642	837	427	318	228	561	789	784	1596	352	1347
		Non-Monsoon	259	170	63	47	105	84	233	0	0	0	0
		Annual	901	1006	490	365	333	645	1022	784	1596	352	1347
4	**Dameracherla**	Monsoon	473	765	387	8	40	247	1146	978	1218	1512	1212
		Non-Monsoon	171	266	151	7	0	244	399	510	636	586	494
		Annual	644	1031	538	15	40	491	1545	1488	1854	2098	1706
5	**Gokak Falls (Seasonal)**	Monsoon	1948	847	517	569	354	770	3999	3087	2239	1428	1233
		Non-Monsoon	85	63	3	0	0	0	0	0	0	0	0
		Annual	2033	910	520	569	354	770	3999	3087	2239	1428	1233
6	**Halia**	Monsoon	15	106	214	2	17	107	853	124	480	351	137
		Non-Monsoon	4	8	6	0	0	8	51	47	59	115	99
		Annual	19	114	220	2	18	115	904	171	539	465	237
7	**Huvinhedigi**	Monsoon	16569	7368	7243	3833	2439	9321	25654	25856	20848	10759	11348
		Non-Monsoon	562	689	720	859	1093	958	923	939	846	806	1158
		Annual	17131	8056	7963	4692	3532	10279	26578	26794	21694	11564	12505
8	**Karad**	Monsoon	4661	1780	1720	2091	1779	4646	10046	10337	6273	3367	3221
		Non-Monsoon	630	606	523	499	544	434	435	488	450	520	168
		Annual	5291	2386	2243	2590	2323	5080	10481	10824	6723	3887	3389

Contd.

9	**Keesara**	Monsoon	1447	2776	455	225	763	677	2898	2134	1419	4036	132
		Non-Monsoon	150	169	81	0	39	32	317	138	314	175	310
		Annual	1597	2945	536	225	801	709	3214	2272	1733	4212	442
10	**Kurundwad**	Monsoon	10622	5348	6034	5886	4706	10797	23671	24683	16759	11813	8346
		Non-Monsoon	0	0	0	0	0	0	0	0	0	0	0
		Annual	10622	5348	6034	5886	4706	10797	23671	24683	16759	11813	8346
11	**Madhira**	Monsoon	418	649	94	61	86	176	781	446	413	709	50
		Non-Monsoon	69	76	55	0	13	13	164	71	116	52	142
		Annual	487	725	149	61	99	190	945	517	529	761	192
12	**Malkhed**	Monsoon	449	1013	542	208	218	149	1058	69	729	818	1207
		Non-Monsoon	24	34	42	21	35	28	33	27	192	101	100
		Annual	472	1047	584	228	253	177	1092	95	921	919	1307
13	**Mantralayam**	Monsoon	6291	5883	3617	915	846	2195	7157	5122	11641	5816	11503
		Non-Monsoon	405	391	412	285	364	318	468	319	1171	368	781
		Annual	6696	6275	4029	1200	1210	2513	7625	5441	12812	6185	12284
14	**Narasingpur**	Monsoon	3049	130	221	205	106	1573	10141	11393	4562	2449	1380
		Non-Monsoon	87	243	125	196	204	360	307	172	211	365	157
		Annual	3136	372	346	401	310	1933	10448	11565	4773	2814	1537
15	**Phulgaon (Seasonal)**	Monsoon	539	610	964	674	1224	2801	2720	964	1106	620	Data not given
		Non-Monsoon	0	0	0	0	0	0					
		Annual	539	610	964	674	1224	2801	2720	964	1106	620	

Contd/…

Table 5 : Flow of Water by season site and river basin

VI Basin : Krishna Unit : MCM

S.No.	Site Name	Season	1999-2000	2000-2001	2001-2002	2002-2003	2003-2004	2004-2005	2005-2006	2006-2007	2007-2008	2008-2009	2009-2010
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
16	**Sadalgi (Seasonal)**	Monsoon	1380	964	1573	907	1860	4918	4924	2673	2216	1736	<---------- Data not given ---------->
		Non-Monsoon	0	2	0	0	0	0					
		Annual	1380	966	1573	907	1860	4918	4924	2673	2216	1736	
17	**Samdoli (Seasonal)**	Monsoon	1399	1520	1361	1436	2708	5839	5650	3839	2343	1949	
		Non-Monsoon	0	0	0	0	0	0					
		Annual	1399	1520	1361	1436	2708	5839	5650	3839	2343	1949	
18	**Sarati**	Monsoon	7	133	72	7	991	2600	3050	1865	748	1326	
		Non-Monsoon	0	0	0	7	0	0	18	0	0	68	
		Annual	7	133	72	14	991	2600	3068	1865	748	1394	
19	**T Ramapuram (Seasonal)**	Monsoon	901	1263	235	181	310	957	461	914	1017	1766	
		Non-Monsoon	85	77	29	57	45	124					
		Annual	987	1340	263	238	354	1081	461	914	1017	1766	
20	**Takli**	Monsoon	253	726	42	8	1481	9277	11671	5348	2094	3490	
		Non-Monsoon	26	0	7	0	0	0	0	0	0	0	
		Annual	278	726	49	8	1481	9277	11671	5348	2094	3490	
21	**Talikot (Seasonal)**	Monsoon	321	415	169	33	118	101	173	264	172	704	
		Non-Monsoon	5	0	0	3	10	19					
		Annual	326	415	169	36	129	120	173	264	172	704	
22	**Terwad (Seasonal)**	Monsoon	2666	3179	3155	2535	4302	8176	8038	5496	4067	3163	
		Non-Monsoon	0	0	0	0	0	0					
		Annual	2666	3179	3155	2535	4302	8176	8038	5496	4067	3163	
23	**Vijayawada**	Monsoon	5932	2116	311	245	628	35590	26740	25721	9064	13169	
		Non-Monsoon	1258	1087	63	88	31	443	1	541	693	1341	
		Annual	7190	3203	374	333	658	36034	26741	26262	9757	14510	
												Contd.	

24	**Wadakbal**	Monsoon	743	188	15	1	193	311	868	550	686	344	
		Non-Monsoon	6	0	3	2	0	5	4	18	95	189	
		Annual	749	188	18	3	193	316	872	568	781	534	
25	**Wadenapally**	Monsoon	6327	4375	3524	1499	3058	35327	32828	35114	12526	21622	
		Non-Monsoon	3161	2745	663	945	1206	2529	3052	3115	3232	3224	
		Annual	9488	7119	4187	2444	4265	37856	35880	38229	15758	24846	
26	**Warunji**	Monsoon	1219	1160	1515	1330	2838	6110	6086	3947	2359	1998	
		Non-Monsoon	475	502	506	505	441	383	346	332	314	39	
		Annual	1694	1661	2021	1835	3278	6493	6432	4279	2673	2037	
27	**Yadgir**	Monsoon	3634	2421	724	896	2473	13485	14191	7322	4736	7290	
		Non-Monsoon	228	60	43	723	82	55	0	303	0	262	
		Annual	3862	2481	766	1619	2555	13541	14191	7626	4736	7553	

Source : Sub Division Engineer, Krishna & Coordination Circle, CWC, Hyderabad.

Table 5 : Flow of Water by season site and river basin

VII Basin : Cauvery Unit : M.C.M.

S.No.	Site Name	Season	1999-2000	2000-2001	2001-2002	2002-2003	2003-2004	2004-2005	2005-2006	2006-2007	2007-2008	2008-2009	2009-2010
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
1	Akkihebbal	Monsoon	-	-	-	168	152	455	1498	1641	1623	1174	Data not given
		Non-Monsoon	-	-	128	125	103	268	462	340	562	324	
		Annual	-	-	128	293	255	722	1960	1981	2184	1498	
2	Annavasal	Monsoon	21	20	10	1	0	4	12	15	21	13	
		Non-Monsoon	23	19	18	2	1	8	14	8	17	11	
		Annual	44	39	28	3	1	12	26	23	38	24	
3	Bendrahalli	Monsoon	-	-	-	-	-	-	36	10	28	25	
		Non-Monsoon	-	-	-	-	-	-	56	11	21	24	
		Annual	-	-	-	-	-	-	92	21	49	49	
4	Biligundulu	Monsoon	5218	6602	3523	1830	1377	3883	7707	5599	8061	4310	
		Non-Monsoon	2531	2438	1908	1284	762	1325	3164	1722	1952	1640	
		Annual	7749	9040	5431	3114	2140	5208	10871	7322	10013	5950	
5	Chunchunkatte	Monsoon	-	-	-	-	-	-	-	-	-	2192	
		Non-Monsoon	-	-	-	-	-	-	-	-	-	161	
		Annual	-	-	-	-	-	-	-	-	-	2353	
6	Elunuthimangalam	Monsoon	68	23	3	4	3	5	54	32	93	52	
		Non-Monsoon	70	6	12	6	9	23	134	134	157	84	
		Annual	138	29	15	11	12	28	188	167	250	136	
7	Gopurajapuram	Monsoon	14	26	3	0	0	16	16	29	63	27	
		Non-Monsoon	64	57	40	3	9	37	50	18	50	61	
		Annual	78	82	43	3	9	53	66	47	113	89	
8	Hogenakkal	Monsoon	78	138	18	3	12	13	75	2	1	28	
		Non-Monsoon	63	18	12	0	8	2	92	2	0	15	

		Annual	140	157	30	3	19	16	167	4	1	42	
9	K.M.Vadi	Monsoon	315	294	168	98	62	221	524	359	665	216	
		Non-Monsoon	24	25	42	5	0	7	40	9	25	0	
		Annual	340	319	210	103	62	228	564	368	689	216	
10	Kodumudi	Monsoon	4499	6204	4161	1407	725	2601	6404	6186	7468	5575	
		Non-Monsoon	3349	3401	2656	1429	1150	2326	4912	3153	3704	3397	
		Annual	7848	9604	6817	2836	1875	4927	11316	9339	11172	8972	
11	Kollegal	Monsoon	4887	5175	3031	2351	1924	3294	6287	6272	7942	4757	
		Non-Monsoon	1777	1905	1616	1494	1088	1384	2597	1844	1992	1361	
		Annual	6663	7080	4648	3845	3012	4678	8884	8115	9934	6118	
12	Kudige	Monsoon	2334	2177	1801	1414	1226	1988	2984	2817	3687	1946	
		Non-Monsoon	225	259	227	194	165	203	382	200	245	155	
		Annual	2560	2435	2028	1608	1392	2191	3367	3017	3932	2100	
13	Kudlur	Monsoon	27	22	8	0	2	2	18	4	11	23	
		Non-Monsoon	66	26	7	7	0	6	63	26	34	11	
		Annual	93	48	14	8	2	8	81	30	45	33	
14	M.H.Halli	Monsoon	560	845	318	143	158	244	590	600	659	747	
		Non-Monsoon	401	275	259	142	93	197	257	86	340	229	
		Annual	961	1120	577	285	251	441	846	685	999	976	

Contd/…

Table 5 : Flow of Water by season site and river basin

VII Basin : Cauvery Unit : M.C.M.

S.No.	Site Name	Season	1999-2000	2000-2001	2001-2002	2002-2003	2003-2004	2004-2005	2005-2006	2006-2007	2007-2008	2008-2009	2009-2010
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
15	Menangudi	Monsoon	-	-	-	-	-	10	27	60	52	27	Data not given
		Non-Monsoon	-	-	-	-	-	15	23	11	39	32	
		Annual	-	-	-	-	-	25	50	71	91	59	
16	Musiri	Monsoon	4212	6532	3868	970	600	2618	6654	6443	7985	5210	4031
		Non-Monsoon	3327	3187	2030	1092	989	2242	5903	2567	4263	2269	430
		Annual	7539	9719	5898	2062	1590	4860	12558	9010	12248	7479	4461
17	Muthankera	Monsoon	2057	2063	1930	1475	1246	2370	2835	2613	3360	1627	<---------- Data not given --------->
		Non-Monsoon	158	324	229	158	222	161	359	350	304	207	
		Annual	2215	2387	2159	1633	1468	2531	3194	2963	3664	1834	
18	Nallamaranpatty	Monsoon	46	85	14	16	8	25	51	19	87	81	
		Non-Monsoon	278	55	19	16	6	137	924	30	373	146	
		Annual	324	140	33	32	14	162	975	48	460	228	
19	Nallathur	Monsoon	-	-	-	-	-	-	-	52	52	33	
		Non-Monsoon	-	-	-	-	-	-	-	28	62	114	
		Annual	-	-	-	-	-	-	-	80	115	146	
20	Nellithurai	Monsoon	762	510	501	149	63	649	1335	947	1606	699	
		Non-Monsoon	99	158	123	99	73	249	332	250	84	75	
		Annual	861	667	624	248	136	898	1667	1198	1690	774	
21	Peralam	Monsoon	12	15	6	1	1	5	10	18	17	14	
		Non-Monsoon	10	11	7	2	2	6	11	3	10	12	
		Annual	22	26	14	3	2	11	21	20	27	26	
22	Porakudi	Monsoon	32	41	14	0	0	36	31	48	70	32	
		Non-Monsoon	123	97	100	21	16	55	134	15	74	98	

		Annual	155	139	114	21	16	92	164	63	144	130	
23	Sakleshpur	Monsoon	-	-		571	393	771	1075	1574	1795	948	
		Non-Monsoon	-	-	2	63	66	39	175	135	223	117	
		Annual	-	-	2	634	459	810	1250	1708	2018	1064	
24	Savandpur	Monsoon	333	237	235	140	55	235	226	365	601	282	
		Non-Monsoon	320	316	184	202	285	218	422	596	357	334	
		Annual	654	554	419	342	339	454	648	960	958	616	
25	Sevnur	Monsoon	12	4	3	0	0	2	13	4	4	2	
		Non-Monsoon	10	6	4	0	0	3	7	5	4	6	
		Annual	22	10	7	0	0	5	20	9	8	9	
26	T. Bekkuppe	Monsoon	-	-	-	-	3	270	-	-	13	213	
		Non-Monsoon	-	-	-	-	12	37	-	-	79	136	
		Annual	-	-	-	-	14	307	-	-	93	350	
27	T.K.Halli	Monsoon	549	1104	454	93	156	443	798	226	413	528	
		Non-Monsoon	379	309	253	134	99	136	536	239	253	210	
		Annual	927	1412	707	228	255	579	1334	465	666	738	
28	T.Narasipur	Monsoon	1954	2216	1725	1397	1095	2017	2781	2696	3928	1672	
		Non-Monsoon	424	626	477	537	512	439	963	549	843	475	
		Annual	2378	2842	2202	1934	1607	2456	3743	3245	4771	2146	

Contd/…

Table 5 : Flow of Water by season site and river basin

VII Basin : Cauvery Unit : M.C.M.

S.No.	Site Name	Season	1999-2000	2000-2001	2001-2002	2002-2003	2003-2004	2004-2005	2005-2006	2006-2007	2007-2008	2008-2009	2009-2010
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
29	Thengudi	Monsoon	49	66	53	2	2	53	69	91	99	90	<---------- Data not given ---------->
		Non-Monsoon	106	102	120	24	24	65	127	60	118	139	
		Annual	155	168	174	26	27	118	196	151	216	229	
30	Thengumarahada	Monsoon	169	185	124	92	68	155	305	134	393	192	
		Non-Monsoon	115	155	115	75	74	108	190	125	172	117	
		Annual	284	340	239	167	142	263	495	259	565	310	
31	Thevur	Monsoon	5	6	9	0	0	1	15	5	5	0	
		Non-Monsoon	13	12	7	0	0	1	33	7	3	7	
		Annual	18	18	16	0	0	2	48	12	8	7	
32	Thimmanahalli	Monsoon	-	181	111	13	4	61	143	152	337	302	
		Non-Monsoon	-	27	27	15	3	20	59	40	73	50	
		Annual	-	209	138	28	6	81	202	193	411	351	
33	Thopper	Monsoon	1	9	1		0	0	0	0	1	0	
		Non-Monsoon	3	8	0	0	0	0	28	0	1	0	
		Annual	3	17	1	0	0	0	28	0	2	0	
34	Uccadai	Monsoon	3		1	1	0	-	-	-	-	-	
		Non-Monsoon	12	6	31	12	6	-	-	-	-	-	
		Annual	15	6	32	13	6	-	-	-	-	-	
35	Urachikottai	Monsoon	3901	6492	4112	1446	721	2354	6675	6544	5904	4467	
		Non-Monsoon	2425	2539	2694	1365	941	1701	3363	2124	2424	2263	
		Annual	6326	9031	6806	2811	1662	4055	10038	8668	8328	6730	

Source :River Data Directorate, Central Water Commission.

Table 5 : Flow of Water by season site and river basin

VIII Basin : East Flowing Rivers from Mahanadi to Kanyakumari Unit: M. C. M.

S.No.	Site Name	Season	1996-1997	1997-1998	1998-1999	1999-2000	2000-2001	2001-2002	2002-2003	2003-2004	2004-2005	2005-2006	2006-2007
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
1	ANAKAPALLI	Monsoon	1038	80	943	158	235	188	26	118	249	584	523
		Non-Monsoon	114	24	451	21	13	67	1	180	79	411	127
		Annual	1152	103	1394	180	248	255	27	297	328	995	650
2	GUNUPUR	Monsoon	1249	1071	1163	949	1042	1783	591	2542	1628	1796	4748
		Non-Monsoon	-	-	-	-	115	274	90	556	279	584	438
		Annual	1249	1071	1163	949	1156	2058	681	3099	1907	2380	5186
3	KASHINAGAR	Monsoon	1092	1268	1332	1197	1025	1876	575	2910	2447	1829	5799
		Non-Monsoon	199	364	479	287	118	281	53	572	301	821	623
		Annual	1291	1632	1811	1484	1143	2158	629	3482	2749	2650	6422
4	PURUSHOTTAMPUR	Monsoon	1066	1371	1742	1291	957	2140	849	2851	1054	2283	2791
		Non-Monsoon	33	235	944	268	24	276	29	487	44	465	121
		Annual	1099	1606	2686	1559	980	2416	878	3338	1098	2748	2912
5	SRIKAKULAM	Monsoon	2275	1063	1662	1062	1267	1725	469	1862	1512	1398	4150
		Non-Monsoon	267	168	773	162	72	283	81	503	229	521	514
		Annual	2542	1231	2435	1224	1338	2008	550	2365	1741	1919	4665

Source :River Data Directorate, Central Water Commission.

Table 5 : Flow of Water by season site and river basin

IX **Basin : West Flowing Rivers from Kanyakumari to Tapi**

Unit: M. C. M.

S.No.	Site Name	Season	1998-1999	1999-2000	2000-2001	2001-2002	2002-2003	2003-2004	2004-2005	2005-2006	2006-2007	2007-2008	2008-2009
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
1	ADDOOR	Monsoon	-	-	-	-	-	1392	2166	2160	2514	2506	-
		Non-Monsoon	-	-	-	-	-	44	66	116	142	106	-
		Annual	-	-	-	-	-	1436	2232	2276	2655	2612	-
2	AMBARAMPALAYAM	Monsoon	115	181	115	131	105	81	151	150	99	194	123
		Non-Monsoon	384	182	182	155	159	121	228	247	197	217	142
		Annual	499	363	297	287	264	202	378	397	296	411	265
3	ARANGALY	Monsoon	2245	1762	1088	1185	1162	1022	1456	1870	1443	3038	1108
		Non-Monsoon	418	189	27	221	495	401	226	230	225	139	246
		Annual	2663	1951	1115	1406	1656	1423	1682	2099	1668	3178	1355
4	ASHRAMAM	Monsoon	-	-	-	-	-	0	69	108	86	82	110
		Non-Monsoon	-	-	-	-	-	10	54	120	63	78	57
		Annual	-	-	-	-	-	10	124	228	149	160	167
5	AVERSHE	Monsoon	-	-	-	-	-	1041	1054	1060	1221	1313	-
		Non-Monsoon	-	-	-	-	-	31	34	52	70	68	-
		Annual	-	-	-	-	-	1072	1089	1112	1291	1381	-
6	AYILAM	Monsoon	616	522	368	405	261	241	563	508	638	699	396
		Non-Monsoon	304	218	168	130	170	177	229	301	217	151	126
		Annual	921	740	535	535	431	418	792	808	855	850	521
7	BANTWAL	Monsoon	11710	10328	8875	8139	6056	7459	8534	11681	12914	13859	-
		Non-Monsoon	776	644	376	468	346	201	220	633	730	1093	-
		Annual	12486	10972	9250	8607	6402	7660	8754	12314	13644	14952	-
8	ERINJIPUZHA	Monsoon	2214	2111	1708	1974	1239	1754	1740	2079	2135	2806	1665
		Non-Monsoon	267	160	109	159	131	127	100	226	212	224	102

		Annual	2481	2271	1817	2133	1371	1881	1840	2305	2348	3031	1767
9	HALADI	Monsoon	1626	1609	1353	1164	944	1258	1310	1470	1787	1726	-
		Non-Monsoon	499	399	396	301	341	235	335	383	567	683	-
		Annual	2125	2008	1749	1465	1284	1493	1646	1853	2354	2410	-
11	KALAMPUR	Monsoon	1325	1138	910	1113	734	806	891	1309	1118	1337	764
		Non-Monsoon	252	100	35	138	106	71	40	187	160	82	31
		Annual	1578	1238	945	1252	840	877	930	1496	1278	1419	795
12	KALLOOPPARA	Monsoon	1751	1352	1186	1528	930	1189	1064	1595	1394	1823	1172
		Non-Monsoon	445	122	130	406	231	360	184	465	386	190	60
		Annual	2196	1474	1316	1934	1161	1549	1248	2059	1779	2013	1232
13	KARATHODU	Monsoon	1099	930	740	870	748	536	919	1152	1808	2461	818
		Non-Monsoon	96	589	66	131	110	36	44	252	188	177	75
		Annual	1195	1518	806	1001	859	573	964	1404	1996	2638	894
14	KIDANGOOR	Monsoon	1846	1634	1212	1311	963	1095	1015	1691	1364	1893	1383
		Non-Monsoon	465	118	122	370	243	342	145	462	306	281	119
		Annual	2310	1752	1334	1681	1206	1437	1159	2153	1671	2174	1502
15	KUMBIDI	Monsoon	4361	3310	2309	3386	2435	1766	3592	4808	5343	7551	2537
		Non-Monsoon	1088	304	336	840	329	378	309	767	738	853	297
		Annual	5449	3614	2645	4226	2764	2143	3901	5576	6080	8404	2833
16	KUNIYIL	Monsoon	4832	4332	2971	2917	1941	1719	3594	5011	4709	6735	3078
		Non-Monsoon	943	521	435	711	163	408	224	1150	402	260	112
		Annual	5775	4853	3406	3628	2104	2127	3817	6161	5111	6996	3189

Contd/…

Table 5 : Flow of Water by season site and river basin

IX Basin : West Flowing Rivers from Kanyakumari to Tapi Unit: M. C. M.

S.No.	Site Name	Season	1998-1999	1999-2000	2000-2001	2001-2002	2002-2003	2003-2004	2004-2005	2005-2006	2006-2007	2007-2008	2008-2009
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
17	KUTTYADI	Monsoon	-		810	844	714	645	896	1086	1150	1516	956
		Non-Monsoon	-	5	62	89	72	94	114	228	232	171	124
		Annual	-	5	872	933	786	738	1010	1314	1382	1687	1080
18	KUZHITHURAI	Monsoon	-	-	-	86	33	12	63	61	140	104	39
		Non-Monsoon	-	-	64	54	54	13	33	64	110	82	6
		Annual	-	-	64	140	87	25	96	125	250	187	44
19	MALAKKARA	Monsoon	3916	3245	2862	2892	1678	1927	2510	3615	3248	3741	2036
		Non-Monsoon	1379	484	596	703	291	514	920	1489	1005	794	199
		Annual	5296	3728	3458	3596	1969	2441	3430	5104	4253	4535	2234
20	MANKARA	Monsoon	1163	947	382	245	237	147	349	636	647	1451	381
		Non-Monsoon	495	98	54	81	53	31	58	227	161	200	57
		Annual	1658	1046	436	327	289	178	407	863	809	1651	438
21	NEELESWARAM	Monsoon	6839	4778	5124	5212	4158	3517	5307	6816	4783	7702	4193
		Non-Monsoon	1923	999	1139	1680	1161	1161	1319	2505	2240	2365	1409
		Annual	8762	5777	6263	6892	5320	4678	6626	9321	7023	10067	5602
22	PATTAZHY	Monsoon	1312	1196	947	810	483	344	593	618	554	689	311
		Non-Monsoon	742	515	427	494	505	424	384	521	383	306	232
		Annual	2054	1711	1374	1304	987	768	977	1138	938	995	543
23	PERUMANNU	Monsoon	3986	3800	2711	2858	2828	2396	3528	4389	4477	5373	2953
		Non-Monsoon	324	176	195	170	149	212	129	461	266	166	140
		Annual	4310	3976	2906	3028	2978	2608	3657	4850	4743	5539	3093
24	PUDUR	Monsoon	189	180	99	117	90	71	144	236	203	484	144
		Non-Monsoon	238	34	41	37	27	17	57	139	72	116	25
		Annual	427	214	141	155	117	88	201	375	275	600	169

													Contd.
25	PULAMANTHOLE	Monsoon	1876	1730	1155	1281	871	603	1297	1757	1887	2587	1146
		Non-Monsoon	321	161	156	342	171	175	148	369	289	207	106
		Annual	2196	1891	1311	1624	1043	778	1444	2126	2176	2794	1252
26	RAMAMANGALAM	Monsoon	4404	3722	2594	3447	2632	2639	2967	4091	3256	4278	2644
		Non-Monsoon	2300	1492	1301	1973	942	1218	1372	2028	1668	1934	947
		Annual	6703	5214	3895	5420	3575	3857	4339	6120	4924	6211	3591
27	SANTEGULI	Monsoon	5556	4939	5967	3510	2804	2460	2071	3836	4488	3387	-
		Non-Monsoon	342	182	164	130	209	182	148	136	142	130	-
		Annual	5898	5121	6130	3640	3013	2642	2219	3972	4630	3517	-
28	THUMPAMON	Monsoon	1201	1047	920	929	441	519	814	899	1026	1076	651
		Non-Monsoon	412	148	171	330	197	291	104	347	302	201	69
		Annual	1613	1196	1091	1259	638	810	918	1246	1328	1277	720
29	VANDIPERIYAR	Monsoon	-	-	175	139	84	95	167	297	161	218	98
		Non-Monsoon	-	-	5	18	16	27	18	38	108	47	9
		Annual	-	-	180	156	100	122	185	334	269	265	107
30	YENNEHOLE	Monsoon	1727	1598	1219	1568	985	1230	1268	1274	1404	1442	-
		Non-Monsoon	77	67	32	70	48	43	33	58	72	93	-
		Annual	1804	1665	1251	1638	1033	1273	1302	1332	1477	1535	-

Source :River Data Directorate, Central Water Commission.

Table 5 : Flow of Water by season site and river basin

X **Basin : Tapi** Unit : M.C.M.

Sl.No.	Site Name	Season	1999-2000	2000-2001	2001-2002	2002-2003	2003-2004	2004-2005	2005-06	2006-07	2007-08	2008-09	2009-10
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
1	Motinaroli	Monsoon	176	102	319	197	696	501	596	747	517	397	165
		Non-Monsoon	43	34	26	45	78	67	69	60	53	53	27
		Annual	220	136	345	242	774	568	665	807	570	450	192
2	Pingalwada	Monsoon	32	150	397	247	467	528	967	1211	564	453	86
		Non-Monsoon	15	6	19	21	20	28	42	28	82	73	30
		Annual	47	157	416	267	487	556	1009	1239	646	526	116
3	Ambica at Gadat	Monsoon	1510	671	1284	1063	1580	1596	3010	2126	1733	1794	704
		Non-Monsoon	142	17	5				0	0		0	0
		Annual	1652	688	1289	1063	1580	1596	3010	2126	1733	1794	704
4	Damanganga at Nanipalsan	Monsoon	627	797	858	668	783	1022	1719	2024	935	1309	647
		Non-Monsoon	41	43	39	5	26	9	15	16	12	11	11
		Annual	669	841	897	674	808	1031	1734	2040	947	1319	658
5	Purna at Mahuwa	Monsoon	729	370	856	1097	1661	1964	3347	2500	1696	1956	554
		Non-Monsoon	53	9	13	19	28	38	48	52	59	67	17
		Annual	781	379	870	1116	1689	2002	3395	2552	1755	2023	571
6	Vaitarna at Durvesh	Monsoon	2646	2316	2985	3159	4157	3910	5302	4996	4009	4295	1950
		Non-Monsoon	27	19	73	21	36	84	36	42	73	66	126
		Annual	2673	2334	3058	3180	4193	3994	5338	5038	4082	4360	2076
7	Wagh at Ozerkheda	Monsoon	899	454	580	841	1043	1550	1691	1424	893	1043	583
		Non-Monsoon	18	5	12	19	16	26	9	12	11	8	12
		Annual	917	459	592	859	1058	1576	1701	1436	904	1051	595

Source : Executive Engineer, Tapi Division, CWC, Surat.

Table 5 : Flow of Water by season site and river basin

XI Basin : Narmada Unit : M.C.M.

Sl No.	Site Name	Season	2000-01	2001-02	2002-03	2003-04	2004-05	2005-06	2006-07	2007-08	2008-09	2009-10	Remarks
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
1	**Orsang at Chandawada**	Monsoon	41.89	789.95	415.84	1496.21	2168.93	1288.98	2732.90	2142.94	807.07	323.05	-
		Non-Monsoon	0.00	0.00	0.00	10.53	0.00	0.00	4.37	33.16	131.72	0.00	-
		Annual	41.89	789.95	415.84	1506.73	2168.93	1288.98	2737.27	2176.10	938.79	323.05	-
2	**Narmad at Garudeswar**	Monsoon	9561.94	18972.48	17974.15	28357.70	15826.23	20239.11	26499.31	20342.02	3126.00	5403.22	-
		Non-Monsoon	1921.28	4308.83	2811.76	1302.38	1715.26	4894.73	5364.27	3660.27	1312.49	1341.65	-
		Annual	11483.23	23281.32	20785.92	29660.07	17541.49	25133.85	31863.59	24002.28	4438.49	6744.87	-
3	**Hathni at Jobat**	Monsoon	-	55.18	178.46	-	-	-	-	-	-	-	Discharge started w.e.from 09.08.2001 and closed on 01.04.2006 (NCA site)
		Non-Monsoon	-	0.00	0.00	-	-	-	-	-	-	-	
		Annual	-	55.18	178.46	-	-	-	-	-	-	-	
4	**Goi at Pati**	Monsoon	72.01	188.43	440.84	-	-	-	-	-	-	-	Discharge started w.e.from 09.08.2001 and closed on 01.04.2006 (NCA site)
		Non-Monsoon	0.00	1.30	7.37	-	-	-	-	-	-	-	
		Annual	72.01	189.72	448.20	-	-	-	-	-	-	-	
5	**Uri at Dhulsar**	Monsoon	9.13	31.97	85.91	-	-	-	-	-	-	-	Discharge started w.e.from 09.08.2001 and closed on 01.04.2006 (NCA site)
		Non-Monsoon	0.00	0.00	0.00	-	-	-	-	-	-	-	
		Annual	9.13	31.97	85.91	-	-	-	-	-	-	-	
													Contd.

6	**Narmada at Rajghat**	Monsoon	10800.94	17431.34	19927.40	31714.93	17103.05	24240.64	17150.49	-	-	-	Discharge started w.e.from 09.08.2001 and closed on 01.04.2006 (NCA site)
		Non-Monsoon	1762.46	3691.56	3350.26	17103.05	4420.14	9071.22	6900.42	-	-	-	
		Annual	12563.39	21122.91	23277.67	48817.99	21523.19	33311.87	24050.91	-	-	-	
7	**Narmada AT Mandleswar**	Monsoon	10584.46	18773.50	18601.32	31257.13	15839.91	26182.15	23975.54	15088.98	7177.79	12838.90	Discharge started w.e.from 09.08.2001 and closed on 01.04.2007 (NCA site)
		Non-Monsoon	2071.98	4149.91	3817.22	3867.40	3936.71	8057.97	9748.84	9664.74	9322.17	15226.87	
		Annual	12656.44	22923.41	22418.54	35124.53	19776.62	34240.12	33724.38	24753.72	16499.96	28065.77	
8	**Kundi at Kogaon**	Monsoon	385.15	169.97	1498.31	1240.85	748.05	112.41	1870.93	987.13	163.20	538.61	
		Non-Monsoon	0.00	0.00	3.73	23.22	8.02	0.00	9.94	6.37	0.00	86.99	
		Annual	385.15	169.97	1502.04	1264.07	756.07	112.41	1880.88	993.50	163.20	625.60	
9	**Chhota Tawa at Ginnore**	Monsoon	0.00	0.00	0.00	0.00	0.00	0.00	0.00	-	-	-	Site closed w.e from 1.4.1999
		Non-Monsoon	0.00	0.00	0.00	0.00	0.00	0.00	0.00	-	-	-	
		Annual	0.00	0.00	0.00	0.00	0.00	0.00	0.00	-	-	-	
10	**Narmada at Motakka**	Monsoon	9427.57	16164.18	16278.45	26984.53	15072.48	17582.44	21781.87	-	-	-	Discharge Started on 23.8.99 & Site closed w.e. from 1.4.199
		Non-Monsoon	2232.08	3786.52	3486.25	3389.53	5074.31	10570.69	10973.23	-	-	-	
		Annual	11659.66	19950.70	19764.71	30374.07	20146.79	28153.14	32755.10	-	-	-	

Contd/…

Table 5 : Flow of Water by season site and river basin

XI **Basin : Narmada** Unit : M.C.M.

Sl No.	Site Name	Season	2000-01	2001-02	2002-03	2003-04	2004-05	2005-06	2006-07	2007-08	2008-09	2009-10	Remarks
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
11	**Narmada at Handia**	Monsoon	9011.91	14219.42	15658.66	16041.37	14772.84	26195.79	21323.61	11947.56	9489.05	15616.17	-
		Non-Monsoon	2862.91	3870.68	4774.15	6265.77	3355.14	4837.71	3846.53	4240.75	5089.65	3375.56	-
		Annual	11874.81	18090.10	20432.81	22307.14	18127.98	31033.50	25170.13	16188.31	14578.70	18991.73	-
12	**Ganjal at Chhidgaon**	Monsoon	260.43	498.90	496.67	1470.93	561.70	615.19	1454.19	1468.47	309.31	795.89	-
		Non-Monsoon	15.01	15.69	17.30	46.40	20.20	26.38	34.20	31.73	7.62	65.86	-
		Annual	275.44	514.58	46.40	1517.33	581.90	641.57	1488.39	1500.21	316.93	861.74	-
13	**Narmada at Hoshangabad**	Monsoon	8806.14	13261.35	12701.14	16380.66	11228.54	25057.90	15938.99	8661.17	11246.00	11246.00	-
		Non-Monsoon	2119.41	3833.19	5182.42	5182.42	4002.57	3968.09	4208.63	3672.84	3899.66	2583.76	-
		Annual	10925.55	17094.54	17883.56	21563.08	15231.11	29025.99	20147.62	12334.01	15145.66	13829.75	-
14	**Tawa at Tawakati**	Monsoon	-	459.29	418.77	-	-	-	-	-	-	-	Discharge started w.e.from 10.05.2001 & closed on 01.04.06 (NCA site)
		Non-Monsoon	-	24.80	23.07	-	-	-	-	-	-	-	
		Annual	-	484.09	441.84	-	-	-	-	-	-	-	
													Contd.

15	**Machna at Shapur**	Monsoon	38.69	80.22	297.48	-	-	-	-	-	-	-	Discharge started w.e.from 10.05.2000 and closed on 01.04.06 (NCA site)
		Non-Monsoon	0.50	2.65	3.95	-	-	-	-	-	-	-	
		Annual	39.19	82.87	301.44	-	-	-	-	-	-	-	
16	**Narmada at Sandia**	Monsoon	7120.62	11052.73	8614.98	18051.98	8911.81	19736.52	10027.93	5779.12	6503.33	9363.06	-
		Non-Monsoon	1643.27	3253.68	2907.12	4368.12	3346.27	4136.05	3836.68	3352.86	3207.19	1908.91	-
		Annual	8763.89	2907.12	11522.10	22420.10	12258.09	23872.58	13864.61	9131.98	9710.51	11271.97	-
17	**Shakkar at Gadarwara**	Monsoon	675.51	477.63	955.43	1460.07	566.87	1458.00	2215.76	1572.70	746.11	2057.87	-
		Non-Monsoon	36.90	38.85	51.51	61.04	29.99	49.64	62.42	19.46	35.50	93.72	-
		Annual	712.40	516.48	61.04	1521.12	596.86	1507.64	2278.17	1592.15	781.61	2151.60	-
18	**Narmada at Barmanghat**	Monsoon	5600.62	9834.93	5944.82	13912.82	7756.30	16753.73	6092.21	3340.83	5608.31	4004.56	-
		Non-Monsoon	1426.42	2591.85	2874.38	3794.69	2987.59	3818.02	3000.24	2730.26	2795.08	1713.23	-
		Annual	7027.04	12426.78	8819.20	17707.51	10743.89	20571.74	9092.45	6071.09	8403.39	5717.79	-
19	**Sher at Belkheri**	Monsoon	385.69	794.36	705.44	838.77	398.91	693.88	1135.42	428.05	296.37	469.71	
		Non-Monsoon	10.28	14.01	14.05	15.86	12.60	17.52	15.29	8.39	5.60	23.18	
		Annual	395.97	808.37	719.49	854.63	411.51	711.40	1150.71	436.44	301.98	492.89	

Contd/…

Table 5 : Flow of Water by season site and river basin

XI **Basin : Narmada** Unit : M.C.M.

Sl No.	Site Name	Season	2000-01	2001-02	2002-03	2003-04	2004-05	2005-06	2006-07	2007-08	2008-09	2009-10	Remarks
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
20	**Hiran at Patan**	Monsoon	778.39	1401.69	1583.10	2740.52	912.64	2804.98	483.85	530.96	1496.54	726.39	
		Non-Monsoon	31.53	99.75	137.64	172.37	165.76	150.75	140.88	43.39	68.81	111.27	
		Annual	809.92	1501.44	1720.74	2912.89	1078.40	2955.74	624.72	574.35	1565.36	837.66	
21	**Banjar at Bamni**	Monsoon	51.65	922.04	584.15	1360.08	700.16	1342.18	670.00	545.82	483.95	246.85	-
		Non-Monsoon	8.42	18.93	13.60	39.16	16.81	89.38	27.60	21.84	8.33	23.35	-
		Annual	60.07	940.97	597.75	1399.24	716.97	1431.55	697.60	567.66	492.28	270.20	-
22	**Narmada at Jamtara**	Monsoon	4084.40	-	-	-	-	-	-	-	-	-	Closed on 1.4.2001
		Non-Monsoon	1292.78	-	-	-	-	-	-	-	-	-	
		Annual	5377.19	-	-	-	-	-	-	-	-	-	
23	**Banjar at Hridyanagar**	Monsoon	700.90	1397.09	-	-	-	-	-	-	-	-	-
		Non-Monsoon	11.94	24.05	-	-	-	-	-	-	-	-	-
		Annual	712.83	1421.15	-	-	-	-	-	-	-	-	-
24	**Burhner at Mohgaon**	Monsoon	1523.23	2661.74	1186.51	3324.24	2306.62	3509.57	2171.06	1432.98	1236.25	570.60	-
		Non-Monsoon	49.39	80.62	58.21	332.06	79.36	100.52	74.73	68.61	56.49	67.19	-
		Annual	1572.63	2742.36	1244.72	3656.30	2385.98	3610.09	2245.78	1501.59	1292.74	637.79	-
25	**Narmada at Amgaon**	Monsoon	-	550.77	2478.23	-	-	-	-	-	-	-	Discharge started w.e.from 07.09.2001 and closed on 01.04.06 (NCA site)
		Non-Monsoon	-	153.29	202.37	-	-	-	-	-	-	-	
		Annual	-	704.06	2680.60	-	-	-	-	-	-	-	
26	**Narmada at Manot**	Monsoon	1859.61	3593.68	1856.81	4153.63	3186.01	4629.36	2668.00	1297.93	2091.82	1108.96	-
		Non-Monsoon	97.36	115.77	85.64	195.75	180.14	139.99	159.07	97.06	82.64	114.07	-
		Annual	1956.97	3709.45	1942.44	4349.38	3366.15	4769.36	2827.07	1394.99	2174.46	1223.03	-
27	**Narmada at Dindori**	Monsoon	584.32	1181.83	700.23	1940.37	7386.95	1577.23	1138.10	560.40	765.75	500.38	-
		Non-Monsoon	69.75	108.28	99.58	149.56	116.90	112.88	97.54	71.64	112.35	87.35	-
		Annual	654.07	1290.11	799.81	2089.93	7503.85	1690.11	1235.63	632.04	878.11	587.73	-

Source : Executive Engineer, Tapi Division, CWC, Surat.

Table 5 : Flow of Water by season site and river basin

XII **Basin : Mahi and Sabarmati** Unit : M.C.M.

Sl.No.	Site Name	Season	1999-2000	2000-2001	2001-2002	2002-2003	2003-2004	2004-2005	2005-2006	2006-2007	**2007-2008**	**2008-2009**	**2009-2010**
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
1	**Anas at Chakaliya**	Monsoon	112	48	313	780	1694	2401	1125	4864	1884	525	400
		Non-Monsoon	13	0	0	0	9	5	0	25	44	6	1
		Annual	125	48	313	780	1703	2406	1125	4889	1927	531	401
2	**Balram at Chitrasani**	Monsoon	0	0	6	0	12	1	6	102	47	4	5
		Non-Monsoon	0	0	0	0	0	0	0	1	0	0	0
		Annual	0	0	6	0	12	1	6	103	47	4	5
3	**Banas at Abu Road**	Monsoon	4	4	26	1	63	9	52	492	188	10	14
		Non-Monsoon	0	0	0	0	0	0	0	3	1	0	0
		Annual	4	4	26	1	63	9	52	496	190	10	14
4	**Banas at Kamalpur**	Monsoon	0	4	4	0	112	34	11	551	214	18	22
		Non-Monsoon	0	0	0	0	0	5	0	0	0	0	21
		Annual	0	4	4	0	112	39	11	551	214	18	43
5	**Banas at Sarotry**	Monsoon	19	6	27	4	114	16	112	710	324	16	6
		Non-Monsoon	0	0	0	0	0	0	0	9	1	0	0
		Annual	19	6	27	4	114	16	112	720	325	16	6
6	**Bhadar at Ganod**	Monsoon	8	3	74	80	138	79	251	795	2032	788	200
		Non-Monsoon	0	0	0	0	0	0	0	0	20	12	1
		Annual	8	3	74	80	138	79	252	795	2052	800	201
7	**Jakham at Dhariwad**	Monsoon	28	33	20	23	18	315	106	1124	94	126	95
		Non-Monsoon	17	0	24	0	14	21	18	21	26	24	10
		Annual	45	33	44	23	32	336	124	1144	120	150	106
8	**Luni at Baltora**	Monsoon	65	0	0	0	0	0	0	98	179	0	0
		Non-Monsoon	0	0	0	0	0	0	0	0	0	0	0
		Annual	65	0	0	0	0	0	0	98	179	0	0

Contd.

9	**Luni at Gandhav**	Monsoon	17	2	203	0	8	0	0	0	227	0	0
		Non-Monsoon	0	0	0	0	0	0	0	0	0	0	0
		Annual	17	2	203	0	8	0	0	0	227	0	0
10	**Machhu at Gungan**	Monsoon	1	8	7	6	13	16	431	112	613	284	7
		Non-Monsoon	0	0	0	0	0	0	0	0		4	0
		Annual	1	8	7	6	13	16	431	112	613	289	7
11	**Mahi at Khanpur**	Monsoon	409	326	344	653	2412	6209	2206	21276	6290	505	367
		Non-Monsoon	145	102	135	115	1141	681	572	604	447	363	186
		Annual	554	428	479	768	3553	6890	2779	21880	6737	868	553
12	**Mahi at Mataji**	Monsoon	256	137	161	220	1550	1046	1016	4035	2136	274	1055
		Non-Monsoon	2	0	0	0	13	9	3	20	24	4	12
		Annual	258	137	161	220	1563	1055	1019	4055	2160	278	1067

Contd/…

Table 5 : Flow of Water by season site and river basin

XII Basin : Mahi and Sabarmati Unit : M.C.M.

Sl.No.	Site Name	Season	1999-2000	2000-2001	2001-2002	2002-2003	2003-2004	2004-2005	2005-2006	2006-2007	**2007-2008**	**2008-2009**	**2009-2010**
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
13	**Mahi at Paderdibadi**	Monsoon	266	99	241	264	591	1706	831	10821	1514	297	454
		Non-Monsoon	55	0	63	109	71	130	100	126	87	17	98
		Annual	321	99	304	373	662	1837	930	10946	1600	314	552
14	**Rupen at Sapawada**	Monsoon	1	4	17	0	32	28	230	223	200	70	5
		Non-Monsoon	0	0	0	0	0	1	0	0	0	0	14
		Annual	1	4	17	0	32	29	230	223	200	70	19
15	**Sabarmati at Derol Bridge**	Monsoon	23	0	8	2	13	9	152	2861	692	26	14
		Non-Monsoon	0	0	7	0	0	0	6	4	0	0	0
		Annual	23	0	15	2	13	9	157	2864	693	26	14
													Contd.

16	**Sabarmati at Kheroj**	Monsoon	29	42	136	50	206	44	460	1115	498	128	121
		Non-Monsoon	0	0	0	0	1	0	8	7	6	0	0
		Annual	29	42	136	50	207	44	468	1122	504	128	121
17	**Sabarmati at Vautha**	Monsoon	68	80	177	137	3474	1819	3697	5909	4651	816	569
		Non-Monsoon	0	0	10	102	393	669	447	630	948	475	345
		Annual	68	80	187	239	3868	2488	4144	6539	5599	1291	914
18	**Shetrunji at Lowara**	Monsoon	21	2	105	414	132	194	1054	629	1266	1055	177
		Non-Monsoon	0	0	0	0	0	0	1	0	4	7	0
		Annual	21	2	105	414	132	194	1055	629	1269	1061	177
19	**Som at Rangeli**	Monsoon	149	51	86	92	103	412	485	3096	216	210	332
		Non-Monsoon	34	0	31	1	20	74	32	49	48	19	37
		Annual	183	51	117	93	123	486	517	3146	264	229	370
20	**Wakal at Kotra (Jotsan)**	Monsoon	48	16	45	20	101	39	370	1062	329	104	62
		Non-Monsoon	0	0	0	0	1	0	0	19	6	0	0
		Annual	48	16	45	20	102	39	370	1081	334	104	62
21	**Watrak at Gadvel (Ratanpur)**	Monsoon	44	35	5	24	493	502	334	1710	527	51	44
		Non-Monsoon	0	0	0	0	12	60	45	21	14	1	0
		Annual	44	35	5	24	505	561	379	1731	542	52	44
22	**Watrak at Kheda**	Monsoon	38	21	0	0	351	318	868	2511	895	89	63
		Non-Monsoon	0	0	0	0	0	8	4	87	23	0	0
		Annual	38	21	0	0	351	326	872	2598	918	89	63

Source: Executive Engineer, Mahi Division, CWC, Gandhi Nagar.

Table 6 : Maximum and minimum observed water levels and discharges by site and river basin

I Basin: Mahanadi Unit: M. C. M.

Sl. No.	Site Name	Maximum Water Level			Minimum Water Level			Maximum Observed Discharge		Minimum Observed Discharge		Period of Record
		Water Level (m)	Date	Discharge (Cumecs)	Water Level (m)	Date	Discharge (Cumecs)	Date	Discharge (Cumecs)	Date	Discharge (Cumecs)	
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
1	Andhiarkhore	258.93	8/9/1979	694.64	0.00	9/18/1977		9/13/1998	851.98	6/16/2006	0.00	01/09/1977 - 31/12/2008
2	Bamnidhi	228.88	8/22/1975	9583.00	224.30	6/8/1978	1.85	8/22/1975	9583.00	2/16/1971	0.00	01/02/1971 - 31/12/2008
3	Baronda	289.33	9/18/1980	6169.88	283.00	4/30/2004	0.00	8/7/2007	6593.80	4/17/1993	0.00	01/12/1977 - 31/12/2008
4	Basantpur	219.32	9/20/1980	22500.00	194.00	5/7/1971	0.00	8/30/2003	33087.95	5/4/1971	0.00	01/05/1971 - 31/12/2008
5	Ghatora	253.50	7/21/1994	2281.00	246.00	6/14/2003	0.00	7/21/1994	2281.00	5/7/2006	0.00	01/09/1979 - 31/12/2008
6	Jondhra	230.57	7/14/1994	8533.00	0.00	1/27/1972		9/20/1980	11033.30	6/3/2001	0.00	01/01/1972 - 31/12/2008
7	Kantamal	132.70	9/19/2008	20000.00	101.00	8/1/1971	0.00	9/19/2008	20000.00	4/27/1989	0.00	01/07/1971 - 31/12/2008
8	Keloatraigarh	229.32	8/15/2008	2013.74	223.00	10/23/2001	0.00	8/15/2008	2013.74	6/6/2001	0.00	01/06/1995 - 15/10/2008
9	Kesinga	178.50	7/4/2006	21192.00	0.00	5/27/1975		7/4/2006	21192.00	6/9/1997	0.00	01/05/1975 - 31/12/2008
10	Kotni	279.61	7/12/1994	5269.00	268.00	6/4/1990	0.00	7/12/1994	5269.00	5/2/1994	0.00	01/09/1978 - 31/12/2008
11	Kurbhata	220.28	7/18/1995	1187.00	215.00	5/8/1999	0.00	8/8/1999	2160.00	4/4/2000	0.00	01/04/1978 - 31/12/2008
12	Manendragarh	420.44	7/12/1990	2088.00	411.00	6/14/1996	0.00	7/12/1990	2088.00	3/24/1994	0.00	01/06/1989 - 31/12/2008
13	Pandigaon	190.65	7/28/1992	4217.00	0.00	6/12/2002		7/28/1992	4217.00	6/13/1997	0.00	01/06/1989 - 30/06/2002
14	Parmanpur	215.00	7/17/2001	10000.00	199.00	6/10/2002		7/17/2001	10000.00	6/15/2007	0.00	01/07/2001 - 15/10/2008
15	Pathardih	279.63	7/1/2007	908.99	271.00	5/26/2003	0.00	9/14/2005	2000.00	2/8/2001	0.00	01/01/1989 - 31/12/2008
16	Rajim	282.75	8/29/2003	8448.90	275.00	5/20/2003	0.00	7/21/1976	9954.13	5/6/2001	0.00	01/02/1971 - 31/12/2008
17	Rampur	229.66	8/29/2003	10958.38	219.00	4/21/1979	0.00	8/29/2003	10958.38	5/15/1981	0.00	01/02/1971 - 31/12/2008
18	Salebhata	152.99	12/9/1998	4.17	130.00	6/8/1975	0.00	8/30/1982	14508.44	6/19/1997	0.00	01/11/1971 - 31/12/2008
19	Seorinarayan	224.31	8/30/2003	22800.00	211.50	11/19/1985		8/30/2003	22800.00	5/29/2003	0.00	01/07/1985 - 31/12/2008
20	Simga	257.59	7/13/1994	11703.00	244.00	6/18/2003	0.00	7/13/1994	11703.00	5/31/2001	0.00	01/09/1971 - 31/12/2008
21	Sukma	157.20	8/20/1992	1935.69	150.00	6/18/1997	0.00	7/23/1995	2315.00	1/6/1998	0.00	01/06/1989 - 31/07/2006
22	Sundergarh	222.60	6/23/1996	6341.00	0.00	5/9/1976		9/11/1998	10404.00	6/7/1996	0.00	01/04/1976 - 31/12/2008
23	Tikapara	73.83	9/19/2008	22150.00	53.33	5/23/1973	121.00	9/21/1980	33800.00	12/22/1988	22.74	28/05/1972 - 31/12/2008

Source :River Data Directorate, Central Water Commission.

Table 6 : Maximum and minimum observed water levels and discharges by site and river basin

II Basin : Subarnarekha, Burhabalang & Baitarni Unit: M. C. M.

Sl. No.	Site Name	Maximum Water Level			Minimum Water Level			Maximum Observed Discharge		Minimum Observed Discharge		Period of Record
		Water Level (m)	Date	Discharge (Cumecs)	Water Level (m)	Date	Discharge (Cumecs)	Date	Discharge (Cumecs)	Date	Discharge (Cumecs)	
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
1	ADITYAPUR	137.90	9/3/1973		123.25	3/3/1973	1.90	8/6/1997	6700.00	11/11/1972	0.00	22/11/1971 - 24/12/2007
2	FENKOGHAT	50.00	7/6/2007	650.40	41.30	6/17/2005	1.02	6/28/1997	1487.95	6/20/1996	0.42	18/06/1988 - 20/10/2007
3	GHATSHILA	85.05	8/17/1974	9579.59	45.14	4/10/1971	2.80	8/6/1997	10582.00	5/11/1986	0.50	16/03/1971 - 31/12/2007
4	GOVINDPUR	8.90	10/31/1999	1725.40	0.96	3/30/2006	2.26	8/20/2007	2815.47	1/31/1997	0.06	07/03/1992 - 31/12/2007
5	JAMSHEDPUR	126.26	9/3/1973	7673.89	113.72	4/6/1976	1.30	8/23/2006	12424.86	6/2/1972	0.00	01/02/1972 - 31/12/2007
6	JAMSHOLAGHAT	51.66	8/22/2004	3369.34	43.66	5/7/2006	7.62	9/26/2007	4500.00	6/15/2005	0.00	17/06/2004 - 08/11/2007
7	MURI	237.50	9/24/2006	428.20	233.46	4/17/2007	0.02	9/7/1991	431.30	4/10/2007	0.00	01/11/1989 - 31/12/2007

Source :River Data Directorate, Central Water Commission.

Table 6 : Maximum and minimum observed water levels and discharges by site and river basin

III Basin : Brahmani Unit: M. C. M.

Sl. No.	Site Name	Maximum Water Level			Minimum Water Level			Maximum Observed Discharge		Minimum Observed Discharge		Period of Record
		Water Level (m)	Date	Discharge (Cumecs)	Water Level (m)	Date	Discharge (Cumecs)	Date	Discharge (Cumecs)	Date	Discharge (Cumecs)	
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
1	ALTUMA	50.14	7/22/1991	750.60	45.92	6/3/2008	0.79	8/15/1993	791.20	6/25/2005	0.16	25/07/1990 - 31/12/2008
2	ANANDPUR	40.63	8/19/1975	10393.90	32.13	5/14/1980	1.22	8/19/1975	10393.90	5/11/1989	0.50	07/03/1972 - 31/05/2007
3	BOLANI	178.00	1/21/1989	16.00	162.24	6/19/1976	6.40	8/17/1974	13566.80	6/10/1972	4.40	01/03/1972 - 20/06/1996
4	CHAMPUA	376.35	8/13/1991	1010.24	366.65	5/13/1991	3.77	8/13/1991	1010.24	5/15/1993	1.33	20/07/1990 - 31/05/2007
5	GOMLAI	147.27	8/20/2007	10794.57	138.30	5/10/2002	9.08	8/20/2007	10794.57	12/1/2000	0.00	21/01/1979 - 31/12/2008
6	JARAIKELA	194.01	8/6/1997	12539.00	185.31	11/22/1972	25.20	8/6/1997	12539.00	5/10/1980	0.41	01/08/1972 - 31/12/2008
7	JENAPUR	23.48	8/18/1984	9701.79	15.92	5/10/1980	3.88	7/31/2005	10313.65	5/10/1980	3.88	27/07/1979 - 31/12/2008
8	PANPOSH	180.28	7/26/1996	11011.00	170.99	4/18/2006	8.01	7/22/2001	11628.00	4/18/2006	8.01	21/06/1996 - 31/12/2008
9	TALCHER	60.88	9/18/1994	8386.00	53.51	5/25/1994	23.70	9/18/1994	8386.00	3/14/1993	12.80	16/08/1985 - 25/06/1996
10	TILGA	379.27	8/28/1987	2830.30	373.30	5/28/1980	0.00	8/28/1987	2830.30	6/10/1997	0.00	15/06/1979 - 31/12/2008

Source :River Data Directorate, Central Water Commission.

Table 6 : Maximum and minimum observed water levels and discharges by site and river basin

IV Basin : Rushikulya, Vamsadhara, Sarada & Nagavali Unit: M. C. M.

Sl. No.	Site Name	Maximum Water Level			Minimum Water Level			Maximum Observed Discharge		Minimum Observed Discharge		Period of Record
		Water Level (m)	Date	Discharge (Cumecs)	Water Level (m)	Date	Discharge (Cumecs)	Date	Discharge (Cumecs)	Date	Discharge (Cumecs)	
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
1	**Purushottampur**	18.970	04.11.1990	4243	12.000	25.05.1995	0.000	08.10.2003	2279.0	10.05.1993	0.000	1978 to 2007
2	**Gunupur**	87.670	17.09.1980	-	79.570	15.02.1990	1.420	29.07.1991	5255	08.06.2003	0.000	1978 to 2007
3	**Kashi Nagar**	58.935	18.09.1980	16790	50.790	17.04.1981	3.400	23.09.1972	6589	02.08.2003	0.000	1971 to 2007
4	**Srikakulam**	14.530	12.05.1990	7669	7.450	20.08.2004	3.500	04.08.2005	5625	31.03.1994	0.000	1988 to 2007
5	**Ankapali**	28.450	10.05.1990	5364	19.600	08.05.2000	0.000	15.10.2005	572.7	14.03.2001	0.000	1967 to 2007

Source : The Superintending Engineer, Wainganga Division, Central Water Commission

Table 6 : Maximum and minimum observed water levels and discharges by site and river basin

V Basin : Godavari Unit: M. C. M.

Sl. No.	Site Name	Maximum Water Level			Minimum Water Level			Maximum observed		Minimum observed		Period of record
		Water Level (m)	Date	Discharge (cumec)	Water Level (m)	Date	Discharge (cumec)	Date	Discharge (cumec)	Date	Discharge (cumec)	
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
1	Ambabal	542.550	7/5/2006	1292	534.000	6/2/2008	0	8/4/2006	1039	Many days dry bed		12/88 to 5/10
2	Betmogra	357.910	9/21/2005	1789	Many days dry bed			10/2/2001	1129	Many days dry bed		6/97 to 5/10
3	Bhadrachalam	48.590	8/10/2007	43815	33.170	6/5/2008	22.5	8/10/2007	42755	5/28/2009	10.3	6/07 to 5/10
4	Cherribeda	575.630	7/3/2006	3791	Many days dry bed			9/13/2005	579.8	Many days dry bed		03/96 to 5/10
5	Chindnar	340.200	7/5/2006	13617	327.532	5/26/1975	5.63	7/24/1995	12223	12/4/2003	0	6/71 to 5/10
6	Degloor	364.600	8/21/2003	3027	Many days dry bed			8/24/2000	2732	Many days dry bed		8/84 to 5/10
7	Dhalegaon	400.005	8/13/2006	7652	Many days dry bed			7/25/1989	6732	Many days dry bed		01/64 to 5/10
8	G.R.Bridge	378.600	8/14/2006	6500	Many days dry bed			8/25/2000	4764	Many days dry bed		6/76 to 5/10
9	Gandlapet	318.500	8/30/1990	2067	Many days dry bed			8/30/1990	1656	Many days dry bed		7/86 to 5/10
10	Jagdalpur	544.686	7/9/1973	2532	532.627	7/12/1965	10.86	7/22/1976	2499	6/13/1995	0.133	8/64 to 5/10
11	Konta	50.130	8/16/1986	14350*	30.700	5/15/1967	23.81	10/4/1968	10414	3/28/1973	17.64	02/64 to 5/10
12	Kosagumda	556.500	8/20/2001	1462	547.650	6/9/2007	0.081	7/28/2004	498.9	Many days dry bed		11/96 to 5/10
13	Mancherial	138.616	10/20/1995	38790	124.586	6/21/2005	0	7/25/1989	24900	Many days dry bed		03/64 to 5/10
14	Murthahandi	545.190	8/14/1986	1624	534.110	3/14/2003	1.152	7/29/1992	1554	3/13/2003	1.166	02/79 to 5/10
15	Nowrangpur	561.456	9/4/1966	2333	549.840	5/1/1999	0	7/7/1973	2610	Many days dry bed		6/65 to 5/10
16	Pachegaon	481.810	10/12/1990	1429	Many days dry bed			8/7/2006	1441	Many days dry bed		12/78 to 5/10
17	Pathagudem	103.610	8/23/1990	32455	86.080	6/12/2003	0	7/21/1976	24862	6/8/2003	0	7/64 to 5/10
18	Perur	87.420	8/15/1986	62889	68.490	6/10/1966	15.89	8/14/1986	54144	6/21/2005	3.388	03/64 to 5/10
19	Polavaram	28.017	8/16/1986	87250	12.077	5/14/1973	65.07	8/10/2007	47249	5/30/1966	25	6/66 to 5/10
20	Potteru	132.030	8/4/2006	3360	121.480	6/2/1997	0.013	8/28/1997	542.8	Many days dry bed		03/89 to 5/10
21	Purna	372.720	7/27/2005	12288	Many days dry bed			7/24/1989	6133	Many days dry bed		6/68 to 5/10
22	Saigaon	556.008	9/6/1969	4308	Many days dry bed			10/7/1983	3395	Many days dry bed		8/64 to 5/10
23	Sangam	58.550	9/20/2005	1101	Many days dry bed			7/24/2004	410.8	Many days dry bed		6/96 to 5/10
24	Saradaput	239.650	8/4/2006	6595	224.647	5/23/1975	6.2	8/14/1986	7052	6/9/1977	5.133	01/68 to 5/10
25	Somanpally	128.600	7/24/1989	4935	Many days dry bed			7/21/1976	3457	Many days dry bed		7/64 to 5/10
26	Sonarpal	542.740	7/4/2006	1417	534.100	4/7/2002	0	9/21/2006	729.3	Many days dry bed		7/89 to 5/10
27	Tumnar	326.837	9/4/1994	1713	Many days dry bed			8/21/2001	1179	Many days dry bed		03/89 to 5/10
28	Yelli	354.300	8/7/2006	12535	Many days dry bed			8/13/1983	9815	Many days dry bed		6/76 to 5/10
29	Zari	387.385	7/26/2005	3150	Many days dry bed			9/3/1992	1474	Many days dry bed		7/86 to 5/10

Source : SE, Godavari Circle, Central Water Commission.

Table 6 : Maximum and minimum observed water levels and discharges by site and river basin

VI Basin : Krishna Unit: M. C. M.

SL. No.	Site Name	Maximum Water Level			Minimum Water Level			Maximum Observed Discharge		Minimum Observed Discharge		Period of record
		Water Level (m)	Date	Discharge (Cumecs)	Water Level (m)	Date	Discharge (Cumecs)	Date	Discharge (Cumecs)	Date	Discharge (Cumecs)	
1	2	3	4	5	6	7	8	9	10	11	12	13
1	**Arjunwad (Seasonal)**	543.685	8/5/2005	5271.52	522.450	1/16/1969	540.795	8/20/1990	0.000	525.79	1/4/1985	1/1969 to 11/2010
2	**Bastawade**	546.860	6/28/1983	1489.045	535.150	2/18/1987	544.560	7/30/1982	0.000	535.150	2/18/1987	6/1979 to 5/2007
3	**Bawapuram**	285.225	10/2/2009	36303.25	270.255	3/16/2004	277.745	10/1/2009	0.000		28/04/2004	6/1965 to 5/2010
4	**Boriomerga**	434.950	9/15/1983	887.4753	427.640	1/19/2001	434.100	9/6/1998	0.000		4/30/1991	7/1979 to 5/2006
5	**Chincholi**	532.800	7/17/1989	2190.664	526.010	4/3/1989	530.500	9/15/1983	0.000	526.650	2/17/1989	8/1979 to 4/2006
6	**Cholachguda (Seasonal)**	535.650	9/18/2007	2747.302	522.890	8/25/2004	531.637	6/29/1991	0.000	523.53	4/29/1996	6/1982 to 11/2010
7	**Daddi**	681.003	6/28/1983	3165.741	674.153	12/2/1999	679.603	7/24/1989	0.000		1/14/1991	12/1978 to 5/2007
8	**Dameracherla**	62.500	10/5/2009	4299.748	54.500	9/2/2002	61.065	10/6/1983	0.000		6/30/2004	6/1968 to 5/2010
9	**Dhond**	508.800	8/24/1997	8066.801	496.000	7/24/2000	508.100	7/15/1994	0.000	497.360	3/23/1994	12/1967 to 5/2007
10	**Gokak Falls (Seasonal)**	546.884	9/23/2005	2266.452	538.120	4/3/2004	545.364	8/10/1979	0.000	539.114	4/29/1998	7/1971 to 11/2010
11	**Gotur**	626.470	6/28/1983	1230.165	615.870	1/31/2003	625.390	7/25/1989	0.000		3/25/1990	6/1980 to 5/2007
12	**Halia**	133.305	9/23/1991	5821.407	127.900	7/7/2006	131.915	10/6/1994	0.000	128.000	5/19/2004	6/1984 to 5/2010
13	**Huvinhedigi**	358.420	10/2/2009	15095.15	345.190	5/11/1979	357.840	10/2/2009	0.100	342.343	05/05/1981	2/1976 to 5/2010
14	**Jewangi**	426.960	8/15/1990	1653.56	421.480	2/20/2004	426.615	8/1/1984	0.000		4/8/1994	11/1978 to 5/2006
15	**K Agraharam**	285.300	10/2/2009		270.660	5/29/1993	282.280	8/9/2005	0.000	271.180	6/5/1998	6/1981 to 5/2010
16	**Karad**	567.162	6/7/1976	8736.187	549.775	3/20/2005	564.815	03/08/2005	0.000	549.892	5/3/1999	6/1965 to 5/2010
17	**Keesara**	35.810	7/24/1989	14128.18	28.026	4/15/1971	33.000	8/15/1978	0.000		5/21/1973	6/1965 to 5/2010
18	**Kokangaon**	458.350	9/27/1979	1164.271	452.000	6/25/2007	456.420	9/22/1981	0.000		3/25/1992	7/1979 to 10/2006
19	**Koyna**	582.750	7/29/2006	4024.48	569.830	6/15/1979	581.500	8/2/2005	0.000	570.140	1/29/1999	10/1972 to 5/2007
20	**Kurundwad**	539.760	8/5/2005	9797.981	519.705	2/8/1973	537.715	7/29/2005	0.000	523.555	17/12/1988	5/1972 to 5/2010
21	**Lakshmipuram**	290.360	10/2/1996	2797.688	285.650	10/14/2004	289.185	10/2/1996	0.000		7/25/1993	9/1984 to 5/2006
22	**Madhira**	52.010	9/20/2005	3048.408	44.440	3/16/2005	49.280	9/22/1991	0.000		22/04/2005	6/1984 to 5/2010
23	**Malkhed**	400.910	8/16/1990	5007.121	391.100	3/8/1999	398.270	10/15/1998	0.000		6/24/1995	8/1990 to 5/2010
24	**Mantralayam**	318.770	10/2/2009	18882.31	305.760	6/25/2003	314.775	9/30/1978	0.000	306.000	3/12/2003	6/1972 to 5/2010

25	**Mudhol**	532.350	8/6/2005	1537.921	521.100	3/13/2002	529.795	9/24/2005	0.000		5/19/2003	7/2000 to 5/2007
26	**Narasingpur**	462.393	8/10/2006	8873.277	448.013	12/5/2004	460.181	8/17/1983	0.000	448.988	22/12/1996	12/1966 to 5/2010
27	**Navalgund**	565.310	9/18/2000	391.1234	558.000	6/6/2005	564.340	9/23/2001	0.000		6/14/1998	6/1991 to 5/2006
28	**Paleru Bridge**	78.877	7/23/1989	2514.115	70.877	4/10/2003	78.002	10/6/1983	0.000	71.772	6/6/1967	6/1965 to 5/2007
29	**Pandegaon**	582.245	9/26/1979	816.5215	576.880	6/22/2004	580.545	9/26/1988	0.000		8/25/1987	10/1979 to 5/2007
30	**Phulgaon (Seasonal)**	93.950	8/23/1997	5998.052	81.005	5/7/1991	91.475	7/27/2005	0.000	84.780	12/05/1998	6/1992 to 11/2010

Contd/…

Table 6 : Maximum and minimum observed water levels and discharges by site and river basin

VI Basin : Krishna Unit: M. C. M.

SL. No.	Site Name	Maximum Water Level			Minimum Water Level			Maximum Observed Discharge		Minimum Observed Discharge		Period of record
		Water Level (m)	Date	Discharge (Cumecs)	Water Level (m)	Date	Discharge (Cumecs)	Date	Discharge (Cumecs)	Date	Discharge (Cumecs)	
1	2	3	4	5	6	7	8	9	10	11	12	13
31	**Pondugala**	60.934	10/15/1998	32577.08	42.384	11/29/1975	60.334	10/15/1998	4.600	42.842	6/5/1976	11/1975 to 5/2007
32	**Purushothamagudem**	154.250	7/23/1989	1751.50	144.300	10/26/2004	149.600	8/24/2000	0.000		1/8/1997	9/1987 to 5/2006
33	**Sadalga (Seasonal)**	538.950	6/29/1983	2457.294	525.080	4/26/1966	537.548	7/11/1975	0.000	529.425	3/9/1991	6/1969 to 11/2010
34	**Samdoli (Seasonal)**	546.324	8/5/2005	2305.221	529.499	4/16/1966	543.424	7/27/1989	0.000		3/10/1983	12/1966 to 11/2010
35	**Sarati**	476.788	8/2/1976	3232.886	467.928	3/10/1995	476.089	8/2/1976	0.000		6/28/1993	6/1965 to 5/2010
36	**Shirdhon**	442.200	9/26/1979	1858.937	437.680	7/20/2005	439.99	10/12/1998	0.000		3/1/1990	7/1979 to 5/2008
37	**T Ramapuram (Seasonal)**	356.478	10/2/2009	3720.143	349.368	3/25/2001	355.948	10/2/2009	0.000		5/8/2001	12/1965 to 11/2010
38	**Takli**	423.718	8/12/2006	7661.959	410.798	5/12/1969	422.753	7/31/1967	0.000	411.278	4/11/1996	6/1965 to 5/2010
39	**Talikot (Seasonal)**	56.450	6/23/2007	1202.298	48.005	4/16/1994	55.560	03/10/2009	0.000	50.06	1/19/2002	9/1995 to 11/2010
40	**Terwad (Seasonal)**	540.390	8/5/2005	3940.818	520.170	6/2/1985	537.299	7/29/1991	0.000	522.240	4/17/1990	8/1979 to 11/2010
41	**Vandur**	542.020	7/24/1989	689.0822	531.980	2/17/1980	540.56	8/9/1986	0.000		4/27/1981	6/1979 to 5/2007
42	**Vijayawada**	19.332	10/5/2009	28140.00	8.512	7/23/1997	18.947	10/16/1998	0.000	9.622	02/06/2006	6/1965 to 5/2010
43	**Wadakbal**	428.563	9/29/1989	3270.743	418.888	4/21/1966	428.538	9/29/1989	0.000		5/26/1992	6/1965 to 5/2010
44	**Wadenapally**	42.494	10/5/2009	31836.00	23.999	6/7/1987	41.144	10/16/1998	0.000	24.664	06/06/1972	12/1965 to 5/2010
45	**Warunji**	568.047	6/6/1976	4900.641	550.757	4/22/1971	565.732	8/2/2005	0.000	550.947	12/1/1988	1/1966 to 5/2010
46	**Yadgir**	361.913	9/7/1969	10609.86	348.903	5/31/1973	361.873	9/7/1969	0.000	351.783	02/04/2002	6/1965 to 5/2010

Source : Sub Division Engineer, Krishna & Coordination Circle, CWC, Hyderabad.

Table 6 : Maximum and minimum observed water levels and discharges by site and river basin

VII Basin : Cauvery Unit: M. C. M.

Sl. No.	Site Name	Maximum Water Level			Minimum Water Level			Maximum observed		Minimum observed		Period of record
		Water Level (m)	Date	Discharge (cumec)	Water Level (m)	Date	Discharge (cumec)	Date	Discharge (cumec)	Date	Discharge (cumec)	
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
1	Akkihebbal	752.25	8/2/2005	1438.00	746.78	5/23/2003	0.00	8/14/2008	1480.00	4/7/2003	0.00	23/01/2002 - 31/05/2009
2	Annavasal	5.99	11/24/1999	11.28	4.37	2/10/1999	0.00	11/24/1999	11.28	6/5/2004	0.00	01/02/1999 - 31/05/2009
3	Bendrahalli	634.95	11/4/2005	31.82	631.19	6/18/2007	0.00	10/22/2007	36.89	3/25/2007	0.00	01/06/2005 - 31/05/2009
4	Biligundulu	265.56	7/30/1991	6688.00	257.40	3/29/2004	5.06	7/30/1991	6688.00	3/28/2004	4.24	30/08/1971 - 31/05/2009
5	Chunchunkatte	756.44	8/14/2008	1456.00	751.48	5/12/2009	0.00	8/14/2008	1456.00	2/2/2009	0.00	01/06/2008 - 31/05/2009
6	Chunchunkatte	757.00	8/2/2005		636.21	11/9/2000	48.68	11/9/2000	48.68	11/9/2000	48.68	09/11/2000 - 31/05/2007
7	Elunuthimangalam	132.05	10/24/1999	175.30	129.80	3/23/1999	0.00	10/24/1999	175.30	5/23/2001	0.00	07/08/1998 - 31/05/2009
8	Gopurajapuram	16.51	2/1/1999	0.38	0.03	5/8/2009	0.00	11/8/2005	51.80	6/28/2005	0.00	01/02/1999 - 31/05/2009
9	Hogenakkal	256.35	10/24/2005	251.40	252.01	7/20/2006	0.00	10/24/2005	251.40	1/5/2004	0.00	05/10/1996 - 31/05/2009
10	K.M.Vadi	772.19	7/4/1980	242.10	0.00	2/15/1975		7/15/1994	681.20	11/28/1990	0.00	01/06/1974 - 31/05/2009
11	Kodumudi	127.83	10/25/2005	6584.92	121.51	6/6/1983	1.20	10/25/2005	6584.92	3/15/2004	0.00	21/06/1971 - 31/05/2009
12	Kollegal	629.75	7/29/1991	6038.00	0.00	3/31/1995	41.50	7/29/1991	6038.00	4/17/2007	2.25	06/02/1971 - 31/05/2009
13	Kudige	820.41	7/3/1980	2265.00	810.49	5/10/2002	3.24	7/3/1980	2265.00	6/1/2003	0.00	01/11/1973 - 31/05/2009
14	Kudlur	438.56	4/19/2001	50.56	433.73	6/22/2003	0.00	11/2/2005	77.64	5/19/2004	0.00	06/03/1999 - 31/05/2009
15	M.H.Halli	846.48	7/28/1991	2172.00	838.13	1/9/2008	4.71	7/28/1991	2172.00	6/4/2007	0.35	01/10/1978 - 31/05/2009
16	Menangudi	7.95	11/8/1997	17.20	4.88	2/28/1997	0.00	11/27/2008	26.24	1/16/2006	0.00	21/08/1996 - 31/05/2009
17	Musiri	86.65	10/25/2005	7690.26	82.38	5/29/2006	2.16	10/25/2005	7690.26	6/28/2003	0.00	01/06/1972 - 30/11/2009
18	Muthankera	712.74	6/22/1992	1584.00	706.75	3/18/1981	0.80	8/3/1979	2050.00	3/17/2004	0.00	01/06/1973 - 31/05/2009
19	Nallamaranpatti	134.85	11/19/1979	3486.60	128.06	10/10/2007	0.00	11/10/1993	5571.00	5/15/1996	0.00	01/12/1977 - 31/05/2009
20	Nallathur	5.67	11/28/2008	92.33	1.67	6/22/2008	0.00	11/28/2008	92.33	3/18/2008	0.00	01/06/2006 - 31/05/2009
21	Nellthurai	308.25	7/23/1989	1348.00	300.84	5/15/1983	0.10	7/23/1989	1348.00	4/3/1991	0.00	01/06/1979 - 31/05/2009
22	Peralam	9.84	11/27/2008	8.21	6.96	3/20/1999	0.00	11/27/2008	8.21	7/12/2004	0.00	01/02/1999 - 31/05/2009

23	Porakudi	7.20	11/28/2008	111.35	2.17	5/3/2005	0.00	11/28/2008	111.35	9/16/2004	0.00	01/02/1999 - 31/05/2009
24	Sakleshpur	892.97	7/2/2007	554.08	886.58	4/4/2005	0.00	7/1/2007	613.10	4/21/2004	0.00	28/01/2002 - 31/05/2009
25	Savandpur	186.88	11/20/1979	1445.60	179.70	9/19/2003	0.00	11/20/1979	1445.60	9/11/2003	0.00	01/06/1978 - 31/05/2009
26	Sevnur	172.17	10/25/2005	41.04	170.50	3/12/2007	0.00	10/26/1999	77.95	9/26/2004	0.00	20/09/1999 - 31/05/2009
27	T. Bekuppe	607.40	10/24/2005		604.30	4/5/2004		7/12/2004	424.70	4/10/2005	0.00	29/09/2003 - 31/05/2009
28	T.K.Halli	585.93	10/3/1984	1218.80	580.19	3/6/2008	0.00	10/3/1984	1218.80	6/17/2003	0.00	12/06/1978 - 31/05/2009
29	T.Narasipur	643.19	7/29/1991	1581.00	634.87	1/25/2009	2.68	8/4/1979	2325.00	4/11/1974	0.70	03/02/1971 - 31/05/2009
30	Thengudi	9.62	11/28/2008	89.73	5.58	4/24/2005	0.00	11/28/2008	89.73	7/26/2003	0.00	02/07/1997 - 31/05/2009
31	Thengumarahada	341.08	10/30/1991	653.20	338.22	4/10/1983	0.00	10/30/1991	653.20	4/27/2004	0.00	01/06/1979 - 31/05/2009
32	Thevur	172.53	12/1/2000	32.55	169.90	4/9/2002	0.00	11/2/2005	62.93	2/28/2005	0.00	24/09/1999 - 31/05/2009
33	Thimmanahalli	908.67	8/14/2008	301.70	10.65	4/19/2003	0.00	8/6/2007	365.30	6/3/2003	0.00	29/06/2000 - 31/05/2009
34	Thoppar	325.81	11/24/2005	60.87	320.52	11/20/2003	0.00	11/24/2005	60.87	4/13/2007	0.00	21/10/1999 - 31/05/2009
35	Uccadai	6.30	11/22/1999	42.42	0.00	9/13/2003		11/22/2000	64.96	11/17/2003	-0.89	01/02/1999 - 01/07/2004
36	Urachikottai	165.83	7/6/1980	4663.50	157.02	4/26/2004	0.00	10/25/2005	5854.54	1/25/2004	0.00	01/06/1979 - 31/05/2009

Source :River Data Directorate, Central Water Commission.

Table 6 : Maximum and minimum observed water levels and discharges by site and river basin

VIII Basin : East Flowing Rivers from Mahanadi to Kanyakumari

Unit: M. C. M.

Sl. No.	Site Name	Maximum Water Level			Minimum Water Level			Maximum observed		Minimum observed		Period of record
		Water Level (m)	Date	Discharge (cumec)	Water Level (m)	Date	Discharge (cumec)	Date	Discharge (cumec)	Date	Discharge (cumec)	
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
1	ANAKAPALLI	25.20	11/16/1998	887.00	19.60	5/7/2002	0.00	10/3/1996	897.00	3/26/2000	0.00	16/08/1989 - 31/05/2007
2	GUNUPUR	85.75	7/29/1991	5285.60	79.57	2/15/1990	1.42	7/29/1991	5285.60	6/15/2003	0.00	15/06/1989 - 31/05/2007
3	KASHINAGAR	56.59	7/4/2006	4012.51	50.79	4/17/1981	3.40	9/23/1972	6589.10	6/2/2003	0.00	28/04/1971 - 31/05/2007
4	PURUSHOTTAMPUR	17.94	10/8/2003	2279.41	12.00	3/24/1995	0.00	10/19/1999	3020.30	4/17/1999	0.00	14/06/1989 - 31/05/2007
5	SRIKAKULAM	14.09	8/4/2006	5624.74	7.45	6/20/2004	3.50	8/4/2006	5624.74	4/25/2003	0.00	25/08/1990 - 31/05/2007

Source :River Data Directorate, Central Water Commission.

Table 6 : Maximum and minimum observed water levels and discharges by site and river basin

IX Basin : West Flowing Rivers from Kanyakumari to Tapi Unit: M. C. M.

Sl. No.	Site Name	Maximum Water Level			Minimum Water Level			Maximum observed		Minimum observed		Period of record
		Water Level (m)	Date	Discharge (cumec)	Water Level (m)	Date	Discharge (cumec)	Date	Discharge (cumec)	Date	Discharge (cumec)	
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
1	ADDOOR	15.48	8/4/2004	930.30	-0.28	3/16/2006	0.00	8/4/2004	930.30	6/7/2005	0.00	17/07/2003 - 31/05/2008
2	AMBARAMPALAYAM	223.27	11/14/1992	5122.00	218.64	5/18/2003	0.00	11/14/1992	5122.00	6/17/2001	0.00	01/06/1978 - 31/05/2009
3	ARANGALY	7.58	6/27/1985	793.00	0.00	5/16/2000	0.00	7/17/2007	1264.85	2/5/2001	0.00	27/04/1978 - 31/05/2009
4	ASHRAMAM	4.86	11/9/2002	120.38	1.01	5/10/2000	0.00	11/9/2002	120.38	10/30/2003	0.00	21/09/1999 - 31/05/2009
5	AVERSHE	95.67	8/2/2005	616.55	10.78	5/26/2007	0.00	8/2/2005	616.55	2/16/2006	0.00	25/06/2002 - 31/05/2008
6	AYILAM	10.37	10/10/1992	974.80	-0.36	3/27/2004	0.00	10/10/1992	974.80	3/20/1986	0.00	01/12/1978 - 31/05/2009
7	BANTWAL	12.65	7/26/1974	9832.00	1.12	6/6/2003	0.00	7/26/1974	9832.00	12/29/2005	0.00	01/11/1970 - 31/05/2008
8	ERINJIPUZHA	18.79	7/18/1999	1388.00	5.23	5/14/1987	0.00	7/18/1999	1388.00	5/16/1996	0.00	25/06/1985 - 31/05/2009
9	HALADI	21.67	8/9/1986	804.90	0.22	5/26/1988	0.00	7/15/1994	915.80	5/12/1988	0.00	30/12/1985 - 31/05/2008
10	KALAMPUR	97.55	8/9/1986	480.30	1.63	12/10/1991	5.20	7/9/2001	805.50	4/21/1994	0.00	23/06/1986 - 31/05/2009
11	KALLOOPPARA	9.05	8/3/1994	848.30	0.17	3/24/2004	0.00	8/26/2000	888.50	3/5/2005	0.00	19/06/1985 - 31/05/2009
12	KARATHODU	96.01	8/10/1986	441.00	2.15	1/15/2008	0.00	7/18/2007	1200.50	4/20/1996	0.00	20/06/1986 - 31/05/2009
13	KIDANGOOR	7.90	8/3/1994	819.90	-0.18	3/8/2005	0.00	8/3/1994	819.90	2/15/2007	0.00	02/07/1985 - 31/05/2009
14	KUMBIDI	9.61	6/27/1985	2295.00	3.43	5/17/2009	0.59	7/18/2007	3032.03	6/2/1987	0.00	01/05/1979 - 31/05/2009
15	KUNIYIL	13.86	7/3/1980	N.A.	0.04	3/16/1997	1.00	7/17/2007	3256.00	4/18/1999	0.00	04/01/1979 - 31/05/2009
16	KUTTYADI	7.18	7/18/2007	757.40	0.32	2/5/2009	0.80	7/18/2007	757.40	3/24/2004	0.00	13/03/2000 - 31/05/2009
17	KUZHITHURAI	4.72	10/30/2006	241.19	0.58	3/24/2004	0.00	10/30/2006	241.19	9/7/2006	0.00	01/11/2000 - 31/05/2009
18	MALAKKARA	7.79	7/10/2001	1212.00	-0.41	3/22/1992	1.72	8/3/1994	1988.00	4/17/2000	0.00	19/06/1985 - 31/05/2009
19	MANKARA	50.97	11/14/1992	1220.00	46.34	3/28/2004	0.00	11/14/1992	1220.00	3/16/2000	0.00	21/06/1985 - 31/05/2009
20	NEELESWARAM	9.75	6/25/1971	2410.00	-0.18	6/4/2007	65.13	8/16/1975	3502.40	4/3/2009	0.00	16/03/1971 - 31/05/2009
21	PATTAZHY	13.70	11/15/1992	2367.00	1.06	1/25/2005	3.48	11/15/1992	2367.00	4/27/1990	0.00	20/04/1978 - 31/05/2009
22	PERUMANNU	14.53	7/17/2007	2369.61	5.83	4/19/1989	0.00	7/18/1999	2380.00	4/17/1989	0.00	26/06/1985 - 31/05/2009
23	PUDUR	64.73	11/14/1992	744.10	59.30	3/29/2004	0.00	11/14/1992	744.10	5/30/2003	0.00	02/09/1985 - 31/05/2009
24	PULAMANTHOLE	90.15	8/9/1986	782.70	10.63	3/27/2004	0.00	7/28/1992	1410.00	4/21/1989	0.00	17/02/1986 - 31/05/2009
25	RAMAMANGALAM	8.30	6/28/1985	1304.10	0.56	3/10/2004	19.08	7/9/2001	1450.18	4/6/1987	12.50	25/04/1978 - 31/05/2009
26	SANTEGULI	18.09	7/13/2000	4959.00	10.05	5/7/1990	0.00	7/18/1988	6730.00	6/8/1997	0.00	01/06/1988 - 31/05/2008
27	THUMPAMON	13.74	11/7/1978	680.00	5.09	2/15/2002	0.62	10/13/1998	800.00	2/22/2006	0.00	21/12/1977 - 31/05/2009
28	VANDIPERIYAR	793.62	7/27/2005	203.17	790.87	3/21/2004	0.00	7/9/2001	206.08	3/18/2004	0.00	01/06/2000 - 31/05/2009
29	YENNEHOLE	23.93	9/29/1996	910.00	16.91	5/5/1990	0.00	7/13/1994	1062.00	4/24/2003	0.00	24/07/1989 - 31/05/2008

Source :River Data Directorate, Central Water Commission.

Table 6 : Maximum and minimum observed water levels and discharges by site and river basin

X **Basin : Tapi** Unit: M. C. M.

Sl. No.	Site Name	Maximum Water Level			Minimum Water Level			Maximum observed		Minimum observed		Period of record
		Water Level (m)	Date	Discharge (cumec)	Water Level (m)	Date	Discharge (cumec)	Date	Discharge (cumec)	Date	Discharge (cumec)	
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
1	**Pingalwada**	19.250	9/9/1994	1085	4.980	3/29/2001	0.231	8/26/1997	1014	08/051990	0.185	1989-2009
2	**Motinaroli**	18.225	7/29/2006	1400	7.095	4/14/2003	0.278	8/4/2004	1288	06/051991	0.000	1991-2009
3	**Mahuwa**	24.800	6/16/1994	5124	9.100	5/9/2001	0.000	8/4/2004	8836	05/052001	0.000	1971-2009
4	**Gadat**	13.985	6/16/1994	4018	1.500	6/13/1984	0.000	7/28/2003	3680	6/16/1981	0.000	1978-2009
5	**Nanipalsan**	110.030	8/3/2004	9500	96.160	6/4/2001	0.000	8/8/2006	2346	5/2/1985	0.000	1991-2009
6	**Ozerkheda**	96.100	8/4/2004	5420	81.070	6/8/2001	0.000	7/23/2009	1678	6/1/1991	0.000	1991-2009
7	**Durvesh**	16.130	9/17/1998	9100	0.700	1/1/1981	0.000	7/31/1976	7744	1/26/1971	0.000	1971-2009

Source : Executive Engineer, Tapi Division, CWC, Surat.

Table 6 : Maximum and minimum observed water levels and discharges by site and river basin

XI Basin : Narmada Unit: M. C. M.

Sl. No.	Site Name	Maximum Water Level			Minimum Water Level			Maximum observed		Minimum observed		Period of record
		Water Level (m)	Date	Discharge (cumec)	Water Level (m)	Date	Discharge (cumec)	Date	Discharge (cumec)	Date	Discharge (cumec)	
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
1	**Orsang at Chandawada**	33.500	07.09.94	9070	18.540	07.11.99	0.000	3827	01.08.97	0.004	08.02.97	80-81 T02009-10
2	**Narmad at Garudeswar**	39.780	07.09.94	60642	13.030	13.05.99	55.00	60642	07.09.94	1.842	16.03.01	73-74 T0 2009-10
3	**Hathni at Jobat**	232.300	03.09.02	1445	226.340	12.12.01	0.00	1191	3.09.02	0.148	23.08.01	01-02 To2005-06
4	**Goi at Pati**	195.85	05.08.01	2250	188.800	31.01.03	0.00	1391	13.07.00	0.126	31.12.02	99-00To2005-06
5	**Uri at Dhulsar**	155.100	05.08.04	616	150.230	05.09.00	0.00	327.1	3.09.02	0.069	26.06.01	99-00 To 2005-06
6	**Narmada at Rajghat**	131.510	19.08.84	56610	112.500	03.06.89	13.40	56610	19.08.84	13.07	05.06.89	72-73 T0 2006-07
7	**Narmada AT Mandleswar**	157.290	31.08.73	48000	139.035	27.05.80	37.60	44422	07.09.94	11.92	06.06.88	72-73 T0 2009-10
8	**Kundi at Kogaon**	163.010	26.06.79	7900	151.120	01.03.00	0.000	5653	03.09.02	0.015	16.02.89	78-79 T0 2009-10
9	**Chhota Tawa at Ginnore**	237.650	06.09.94	5950	219.750	15.06.98	0.000	12158	29.08.78	0.100	14.01.99	71-72 T0 1998-99
10	**Narmada at Motakka**	169.000	26.07.97	N.A	155.590	15.06.97	43.00	31464	26.07.97	43.00	15.06.97	99-00 To 2006-07
11	**Narmada at Handia**	273.580	19.08.84	26240	258.965	08.06.77	18.50	26210	20.09.99	11.00	01.06.89	77-78 T0 2009-10
12	**Ganjal at Chhidgaon**	300.300	15.09.98	6660	287.155	19.05.88	0.410	5805	16.07.93	0.100	20.05.80	77-78 T0 2009-10
13	**Narmada at Hoshangabad**	301.330	30.08.73	33593	283.770	29.05.80	14.40	31463	31.08.73	14.30	30.05.80	72-73 T0 2009-10
14	**Tawa at Tawakati**	371.850	30.08.02	1082	363.040	31.05.03	0.26	109.7	19.08.02	0.260	31.05.03	01-02 TO2005-06
15	**Machna at Shapur**	384.090	24.06.02	1325	377.860	20.06.00	0.64	158.5	25.06.02	0.010	01.02.01	01-02 TO 2005-06
16	**Narmada at Sandia**	316.890	19.09.99	24500	298.900	18.05.96	36.48	16683	29.07.94	9.290	09.05.89	78-79 T0 2009-10
17	**Shakkar at Gadarwara**	332.470	18.09.99	5850	322.351	22.05.97	0.000	3835	15.09.99	0.043	21.04.96	77-78T0 2009-10
18	**Narmada at Barmanghat**	331.320	30.08.73	19000	307.360	01.06.80	4.500	20658	30.08.73	2.900	31.05.84	72-73 T0 2009-10
19	**Sher at Belkheri**	359.950	21.07.94	7600	340.910	27.04.03	0.240	4961	16.09.84	0.100	09.06.77	77-78 T0 2009-10
20	**Hiran at Patan**	356.080	13.09.92	1880	341.590	17.06.97	0.000	1339	15.07.94	0.176	15.05.97	79-80 T0 2009-10
21	**Banjar at Bamni**	448.500	18.09.99	N.A	440.590	31.05.00	0.000	640.0	14.08.01	0.046	08.04.00	99-00 To 2009-10
22	**Narmada at Jamtara**	382.000	24.08.91	17250	361.790	05.06.80	0.000	21355	30.08.72	0.090	12.05.88	72-73 T0 2000-01
23	**Banjar at Hridyanagar**	445.930	17.07.94	4790	436.250	10.05.01	0.000	6265	18.09.99	0.025	01.04.93	77.78 T0 2001-02
24	**Burhner at Mohgaon**	467.300	08.08.04	11600	448.490	20.06.79	0.000	7182	23.08.91	0.007	09.06.82	78-79 T0 2009-10
25	**Narmada at Amgaon**	445.520	08.08.04	8900	431.110	01.06.01	0.000	792.1	17.08.02	0.790	03.05.03	01-02 To2005-06
26	**Narmada at Manot**	459.650	18.08.84	5660	442.360	31.05.80	0.000	7528	23.08.91	0.051	14.06.93	77-78 T0 2009-10
27	**Narmada at Dindori**	669.640	23.08.91	4710	662.520	20.05.03	0.500	4577	23.08.91	0.504	30.05.02	88-89 T0 2009-10

Source : Executive Engineer, Tapi Division, CWC, Surat.

Table 6 : Maximum and minimum observed water levels and discharges by site and river basin

XII **Basin : Mahi and Sabarmati** Unit: M. C. M.

S.No.	Site Name	Maximum Water Level			Minimum Water Level			Maximum Observed Discharge		Minimum Observed Discharge		Period of Record
		Water Level (m)	Date	Discharge (Cumecs)	Water Level (m)	Date	Discharge (Cumecs)	Date	Discharge (Cumecs)	Date	Discharge (Cumecs)	
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
I	**MAHI BASIN**											
1	Mataji	309.035	28.07.96	16100.000	0.000	27.07.87	0.000	28.07.96	10257.000	08.04.98	0.000	1982-2009
2	Dhariawad	209.350	11.08.06	1979.941	0.000	03.05.89	0.000	11.08.06	1979.941	05.04.03	0.000	1988-2009
3	Rangeli	158.240	19.08.06	5179.314	0.000	24.05.80	0.000	19.08.06	5179.314	03.06.01	0.000	1978-2009
4	Paderdibadi	147.525	19.08.06	16153.253	0.000	18.04.80	0.000	19.08.06	16153.253	01.12.00	0.000	1978-2009
5	Chakaliya	226.900	11.08.06	5473.966	0.000	03.04.01	0.000	28.07.96	6956.497	25.11.01	0.000	1991-2009
6	Khanpur	26.820	12.08.06	31061.914	7.900	14.06.02	7.900	12.08.06	31061.914	15.03.03	1.490	1978-2009
II	**SABARMATI BASIN**											
1	Jotasan	291.550	22.08.06	1339.665	0.000	25.11.95	0.000	20.08.06	1339.665	04.01.05	0.000	1995-2009
2	Kheroj	215.450	19.08.06	1402.000	0.000	03.05.99	0.000	19.08.06	1402.000	01.06.01	0.000	1990-2009
3	Derol Bridge	94.730	20.08.94	3050.000	0.000	30.06.00	0.000	20.08.84	3050.000	07.12.01	0.000	1991-2009
4	Ratanpur	44.980	12.08.06	3732.154	0.000	03.03.96	0.000	12.08.06	3732.154	16.12.00	0.000	1989-2009
5	Kheda	28.200	25.08.90	1626.000	0.000	23.04.97	0.000	12.08.06	4507.513	16.11.03	0.000	1989-2009
6	Voutha	20.970	21.08.06	3176.000	12.000	01.10.01	0.000	09.08.06	3350.930	05.10.00	0.000	2000-2009
III	**BANAS BASIN**											
1	Abu Road	258.397	08.09.92	1164.000	0.000	02.01.98	0.000	08.09.06	1164.000	07.11.00	0.000	1990-2009
2	Sarotry	190.780	08.09.92	2672.000	0.000	06.02.99	0.000	08.09.92	2672.000	23.03.00	0.000	1990-2009
3	Chitrasani	186.750	19.08.06	127.200	0.000	08.04.92	0.000	08.09.92	274.800	25.09.04	0.000	1990-2009
4	Kamalpur	38.555	07.09.73	280.000	0.000	03.02.72	0.000	08.09.92	4221.000	04.06.84	0.000	1971-2009
IV	**LUNI BASIN**											
1	Balotra	107.150	06.07.90	1875.000	0.000	07.10.04	0.000	09.09.92	2907.000	02.10.00	0.000	1990-2009
2	Gandhav	38.880	19.07.79	4300.000	0.000	29.06.78	0.000	19.07.97	4300.000	19.06.97	0.000	1974-2009
V	**SHETRUNJI BASIN**											
1	Lowara	66.930	09.11.82	880.000	0.000	18.04.85	0.000	29.06.05	2441.000	26.04.97	0.000	1970-2009
VI	**BHADAR BASIN**											
1	Ganod	34.100	22.06.83	2750.000	0.000	26.05.75	0.000	27.07.88	4160.000	14.08.97	0.000	1970-2009
VII	**MACHU BASIN**											
1	Gungan	16.000	24.06.97	990.000	0.000	01.06.76	0.000	28.07.88	2681.000	26.01.02	0.000	1970-2009
VIII	**RUPEN BASIN**											
	Sapawada	43.000	27.06.97	325.000	0.000	29.07.03	0.000	03.08.94	964.300	20.06.95	0.000	1989-2009

Source: Executive Engineer, Mahi Division, CWC, Gandhi Nagar.

Table 7 : Annual dependable flow of water by site and river basin

I Basin : Mahanadi Unit: M. C. M.

Sl.No.	Site Name	Period/Years	Dependable flow									
			10%	20%	30%	40%	50%	60%	70%	80%	90%	100%
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
1	Andhiarkhore	9/1977 to 4/2009	628	461	421	348	284	247	224	203	118	-
2	Bamnidhi	6/1971 to 5/2009	7629	7236	5289	4654	4166	3717	3151	2532	2377	-
3	Baronda	12/1977 to 4/2009	2801	2110	1835	1413	1293	973	611	453	164	-
4	Basantpur	6/1971 to 5/2009	34313	29998	24922	23549	20056	18223	16675	12683	9590	-
5	Ghatora	9/1979 to 5/2009	1409	1158	1085	1044	948	771	564	501	367	-
6	Jondhra	7/1979 to 5/2009	12793	11928	9760	8942	7554	6646	6050	4443	2962	-
7	Kantamal	8/1971 to 5/2009	21093	15698	13499	10744	9823	7419	6359	5389	3617	-
8	Keloatraigarh	9/1995 to 10/2008	822	747	721	687	594	553	521	391	117	-
9	Kesinga	11/1978 to 5/2009	13947	10099	8257	6930	5327	4921	4166	2926	2350	-
10	Kotni	9/1978 to 5/2009	3365	2632	2469	1861	1541	1437	1031	815	484	-
11	Kurbhata	4/1978 to 5/2009	3454	2898	2765	2530	2275	2107	1872	1710	1228	-
12	Manendragarh	6/1989 to 5/2009	562	464	426	404	302	292	267	234	200	-
13	Pandigaon	6/1989 to 4/2001	5671	5112	3774	3516	3054	2595	2393	1619	144	-
14	Parmanpur	7/2001 to 10/2008	<---------- Sufficient data not available ---------->									
15	Pathardih	1/1989 to 4/2009	1947	1350	1173	1097	921	832	705	471	325	-
16	Rajim	6/1971 to 5/2009	5955	4764	3820	3235	2487	1792	1618	904	645	-
17	Rampur	6/1971 to 5/2009	2653	1904	1640	1333	1168	988	884	707	416	-
18	Salebhata	11/1971 to 5/2009	3529	2920	2367	2004	1590	1344	1220	994	552	-
19	Seorinarayan	12/1985 to 5/2009	28008	22055	19004	16133	14470	13392	10213	7730	5324	-
20	Simga	9/1971 to 4/2009	8732	7336	6161	5401	4623	3714	2798	2382	1902	-
21	Sukma	6/1989 to 7/2006	1182	965	723	537	470	323	215	101	30	-
22	Sundrgarh	12/1977 to 5/2009	4319	4146	3766	3339	3068	2846	2256	2103	1720	-
23	Tikapara	5/1972 to 5/2009	70344	62116	58454	53104	49155	42005	36505	25199	20308	-

Source :River Data Directorate, Central Water Commission.

Table 7 : Annual dependable flow of water by site and river basin

II Basin : Subarnarekha, Burhabalang & Baitarni Unit: M. C. M.

Sl.No.	Site Name	Period/Years	Dependable flow									
			10%	20%	30%	40%	50%	60%	70%	80%	90%	100%
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
1	ADITYAPUR	11/1971 to 12/2007	4784	4149	3769	2751	2117	2065	1880	1549	1126	-
2	ANANDPUR	3/1972 to 5/2007	7735	6056	5455	5000	4662	4205	3506	3015	2270	-
3	BARIDHI NALA		<---------- Sufficient data not available ---------->									
4	CHAMPUA	7/1990 to 5/2007	1728	1228	1160	1099	1004	939	888	774	466	-
5	FENKOGHAT	6/1988 to 10/2007	692	654	612	511	396	343	296	260	198	-
6	GHATSHILA	6/1971 to 12/2007	11126	9780	8128	7044	5568	5035	4520	3909	2984	-
7	GHATSILA ROAD BRIDGE		<---------- Sufficient data not available ---------->									
8	GOVINDPUR	3/1992 to 12/2007	4951	4013	3612	3247	3152	3087	2287	2088	1516	-
9	JAMSHEDPUR	2/1972 to 12/2007	11512	10281	8769	7664	6326	5405	4593	3850	2755	-
10	JAMSHOLAGHAT	6/2004 to 11/2007	<---------- Sufficient data not available ---------->									
11	MURI	11/1989 to 12/2007	1148	984	911	812	727	517	503	389	281	-

Source :River Data Directorate, Central Water Commission.

Table 7 : Annual dependable flow of water by site and river basin

III Basin : Brahmani Unit: M. C. M.

Sl.No.	Site Name	Period/Years	Dependable flow									
			10%	20%	30%	40%	50%	60%	70%	80%	90%	100%
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
1	ALTUMA	7/1990 to 5/2009	1005	892	770	721	628	516	396	363	294	-
2	BOLANI	3/1972 to 6/1996	13296	10551	10210	9006	8576	7683	6870	6407	2300	-
3	GOMLAI	1/1979 to 5/2009	15897	14069	12382	10993	10306	9897	8581	7531	5409	-
4	JARAIKELA	8/1972 to 5/2009	7033	6015	5393	4910	4502	4246	3710	3391	2523	-
5	JENAPUR	7/1979 to 5/2009	23584	21923	19836	17477	16672	15515	14900	11828	10808	-
6	PANPOSH	6/1996 to 5/2009	14236	13588	13015	12256	11328	9735	8147	7495	6890	-
7	TALCHER	8/1985 to 6/1996	27232	17955	17612	15059	14041	12392	11553	9855	3512	-
8	TILGA	6/1979 to 5/2009	2766	2563	2106	1938	1847	1718	1605	1545	1200	-

Source :River Data Directorate, Central Water Commission.

Table 7 : Annual dependable flow of water by site and river basin

IV **Basin : Rushikulya, Vamsadhara, Sarada & Nagavali** Unit: M. C. M.

Sl.No.	Site Name	Period/Years	Dependable flow									
			10%	20%	30%	40%	50%	60%	70%	80%	90%	100%
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
1	**Purushottampur**	07/1978 to 05/2007	3350	2925	2705	2552	2085	1587	1389	1096	970.1	-
2	**Gunupur**	05/1978 to 05/2007	3423	2997	2444	2187	1677	1215	1131	964.0	614.6	-
3	**Kashi Nagar**	05/1971 to 05/2007	4164	3454	2955	2489	2259	2096	1754	1383	1112	-
4	**Srikakulam**	02/1988 to 05/2007	3917	3208	3087	2519	2365	1936	1569	1295	1089	-
5	**Ankapali**	12/1987 to 05/2007	1176	973	631.4	449.9	312.5	271.9	230.8	167.6	95.64	-

Source : Wainganga Division, Central Water Commission.

Table 7 : Annual dependable flow of water by site and river basin

V **Basin : Godavari** Unit: M. C. M.

Sl.No.	Site Name	Period/Years	Dependable flow									
			10%	20%	30%	40%	50%	60%	70%	80%	90%	100%
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
1	**Ambabal**	6/1993 to 5/2010	1560	1213	1073	894	748	608	523	491	398	-
2	**Betmogrra**	6/1997 to 5/2010	650	424	323	233	214	86	44	25	6	-
3	**Bhadrachalam**	6/2007 to 5/2010	<---------- Sufficient data not available ---------->									
4	**Cherribeda**	6/1996 to 5/2010	1204	974	889	606	458	374	331	249	209	-
5	**Chindnar**	6/1971 to 5/2010	12245	10612	9280	8747	7997	7345	6212	5903	4570	-
6	**Degloor**	6/1987 to 5/2010	705	495	454	369	230	124	102	72	39	-
7	**Dhalegaon**	6/1965 to 5/2010	5800	4549	3844	2834	1694	1011	719	364	202	-
8	**G.R.Bridge**	6/1976 to 5/2010	4798	4383	2936	1843	1144	973	636	454	161	-
9	**Gandlapet**	7/1986 to 5/2010	663	228	195	100	59	23	6	3	0	-
10	**Jagdalpur**	6/1965 to 5/2010	5386	4764	4506	3821	3655	3174	2895	2378	1843	-
11	**Konta**	12/1965 to 5/2010	19996	17983	15630	14851	14273	13361	12497	10576	7539	-
12	**Kosagumda**	11/1996 to 5/2010	1321	1219	1119	977	746	722	643	448	159	-
13	**Mancherial**	6/1966 to 5/2010	28536	17954	14888	11141	7935	6275	4021	2573	1709	-
14	**Murthahandi**	12/1988 to 5/2010	2472	1934	1808	1672	1480	1354	1202	981	834	-
15	**Nowrangpur**	12/1965 to 5/2010	4016	3739	3180	2912	2703	2279	1942	1565	746	-
16	**Pachegaon**	6/1983 to 5/2010	1304	934	498	338	211	88	42	18	12	-
17	**Pathagudem**	6/1965 to 5/2010	32757	28321	26448	23336	20090	18586	17147	15503	12071	-
18	**Perur**	12/1965 to 5/2010	111919	96934	81831	68751	64931	62646	43918	39093	32422	-
19	**Polavaram**	12/1965 to 5/2010	133309	106631	97432	93344	85937	72802	58463	55358	45081	-
20	**Potteru (Seasonal)**	6/1997 to 11/2009	3180	2986	2486	2298	2042	1905	1849	1677	1034	-
21	**Purna**	6/1969 to 5/2010	4996	3460	2274	1728	1262	805	435	317	238	-
22	**Saigaon**	6/1967 to 5/2010	2720	1906	1085	793	699	440	228	155	32	-
23	**Sangam**	6/1996 to 5/2010	437	406	357	338	282	247	174	120	66	-
24	**Saradaput**	6/1970 to 5/2010	7094	5942	5678	5502	4784	4286	4024	3773	3085	-
25	**Somanpally (Seasonal)**	12/1966 to 1/2010	3110	1935	1459	1171	862	703	571	385	277	-
26	**Sonarpal**	12/1991 to 5/2010	1107	941	803	785	660	629	543	395	353	-
27	**Tumnar**	12/1991 to 5/2010	2014	1795	1592	1273	1214	1126	867	610	506	-
28	**Yelli**	6/1978 to 5/2010	13392	9142	4867	3600	2904	2240	1699	1342	827	-
29	**Zari**	6/1987 to 5/2010	1362	770	591	451	367	299	146	120	54	-

Source : SE, Godavari Circle, Central Water Commission.

Table 7 : Annual dependable flow of water by site and river basin

VI **Basin : Krishna** Unit: M. C. M.

Sl. No.	Site Name	Period/ Year	Dependable flow									
			10%	20%	30%	40%	50%	60%	70%	80%	90%	100%
1	2	3	4	5	6	7	8	9	10	11	12	(13)
1	**Arjunwad (Seasonal)**	1/1969 to 11/2009	11307	10083	8845	8070	7582	6026	5151	4511	2895	-
2	**Bawapuram**	6/1965 to 5/2010	10288	8010	6160	5634	5038	4624	3796	2542	1530	-
3	**Cholachguda (Seasonal)**	6/1982 to 11/2009	1506	1297	1060	1005	893	763	672	465	333	-
4	**Dameracherla**	7/1968 to 5/2010	1811	1638	1485	1027	852	756	650	563	494	-
5	**Gokak Falls (Seasonal)**	7/1971 to 11/2009	3458	2829	2277	2174	1906	1428	1230	894	569	-
6	**Halia**	7/1984 to 5/2010	506	230	166	134	121	69	55	25	19	-
7	**Huvinhedigi**	2/1976 to 5/2010	25274	22760	21712	20040	17131	14062	11526	9940	6655	-
8	**Karad**	6/1965 to 5/2010	7084	6726	5315	5023	4132	3689	3378	2887	2442	-
9	**Keesara**	6/1965 to 5/2010	4270	2998	2520	1985	1597	1244	933	748	416	-
10	**Kurundwad**	5/1972 to 5/2010	16759	15352	13248	12531	10797	8996	8346	6034	5348	-
11	**Madhira**	6/1984 to 5/2010	1032	756	681	611	516	425	280	215	134	-
12	**Malkhed**	8/1990 to 5/2010	1648	1105	1044	920	587	454	280	187	106	-
13	**Mantralayam**	6/1972 to 5/2010	12337	9875	7425	6779	6163	5606	4788	3487	2461	-
14	**Narasingpur**	12/1966 to 5/2010	10441	7799	6897	6065	5082	3716	2724	1933	359	-
15	**Phulgaon (Seasonal)**	6/1992 to 11/2009	2728	2102	1394	1248	1134	964	927	664	603	-
16	**Sadalgi (Seasonal)**	6/1969 to 11/2009	3849	3316	3004	2746	2592	2417	2189	1786	1444	-
17	**Samdoli (Seasonal)**	12/1966 to 11/2009	4470	4006	3542	3342	3099	2708	2376	1791	1469	-
18	**Sarati**	6/1965 to 5/2010	2279	1863	1667	1500	1259	1068	852	498	168	-
19	**T Ramapuram (Seasonal)**	12/1965 to 11/2009	1360	1098	1027	921	789	741	545	449	342	-
20	**Takli**	6/1965 to 5/2010	10836	9109	8121	7132	5418	4988	2845	2138	547	-
21	**Talikot (Seasonal)**	9/1995 to 11/2009	698	400	328	228	172	153	130	122	57	-
22	**Terwad (Seasonal)**	8/1979 to 11/2009	6937	5463	4944	4178	3971	3553	3172	3007	2561	-
23	**Vijayawada**	6/1965 to 5/2010	40357	35032	31536	28113	26177	19207	10338	6503	3868	-
24	**Wadakbal**	6/1965 to 5/2010	2263	1469	1023	819	582	516	264	189	89	-
25	**Wadenapally**	12/1965 to 5/2010	44413	39492	36372	35221	27539	21884	16381	10785	5977	-
26	**Warunji**	1/1966 to 5/2010	4791	3956	3294	2845	2414	2303	2055	1769	1511	-
27	**Yadgir**	6/1965 to 5/2010	15121	13959	12204	10566	8564	7649	4660	3617	2650	-

Source : Sub Division Engineer, Krishna & Coordination Circle, CWC, Hyderabad.

Table 7 : Annual dependable flow of water by site and river basin

VII **Basin : Cauvry** Unit: M. C. M.

Sl. No.	Site Name	Period/ Year	Dependable flow									
			10%	20%	30%	40%	50%	60%	70%	80%	90%	100%
1	2	3	4	5	6	7	8	9	10	11	12	13
1	Akkihebbal	1/2002 to 5/2009	Sufficient data not available									
3	Annavasal	2/1999 to 5/2009	43	38	32	26	24	21	8	2	0	-
4	Bendrahalli	8/2005 to 5/2009	Sufficient data not available									
5	Biligundulu	8/1971 to 5/2009	11390	10090	9464	8978	7330	6341	5487	5161	3578	-
6	Chunchunkatte	6/2008 to 5/2009	Sufficient data not available									
8	Elunuthimangalam	8/1998 to 5/2009	238	179	150	137	29	28	22	13	11	-
9	Gopurajapuram	2/1999 to 5/2009	108	86	80	69	53	46	29	5	1	-
10	Hogenakkal	10/1996 to 5/2009	163	144	92	47	40	26	16	4	2	-
11	K.M.Vadi	6/1979 to 5/2009	675	497	437	332	309	266	212	142	104	-
12	Kodumudi	6/1971 to 5/2009	13086	12326	11202	9492	8967	7565	6424	5394	4376	-
13	Kollegal	2/1971 to 5/2009	9934	9548	8073	7551	6663	5253	4648	4160	3791	-
14	Kudige	11/1973 to 5/2009	4197	3453	3090	2760	2533	2369	2192	2035	1543	-
15	Kudlur	3/1999 to 5/2009	91	68	46	36	30	13	8	7	3	-
16	M.H.Halli	10/1978 to 5/2009	2548	2137	1504	1040	996	845	689	579	403	-
18	Musiri	6/1972 to 11/2009	13380	12465	9963	8920	7580	6424	5087	4531	2395	-
19	Muthankera	6/1973 to 5/2009	3490	3163	2860	2569	2364	2244	2163	1993	1721	-
20	Nallamaranpatty	12/1977 to 5/2009	903	500	325	275	201	144	54	45	32	-
21	Nallathur	6/2006 to 5/2009	Sufficient data not available									
22	Nellithurai	6/1979 to 5/2009	2068	1755	1604	1308	1180	1094	904	791	552	-
23	Peralam	2/1999 to 5/2009	27	26	23	21	20	13	8	3	0	-
24	Porakudi	2/1999 to 5/2009	163	150	141	131	114	86	46	18	6	-
26	Sakleshpur	4/2002 to 5/2009	Sufficient data not available									
27	Savandpur	6/1978 to 5/2009	975	901	731	653	616	553	499	461	423	-

Contd.

28	Sevnur	9/1999 to 5/2009	22	18	10	9	8	8	6	1	0	-
29	T. Bekuppe	9/2003 to 5/2009	Sufficient data not available									
30	T.K.Halli	6/1978 to 5/2009	1210	984	749	711	666	591	550	472	292	-
31	T.Narasipur	3/1971 to 5/2009	4355	3930	3299	3117	2842	2553	2315	2179	1934	-
32	Thengudi	7/1997 to 5/2009	225	204	177	173	165	156	148	82	26	-
33	Thengumarahada	6/1979 to 5/2009	558	411	345	317	274	260	231	194	167	-
34	Thevur	9/1999 to 5/2009	45	18	17	14	10	8	4	0	0	-
35	Thimmanahalli	6/2000 to 5/2009	Sufficient data not available									
37	Thopper	10/1999 to 5/2009	27	14	3	1	1	0	0	0	0	-
38	Uccadai	10/1999 to 12/2003	Sufficient data not available									
39	Urachikottai	6/1979 to 5/2009	11447	10116	8623	7875	6768	6319	5585	5065	3080	-

Source :River Data Directorate, Central Water Commission.

Table 7 : Annual dependable flow of water by site and river basin

VIII Basin : East Flowing Rivers from Mahanadi to Kanyakumari Unit: M. C. M.

Sl. No.	Site Name	Period/ Years	Dependable flow									
			10%	20%	30%	40%	50%	60%	70%	80%	90%	100%
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
1	ANAKAPALLI	8/1989 to 5/2007	1176	973	631	450	312	272	231	168	96	-
2	GUNUPUR	6/1989 to 5/2007	3423	2997	2444	2187	1677	1215	1131	964	615	-
3	KASHINAGAR	6/1971 to 5/2007	4164	3454	2955	2489	2269	2096	1754	1383	1112	-
4	PURUSHOTTAMPUR	6/1989 to 5/2007	3350	2925	2705	2552	2085	1587	1387	1099	970	-
5	SRIKAKULAM	8/1990 to 5/2007	3922	3210	3087	2521	2365	1937	1569	1295	1089	-

Source :River Data Directorate, Central Water Commission.

Table 7 : Annual dependable flow of water by site and river basin

IX **Basin : West Flowing Rivers from Kanyakumari to Tapi** Unit: M. C. M.

Sl. No.	Site Name	Period/ Years	Dependable flow									
			10%	20%	30%	40%	50%	60%	70%	80%	90%	100%
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
1	ADDOOR	7/2003 to 5/2008	Sufficient data not available									
2	AMBARAMPALAYAM	6/1978 to 5/2009	558	405	360	300	287	274	264	244	229	-
3	ARANGALY	4/1978 to 5/2009	2743	2454	1975	1815	1675	1626	1422	1378	1207	-
4	ASHRAMAM	9/1999 to 5/2009	222	165	156	139	107	83	77	56	14	-
5	AVERSHE	6/2002 to 5/2008	Sufficient data not available									
6	AYILAM	12/1978 to 5/2009	931	853	767	706	616	541	527	445	362	-
7	BANTWAL	11/1970 to 5/2008	15137	13849	12524	11918	11050	10177	9549	9085	7565	-
8	ERINJIPUZHA	6/1985 to 5/2009	2932	2794	2485	2332	2258	2133	1872	1817	1591	-
9	HALADI	12/1985 to 5/2008	2496	2237	2113	2041	1853	1726	1554	1468	1290	-
11	KALAMPUR	6/1986 to 5/2009	1465	1348	1274	1243	1148	1041	970	924	855	-
12	KALLOOPPARA	6/1985 to 5/2009	2171	2059	1988	1934	1791	1549	1444	1316	1240	-
13	KARATHODU	6/1986 to 5/2009	1972	1611	1496	1213	1150	1048	1006	887	805	-
14	KIDANGOOR	7/1985 to 5/2009	2213	1996	1817	1752	1702	1502	1425	1362	1183	-
15	KUMBIDI	5/1979 to 5/2009	6619	5708	5026	4140	3973	3804	3591	2792	2243	-
16	KUNIYIL	1/1979 to 5/2009	6003	5368	4689	4112	3852	3433	3323	2570	586	-
17	KUTTYADI	3/2000 to 5/2009	Sufficient data not available									
18	KUZHITHURAI	11/2000 to 5/2009	Sufficient data not available									
19	MALAKKARA	6/1985 to 5/2009	5200	4535	4277	4064	3697	3596	3444	3163	2338	-
20	MANKARA	6/1985 to 5/2009	1487	1046	836	598	459	447	432	388	308	-
21	NEELESWARAM	3/1971 to 5/2009	10067	8911	8142	7331	6626	6305	5908	5602	4678	-
22	PATTAZHY	4/1978 to 5/2009	2047	1894	1537	1454	1375	1227	1128	983	809	-
23	PERUMANNU	6/1985 to 5/2009	4796	4688	4071	3685	3602	3272	3070	2978	2705	-
24	PUDUR	9/1985 to 5/2009	557	375	295	240	207	205	175	155	103	-
25	PULAMANTHOLE	2/1986 to 5/2009	2387	2176	1948	1811	1635	1606	1378	1252	910	-
26	RAMAMANGALAM	4/1978 to 5/2009	6184	5720	5428	5164	4910	4594	4241	4020	3597	-
27	SANTEGULI	6/1988 to 5/2008	6232	6011	5433	4877	4458	3820	3557	3419	2680	-
28	THUMPAMON	12/1977 to 5/2009	1614	1444	1289	1236	1115	987	913	828	720	-
29	VANDIPERIYAR	6/2000 to 5/2009	Sufficient data not available									
30	YENNEHOLE	7/1989 to 5/2008	1804	1746	1638	1551	1477	1407	1332	1273	1033	-

Source :River Data Directorate, Central Water Commission.

Table 7 : Annual dependable flow of water by site and river basin

X **Basin : Tapi** Unit : M.C.M

Sl. No.	Site Name	Period/ Years	Dependable flow									
			10%	20%	30%	40%	50%	60%	70%	80%	90%	100%
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
1	Motinaroli	10/1990 to 5/2010	804.0	645.9	561.0	432.0	350.9	249.6	220.5	197.3	132.0	-
2	Pingalwada	6/1989 to 5/2010	999.9	691.6	595.0	532.0	451.6	402.0	329.0	201.0	120.7	-
3	Ambica at Gadat	3/1979 to 5/2010	2288.1	1901.7	1706.8	1593.2	1331.4	1192.0	1071.9	941.6	692.6	-
4	Damanganga at Nanipalsan	6/1991 to 5/2010	1734.0	1229.9	1031.1	934.6	840.7	808.4	668.5	635.2	466.8	-
5	Purna at Mahuwa	6/1971 to 5/2010	2551.7	2002.0	1594.5	1258.2	1161.8	1051.6	873.3	711.1	403.0	-
6	Vaitarna at Durvesh	6/1971 to 5/2010	5025.4	4081.8	3689.1	3501.9	3058.0	2738.2	2311.8	2005.7	1660.7	-
7	Wagh at Ozerkheda	6/1991 to 5/2010	1700.7	1436.1	1058.2	1016.7	943.5	904.2	859.5	654.0	591.9	-

Source : Executive Engineer, Tapi Division, CWC, Surat.

Table 7 : Annual dependable flow of water by site and river basin

XI **Basin: Narmada** Unit: M. C. M.

Sl. No.	Site Name	Period/ Years	Dependable flow									
			10%	20%	30%	40%	50%	60%	70%	80%	90%	100%
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
1	Orsang at Chandawada	80-81 T0 2009-10	2634	2231	1859	1404	1043	892	730	468	293	42
2	Narmad at Garudeswar	73-74 T0 2009-10	49016	40341	35497	32565	26323	24412	22891	20725	13949	4492
3	Hathni at Jobat	01-02 To2005-06	Discharge started w.e.from 09.08.2001 and closed on 1.4.2006									-
4	Goi at Pati	99-00To2005-06	Discharge started w.e.from 23.02.1999 and closed on 1.4.2006									-
5	Uri at Dhulsar	99-00 To 2005-06	Discharge started w.e.from 15.03.1999 and closed on 1.4.2006									-
6	Narmada at Rajghat	72-73 T0 2006-07	47047	40916	35720	34582	28823	26286	24401	22273	19820	12563
7	Narmada at Mandleswar	72-73 T0 2009-10	48839	40112	34871	32994	27854	24512	23573	22077	18998	12656
8	Kundi at Kogaon	78-79 T0 2009-10	1878	1507	1311	980	833	643	576	346	175	112

Contd.

9	chhota tawa at Ginnore	71-72 T0 1998-99	3110	2691	2465	2267	2130	1962	1524	1148	738	503
10	Narmada at Motakka	99-00 To 2006-07	Discharge started w.e.from 23.08.1999 and closed on 1.7.2007									-
11	Narmada at Handia	77-78 T0 2009-10	34024	31304	27506	25088	21768	20731	18787	16554	13376	10397
12	Ganjal at Chhidgaon	77-78 T02009-10	1621	1536	1387	1134	812	691	589	514	377	235
13	Narmada at Hoshangabad	72-73 T0 2009-10	34390	29036	24008	21172	19328	17089	16632	13070	11600	5101
14	Tawa at Tawakati	01-02 TO2005-06	Discharge started w.e.from 10.05.2001 and closed on 1.4.2006									-
15	Machna at Shapur	01-02 TO 2005-06	Discharge started w.e.from 20.06.2000 and closed on 1.4.2006									-
16	Narmada at Sandia	78-79 T0 2009-10	23560	17763	15947	14444	12992	12073	11100	9412	8398	5471
17	Shakkar at Gadarwara	77-78T0 2009-10	2302	1870	1546	1406	1288	980	844	724	619	438
18	Narmada at Barmanghat	72-73 T0 2009-10	19000	17465	13264	12205	10952	9456	8594	7096	6264	3978
19	Sher at Belkheri	77-78 T0 2009-10	1293	849	771	720	642	603	509	448	401	208
20	Hiran at Patan	79-80 T0 2009-10	2988	2119	1838	1586	1524	1345	1232	791	585	480
21	Banjar at Bamni	99-00 To 2009-10	1402	1033	784	705	648	586	545	448	249	60
22	Narmada at Jamtara	72-73 T0 2000-01	13121	11553	10635	10468	9315	8929	7661	5907	5041	2681
23	Banjar at Hridyanagar	77.78 T0 2001-02	2917	2052	1864	1463	1384	1164	1053	937	753	513
24	Burhner at Mohgaon	78-79 T0 2009-10	3658	2733	2474	2379	2173	2043	1628	1502	1251	544
25	Narmada at Amgaon	01-02 To2005-06	Discharge started w.e.from 07.09.2001 and closed on 1.4.2006									-
26	Narmada at Manot	77-78 T0 2009-10	4404	3986	3658	3373	3008	2737	2236	1963	1514	939
27	Narmada at Dindori	88-89 T0 2009-10	1704	1388	1283	1223	1167	1110	912	770	661	588

Source : Executive Engineer, Tapi Division, CWC, Surat.

Table 7 : Annual dependable flow of water by site and river basin

XII **Basin : Mahi and Sabarmati** Unit: M. C. M.

Sl. No.	Site Name	Period/ Years	Dependable flow									
			10%	20%	30%	40%	50%	60%	70%	80%	90%	100%
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
1	Anas at Chakaliya	6/1995 to 5/2010	4520	3091	2023	1809	1125	779	505	330	94	-
2	Balaram at Chitrasani	6/1995 to 5/2010	69	30	13	6	6	5	4	0	0	-
3	Banas at Abu Road	6/1995 to 5/2010	312	65	59	44	26	17	10	5	3	-
4	Banas at Kamalpur	6/1995 to 5/2010	356	194	70	41	18	11	4	1	0	-
5	Banas at Sarotry	6/1995 to 5/2010	483	194	118	95	47	22	16	8	5	-
6	Bhadar at Ganod	6/1995 to 5/2010	1301	720	285	176	125	79	67	37	6	-
7	Jakham at Dhariawad	6/1995 to 5/2010	662	299	129	114	56	44	33	28	25	-
8	Luni at Balotra	6/1995 to 5/2010	404	163	72	17	0	0	0	0	0	-
9	Luni at Gandhav	6/1995 to 3/2010	332	222	56	15	8	1	0	0	0	-
10	Machhu at Gungan	6/1995 to 5/2010	504	281	139	24	17	14	8	7	4	-
11	Mahi at Khanpur	6/1995 to 5/2010	14034	7872	6768	3570	2779	822	725	554	459	-
12	Mahi at Mataji	6/1995 to 5/2010	3322	2041	1551	1260	1055	942	274	228	151	-
13	Mahi at Paderdibadi	6/1995 to 5/2010	6160	1789	1404	1030	662	444	358	315	222	-
14	Rupen at Sapawada	6/1995 to 5/2010	225	182	79	31	25	21	15	2	0	-
15	Sabarmati at Derol Bridge	6/1995 to 5/2010	1562	612	189	161	26	18	14	10	1	-
16	Sabarmati at Kheroj	6/1995 to 5/2010	752	434	246	200	136	124	100	45	37	-
17	Sabarmati at Voutha	8/1999 to 5/2010	6351	5017	3978	2764	1291	779	219	123	70	-
18	Shetrunji at Lowara	6/1995 to 5/2010	1145	970	457	202	177	124	95	39	14	-
19	Som at Rangeli	6/1995 to 5/2010	1656	511	409	327	229	180	143	118	76	-
20	Wakal at Kotra(Jotasan)	6/1995 to 5/2010	655	290	106	101	62	58	47	40	18	-
21	Watrak at Gadvel (Ratanpur)	6/1995 to 5/2010	1269	558	512	336	115	47	43	36	17	-
22	Watrak at Kheda	6/1995 to 5/2010	2178	909	577	341	113	73	35	21	0	-

Source: Executive Engineer, Mahi Division, CWC, Gandhi Nagar.

Table 8 : Monthly average flow per unit drainage area by site and river basin

I Basin : Mahanadi *Unit : Millimeter*

Sl.No.	Site Name	Reference Period	June	July	August	September	October	November	December	January	February	March	April	May
(1)	**(2)**	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)
1	**Andhiarkhore**	9/1977 to 5/2008	7.51	29.42	44.54	41.83	15.59	6.19	4.09	3.08	2.45	1.53	0.77	0.55
2	**Bamnidhi**	6/1971 to 5/2008	28.84	111.84	151.51	95.81	29.05	16.12	14.47	11.29	8.86	8.09	8.15	7.93
3	**Baronda**	12/1977 to 3/2008	20.60	93.26	169.93	95.06	27.54	5.21	1.53	0.76	0.59	0.30	0.13	0.37
4	**Basantpur**	6/1971 to 5/2008	14.68	75.22	137.42	90.05	31.86	10.64	5.25	3.76	2.99	2.29	1.73	1.41
5	**Ghatora**	9/1979 to 5/2008	11.80	64.27	103.93	89.22	25.19	7.19	4.04	3.53	1.78	0.99	0.55	0.45
6	**Jondhra**	7/1979 to 5/2008	9.12	54.54	99.94	76.89	28.19	7.90	2.76	1.90	1.46	0.79	0.40	0.30
7	**Kantamal**	8/1971 to 5/2008	25.31	112.37	185.89	120.38	43.01	18.50	8.82	4.91	3.53	2.70	2.35	3.51
8	**Keloatraigarh**	9/1995 to 10/2007	23.63	143.64	248.77	173.44	17.91	-	-	-	-	-	-	-
9	**Kesinga**	11/1978 to 5/2008	36.50	125.01	192.48	111.58	44.19	17.81	10.56	5.50	4.66	4.39	4.23	6.34
10	**Kotni**	9/1978 to 5/2008	13.32	56.65	115.01	60.76	22.53	3.99	1.02	0.63	0.66	0.09	0.02	0.03
11	**Kurbhata**	4/1978 to 5/2008	25.28	129.87	163.79	124.79	38.94	15.20	8.59	7.42	4.28	2.36	0.82	0.85
12	**Manendragarh**	6/1989 to 1/2008	16.76	86.60	92.23	77.74	24.42	7.35	5.93	4.34	3.45	3.34	1.41	0.13
13	**Pandigaon**	6/1989 to 4/2001	16.05	123.92	210.61	125.65	48.64	23.94	7.71	3.34	1.56	0.81	0.49	5.15
14	**Parmanpur**	7/2001 to 10/2007	54.58	345.42	333.44	221.65	50.86	-	-	-	-	-	-	-
15	**Pathardih**	1/1989 to 12/2007	12.38	93.79	161.58	97.36	41.58	7.11	1.91	1.44	1.80	0.81	0.70	1.04
16	**Rajim**	6/1971 to 5/2008	14.54	68.17	134.96	76.45	24.45	5.12	1.23	0.67	0.55	0.33	0.22	0.32
17	**Rampur**	6/1971 to 1/2008	20.73	111.18	187.71	114.05	27.45	6.69	1.26	0.54	0.27	0.07	0.01	0.03
18	**Salebhata**	11/1971 to 5/2008	17.37	92.34	174.03	95.51	23.65	5.32	1.23	1.17	1.35	1.05	0.66	0.44
19	**Seorinarayan**	12/1985 to 5/2008	13.27	70.07	123.72	86.83	33.03	9.07	2.80	1.80	1.45	0.73	0.41	0.33
20	**Simga**	9/1971 to 5/2008	5.18	31.87	61.62	42.64	16.01	3.93	1.40	0.98	0.79	0.43	0.28	0.25
21	**Sukma**	6/1989 to 7/2006	10.04	101.59	155.70	90.09	26.20	8.73	1.45	1.17	0.08	0.01	0.00	0.16
22	**Sundrgarh**	12/1977 to 5/2008	38.19	146.33	161.79	134.79	38.31	15.59	5.94	6.51	3.28	1.83	0.83	1.01
23	**Tikapara**	5/1972 to 5/2008	13.64	71.56	129.08	91.18	30.31	12.41	7.59	6.79	6.08	6.55	6.43	6.06

Source :River Data Directorate, Central Water Commission.

Table 8 : Monthly average flow per unit drainage area by site and river basin

Unit : Millimeter

II Basin : Subarnarekha, Burhabalang & Baitarni

Sl.No.	Site Name	Reference Period	June	July	August	September	October	November	December	January	February	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)
1	**ADITYAPUR**	11/1971 to 12/2007	29.92	84.71	149.05	109.25	43.79	10.64	3.25	2.56	2.07	1.45	1.28	2.05
2	**ANANDPUR**	3/1972 to 5/2007	40.54	91.55	180.12	134.46	66.62	20.68	6.84	5.02	3.78	2.99	2.46	6.06
3	**FENKOGHAT**	6/1988 to 10/2007	38.81	141.33	203.07	182.81	78.57	-	-	-	-	-	-	-
4	**CHAMPUA**	7/1990 to 5/2007	33.12	96.96	170.65	136.18	79.18	34.27	15.17	13.10	9.18	7.88	6.42	8.61
5	**GHATSHILA**	6/1971 to 12/2007	31.16	86.59	139.45	119.04	51.08	16.25	6.77	3.95	3.02	2.19	1.98	2.59
6	**GOVINDPUR**	3/1992 to 12/2007	36.13	106.01	186.02	189.04	105.11	51.43	15.85	7.01	5.08	4.00	4.16	9.42
7	**JAMSHEDPUR**	2/1972 to 12/2007	31.07	101.41	169.23	141.33	63.54	21.51	8.54	5.41	3.20	2.01	1.77	2.54
8	**JAMSHOLAGHAT**	6/2004 to 11/2007	2.99	52.70	144.75	99.40	43.96	6.10	0.27	-	-	0.44	1.09	0.67
9	**MURI**	11/1989 to 12/2007	12.03	68.69	108.48	109.15	75.87	50.81	45.77	30.98	19.17	12.28	7.15	5.85

Source :River Data Directorate, Central Water Commission.

Table 8 : Monthly average flow per unit drainage area by site and river basin

Unit : Millimeter

III Basin : Brahmani

Sl.No.	Site Name	Reference Period	June	July	August	September	October	November	December	January	February	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)
1	**ALTUMA**	7/1990 to 5/2008	48.43	133.13	244.76	170.23	88.18	24.98	6.58	6.99	7.98	10.71	14.57	10.60
2	**BOLANI**	3/1972 to 6/1996	25.93	111.08	150.67	110.41	33.41	11.83	5.07	3.85	2.91	2.51	1.86	2.36
3	**GOMLAI**	1/1979 to 5/2008	32.01	118.55	154.93	115.25	40.40	12.42	5.53	4.61	3.27	2.43	1.79	2.47
4	**JARAIKELA**	8/1972 to 5/2008	33.52	115.96	158.31	123.40	46.35	14.56	6.89	5.19	3.93	2.47	1.53	2.42
5	**JENAPUR**	7/1979 to 5/2008	21.15	89.92	140.00	109.86	51.96	22.07	14.78	13.13	10.40	11.43	10.45	10.54
6	**PANPOSH**	6/1996 to 5/2008	29.10	121.90	169.01	129.74	52.18	16.14	7.59	7.19	4.59	3.07	2.55	3.01
7	**TALCHER**	8/1985 to 6/1996	20.38	105.46	121.51	100.04	51.59	28.08	23.44	24.22	18.83	17.25	13.05	12.26
8	**TILGA**	6/1979 to 5/2008	36.51	149.84	172.21	144.63	54.55	20.07	9.16	7.56	4.86	3.07	1.68	2.20

Source :River Data Directorate, Central Water Commission.

Table 8 : Monthly average flow per unit drainage area by site and river basin

IV Basin : Rushikulya, Vamsadhara, Sarada & Nagavali

Sl.No.	Site Name	Period	June	July	August	September	October	November	December	January	February	March	April	May
(1)	**(2)**	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)
I	**Basin : RUSHIKULYA**													
	Purushottampur	1978 to 2007	11.53	29.17	72.73	68.32	84.81	25.65	6.24	2.47	1.25	0.66	0.43	11.34
II	**Basin : VAMSADHARA**													
	Kashinagar	1971 to 2007	10.05	38.34	80.40	84.61	57.91	23.18	9.06	4.92	2.74	2.19	1.80	6.00
	Gunupur	1978 to 2007	11.34	54.80	82.77	76.72	54.88	19.95	9.32	5.13	3.56	2.74	2.88	3.53
III	**Basin : NAGAVALI**													
	Srikakulam	1988 to 2007	8.51	31.49	58.26	59.78	51.37	20.63	9.09	4.41	1.94	0.85	1.42	5.15
IV	**Basin : SARADA**													
	Anakapalli	1987 to 2007	7.52	13.53	31.28	45.67	83.20	36.58	8.85	3.95	1.65	1.11	0.60	3.10

Source : Wainganga Division, Central Water Commission.

Table 8 : Monthly average flow per unit drainage area by site and river basin

V **Basin : Godavari** Unit : Millimeter

Sl.No.	Site Name	Period	June	July	August	September	October	November	December	January	February	March	April	May
(1)	**(2)**	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)
1	**Ambabal**	6/1993 to 5/2010	17.69	95.05	160.05	102.98	38.68	10.13	4.97	4.96	2.41	1.38	1.14	1.37
2	**Betmogrra**	6/1997 to 5/2010	0.82	7.07	39.65	29.75	35.23	2.00	0.33	0.35	0.23	0.24	0.01	0.02
3	**Bhadrachalam**	6/2007 to 5/2010	1.03	35.47	95.26	55.35	20.08	4.41	2.30	1.37	1.13	0.90	0.72	0.35
4	**Cherribeda**	6/1996 to 5/2010	35.13	146.40	270.71	152.45	55.71	17.25	6.04	3.73	2.36	0.92	1.25	0.37
5	**Chindnar**	6/1971 to 5/2010	21.25	101.19	178.20	112.23	41.89	12.69	5.93	4.11	2.62	2.09	1.70	2.49
6	**Degloor**	6/1987 to 5/2010	4.46	21.12	62.12	51.65	30.49	3.11	0.50	0.24	0.03	0.02	0.01	0.39
7	**Dhalegaon**	6/1965 to 5/2010	3.26	12.82	26.03	26.42	10.27	1.79	1.26	0.61	0.51	0.39	0.26	0.33
8	**G.R.Bridge**	6/1976 to 5/2010	2.66	8.37	18.01	19.62	9.56	1.66	0.94	0.54	0.47	0.38	0.22	0.27
9	**Gandlapet**	7/1986 to 5/2010	3.32	21.55	55.77	26.14	22.03	1.20	0.11	0.14	0.00	0.00	0.00	0.00
10	**Jagdalpur**	6/1965 to 5/2010	27.36	102.48	164.68	110.94	42.10	14.49	9.51	7.07	4.82	4.61	3.85	5.05
11	**Konta**	12/1965 to 5/2010	36.05	116.54	211.05	138.15	72.92	35.27	27.67	23.95	21.39	22.64	20.17	20.24
12	**Kosagumda**	11/1996 to 5/2010	38.73	103.47	208.07	125.41	47.13	11.85	3.96	2.14	1.70	0.88	0.92	2.04
13	**Mancherial**	6/1966 to 5/2010	1.82	13.12	34.90	33.55	19.39	3.38	1.52	0.97	0.80	0.84	0.46	0.30
14	**Murthahandi**	12/1988 to 5/2010	-	-	-	-	-	-	-	-	-	-	-	-
15	**Nowrangpur**	12/1965 to 5/2010	41.21	150.65	233.15	162.14	63.75	27.43	22.05	16.96	11.15	11.07	8.77	11.13
16	**Pachegaon**	6/1983 to 5/2010	1.10	10.84	31.53	23.43	10.15	0.80	0.11	0.01	0.00	0.00	0.00	0.00
17	**Pathagudem**	6/1965 to 5/2010	18.49	118.25	225.22	130.20	44.61	12.15	5.31	3.25	1.90	1.27	0.95	1.29
18	**Perur**	12/1965 to 5/2010	7.37	48.03	96.96	65.03	25.88	6.36	2.96	1.82	1.36	1.09	0.65	0.55
19	**Polavaram**	12/1965 to 5/2010	7.25	49.57	103.89	68.62	29.39	8.11	4.40	3.13	2.44	2.30	1.85	1.85
20	**Potteru (Seasonal)**	6/1997 to 11/2009	166.11	247.81	380.09	234.03	184.25	143.67	123.95	111.75	107.24	126.82	122.47	122.58
21	**Purna**	6/1969 to 5/2010	7.16	17.51	35.93	40.52	15.43	2.35	1.12	0.71	0.70	0.54	0.60	0.84
22	**Saigaon**	6/1967 to 5/2010	3.47	8.84	18.72	43.46	24.95	3.05	0.81	0.65	0.24	0.27	0.01	0.11
23	**Sangam**	6/1996 to 5/2010	3.52	27.98	69.15	51.90	16.71	6.44	3.54	0.96	0.40	1.05	0.28	0.13
24	**Saradaput**	6/1970 to 5/2010	100.86	288.81	500.64	329.79	157.75	68.11	48.09	35.99	30.00	29.09	27.51	32.52
25	**Somanpally (Seasonal)**	12/1966 to 1/2010	2.00	15.98	38.58	27.59	16.82	4.60	1.49	0.94	0.69	0.70	0.46	0.57
26	**Sonarpal**	12/1991 to 5/2010	20.67	106.06	179.21	118.62	34.63	8.87	2.98	2.00	1.19	0.68	0.82	0.96
27	**Tumnar**	12/1991 to 5/2010	31.51	144.10	283.79	179.50	76.54	22.48	8.78	5.49	3.23	2.15	2.23	2.18
28	**Yelli**	6/1978 to 5/2010	4.44	12.11	26.14	28.09	14.41	1.75	0.89	0.56	0.50	0.42	0.31	0.46
29	**Zari**	6/1987 to 5/2010	6.39	16.39	21.52	26.81	15.69	1.86	0.22	0.03	0.00	0.01	0.00	0.03

Source : SE, Godavari Circle, Central Water Commission.

Table 8 : Monthly average flow per unit drainage area by site and river basin

VI **Basin : Krishna** Unit: Millimeter

Sl. No.	Site Name	Reference Period	June	July	August	September	October	November	December	January	February	March	April	May
1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
1	**Arjunwad (Seasonal)**	1/1969 to 11/2009	35.12	203.27	247.07	84.88	36.12	3.86	0.15	0.03	0.02	0.03	0.43	0.17
2	**Bawapuram**	6/1965 to 5/2010	2.11	6.29	27.93	18.91	16.12	4.96	1.34	0.58	0.40	0.35	0.34	0.94
3	**Cholachguda (Seasonal)**	6/1982 to 11/2009	9.97	5.38	11.90	22.17	21.27	8.68	5.06	4.01	2.48	1.43	0.78	2.49
4	**Dameracherla**	7/1968 to 5/2010	0.83	3.15	12.25	18.85	21.57	11.21	4.64	4.73	4.64	4.99	3.17	1.04
5	**Gokak Falls (Seasonal)**	7/1971 to 11/2009	33.96	228.62	300.64	72.47	27.33	10.53	6.10	4.53	2.89	2.55	2.53	2.93
6	**Halia**	7/1984 to 5/2010	0.98	2.17	3.82	16.15	20.04	6.40	1.83	0.98	0.84	0.92	0.64	0.32
7	**Huvinhedigi**	2/1976 to 5/2010	10.42	82.08	123.60	49.53	27.02	5.47	2.90	2.24	2.02	1.90	1.27	1.38
8	**Karad**	6/1965 to 5/2010	52.00	266.50	306.90	109.97	44.57	13.91	12.74	12.64	12.69	14.68	15.29	15.43
9	**Keesara**	6/1965 to 5/2010	2.63	21.39	60.38	48.49	34.10	11.68	5.30	2.62	1.45	1.45	0.89	4.11
10	**Kurundwad**	5/1972 to 5/2010	44.16	259.97	312.50	98.00	39.16	4.03	0.59	0.08	0.03	0.12	0.10	0.20
11	**Madhira**	6/1984 to 5/2010	3.51	19.52	77.87	75.62	56.29	25.11	14.70	8.74	6.19	5.65	3.85	5.84
12	**Malkhed**	8/1990 to 5/2010	2.68	8.38	18.67	29.96	29.70	3.91	1.87	1.30	0.82	1.11	0.38	0.49
13	**Mantralayam**	6/1972 to 5/2010	2.44	8.49	34.28	23.69	19.75	7.96	3.14	2.27	1.92	2.10	1.38	0.93
14	**Narasingpur**	12/1966 to 5/2010	6.88	55.43	85.98	47.54	22.64	3.31	1.96	1.31	0.74	1.08	0.86	1.05
15	**Phulgaon (Seasonal)**	6/1992 to 11/2009	17.58	206.24	263.91	100.87	31.45	3.02	0.00	0.00	0.00	0.00	0.00	0.00
16	**Sadalgi (Seasonal)**	6/1969 to 11/2009	70.73	421.10	464.06	126.64	52.04	3.76	0.00	0.03	0.00	0.00	0.00	0.09
17	**Samdoli (Seasonal)**	12/1966 to 11/2009	102.67	577.95	645.24	193.33	69.01	3.89	0.55	0.04	0.00	0.00	0.01	0.00
18	**Sarati**	6/1965 to 5/2010	5.74	40.05	61.24	40.12	22.63	3.90	2.33	1.26	0.65	0.29	0.10	1.20
19	**T Ramapuram (Seasonal)**	12/1965 to 11/2009	1.27	1.20	2.92	9.59	10.68	4.59	2.43	1.19	0.58	0.26	0.15	0.67
20	**Takli**	6/1965 to 5/2010	4.77	34.41	59.30	39.25	22.74	3.78	1.70	0.88	0.44	0.30	0.18	0.57
21	**Talikot (Seasonal)**	9/1995 to 11/2009	12.00	3.85	9.30	28.90	33.69	2.79	0.81	0.31	0.13	0.06	0.04	2.01
22	**Terwad (Seasonal)**	8/1979 to 11/2009	106.48	655.47	747.48	202.23	61.01	0.78	0.05	0.06	0.11	0.07	0.07	0.03
23	**Vijayawada**	6/1965 to 5/2010	0.96	8.30	31.47	21.89	17.70	4.15	1.64	1.16	0.98	1.32	1.37	1.49
24	**Wadakbal**	6/1965 to 5/2010	3.98	5.32	9.57	31.36	17.38	3.64	1.05	0.38	0.25	0.15	0.10	0.73
25	**Wadenapally**	12/1965 to 5/2010	2.13	11.33	35.69	25.69	20.83	5.88	3.19	3.09	2.82	3.28	2.44	1.49
26	**Warunji**	1/1966 to 5/2010	95.43	449.32	550.34	193.98	62.97	18.89	24.82	29.71	31.79	38.13	39.69	36.86
27	**Yadgir**	6/1965 to 5/2010	4.44	17.74	37.03	34.62	25.73	5.13	1.89	0.92	0.51	0.38	0.13	0.56

Source : Sub Division Engineer, Krishna & Coordination Circle, CWC.

Table 8 : Monthly average flow per unit drainage area by site and river basin

VII **Basin : Cauvery** Unit: Millimeter

Sl. No.	Site Name	Reference Period	Jun	July	Aug	Sep	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May
1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
1	**Akkihebbal**	1/2002 to 5/2009	4.23	30.75	77.91	32.69	37.50	20.60	15.55	4.69	2.94	3.25	6.49	6.18
2	**Bendrahalli**	8/2005 to 5/2009	0.25	0.33	1.39	3.16	7.89	6.94	4.38	1.36	0.66	0.62	0.49	0.45
3	**Biligundulu**	8/1971 to 5/2009	8.04	33.59	48.07	31.39	31.97	19.46	11.62	5.74	3.87	3.66	4.06	5.73
4	**Chunchunkatte**	6/2008 to 5/2009	55.39	162.63	375.50	81.78	56.50	28.30	24.99	0.47	0.00	0.00	0.00	0.00
5	**Elunuthimangalam**	8/1998 to 5/2009	0.45	0.88	1.34	1.16	5.38	6.47	5.44	2.60	0.88	0.93	0.74	0.71
6	**Hogenakkal**	10/1996 to 5/2009	0.10	0.02	1.31	2.00	16.94	8.71	4.73	1.58	0.53	0.21	0.16	0.43
7	**K.M.Vadi**	6/1979 to 5/2009	30.83	88.20	71.12	22.65	17.23	8.70	3.83	1.03	0.19	0.14	0.22	0.58
8	**Kodumudi**	6/1971 to 5/2009	5.17	19.32	28.90	27.00	22.34	17.90	15.22	14.18	4.96	2.98	2.33	2.22
9	**Kollegal**	2/1971 to 5/2009	14.01	61.97	85.84	42.46	37.55	24.37	15.66	8.75	5.88	5.71	6.35	7.92
10	**Kudige**	11/1973 to 5/2009	143.12	437.99	454.71	150.48	92.27	46.21	24.06	13.89	10.39	7.68	9.13	14.36
11	**Kudlur**	3/1999 to 5/2009	0.92	0.21	1.48	3.17	10.60	13.50	7.14	3.60	3.73	1.83	3.04	2.27
12	**M.H.Halli**	10/1978 to 5/2009	16.96	62.99	100.51	53.11	40.18	31.68	22.00	14.83	16.11	16.56	19.04	17.70
13	**Musiri**	6/1972 to 11/2009	3.11	12.82	21.03	20.69	17.84	16.27	12.24	10.15	2.98	1.48	0.78	0.66
14	**Muthankera**	6/1973 to 5/2009	277.68	615.26	553.42	216.99	146.67	83.91	40.13	19.71	9.84	7.32	12.94	23.84
15	**Nallamaranpatty**	12/1977 to 5/2009	0.17	0.77	1.52	1.15	2.42	16.89	9.90	1.61	0.66	0.51	0.06	0.15
16	**Nellithurai**	6/1979 to 5/2009	103.76	185.31	146.77	75.82	95.20	105.23	49.21	33.11	22.89	29.72	20.55	21.67
17	**Sakleshpur**	4/2002 to 5/2009	190.80	482.30	556.04	256.80	163.92	85.65	43.81	21.19	11.37	9.33	4.65	11.43
18	**Savandpur**	6/1978 to 5/2009	5.36	13.58	11.85	10.21	11.88	21.03	12.43	10.08	6.95	7.65	6.58	4.42
19	**Sevnur**	9/1999 to 5/2009	0.00	0.01	0.24	2.19	14.81	7.28	6.58	2.65	0.68	0.42	0.27	0.02
20	**T. Bekuppe**	9/2003 to 5/2009	2.59	8.91	7.72	10.53	14.29	4.87	3.14	1.56	1.07	2.08	2.66	5.00
21	**T.K.Halli**	6/1978 to 5/2009	2.80	2.81	7.96	20.06	25.64	13.64	7.29	2.69	1.36	1.41	1.25	2.25
22	**T.Narasipur**	3/1971 to 5/2009	30.13	106.65	113.39	51.73	40.00	26.60	15.68	7.00	5.95	6.98	10.16	14.90
23	**Thengumarahada**	6/1979 to 5/2009	15.38	27.52	33.17	24.24	29.76	29.87	16.50	10.50	9.97	11.73	11.17	11.58
24	**Thevur**	9/1999 to 5/2009	0.00	0.00	0.00	0.75	3.00	3.73	2.17	0.55	0.06	0.05	0.00	0.00
25	**Thimmanahalli**	6/2000 to 5/2009	7.04	24.47	49.21	30.41	32.40	16.44	4.58	1.71	1.63	3.79	3.16	3.25
26	**Thoppur**	10/1999 to 5/2009	0.00	0.00	0.17	0.56	3.27	4.70	7.29	2.21	0.23	0.27	0.14	0.06
27	**Urachikottai**	6/1979 to 5/2009	7.02	20.17	30.38	28.86	23.86	15.26	14.41	14.52	3.32	2.28	2.03	1.78

Source :River Data Directorate, Central Water Commission.

Table 8 : Monthly average flow per unit drainage area by site and river basin

VIII **Basin : East Flowing Rivers from Mahanadi to Kanyakumari**

Unit: Millimeter

Sl. No.	Site Name	Reference Period	Jun	July	Aug	Sep	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May
1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
1	A.P.Puram	12/1979 to 5/2009	0.13	0.55	0.42	0.06	0.82	8.55	7.50	1.76	0.61	3.70	0.32	0.15
2	Alladupalli	8/1985 to 5/2009	5.95	10.04	27.11	37.64	50.01	16.20	11.56	5.87	1.76	0.79	0.35	0.70
3	Ambasamudram	1/1999 to 5/2009	0.28	0.59	1.30	1.59	15.91	29.59	23.14	7.21	4.12	7.86	3.28	0.83
4	Arcot	9/1979 to 5/2009	0.00	0.00	0.04	1.80	2.26	6.07	2.42	0.19	0.06	0.04	0.00	0.00
5	Avarankuppam	6/1978 to 5/2009	0.20	0.19	0.48	4.06	6.26	4.70	1.87	0.34	0.11	0.06	0.04	0.10
6	Chengalpet	10/1978 to 5/2009	0.05	0.05	0.09	0.34	1.30	8.74	6.83	0.49	0.17	0.11	0.00	0.00
7	Chennur	7/1989 to 5/2009	2.52	3.31	6.65	12.80	19.82	6.09	3.66	1.35	0.45	0.19	0.07	0.21
8	Gummanur	9/1978 to 5/2009	1.43	1.17	2.39	11.08	16.48	8.46	3.23	1.20	0.42	0.28	0.22	0.88
9	Irrukkankudi	11/1989 to 5/2009	0.01	0.03	0.02	0.02	2.56	9.20	5.07	0.25	0.10	0.05	0.21	0.01
10	Kamalapuram	6/1990 to 5/2009	0.91	0.03	0.73	3.85	8.52	7.81	1.97	0.30	0.04	0.00	0.01	0.00
11	Kudalaiyathur	11/1989 to 5/2009	0.00	0.00	0.00	0.02	1.69	23.45	17.26	0.91	0.12	0.08	0.00	0.02
12	Kumarapalayam	11/2004 to 5/2009	0.00	0.00	0.00	0.00	0.00	12.07	5.21	0.00	0.00	0.00	0.00	0.00
13	Magaral	11/1971 to 5/2009	0.00	0.20	0.12	0.65	2.00	29.50	30.06	1.94	0.87	0.55	0.00	0.01
14	Murappanadu	11/1977 to 5/2009	5.36	5.00	4.88	4.07	7.45	40.75	28.73	9.37	9.08	10.15	4.35	4.12
15	Nagalamedike	7/1978 to 5/2009	0.00	0.09	0.50	4.25	1.66	0.78	0.04	0.01	0.01	0.00	0.00	0.06
16	Naidupeta	12/1978 to 5/2009	0.59	0.06	0.38	0.55	9.74	56.64	40.58	8.00	3.92	0.10	0.00	0.39
17	Nandipalli	6/1990 to 5/2009	5.14	0.93	2.42	3.91	20.71	10.60	4.13	1.14	0.58	0.24	0.20	0.12
18	Nellore	8/1987 to 5/2009	0.14	0.28	1.01	4.16	10.86	7.47	3.34	0.39	0.03	0.02	0.01	0.14
19	Paramakudi	11/1971 to 5/2009	0.01	0.03	0.02	0.35	2.15	11.95	4.40	0.30	0.18	1.13	0.14	0.07
20	Singavaram	9/1979 to 5/2009	0.42	1.04	0.76	5.54	4.48	2.07	0.18	0.05	0.01	0.04	0.00	0.00
21	Sulurpet	10/1988 to 5/2009	0.73	0.06	0.07	0.06	6.22	16.45	9.52	2.62	0.03	0.00	0.00	0.12
22	Tadipattri	12/1971 to 5/2009	0.30	0.84	0.87	5.60	7.63	5.35	1.18	0.49	0.10	0.02	0.01	0.14
23	Thammavaram	9/1977 to 5/2006	1.57	2.84	6.15	13.58	26.86	21.24	13.11	10.64	6.57	4.28	2.00	3.24
24	Theni	6/1978 to 5/2009	16.68	45.27	64.40	58.48	79.84	105.50	67.11	35.21	18.85	15.04	7.13	5.58
25	Vazhavachanur	6/1978 to 5/2009	0.08	0.12	0.09	0.64	5.91	10.58	7.68	1.39	1.13	0.87	0.81	0.36
26	Villupuram	10/1972 to 5/2009	0.00	0.01	0.02	0.10	2.93	11.86	9.17	0.72	0.10	0.06	0.06	0.05

Source :River Data Directorate, Central Water Commission.

Table 8 : Monthly average flow per unit drainage area by site and river basin

IX **Basin : West Flowing Rivers from Kanyakumari to Tapi** *Unit : Millimeter*

Sl. No.	Site Name	Reference Period	Jun	July	Aug	Sep	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May
1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
1	**ADDOOR AMBARAMPALAY**	7/2003 to 5/2008	516.92	985.94	976.68	474.99	270.60	111.06	11.20	0.00	0.00	0.00	0.00	15.29
2	**AM**	6/1978 to 5/2009	16.94	18.20	25.73	38.36	36.09	67.63	44.64	41.59	29.45	16.98	7.22	11.04
3	**ARANGALY**	4/1978 to 5/2009	186.51	381.75	326.14	173.46	137.71	91.15	26.78	16.69	10.73	10.27	11.96	21.82
4	**ASHRAMAM**	9/1999 to 5/2009	16.85	35.76	22.56	61.22	104.23	115.47	17.65	10.33	18.05	17.61	17.89	8.60
5	**AVERSHE**	6/2002 to 5/2008	431.12	1402.64	1549.39	621.67	288.00	122.42	39.74	16.69	5.15	5.19	1.60	11.57
6	**AYILAM**	12/1978 to 5/2009	175.27	171.69	132.19	148.05	236.97	181.01	59.68	15.75	8.86	10.10	21.72	47.24
7	**BANTWAL**	11/1970 to 5/2008	384.26	1132.82	1105.28	463.16	291.01	124.09	37.68	14.75	5.69	3.24	2.53	9.84
8	**ERINJIPUZHA**	6/1985 to 5/2009	218.24	699.76	701.41	305.54	218.45	111.31	44.18	18.24	5.90	2.35	1.76	11.83
9	**HALADI**	12/1985 to 5/2008	306.59	902.83	841.12	349.87	193.00	116.58	79.83	84.13	84.43	103.39	95.64	92.04
10	**KALAMPUR**	6/1986 to 5/2009	424.05	768.54	599.27	371.75	364.99	188.66	45.96	10.45	1.41	0.58	3.94	47.60
11	**KALLOOPPARA**	6/1985 to 5/2009	412.41	549.98	388.55	278.50	342.61	214.10	34.19	5.99	4.24	2.37	23.41	102.93
12	**KARATHODU**	6/1986 to 5/2009	215.00	514.50	341.22	202.71	220.30	139.70	31.80	9.22	3.63	4.15	3.94	11.88
13	**KIDANGOOR**	7/1985 to 5/2009	492.73	631.95	460.42	309.17	391.86	232.56	40.93	7.17	2.28	4.53	30.60	132.33
14	**KUMBIDI**	5/1979 to 5/2009	101.72	220.70	168.64	91.64	85.56	53.99	17.53	8.70	3.17	1.62	2.45	6.98
15	**KUNIYIL**	1/1979 to 5/2009	321.88	655.10	516.93	264.37	221.59	126.08	40.50	21.35	7.43	5.32	4.06	23.31
16	**KUTTYADI**	3/2000 to 5/2009	745.01	1256.21	1045.76	577.34	397.34	180.93	115.00	60.91	28.85	17.10	18.07	118.43
17	**KUZHITHURAI**	11/2000 to 5/2009	3.22	9.93	5.28	12.06	49.27	43.92	9.10	4.58	1.73	0.82	1.70	1.62
18	**MALAKKARA**	6/1985 to 5/2009	323.99	474.88	371.13	277.18	316.55	208.07	64.93	35.07	17.55	18.05	30.42	82.08
19	**MANKARA**	6/1985 to 5/2009	23.63	62.77	44.76	29.86	31.07	30.23	10.74	5.05	2.36	1.39	1.49	2.49
20	**NEELESWARAM**	3/1971 to 5/2009	226.61	406.42	369.15	204.24	181.52	117.17	46.32	24.04	19.14	20.95	28.49	54.23
21	**PATTAZHY**	4/1978 to 5/2009	136.09	185.44	160.33	135.19	186.02	174.61	63.11	33.33	20.42	22.44	22.80	39.68
22	**PERUMANNU**	6/1985 to 5/2009	431.43	1131.68	952.70	419.70	263.86	108.81	28.27	14.57	7.34	7.75	4.85	30.02
23	**PUDUR**	9/1985 to 5/2009	17.98	45.10	32.95	20.42	24.31	28.95	13.57	6.40	3.50	3.13	2.83	3.40
24	**PULAMANTHOLE**	2/1986 to 5/2009	218.64	485.68	372.35	242.49	259.59	140.11	38.24	13.81	6.00	6.51	10.96	29.29
25	**RAMAMANGALAM**	4/1978 to 5/2009	545.45	788.82	634.13	418.91	438.72	308.28	171.46	145.67	133.30	144.10	147.43	205.24
26	**SANTEGULI**	6/1988 to 5/2008	398.69	1629.83	1247.35	444.18	217.14	88.21	39.37	20.36	12.02	8.49	6.05	9.04
27	**THUMPAMON**	12/1977 to 5/2009	215.25	287.49	222.17	171.15	234.46	186.47	34.41	9.58	4.56	4.16	13.66	41.66
28	**VANDIPERIYAR**	6/2000 to 5/2009	33.77	64.20	62.07	31.09	32.44	32.29	5.77	1.44	0.51	0.26	0.45	3.86
29	**YENNEHOLE**	7/1989 to 5/2008	631.04	1593.91	1333.11	512.98	308.13	119.88	38.60	11.37	2.70	3.67	1.63	14.23

Source :River Data Directorate, Central Water Commission.

Table 8 : Monthly average flow per unit drainage area by site and river basin

Unit : Millimeter

X Basin : Tapi

Sl.No.	Site Name	Reference Period	June	July	August	September	October	November	December	January	February	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)
1	**Purna at Yerli**	4/1973 to 11/2008	9.28	23.14	50.81	33.70	12.47	2.46	2.02	0.91	0.74	0.51	0.26	0.14
2	**Purna at Gopalkheda**	9/1977 to 11/2008	6.49	16.76	38.38	25.44	10.00	2.28	2.20	0.88	0.76	0.46	0.29	0.33
3	**Sarangkheda**	10/1977 to 5/2009	6.71	23.39	55.63	37.91	11.23	1.70	1.54	0.55	0.47	0.33	0.22	0.25
4	**Tapi at Burhanpur**	9/1972 to 2/2009	16.67	95.45	229.83	150.09	29.51	6.14	3.44	1.65	0.95	0.60	0.30	0.22

Source :River Data Directorate, Central Water Commission.

Table 8 : Monthly average flow per unit drainage area by site and river basin

Unit : Millimeter

XI Basin : Narmada

Sl.No.	Site Name	Reference Period	June	July	August	September	October	November	December	January	February	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)
1	**Orsang at Chandwada**	80-81 T02009-10	14.46	71.18	158.42	86.93	12.08	1.91	0.71	0.32	0.19	0.21	0.16	0.19
2	**Narmada at Garudeshwar**	73-74 T0 2009-10	8.62	51.30	119.29	91.35	25.47	9.53	7.61	5.56	4.78	3.55	2.93	2.61
3	**Hathni at Jobat**	01-02 To2005-06	Discharge started w.e.from 09.08.2001 and closed on 1.4.2006											
4	**Goi at Pati**	99-00To2005-06	Discharge started w.e.from 23.02.1999 and closed on 1.4.2006											
5	**Uri at Dhulsar**	99-00 To 2005-06	Discharge started w.e.from 15.03.1999 and closed on 1.4.2006											
6	**Narmada at Rajghat**	72-73 T0 2006-07	10.44	67.41	153.68	110.35	25.81	10.44	8.90	7.01	6.34	5.19	3.83	3.01
7	**Narmada at Mandleshwar**	72-73 T0 2009-10	11.60	69.64	153.95	109.28	32.15	12.87	11.45	9.11	7.40	6.58	5.33	4.29
8	**Kundi at Kogaon**	78-79 T0 2009-10	15.94	34.99	83.93	80.54	24.32	4.95	1.55	0.64	0.56	0.19	0.13	0.10
9	**Chhota tawa at Ginnore**	71-72 T0 1998-99	18.15	93.16	7.42	4.59	1.49	0.35	0.18	0.20	0.13	0.10	0.08	0.07
10	**Narmada at Mortakka**	99-00 To 2006-07	Discharge started w.e.from 23.08.1999 and closed on 1.7.2007											
11	**Narmada at Handia**	77-78 T0 2009-10	12.35	78.93	164.17	102.15	28.54	13.26	13.22	9.73	9.17	8.17	6.12	4.88
12	**Ganjal at chhidgaon**	77-78 T0 2009-10	15.97	116.73	240.91	136.58	33.38	7.64	4.91	3.39	2.19	1.64	1.00	0.82

Contd.

13	**Narmada at Hoshangabad**	72-73 T0 2009-10	15.66	81.05	178.89	114.98	31.27	14.50	13.04	9.56	8.90	8.04	6.52	5.64
14	**Tawa at Tawakati**	01-02 TO2005-06	Discharge started w.e.from 10.05.2001 and closed on 1.4.2006											
15	**Machna at Shapur**	01-02 TO 2005-06	Discharge started w.e.from 20.06.2000 and closed on 1.4.2006											
16	**Narmada at Sandia**	78-79 T0 2009-10	11.38	71.43	144.60	101.37	29.46	16.16	15.13	10.81	10.36	9.50	8.22	7.30
17	**Shakkar at Gadarwara**	77-78T0 2009-10	16.76	111.25	233.22	157.12	34.00	10.42	7.20	4.59	3.99	2.90	1.91	1.52
18	**Narmada at Barmanghat**	72-73 T0 2009-10	11.41	70.10	157.98	98.59	31.60	16.25	13.98	9.71	10.02	8.59	7.84	5.82
19	**Sher at Belkheri**	77-78 T0 2009-10	16.56	110.39	196.69	112.52	21.21	7.86	5.51	2.42	2.19	1.88	0.92	0.73
20	**Hiran at Patan**	79-80 T0 2009-10	9.04	61.60	143.96	115.36	33.03	11.05	6.43	4.65	3.66	2.84	1.90	1.22
21	**Banjar at Bamni**	99-00 To 2009-10	23.17	162.56	325.14	213.38	69.29	19.08	6.88	4.08	2.37	0.72	0.10	0.00
22	**Narmada at Jamtara**	72-73 T0 2000-01	13.94	104.47	204.07	106.21	38.42	19.75	15.60	8.52	12.46	10.46	9.61	6.99
23	**Banjar at Hirdaya Nager**	77.78 T0 2001-02	18.67	127.18	190.36	114.51	28.37	7.95	3.80	3.26	2.51	1.38	0.29	0.06
24	**Burhner at Mohgaon**	78-79 T0 2009-10	20.20	130.26	208.14	124.13	29.85	7.99	7.90	5.52	3.94	1.59	0.51	0.24
25	**Narmada at Amgaon**	01-02 To2005-06	Discharge started w.e.from 07.09.2001 and closed on 1.4.2006											
26	**Narmada at Manot**	77-78 T0 2009-10	26.62	155.98	250.34	153.33	33.97	11.62	8.08	8.27	5.14	2.85	1.29	0.62
27	**Narmada at Dindori**	88-89 T0 2009-10	27.23	112.86	177.92	118.49	31.79	15.35	10.51	10.08	6.37	4.80	2.79	2.27

Source : Executive Engineer, Tapi Division, CWC, Surat.

Table 8 : Monthly average flow per unit drainage area by site and river basin

XII **Basin : Mahi and Sabarmati** Unit : Millimeter

Sl. No.	Site Name	Reference Period	Jun	July	August	September	October	November	December	January	February	March	April	May
1	**2.00**	3.00	4.00	5.00	6.00	7.00	8.00	9.00	10.00	11.00	12.00	13.00	14.00	15.00
1	**Anas at Chakaliya**	6/1995 to 5/2010	14.12	89.80	280.50	131.45	24.72	4.69	3.84	0.38	0.25	0.15	0.06	0.26
2	**Balaram at Chitrasani**	6/1995 to 5/2010	0.88	7.68	26.70	12.40	2.39	0.23	0.00	0.00	0.00	0.00	0.00	0.00
3	**Banas at Abu Road**	6/1995 to 5/2010	1.42	11.03	22.38	9.37	1.67	0.15	0.05	0.02	0.00	0.00	0.00	0.00
4	**Banas at Kamalpur**	6/1995 to 5/2010	1.45	4.15	5.82	1.25	0.11	0.05	0.00	0.00	0.00	0.00	0.00	0.00
5	**Banas at Sarotry**	6/1995 to 5/2010	1.89	13.30	23.15	15.82	3.99	0.71	0.14	0.03	0.00	0.00	0.00	0.00
6	**Bhadar at Ganod**	6/1995 to 5/2010	5.43	8.92	20.60	18.05	2.52	0.15	0.13	0.03	0.00	0.00	0.00	0.05
7	**Jakham at Dhariawad**	6/1995 to 5/2010	0.48	12.07	68.68	23.17	3.67	1.77	2.20	2.36	2.03	1.27	0.40	0.24
8	**Luni at Balotra**	6/1995 to 5/2010	0.00	2.71	1.74	0.25	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
9	**Luni at Gandhav**	6/1995 to 3/2010	0.03	1.73	0.67	0.25	0.01	0.00	0.00	0.00	0.00	0.00	0.00	0.00
10	**Machhu at Gungan**	6/1995 to 5/2010	6.40	10.75	15.39	26.28	1.93	0.01	0.01	0.04	0.05	0.03	0.01	0.01
11	**Mahi at Khanpur**	6/1995 to 5/2010	3.63	13.69	76.92	31.36	5.72	3.23	2.24	2.00	1.57	1.60	1.38	2.18
12	**Mahi at Mataji**	6/1995 to 5/2010	3.36	85.39	143.73	74.89	11.57	1.63	1.54	0.53	0.52	0.19	0.03	0.01
13	**Mahi at Paderdibadi**	6/1995 to 5/2010	0.93	6.56	58.42	28.36	2.66	0.65	0.89	0.95	0.76	0.62	0.47	0.63
14	**Rupen at Sapawada**	6/1995 to 5/2010	2.38	6.75	16.60	6.39	0.34	0.02	0.00	0.00	0.00	0.00	0.00	0.00
15	**Sabarmati at Derol Bridge**	6/1995 to 5/2010	2.25	3.76	24.95	12.87	3.67	0.96	0.89	0.92	0.88	1.00	1.10	1.06
16	**Sabarmati at Kheroj**	6/1995 to 5/2010	3.06	12.87	29.53	19.77	3.89	0.59	0.03	0.00	0.00	0.00	0.00	0.00
17	**Sabarmati at Voutha**	8/1999 to 5/2010	2.64	29.28	48.40	18.94	10.02	3.62	4.77	2.85	2.09	3.86	2.10	1.50
18	**Shetrunji at Lowara**	6/1995 to 5/2010	18.98	22.75	19.00	31.63	3.15	0.13	0.03	0.02	0.01	0.01	0.01	0.00
19	**Som at Rangeli**	6/1995 to 5/2010	0.59	4.45	29.45	13.28	3.24	0.90	0.89	1.10	0.89	0.67	0.86	0.19
20	**Wakal at Kotra(Jotasan)**	6/1995 to 5/2010	3.17	15.44	57.72	40.03	6.94	1.11	0.52	0.19	0.08	0.02	0.00	0.00
21	**Watrak at Gadvel (Ratanpur)**	6/1995 to 5/2010	4.84	24.76	58.92	25.64	10.35	1.99	0.81	0.54	0.11	0.80	0.19	0.01
22	**Watrak at Kheda**	6/1995 to 5/2010	3.88	18.56	33.06	12.94	3.58	0.53	0.30	0.20	0.11	0.14	0.02	0.00

Source: Executive Engineer, Mahi Division, CWC, Gandhi Nagar.

Table 9 : Time series of Sediment load by site in River Basin

I Basin: Mahanadi *Unit: Million Metric Tonnes*

Sl. No	Year	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
	Site Name	Baronda			Rajim			Basantpur			Simga		
1	2000-2001	0.055	0.000	0.055	0.145	0.000	0.145	1.100	0.002	1.102	0.405	0.000	0.405
2	2001-2002	1.041	0.000	1.041	2.396	0.000	2.396	8.644	0.009	8.653	1.294	0.000	1.294
3	2002-2003	0.058	0.000	0.058	0.087	0.000	0.087	2.204	0.007	2.211	0.565	0.000	0.565
4	2003-2004	0.687	0.000	0.687	2.997	0.000	2.997	9.662	0.009	9.671	1.319	0.001	1.320
5	2004-2005	0.413	0.000	0.413	0.530	0.000	0.530	2.597	0.006	2.603	0.906	0.000	0.906
6	2005-2006	0.332	0.000	0.332	0.569	0.000	0.569	4.084	0.003	4.087	1.388	0.000	1.388
7	2006-2007	0.431	0.000	0.431	1.569	0.000	1.569	4.446	0.005	4.451	1.335	0.000	1.335
8	2007-2008	1.214	0.000	1.214	1.317	0.000	1.317	6.651	0.002	6.653	1.523	0.000	1.523
9	2008-2009	0.454	0.000	0.454	0.659	0.000	0.659	2.093	0.001	2.094	0.077	0.000	0.077
10	2009-2010	0.130	0.000	0.130	0.270	0.000	0.270	4.165	0.001	4.166	0.333	0.000	0.333
	Site Name	Andhiarkhore			Ghatora			Jondhra			Rampur		
1	2000-2001	0.076	0.000	0.076				0.553	0.000	0.553	0.005	0.000	0.005
2	2001-2002	0.609	0.000	0.609	0.809	0.000	0.809	4.516	0.000	4.516	0.554	0.000	0.554
3	2002-2003	0.635	0.000	0.635	0.108	0.000	0.108	1.119	0.000	1.119	0.086	0.000	0.086
4	2003-2004	0.461	0.000	0.461	0.137	0.000	0.137	3.094	0.002	3.096	4.244	0.000	4.244
5	2004-2005	0.383	0.000	0.383	0.119	0.000	0.119	3.094	0.003	3.097	0.287	0.000	0.287
6	2005-2006	0.528	0.000	0.528	0.164	0.000	0.164	5.875	0.000	5.875	0.338	0.000	0.338
7	2006-2007	0.088	0.000	0.088	0.039	0.000	0.039	4.144	0.000	4.144	0.750	0.000	0.750
8	2007-2008	0.131	0.000	0.131	0.062	0.000	0.062	4.596	0.000	4.596	0.844	0.000	0.844
9	2008-2009	0.024	0.000	0.024	0.048	0.000	0.048	2.940	0.002	2.942	5.227	0.000	5.227
10	2009-2010	0.021	0.000	0.021	0.041	0.000	0.041	1.733	0.000	1.733	0.211	0.000	0.211

Contd/…

Table 9 : Time series of Sediment load by site in River Basin

I Basin: Mahanadi *Unit: Million Metric Tonnes*

Sl. No	Year	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
	Site Name	Manendragarh			Bamnidhi			Kurubhata			Sundargarh		
1	2000-2001	0.060	0.000	0.060	0.144	0.006	0.150	0.441	0.000	0.441	2.087	0.000	2.087
2	2001-2002	0.077	0.000	0.077	1.227	0.004	1.231	2.826	0.001	2.827	1.366	0.000	1.366
3	2002-2003	0.036	0.000	0.036	0.148	0.002	0.150	1.768	0.000	1.768	0.648	0.000	0.648
4	2003-2004	0.073	0.000	0.073	0.556	0.000	0.556	1.903	0.001	1.904	1.806	0.000	1.806
5	2004-2005	0.030	0.000	0.030	0.247	0.003	0.250	0.628	0.002	0.630	0.945	0.000	0.945
6	2005-2006	0.029	0.000	0.029	0.270	0.006	0.276	1.479	0.000	1.479	0.760	0.000	0.760
7	2006-2007	0.022	0.000	0.022	0.205	0.004	0.209	1.234	0.000	1.234	1.112	0.000	1.112
8	2007-2008	0.014	0.000	0.014	0.164	0.004	0.168	1.142	0.000	1.142	1.861	0.000	1.861
9	2008-2009	0.040	0.000	0.040	0.094	0.001	0.095	1.326	0.000	1.326	2.397	0.000	2.397
10	2009-2010	0.026	0.000	0.026	0.100	0.001	0.101	0.197	0.000	0.197	2.983	0.000	2.983
	Site Name	Salebhata			Kantamal			Tikarapara			Kesinga		
1	2000-2001	0.013	0.000	0.013	2.365	0.097	2.462	2.743	0.047	2.790			
2	2001-2002	0.665	0.000	0.665	18.660	0.018	18.678	15.224	0.192	15.416			
3	2002-2003	0.219	0.000	0.219	1.972	0.004	1.976	2.051	0.12	2.171			
4	2003-2004	1.504	0.000	1.504	7.472	0.010	7.482	17.666	0.294	17.960			
5	2004-2005	0.409	0.000	0.409	9.016	0.052	9.068	7.735	0.185	7.920			
6	2005-2006	0.987	0.000	0.987	5.516	0.059	5.575	11.573	0.097	11.670			
7	2006-2007	0.853	0.000	0.853	14.586	0.005	14.591	7.815	0.163	7.978			
8	2007-2008	0.210	0.000	0.210	6.186	0.021	6.207	10.876	0.523	11.399	9.150	0.062	9.212
9	2008-2009	0.747	0.000	0.747	9.084	0.000	9.084	12.497	0.435	12.932	3.435	0.004	3.439
10	2009-2010	0.066	0.000	0.066	0.000	0.000	0.000	10.409	0.051	10.460	14.770	0.000	14.770

Source: Suspended Sediment Year Book (2000 to 2010) Mahandi Basin.

Table 9 : Time series of Sediment load by site in River Basin

II **Basin : Subarnarekha, Burhabalang & Baitarni** *Unit: Million Metric Tonnes*

Sl. No	Year	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
	Site Name	Subranrekha at Ghatsila			Kharkai at Adityapur			Baitarani at Anandpur			Subranrekha at Jamshedpur		
1	2000-2001	0.248	0.000	0.248	0.191	0.000	0.191	2.100	0.005	2.105	0.470	0.002	0.472
2	2001-2002	2.116	0.022	2.138	0.944	0.001	0.945	1.955	0.010	1.965	2.384	0.026	2.410
3	2002-2003	0.591	0.008	0.599	0.444	0.003	0.447	0.500	0.008	0.508	0.685	0.053	0.738
4	2003-2004	0.674	0.028	0.702	0.233	0.002	0.235	1.542	0.007	1.549	0.971	0.024	0.995
5	2004-2005	1.810	0.009	1.819	0.733	0.003	0.736	1.139	0.007	1.146	2.153	0.006	2.159
6	2005-2006	0.294	0.001	0.295	0.345	0.004	0.349	2.477	0.011	2.488	0.850	0.018	0.868
7	2006-2007	6.156	0.091	6.247	2.151	0.002	2.153	2.123	0.007	2.130	5.800	0.038	5.838
8	2007-2008	11.146	0.026	11.172	1.528	0.002	1.530	4.487	0.034	4.521	2.652	0.011	2.663
9	2008-2009	0.201	0.001	0.202	12.031	0.001	12.032	2.387	0.004	2.391	2.803	0.028	2.831
10	2009-2010	0.852	0.000	0.852	1.045	0.001	1.046	0.787	0.004	0.791	1.153	0.058	1.211
	Site Name	Baitarani at Champua			Burhabalang at Govindpur								
1	2000-2001	Sedinment Observation Started w.e.f 09.08.2002											
2	2001-2002												
3	2002-2003	0.179	0.002	0.181									
4	2003-2004	0.574	0.001	0.575	0.913	0.025	0.938						
5	2004-2005	0.519	0.002	0.521	1.204	0.016	1.220						
6	2005-2006	0.584	0.002	0.586	1.373	0.015	1.388						
7	2006-2007	0.557	0.002	0.559	1.937	0.007	1.944						
8	2007-2008	0.925	0.004	0.929	2.174	0.020	2.194						
9	2008-2009	0.537	0.002	0.539	1.710	0.005	1.715						
10	2009-2010	0.207	0.001	0.208	1.393	0.006	1.399						

Source: Suspended Sediment Year Books (2000 to 2010) Subarnarekha, Burhabalang & Baitarni.

Table 9 : Time series of Sediment load by site in River Basin

Unit: Million Metric Tonnes

III Basin: Brahmani

Sl. No	Year	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
	Site Name	Brahmani at Jenapur			Brahmani at Gomlai			Koel at Jaraikela			Sankh at Tilga		
1	2000-2001	2.618	0.094	2.712	3.855	0.004	3.859	2.920	0.005	2.925	0.667	0.001	0.668
2	2001-2002	12.567	0.059	12.626	11.961	0.004	11.965	4.275	0.003	4.278	2.427	0.000	2.427
3	2002-2003	1.869	0.012	1.881	3.872	0.001	3.873	0.990	0.000	0.990	1.297	0.000	1.297
4	2003-2004	6.004	0.039	6.043	5.947	0.006	5.953	N.A	N.A	N.A	2.643	0.026	2.669
5	2004-2005	2.576	0.041	2.617	4.090	0.005	4.095	N.A	N.A	N.A	1.249	0.003	1.252
6	2005-2006	4.467	0.046	4.513	2.279	0.012	2.291	N.A	N.A	N.A	1.421	0.002	1.423
7	2006-2007	4.728	0.053	4.781	7.288	0.006	7.294	N.A	N.A	N.A	1.203	0.001	1.204
8	2007-2008	7.671	0.019	7.69	13.553	0.007	13.56	N.A	N.A	N.A	1.301	0.000	1.301
9	2008-2009	<----Data not available ---->			8.105	0.007	8.112	<----Data not available ---->			1.117	0.000	1.117
10	2009-2010	<----Data not available ---->			3.876	0.004	3.880	<----Data not available ---->			1.469	0.000	1.469
	Site Name	Brahamani at Panposh											
1	2000-2001	5.934	0.001	5.935									
2	2001-2002	11.015	0.001	11.016									
3	2002-2003	5.722	0.007	5.729									
4	2003-2004	11.211	0.024	11.235									
5	2004-2005	7.359	0.018	7.377									
6	2005-2006	4.310	0.037	4.347									
7	2006-2007	8.494	0.014	8.508									
8	2007-2008	15.179	0.019	15.198									
9	2008-2009	11.015	0.019	11.034									
10	2009-2010	4.573	0.010	4.583									

Source: Suspended Sediment Year Books (2000 to 2010) Brahmani Basin.

Table 9 : Time series of Sediment load by site in River Basin

IV **Basin: Rushikulya, Vamsadhara, Saroda & Nagavali** *Unit: Million Metric Tonnes*

Sl. No	Year	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)
	Site Name	Rushikulya at Purushattampur			Vamsadhara at Kashinagar			Nagavali at Srikakulam		
1	2000-2001	Started w.e.f. 2001-02			0.591	0.000	0.591			
2	2001-2002	1.959	0.000	1.959	1.621	0.002	1.623			
3	2002-2003	0.725	0.000	0.725	0.481	0.000	0.481	0.376	0.002	0.378
4	2003-2004	3.638	0.027	3.665	6.648	0.045	6.693	2.412	0.127	2.539
5	2004-2005	0.866	0.000	0.866	2.332	0.008	2.34	2.686	0.016	2.702
6	2005-2006	5.268	0.006	5.274	2.315	0.015	2.33	3.742	0.009	3.751
7	2006-2007	5.490	0.001	5.491	11.315	0.016	11.331	9.674	0.092	9.766
8	2007-2008	3.380	0.001	3.381	6.433	0.051	6.484	6.430	0.033	6.463
9	2008-2009	0.729	0.000	0.729	5.956	0.003	5.959	1.429	0.036	1.465
10	2009-2010	0.946	0.000	0.946	3.386	0.012	3.398	0.675	0.006	0.681

Source: Suspended Sediment Year Books (2000 to 2010) Rushikulya, Vamsadhara, Saroda & Nagavali.

Table 9 : Time series of Sediment load by site in River Basin

V **Godavari Basin** *Unit: Million Metric Tonnes*

Sl. No	Year	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
	Site Name	**Polavaram**			**Sabari at Konta**			**Perur**			**Indravati at Pathagudem**		
1	2000-2001	108.684	0.062	108.746	5.817	0.067	5.884	86.681	0.007	86.688	7.289	0.002	7.291
2	2001-2002	55.986	0.020	56.006	4.138	0.077	4.215	72.249	0.011	72.260	17.156	0.002	17.158
3	2002-2003	34.780	0.011	34.791	1.942	0.020	1.962	22.103	0.009	22.112	7.163	0.003	7.166
4	2003-2004	43.214	0.139	43.353	9.192	0.128	9.320	41.975	0.090	42.065	22.045	0.012	22.057
5	2004-2005	25.183	0.118	25.301	5.464	0.084	5.548	17.061	0.017	17.078	12.513	0.001	12.514
6	2005-2006	69.708	0.218	69.926	2.595	0.093	2.688	54.087	0.002	54.089	11.659	0.000	11.659
7	2006-2007	62.373	0.160	62.533	40.954	0.137	41.091	211.994	0.010	212.004	24.353	0.011	24.364
8	2007-2008	44.728	0.180	44.908	10.306	0.213	10.519	31.520	0.001	31.521	25.505	0.008	25.513
9	2008-2009	24.420	0.028	24.448	4.501	0.119	4.620	23.618	0.007	23.625	7.807	0.004	7.811
10	2009-2010	12.067	0.027	12.094	2.031	0.027	2.058	6.801	0.003	6.804	5.237	0.000	5.237
	Site Name	**Indravati at Jagadalpur**			**Wardha at Bamni**			**Pranhita at Tekra**			**Paddavagu at Bhatpalli**		
1	2000-2001	1.562	0.001	1.563	16.878	0.002	16.880	50.188	0.000	50.188	3.954	0.001	3.955
2	2001-2002	2.803	0.001	2.804	15.192	0.001	15.193	19.763	0.001	19.764	1.117	0.001	1.118
3	2002-2003	1.247	0.000	1.247	31.306	0.001	31.307	32.158	0.007	32.165	0.598	0.000	0.598
4	2003-2004	3.680	0.000	3.680	7.953	0.003	7.956	34.330	0.005	34.335	2.177	0.001	2.178
5	2004-2005	2.035	0.001	2.036	0.823	0.007	0.830	4.010	0.015	4.025	0.320	0.006	0.326
6	2005-2006	1.627	0.000	1.627	14.632	0.005	14.637	27.786	0.008	27.794	1.146	0.005	1.151
7	2006-2007	5.087	0.000	5.087	18.000	0.002	18.002	50.732	0.009	50.741	0.874	0.001	0.875
8	2007-2008	2.829	0.002	2.831	2.643	0.002	2.645	45.513	0.019	45.532	0.211	0.001	0.212
9	2008-2009	1.197	0.000	1.197	0.498	0.001	0.499	15.197	0.001	15.198	0.129	0..004	0.129
10	2009-2010	0.930	0.000	0.930	0.078	0.002	0.080	6.723	0.006	6.729	0.024	0.000	0.024

Contd/…

Table 9 : Time series of Sediment load by site in River Basin

V **Godavari Basin** *Unit: Million Metric Tonnes*

Sl. No	Year	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
	Site Name	**Wainganga at Ashti**			**Penganga at PG Bridge**			**Unna at Nandgaon**			**Wardha at Hivra**		
1	2000-2001	9.013	0.000	9.013	2.965	0.001	2.966	0.475	0.000	0.475	0.403	0.000	0.403
2	2001-2002	7.792	0.000	7.792	3.039	0.001	3.040	0.199	0.000	0.199	0.993	0.000	0.993
3	2002-2003	12.810	0.002	12.812	9.731	0.003	9.734	1.032	0.000	1.032	1.142	0.000	1.142
4	2003-2004	14.203	0.003	14.206	2.027	0.000	2.027	0.113	0.000	0.113	0.108	0.001	0.109
5	2004-2005	2.532	0.005	2.537	0.149	0.001	0.150	0.022	0.002	0.024	0.128	0.002	0.130
6	2005-2006	15.226	0.007	15.233	11.201	0.001	11.202	0.113	0.001	0.114	1.039	0.000	1.039
7	2006-2007	13.687	0.011	13.698	11.495	0.002	11.497	0.023	0.002	0.025	1.475	0.000	1.475
8	2007-2008	18.077	0.009	18.086	0.988	0.001	0.989	0.056	0.000	0.056	2.002	0.000	2.002
9	2008-2009	3.864	0.001	3.865	0.752	0.000	0.752	0.031	0.000	0.031	0.003	0.000	0.003
10	2009-2010	5.247	0.010	5.257	0.650	0.000	0.650	0.007	0.000	0.007	0.001	0.000	0.001
	Site Name	**Kanhan at Satrapur**			**Manijira at Saigaon**			**Godavari at Mancherial**			**Godavari at Dhalegaon**		
1	2000-2001	0.359	0.000	0.359	2.285	0.000	2.285	1.863	0.004	1.867	0.879	0.000	0.879
2	2001-2002	1.326	0.002	1.328	0.074	0.000	0.074	0.197	0.000	0.197	0.119	0.000	0.119
3	2002-2003	0.701	0.005	0.706	0.003	0.000	0.003	1.274	0.000	1.274	0.365	0.000	0.365
4	2003-2004	1.929	0.006	1.935	0.019	0.000	0.019	0.546	0.001	0.547	0.099	0.000	0.099
5	2004-2005	0.184	0.001	0.185	0.018	0.000	0.018	0.549	0.002	0.551	0.115	0.000	0.115
6	2005-2006	2.978	0.013	2.991	0.739	0.000	0.739	2.551	0.005	2.556	1.963	0.000	1.963
7	2006-2007	2.217	0.004	2.221	0.224	0.000	0.224	2.560	0.006	2.566	3.705	0.000	3.705
8	2007-2008	1.995	0.008	2.003	0.303	0.000	0.303	0.039	0.004	0.043	0.302	0.000	0.302
9	2008-2009	0.014	0.002	0.016	0.707	0.000	0.707	0.275	0.002	0.277	0.127	0.000	0.127
10	2009-2010	2.081	0.006	2.087	0.001	0.000	0.001	0.022	0.000	0.022	0.069	0.000	0.069

Source: Suspended Sediment Year Books (2000 to 2010) Godavari Basin.

Table 9 : Time series of Sediment load by site in River Basin

VI **Basin : Krishna** *Unit: Million Metric Tonnes*

Sl. No	Year	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
	Site Name	Wadenapalli			Bawapuram			Yadgir			Malkhed		
1	2000-2001	0.316	0.049	0.365	1.537	0.009	1.546	1.743	0.005	1.748	0.375	0.001	0.376
2	2001-2002	0.112	0.025	0.137	1.145	0.001	1.146	2.751	0.001	2.752	0.318	0.001	0.319
3	2002-2003	0.033	0.003	0.036	0.129	0.001	0.130	0.152	0.005	0.157	0.118	0.000	0.118
4	2003-2004	0.019	0.005	0.024	0.059	0.007	0.066	0.204	0.022	0.226	0.023	0.000	0.023
5	2004-2005	0.057	0.007	0.064	1.031	0.007	1.038	1.369	0.001	1.370	0.017	0.000	0.017
6	2005-2006	1.645	0.007	1.652	4.072	0.007	4.079	18.908	0.001	18.909	0.914	0.001	0.915
7	2006-2007	0.800	0.009	0.809	0.528	0.001	0.529	7.426	0.000	7.426	0.003	0.000	0.003
8	2007-2008	1.200	0.032	1.232	1.007	0.025	1.032	1.964	0.002	1.966	0.039	0.011	0.050
9	2008-2009	0.641	0.123	0.764	0.081	0.007	0.088	0.745	0.000	0.745	0.098	0.001	0.099
10	2009-2010	2.540	0.62	3.160	1.380	0.004	1.384	13.191	0.004	13.195	0.442	0.003	0.445
	Site name	Takali			Cholachagudda			Kurundwad			Karad		
1	2000-2001	0.011	0.000	0.011	3.837	0.020	3.857				0.146	0.003	0.149
2	2001-2002	0.258	0.000	0.258	1.812	0.005	1.817	<------ Data not available ---------->			0.033	0.002	0.035
3	2002-2003	0.001	0.000	0.001	1.736	0.006	1.742				0.027	0.003	0.030
4	2003-2004	0.000	0.000	0.000	1.187	0.168	1.355				0.065	0.003	0.068
5	2004-2005	0.457	0.000	0.457	3.213	0.017	3.230	2.468	0.000	2.468	1.239	0.005	1.244
6	2005-2006	0.744	0.000	0.744	2.916	0.054	2.970	10.088	0.000	10.088	2.24	0.010	2.250
7	2006-2007	0.194	0.000	0.194	2.579	0.000	2.579	13.985	0.000	13.985	3.369	0.012	3.381
8	2007-2008	0.206	0.000	0.206	8.460	0.000	8.460	3.295	0.000	3.295	0.745	0.010	0.755
9	2008-2009	0.060	0.000	0.060	0.608	0.000	0.608	2.613	0.000	2.613	0.263	0.010	0.273
10	2009-2010	0.462	0.000	0.462	0.549	0.000	0.549	2.014	0.000	2.014	0.105	0.004	0.109

Contd/…

Table 9 : Time series of Sediment load by site in River Basin

VI **Basin : Krishna** *Unit: Million Metric Tonnes*

Sl. No	Year	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual
(1)	(2)	(3)	(4)	-5	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
	Site name	Marol			Haralahalli			Byladahalli			Honali		
1	2000-2001	0.513	0.000	0.513	0.720	0.021	0.741	0.030	0.005	0.035	0.452	0.036	0.488
2	2001-2002	0.006	0.000	0.006	0.183	0.009	0.192	0.004	0.000	0.004	0.125	0.002	0.127
3	2002-2003	0.135	0.000	0.135	0.187	0.000	0.187	0.006	0.000	0.006	0.172	0.002	0.174
4	2003-2004	0.158	0.000	0.158	0.127	0.000	0.127	0.006	0.000	0.006	0.127	0.002	0.129
5	2004-2005	0.225	0.000	0.225	0.081	0.002	0.083	0.007	0.000	0.007	0.38	0.003	0.383
6	2005-2006	0.974	0.000	0.974	0.719	0.004	0.723	4.200	0.200	4.400	0.915	0.004	0.919
7	2006-2007	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
8	2007-2008	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
9	2008-2009	0.463	0.000	0.463	2.259	0.015	2.274	1.200	0.100	1.300	0.786	0.011	0.797
10	2009-2010	0.725	0.000	0.725	1.447	0.007	1.454	1.100	0.000	1.100	0.534	0.060	0.594
	Site name	Shimoga											
1	2000-2001	1.068	0.001	1.069									
2	2001-2002	0.311	0.001	0.312									
3	2002-2003	0.234	0.002	0.236									
4	2003-2004	0.245	0.000	0.245									
5	2004-2005	0.129	0.000	0.129									
6	2005-2006	1.109	0.004	1.113									
7	2006-2007	0.000	0.001	0.001									
8	2007-2008	0.000	0.000	0.000									
9	2008-2009	0.555	0.000	0.555									
10	2009-2010	1.223	0.000	1.223									

Source: Suspended Sediment Year Books (2000 to 2010) Krishna Basin.

Table 9 : Time series of Sediment load by site in River Basin

Basin : Cauvery

VII

Unit : Millian Metric Tones

Sl. No	Year	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
	Site Name	**Kudige**			**Muthankera**			**T.Narsinpur**			**Kollegal**		
1	2000-2001	0.087	0.003	0.090	0.105	0.008	0.113	0.120	0.020	0.140	0.288	0.053	0.341
2	2001-2002	0.060	0.005	0.065	0.101	0.005	0.106	0.088	0.016	0.104	0.067	0.015	0.082
3	2002-2003	0.056	0.003	0.059	0.109	0.003	0.112	N.A.	N.A.	N.A.	0.049	0.014	0.063
4	2003-2004	0.039	0.003	0.042	0.067	0.009	0.076	0.038	0.011	0.049	0.026	0.008	0.034
5	2004-2005	0.152	0.004	0.156	0.166	0.009	0.175	0.125	0.010	0.135	0.030	0.011	0.041
6	2005-2006	0.215	0.015	0.230	N.A.	N.A.	N.A.	0.284	0.027	0.311	0.228	0.015	0.243
7	2006-2007	Sediment Observation not done			Sediment Observation not done			Sediment Observation not done			0.145	0.011	0.156
8	2007-2008	Sediment Observation not done			Sediment Observation not done			Sediment Observation not done			0.280	0.017	0.297
9	2008-2009	0.004	0.002	0.006	0.181	0.003	0.184	0.016	0.006	0.022	0.093	0.10	0.193
10	2009-2010	0.199	0.004	0.203	0.161	0.010	0.171	0.168	0.004	0.172	0.057	0.008	0.065
	Site Name	**T.K. Halli**			**Biligundulu**			**Savandapur**			**Kodumudi**		
1	2000-2001	0.075	0.007	0.082	0.939	0.038	0.977	0.008	0.006	0.014	0.218	0.064	0.282
2	2001-2002	0.017	0.006	0.023	0.169	0.020	0.189	0.004	0.003	0.007	0.076	0.049	0.125
3	2002-2003	0.002	0.002	0.004	0.094	0.025	0.119	0.007	0.011	0.018	0.023	0.027	0.050
4	2003-2004	0.002	0.002	0.004	0.047	0.015	0.062	0.001	0.021	0.022	0.014	0.024	0.038
5	2004-2005	0.006	0.002	0.008	0.314	0.023	0.337	0.004	0.004	0.008	0.045	0.038	0.083
6	2005-2006	0.015	0.004	0.019	0.874	0.030	0.904	0.014	0.006	0.020	0.443	0.038	0.481
7	2006-2007	Sediment Observation not done			0.129	0.016	0.145	0.161	0.006	0.167	0.136	0.056	0.192
8	2007-2008	Sediment Observation not done			0.577	0.055	0.632	0.687	0.005	0.692	0.675	0.054	0.729
9	2008-2009	0.009	0.002	0.011	0.416	0.015	0.431	0.006	0.004	0.010	0.191	0.044	0.235
10	2009-2010	0.027	0.004	0.031	0.268	0.011	0.279	0.006	0.002	0.008	0.168	0.038	0.206

	Site Name	Thengudi			Musiri			Nallamaranpatty			Thengumarahada		
1	2000-2001	0.004	0.000	0.004	0.792	0.132	0.924	0.004	0.002	0.006	<------ Data not available ------>		
2	2001-2002	0.000	0.000	0.000	0.130	0.066	0.196	0.000	0.000	0.000			
3	2002-2003	0.000	0.001	0.001	0.027	0.031	0.058	0.002	0.000	0.002	0.014	0.001	0.015
4	2003-2004	0.000	0.000	0.000	0.017	0.025	0.042	0.000	0.000	0.000	0.004	0.002	0.006
5	2004-2005	0.001	0.010	0.011	0.125	0.093	0.218	0.010	0.000	0.010	0.012	0.001	0.013
6	2005-2006	0.479	0.027	0.506	0.559	0.111	0.670	0.031	0.026	0.057	0.030	0.002	0.032
7	2006-2007	0.001	0.000	0.001	0.292	0.034	0.326	0.001	0.000	0.001	0.005	0.003	0.008
8	2007-2008	0.016	0.282	0.298	0.387	0.087	0.474	0.016	0.282	0.298	0.020	0.005	0.025
9	2008-2009	0.003	0.003	0.006	0.170	0.038	0.208	0.015	0.001	0.016	0.009	0.002	0.011
10	2009-2010	0.003	0.002	0.005	0.107	0.021	0.128	0.006	0.000	0.006	0.046	0.004	0.050

Contd/…

Table 9 : Time series of Sediment load by site in River Basin

VII **Basin : Cauvery** *Unit : Millian Metric Tones*

Sl. No	Year	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)
	Site Name	Nellithurai			Urachikottai			M.H.Halli		
1	2000-2001				<---------- Data not available -----			0.019	0.001	0.020
2	2001-2002	<---------- Data not available----->			0.006	0.002	0.008	0.008	0.002	0.010
3	2002-2003				0.025	0.012	0.037	0.001	0.001	0.002
4	2003-2004	0.000	0.000	0.000	0.016	0.005	0.021	0.004	0.001	0.005
5	2004-2005	0.001	0.010	0.011	0.029	0.017	0.046	0.005	0.002	0.007
6	2005-2006	0.479	0.027	0.506	0.324	0.015	0.339	0.014	0.002	0.016
7	2006-2007	0.001	0.000	0.001	0.034	0.003	0.037	Sediment Observation not done		
8	2007-2008	0.016	0.282	0.298	0.053	0.001	0.054	Sediment Observation not done		
9	2008-2009	0.003	0.003	0.006	0.004	0.001	0.005	0.003	0.002	0.005
10	2009-2010	0.040	0.004	0.044	0.005	0.002	0.007	0.011	0.003	0.014

Source: Suspended Sediment and Bedmaterial Data Book (2000 to 2010) Cauvery Basin.

Table 9 : Time series of Sediment load by site in River Basin

Basin: East Flowing Rivers from Mahanadi to Kanyakumari

VIII

Unit: Million Metric Tonnes

Sl.No	Year	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual
(1)	(2)	(3)	(4)	(5)	(6)	(7)	-8	(9)	(10)	(11)	(12)	(13)	(14)
	Site Name	**Gundalakamma at Thammavaram**			**Pennar at Chennur**			**Kunderu at Alladupalli**			**Ponniar at Gummanur**		
1	2000-2001	0.421	0.003	0.424	3.755	0.038	3.793	1.375	0.105	1.480	0.023	0.000	0.023
2	2001-2002	0.071	0.004	0.075	4.712	0.032	4.744	N.A.	N.A.	N.A.	0.039	0.000	0.039
3	2002-2003	0.003	0.000	0.003	0.229	0.000	0.229	0.200	0.000	0.200	0.000	0.000	0.000
4	2003-2004	0.009	0.000	0.009	0.284	0.002	0.286	0.331	0.003	0.334	0.002	0.000	0.002
5	2004-2005	0.004	0.003	0.007	0.560	0.029	0.589	0.272	0.021	0.293	0.015	0.001	0.016
6	2005-2006	0.080	0.012	0.092	1.137	0.025	1.162	0.557	0.013	0.570	0.207	6.000	6.207
7	2006-2007	Sediment Observation not done			Sediment Observation not done			Sediment Observation not done			Sediment Observation not done		
8	2007-2008	Sediment Observation not done			Sediment Observation not done			Sediment Observation not done			Sediment Observation not done		
9	2008-2009	Sediment Observation not done			0.312	0.012	0.324	0.001	0.000	0.001	0.013	0.001	0.014
10	2009-2010	Sediment Observation not done			1.821	0.016	1.837	0.396	0.019	0.415	0.007	0.001	0.008
	Site Name	**Suriliyar at Theni**			**Thampaparani at Murappandu**			**Vaigai at Ambasamundram**			**Ponniyar at Vazhavachanur**		
1	2000-2001	0.036	0.016	0.052	0.005	0.011	0.016						
2	2001-2002	0.033	0.030	0.063	0.002	0.005	0.007				0.000	0.000	0.000
3	2002-2003	0.012	0.009	0.021	0.001	0.009	0.010	0.003	0.010	0.013	0.000	0.000	0.000
4	2003-2004	0.010	0.007	0.017	0.000	0.005	0.005	0.010	0.023	0.033	0.000	0.001	0.001
5	2004-2005	0.022	0.024	0.046	0.002	0.059	0.061	0.060	0.061	0.121	0.003	0.005	0.008
6	2005-2006	0.062	52.000	52.062	0.004	0.019	0.023	0.058	0.083	0.141	0.090	0.015	0.105
7	2006-2007	0.050	0.009	0.059	0.054	0.008	0.062	0.053	0.003	0.056	Sediment Observation not done		
8	2007-2008	0.156	0.033	0.189	0.004	0.019	0.023	0.037	0.131	0.168	Sediment Observation not done		
9	2008-2009	0.036	0.003	0.039	0.008	0.011	0.019	0.032	0.003	0.035	Sed. Obs. Not done	0.000	0.000
10	2009-2010	0.028	0.010	0.038	0.006	0.004	0.010	0.014	0.004	0.018	0.000	0.001	0.001

	Site Name	Gundlakamma at Marella		
1	2000-2001			
2	2001-2002			
3	2002-2003			
4	2003-2004	Started w.e.f 2007-2008		
5	2004-2005			
6	2005-2006			
7	2006-2007			
8	2007-2008	0.033	0.023	0.056
9	2008-2009	0.043	0.016	0.059
10	2009-2010	0.054	0.166	0.220

Source: Sediment Year Book (2000 to 2010) East Flowing Rivers.

Table 9 : Time series of Sediment load by site in River Basin

IX Basin: West Flowing Rivers from Kanyakumari to Tapi *Unit: Million Metric Tonnes*

Sl.No	Year	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
	Site Name	**Nethravathi at Bantwal**			**Payaswani at Erinijipuzha**			**Valapatanam at Perumannu**			**Chaliyar at Kuniyil**		
1	2000-2001	0.321	0.000	0.321	0.118	0.002	0.120	0.161	0.010	0.171	N.A.	N.A.	N.A.
2	2001-2002	0.353	0.006	0.359	0.116	0.005	0.121	0.150	0.003	0.153	0.105	0.025	0.130
3	2002-2003	0.437	0.005	0.442	0.081	0.002	0.083	0.135	0.002	0.137	0.063	0.004	0.067
4	2003-2004	0.649	0.001	0.650	0.111	0.003	0.114	0.054	0.008	0.062	0.046	0.008	0.054
5	2004-2005	0.877	0.004	0.881	0.119	0.002	0.121	0.279	0.003	0.282	0.232	0.012	0.244
6	2005-2006	1.646	0.025	1.671	0.181	0.009	0.190	0.358	0.030	0.388	0.315	0.042	0.357
7	2006-2007	Sediment Observation not done			Sediment Observation not done			Sediment Observation not done			Sediment Observation not done		
8	2007-2008	Sediment Observation not done			Sediment Observation not done			Sediment Observation not done			Sediment Observation not done		
9	2008-2009	Sediment Observation not done			0.108	0.001	0.109	0.091	0.001	0.092	0.111	Sediment Obsn. Not done	0.111
10	2009-2010	Sediment Observation not done			0.147	0.002	0.149	0.241	0.002	0.243	0.256	0.001	0.257

Contd.

	Site Name	Bharathapuzha at Kumbidi			Pulanthode at Pulamanthole			Chalakudi at Arangaly			Periyar at Neeleswaram		
1	2000-2001	0.178	0.014	0.192	0.041	0.002	0.043	0.015	0.000	0.015	0.082	0.005	0.087
2	2001-2002	0.243	0.047	0.290	0.071	0.016	0.087	0.018	0.002	0.020	0.101	0.012	0.113
3	2002-2003	0.143	0.010	0.153	0.052	0.003	0.055	0.012	0.003	0.015	0.051	0.004	0.055
4	2003-2004	0.077	0.010	0.087	`	0.004	0.027	0.013	0.003	0.016	0.046	0.011	0.057
5	2004-2005	0.260	0.009	0.269	0.088	0.003	0.091	0.061	0.007	0.068	0.085	0.006	0.091
6	2005-2006	0.302	0.033	0.335	0.118	0.010	0.128	0.066	0.002	0.068	0.127	0.017	0.144
7	2006-2007	0.309	0.005	0.314	Sediment Observation not done			Sediment Observation not done			0.076	Sediment Obsn. Not done	0.076
8	2007-2008	0.551	0.020	0.571	Sediment Observation not done			Sediment Observation not done			0.146	Sediment Obsn. Not done	0.146
9	2008-2009	0.126	0.004	0.130	Sediment Observation not done			0.035	0.001	0.036	0.054	Sediment Obsn. Not done	0.054
10	2009-2010	0.385	0.004	0.389	0.109	0.002	0.111	0.097	0.001	0.098	0.120	0.002	0.122

	Site Name	Muvattupuzha at Ramamangalam			Kaliyar at Kalampur			Meenachil at Kidangoor			Manimala at Kallooppara		
1	2000-2001	0.072	0.016	0.088	0.029	0.001	0.030	0.038	0.003	0.041	0.042	0.002	0.044
2	2001-2002	0.159	0.037	0.196	0.038	0.002	0.040	0.040	0.011	0.051	0.042	0.011	0.053
3	2002-2003	0.161	0.017	0.178	0.021	0.002	0.023	0.035	0.009	0.044	0.017	0.003	0.020
4	2003-2004	0.094	0.012	0.106	0.023	0.001	0.024	0.057	0.016	0.073	0.019	0.005	0.024
5	2004-2005	0.083	0.018	0.101	0.027	0.001	0.028	0.036	0.002	0.038	0.015	0.002	0.017
6	2005-2006	0.104	0.024	0.128	0.047	0.003	0.050	0.024	0.004	0.028	0.048	0.018	0.066
7	2006-2007	Sediment Observation not done			Sediment Observation not done			0.015	0.001	0.016	0.025	0.001	0.026
8	2007-2008	Sediment Observation not done			Sediment Observation not done			0.028	0.001	0.029	0.073	0.001	0.074
9	2008-2009	0.077	0.007	0.084	0.019	0.000	0.019	0.012	0.001	0.013	0.026	0.000	0.026
10	2009-2010	0.080	0.008	0.088	0.023	0.000	0.023	0.012	0.001	0.013	0.031	0.001	0.032

Contd/…

Table 9 : Time series of Sediment load by site in River Basin

IX **Basin: West Flowing Rivers from Kanyakumari to Tapi** *Unit: Million Metric Tonnes*

Sl.No	Year	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
	Site Name	**Kallada at Pattazhy**			**Aliyar at Ambarampalayam**			**Pumba at Malakkara**			**Achankovil at Thumpamon**		
1	2000-2001												
2	2001-2002												
3	2002-2003												
4	2003-2004												
5	2004-2005												
6	2005-2006												
7	2006-2007	Sediment Observation not done			Sediment Observation not done			Sediment Observation not done			Sediment Observation not done		
8	2007-2008	Sediment Observation not done			Sediment Observation not done			Sediment Observation not done			Sediment Observation not done		
9	2008-2009	0.007	0.002	0.009	0.002	0.001	0.003	0.022	0.000	0.022	0.036	0.000	0.036
10	2009-2010	0.013	0.006	0.019	0.009	0.002	0.011	0.032	0.001	0.033	0.029	0.001	0.030
	Site Name	**Vamanapuram at Ayilam**											
1	2000-2001												
2	2001-2002												
3	2002-2003												
4	2003-2004												
5	2004-2005												
6	2005-2006												
7	2006-2007	Sediment Observation not done											
8	2007-2008	Sediment Observation not done											
9	2008-2009	0.013	0.001	0.014									
10	2009-2010	0.017	0.002	0.019									

Source: Suspended Sediment Year Books (2000 to 2010) WestFlowing River.

Table 9 : Time series of Sediment load by site in River Basin

X **Basin : Tapi**

Unit: Million Metric Tonnes

Sl.No	Year	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
	Site Name	**Tapi at Dedtali**			**Tapi at Burhanpur**			**Panjhara at Morane**			**Tapi at Sarankheda**		
1	2000-2001	1.616	0.044	1.660	0.834	0.015	0.849	0.000	0.000	0.000	4.686	0.000	4.686
2	2001-2002	2.419	0.360	2.779	7.769	0.598	8.367	0.766	0.000	0.766	4.796	0.000	4.796
3	2002-2003	1.796	0.000	1.796	4.928	0.002	4.930	13.656	0.000	13.656	43.493	0.000	43.493
4	2003-2004	1.680	0.000	1.680	2.348	0.003	2.351	0.138	0.000	0.138	7.669	0.000	7.669
5	2004-2005	Sediment Observation not done			Sediment Observation not done			Sediment Observation not done			Sediment Observation not done		
6	2005-2006	Sediment Observation not done			1.056	0.001	1.057	Sediment Observation not done			7.495	0.000	7.495
7	2006-2007	Sediment Observation not done			4.001	0.001	4.002	Sediment Observation not done			27.657	0.000	27.657
8	2007-2008	Sediment Observation not done			11.278	0.001	11.279	Sediment Observation not done			27.782	0.000	27.782
9	2008-2009	Sediment Observation not done			2.348	0.001	2.349	Sediment Observation not done			2.779	0.000	2.779
10	2009-2010	Sediment Observation not done			1.269	0.011	1.280	Sediment Observation not done			5.015	0.000	5.015
	Site Name	**Purna at Gopalkheda**			**Purna at Yearli**			**Girna at Dapuri**			**Tapi at Savkheda**		
1	2000-2001	0.378	0.001	0.379	0.366	0.000	0.366	0.066	0.000	0.066	3.336	0.000	3.336
2	2001-2002	0.198	0.062	0.260	0.354	0.513	0.867	0.003	0.000	0.003	2.514	0.800	3.314
3	2002-2003	1.219	0.000	1.219	8.230	0.000	8.230	0.062	0.042	0.001	13.656	0.000	13.656
4	2003-2004	0.030	0.000	0.030	0.215	0.000	0.215	0.078	0.000	0.078	4.255	0.000	4.255
5	2005-2006	Sediment Observation not done			Sediment Observation not done			Sediment Observation not done			Sediment Observation not done		
6	2005-2006	0.987	0.000	0.987	2.110	0.003	2.113	Sediment Observation not done			Sediment Observation not done		
7	2006-2007	1.449	0.000	1.449	30.361	0.000	30.361	Sediment Observation not done			Sediment Observation not done		
8	2007-2008	2.300	0.006	2.306	11.279	0.000	11.279	Sediment Observation not done			Sediment Observation not done		
9	2008-2009	0.230	0.000	0.230	0.668	0.000	0.668	Sediment Observation not done			Sediment Observation not done		
10	2009-2010	0.508	0.000	0.508	0.558	0.001	0.559	Sediment Observation not done			Sediment Observation not done		

Source: Sediment Data Book (2000 to 2010) Tapi Basin.

Table 9 : Time series of Sediment load by site in River Basin

XI **Basin : Narmada** *Unit: Million Metric Tonnes*

Sl. No	Year	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
	Site Name	**Orsang at Chandwada**			**Narmada at Garudeshwar**			**Narmada at Rajghat**			**Narmada at Mandleshwar**		
1	2000-2001	0.500	0.000	0.500	1.674	0.025	1.699	7.987	0.028	8.015	5.124	0.12	5.244
2	2001-2002	0.681	0.000	0.681	4.179	0.061	4.240	12.603	0.034	12.637	18.022	0.056	18.078
3	2002-2003	0.658	0.000	0.658	4.705	0.046	4.751	36.003	0.027	36.030	23.533	0.026	23.559
4	2003-2004	1.515	0.000	1.515	5.458	0.012	5.470	29.422	0.041	29.463	12.520	0.031	12.551
5	2004-2005	3.739	0.00	3.739	2.598	0.026	2.624	8.643	0.039	8.682	5.775	0.015	5.790
6	2005-2006	0.005	0.000	0.005	2.678	0.085	2.683	7.873	0.164	8.037	3.756	0.018	10.347
7	2006-2007	2.259	0.000	2.259	6.639	0.060	3.005	6.569	0.0216	6.591	23.348	0.070	29.939
8	2007-2008	1.191	0.000	1.191	3.310	0.044	4.501	0.014	0.000	6.591	3.620	0.061	3.620
9	2008-2009	0.733	0.000	0.733	0.040	0.000	0.773	-	-	-	0.357	0.258	1.508
10	2009-2010	0.047	0.000	0.047	0.719	0.008	0.727	-	-	-	1.250	0.383	0.383
	Site Name	**Narmada at Handia**			**Narmada at Hoshangabad**			**Narmada at Sandia**			**Burhner at Mohgaon**		
1	2000-2001	4.651	0.828	5.479	5.364	0.046	5.410	9.459	0.033	9.492	1.813	0.023	1.836
2	2001-2002	23.565	0.071	23.636	11.442	0.077	11.519	17.388	0.085	17.473	2.522	0.004	2.526
3	2002-2003	41.982	0.170	42.152	12.64	0.187	12.827	14.125	0.152	14.277	0.852	0.000	0.852
4	2003-2004	4.000	90.085	0.058	90.143	29.422	0.041	12.520	0.031	12.551	4.468	0.002	4.47
5	2004-2005	20.327	0.239	20.566	10.949	0.234	11.183	10.280	0.097	10.377	2.399	0.003	2.402
6	2005-2006	4.147	0.099	4.246	41.755	0.0113	46.001	26.94	0.200	72.941	9.694	0.002	9.696
7	2006-2007	45.195	0.293	45.488	21.224	0.064	21.288	17.84	0.125	17.965	3.637	0.003	3.640
8	2007-2008	8.953	0.986	9.939	3.247	48.000	51.247	0.226	0.011	0.237	1.021	0.001	27.782
9	2008-2009	5.449	0.128	5.577	6.548	0.005	6.553	1.005	0.006	1.011	0.646	0.000	0.646
10	2009-2010	20.454	0.148	20.602	14.346	0.013	14.359	47.17	0.042		0.646	0.000	0.646

.

Contd/…

Table 9 : Time series of Sediment load by site in River Basin

XI **Basin : Narmada** *Unit: Million Metric Tonnes*

Sl. No	Year	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
	Site Name	**Shakkar at Gadarwara**				**Narmada at Barmanghat**			**Banjar at Bamni**		**Narmada at Manot**		
1	2000-2001	0.493	0.000	0.493	1.364	0.262	1.626				2.049	0.008	2.057
2	2001-2002	0.351	0.000	0.351	2.347	0.022	2.369				2.757	0.003	2.760
3	2002-2003	0.646	0.000	0.646	7.825	0.036	7.861	0.368	0.000	0.368	1.846	0.001	1.847
4	2003-2004	8.000	0.732	0.001	0.733	9.541	0.076	0.783	0.000	0.783	3..950	0.009	0.01
5	2004-2005	0.132	0.000	0.132	2.518	0.095	2.613	0.323	0.000	0.323	9.219	0.007	9.226
6	2005-2006	0.746	0.000	0.746	15.179	0.080	15.259	1.640	0.000	1.640	10.702	0.003	10.705
7	2006-2007	2.654	0.000	2.654	3.190	0.040	3.230	0.325	0.000	0.325	2.397	0.002	2.399
8	2007-2008	0.739	0.000	0.739	10.701	0.077	10.778	0.372	0.000	0.372	1.844	0.002	1.846
9	2008-2009	0.093	0.000	0.093	1.844	0.006	1.850	0.209	0.000	0.209	1.556	0.000	1.556
10	2009-2010	5.462	0.000	5.462	18.821	0.079	18.900	0.137	0.000	0.137	0.821	0.002	0.823

Source: Sediment Data Book (2000 to 2010) Narmada Basin.

Table 9 : Time series of Sediment load by site in River Basin

XII **Basin : Mahi and Sabarmati** *Unit: Million Metric Tonnes*

Sl.No	Year	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual	Monsoon	Non-Monsoon	Annual
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
	Site Name	**Khanpur**			**Vaitarana at Durvesh**			**Padaradibadi**			**Mataji**		
1	2000-2001	0.091	0.218	0.309	0.448	0.000	0.448	0.968	0.000	0.968	0.050	0.000	0.050
2	2001-2002	0.052	0.266	0.318	0.561	0.002	0.563	0.005	0.000	0.005	0.053	0.000	0.053
3	2002-2003	0.217	0.001	0.218	1.496	0.000	1.496	0.000	0.000	0.000	0.217	0.000	0.217
4	2003-2004	0.558	0.052	0.610	1.508	0.001	1.509	0.013	0.000	0.013	3.958	0.000	3.958
5	2004-2005	Sediment Observation not done			Sediment Observation not done			Sediment Observation not done			Sediment Observation not done		
6	2005-2006	0.498	0.005	0.503	1.819	0.000	1.819	0.214	0.000	0.214	7.378	0.000	7.378
7	2006-2007	24.257	0.000	24.257	2.649	0.000	2.649	5.760	0.000	5.760	4.262	0.000	4.262
8	2007-2008	1.876	0.005	1.881	1.571	0.000	1.571	0.157	0.000	0.157	2.046	0.000	2.046
9	2008-2009	0.069	0.002	0.071	1.829	0.000	1.829	0.013	0.000	0.013	0.046	0.000	0.046
10	2009-2010	0.002	0.000	0.002	0.677	0.000	0.677	0.006	0.000	0.006	2.311	0.000	2.311
	Site Name	**Ambica at Gadat**			**Banas at Kamalpur**			**Bhadar at Ganod**			**Purna at Mahuwa**		
1	2000-2001	0.082	0.008	0.090	0.009	0.000	0.009	0.009	0.000	0.009	0.055	0.000	0.055
2	2001-2002	0.650	0.004	0.654	0.014	0.000	0.014	0.061	0.000	0.061	0.544	0.003	0.547
3	2002-2003	0.364	0.000	0.364	0.000	0.000	0.000	0.187	0.000	0.187	0.701	0.000	0.701
4	2003-2004	0.756	0.000	0.756	0.158	0.000	0.158	0.072	0.000	0.072	1.441	0.000	1.441
5	2004-2005	Sediment Observation not done			Sediment Observation not done			Sediment Observation not done			Sediment Observation not done		
9	2005-2006	1.539	0.000	1.539	0.029	0.000	0.029	0.039	0.000	0.039	2.418	0.000	2.418
10	2006-2007	0.805	0.000	0.805	0.770	0.000	0.770	0.434	0.000	0.434	0.869	0.000	0.869
8	2007-2008	0.401	0.000	0.401	0.815	0.000	0.815	1.330	0.000	1.330	0.604	0.000	0.604
9	2008-2009	0.583	0.000	0.583	0.064	0.000	0.064	0.503	0.000	0.503	0.332	0.000	0.332
10	2009-2010	0.174	0.000	0.174	0.004	0.000	0.004	0.049	0.000	0.049	0.059	0.000	0.059
													Contd.

	Site Name	Shetrunji at Lowara			Sabarmati at Derol Bridge		
1	2000-2001	0.669	0.000	0.669	0.000	0.000	0.000
2	2001-2002	0.340	0.000	0.340	0.088	0.051	0.139
3	2002-2003	2.496	0.000	2.496	0.000	0.000	0.000
4	2003-2004	0.147	0.000	0.147	0.000	0.000	0.000
5	2004-2005	Sediment Observation not done			Sediment Observation not done		
6	2005-2006	1.932	0.000	1.932	0.001	0.000	0.001
7	2006-2007	1.475	0.000	1.475	0.615	0.000	0.615
8	2007-2008	3.122	0.000	3.122	0.030	0.000	0.030
9	2008-2009	3.018	0.000	3.018	0.000	0.000	0.000
10	2009-2010	0.457	0.000	0.457	0.000	0.000	0.000

Source: Sediment Data Book (2000 to 2010) Mahi & Others Flowing River Basins.

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

I Basin : Mahanadi *Unit : Tonnes per day*

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2007-2008												
Pairi at Baronda												
01-10 days	-	2024	49423	4044	710	0	0	-	-	-	-	-
11-20 days	0	35887	2325	5579	103	0	0	-	-	-	-	-
R - days	17383	326	3036	3817	0	0	0	-	-	-	-	-
Monthly	8692	12345	17770	4480	262	0	0	-	-	-	-	-
Mahanadi at Rajim												
01-10 days	0	2635	35285	5435	1358	28	1	0	7	2	4	0
11-20 days	36	19899	4229	3947	109	24	1	0	5	3	4	0
R - days	49793	530	4723	3043	46	10	1	1	1	3	5	1
Monthly	16610	7457	14422	4142	490	21	1	0	4	3	4	0
Pairi at Seorinaryan												
01-10 days 11-20 days R - days Monthly	<---------- Data not available ---------->											
Mahanadi at Basantpur												
01-10 days	15	237573	141409	40862	8239	62	37	98	103	58	74	18
11-20 days	133	107159	20581	18101	1033	97	18	99	100	64	54	21
R - days	1999	18003	30232	25521	174	29	24	102	48	73	65	12
Monthly	716	117592	62982	28161	3053	63	26	100	85	65	64	17
Pairi at Kotni												
01-10 days 11-20 days R - days Monthly	<---------- Data not available ---------->											

Contd/…

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

I Basin : Mahanadi

Unit : Tonnes per day

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2007-2008												
Seonath at Pathardih												
01-10 days	<---------- Data not available ---------->											
11-20 days												
R - days												
Monthly												
Seonath at Simga												
01-10 days	0	66795	29664	11910	2253	207	2	8	3	0	-	0
11-20 days	0	4762	9684	3567	709	73	1	2	3	-	-	0
R - days	0	4054	12330	4248	337	38	1	2	0	-	-	0
Monthly	0	24521	17068	6575	1075	106	1	4	2	-	-	0
Hamp at Andhiyarkore												
01-10 days	0	215	2626	2911	720	7	0	0	0	0	0	0
11-20 days	205	202	144	513	9	0	0	0	0	-	0	0
R - days	368	1068	601	3350	0	0	0	0	0	-	0	0
Monthly	191	513	1107	2258	235	2	0	0	0	-	0	0
Seonath at Ghatora												
01-10 days	0	142	456	2028	76	-	20	-	-	-	-	-
11-20 days	0	662	224	433	25	-	56	-	-	-	-	-
R - days	0	242	1320	405	13	-	1	-	-	-	-	-
Monthly	0	345	688	955	37	-	25	-	-	-	-	-

Contd/…

Seonath at Jondhra												
01-10 days	0	168960	68039	63063	4906	315	6	11	14	3	2	-
11-20 days	0	46015	24703	19225	1010	54	4	12	13	2	2	-
R - days	1403	6898	42253	7534	309	5	4	12	9	2	1	-
Monthly	468	71794	44910	29941	2018	125	5	12	12	2	2	-
Jonk at Rampur												
01-10 days	0	15934	2201	2530	1250	20	0	-	-	-	-	-
11-20 days	0	30492	992	687	57	8	0	-	-	-	-	-
R - days	24335	317	2856	2344	22	0	0	-	-	-	-	-
Monthly	8112	15089	2043	1854	429	9	0	-	-	-	-	-
Hasdeo at Manendragarh												
01-10 days	0	96	108	315	134	0	0	-	-	-	-	-
11-20 days	0	72	65	137	13	0	0	-	-	-	-	-
R - days	42	82	141	205	3	0	0	-	-	-	-	-
Monthly	14	83	106	219	48	0	0	-	-	-	-	-

Contd/…

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

I Basin : Mahanadi

Unit : Tonnes per day

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2007-2008												
Hasdeo at Bamnidhi												
01-10 days	10	737	967	2918	707	28	39	162	176	140	129	-
11-20 days	75	1653	1456	796	186	55	24	187	147	169	128	-
R - days	217	2011	2621	1441	56	25	38	171	191	116	151	-
Monthly	101	1485	1712	1718	308	36	34	173	171	141	136	-
Mand at Kurubhata												
01-10 days	0	32952	14177	21451	3878	8	4	5	-	-	-	-
11-20 days	0	5638	2348	1781	52	25	2	2	-	-	-	-
R - days	1957	1636	12911	13893	10	4	4	2	-	-	-	-
Monthly	652	13029	9912	12375	1271	12	3	3	-	-	-	-
IB at Sundargarh												
01-10 days	0	39671	19608	42404	5335	37	1	0	0	0	2	0
11-20 days	63	7268	16154	9745	156	12	0	0	0	0	-	0
R - days	1083	10255	11010	21127	6	4	1	1	0	1	1	-
Monthly	382	18780	15443	24425	1773	18	1	0	0	0	2	0
Ong at Salebhata												
01-10 days	0	4707	333	2892	2259	1	1	0	0	0	0	0
11-20 days	3	2111	232	539	5	1	0	0	0	0	0	0
R - days	3724	152	639	3318	1	0	0	0	0	0	0	0
Monthly	1242	2253	409	2250	731	1	0	0	0	0	0	0
Tel at Kesinga												
01-10 days	125	20319	289501	19279	7642	324	516	860	529	174	-	-
11-20 days	1920	239145	145386	17098	1296	291	1146	533	424	164	-	-
R - days	119165	14294	11608	23435	881	591	999	1606	116	83	-	-
Monthly	40403	88770	144405	19937	3196	402	891	1019	365	138	-	-

Contd/…

Tel at Kantamal												
01-10 days	84	22725	176861	27645	67340	462	785	1229	1097	310	59	0
11-20 days	934	111814	91183	22649	3228	714	149	893	767	5	11	0
R - days	22878	5520	16206	44389	1323	362	238	1282	882	43	0	0
Monthly	2655	15562	31583	10520	7988	171	130	378	305	40	8	0
Mahanadi at Tikarpara												
01-10 days	624	146758	121797	57395	29526	13551	4322	2737	3132	2533	3448	2540
11-20 days	1806	129169	171491	48719	19565	9338	1944	3176	2003	3686	2874	2794
R - days	28211	58071	86440	97181	45637	3354	2928	4654	1701	2823	2417	1584
Monthly	10214	109615	125281	67765	32030	8748	3060	3559	2299	3008	2913	2283

Source: Suspended Sediment Data Year Book (2007 to 2008) Mahanadi Basin.

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

I Basin : Mahanadi

Unit : Tonnes per day

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2008-2009												
Pairi at Baronda												
01-10 days	78	15	7468	8322	106	0	0	0	0	-	-	0
11-20 days	31	3	1846	21209	96	0	0	0	0	-	-	0
R - days	199	156	2411	3535	31	0	0	0	0	-	-	0
Monthly	77	58	3908	11022	78	0	0	0	0	-	-	0
Mahanadi at Rajim												
01-10 days	3	171	13394	4092	111	19	0	0	0	0	0	0
11-20 days	5	124	5507	34411	89	24	0	0	0	0	0	0
R - days	460	726	939	5393	30	5	0	0	0	0	0	0
Monthly	155	340	6613	14632	77	16	0	0	0	0	0	0

Contd/…

Pairi at Seorinaryan												
01-10 days	<---------- Data is not Available ---------- >											
11-20 days												
R - days												
Monthly												
Mahanadi at Basantpur												
01-10 days	5	5883	17622	6280	2380	130	22	7	12	9	10	6
11-20 days	132	3835	33763	88685	985	40	12	15	5	4	16	13
R - days	552	5193	16377	25173	96	25	18	6	7	10	5	4
Monthly	228	4970	22587	40046	1154	65	17	0	0	0	0	0
Pairi at Kotni												
01-10 days	<---------- Data is not Available ---------- >											
11-20 days												
R - days												
Monthly												

Contd/…

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

I Basin : Mahanadi

Unit : Tonnes per day

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2008-2009												
Pairi at Baronda												
01-10 days	78	15	7468	8322	106	0	0	0	0	-	-	0
11-20 days	31	3	1846	21209	96	0	0	0	0	-	-	0
R - days	199	156	2411	3535	31	0	0	0	0	-	-	0
Monthly	77	58	3908	11022	78	0	0	0	0	-	-	0
Mahanadi at Rajim												
01-10 days	3	171	13394	4092	111	19	0	0	0	0	0	0
11-20 days	5	124	5507	34411	89	24	0	0	0	0	0	0
R - days	460	726	939	5393	30	5	0	0	0	0	0	0
Monthly	155	340	6613	14632	77	16	0	0	0	0	0	0
Pairi at Seorinaryan												
01-10 days	<---------- Data is not Available ---------- >											
11-20 days												
R - days												
Monthly												
Mahanadi at Basantpur												
01-10 days	5	5883	17622	6280	2380	130	22	7	12	9	10	6
11-20 days	132	3835	33763	88685	985	40	12	15	5	4	16	13
R - days	552	5193	16377	25173	96	25	18	6	7	10	5	4
Monthly	228	4970	22587	40046	1154	65	17	0	0	0	0	0

Contd/…

Pairi at Kotni	
01-10 days	<---------- Data is not Available ---------- >
11-20 days	
R - days	
Monthly	

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

I Basin : Mahanadi

Unit : Tonnes per day

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2008-2009												
Seonath at Pathardih												
01-10 days	<---------- Data not available ---------- >											
11-20 days												
R - days												
Monthly												
Seonath at Simga												
01-10 days	0	51	657	257	65	6	0	0	0	0	0	0
11-20 days	5	54	965	2835	52	3	0	0	0	0	0	0
R - days	7	47	301	2342	26	2	0	0	0	0	0	0
Monthly	4	51	641	1811	48	4	0	0	0	0	0	0
Hamp at Andhiyarkore												
01-10 days	0	81	749	13	1	0	0	0	0	0	0	0
11-20 days	5	47	51	604	0	0	0	0	0	0	0	0
R - days	509	74	56	195	0	0	0	0	0	0	0	0
Monthly	171	67	285	271	0	0	0	0	0	0	0	0
Seonath at Ghatora												

Contd/…

01-10 days	0	236	340	155	62	0	0	0	0	0	0	0
11-20 days	0	236	688	726	25	0	0	0	0	0	0	0
R - days	578	912	334	341	25	0	0	0	0	0	0	0
Monthly	193	461	454	407	17	0	0	0	0	0	0	0
Seonath at Jondhra												
01-10 days	0	3043	40971	6106	1879	109	33	34	198	0	0	0
11-20 days	0	5152	50907	93825	1840	39	10	21	152	0	0	0
R - days	2309	5396	12267	66152	2022	25	13	388	0	0	0	0
Monthly	770	4530	34715	55361	1914	58	19	148	117	0	0	0
Jonk at Rampur												
01-10 days	0	0	76665	584	27	0	0	0	0	0	0	0
11-20 days	0	0	307826	46542	10	0	0	0	0	0	0	0
R - days	0	0	81983	919	1	0	0	0	0	0	0	0
Monthly	0	0	155491	16015	13	0	0	0	0	0	0	0
Hasdeo at Manendragarh												
01-10 days	-	472	601	175	84	1	0	0	0	0	0	0
11-20 days	14	113	592	396	18	0	0	0	0	0	0	-
R - days	470	629	276	110	1	0	0	0	0	0	0	-
Monthly	161	405	490	227	34	0	0	0	0	0	0	0

Contd/…

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

I Basin : Mahanadi

Unit : Tonnes per day

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2008-2009												
Hasdeo at Bamnidhi												
01-10 days	0	649	1320	274	157	10	7	18	22	18	47	21
11-20 days	71	496	1860	602	49	9	3	16	22	14	23	33
R - days	961	1717	749	256	6	5	6	20	16	20	15	28
Monthly	344	954	1310	377	71	8	5	18	20	17	28	27
Mand at Kurubhata												
01-10 days	0	27093	2159	3124	250	24	5	0	0	0	0	0
11-20 days	329	2200	34769	31796	93	7	1	0	0	0	0	0
R - days	1707	4806	19042	2770	4	5	1	0	0	0	0	0
Monthly	679	11366	18657	12563	116	12	2	0	0	0	0	0
IB at Sundargarh												
01-10 days	0	28342	5823	3436	2895	1	0	0	-	-	-	0
11-20 days	746	15138	68090	62558	57	1	0	0	-	-	-	0
R - days	4790	20537	21026	2283	1	0	0	0	-	-	-	0
Monthly	1845	21339	31646	22759	984	1	0	0	-	-	-	0
Ong at Salebhata												
01-10 days	-	2150	6336	1164	30	0	0	0	0	0	0	0
11-20 days	51	928	18445	19121	6	0	0	0	0	0	0	0
R - days	1478	761	20916	1214	0	0	0	0	0	0	0	0
Monthly	510	1280	15232	7166	12	0	0	0	0	0	0	0

Contd/…

Tel at Kesinga												
01-10 days	0	4800	75111	10849	885	299	69	25	135	389	0	0
11-20 days	350	3853	26170	175111	831	396	10	35	205	353	0	0
R - days	8784	14426	12269	5852	866	84	22	11	218	276	0	0
Monthly	3045	7693	37850	63937	861	260	34	24	186	339	0	0
Tel at Kantamal												
01-10 days	112	5195	137033	23807	0	0	0	0	-	-	-	0
11-20 days	710	4742	128250	3582	0	0	0	0	-	-	-	0
R - days	4558	25029	521162	0	0	0	0	0	-	-	-	0
Monthly	1756	11655	262148	9130	0	0	0	0	-	-	-	0
Mahanadi at Tikarpara												
01-10 days	4852	23712	182104	82130	28342	4015	1682	3572	2763	3162	1299	1551
11-20 days	8612	34756	251303	215470	28710	3908	1833	4790	3285	2184	2164	1946
R - days	15394	41337	128323	165071	11363	2168	1638	4134	2854	1606	1403	1347
Monthly	8002	33268	187243	154224	22805	3364	1718	4165	2967	2317	1622	1615

Source: Suspended Sediment Data Year Book (2008 to 2009) Mahanadi Basin.

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

I Basin : Mahanadi *Unit : Tonnes per day*

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2009-2010												
Pairi at Baronda												
01-10 days	0	0	72	1662	86	0	0	0	0	0	0	N.A.
11-20 days	0	2171	520	15	16	0	0	0	0	0	0	N.A.
R - days	0	3291	4396	36	4	0	0	0	0	0	0	N.A.
Monthly	0	607	554	190	12	0	0	0	0	0	0	N.A.
Mahanadi at Rajim												
01-10 days	N.A.	N.A.	47	3080	164	9	1	0	0	0	0	0
11-20 days	N.A.	781	322	51	15	25	0	0	0	0	0	0
R - days	N.A.	5999	10803	110	6	28	0	0	0	0	0	0
Monthly	N.A.	1130	1241	360	21	7	0	0	0	0	0	0
Pairi at Seorinaryan												
01-10 days	<----------Data not available ---------->											
11-20 days												
R - days												
Monthly												
Mahanadi at Basantpur												
01-10 days	22	1158	3040	15473	6120	37	12	4	25	5	0	N.A.
11-20 days	94	161375	30664	2821	394	12	12	5	4	2	0	N.A.
R - days	60	123345	52794	1419	4	54	9	2	8	6	0	N.A.
Monthly	20	31764	9611	2190	724	11	4	1	4	1	0	N.A.
Pairi at Kotni												
01-10 days	<----------Data not available ---------->											
11-20 days												
R - days												
Monthly												

Contd/…

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

I Basin : Mahanadi *Unit : Tonnes per day*

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2009-2010												
Seonath at Pathardih												
01-10 days	<----------Data not available ---------->											
11-20 days												
R - days												
Monthly												
Seonath at Simga												
01-10 days	0	35	113	N.A.	N.A.	N.A.	0	0	0	0	0	0
11-20 days	0	11666	955	N.A.	N.A.	N.A.	0	0	0	0	0	0
R - days	0	16634	976	N.A.	N.A.	N.A.	0	0	0	0	0	0
Monthly	0	3148	227	N.A.	N.A.	N.A.	0	0	0	0	0	0
Hamp at Andhiyarkore												
01-10 days	0	983	0	61	5	0	0	0	0	0	0	N.A.
11-20 days	0	554	44	0	0	0	0	0	0	0	0	N.A.
R - days	0	350	41	1	0	0	0	0	0	0	0	N.A.
Monthly	0	210	9	7	1	0	0	0	0	0	0	N.A.
Seonath at Ghatora												
01-10 days	0	861	67	434	48	0	0	0	0	0	0	0
11-20 days	0	742	492	131	18	0	0	0	0	0	0	0
R - days	0	530	641	25	0	0	0	0	0	0	0	0
Monthly	0	237	133	66	7	0	0	0	0	0	0	0
Seonath at Jondhra												
01-10 days	0	53	166	15196	1946	26	13	7	0	0	N.A.	N.A.
11-20 days	0	60801	7285	2691	1716	10	10	0	0	0	N.A.	N.A.
R - days	0	56149	18632	714	31	376	10	0	0	0	N.A.	N.A.
Monthly	0	13000	2898	2067	410	46	4	1	0	0	N.A.	N.A.

Contd/…

Jonk at Rampur												
01-10 days	856	139	0	0	0	0	0	0	0	0	0	N.A.
11-20 days	28	19	0	0	0	0	0	0	0	0	0	N.A.
R - days	27	9	0	0	0	0	0	0	0	0	0	N.A.
Monthly	101	19	0	0	0	0	0	0	0	0	0	N.A.
Hasdeo at Manendragarh												
01-10 days	0	150	9	937	32	1	2	0	0	0	0	0
11-20 days	0	264	204	60	8	1	1	0	N.A.	0	0	0
R - days	413	236	177	17	0	1	1	0	N.A.	0	0	0
Monthly	46	72	43	113	4	0	0	0	0	0	0	0

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

I Basin : Mahanadi

Unit : Tonnes per day

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2009-2010												
Hasdeo at Bamnidhi												
01-10 days	23	319	87	353	390	13	9	4	12	6	0	N.A.
11-20 days	56	3354	1072	108	104	4	6	12	4	3	0	N.A.
R - days	54	2019	1556	138	5	11	10	4	12	6	0	N.A.
Monthly	15	632	302	67	55	3	3	2	3	2	0	N.A.
Mand at Kurubhata												
01-10 days	0	580	135	1523	2184	6	3	1	0	0	0	0
11-20 days	0	3633	1541	173	93	6	3	1	0	0	0	0
R - days	0	4387	4364	40	4	19	4	0	0	0	0	0
Monthly	0	956	671	193	253	3	1	0	0	0	0	0
IB at Sundargarh												
01-10 days	0	5102	801	32037	138420	24	1	1	2	0	0	0
11-20 days	0	59198	13902	1167	192	4	0	1	1	0	0	0
R - days	71	20063	22182	926	21	5	0	0	2	0	0	0
Monthly	8	9374	4098	3792	15404	4	0	0	1	0	0	0
Ong at Salebhata												Contd/…

01-10 days	0	0	130	813	59	0	0	0	0	0	0	0
11-20 days	0	0	372	20	12	0	0	0	0	0	0	0
R - days	0	0	4686	40	0	0	0	0	0	0	0	0
Monthly	0	0	576	97	8	0	0	0	0	0	0	0
Tel at Kesinga												
01-10 days	0	1226	3593	5271	3228	0	0	0	0	0	0	0
11-20 days	0	885564	6064	422	174	0	0	0	0	0	0	0
R - days	0	373197	145148	1258	15	0	0	0	0	0	0	0
Monthly	0	139999	17201	772	380	0	0	0	0	0	0	0
Tel at Kantamal												
01-10 days	0	0	0	0	0	0	0	0	0	0	0	0
11-20 days	0	0	0	0	0	0	0	0	0	0	0	0
R - days	0	0	0	0	0	0	0	0	0	0	0	0
Monthly	0	0	0	0	0	0	0	0	0	0	0	0
Mahanadi at Tikarpara												
01-10 days	1392	27190	39889	65671	3176	643	96	879	298	60	163	129
11-20 days	1989	247526	92790	20226	2656	395	113	1047	514	108	126	143
R - days	1705	37567	91873	20305	1174	155	85	883	157	61	82	106
Monthly	565	34698	24950	11800	778	133	33	312	108	163	41	42

Source: Suspended Sediment Data Year Book (2009 to 2010) Mahanadi Basin.

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

II Basin : Subernarekha, Burhabalang & Baitarni *Unit : Tonnes per day*

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2007-2008												
a) Basin : Subernarekha												
Subarnarekha at Jamshedpur												
01-10 days	31	42194	16901	8341	11682	2230	665	27	23	15	0	15
11-20 days	31	14384	45438	6756	2702	1636	87	22	20	14	0	8
R - days	38	19279	20681	65359	1727	2416	43	23	17	12	13	31
Monthly	11	8429	9224	8940	1790	698	88	8	7	163	1	6
Subarnarekha at Ghatsila												
01-10 days	3	190089	81779	24324	44436	4244	2445	9	7	8	4	7
11-20 days	5	68563	216057	27258	6280	3880	24	11	6	6	5	8
R - days	9	71390	96307	254346	4072	3819	20	7	6	5	4	9
Monthly	2	36671	43794	33992	6088	1327	277	3	2	163	1	3
Kharkai at Adityapur												
01-10 days	5	24250	3906	1396	4415	84	17	12	16	11	7	5
11-20 days	8	12981	52208	1557	162	57	9	10	15	9	5	6
R - days	12	7758	13724	27835	215	33	8	12	13	11	5	8
Monthly	3	4999	7760	3421	532	19	4	4	5	163	2	2
b) Basin: Burhabalang												
Burhabalang at Govindpur												
01-10 days	89	32602	10623	5181	4168	2505	225	84	113	73	174	46
11-20 days	284	10432	44474	3826	1130	658	144	76	79	60	139	38
R - days	1602	7828	16852	71555	648	439	95	387	70	63	58	40
Monthly	219	5651	7994	8951	661	400	52	61	29	163	41	14

Contd/…

c) Basin: Baitarani												
Baitarani at Anandpur												
01-10 days	79	98625	18541	19537	16917	3458	319	354	208	141	191	67
11-20 days	1115	23419	99465	14206	5778	1292	298	250	278	106	75	67
R - days	1728	12085	733272	90877	2970	513	304	243	194	91	58	82
Monthly	325	14903	94586	13847	2852	585	102	94	76	163	36	24
Baitarani at Champua												
01-10 days	10	14750	6323	6632	3037	589	15	5	25	17	43	9
11-20 days	181	14537	16859	1816	96	33	11	5	23	14	41	8
R - days	2015	4207	5246	15112	86	27	8	50	19	46	29	39
Monthly	735	10940	9340	7853	1041	216	11	21	22	26	38	19

Source: Suspended Sediment Year Books (2007 to 2008) Subernarekha, Burhabalang & Baitarni.

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

II Basin : Subernarekha, Burhabalang & Baitarni *Unit : Tonnes per day*

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2008-2009 a) Basin : Subernarekha												
01-10 days 11-20 days R - days Monthly	<---------- Data not available ---------->											

Contd/…

b) Basin: Burhabalang	
01-10 days 11-20 days R - days Monthly	<---------- Data not available ---------->
c) Basin: Baitarani	
01-10 days 11-20 days R - days Monthly	<---------- Data not available ---------->

Source: Suspended Sediment Year Books (2008 to 2009) Subernarekha, Burhabalang & Baitarni.

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

II Basin : Subernarekha, Burhabalang & Baitarni *Unit : Tonnes per day*

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	-6	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2009-2010 a) Basin : Subernarekha												
Subarnarekha at Jamshedpur												
01-10 days	95	853	3216	41625	10679	1324	938	648	349	113	77	262
11-20 days	48	4418	7117	14734	2550	1196	846	568	304	157	76	52
R - days	91	3086	14470	5393	1466	1079	769	409	262	89	69	56
Monthly	26	929	2756	6861	1633	400	284	181	102	163	25	41
Subarnarekha at Ghatsila												
01-10 days	12	476	3811	36866	6347	206	6	10	0	0	0	0
11-20 days	8	4744	8232	5093	1171	67	7	5	6	0	0	0
R - days	5	6319	8047	2297	928	77	2	3	0	0	1	3
Monthly	3	1282	2232	4917	938	39	2	2	1	163	0	0
												Contd/…

Kharkai at Adityapur												
01-10 days	5	289	2763	57183	5534	49	9	6	3	2	2	1
11-20 days	5	4196	13974	4947	202	26	7	5	3	1	1	1
R - days	29	2208	11743	811	88	14	6	3	3	2	1	1
Monthly	4	744	3164	6993	647	10	2	2	1	163	0	0
c) Basin: Burhabalang												
Burhabalang at Govindpur												
01-10 days	84	28	1319	26693	53848	191	86	13	13	6	4	53
11-20 days	41	3587	2764	6988	3007	175	76	18	11	5	2	36
R - days	19	11127	21307	3779	906	164	41	14	9	5	2	218
Monthly	16	1638	2821	4162	6418	59	23	5	4	163	1	34
c) Basin: Baitarani												
Baitarani at Anandpur												
01-10 days	142	801	3924	7275	7482	63	67	11	13	10	6	25
11-20 days	100	9415	3158	2796	918	91	62	13	11	6	6	14
R - days	117	30336	5929	2129	306	78	39	16	10	6	6	37
Monthly	40	4506	1446	1356	967	26	19	4	4	163	2	8
Baitarani at Champua												
01-10 days	102	1316	1199	1707	1236	14	17	8	6	4	3	4
11-20 days	70	3362	2679	721	92	20	13	7	6	4	3	3
R - days	37	4548	1925	953	23	67	10	7	5	4	3	3
Monthly	23	1025	645	376	150	11	4	2	2	1	1	1

Source: Suspended Sediment Year Books (2000 to 2010) Subernarekha, Burhabalang & Baitarni.

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

III Basin : Brahamani *Unit : Tonnes per day*

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2007-2008												
Brahmani at Tilga												
01-10 days	0	14412	17915	9921	5506	680	15	0	0	0	0	0
11-20 days	1533	6516	13848	3362	819	66	0	0	0	0	0	0
R - days	1957	8140	21799	20402	153	26	0	0	0	0	0	0
Monthly	388	3230	5951	3743	720	86	2	0	0	163	0	0
Brahmani at Panposh												
01-10 days	108	87967	143247	62709	65491	8772	303	203	45	31	60	43
11-20 days	1178	34844	528129	54356	8140	1726	264	147	65	47	47	32
R - days	4799	39811	176288	276018	2021	440	263	151	35	47	33	22
Monthly	676	18069	94185	43676	8406	1215	92	56	16	163	16	11
Brahmani at Gomlai												
01-10 days	350	177003	68621	22285	30425	6921	113	9	20	18	159	12
11-20 days	829	57252	403675	40255	2227	184	52	23	11	13	28	11
R - days	2524	310242	82980	109849	251	42	58	40	23	13	29	21
Monthly	411	60500	61697	19154	3656	794	25	8	6	5	24	5
Brahmani at Jenapur												
01-10 days	246	23223	17801	46797	56244	4665	134	346	99	67	58	56
11-20 days	736	36009	106423	57190	20436	746	86	133	95	48	68	35
R - days	2066	26464	122924	217918	10910	225	216	116	90	64	95	31
Monthly	339	9522	27461	35767	9732	626	48	66	32	163	25	14

Source: Suspended Sediment Year Books (2007 to 2008) Subernarekha, Burhabalang & Baitarni.

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

III Basin : Brahamani *Unit : Tonnes per day*

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2008-2009												
Brahmani at Tilga												
01-10 days	<---------- Data not available ---------->											
11-20 days												
R - days												
Monthly												
Brahmani at Panposh												
01-10 days	<---------- Data not available ---------->											
11-20 days												
R - days												
Monthly												
Brahmani at Gomlai												
01-10 days	<---------- Data not available ---------->											
11-20 days												
R - days												
Monthly												
Brahmani at Jenapur												
01-10 days	<---------- Data not available ---------->											
11-20 days												
R - days												
Monthly												

Source: Suspended Sediment Data Year Books (2008 to 2009) Brahmani Basin.

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

III Basin : Brahamani *Unit : Tonnes per day*

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2009-2010												
Brahmani at Tilga												
01-10 days	0	34214	1750	12528	5628	146	17	0	0	0	0	0
11-20 days	0	27800	8988	854	255	148	1	0	0	0	0	0
R - days	194	14832	32893	177	49	80	0	0	0	0	0	0
Monthly	22	8538	4848	1507	659	42	2	0	0	163	0	0
Brahmani at Panposh												
01-10 days	57	14080	11995	162010	17671	263	142	63	39	35	36	31
11-20 days	51	49723	47647	19841	6471	207	117	51	50	34	34	29
R - days	1263	39135	63603	10930	1614	344	107	38	44	38	37	20
Monthly	152	11438	13694	21420	2862	90	41	17	15	163	12	9
Brahmani at Gomlai												
01-10 days	105	10448	7945	91863	7404	32	68	9	18	26	14	13
11-20 days	30	123172	32408	12701	1360	13	97	5	25	8	5	9
R - days	204	29582	56999	4417	132	158	45	5	36	7	5	10
Monthly	38	18134	10817	12109	988	23	23	2	9	163	3	4
Brahmani at Jenapur												
01-10 days	118	1600	7935	16131	26980	418	106	34	22	32	98	119
11-20 days	94	36611	15480	17059	3336	220	120	30	31	70	115	129
R - days	88	4698	18224	14380	373	102	74	29	51	176	119	193
Monthly	100	13993	14020	15857	9912	247	99	31	34	95	111	148

Source: Suspended Sediment Data Year Books (2000 to 2010) Brahmani Basin.

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

IV Basin : Rushikulya, Vamsadhra, Saroda & Nagavali

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2007-2008												
Kashinagar (Vamsadhara)												
01-10 days	<---------- Data not available ---------->											
11-20 days												
R - days												
Monthly												
Purushottampur (Rushikulya)												
01-10 days	<---------- Data not available ---------->											
11-20 days												
R - days												
Monthly												
Srikakulam (Nagavali)												
01-10 days	<---------- Data not available ---------->											
11-20 days												
R - days												
Monthly												

Source: Suspended Sediment Data Year Books (2007 to 2008) Rushikulya, Vamsadhra, Saroda & Nagavali.

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

IV Basin : Rushikulya, Vamsadhra, Saroda & Nagavali

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2008-2009												
Kashinagar (Vamsadhara)												
01-10 days	<---------- Data not available ---------->											
11-20 days												
R - days												
Monthly												
Purushottampur (Rushikulya)												
01-10 days	<---------- Data not available ---------->											
11-20 days												
R - days												
Monthly												
Srikakulam (Nagavali)												
01-10 days	<---------- Data not available ---------->											
11-20 days												
R - days												
Monthly												

Source: Suspended Sediment Data Year Books (2008 to 2009) Rushikulya, Vamsadhra, Saroda & Nagavali.

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

IV Basin : Rushikulya, Vamsadhra, Saroda & Nagavali

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2009-2010												
Kashinagar (Vamsadhara)												
01-10 days	77	14072	5502	16625	23977	238	97	27	14	1	0	0
11-20 days	456	75165	24314	1592	1070	685	70	535	9	0	0	0
R - days	5888	51560	99131	2510	234	409	43	60	4	0	0	290
Monthly	713	15644	14327	2303	2809	148	23	69	3	163	0	32
Purushottampur (Rushikulya)												
01-10 days	2	167	207	3947	19608	20	6	0	0	0	0	0
11-20 days	3	35320	1837	95	584	999	3	11	0	0	0	0
R - days	N.A.	8144	19757	856	37	220	2	1	0	0	0	0
Monthly	1	4848	2422	544	2248	138	1	1	0	163	0	0
Srikakulam (Nagavali)												
01-10 days	0	2344	2723	6662	15719	94	151	36	21	2	0	0
11-20 days	1	17764	1693	1169	1174	472	104	105	11	0	0	2
R - days	356	9998	3050	2141	106	757	56	49	3	0	0	2
Monthly	119	10034	2507	3324	5487	441	102	63	12	1	0	1

Source: Suspended Sediment Data Year Books (2000 to 2010) Rushikulya, Vamsadhra, Saroda & Nagavali.

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

V Basin : Godavari *Unit : Tonnes per day*

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2007-2008												
Godavari at Plolavaram												
01-10 days	581	343233	740178	625655	207041	3303	2977	518	578	742	3857	350
11-20 days	980	983542	759055	267451	76137	3649	1159	446	559	580	1060	286
R - days	77208	81763	107124	150136	20502	4336	1719	775	397	1033	405	250
Monthly	8752	156504	178484	115916	33742	1254	651	193	170	163	591	98
Sabari at Konta												
01-10 days	1131	24167	121216	104253	503757	3888	3552	1117	1161	1120	1217	602
11-20 days	866	15472	107784	20040	15996	3002	3182	868	924	735	815	615
R - days	21731	6153	17142	48596	10001	2109	1325	755	805	1071	655	487
Monthly	2636	5088	27349	19210	58862	1000	895	304	321	163	299	189
Godavari at Perur												
01-10 days	10	258601	1558048	481413	83353	647	13	6	4	3	5	0
11-20 days	27	192716	316129	119619	8838	335	8	5	5	2	4	0
R - days	1310	30234	26429	66824	1627	20	6	4	4	3	1	0
Monthly	150	53506	211178	74206	10424	111	3	2	1	163	1	0
Indravati at Pathagudem												
01-10 days	0	187851	1158962	270909	223478	937	259	76	0	0	0	0
11-20 days	13	142607	191347	94663	22802	505	196	50	0	0	0	0
R - days	23978	20738	65373	132649	4282	350	122	38	0	0	0	0
Monthly	2666	39022	157298	55358	27840	199	64	18	0	163	0	0

Contd/..

Indravati at Jagdalpur												
01-10 days	0	18345	80341	19638	6726	5	23	10	11	13	22	4
11-20 days	151	20718	37678	10253	146	11	15	10	16	13	19	3
R - days	59955	5041	9667	12535	64	29	10	12	11	15	6	3
Monthly	6678	4900	14187	4714	771	5	5	4	4	163	5	1
Pranahita at Tekra												
01-10 days	18	569570	1994956	46534	113080	2828	610	219	106	30	27	4
11-20 days	263	370257	329925	257285	23662	2254	262	108	91	33	17	3
R - days	23601	112374	55141	199521	12208	1079	226	80	43	26	7	2
Monthly	2654	116911	264447	55927	16550	685	122	45	27	10	6	1
Peddavagu at Bhatpally												
01-10 days	2	207	4911	2827	794	20	12	5	6	3	30	5
11-20 days	92	3136	553	2319	246	15	10	5	5	4	5	2
R - days	209	3255	1394	560	56	11	8	6	4	7	5	1
Monthly	34	733	762	634	122	5	3	2	2	163	4	1

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

V Basin : Godavari *Unit : Tonnes per day*

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2007-2008												
Wardha at Bamni												
01-10 days	3	40978	109889	34773	4088	16	10	18	15	24	6	1
11-20 days	347	24113	6592	14134	985	15	6	15	15	16	3	0
R - days	686	6521	6940	12729	112	5	16	16	8	9	3	0
Monthly	115	7957	13713	6848	576	4	4	5	4	163	1	0

Contd/…

Penganga at P.G.Bridge												
01-10 days	1	112	2795	62558	1014	19	9	5	7	3	8	0
11-20 days	559	21940	269	5342	173	6	4	5	7	5	2	0
R - days	121	1239	910	1451	44	7	6	6	5	8	0	-
Monthly	76	2588	442	7706	137	4	2	2	2	163	1	0
Wardha at Nandgaon												
01-10 days	0	1633	1351	1457	26	1	0	0	0	0	0	0
11-20 days	1	194	93	87	5	0	0	0	0	0	0	0
R - days	362	163	83	136	1	3	0	0	0	0	0	0
Monthly	40	221	170	187	4	0	0	0	0	163	0	0
Wardha at Hivra												
01-10 days	0	76798	82105	9230	942	6	1	1	1	1	1	1
11-20 days	2	4833	4180	8070	120	1	1	1	1	1	1	1
R - days	3	771	1226	11731	12	2	1	1	1	1	1	1
Monthly	1	9156	9723	3226	119	1	0	0	0	163	0	0
Wainganga at Asthi												
01-10 days	8	186681	949740	133663	60307	2666	132	54	73	51	51	16
11-20 days	1300	81081	93879	94180	22207	1695	63	34	72	51	34	13
R- days	19872	32218	44008	68881	8391	1141	59	40	52	56	28	7
Monthly	2353	33331	120847	32969	10101	611	28	14	22	163	13	4
Kanhan at Satrapur												
01-10 days	18	74197	62621	16488	2799	195	84	65	54	51	42	23
11-20 days	225	6317	5058	9091	483	135	114	51	31	39	13	6
R- days	747	5417	3731	10739	208	93	80	58	49	30	13	6
Monthly	110	9548	7934	4035	388	47	31	19	15	13	8	4
Godavari at Mancherial												
01-10 days	3	8	12	332	1221	88	44	16	18	18	37	4
11-20 days	8	9	10	411	140	58	39	17	30	13	17	1
R- days	8	14	381	1050	90	46	31	17	17	26	12	0
Monthly	2	3	45	199	161	21	13	6	7	163	7	1

Contd/…

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

V Basin : Godavari *Unit : Tonnes per day*

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2007-2008												
Manjira at Saigaon												
01-10 days	0	4	133	292	387	0	0	0	0	0	0	0
11-20 days	0	0	0	14443	1	0	0	0	0	0	0	0
R-days	527	2	2	14524	0	0	0	0	0	0	0	0
Monthly	59	1	15	3251	43	0	0	0	0	163	0	0
Godavari at Dhalegaon												
01-10 days	11	3	145	5238	442	4	0	0	0	0	0	0
11-20 days	12	1	1	1106	16	0	0	0	0	0	0	0
R-days	10	1987	608	20322	6	0	0	0	0	0	0	0
Monthly	4	221	84	2963	52	0	0	0	0	163	0	0

Source: Suspended Sediment Data Year Books (2007 to 2008) Godavari Basin.

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

V Basin : Godavari *Unit : Tonnes per day*

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2008-2009												
Godavari at Plolavaram												
01-10 days	377	8128	1216086	61909	9176	745	213	86	518	73	30	9
11-20 days	4763	7781	537846	191924	2531	502	373	250	190	154	21	28
R - days	2386	249701	74819	39023	1284	414	228	355	90	81	31	65
Monthly	836	29512	203195	32540	1443	185	90	77	89	163	9	11
Sabari at Konta												
01-10 days	808	8134	106781	14028	3177	794	1016	735	719	868	429	513
11-20 days	5473	6382	108536	36846	2370	1092	710	790	547	878	447	436
R - days	5013	100428	25721	9207	1648	886	792	636	802	658	405	446
Monthly	1255	12772	26782	6676	799	308	280	240	230	163	142	155
Godavari at Perur												
01-10 days	0	3194	1200872	46120	6734	586	179	50	28	15	10	3
11-20 days	95	3200	663036	135974	4326	356	124	49	22	12	8	2
R - days	311	22080	35919	33409	1400	215	84	32	19	10	6	0
Monthly	45	3164	211092	23945	1384	129	43	15	8	163	3	1
Indravati at Pathagudem												
01-10 days	0	5309	255995	55083	5718	686	171	17	0	0	0	0
11-20 days	2023	3140	178050	74373	2961	470	106	0	0	0	0	0
R - days	1108	102178	51485	24793	1559	295	69	0	0	0	0	0
Monthly	348	12292	53948	17139	1138	161	38	2	0	163	0	0

Contd/…

Indravati at Jagdalpur												
01-10 days	20	28	20894	6983	300	0	0	0	0	0	0	0
11-20 days	638	276	30560	28949	118	0	0	0	0	0	0	0
R - days	32	13078	13297	1867	30	0	0	0	0	0	0	0
Monthly	77	1487	7195	4200	50	0	0	0	0	163	0	0
Pranahita at Tekra												
01-10 days	11	1108	1067459	37176	4901	211	23	2	0	0	0	0
11-20 days	15	21851	195428	31421	1869	83	15	3	0	0	0	0
R - days	126	106543	21461	16647	468	32	6	2	0	0	0	0
Monthly	17	14389	142705	9472	804	36	5	1	0	0	0	0
Peddavagu at Bhatpally												
01-10 days	21	397	8150	502	113	47	32	26	24	17	16	13
11-20 days	7	166	1132	846	77	45	26	24	23	19	14	10
R - days	98	700	213	204	54	36	28	29	21	16	13	9
Monthly	14	140	1055	172	27	14	10	9	8	163	5	4

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

V Basin : Godavari *Unit : Tonnes per day*

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2008-2009												
Wardha at Bamni												
01-10 days	1	462	27652	590	192	17	30	4	5	1	0	0
11-20 days	5	12	7410	7318	131	25	30	10	4	0	0	0
R - days	8	4093	448	900	85	18	15	9	2	0	0	0
Monthly	2	507	3946	979	45	7	8	3	1	163	0	0
Penganga at P.G.Bridge												

Contd/…

01-10 days	0	11	46814	1118	88	7	0	0	0	0	0	0
11-20 days	12	9	3434	16417	44	4	0	0	0	0	0	0
R - days	4	920	299	5880	19	1	0	0	0	0	0	0
Monthly	2	104	5616	2602	17	1	0	0	0	163	0	0
Wunna at Nandgaon												
01-10 days	0	0	353	170	19	0	0	0	0	0	0	0
11-20 days	0	0	244	37	9	0	0	0	0	0	0	0
R - days	0	1992	38	51	1	0	0	0	0	0	0	0
Monthly	0	221	71	29	3	0	0	0	0	163	0	0
Wardha at Hivra												
01-10 days	-	134	64	1	1	0	0	0	0	0	0	0
11-20 days	-	0	24	2	1	0	0	0	0	0	0	0
R - days	81	82	8	1	0	0	0	0	0	0	0	0
Monthly	27	24	11	0	0	0	0	0	0	163	0	0
Wainganga at Asthi												
01-10 days	6	5253	214043	7525	398	63	24	12	7	1	0	0
11-20 days	36	9541	79674	3626	125	108	31	18	3	0	0	0
R- days	205	44588	8787	6838	213	43	8	5	5	0	0	0
Monthly	27	6598	33612	1999	82	24	7	4	2	0	0	0
Kanhan at Satrapur												
01-10 days	16	70	172	99	50	23	18	8	9	6	12	13
11-20 days	63	33	134	151	31	17	13	8	6	6	12	12
R- days	73	147	95	151	20	19	9	7	6	6	15	20
Monthly	17	28	45	45	11	7	4	3	2	163	4	5
Godavari at Mancherial												
01-10 days	0	2	7964	170	388	72	54	12	5	10	5	3
11-20 days	0	19	3365	3190	98	62	38	10	10	12	5	3
R- days	0	47	142	11787	78	71	28	4	13	11	6	3
Monthly	0	8	1275	1683	63	23	13	3	3	163	2	1

Contd/…

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

V Basin : Godavari *Unit : Tonnes per day*

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2008-2009												
Manjira at Saigaon												
01-10 days	0	0	0	6578	6	0	0	0	0	0	0	0
11-20 days	0	0	2	58115	214	0	0	0	0	0	0	0
R-days	0	0	0	5741	0	0	0	0	0	0	0	0
Monthly	0	0	0	7826	24	0	0	0	0	163	0	0
Godavari at Dhalegaon												
01-10 days	0	0	0	0	354	0	0	0	0	0	0	0
11-20 days	0	0	0	2606	609	0	0	0	0	0	0	0
R-days	0	0	0	9098	0	0	0	0	0	0	0	0
Monthly	0	0	0	1300	107	0	0	0	0	163	0	0

Source: Suspended Sediment Data Year Books (2008 to 2009) Godavari Basin.

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

V Basin : Godavari *Unit : Tonnes per day*

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2009-2010												
Godavari at Plolavaram												
01-10 days	40	446	50161	307969	9365	451	473	86	58	79	100	115
11-20 days	31	130415	17138	35111	3460	442	280	66	59	88	100	295
R - days	68	360038	226764	3710	1056	1248	231	63	72	79	121	299
Monthly	15	54544	32674	38532	1542	238	109	24	21	163	36	79
Sabari at Konta												
01-10 days	687	654	21021	503	3826	138	28	23	50	31	264	304
11-20 days	772	53865	24201	228	1779	50	28	30	53	22	346	662
R - days	621	58669	24710	1541	1333	41	10	37	44	19	348	356
Monthly	231	12576	7770	252	771	25	7	10	16	163	106	147
Godavari at Perur												
01-10 days	0	943	15092	156926	5427	95	64	29	20	16	6	2
11-20 days	0	91098	23795	29104	4097	80	37	29	19	10	4	2
R - days	0	127483	190786	2478	653	192	21	26	15	8	3	4
Monthly	0	24392	25519	20945	1131	41	14	9	6	4	1	1
Indravati at Pathagudem												
01-10 days	0	3144	12532	98600	6226	0	0	0	0	0	0	0
11-20 days	0	300547	20462	3848	1252	0	0	0	0	0	0	0
R - days	0	111178	141673	937	9	0	0	0	0	0	0	0
Monthly	0	46097	19407	11487	832	0	0	0	0	163	0	0

Contd/…

Indravati at Jagdalpur												
01-10 days	0	1331	2392	1549	948	0	0	0	0	0	0	0
11-20 days	0	33728	8504	224	42	0	0	0	0	0	0	0
R - days	570	23328	16194	226	0	0	0	0	0	0	0	0
Monthly	63	6487	3010	222	110	0	0	0	0	163	0	0
Pranahita at Tekra												
01-10 days	0	1654	4439	93191	3357	346	135	60	37	0	0	0
11-20 days	0	244363	5957	11138	3109	249	152	55	28	0	0	0
R - days	5	174072	97590	3046	498	2057	56	52	7	0	0	0
Monthly	1	46677	11998	11931	774	295	38	19	8	0	0	0
Peddavagu at Bhatpally												
01-10 days	14	71	25	1014	52	10	12	3	2	1	0	0
11-20 days	7	54	135	23	18	15	6	3	2	1	0	0
R - days	73	46	729	61	8	8	4	3	2	1	0	0
Monthly	10	19	99	122	9	4	2	1	1	163	0	0

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

V Basin : Godavari *Unit : Tonnes per day*

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2009-2010												
Wardha at Bamni												
01-10 days	0	868	31	3669	35	3	5	16	39	38	1	0
11-20 days	0	698	52	152	47	2	20	9	18	16	0	0
R - days	338	177	1482	40	10	26	34	6	30	3	0	0
Monthly	38	194	174	429	10	3	7	3	10	163	0	0

Contd/…

Penganga at P.G.Bridge												
01-10 days	0	6143	15	12357	12	0	1	0	0	0	0	0
11-20 days	0	725	86	137	2	4	0	0	0	0	0	0
R - days	44035	113	1227	16	0	2	0	0	0	0	0	0
Monthly	4893	776	148	1390	2	1	0	0	0	163	0	0
Wunna at Nandgaon												
01-10 days	0	74	17	301	4	0	6	1	1	2	0	0
11-20 days	0	43	14	33	3	6	11	2	1	0	0	0
R - days	0	47	154	4	1	1	3	2	1	0	0	0
Monthly	0	18	21	38	1	1	2	1	0	163	0	0
Wardha at Hivra												
01-10 days	0	19	0	22	0	0	0	0	0	0	0	0
11-20 days	0	19	0	0	0	0	0	0	0	0	0	0
R - days	1	2	0	0	0	0	0	0	0	0	0	0
Monthly	0	4	0	2	0	0	0	0	0	163	0	0
Wainganga at Asthi												
01-10 days	12	2340	1238	12477	1123	206	134	22	43	72	13	12
11-20 days	9	229645	5566	4272	254	100	49	37	53	23	11	21
R- days	17	180804	60552	885	44	967	223	51	99	50	10	18
Monthly	4	45865	7484	1959	158	141	45	12	22	163	4	6
Kanhan at Satrapur												
01-10 days	23	12930	340	18650	315	47	54	37	35	59	21	8
11-20 days	21	66618	53	3521	128	124	38	34	34	26	21	9
R- days	43	84315	6601	162	61	72	66	34	34	23	16	25
Monthly	10	18207	777	2481	56	27	18	12	11	12	6	5
Godavari at Mancherial												
01-10 days	2	315	12	1079	94	13	13	2	0	0	0	0
11-20 days	1	37	7	176	63	11	11	1	0	0	0	0
R- days	88	18	363	46	27	11	4	1	0	0	0	0
Monthly	10	41	42	145	20	4	3	0	0	163	0	0

Contd/…

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

V Basin : Godavari *Unit : Tonnes per day*

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2009-2010												
Manjira at Saigaon												
01-10 days	0	0	0	12	59	0	0	0	0	0	0	0
11-20 days	0	0	0	4	0	0	0	0	0	0	0	0
R-days	0	0	18	0	0	0	0	0	0	0	0	0
Monthly	0	0	2	2	7	0	0	0	0	163	0	0
Godavari at Dhalegaon												
01-10 days	0	570	0	656	19	0	0	0	0	0	0	0
11-20 days	0	29	0	0	0	0	0	0	0	0	0	0
R-days	0	0	5095	0	0	0	0	0	0	0	0	0
Monthly	0	67	566	73	2	0	0	0	0	163	0	0

Source: Suspended Sediment Data Year Books (2000 to 2010) Godavari Basin.

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

VI Basin : Krishna *Unit : Tonnes per day*

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2007-2008												
Krishna at Wadenapalli												
01-10 days	21	782	24460	7663	3752	856	170	347	220	219	125	10
11-20 days	63	4552	26040	23271	1336	640	192	357	263	227	70	8
R - days	2562	3265	5687	12786	1025	214	259	233	163	242	22	6
Monthly	294	955	6243	4858	679	190	69	104	72	163	24	3
Tungabhadra at Bawapuram												
01-10 days	266	88	23147	1421	435	142	33	0	1	0	107	3
11-20 days	126	1906	28072	25636	2	11	34	1	152	0	31	0
R - days	12971	2156	615	1825	1405	47	6	1	2	1861	13	63
Monthly	1485	461	5759	3209	205	22	8	0	17	163	17	7
Bhima at Yadgir												
01-10 days	155	18530	610	29270	6658	270	0	0	0	0	0	0
11-20 days	592	13566	30842	18291	644	129	0	0	0	0	0	0
R- days	6015	960	32072	34193	230	65	0	0	0	215	0	0
Monthly	751	3673	7058	9084	837	52	0	0	0	163	0	0
Kagna at Malkhed												
01-10 days	15	1	60	313	106	17	6	10	4	2	9	1
11-20 days	170	1	1	1517	17	8	4	15	3	1	1	1
R- days	30	7	73	1496	12	9	5	10	3	938	1	1
Monthly	24	1	15	370	15	4	2	4	1	163	1	0

Contd/…

Bhima at Takali												
01-10 days	0	1461	444	2222	224	0	0	0	0	0	0	0
11-20 days	0	1950	1478	845	7	0	0	0	0	0	0	0
R-days	1161	112	8922	1584	0	0	0	0	0	0	0	0
Monthly	129	391	1205	517	26	0	0	0	0	163	0	0
Malaprabha at Cholachagudda												
01-10 days	5640	1569	8522	4218	21989	2917	-	-	-	-	-	-
11-20 days	8131	6273	45168	580442	2238	720	-	-	-	-	-	-
R-days	4362	752	13293	134495	2890	728	-	-	-	-	-	-
Monthly	2015	955	7443	79906	3013	485	-	-	-	-	-	-
Krishna at Kurundwad												
01-10 days	0	80306	35848	30020	1590	0	0	0	0	0	0	0
11-20 days	0	52174	39003	5243	255	0	0	0	0	0	0	0
R-days	54660	10552	11521	8094	0	0	0	0	0	0	0	0
Monthly	6073	15892	9597	4817	205	0	0	0	0	163	0	0
Krishna at Karad												
01-10 days	61	46506	6589	3030	163	46	63	80	49	58	29	56
11-20 days	38	8574	2329	296	62	36	19	34	76	63	44	80
R-days	4203	372	1117	701	60	152	39	25	52	49	86	75
Monthly	478	6161	1115	447	32	26	13	15	20	19	18	23

Source : Suspended Sediment Data books (2007 to 2008) Krishna Basin.

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

VI Basin : Krishna *Unit : Tonnes per day*

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2008-2009												
Krishna at Wadenapalli												
01-10 days	7	333	3435	2477	1925	1206	548	505	1008	1073	693	196
11-20 days	7	930	3149	14622	1511	1123	361	736	1030	1282	449	127
R - days	103	899	1546	28479	1299	663	447	915	1556	1049	240	96
Monthly	13	240	903	5064	526	332	151	240	399	163	154	47
Tungabhadra at Bawapuram												
01-10 days	27	2	10	1867	61	35	72	17	13	8	1	3
11-20 days	35	2	3918	609	51	64	87	21	11	8	0	0
R - days	1	2	670	262	246	155	19	12	15	7	4	396
Monthly	7	1	511	304	40	28	20	6	4	163	1	44
Bhima at Yadgir												
01-10 days	0	0	147	5251	923	164	0	0	0	0	0	0
11-20 days	0	0	1850	38325	3228	169	0	0	0	0	0	0
R- days	0	0	689	23400	284	0	0	0	0	0	0	0
Monthly	0	0	298	7442	493	37	0	0	0	163	0	0
Kagna at Malkhed												
01-10 days	0	0	3626	1720	611	5	6	9	6	5	2	1
11-20 days	0	0	773	2169	210	6	7	8	6	4	2	1
R- days	0	58	386	175	21	12	11	10	6	2	1	6
Monthly	0	6	532	452	94	3	3	3	2	163	1	1

Contd/…

Bhima at Takali												
01-10 days	0	0	0	588	0	0	0	0	0	0	0	0
11-20 days	0	0	76	3251	0	0	0	0	0	0	0	0
R-days	0	0	40	2044	0	0	0	0	0	0	0	0
Monthly	0	0	13	654	0	0	0	0	0	163	0	0
Malaprabha at Cholachagudda												
01-10 days	1024	12	0	26269	7874	345	-	-	-	-	-	-
11-20 days	0	226	1703	21	3023	5155	-	-	-	-	-	-
R-days	757	267	44	303	582	13122	-	-	-	-	-	-
Monthly	198	56	194	2955	1275	2069	-	-	-	-	-	-
Krishna at Kurundwad												
01-10 days	0	14724	25684	6771	2951	0	0	0	0	0	0	0
11-20 days	7823	5546	88636	54747	5702	0	0	0	0	0	0	0
R-days	2181	12392	3803	28680	12	0	0	0	0	0	0	0
Monthly	1112	3629	13125	10022	963	0	0	0	0	163	0	0
Krishna at Karad												
01-10 days	61	715	1827	255	201	31	28	20	35	27	60	57
11-20 days	176	205	16244	2875	331	63	38	52	120	65	45	127
R-days	260	503	241	2132	47	56	70	37	4	53	53	73
Monthly	55	158	2035	585	64	17	15	12	18	163	18	29

Source : Suspended Sediment Data books (2008 to 2009) Krishna Basin.

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

VI Basin : Krishna *Unit : Tonnes per day*

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2009-2010												
Krishna at Wadenapalli												
01-10 days	14	283	2975	2406	214950	2516	268	310	589	565	551	6
11-20 days	28	799	3055	3161	10590	1050	230	485	555	575	263	4
R - days	131	2296	1904	3206	3711	477	220	398	545	640	12	12
Monthly	19	375	882	975	25472	449	80	133	188	163	92	2
Tungabhadra at Bawapuram												
01-10 days	460	1	3401	18090	121609	497	109	1	1	2	1	2
11-20 days	208	1	159	2538	681	1136	14	52	1	0	1	26
R - days	83	1959	3825	6719	120	300	10	25	2	1	0	111
Monthly	83	218	821	3039	13601	215	15	9	0	163	0	15
Tungabhadra at Marol												
01-10 days	N.A.	2870	3043	3283	6730	0	0	0	0	0	0	0
11-20 days	81	3073	1036	1675	1089	0	0	0	0	0	0	0
R- days	31	16456	1297	2118	325	0	0	0	0	0	0	0
Monthly	19	2489	597	786	905	0	0	0	0	163	0	0
Tungabhadra at Haralahalli												
01-10 days	121	9015	6562	18480	17921	370	79	168	8	7	9	39
11-20 days	161	57720	3549	2743	1594	395	50	34	18	65	20	18
R- days	94	12798	5873	4690	429	252	56	15	12	14	36	61
Monthly	42	8837	1776	2879	2216	113	21	24	4	163	7	13

Contd/…

Haridra at Byladahalli												
01-10 days	7	5	25	155	247	23	3	9	0	0	0	0
11-20 days	4	20	138	50	15	28	1	1	0	0	0	0
R- days	1	17	179	175	15	8	4	0	0	0	0	0
Monthly	1	5	38	42	31	7	1	1	0	163	0	0
Tungabhadra at Honnali												
01-10 days	12	3880	3890	7592	4387	179	50	221	13	16	12	19
11-20 days	155	20942	1021	1193	618	152	27	23	12	13	19	25
R- days	6	4970	1605	1850	163	97	26	20	10	12	20	16
Monthly	19	3310	724	1182	574	48	11	29	4	163	6	7
Tungabhadra at Shimoga												
01-10 days	59	10366	4955	20277	3599	46	30	14	0	0	0	0
11-20 days	0	65070	1493	835	178	111	11	0	0	0	0	0
R- days	0	10648	2530	557	176	94	0	0	0	0	0	0
Monthly	7	9565	998	2408	439	28	5	2	0	163	0	0
Bhima at Yadgir												
01-10 days	0	0	252	13252	1201954	155	253	0	0	0	0	0
11-20 days	0	0	37	1547	9053	218	72	0	0	0	0	0
R- days	0	0	27565	59613	466	2217	46	0	0	0	0	0
Monthly	0	0	3095	8268	134608	288	41	0	0	163	0	0

Contd/…

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

VI Basin : Krishna *Unit : Tonnes per day*

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2009-2010												
Kagna at Malkhed												
01-10 days	0	0	0	8215	11207	28	25	21	20	16	6	2
11-20 days	2	0	442	913	71	37	31	21	7	12	4	1
R- days	3	0	20670	485	32	30	28	26	15	7	2	2
Monthly	1	0	2346	1068	1257	11	9	8	5	163	1	1
Bhima at Takali												
01-10 days	0	0	35	1497	38958	0	0	0	0	0	0	0
11-20 days	0	0	0	428	1003	0	0	0	0	0	0	0
R-days	0	381	1295	2440	0	0	0	0	0	0	0	0
Monthly	0	42	148	485	4440	0	0	0	0	163	0	0
Malaprabha at Cholachagudda												
01-10 days	1057	51	27	675	300922	573	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
11-20 days	16932	912	633	4366	3783	2412	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
R-days	482	402	2425	1774	625	531	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
Monthly	2052	152	343	757	33926	391	N.A.	N.A.	N.A.	163	N.A.	N.A.
Krishna at Kurundwad												
01-10 days	0	5711	5370	14952	27451	0	0	0	0	0	0	0
11-20 days	0	55758	3616	4716	4108	4817	0	0	0	0	0	0
R-days	0	49582	9673	6584	747	2332	0	0	0	0	0	0
Monthly	0	12339	2073	2917	3590	794	0	0	0	163	0	0

Contd/…

Krishna at Karad												
01-10 days	17	100	481	396	750	85	163	0	0	0	0	0
11-20 days	75	2729	506	533	303	590	80	0	0	0	0	0
R-days	80	2113	588	578	81	228	100	0	0	0	0	0
Monthly	19	549	175	167	126	100	38	0	0	163	0	0

Source : Suspended Sediment Data books (2009 to 2010) Krishna Basin.

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

VII Basin : Cauvery

Unit : Tonnes per day

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2007-2008												
Thirumalairajanar at Thengudi												
01-10 days	0	0	0	2	12	12	3	6	2	0	0	0
11-20 days	0	0	2	5	4	2	69	3	1	1	0	0
R - days	0	0	5	42	47	6	28	3	0	4	0	0
Monthly	0	0	1	5	7	2	11	1	0	163	0	0
Cauvery at Musiri												
01-10 days	0	0	3953	1214	1385	3419	814	469	26	23	47	5
11-20 days	0	725	12088	1435	1426	996	3904	354	36	43	8	1
R - days	0	4795	1185	1399	2719	1120	2225	254	4	197	9	17
Monthly	0	613	1914	450	614	615	771	120	7	163	7	3
Amaravathy at Nallamaranpatty												
01-10 days	0	17	0	0	0	114	0	117	8	0	30	0
11-20 days	0	7	46	21	11	0	27022	7	11	0	0	0
R - days	0	0	6	0	1261	15	723	10	0	159	0	62
Monthly	0	3	6	2	141	14	3083	15	2	163	3	7

Contd/…

Cauvery at Kodumudi												
01-10 days	80	107	8273	2685	2214	2298	943	549	135	144	90	117
11-20 days	75	1085	27558	2648	1850	1006	1161	468	129	142	85	119
R - days	72	9007	1696	2955	1781	883	379	325	107	162	128	130
Monthly	25	1133	4170	921	649	465	276	149	41	163	34	41
Bhavani at Savandapur												
01-10 days	14	27	353	24	53	76	18	47	37	26	19	10
11-20 days	13	262	345	20	45	14	59	30	25	23	15	14
R - days	25	122	52	211	242	14	41	29	15	11	23	21
Monthly	6	46	83	28	38	12	13	12	9	163	6	5

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

VII Basin : Cauvery *Unit : Tonnes per day*

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2007-2008												
Moyar at Thengumarahada												
01-10 days	19	153	682	86	39	73	32	6	8	6	27	35
11-20 days	11	206	177	63	50	20	52	6	40	23	28	37
R - days	54	72	70	136	73	16	60	8	31	36	56	29
Monthly	9	48	103	32	18	12	16	2	9	163	12	11
Bhavani at Nellithurai												
01-10 days	7	1314	1496	127	39	67	2	2	4	2	7	2
11-20 days	1	354	204	56	3	5	5	1	14	7	3	2
R - days	789	123	159	200	59	3	6	2	2	22	3	2
Monthly	89	199	207	43	11	8	1	1	2	163	1	1

Contd/…

Cauvery at Urachikottai												
01-10 days	0	0	849	78	56	38	32	17	4	4	0	0
11-20 days	0	337	1403	68	41	32	10	14	6	3	0	0
R - days	0	1982	72	64	53	34	0	8	2	0	0	0
Monthly	0	258	258	23	17	12	5	4	1	163	0	0
Cauvery at Biligundulu												
01-10 days	42	3043	5167	2067	774	1312	474	109	46	62	194	370
11-20 days	35	12585	9777	2211	1261	359	322	103	225	139	73	1096
R - days	67	4068	3883	2174	7017	318	378	90	64	163	107	1284
Monthly	16	2188	2092	717	1006	221	130	34	37	163	42	306
Shimsha at T.K.Halli												
01-10 days	<---------- Data not available ---------->											
11-20 days												
R - days												
Monthly												
Cauvery at Kollegal												
01-10 days	20	2489	3487	1363	520	528	301	63	21	30	59	84
11-20 days	12	5449	4412	4913	371	419	271	62	33	53	45	80
R - days	115	801	810	905	773	394	219	48	38	59	70	84
Monthly	16	971	968	798	185	149	88	19	10	163	19	28
Kabini at T.Narasipur												
01-10 days	<---------- Data not available ---------->											
11-20 days												
R - days												
Monthly												
Kabini at Muthankera												
01-10 days	<---------- Data not available ---------->											
11-20 days												
R - days												
Monthly												

Source: Suspended Sediment and Bedmaterial Data Book for 2007-2008 (Cauvery Basin)

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

VII Basin : Cauvery

Unit : Tonnes per day

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2008-2009												
Thirumalairajanar at Thengudi												
01-10 days	0	0	5	11	6	2	111	16	7	1	0	0
11-20 days	2	3	12	7	20	18	53	39	6	1	0	0
R - days	10	5	21	5	18	148	11	7	2	0	0	0
Monthly	1	1	4	3	5	19	19	7	2	163	0	0
Cauvery at Musiri												
01-10 days	43	533	477	950	1391	998	710	660	15	9	5	5
11-20 days	917	618	773	851	1064	1206	762	562	15	27	5	14
R - days	528	585	899	1336	1748	1718	649	243	10	7	6	6
Monthly	165	193	239	349	467	436	236	163	4	163	2	3
Amaravathy at Nallamaranpatty												
01-10 days	10	0	0	34	0	3	62	4	2	0	0	0
11-20 days	0	0	0	3	10	1	59	3	1	0	0	0
R - days	0	0	1	0	1143	208	2	2	0	0	0	0
Monthly	1	0	0	4	128	24	14	1	0	163	0	0
Cauvery at Kodumudi												
01-10 days	82	908	903	1104	2282	1138	269	744	121	131	111	134
11-20 days	662	890	1000	1251	1100	1198	203	649	125	137	106	144
R - days	799	772	1032	2316	468	938	572	468	137	112	104	84
Monthly	171	286	326	519	428	364	116	207	43	42	36	40

Contd/…

Bhavani at Savandapur												
01-10 days	19	24	24	20	25	42	29	26	21	24	21	9
11-20 days	25	28	25	20	56	39	27	25	22	19	20	20
R - days	37	25	28	27	57	37	25	20	36	17	18	20
Monthly	9	9	9	7	15	13	9	8	9	163	7	5

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

VII Basin : Cauvery

Unit : Tonnes per day

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2008-2009												
Moyar at Thengumarahada												
01-10 days	36	69	41	77	16	19	11	5	4	12	6	14
11-20 days	30	66	79	21	20	17	9	4	11	11	1	31
R - days	110	59	67	23	118	11	9	5	12	11	19	42
Monthly	20	22	21	13	17	5	3	2	3	163	3	10
Bhavani at Nellithurai												
01-10 days	19	261	42	33	5	17	2	1	2	1	2	1
11-20 days	60	87	79	2	6	10	2	1	2	4	2	2
R - days	237	74	21	11	514	1	2	4	1	3	3	1
Monthly	35	47	16	5	58	3	1	1	1	163	1	0
Cauvery at Urachikottai												
01-10 days	0	29	26	29	28	26	6	23	0	0	8	0
11-20 days	22	29	29	31	24	28	0	24	0	0	0	2
R - days	26	26	28	32	7	12	21	16	2	13	2	0
Monthly	5	9	9	10	7	7	3	7	0	163	1	0

Contd/…

Cauvery at Biligundulu												
01-10 days	232	153	799	7115	3520	3409	176	61	51	34	30	15
11-20 days	87	816	1818	1154	4873	2724	301	48	51	25	23	107
R - days	59	192	2786	2361	7621	722	123	47	54	30	31	277
Monthly	42	129	600	1181	1779	762	67	17	17	163	9	44
Shimsha at T.K.Halli												
01-10 days	SEDIMENT OBSER-VATION SUSPENDED	SEDIMENT OBSER-VATION SUSPENDED	24	133	66	21	47	17	3	1	1	0
11-20 days			26	50	113	28	35	6	2	1	0	1
R - days			167	51	152	43	24	6	1	1	2	17
Monthly			24	26	37	10	12	3	1	163	0	2
Cauvery at Kollegal												
01-10 days	72	80	952	422	480	273	230	51	44	34	31	32
11-20 days	75	79	3976	531	385	153	160	27	40	33	28	37
R - days	74	216	226	419	561	226	89	41	37	35	33	39
Monthly	25	42	573	152	158	72	53	13	13	163	10	12
Kabini at T.Narasipur												
01-10 days	SEDIMENT OBSER-VATION SUSPENDED	SEDIMENT OBSER-VATION SUSPENDED	SEDIMENT OBSER-VATION SUSPENDED	-	144	99	106	18	9	15	21	20
11-20 days				83	129	92	73	13	18	18	20	48
R - days				145	739	134	34	9	13	20	24	57
Monthly				38	112	36	24	4	4	163	7	14
Kabini at Muthankera												
01-10 days	67	271	1527	874	150	83	41	20	5	3	5	16
11-20 days	1148	94	2056	425	294	49	51	10	7	29	5	21
R - days	1110	4731	536	68	3674	55	39	3	4	18	11	20
Monthly	258	566	458	152	458	21	15	4	2	163	2	6

Contd/…

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

VII Basin : Cauvery

Unit : Tonnes per day

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2008-2009												
Hemavathi at Mukundur Hosahalli												
01-10 days	SEDIMENT OBSER-VATION SUSPENDED	SEDIMENT OBSER-VATION SUSPENDED	SEDIMENT OBSER-VATION SUSPENDED	62	19	22	17	17	8	7	8	13
11-20 days				36	20	20	17	18	8	7	12	12
R - days				25	23	19	16	18	6	7	14	12
Monthly				14	7	7	6	6	2	163	4	4
Cauvery at Kudige												
01-10 days	SEDIMENT OBSER-VATION SUSPENDED	SEDIMENT OBSER-VATION SUSPENDED	SEDIMENT OBSER-VATION SUSPENDED	-	50	44	30	12	9	0	7	9
11-20 days				-	52	46	25	9	7	4	5	7
R - days				75	138	40	21	11	4	12	9	9
Monthly				25	27	14	8	4	2	163	2	3

Source: Suspended Sediment and Bedmaterial Data Book for 2008-2009 (Cauvery Basin)

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

VII Basin : Cauvery

Unit : Tonnes per day

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2009-2010												
Thirumalairajanar at Thengudi												
01-10 days	0	0	0	3	8	125	23	15	14	0	0	0
11-20 days	0	0	3	6	9	97	95	16	3	0	0	0
R - days	0	0	9	10	21	28	49	17	0	0	0	0
Monthly	0	0	1	2	4	28	19	5	2	163	0	0
Cauvery at Musiri												
01-10 days	3	4	355	172	849	1170	609	636	23	11	9	79
11-20 days	2	3	1112	335	1148	1609	531	256	19	13	8	16
R - days	7	126	866	125	1241	734	151	391	14	9	7	9
Monthly	1	15	259	70	360	390	143	143	6	163	3	12
Amaravathy at Nallamaranpatty												
01-10 days	0	0	9	0	0	378	1	2	1	0	0	0
11-20 days	0	0	0	0	3	239	10	1	1	0	0	0
R - days	0	0	0	2	0	13	5	1	0	0	0	0
Monthly	0	0	1	0	0	70	2	0	0	163	0	0
Cauvery at Kodumudi												
01-10 days	79	90	698	1361	2298	415	278	650	120	136	133	181
11-20 days	56	181	1237	1859	3326	158	312	312	185	155	101	116
R - days	91	401	1219	1735	1212	132	222	455	139	118	114	85
Monthly	25	75	350	551	760	78	90	157	49	45	39	42
Bhavani at Savandapur												
01-10 days	18	24	30	29	30	48	37	11	5	7	4	4
11-20 days	19	33	36	24	167	19	21	8	6	4	1	6
R - days	17	36	24	22	35	25	12	1	4	5	1	47
Monthly	6	10	10	8	26	10	8	2	2	163	1	6

Contd/…

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

VII Basin : Cauvery *Unit : Tonnes per day*

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2009-2010												
Moyar at Thengumarahada												
01-10 days	39	177	24	44	85	836	27	16	9	8	10	40
11-20 days	25	2505	47	39	135	314	19	20	18	8	11	48
R - days	13	101	37	71	42	39	32	7	13	7	63	11
Monthly	9	309	12	17	29	132	9	5	4	163	9	11
Bhavani at Nellithurai												
01-10 days	2	174	108	351	274	179	79	32	2	41	4	10
11-20 days	18	288	93	141	98	723	74	2	10	21	4	12
R - days	15	238	630	211	48	307	21	2	58	34	7	7
Monthly	4	78	92	78	47	134	19	4	8	163	2	3
Cauvery at Urachikottai												
01-10 days	0	0	44	49	58	6	16	35	5	7	8	8
11-20 days	0	0	54	52	73	0	14	20	7	2	0	2
R - days	0	43	43	59	48	2	9	18	6	0	6	0
Monthly	0	5	16	18	20	1	4	8	2	163	2	1
Cauvery at Biligundulu												
01-10 days	206	41	845	1520	426	204	84	52	25	41	67	79
11-20 days	175	7807	1591	3900	489	170	63	26	21	41	44	67
R - days	39	2746	993	4714	444	87	75	31	37	38	130	91
Monthly	47	1177	381	1126	151	51	25	12	9	163	27	26
Shimsha at T.K.Halli												
01-10 days	4	3	2	6	9	141	64	26	11	10	22	21
11-20 days	3	2	14	1370	70	146	49	12	8	6	78	17
R - days	2	1	9	855	3	80	43	17	14	7	20	30
Monthly	1	1	3	248	9	41	17	6	4	163	13	8

Contd/…

Cauvery at Kollegal												
01-10 days	44	37	510	455	287	234	111	62	46	16	23	21
11-20 days	39	832	360	455	321	260	58	48	47	17	31	21
R - days	31	543	286	455	233	200	59	51	54	18	39	33
Monthly	13	157	128	152	93	77	25	18	16	163	10	8
Kabini at T.Narasipur												
01-10 days	42	47	850	896	196	201	73	12	10	16	19	25
11-20 days	28	7765	1160	1526	479	227	37	14	13	15	32	34
R - days	15	1612	495	783	157	138	11	10	14	16	32	40
Monthly	9	1047	278	356	92	63	13	4	4	163	9	11
Kabini at Muthankera												
01-10 days	479	2265	593	1653	1025	332	47	331	11	9	6	75
11-20 days	37	6841	446	293	220	485	41	86	10	6	7	24
R - days	61	622	349	124	54	97	262	19	8	9	38	11
Monthly	64	1081	154	230	144	102	39	48	3	163	6	12

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

VII Basin : Cauvery

Unit : Tonnes per day

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2009-2010												
Hemavathi at Mukundur Hosahalli												
01-10 days	7	8	32	53	55	44	35	21	9	19	17	12
11-20 days	11	245	42	70	35	38	24	13	20	19	15	14
R - days	10	225	43	42	45	42	22	6	20	18	13	11
Monthly	3	53	13	18	15	14	9	4	5	163	5	4

Contd/…

Cauvery at Kudige												
01-10 days	43	2533	1125	3027	1033	44	25	51	10	7	7	12
11-20 days	38	6504	757	769	240	290	32	25	9	6	7	38
R - days	68	2052	609	347	81	73	98	16	8	7	9	16
Monthly	17	1232	277	460	150	45	17	10	3	163	3	7

Source: Suspended Sediment and Bedmaterial Data Book for 2009-2010 (Cauvery Basin)

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

VIII Basin : East Flowing Rivers from Mahanadi to Kanyakumari

Unit : Tonnes per day

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2007-2008												
Gundlakamma at Marella												
01-10 days	-	-	32	64	534	684	54	133	43	13	59	3
11-20 days	-	-	9	1118	71	60	68	103	556	6	20	2
R - days	-	-	44	427	192	56	67	45	24	988	4	1
Monthly	-	-	9	179	89	89	21	31	69	163	9	1
Pennar at Chennur												
01-10 days	<---------- Data not available ---------->											
11-20 days												
R - days												
Monthly												
Kunderu at Alladupalli												
01-10 days	<---------- Data not available ---------->											
11-20 days												
R - days												
Monthly												

Contd/…

Ponnaiyar at Vazhavachanur												
01-10 days	<---------- Data not available ---------->											
11-20 days												
R - days												
Monthly												
Ponnaiyar at Gummanur												
01-10 days	<---------- Data not available ---------->											
11-20 days												
R - days												
Monthly												
Suruliyar at Theni												
01-10 days	0	315	285	180	162	651	282	18	272	32	70	9
11-20 days	0	357	203	151	544	472	1613	135	90	185	10	20
R - days	119	312	182	175	10045	388	264	100	53	118	9	0
Monthly	13	109	74	56	1195	168	240	28	46	163	10	3
Vaigai at Ambasamudram												
01-10 days	0	69	0	0	0	560	2	95	114	1	437	3
11-20 days	0	0	0	0	40	102	3908	16	91	1623	92	4
R - days	0	0	0	0	2656	34	773	6	3	5278	15	1
Monthly	0	8	0	0	300	77	520	13	23	163	60	1
Thambraparani at Murappanadu												
01-10 days	-	-	-	-	-	-	16	21	22	10	19	22
11-20 days	-	-	-	-	-	-	33	17	26	196	38	20
R - days	-	-	-	-	-	-	319	19	9	623	9	22
Monthly	-	-	-	-	-	-	41	6	6	163	7	7

Source: Suspended Sediment and Bedmaterial Data Book for 2007-2008 (East Flowing River)

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

VIII Basin : East Flowing Rivers from Mahanadi to Kanyakumari

Unit : Tonnes per day

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2008-2009												
Gundlakamma at Marella												
01-10 days	0	0	0	0	15	30	842	89	48	23	14	1
11-20 days	0	0	2	1	15	737	164	90	36	17	5	0
R - days	0	1	8	3	361	3096	103	48	31	21	6	0
Monthly	0	0	1	0	43	429	123	25	13	163	3	0
Pennar at Chennur												
01-10 days	8	0	0	11095	2316	118	676	64	10	11	0	0
11-20 days	0	0	64	9171	1036	814	273	38	7	0	0	0
R - days	0	0	536	3685	589	1704	75	15	19	0	0	48
Monthly	1	0	67	2661	438	293	114	13	4	163	0	5
Kunderu at Alladupalli												
01-10 days	0	0	0	10	11	6	7	3	1	2	0	0
11-20 days	0	0	1	19	6	9	6	2	1	0	0	0
R - days	0	0	7	12	6	9	4	1	1	0	0	2
Monthly	0	0	1	5	3	3	2	1	0	163	0	0
Ponnaiyar at Vazhavachanur												
10 days	0	0	0	0	0	0	0	0	0	10	1	1
11-20 days	0	0	0	0	0	0	0	0	2	3	1	1
R - days	0	0	0	0	0	0	0	0	22	2	1	1
Monthly	0	0	0	0	0	0	0	0	3	163	0	0

Contd/…

Ponnaiyar at Gummanur												
01-10 days	15	8	32	202	33	20	18	5	3	3	0	11
11-20 days	6	46	169	45	46	9	9	6	2	2	0	6
R - days	8	54	357	15	147	17	5	2	4	0	5	52
Monthly	3	12	62	29	25	5	4	1	1	163	1	8
Suruliyar at Theni												
01-10 days	0	340	114	135	70	127	117	16	2	0	0	5
11-20 days	0	143	101	103	249	107	75	12	0	0	0	6
R - days	14	162	267	71	1323	141	25	9	2	1	4	0
Monthly	2	72	54	34	182	42	24	4	0	163	0	1
Vaigai at Ambasamudram												
01-10 days	0	0	0	2	0	15	77	2	0	0	0	0
11-20 days	0	0	0	1	584	1	178	0	0	0	0	0
R - days	0	0	0	0	2311	95	41	0	0	0	0	0
Monthly	0	0	0	0	322	12	33	0	0	163	0	0
Thambraparani at Murappanadu												
01-10 days	15	9	7	7	6	15	101	12	14	12	10	13
11-20 days	11	6	8	11	92	12	706	11	16	7	22	13
R - days	6	3	14	4	43	488	112	20	14	4	9	17
Monthly	4	2	3	2	16	57	102	5	5	163	5	5

Source: Suspended Sediment and Bedmaterial Data Book for 2008-2009 (East Flowing River)

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

VIII Basin : East Flowing Rivers from Mahanadi to Kanyakumari

Unit : Tonnes per day

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2009-2010												
Gundlakamma at Marella												
01-10 days	1	0	0	249	1404	258	107	80	111	52	2	0
11-20 days	5	1	35	45	107	2315	103	144	114	18	4	0
R - days	1	0	4	17	29	977	185	79	13	9	1	14107
Monthly	1	0	4	35	171	394	44	34	26	163	1	1567
Pennar at Chennur												
01-10 days	11.82	2.30	0.0	12848.9	139175.3	1025	308.0	14.1	137.6	79.0	2.16	9.31
11-20 days	7.02	0.00	122.8	1533.0	5171.0	989	366.7	166.0	85.5	18.1	0.77	9.12
R - days	12.17	0.00	2066.7	17860.3	329.9	683	162.3	106.6	117.7	3.7	7.98	15.45
Monthly	3	0	243	3582	16075	300	93	32	38	163	1	4
Kunderu at Alladupalli												
01-10 days	1.49	3.19	0.00	2647.3	28952.8	2002.6	266.0	62.5	109.49	45.87	6.16	1.57
11-20 days	5.76	0.00	79.39	677.9	3083.9	738.8	369.2	516.0	67.77	7.56	1.30	0.67
R - days	13.77	0.00	163.17	419.6	244.8	548.3	150.9	208.7	73.37	4.75	1.47	3.32
Monthly	2	0	27	416	3587	366	87	87	28	163	1	1
Ponnaiyar at Vazhavachanur												
01-10 days	0.39	0.00	0.00	0.00	0.16	0.96	3.65	7.16	0.51	8.99	0.22	0.41
11-20 days	0.14	0.00	0.00	0.08	0.09	19.72	25.45	3.76	7.05	1.02	0.17	0.27
R - days	0.00	0.00	0.00	0.34	0.00	5.65	22.90	1.22	15.38	0.28	0.19	0.15
Monthly	0	0	0	0	0	3	6	1	3	163	0	0

Contd/…

Ponnaiyar at Gummanur												
01-10 days	20	2	9	5	26	21	15	30	1	2	2	19
11-20 days	28	0	15	329	10	53	12	3	2	1	3	15
R - days	10	1	33	131	5	24	9	4	1	1	3	13
Monthly	6	0	6	52	5	11	4	4	0	163	1	5
Suruliyar at Theni												
01-10 days	1	33	82	48	29	915	242	128	19	4	3	40
11-20 days	2	104	41	55	110	774	200	87	13	0	3	7
R - days	5	122	60	31	102	219	157	21	9	1	4	1
Monthly	1	29	20	15	27	212	67	26	5	163	1	5
Vaigai at Ambasamudram												
01-10 days	0	0	0	0	0	699	254	3	0	0	0	0
11-20 days	0	0	0	0	0	476	41	22	0	0	0	0
R - days	0	0	0	0	0	241	54	0	0	0	0	0
Monthly	0	0	0	0	0	157	39	3	0	163	0	0
Thambraparani at Murappanadu												
01-10 days	12	7	7	8	6	315	71	19	16	13	5	12
11-20 days	12	13	7	10	8	121	30	70	20	6	5	12
R - days	10	16	5	8	16	41	96	19	15	5	13	8
Monthly	4	4	2	3	3	53	22	12	6	163	3	4

Source: Suspended Sediment and Bedmaterial Data Book for 2009-2010 (East Flowing River)

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

IX Basin : West Flowing Rivers fro Kanyakumari to Tapi *Unit : Tonnes per day*

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2007-2008												
Nethravathi at Bantwal												
01-10 days	0	-	-	-	-	-	-	-	-	-	-	-
11-20 days	-	-	-	-	-	-	-	-	-	-	-	-
R - days	-	-	-	-	-	-	-	-	-	74	-	-
Monthly	0	-	-	-	-	-	-	-	-	163	-	-
Periyar at Neeleeswaram												
01-10 days	79	2411	885	583	242	341	-	-	-	-	-	-
11-20 days	256	2440	646	1039	266	212	-	-	-	-	-	-
R - days	1626	683	602	988	887	163	-	-	-	-	-	-
Monthly	218	615	237	290	155	80	-	-	-	-	-	-
Bharathapuzha at Kumbidi												
01-10 days	98	11461	4519	1772	549	956	140	127	87	20	62	13
11-20 days	460	10113	2985	3993	1397	338	85	82	251	206	28	12
R - days	4700	2553	1103	5011	2336	192	322	86	46	295	19	22
Monthly	584	2681	956	1197	476	165	61	33	43	163	12	5
Meenachil at Kidangoor												
01-10 days	46	190	76	41	17	42	3	0	0	0	14	7
11-20 days	153	400	58	202	85	23	1	0	0	2	16	4
R - days	1051	131	20	71	119	14	2	0	0	3	12	30
Monthly	139	80	17	35	25	9	1	0	0	163	5	5
Manimala at Kallooppara												
01-10 days	8	708	97	223	29	224	3	0	0	0	13	5
11-20 days	103	1348	76	372	428	66	1	0	0	0	4	5
R - days	2066	168	36	358	825	14	1	0	0	0	2	21
Monthly	242	247	23	106	142	34	1	0	0	163	2	3

Source: Suspended Sediment Data Year Books (2007 to 2008) West Flowing Rivers fro Kanyakumari to Tapi

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

IX Basin : West Flowing Rivers fro Kanyakumari to Tapi

Unit : Tonnes per day

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2008-2009												
<---------- Data not available ---------->												

Source: Suspended Sediment Data Year Books (2008 to 2009) West Flowing Rivers fro Kanyakumari to Tapi

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

IX Basin : West Flowing Rivers fro Kanyakumari to Tapi

Unit : Tonnes per day

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2009-2010												
Pulanthode at Pulamanthole												
01-10 days	108	836	91	424	463	1208	14	20	3	4	4	37
11-20 days	13	5854	93	176	68	254	12	8	3	1	7	6
R - days	53	235	449	489	22	53	21	2	1	5	14	5
Monthly	19	769	70	121	61	168	5	3	1	163	3	5
Aliyar at Ambrampalayam												
01-10 days	3	6	9	11	16	607	12	14	8	7	3	5
11-20 days	2	9	17	28	13	129	14	12	10	5	4	6
R - days	4	6	26	18	10	14	15	12	9	6	5	10
Monthly	1	2	6	6	4	83	5	4	3	163	1	2

Contd/…

Chalakudy at Arangaly												
01-10 days	70	555	113	1647	1139	201	26	7	0	0	0	0
11-20 days	69	3863	158	143	84	223	14	0	0	0	0	0
R - days	85	219	662	177	76	128	13	0	0	0	0	56
Monthly	25	515	104	219	144	61	6	1	0	163	0	6
Periyar at Neeleeswaram												
01-10 days	2193	1157	57	502	2853	63	32	10	7	23	23	7
11-20 days	40	2328	240	424	184	312	8	7	13	30	8	9
R - days	139	268	528	358	44	115	7	8	14	12	11	14
Monthly	264	417	92	143	342	54	5	3	4	163	5	3
Muvattupuzha at Ramamangalam												
01-10 days	359	1534	219	360	1046	56	64	34	42	54	37	42
11-20 days	164	1371	516	468	77	143	28	23	61	62	69	62
R - days	559	312	212	321	59	190	27	33	39	50	55	42
Monthly	120	357	105	128	131	43	13	10	16	163	18	16
Kaliyar at Kalampur												
01-10 days	17	495	36	183	145	10	5	1	0	0	0	1
11-20 days	11	759	286	56	34	22	3	2	0	0	0	0
R - days	58	74	34	92	13	14	4	0	0	0	1	2
Monthly	10	148	40	37	21	5	1	0	0	163	0	0

Contd/….

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

IX Basin : West Flowing Rivers fro Kanyakumari to Tapi

Unit : Tonnes per day

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2009-2010												
Chaliyar at Kuniyil												
01-10 days	0	3335	286	1715	4300	572	131	0	0	0	0	0
11-20 days	0	11624	218	538	188	432	3	0	0	0	0	0
R - days	87	951	364	539	109	192	0	0	0	0	0	0
Monthly	10	1768	96	310	511	133	15	0	0	163	0	0
Bharathapuzha at Kumbidi												
01-10 days	59	3061	785	2121	2007	3053	113	39	6	2	4	23
11-20 days	58	17882	432	589	573	2050	45	22	4	1	5	25
R - days	151	2541	1372	749	13	581	60	9	2	3	9	40
Monthly	30	2609	288	384	288	632	24	8	1	163	2	10
Meenachil at Kidangoor												
01-10 days	26	247	46	92	112	35	8	2	0	0	1	26
11-20 days	13	219	50	68	31	68	3	1	0	0	1	5
R - days	35	40	51	53	13	27	7	0	0	0	5	33
Monthly	8	56	16	24	17	14	2	0	0	163	1	7
Payaswani at Erinjipuzha												
01-10 days	21	230	555	948	137	61	32	24	5	1	0	1
11-20 days	15	8342	1710	607	79	82	14	11	2	0	0	3
R - days	25	672	337	613	66	54	32	12	1	0	0	6
Monthly	7	1027	289	241	31	22	9	5	1	0	0	1

Contd/…

Valapatanam at Perumannu												
01-10 days	134	5734	453	805	752	58	8	5	7	6	5	5
11-20 days	17	12353	180	433	227	83	10	5	6	5	4	5
R - days	117	1818	213	422	46	43	49	6	13	5	5	5
Monthly	30	2212	94	184	114	20	7	2	3	163	2	2
Manimala at Kallooppara												
01-10 days	77	756	574	98	431	11	3	1	0	0	0	62
11-20 days	12	566	33	69	28	85	1	1	0	0	1	3
R - days	36	20	108	127	9	40	2	0	0	0	5	30
Monthly	14	149	79	33	52	15	1	0	0	163	1	11
Pamba at Malakkara												
01-10 days	34	677	58	262	489	49	14	3	1	1	5	26
11-20 days	19	720	156	63	53	128	8	3	1	2	7	13
R - days	67	89	135	108	26	36	5	2	1	3	5	33
Monthly	13	165	39	48	63	24	3	1	0	163	2	8
Achankovil at Thumpamon												
01-10 days	14	124	9	260	1026	183	7	4	0	0	0	17
11-20 days	12	504	28	40	147	231	6	7	0	0	2	19
R - days	20	17	56	43	53	146	3	1	0	0	16	59
Monthly	5	72	10	38	136	62	2	1	0	163	2	11

Contd/….

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

IX Basin : West Flowing Rivers fro Kanyakumari to Tapi

Unit : Tonnes per day

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2009-2010												
Kallada at Pattazhy												
01-10 days	13	37	8	40	240	413	30	17	41	26	48	62
11-20 days	9	61	15	38	60	121	4	72	23	31	23	31
R-days	11	9	22	43	14	141	2	45	13	48	37	74
Monthly	4	12	5	13	35	75	4	15	9	163	12	19
Vamanapuram at Ayilam												
01-10 days	0	11	3	47	846	28	9	2	0	0	0	0
11-20 days	0	410	12	106	25	37	3	2	0	0	0	0
R- days	0	4	22	23	29	112	5	2	0	0	23	170
Monthly	0	47	4	20	100	20	2	1	0	163	3	19

Source: Suspended Sediment Data Year Books (2009 to 2010) West Flowing River.

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

X Basin : Tapi *Unit : Tonnes per day*

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2007-2008												
Tapi at Burhanpur												
01-10 days	0	963498	63022	44548	716	75	10	1	4	4	12	5
11-20 days	1	21861	6462	2464	80	11	24	2	8	0	5	2
R - days	44	1743	3375	19280	125	2	12	1	5	14	3	0
Monthly	5	109678	8095	7366	102	10	5	0	2	163	2	1
Purna at Gopalkheda												
01-10 days	1986	114281	56256	11669	2729	14	7	4	1	0	2	0
11-20 days	2025	6226	3006	4609	88	6	6	2	1	0	268	0
R - days	168	11037	8718	5127	32	4	4	1	0	0	311	0
Monthly	464	14616	7553	2378	317	3	2	1	0	163	65	0
Purna at Yerli												
01-10 days	-	667967	279335	66413	4063	103	1	1	0	0	0	0
11-20 days	284	35695	25062	15050	492	78	0	1	0	0	0	0
R - days	226	7534	12146	11420	185	16	0	0	0	0	0	0
Monthly	85	79022	35171	10320	527	22	0	0	0	163	0	0
Tapi at Sarangkheda												
01-10 days	-	1740058	485303	97660	1521	132	6	-	-	-	-	-
11-20 days	-	267442	90850	16347	416	115	1	-	-	-	-	-
R - days	168	10726	21029	43033	208	24	0	-	-	-	-	-
Monthly	56	224247	66354	17449	238	30	1	-	-	-	-	-

Source: Suspended Sediment and Bedmaterial Data Book (2007 to 2008) Tapi Basin.

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

X Basin : Tapi

Unit : Tonnes per day

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2008-2009												
Tapi at Burhanpur												
01-10 days	0	126	157331	13525	328	1	11	6.4	0.1	0.9	1.0	0.0
11-20 days	56	56	21072	3007	332	1	7.7	4.3	0.0	0.9	0.4	0.4
R - days	12	28642	3871	3195	9	1	3.1	1.2	0.0	0.9	0.0	0.1
Monthly	8	3203	20253	2192	74	0	2	1	0	163	0	0
Purna at Gopalkheda												
01-10 days	0	0	80	10603	182	0	-	-	-	-	-	-
11-20 days	512	0	19	4646	10	0	-	-	-	-	-	-
R - days	1	1758	41	5007	2	-	-	-	-	-	-	-
Monthly	57	195	16	2251	22	0	-	-	-	163	-	-
Purna at Yerli												
01-10 days	0	155	5734	19487	178	0	0	0	0	0	-	-
11-20 days	337	0	6013	6513	98	0	0	0	0	0	-	-
R - days	217	3729	390	23498	12	0	0	0	0	0	-	-
Monthly	62	432	1349	5500	32	0	0	0	0	163	-	-
Tapi at Sarangkheda												
01-10 days	-	-	93297	18150	706	-	-	-	-	-	-	-
11-20 days	-	-	53074	78971	731	-	-	-	-	-	-	-
R - days	-	20993	5837	23470	-	-	-	-	-	-	-	-
Monthly	-	6998	16912	13399	240	-	-	-	-	163	-	-

Source: Suspended Sediment and Bedmaterial Data Book (2008 to 2009) Tapi Basin.

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

X Basin : Tapi

Unit : Tonnes per day

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2009-2010												
Tapi at Burhanpur												
01-10 days	0	1890	249	7391	1421	7	13	1	30	10	0	0
11-20 days	0	4270	149	997	77	731	3	3	25	8	0	0
R - days	55	82847	16696	66	19	67	1	1	18	1	0	0
Monthly	6	9890	1899	939	169	89	2	1	8	163	0	0
Purna at Gopalkheda												
01-10 days	0	23637	3	5226	889	9	0	0	0	0	0	0
11-20 days	0	8884	226	20	16	269	0	0	0	0	0	0
R - days	852	7292	2457	9	10	21	0	0	0	0	0	0
Monthly	95	4424	298	584	102	33	0	0	0	163	0	0
Purna at Yerli												
01-10 days	0	12427	400	10010	318	0	628	0	0	0	0	0
11-20 days	0	5275	0	110	49	940	0	0	0	0	0	0
R - days	1	12049	11622	4	0	187	0	0	0	0	0	0
Monthly	0	3306	1336	1125	41	125	70	0	0	163	0	0
Tapi at Sarangkheda												
01-10 days	0	19151	217	202840	1063	0	0	0	0	0	0	0
11-20 days	0	25075	0	370	0	0	0	0	0	0	0	0
R - days	0	229771	0	24	0	0	0	0	0	0	0	0
Monthly	0	30444	24	22582	118	0	0	0	0	163	0	0

Source: Suspended Sediment and Bedmaterial Data Book (2009 to 2010) Tapi Basin.

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

XI Basin : Narmada *Unit : Tonnes per day*

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2007-2008												
Orsang at Chandwada												
01-10 days	-	45958	10083	6656	3214	-	-	-	-	-	-	-
11-20 days	77	9917	15219	4357	389	-	-	-	-	-	-	-
R - days	14	677	4248	17805	93	-	-	-	-	-	-	-
Monthly	15	6284	3283	3202	411	-	-	-	-	163	-	-
Narmada at Mandleshwar												
01-10 days	1711	84179	181375	24277	1866	487	382	567	255	167	121	488
11-20 days	349	23733	14198	2483	686	378	513	617	205	168	168	308
R - days	216	16702	5189	888	669	349	431	475	160	217	172	615
Monthly	253	13846	22307	3072	358	135	147	184	69	163	51	157
Narmada at Gurudeshwar												
01-10 days	405	69081	111325	8274	228	1215	456	489	3	22	24	326
11-20 days	224	57214	43247	2935	473	646	746	478	23	25	34	227
R - days	246	20119	9483	2184	288	424	734	462	21	20	25	105
Monthly	97	16268	18228	1488	110	254	215	159	5	163	9	73
Narmada at Rajghat												
01-10 days	760	-	-	-	-	-	-	-	-	-	-	-
11-20 days	525	-	-	-	-	-	-	-	-	-	-	-
R - days	130	-	-	-	-	-	-	-	-	-	-	-
Monthly	157	-	-	-	-	-	-	-	-	163	-	-
Narmada at Mortakka												
01-10 days	647	-	-	-	-	-	-	-	-	-	-	-
11-20 days	610	-	-	-	-	-	-	-	-	-	-	-
R - days	215	-	-	-	-	-	-	-	-	-	-	-
Monthly	164	-	-	-	-	-	-	-	-	163	-	-

Contd/…

Narmada at Handia												
01-10 days	146	395356	220268	86101	9025	5497	6529	3867	3259	878	127	128
11-20 days	141	42844	21678	26015	7468	6489	5403	3426	2770	759	131	44
R - days	363	17944	24697	13954	5767	6754	5016	2749	2314	375	166	65
Monthly	72	50683	29627	14008	2473	2082	1883	1116	927	163	47	26
Narmada at Hoshangabad												
01-10 days	196	121209	107116	39676	615	283	268	317	712	148	42	148
11-20 days	93	18381	7362	4493	560	205	305	517	301	29	78	60
R - days	712	4919	10699	5642	506	295	385	475	277	110	235	148
Monthly	111	16057	13909	5535	187	87	106	145	143	163	39	40
Narmada at Sandia												
01-10 days	338	6174	1968	1444	2988	294	181	101	125	23	4	8
11-20 days	632	595	533	884	1495	230	186	45	33	29	32	5
R - days	783	757	1575	771	626	207	150	115	20	11	13	9
Monthly	195	836	453	344	568	81	57	29	20	163	5	2

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

XI Basin : Narmada *Unit : Tonnes per day*

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2007-2008												
Shakkar at Gadarwara												
01-10 days	0	49081	6061	6956	370	2.0	0.1	0.3	0.1	0.1	0.1	0
11-20 days	258	1552	336	492	66	1.0	0.1	0.2	0.1	0.0	0.1	-
R - days	59	5491	1477	1048	8	0.3	0.1	0.1	0.1	0.1	0.1	-
Monthly	35	6236	875	944	49	0	0	0	0	163	0	0
Narmada at Barmanghat												
01-10 days	250	25098	12852	6959	1356	613	204	204	362	238	54	361
11-20 days	140	10463	4839	3131	1124	353	142	167	210	300	232	86
R - days	582	20681	12724	1530	556	371	67	131	107	85	4584	138
Monthly	108	6249	3379	1291	337	149	46	56	75	163	541	65
												Contd/…

Banjar at Bamini												
01-10 days	-	1718	1791	1898	352	9	2	-	-	-	-	-
11-20 days	0	1272	3788	1807	147	5	9	-	-	-	-	-
R - days	0	1197	1885	941	39	1	2	-	-	-	-	-
Monthly	0	465	829	516	60	2	1	-	-	-	-	-
Burhner at Mohgaon												
01-10 days	0	37916	7253	12198	1983	74	20	10	6	2	2	0
11-20 days	1086	16325	4878	5229	179	40	16	7	6	2	1	0
R- days	666	6431	3385	3361	72	29	16	5	3	2	0	0
Monthly	195	6741	1724	2310	248	16	6	2	2	163	0	0
Narmada ar Manot												
01-10 days	0	10608	38259	32558	1113	75	25	16	11	8	10	1
11-20 days	45	34093	2312	6569	407	58	24	15	11	8	5	0
R- days	33	20049	25278	8199	183	36	17	6	8	8	2	0
Monthly	9	7194	7317	5258	189	19	7	4	3	163	2	0

Source : Suspended Sediment Data Year Book (2007 to 2008) Narmada Basin.

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

XI Basin : Narmada *Unit : Tonnes per day*

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2008-2009												
Orsang at Chandwada												
01-10 days	-	-	2191	1479	168	-	-	-	-	-	-	-
11-20 days	-	10069	60624	5737	28	-	-	-	-	-	-	-
R - days	-	476	1060	1000	-	-	-	-	-	-	-	-
Monthly	-	1758	7097	913	33	-	-	-	-	-	-	-

Contd/…

Narmada at Gurudeshwar												
01-10 days	186	259	34	777	89	74	36	-	-	-	-	-
11-20 days	457	177	327	1832	38	156	37	-	-	-	-	-
R - days	243	100	238	215	63	65	19	-	-	-	-	-
Monthly	98	60	67	314	21	33	10	-	-	-	-	-
Narmada at Rajghat												
01-10 days	-	-	-	-	-	-	-	-	-	-	-	-
11-20 days	-	-	-	-	-	-	-	-	-	-	-	-
R - days	-	-	-	-	-	-	-	-	-	-	-	-
Monthly	-	-	-	-	-	-	-	-	-	-	-	-
Narmada at Mandleshwar												
01-10 days	801	1136	473	2944	1245	3280	1758	2589	2940	1096	630	1230
11-20 days	2254	1348	244	3280	2402	3059	1380	1905	2299	726	749	476
R - days	829	1179	2792	1081	1912	4890	2273	2215	803	688	1222	390
Monthly	432	407	390	812	618	1248	601	745	671	163	289	233
Narmada at Mortakka												
01-10 days	-	-	-	-	-	-	-	-	-	-	-	-
11-20 days	-	-	-	-	-	-	-	-	-	-	-	-
R - days	-	-	-	-	-	-	-	-	-	-	-	-
Monthly	-	-	-	-	-	-	-	-	-	-	-	-
Narmada at Handia												
01-10 days	107	15871	260388	11520	5795	1591	1973	1622	418	123	160	258
11-20 days	546	38137	134679	11535	2370	2112	2685	1109	285	98	174	236
R - days	4990	20050	15446	13638	2005	1739	2188	599	180	70	217	102
Monthly	627	8229	45613	4077	1130	605	761	370	98	163	61	66
Narmada at Hoshangabad												
01-10 days	210	16410	646090	3532	1098	134	234	206	234	461	457	-
11-20 days	316	18269	98783	4238	327	566	270	182	239	173	108	27
R - days	6645	3808	6886	6763	360	68	330	156	-	394	-	28
Monthly	797	4276	83529	1615	198	85	93	60	79	163	94	9

Contd/…

Narmada at Sandia												
01-10 days	14	9421	89696	1416	711	354	416	235	110	234	446	-
11-20 days	93	8093	5406	1028	459	418	458	-	110	159	418	418
R - days	3779	1471	701	1187	341	404	416	146	143	186	357	148
Monthly	432	2109	10645	403	168	131	143	64	40	163	136	94

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

XI Basin : Narmada *Unit : Tonnes per day*

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2008-2009												
Shakkar at Gadarwara												
01-10 days	-	26	4450	1249	462	4.13	2	-	-	-	-	-
11-20 days	0.48	18	1360	460	87	4.25	-	-	-	-	-	-
R - days	3.05	6.0	2376	457	11	1.91	-	-	-	-	-	-
Monthly	1	6	910	241	62	1	1	-	-	-	-	-
Narmada at Barmanghat												
01-10 days	308	22181	71625	2905	513	771	126	146	22	611	153	119
11-20 days	731	31487	50175	1163	671	609	39	181	98	424	293	166
R - days	26986	6783	5638	1256	968	196	641	223	520	152	100	96
Monthly	3114	6717	14160	592	239	175	90	61	71	163	61	42
Banjar at Bamini												
01-10 days	-	1695	12754	481	58	4	-	-	-	-	-	-
11-20 days	-	688	1246	1186	24	1	-	-	-	-	-	-
R - days	1581	463	494	313	31	1	-	-	-	-	-	-
Monthly	527	316	1610	220	13	1	-	-	-	-	-	-

Contd/…

Burhner at Mohgaon												
01-10 days	-	6942	22006	1020	265	73	24	26	15	-	-	-
11-20 days	124	2736	19673	5219	155	42	27	60	7	-	-	-
R- days	10384	7838	581	1256	85	33	12	18	5	-	-	-
Monthly	1751	1946	4696	833	56	16	7	12	3	163	-	-
Narmada ar Manot												
01-10 days	0	14779	53896	8001	1435	15	9.59	4.76	0.00	2.9	1.4	0.7
11-20 days	38	9508	42304	19642	269	11	7.88	11.56	4.11	2.5	1.9	0.6
R- days	9000	18135	10843	7884	34	15	6.19	5.65	-	2.0	1.5	0.4
Monthly	1004	4714	11894	3947	193	5	3	2	1	163	1	0

Source : Suspended Sediment Data Year Book (2008 to 2009) Narmada Basin.

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

XI Basin : Narmada *Unit : Tonnes per day*

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2009-2010												
Orsang at Chandwada												
01-10 days	-	238	9	1245	600	-	-	-	-	-	-	-
11-20 days	-	214	1	416	112	-	-	-	-	-	-	-
R - days	-	321	1550	16	2	-	-	-	-	-	-	-
Monthly	-	86	173	186	79	-	-	-	-	-	-	-
Narmada at Gurudeshwar												
01-10 days	6	4	9	15309	615	87	19	-	-	-	-	-
11-20 days	5	25	11	49818	149	56	779	-	-	-	-	-
R - days	4	294	1125	2495	1587	41	17	-	-	-	-	-
Monthly	2	36	127	7514	261	20	91	-	-	-	-	-

Contd/…

Narmada at Mandleshwar												
01-10 days	456	1932	2483	9239	2998	2178	2025	2466	2667	1975	1696	1245
11-20 days	261	3166	1706	46909	1492	936	2904	2646	1448	1564	4468	1249
R - days	126	32969	4594	8474	729	571	2732	924	2650	750	2815	1942
Monthly	94	4230	976	7180	580	409	851	671	752	163	998	493
Narmada at Handia												
01-10 days	57	417	7605	513242	35472	1655	1494	1326	470	391	211	450
11-20 days	54	24397	5819	703729	7462	9602	2451	1016	497	296	301	213
R - days	50	609122	39058	15970	3031	3568	1766	515	318	2149	288	260
Monthly	18	70437	5831	136993	5107	1647	635	317	143	163	89	103
Narmada at Hoshangabad												
01-10 days	53	748	317	443945	2664	52	33	57	48	47	34	238
11-20 days	182	30950	1858	355811	297	128	22	51	30	34	117	108
R - days	191	536593	4436	2115	100	51	37	55	61	32	84	157
Monthly	47	63143	735	89097	340	26	10	18	15	163	26	56
Narmada at Sandia												
01-10 days	211	416	607	3000367	471	200	201	199	183	147	186	367
11-20 days	344	27731	1321	988390	228	294	172	221	150	184	330	314
R - days	108	621557	10395	738	174	274	293	177	252	170	383	272
Monthly	74	72189	1369	443277	97	85	74	66	65	163	100	106

Contd/…

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

XI Basin : Narmada *Unit : Tonnes per day*

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2009-2010												
Shakkar at Gadarwara												
01-10 days	-	45439	1963	134172	778	4	2	1	0	0	0	0
11-20 days	-	21841	1510	33579	224	95	1	0	0	0	0	-
R - days	-	290423	3964	856	10	33	1	1	0	0	0	-
Monthly	-	39745	826	18734	112	15	0	0	0	163	0	0
Narmada at Barmanghat												
01-10 days	996	251	2151	1570254	574	721	152	508	282	259	626	382
11-20 days	127	3751	3427	165003	294	310	151	638	308	457	780	499
R - days	196	116016	4402	1075	290	199	385	217	510	554	907	328
Monthly	147	13335	1109	192926	129	137	76	151	122	163	257	134
Banjar at Bamini												
01-10 days	-	-	108	744	354	3	5	1	-	-	-	-
11-20 days	-	5047	838	141	35	89	1	0	-	-	-	-
R - days	-	6390	1612	35	7	32	2	-	-	-	-	-
Monthly	-	1906	284	102	44	14	1	0	-	163	-	-
Burhner at Mohgaon												
01-10 days	-	3786	108	10942	118	3	3	1	1	0	0	-
11-20 days	-	14523	5508	135	13	144	3	1	0	0	0	-
R- days	-	23646	4696	9	6	22	2	0	0	0	0	-
Monthly	-	4662	1146	1232	15	19	1	0	0	163	0	-
Narmada ar Manot												
01-10 days	1	7448	399	19762	89	21	35	18	12	10	3	0
11-20 days	6	29483	9268	887	66	105	26	14	16	7	2	0
R- days	2	7801	5180	155	34	67	25	14	14	3	0	0
Monthly	1	4970	1650	2312	21	21	10	5	5	163	1	0

Source : Suspended Sediment Data Year Book (2009 to 2010) Narmada Basin.

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

XII Basin : Mahi and Sabarmati

Unit : Tonnes per day

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2007-2008												
Mahi at Mataji												
01-10 days	0	47612	147247	880	215	5	0	0	0	0	0	0
11-20 days	0	1822	1040	61	40	2	0	0	0	0	0	0
R - days	0	297	2333	2785	4	1	0	0	0	0	0	0
Monthly	0	5526	16736	414	29	1	0	0	0	0	0	0
Mahi at Paderdibadi												
01-10 days	0	1490	6763	435	24	2	1	2	3	1	0	0
11-20 days	0	327	699	111	4	1	1	2	3	1	0	0
R - days	0	9	5177	153	2	1	3	4	2	1	0	0
Monthly	0	203	1404	78	3	0	1	1	1	163	0	0
Mahi at Khanpur												
01-10 days	0	48672	36721	172	487	65	44	38	31	21	10	15
11-20 days	0	67210	9234	76	62	63	40	42	19	15	13	14
R - days	0	1582	18327	2821	67	55	44	43	18	19	14	14
Monthly	0	13052	7142	341	68	20	14	14	8	163	4	5
Banas at Kamalpur												
01-10 days	0	73611	7687	0	0	0	0	0	0	0	0	0
11-20 days	0	156	35	0	0	0	0	0	0	0	0	0
R - days	0	0	0	0	0	0	0	0	0	0	0	0
Monthly	0	8196	858	0	0	0	0	0	0	163	0	0

Contd/…

Bhadar at Ganod												
01-10 days	0	5571	115736	925	21	1	0	0	0	0	0	0
11-20 days	0	12	2760	3842	22	0	0	0	0	0	0	0
R - days	0	2	2958	794	18	0	0	0	0	0	0	0
Monthly	0	621	13495	618	7	0	0	0	0	163	0	0
Shetrunji at Lowara												
01-10 days	0	4087	101502	10642	1677	9	0	0	0	0	0	0
11-20 days	0	3	1098	8147	248	1	0	0	0	0	0	0
R - days	35	44	36173	108865	65	0	0	0	0	0	0	0
Monthly	4	459	15419	14184	221	1	0	0	0	163	0	0
Derol Bridge at Sabarmati												
01-10 days	0	397	833	738	0	0	0	0	0	0	0	0
11-20 days	0	72	310	2	0	0	0	0	0	0	0	0
R - days	0	272	272	0	0	0	0	0	0	0	0	0
Monthly	0	82	157	82	0	0	0	0	0	163	0	0

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

XII Basin : Mahi and Sabarmati *Unit : Tonnes per day*

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2007-2008												
Purna at Mahuwa												
01-10 days	0	38386	9715	578	62	4	0	0	0	0	0	0
11-20 days	20	949	547	795	23	2	0	0	0	0	0	0
R - days	1654	408	2084	4961	10	0	0	0	0	0	0	0
Monthly	186	4416	1372	704	11	1	0	0	0	163	0	0

Contd/…

Ambika at Gadat												
01-10 days	-	25439	6663	2008	21	-	-	-	-	-	-	-
11-20 days	-	888	242	1444	3	-	-	-	-	-	-	-
R - days	-	437	913	1941	1	-	-	-	-	-	-	-
Monthly	-	2974	869	599	3	-	-	-	-	163	-	-
Vaitarna at Durvesh												
01-10 days	3	28366	51528	15179	578	62	15	0	0	2	3	0
11-20 days	6	2196	9045	14119	209	40	2	0	1	2	0	0
R - days	1646	13675	8234	9930	77	26	0	2	5	1	1	0
Monthly	184	4915	7645	4359	96	14	2	0	1	163	0	0

Source: Suspended Sediment and Bedmaterial Data Book (2007 to 2008) Mahi, Sabarmati & Other Basins.

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

XII Basin : Mahi and Sabarmati

Unit : Tonnes per day

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2008-2009												
Mahi at Mataji												
01-10 days	0	869	119	1145	5	0	0	0	0	0	0	0
11-20 days	0	82	243	1395	0	0	0	0	0	0	0	0
R - days	0	658	4	41	0	0	0	0	0	0	0	0
Monthly	0	179	41	287	1	0	0	0	0	163	0	0
Mahi at Paderdibadi												
01-10 days	0	0	13	5	1	0	0	0	0	0	0	0
11-20 days	2	560	49	4	1	0	0	0	0	0	0	0
R - days	1	591	17	3	0	0	0	0	0	0	0	0
Monthly	0	128	9	1	0	0	0	0	0	163	0	0
Mahi at Khanpur												

Contd/…

01-10 days	18	22	67	48	22	15	17	17	10	10	8	9
11-20 days	19	35	5159	370	23	14	18	12	8	9	6	9
R - days	18	846	62	35	18	14	19	10	10	6	7	7
Monthly	6	100	588	50	7	5	6	4	3	163	2	3
Banas at Kamalpur												
01-10 days	0	0	5485	0	0	0	0	0	0	0	0	0
11-20 days	0	0	904	0	0	0	0	0	0	0	0	0
R - days	0	0	0	0	0	0	0	0	0	0	0	0
Monthly	0	0	710	0	0	0	0	0	0	163	0	0
Bhadar at Ganod												
01-10 days	0	29	16	0	352	0	0	0	0	0	0	7
11-20 days	0	0	12	45308	54	0	0	0	0	0	0	0
R - days	0	3901	26	184	0	0	0	0	0	0	0	0
Monthly	0	437	6	5055	45	0	0	0	0	163	0	1
Shetrunji at Lowara												
01-10 days	0	22235	60	12	999	1	0	0	0	0	0	0
11-20 days	0	0	7359	245585	122	0	0	0	0	0	0	0
R - days	0	19958	49	3379	4	0	0	0	0	0	0	0
Monthly	0	4688	830	27664	125	0	0	0	0	163	0	0
Derol Bridge at Sabarmati												
01-10 days	0	0	0	0	0	0	0	0	0	0	0	0
11-20 days	0	0	2	0	0	0	0	0	0	0	0	0
R - days	0	0	9	0	0	0	0	0	0	0	0	0
Monthly	0	0	1	0	0	0	0	0	0	163	0	0

Contd/…

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

XII Basin : Mahi and Sabarmati

Unit : Tonnes per day

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2008-2009												
Purna at Mahuwa												
01-10 days	0	206	667	4050	409	4	2	0	1	0	0	0
11-20 days	0	352	4561	20762	62	7	1	0	0	0	0	0
R - days	0	416	153	1441	20	2	0	0	0	0	0	0
Monthly	0	108	598	2917	55	1	0	0	0	163	0	0
Ambika at Gadat												
01-10 days	-	822	5368	2432	866	-	-	-	-	-	-	-
11-20 days	-	334	19479	24512	141	-	-	-	-	-	-	-
R - days	-	164	1533	2713	129	-	-	-	-	-	-	-
Monthly	-	147	2931	3295	126	-	-	-	-	163	-	-
Vaitarna at Durvesh												
01-10 days	0	15596	26255	1514	551	85	2	0	1	6	0	0
11-20 days	98	4826	71566	32959	343	26	0	1	4	1	1	1
R - days	141	17389	849	8722	162	7	0	1	3	2	0	0
Monthly	27	4201	10963	4799	117	13	0	0	1	163	0	0

Source: Suspended Sediment and Bedmaterial Data Book (2008 to 2009) Mahi, Sabarmati & Other Basins.

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

XII Basin : Mahi and Sabarmati *Unit : Tonnes per day*

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2009-2010												
Mahi at Mataji												
01-10 days	0	841	116	8692	204	0	0	0	0	0	0	0
11-20 days	0	309	50	28	0	0	0	0	0	0	0	0
R - days	0	199592	1151	2	0	0	0	0	0	0	0	0
Monthly	0	22305	146	969	23	0	0	0	0	163	0	0
Mahi at Paderdibadi												
01-10 days	0	0	3	303	1	0	0	1	0	0	0	0
11-20 days	0	23	2	19	2	0	0	0	0	0	0	0
R - days	0	36	161	2	1	0	1	0	0	0	0	0
Monthly	0	7	18	36	0	0	0	0	0	163	0	0
Mahi at Khanpur												
01-10 days	7	27	2	16	1	1	1	1	1	1	1	1
11-20 days	7	21	1	7	1	2	1	1	1	1	1	1
R - days	4	6	63	1	1	1	1	1	1	1	1	1
Monthly	2	6	7	3	0	0	0	0	0	163	0	0
Banas at Kamalpur												
01-10 days	0	0	0	0	16	0	9	0	0	0	0	0
11-20 days	0	135	0	42	47	7	19	0	0	0	0	0
R - days	0	4	0	31	3	71	12	0	0	0	0	0
Monthly	0	15	0	8	7	9	4	0	0	163	0	0

Contd/…

Bhadar at Ganod												
01-10 days	0	0	32	51	0	0	0	0	0	0	0	0
11-20 days	0	599	1	0	0	0	0	0	0	0	0	0
R - days	0	3830	1	0	0	0	6	0	0	0	0	0
Monthly	0	492	4	6	0	0	1	0	0	163	0	0
Shetrunji at Lowara												
01-10 days	0	48	1	21	0	0	0	0	0	0	0	0
11-20 days	0	45645	0	0	0	0	0	0	0	0	0	0
R - days	0	13	0	0	0	0	0	0	0	0	0	0
Monthly	0	5078	0	2	0	0	0	0	0	163	0	0

Table 10 : Ten daily and monthly average Sediment Load by site and river basin

XII Basin : Mahi and Sabarmati *Unit : Tonnes per day*

Site / Period	June	July	August	September	October	November	December	January	Feburary	March	April	May
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Year : 2009-2010												
Derol Bridge at Sabarmati												
01-10 days	0	0	0	0	0	0	0	0	0	0	0	0
11-20 days	0	3	0	0	0	0	0	0	0	0	0	0
R - days	0	0	13	0	0	0	0	0	0	0	0	0
Monthly	0	0	1	0	0	0	0	0	0	163	0	0
Purna at Mahuwa												
01-10 days	0	1	26	1232	18	0	0	0	0	0	0	0
11-20 days	0	164	9	126	3	0	0	0	0	0	0	0
R - days	0	3607	315	18	1	0	0	0	0	0	0	0
Monthly	0	419	39	153	2	0	0	0	0	163	0	0
Ambika at Gadat												

Contd/…

01-10 days	0	0	790	3733	89	0	0	0	0	0	0	0
11-20 days	0	0	90	486	0	0	0	0	0	0	0	0
R - days	0	10118	1026	0	0	0	0	0	0	0	0	0
Monthly	0	1124	212	469	10	0	0	0	0	0	0	0
Vaitarna at Durvesh												
01-10 days	0	441	517	1815	6140	111	18	0	0	0	0	0
11-20 days	0	13409	1245	821	425	108	10	0	0	0	0	0
R - days	0	36457	1451	640	266	37	2	0	0	0	0	0
Monthly	0	5590	357	364	759	28	3	0	0	163	0	0

Source: Suspended Sediment and Bedmaterial Data Book (2009 to 2010) Mahi, Sabarmati & Other Basins.

Table 11 : Tolerance limits of selected water quality paremeters for inland surface water by its use

Basin : Mahanadi, Subarnarekha, Burhabalang & Baitarni, Barhamani & Baitarni, Rushikuluya and Vamsadhara

Sl. No.	Constituent	Unit	Designated use classes of Inland Surface Water				
			A	B	C	D	E
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
1	pH Value		6.5 to 8.5	6.5 to 8.5	6.5 to 8.5	6.5 to 8.5	6.5 to 8.5
2	Dissolved Oxygen (DO)	mg/l(min.)	6	5	4	4	
3	Biochemical Oxygen Demand (BOD)	mg/l(max.)	2	3	3	-	-
4	Total Coliform organisms	MPN/100 ml.max.	50	500	5000	-	-
5	Total Dissolved Solides	mg/l(max.)	50	-	1500	-	2100
6	Chloride (Cl^-)	mg/l(max.)	250	-	600	-	600
7	Sodium Absorption Ratio,max. (SAR)	-	-	-	-	-	26
8	Sulphate (SO_4)	mg/l(max.)	400	-	400	-	1000
9	Electric Conductivity at 25^oC	micromho/cm/max.	-	-	-	1000×10^{-4}	2250×10^{-4}
10	Percentage sodium, max	-	-	-	-	-	60
11	Boron (as B), mg/l, max.	-	-	-	-	-	2

Source : Water Quality Year Book

Note : Class A refers drinking water without conventional treatement but after disinfection,

Class B refers outdoor bathing,

Class C refers drinking water with conventional treatment followed by disinfection; and

Class D refers culture and wild life propagation.

Class E refers irrigation, Industrial cooling, controlled waste disposal.

Table 11 : Tolerance limits of selected water quality paremeters for inland surface water by its use

Basin : Godavari

Sl. No.	Constituent	Unit	Designated use classes of Inland Surface Water				
			A	B	C	D	E
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
1	**pH**						
2	**EC at 25^0C**	uS/cm, Max	6.5 - 8.5	6.5 - 8.5	6.5 - 8.5	6.5 - 8.5	6.0 - 8.5
3	**DO**	mg/L, Min	-	-	-	1000	2250
4	**BOD**	mg/L Max	6	5	4	4	-
5	**Total Coliform Organisms**	MPN/100 ml, Max	2	3	3	-	-
6	**Colour**	Hazen units, Max	50*	500*	5000*	-	-
7	**Odour**		Unobjectionable	300	300	-	-
8	**Taste**		Testeless	-	-	-	-
9	**Total dissolved solids**	mg/L Max	500	-	1500	-	2100
10	**Total hardness**	as CaCO, mg/L, Max	300	-	-	-	-
11	**Calcium hardness**	as CaCO, mg/L, Max	200	-	-	-	-
12	**Mangensium**	as CaCO, mg/L, Max	100	-	-	-	-
13	**Iron**	as Cl, mg/L, Max	0.3	-	50	-	-
14	**Chioride**	as F, mg/L, Max	250	-	600	-	600
15	**Fluoride**	as SO, mg/L, Max	1.5	1.5	1.5	-	-
16	**Sulphate**	as NO, mg/L, Max	400	-	400	-	1000
17	**Nitrate**	as N, mg/L, Max	20	-	50	-	-
18	**Free Ammonia**	as As, mg/L, Max	-	-	-	1.2	-
19	**Arsenic**	as B, mg/L, Max	0.05	0.2	0.2	-	-
20	**Boron**	as Cd, mg/L, Max	-	-	-	-	2
21	**Cadmium**	as Cr^{6+}, mg/L, Max	0.01	-	0.01	-	-
22	**Chromium**	as Cu, mg/L, Max	0.05	0.05	0.05	-	-
23	**Copper**	as CN, mg/L, Max	1.5	-	1.50	-	-
24	**Cyanide**	as Pb, mg/L, Max	0.05	0.05	0.05	-	-
25	**Lead**	as Mn, mg/L, Max	0.1	-	0.10	-	-
26	**Manganese**	as Hg, mg/L, Max	0.5	-	-	-	-
27	**Mercury**	as Zn, mg/L, Max	0.001	-	-	-	-
28	**Zinc**	as Mn, mg/L, Max	15	-	15	-	-
29	**Pesticides**		Absent	-	Absent	-	-
30	**Free carbon dioxide**	as CO_2, mg/L, Max	-	-	-	6	-
31	**Phenolic compound**	as C_6H_5OH, mg/L, Max	0.002	0.005	0.005	-	-
32	**Sodium percent**	Max	-	-	-	-	60
33	**SAR**	Max	-	-	-	-	26

Source : Water Quality Year Book for the period of 2009-2010 (Godavari Basin).

Note :

A - Drinking Water source without conventional treatiment but after disinfections.

B - Out door bathing organised.

C - Drinking Water source with conventional treatment followed by disinfections.

D - Propagation of wildlife, fisheries.

E - Irrigation, Industrial cooling, Controlled waste disposal.

* If the coliform count is more than the prescribed tolerance limit, the criteria for coliforms shall be satisfied if not more than 20% of samples show more than the tolerance limit specified and not more than 5% samples show than 4 times the tolerance limit. Further, the faecal coliform should not be more then 40% of the total coliform.

Table 11 : Tolerance limits of selected water quality paremeters for inland surface water by its use

Basin : Krishna, Cauvery, East Flowing Rivers from Mahanadi to Kanyakumari & West Flowing Rivers from Kanyakumari to Tapi

Sl. No.	Constituent	Unit	Designated use classes of Inland Surface Water				
			A	B	C	D	E
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
1	pH		6.5-8.5	6.5-8.6	6.5-8.7	6.5-8.8	6.0-8.5
2	Electrical Conductivity at 25°C	micromhos/cm, (max.)	-	-	-	1000	2250
3	Calcium (Ca^{++})	miligram/litre (max.)	80	-	-	-	-
4	Magnesium (Mg^{++})	miligram/litre (max.)	24	-	-	-	-
5	Iron (Fe^{+++})	miligram/litre (max.)	0.3	-	50	-	-
6	Free Ammonia (NH_4^+)	miligram/litre (max.)	-	-	-	1.2	
7	Chloride (Cl^-)	miligram/litre (max.)	250	-	600	-	600
8	Fluoride (F^-)	miligram/litre (max.)	1.5	1.5	1.5	-	-
9	Sulphate (SO_4^{--})	miligram/litre (max.)	400	-	400	-	1000
10	Nitrate (NO_3^-)	miligram/litre (max.)	20	-	50	-	-
11	Dissolved Oxygen (DO)	miligram/litre (max.)	6	5	4	4	-
12	Biochemical Oxygen Demand (BOD)	miligram/litre (max.)	2	3	3	-	-
13	Total Coliform	Most Probable Number(MPN)/100 ml	50*	500*	*5000**	-	-
14	Arsenic (As)	miligram/litre (max.)	0.05	0.2	0.2	-	-
15	Boron (B)	miligram/litre (max.)	-	-	-	-	2
16	Cadmium (Cd)	miligram/litre (max.)	0.01	-	-	-	-
17	Chromium (Cr)	miligram/litre (max.)	0.05	0.05	0.05	-	-
18	Copper (Cu)	miligram/litre (max.)	1.5	-	1.5	-	-
19	Cyanide (CN)	miligram/litre (max.)	0.05	0.05	0.05	-	-
20	Lead (Pb)	miligram/litre (max.)	0.1	-	0.1	-	-
21	Manganese (Mn)	miligram/litre (max.)	0.5	-	-	-	-
22	Mercury (Hg)	miligram/litre (max.)	0.001	-		-	-
23	Zinc (Zn)	miligram/litre (max.)	15	-	15	-	-
24	Total Hardness (As $CaCO_3$)	miligram/litre (max.)	300	-	-	-	-
25	Sodium Percentage (SP)	maximum	-	-	-	-	60
26	Sodium Adsorption Ratio (SAR)	maximum	-	-	-	-	26

Source : Water Quality Year Book.

Note :

A : Drinking water source without conventional treatment but after disinfection.

B : Outdoor bathing.

C : Drinking water source with conventional treatment followed by disinfection.

D : Propagation of wildlife, fisheries.

E : Irrigation, industrial cooling, Controlled waste disposal.

* : If the coliform count is more than the prescribed tolerance limit, the criteria for coliform shall be satisfied if not more than 20 % of samples show more than the tolerance limit specified and not more than 5 % samples show more than 4 times the tolerance limit. Further,the faecal coliform should not be more than 40% of the total coliform.

Table 11 : Tolerance limits of selected water quality paremeters for inland surface water by its use

Basin : Narmada

Sl. No.	Constituent	Designated use classes of Inland Surface Water				
		A*	B*	C*	D*	E*
(1)	(2)	(3)	(4)	(5)	(6)	(7)
1	**pH Value**	6.5-8.5	6.5-8.5	6.5-8.5	6.5-8.5	6.0-8.5
2	**Conductivity at 25°C u mbos/cm(max)**	-	-	-	1000	2250
3	**Colour, Hazen units, Max**	10	300	300	-	-
4	**Dissolved Oxygen, mg/l, Min.(DO)**	6	5	4	4	-
5	**Biochemical Oxygen Demand (BOD)**	2	3	3	-	-
6	**Total Dissolved Solids, mg/l, Max**	500	-	1500	-	2100
7	**Total Hardness as ($CaCO_3$) mg/l, max**	300	-	-	-	-
8	**Calcium Hardness as (CaCO3) mg/l, max**	200	-	-	-	-
9	**Magnesium as (CaCO3) mg/l, max**	100	-	-	-	-
10	**Iron (as Fe), mg/l, max**	0.3	-	5	-	-
11	**Coper (as Cu), mg/l, max**	1.5	-	1.5	-	-
12	**Chloride (as Cl), mg/l, max**	250	-	600	-	600
13	**Fluoride (as F), mg/l, max**	1.5	1.5	1.5	-	-
14	**Sulphate (as SO_4), mg/l, max**	400	-	400	-	1000
15	**Nitrate (as NO_3) mg/l, max**	20	-	50	-	-
16	**Free Ammonia**	-	-	-	1.2	-
17	**Chrmium (as Cr), mg/l, max**	0.05	0.05	0.05	-	-
18	**Boron (B) mg/l, Max**	-	-	-	-	2
19	**Sodium Percentage Max**	-	-	-	-	60
20	**Sodium Absorption Ratio (SAR) Max**	-	-	-	-	26

Source : Water Quality Year Book for the year 2009-2010.
Note : * For use Classes A to E refer table below.

Sl.No.	Class of Stream	Designated best use
1	Class A	Drinking water without conventional treatement but after disinfection.
2	Class B	Outdoor bathing (Organised)
3	Class C	Drinking water with conventional treatment followed by disinfection; and
4	Class D	Culture and wild life propagation.
5	Class E	Irrigation, Industrial cooling, controlled waste disposal.

Table 11 : Tolerance limits of selected water quality paremeters for inland surface water by its use

Basin : Mahi, Sabarmati, Tapi & Other West Flowing River

Sl. No.	Substance or Characteristics	For drinking water (IS 10500 : 1991)			For fish culture (IS 13891 :1994)	For swimming pools (IS 3328 :1993)	For Irrigation water (IS 11624 : 1986)
		Desirable limit	Undesirable effects outside the desirable limit	Permissible limit in the absence of alternate source			
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
1	Colour, Hazen units	5	Above 5, consumer acceptance decreases	25	-	10	-
2	Odour	Unobjec-tionable	-	-	-	Odourless	-
3	Taste	Agreeable	-	-	-	Palatable	-
4	Temperature ^{o} C, range	-	-	-	2 to 35		-
5	Turbidity, NTU (max.)	5	Above 5, consumer acceptance decreases	10	10	10	-
6	pH Value	6.5 to 8.5	Beyond this range the water will affect the mucous membrane and/or water supply system	No relaxation	6.5 to 8.5	7.5 to 8.5	-
7	Total Hardness ($CaCO_3$) mg/l(max.)	300	Encrustation in water supply structure and adverse effects on domestic use	600	-	-	-
8	Iron (Fe^{+++}) mg/l(max.)	0.3	Beyond this limit taste/appearance are affect has adverse effect on domestic uses and water supply structure, and promotes iron bacteria	1.0	2.0 Total Iron (as Fe)	0.1	-
9	Chloride (Cl^{-}) mg/l(max.)	250	Beyond this limit taste, corrosion and palatabiliy are affect	1000		500	-
10	Fluoride (F^{-}) mg/l (max.)	1.0	Fluoride may be kept as low as possible. High fluoride may cause Fluorosis	1.5	-	-	-

(Contd.)

Table 11 : Tolerance limits of selected water quality paremeters for inland surface water by its use

Basin : Mahi, Sabarmati, Tapi & Other West Flowing River

Sl. No.	Substance or Characteristics	For drinking water (IS 10500 : 1991)			For fish culture (IS 13891 :1994)	For swimming pools (IS 3328 :1993)	For Irrigation water (IS 11624 : 1986)
		Desirable limit	Undesirable effects outside the desirable limit	Permissible limit in the absence of alternate source			
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
11	Dissolved Oxygen (DO) mg/l(max.)	500	Beyond this palatabiliy decreases and may cause gastro intestinal limitation are affect	2000	-	1500	-
12	Specific conductivity at 25°C, umhos (max)	-	-	-	1500×10^{-6}	-	6000 umhos/cm
13	Calcium (Ca^{++}) mg/l(max.)	75	Encrustation in water supply structure and adverse effects on domestic use	200	-	-	-
14	Magnesium (Mg^{++}) mg/l(max.)	30	Encrustation in water supply structure and adverse effects on domestic use	100	-	-	-
15	Sulphate (SO_4) mg/l(max.)	200	Beyond this causes gastro intentinal limitation when magnesium or sodium are present	400	-	-	-
16	Nitrate (NO_3) mg/l(max.)	45	Beyond this methaemoglobinema takes place	100	2.0 (as N)	-	-
17	Free Ammonia (NH_4^+) mg/l(max.)	-	-	-	1.5	-	-
18	Alkalinity, mg/l(max.)	200	Beyond this limit taste, becames unpleasant	600	100 to 300 as Ca CO_3 mg/l	50 to 500 Total alkalinity as Ca CO_3 mg/l, max	-
19	Aluminium (as Al) mg/l(max.)	0.03	Cumulative effect is reported to cause dementia	0.2	-	0.1	-
20	Boron mg/l(max.)	1.0	-	5.0	-	-	4.0
21	Dissolved Oxygen (DO) mg/l(max.)	-	-	-	4.0	-	-
22	Sodium Absorption Ratio (SAR)						26.0
23	Residual Sodium Carbonate (RSC)						6.0
24	Pesticides, mg/l max	Absent	Toxic	0.0001	Absent	-	-

Source : Water Quality Year Book.

Table 12 : Critical Absolute Values of Water Quality Parameters Crossing Tolerance Limits by Season

I Basin : Mahanadi

Sl. No.	Site Name	Summer March to June		Monsoon July to Oct.		Winter Nov. to Feb.	
		Value	Date	Value	Date	Value	Date
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
	Year : 2009-2010						
1	**Baronda**			DO = 5.0	01.10.2009		
2	**Ranjim**			DO = 4.8	01.09.2009	DO = 5.0	.03.11.2009
						DO = 3.5	01.01.2010
						BOD = 6.0	01.01.2010
3	**Basantpur**					DO = 4.5	06.01.2009
						DO = 5.0	07.01.2009
						DO = 5.0	04.01.2010
						DO = 4.7	05.01.2010
4	**Pathardih**					BOD = 3.0	08.01.2009
5	**Simga**					pH = 8.6	02.01.2010
						BOD = 2.2	07.01.2009
						BOD = 2.5	09.01.2009
						BOD = 2.6	03.02.2010
						DO = 4.5	06.01.2009
						DO = 5.0	10.01.2009
						DO = 1.4	03.02.2010
6	**Andhiarkore**					BOD = 2.7	07.01.2009
						BOD = 3.5	08.01.2009
						DO = 5.0	07.01.2009
						DO = 4.0	08.01.2009
						DO = 5.0	10.01.2009
						DO = 5.2	01.01.2010
7	**Ghatora**	DO = 5.3	11.03.2009			BOD = 3.7	08.01.2009
						BOD = 2.2	09.01.2009
						BOD = 2.2	10.01.2009
						DO = 4.2	08.01.2009
						DO = 3.5	10.01.2009
8	**Jondhra**			DO = 5.4	01.09.2009	pH = 8.6	01.01.2010
						BOD = 2.3	01.08.2009
						BOD = 2.8	01.01.2010
9	**Rampur**					BOD = 2.7	01.01.2010
10	**Bamnidhi**	BOD = 2.8	01.04.2010	DO = 5.9	01.10.2009		
		DO = 4.0	01.04.2010				
		DO = 4.6	01.05.2010				
11	**Sundergarh**					DO = 5.8	03.02.2010
12	**Salebhata**					BOD = 2.3	08.01.2009
13	**Kantamal**					DO = 5.0	06.01.2009
						DO = 5.7	05.01.2010

Source: Water Quality Data Book (June, 2009 to May, 2010) Mahanadi Basin.

Table 12 : Critical Absolute Values of Water Quality Parameters Crossing Tolerance Limits by Season

II Basin : Subernarekha, Baitarani & Burhabalang

Sl. No.	Site Name	Summer March to June		Monsoon July to Oct.		Winter Nov. to Feb.	
		Value	Date	Value	Date	Value	Date
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
	Year : 2009-2010						
I	**Basin : Subernarekha**						
1	**Muri**	pH = 8.6	01.06.2009			DO = 5.9	01.12.2009
		pH = 8.7	01.05.2010				
		DO = 5.9	01.04.2010				
2	**Adityapur**	BOD = 20.0	02.03.2010			BOD = 2.2	01.01.2010
		BOD = 20.0	01.04.2010				
		BOD = 20.0	01.05.2010				
3	**Jamshedpur**	BOD = 2.2	01.06.2009	BOD = 2.8	01.08.2009	BOD = 2.8	03.11.2009
		BOD = 2.8	01.07.2009	BOD = 2.8	01.09.2009	BOD = 3.0	01.12.2009
		BOD = 2.7	01.03.2010	DO = 4.8	01.07.2009	BOD =2.8	01.01.2010
		DO = 5.4	01.06.2009			BOD = 2.6	01.02.2010
		DO = 0.0	01.05.2010			DO = 5.5	01.01.2010
4	**Ghatshila**	pH = 8.6	01.05.2010			BOD = 2.4	01.02.2010
						BOD = 2.6	01.12.2009
5	**Ghatshila Road Bridge**	DO = 5.8	01.06.2009	BOD = 2.4	01.07.2009	BOD = 2.8	01.12.2009
						BOD = 4.0	01.02.2010
6	**Baridhi Nala**	BOD = 40.0	01.06.2009	BOD = 3.0	01.07.2009	BOD = 140.0	01.12.2009
		BOD = 61.0	01.04.2010	BOD = 40.0	01.08.2009	BOD = 20.0	03.11.2009
		BOD = 20.0	01.05.2010	BOD = 21.0	01.09.2009	BOD = 140.0	01.12.2009
		DO = 0.0	01.04.2010	BOD = 61.0	01.10.2009	BOD = 59.0	01.01.2010
		DO = 0.0	01.05.2010	DO = 3.0	01.07.2009	BOD = 21.0	01.02.2010
				DO = 0.0	01.08.2009	BOD =61.0	02.03.2010
				DO = 0.0	01.09.2009	DO = 3.2	03.11.2009
				DO = 0.0	01.10.2009	DO = 0.0	01.12.2009
						DO = 0.0	01.01.2010
						DO = 0.0	01.02.2010
						DO = 0.0	02.03.2010
7	**Kulpatanga**	BOD = 20.0	01.04.2010	BOD = 2.6	01.07.2009	BOD = 2.8	01.02.2010
		BOD = 20.0	01.05.2010	BOD = 2.6	01.08.2009	BOD = 20.0	02.03.2010
		DO = 4.6	01.06.2009	DO = 5.6	01.07.2009	DO = 5.9	01.01.2010
		DO = 0.0	02.03.2010				
		DO = 0.0	01.04.2010				
		DO = 0.0	01.05.2010				
II	**Basin : Baitarani**						
1	**Anandpur**	pH = 8.6	01.05.2010				
III	**Basin : Budhabalang**						
		<---------- No site reported critical absolute values ---------->					

Source: Water Quality Data Book (June, 2009 to May, 2010) Subernarekha, Baitarani & Budhabalang Basin.

Table 12 : Critical Absolute Values of Water Quality Parameters Crossing Tolerance Limits by Season

III Basin : Brahamani

Sl. No.	Site Name	Summer March to June		Monsoon July to Oct.		Winter Nov. to Feb.	
		Value	Date	Value	Date	Value	Date
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
	Year : 2009-2010						
1	**Tilga**	pH = 6.4	01.04.2010				
2	**Panposh**	BOD = 2.7	02.03.2010			BOD = 2.2	01.12.2009
3	**Gomlai**	DO = 5.8	01.06.2009			BOD = 2.4	01.12.2009
						BOD = 193.0	01.02.2010
4	**Nandira**	BOD = 3.3	02.03.2010	BOD = 2.7	01.07.2009	BOD = 2.8	01.10.2009
		BOD = 2.6	01.04.2010			BOD = 3.2	01.12.2009
						BOD = 2.6	01.01.2010
						BOD = 2.6	01.02.2010
5	**Kamalanga**					BOD = 2.2	01.02.2010
6	**RSP Nalla**	DO = 4.2	01.06.2009	BOD = 2.2	01.08.2009	BOD = 2.8	01.12.2009
		DO = 5.5	01.04.2010	BOD = 2.8	01.10.2009	DO = 4.4	01.10.2009
		DO = 3.5	01.05.2010	DO = 3.4	01.07.2009		
				DO = 5.8	01.08.2009		
				DO = 4.8	01.09.2009		

Source: Water Quality Data Book (June, 2009 to May, 2010) Brahamani Basin.

Table 12 : Critical Absolute Values of Water Quality Parameters Crossing Tolerance Limits by Season

IV Basin : Rushikulya, Vamsadhara, Sarda & Nagavali

Sl. No.	Site Name	Summer March to June		Monsoon July to Oct.		Winter Nov. to Feb.	
		Value	Date	Value	Date	Value	Date
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
	Year : 2009-2010	<---------- No site reported critical absolute values ---------->					

Source: Water Quality Data Book (June, 2009 to May,2010) Rushikulya, Vamsadhara, Sarda & Nagavali.

Table 12 : Critical Absolute Values of Water Quality Parameters Crossing Tolerance Limits by Season

V Basin : Godavari

Sl. No.	Site Name	Summer March to June		Monsoon July to Oct.		Winter Nov. to Feb.	
		Value	Date	Value	Date	Value	Date
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
	Year : 2009-2010						
1	**Polavaram**	DO = 5.8	01.06.2009	DO = 4.6	01.07.2009		
				DO = 5.2	01.08.2009		
2	**Bhadrachalam**	DO = 5.5	01.06.2009	DO = 5.0	01.07.2009		
		DO = 5.2	01.05.2010	DO = 5.4	01.08.2009		
				DO = 5.7	01.10.2009		
3	**Konta**	DO = 5.3	01.06.2009				
		DO = 5.3	01.07.2009				
4	**Perur**	DO = 4.6	01.07.2009	DO = 5.0	01.09.2009		
		DO = 5.7	01.04.2010				
5	**Pathagudem**	DO = 4.6	01.07.2009				
6	**Jagdalpur**	DO = 5.2	01.06.2009	DO = 5.6	01.08.2009		
		DO = 5.7	01.07.2009	DO = 5.9	01.10.2009		
		DO = 5.5	01.03.2010				
		DO = 5.8	01.05.2010				
7	**Bhatpalli**	BOD = 4.3	01.06.2009	BOD = 2.2	03.08.2009	BOD = 2.2	01.01.2010
		BOD = 3.2	01.07.2009			BOD = 2.2	01.02.2010
		BOD = 2.4	03.05.2010				
8	**Bamini**	BOD = 2.6	02.03.2010	BOD = 2.1	03.08.2009	BOD = 70.0	03.11.2009
		BOD = 35.0	05.04.2010	BOD = 2.6	05.10.2009	BOD = 30.0	01.12.2009
		BOD = 85.0	03.05.2010	DO = 5.7	03.08.2009	BOD = 20.0	01.01.2010
		DO = 5.5	01.06.2009	DO = 5.8	01.09.2009	BOD = 25.0	01.02.2010
		DO = 5.7	01.07.2009	DO = 5.8	05.10.2010	DO = 0.0	03.11.2009
		DO = 0.7	05.04.2010			DO = 2.1	01.12.2009
		DO = 2.8	03.05.2010			DO = 4.1	01.01.2010
						DO = 1.7	01.02.2010
9	**P.G.Bridge**			BOD = 2.1	01.07.2009	BOD = 2.1	01.12.2009
				BOD = 2.4	03.08.2009		
				BOD = 2.4	01.09.2009		
10	**Nandgaon**	BOD = 2.4	02.03.2010	BOD = 2.7	01.09.2009	BOD = 30.0	03.11.2009
				BOD = 2.5	05.10.2009	BOD = 25.0	01.12.2009
				DO = 5.6	01.09.2009	BOD = 3.2	01.01.2010
						DO = 4.4	03.11.2009
						DO = 4.5	01.12.2009
						DO = 5.4	01.01.2010

Contd/…

Table 12 : Critical Absolute Values of Water Quality Parameters Crossing Tolerance Limits by Season

V Basin : Godavari

Sl. No.	Site Name	Summer March to June		Monsoon July to Oct.		Winter Nov. to Feb.	
		Value	Date	Value	Date	Value	Date
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
	Year : 2009-2010						
11	**Hivra**			BOD = 9.0	01.07.2009		
				BOD = 2.5	03.08.2009		
				DO = 2.6	01.07.2009		
12	**Pauni**	BOD = 5.0	01.06.2009	BOD = 7.2	01.07.2009	BOD = 2.4	01.12.2009
		BOD = 3.7	02.03.2010	BOD = 2.1	01.09.2009	BOD = 2.1	01.01.2010
		BOD = 6.0	05.04.2010	DO = 4.0	01.07.2009	BOD = 2.5	01.02.2010
		BOD = 3.8	03.05.2010				
		DO = 4.7	01.06.2009				
		DO = 5.3	03.05.2010				
13	**Satarpur**			BOD = 11.4	01.07.2009	BOD = 2.3	05.10.2009
				DO = 3.5	01.07.2009	BOD = 2.8	01.12.2009
14	**Mancherial**	DO = 5.1	01.06.2009	DO = 3.5	01.07.2009	DO = 5.4	01.02.2010
				DO = 5.8	01.09.2009		
15	**Saigaon**			DO = 5.6	01.09.2009		
				DO = 5.8	01.10.2009		

Source: Water Quality Data Book (June, 2009 to May, 2010) Godavari Basin.

Table 12 : Critical Absolute Values of Water Quality Parameters Crossing Tolerance Limits by Season

VI Basin : Krishna

Sl. No.	Site Name	Summer March to June		Monsoon July to Oct.		Winter Nov. to Feb.	
		Value	Date	Value	Date	Value	Date
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
	Year : 2009-2010						
1	**Vijayawada**			DO = 5.3	01.10.2009		
2	**Keesara**	DO = 4.9	01.06.2009	DO = 5.2	01.10.2009	DO = 5.7	01.12.2009
		pH = 8.6	01.06.2009				
3	**Paleeru Bridge**	BOD = 2.8	01.04.2010	DO = 1.3	01.08.2009	DO = 5.4	01.12.2009
		BOD = 2.2	01.05.2010	BOD = 2.6	01.09.2009	DO = 4.6	01.01.2010
		DO = 3.5	01.06.2009	DO = 4.0	01.07.2009	DO = 5.1	01.02.2010
		DO = 5.3	01.03.2010	DO = 4.6	01.09.2009		
		DO = 5.6	01.05.2010	DO = 4.9	01.10.2010		
4	**Wadenapally**	pH = 8.9	01.05.2010	pH = 8.6	01.07.2009		
		DO = 5.0	01.06.2009	pH = 5.8	01.08.2009		
5	**Dameracherla**	pH = 8.6	01.06.2009	pH = 8.7	01.07.2009	DO = 5.6	01.02.2010
		pH = 8.6	01.05.2010	DO = 4.6	01.07.2009		
				DO = 5.7	01.10.2009		
6	**Halia**	pH =8.6	01.05.2010	DO = 5.7	01.10.2009	DO = 5.5	01.01.2010
		DO = 5.3	01.05.2010				
		DO = 5.8	01.04.2010				
7	**Bawapuram**	pH = 9.2	01.05.2010	BOD = 5.9	01.09.2009	pH = 8.7	03.11.2009
		pH = 8.8	01.03.2010	DO = 5.8	01.07.2009	pH = 8.8	01.12.2009
		pH = 8.7	01.04.2010			pH = 8.8	01.02.2010
		BOD = 3.9	01.06.2009				
		BOD = 3.2	01.04.2010				
		BOD = 2.1	01.05.2010				
		DO = 5.4	01.04.2010				
		DO = 5.6	01.05.2010				
8	**T.Ramapuram**			Cl = 362.6	01.07.2009		
				DO = 5.6	01.09.2009		
9	**Hoovinahole**					Cl = 252.8	03.11.2009
10	**Holehonnur**	DO = 5.1	01.06.2009	DO = 5.2	01.07.2009	DO = 4.9	01.01.2010
		DO = 5.3	01.03.2010	DO = 5.6	03.08.2009		
		DO = 5.8	05.04.2010				
11	**Yadgir**			DO = 5.6	01.10.2009	pH = 8.6	01.12.2009
						BOD = 2.1	01.11.2009
						BOD = 2.8	01.12.2009
12	**Malkhed**	DO = 4.3	01.06.2009	DO = 5.2	01.10.2009		
13	**Cholachguda**					Cl = 282.0	01.12.2009
14	**Kurundwad**			DO = 5.1	05.10.2009		
15	**Karad**	BOD = 3.2	01.06.2009	BOD = 2.3	03.08.2009	BOD = 3.2	01.12.2009
				BOD = 2.8	01.09.2009		

Source: Water Quality Data Book (June, 2009 to May, 2010) Krishna Basin.

Table 12 : Critical Absolute Values of Water Quality Parameters Crossing Tolerance Limits by Season

VII Basin : Cauvery

Sl. No.	Site Name	Summer March to June		Monsoon July to Oct.		Winter Nov. to Feb.	
		Value	Date	Value	Date	Value	Date
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
	Year : 2009-2010						
1	**Musiri**	BOD=2.7	01.06.2009	pH=8.5	01.07.2009		
				BPD=2.6	01.08.2009		
2	**Thengudi**			BOD=3.5	17.08.2009		
3	**Elunuthimangalam**	pH=8.6	01.06.2009	pH=8.6	01.07.2008	pH=8.7	01.02.2010
		pH=8.8	15.06.2009	pH=8.6	15.07.2009	BOD=4.6	01.02.2010
		pH=8.8	01.03.2010	pH=8.7	17.08.2009		
		pH=9.1	01.04.2010	pH=8.5	15.09.2009		
		pH=8.6	01.05.2010				
		BOD=3.0	01.04.2010				
		BOD=3.9	01.05.2010				
4	**Kodumudi**			BOD=2.4	01.09.2009	BOD=2.1	01.02.2009
5	**Thengumarahada**	BOD=3.0	01.06.2010	DO = 5.8	01.09.2009	DO = 5.9	03.11.2009
6	**Kudlur**			BOD=2.1	01.08.2009		
7	**Billigundulu**	DO=4.5	01.06.2009	pH=8.6	01.07.2009		
8	**T.Bekuppe**	BOD = 4.6	01.06.2009	BOD=2.2	03.08.2009	DO = 2.0	03.11.2009
				DO =2.2	03.08.2009	DO=4.3	01.01.2010
				BOD=4.1	01.09.2009	DO=3.1	01.02.2010
				BOD=3.0	01.10.2009	BOD=5.0	01.12.2009
9	**T.K.Halli**	DO=4.3	01.03.2010	BOD=2.5	02.07.2009	DO=5.8	01.11.2009
		DO=4.1	05.04.2010	DO=5.0	01.09.2009	DO=5.7	01.01.2010
		DO=4.3	01.05.2010				
10	**Kollegal**	DO = 4.8	01.06.2009	DO = 5.6	03.08.2009	DO=5.8	03.11.2009
				DO=5.2	01.09.2009		
11	**T. Narsipur**	pH=8.6	01.07.2009				
		DO=5.3	01.06.2009	DO=5.6	01.07.2009		
		DO=5.6	05.04.2010	DO=5.2	02.09.2009		
		DO=5.8	01.05.2010				
12	**Akkihebbal**	BOD=2.6	01.06.2009	BOD=2.8	01.07.2009	DO=5.4	01.02.2010
		DO=4.7	01.06.2009	BOD=5.0	01.07.2009		
		DO=5.3	01.03.2010				
		DO=4.5	05.04.2010				
		DO=4.6	01.05.2010				
13	**M.H. Halli**	DO=5.4	01.03.2010	DO = 4.8	01.06.2009		
14	**Kudige**	DO=5.6	01.03.2010	BOD=2.2	03.07.2009	BOD=3.1	05.11.2009
		DO=5.8	01.05.2010	BOD=2.3	03.09.2009		

Source: Water Quality Data Book (June, 2009 to May, 2010) Cauvery Basin.

Table 12 : Critical Absolute Values of Water Quality Parameters Crossing Tolerance Limits by Season

VIII Basin : East Flowing Rivers from Mahanadi to Kanyakumari

Sl. No.	Site Name	Summer March to June		Monsoon July to Oct.		Winter Nov. to Feb.	
		Value	Date	Value	Date	Value	Date
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
	Year : 2009-2010						
1	**Marella**	DO = 5.7	01.03.2009				
2	**Chennur**			pH=8.5	01.09.2009		
3	**Alladupalli**			DO=5.5	01.09.2009		
				DO=5.7	01.10.2009		
4	**Vazhavachanur**	BOD = 3.3	03.06.2009				
5	**Gummanur**	BOD = 4.9	01.06.2009	pH=8.7	01.07.2009		
		DO=5.3	01.06.2009	pH=8.9	01.08.2009		
				BOD=2.0	01.07.2009		
				BOD=4.1	01.08.2009		
				DO=4.7	01.07.2009		
6	**Theni**			DO = 5.7	01.08.2009		
7	**Murappandu**			DO = 5.9	01.10.2009	BOD=2.6	01.01.2010
				DO = 5.9	03.11.2009		

Source: Water Quality Data Book (June, 2009 to May, 2010) East Flowing Rivers from Mahanadi to Kanyakumari .

Table 12 : Critical Absolute Values of Water Quality Parameters Crossing Tolerance Limits by Season

IX Basin : West Flowing Rivers from Kanyakumari to Tapi

Sl. No.	Site Name	Summer March to June		Monsoon July to Oct.		Winter Nov. to Feb.	
		Value	Date	Value	Date	Value	Date
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
	Year : 2009-2010						
1	**Badlapur**	DO=5.5	01.06.2009	BOD=2.2	01.07.2009	BOD=2.1	01.02.2010
		DO=5.0	02.03.2010	DO=3.8	03.08.2009	DO=4.9	01.12.2009
				DO=4.2	05.10.2009	DO=5.4	01.01.2010
2	**Mangoan**			BOD=2.0	01.07.2009		
				DO=5.7	05.10.2009		
3	**Beln Bridge**					pH=8.5	01.02.20010

Source: Water Quality Data Book (June, 2009 to May, 2010) West Flowing Rivers from Kanyakumari to Tapi.

Table 12 : Critical Absolute Values of Water Quality Parameters Crossing Tolerance Limits by Season

X Basin : Tapi

Sl. No.	Site Name	Summer March to June		Monsoon July to Oct.		Winter Nov. to Feb.	
		Value	Date	Value	Date	Value	Date
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
	Year : 2009-2010						
1	Burhanpur	BOD-=2.8	01.06.2009				
		BOD=3.7	01.04.2010				
		BOD=2.3	01.05.2010				
		DO=5.4	02.03.2010				
		DO=2.3	01.05.2010				
		DO=10.2	01.04.2010				
2	Gopalkheda	pH=8.7	01.04.2010	BOD=2.7	01.09.2009	pH=9.2	01.02.2010
		BOD=19.0	02.03.2010	BOD=2.0	01.10.2009	BOD=3.2	03.11.2009
		BOD=4.0	01.04.2010				
		DO=5.6	01.04.2010				
3	Sarangkheda			BOD=4.5	01.09.2009		

Source: Water Quality Data Book (June, 2009 to May, 2010) Tapi Basin.

Table 12 : Critical Absolute Values of Water Quality Parameters Crossing Tolerance Limits by Season

XI Basin : Narmada

Sl. No.	Site Name	Summer March to June		Monsoon July to Oct.		Winter Nov. to Feb.	
		Value	Date	Value	Date	Value	Date
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
	Year : 2009-2010						
1	Chandwada			BOD = 2.4	01.10.2009		
2	Garudeshwar	pH = 8.6	01.04.2010				
3	Pati					pH = 9.3 DO = 7.3	01.02.2010 17.02.2009
4	Dhulsar					pH = 9.1	01.12.2009
5	Mandleshwar	BOD = 2.1	01.06.2009	BOD = 2.6	01.07.2009		
6	Kogaon			BOD = 2.2	01.07.2009		
7	Handia	pH = 8.6	05.04.2010	BOD = 3.0	05.10.2009	BOD = 3.0	03.11.2009
8	Chhidgaon			BOD = 2.4	03.08.2009		
9	Hoshangabad			BOD = 2.4	03.08.2009		
10	Sandia			TDS =1953	03.08.2009		
11	Gadarwara					BOD = 2.3 BOD =2.2	01.12.2009 01.01.2010
12	Barman	BOD = 2.5	03.05.2010	BOD = 2.5	03.08.2009	BOD = 2.2	01.02.2010
13	Patan	BOD = 2.3	01.06.2009	BOD = 2.3	05.10.2009		
14	Manot	DO = 5.5 DO = 5.5 DO = 5.3	08.03.2009 10.05.2009 05.03.2010			BOD = 2.3 BOD = 2.5 DO = 5.8 DO = 5.0 DO = 4.7 DO = 5.5	06.01.2009 07.01.2009 06.01.2009 07.01.2009 09.01.2009 10.05.2010

Source: Water Quality Data Book (June, 2009 to May, 2010) Narmada Basin.

Table 12 : Critical Absolute Values of Water Quality Parameters Crossing Tolerance Limits by Season

XII Basin : Mahi and Sabarmati

Sl. No.	Site Name	Summer March to June		Monsoon July to Oct.		Winter Nov. to Feb.	
		Value	Date	Value	Date	Value	Date
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
	Year : 2009-2010						
1	**Mataji**			Ph=8.5	01.08.2009		
				BOD=2.1	01.08.2009		
2	**Rangeli**			BOD=2.3	01.10.2009		
				DO=5.8	01.08.2009		
3	**Padeerdibadi**	BOD=2.3	02.03.2010	BOD=2.9	01.10.2009		
				BOD=2.0	01.09.2009		
4	**Khanpur**	BOD=2.2	01.04.2010	DO=5.0	01.07.2009	BOD=2.3	01.01.2010
		BOD=2.8	01.05.2010	BOD=2.1	01.10.2009		
		DO=5.2	01.06.2009				
		DO=5.1	02.03.2010				
5	**Derol Bridge**			pH=8.5	01.08.2009		
				BOD=2.5	01.08.2009		
6	**Vautha**	BOD=28.0	01.06.2009	BOD=22.0	01.07.2009	BOD=11.0	03.11.2009
		BOD=25.0	02.03.2010	BOD=18.0	01.08.2009	BOD=14.0	01.12.2009
		BOD=30.0	01.04.2010	BOD=10.0	01.09.2009	BOD=11.0	01.01.2010
		BOD=20.0	01.05.2010	BOD=7.0	01.10.2009	BOD=17.0	01.02.2010
		DO=*5.7	01.04.2010				
		DO=*5.2	01.05.2010				
7	**Luwara**			BOD=3.3	01.10.2009		
8	**Chitrasani**			BOD=2.6	01.08.2009		
9	**Kamal Pur**					pH=8.5	01.02.2010
10	**Mahuwa**			pH=8.6	01.10.2009	Ph=8.5	01.02.2010
				DO=4.2	01.10.2009		
11	**Durvesh**			DO=5.8	01.08.2010	BOD=2.0	01.02.2010
		DO=5.5	01.04.2009				
12	**Pingalwada**	BOD=8.0	01.06.2009	BOD=22.0	01.07.2009	BOD=11.0	01.11.2009
		BOD=27.0	02.03.2010	BOD=31.0	01.08.2009	BOD=12.0	01.12.2009
		BOD=12.0	01.04.2010	BOD=4.8	01.09.2009	BOD=3.0	01.01.2010
		BOD=43.0	01.05.2010	BOD=10.0	01.10.2009	BOD=8.0	01.02.2010
		DO=*4.0	01.06.2009	DO=*3.5	01.07.2009	DO=*3.5	01.11.2009
		DO=*5.7	02.03.2010	DO=*3.0	01.08.2009	DO=*4.0	01.02.2010
		DO=*5.6	01.04.2010	DO=*4.0	01.10.2009		
		DO=*4.3	01.05.2010				
13	**Motinaroli**	BOD=2.5	01.04.2010	BOD=4.0	01.07.2009	BOD=8.0	01.12.2009
		DO=5.0	01.03.2010	BOD=2.4	01.09.2009		
		DO=5.1	01.05.2010				

Source: Water Quality Data Book (June, 2009 to May, 2010) Mahi and Sabarmati.

Note : * : After Dilution.

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

I Basin : Mahanadi

Sl. No.	Site Name	Name of the River/ Stream	Years	Q (Cumecs)		Temperature °C		pH_GEN		Sp.Conductance		Potassium (K)		Sodium (Na)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
1	Baronda	Pairi	2007-2008	-	-	18.0	29.0	7.3	8.1	-	-	0.8	2.7	11.3	21.4
			2008-2009	-	-	20.0	28.5	7.4	8.7	-	-	0.1	3.2	1.0	24.1
			2009-2010	0.000	685.4	20.0	29.0	7.7	8.2	-	-	0.6	2.4	1.8	9.3
2	Rajim	Pairi	2007-2008	-	-	16.0	30.0	7.2	7.8	-	-	0.9	3.8	2.1	26.5
			2008-2009	-	-	15.0	27.0	7.4	8.6	-	-	0.7	10.0	1.6	25.4
			2009-2010	0.000	2257.0	17.0	28.5	7.2	8.1	-	-	0.8	8.2	2.5	9.2
3	Seorinaryan	Pairi	2007-2008												
			2008-2009					<---------- Data not available ---------->							
			2009-2010												
4	Basantpur	Pairi	2007-2008	-	-	14.5	30.0	6.9	8.7	-	-	0.6	3.7	3.3	14.4
			2008-2009	-	-	15.0	31.0	7.1	8.4	-	-	1.3	3.8	4.2	13.6
			2009-2010	2.630	16117.0	14.5	28.0	7.0	7.9	-	-	1.7	6.5	6.0	28.6
5	Kotni	Seonath	2007-2008												
			2008-2009					<---------- Data not available ---------->							
			2009-2010												
6	Pathardih	Seonath	2007-2008	-	-	21.0	30.0	7.1	8.4	-	-	1.8	10.4	13.4	50.5
			2008-2009	-	-	15.0	29.0	7.4	8.2	-	-	2.7	10.9	6.9	51.4
			2009-2010	0.000	646.2	25.0	28.0	7.8	8.1	-	-	2.2	5.5	11.5	27.6
7	Simga	Seonath	2007-2008	-	-	18.0	32.0	7.2	8.4	-	-	1.8	7.7	12.1	39.2
			2008-2009	-	-	16.0	33.0	7.3	8.5	-	-	2.9	9.1	9.4	56.4
			2009-2010	0.000	3039.0	18.0	31.0	7.7	8.6	-	-	2.1	14.8	6.8	66.0
8	Andhiyarkore	Seonath	2007-2008	-	-	17.0	30.0	7.5	8.1	-	-	1.7	4.3	23.2	66.0
			2008-2009	-	-	16.0	29.0	7.3	8.3	-	-	2.9	7.7	9.9	110.0
			2009-2010	0.000	38.23	11.5	28.5	7.8	8.0	-	-	1.2	6.5	4.6	36.1
9	Ghatora	Seonath	2007-2008	-	-	18.0	28.0	7.1	8.2	-	-	0.5	6.8	12.2	30.0
			2008-2009	-	-	17.0	30.0	7.3	8.2	-	-	1.1	8.1	5.2	51.9
			2009-2010	0.000	111.6	23.0	31.0	7.5	8.2	-	-	1.9	4.0	5.8	15.0
10	Jondhra	Seonath	2007-2008	-	-	18.0	31.5	7.3	31.5	-	-	1.0	7.2	11.2	56.2
			2008-2009	-	-	18.5	30.0	7.3	8.8	-	-	0.4	6.0	3.0	36.4
			2009-2010	0.000	3056.0	21.0	29.5	7.6	8.6	-	-	2.3	4.5	3.6	18.1

Contd/…

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

I Basin : Mahanadi

Sl. No.	Site Name	Name of the River/ Stream	Years	Q (Cumecs)		Temperature °C		pH_GEN		Sp.Conductance		Potassium (K)		Sodium (Na)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
11	Rampur	Jonk	2007-2008	-	-	15.5	30.0	7.1	9.6	-	-	0.6	1.9	2.2	18.4
			2008-2009	-	-	19.7	30.0	7.2	7.8	-	-	0.3	1.5	6.4	17.5
			2009-2010	0.000	1000.0	16.5	30.0	7.6	8.2	-	-	1.1	1.9	3.1	9.6
12	Manendragarh	Hasdeo	2007-2008	-	-	10.0	29.5	7.3	8.4	-	-	0.7	2.7	11.0	18.1
			2008-2009	-	-	12.0	23.0	7.3	7.8	-	-	1.2	2.7	4.5	9.0
			2009-2010	0.000	112.9	15.0	28.0	7.5	8.5	-	-	1.1	2.4	2.2	8.7
13	Bamnidhi	Hasdeo	2007-2008	-	-	16.0	29.0	7.2	8.2	-	-	1.1	3.3	3.0	11.5
			2008-2009	-	-	17.0	28.5	7.2	8.2	-	-	0.7	3.6	2.0	16.6
			2009-2010	1.884	346.7	14.5	29.5	7.3	8.2	-	-	1.7	5.8	6.0	25.9
14	Kurubhata	Mond	2007-2008	-	-	15.5	31.5	7.3	8.2	-	-	0.5	3.0	11.3	17.3
			2008-2009	-	-	20.8	32.5	7.6	8.4	-	-	0.7	3.8	2.6	8.6
			2009-2010	0.000	649.5	17.8	31.5	7.6	8.2	-	-	0.8	4.7	3.2	15.2
15	Sundergarh	Ib	2007-2008	-	-	18.3	28.5	7.4	8.3	-	-	0.7	2.1	11.5	17.9
			2008-2009	-	-	18.0	27.5	7.2	8.2	-	-	0.5	3.0	4.5	14.2
			2009-2010	0.000	1575.0	17.5	30.2	7.6	8.1	-	-	0.5	2.3	2.6	30.8
16	Salebhata	Ong	2007-2008	-	-	19.2	32.4	7.7	8.3	-	-	0.9	6.8	10.0	33.8
			2008-2009	-	-	20.0	27.5	7.6	8.4	-	-	0.5	1.9	8.3	25.9
			2009-2010	0.000	4331.0	16.0	27.5	7.8	8.3	-	-	0.8	3.9	3.9	48.6
17	Kesinga	Tel	2007-2008	-	-	18.0	32.5	7.8	8.8	-	-	1.0	2.2	12.3	18.8
			2008-2009	-	-	21.0	32.7	7.5	8.2	-	-	0.8	2.2	5.4	11.7
			2009-2010	6.175	4607.0	20.0	29.0	7.9	8.5	-	-	1.0	2.0	3.9	8.2
18	Kantamal	Tel	2007-2008	-	-	18.0	31.0	7.7	8.4	-	-	1.0	2.2	11.3	18.2
			2008-2009	-	-	20.0	30.5	7.7	8.6	-	-	0.2	2.7	1.0	10.0
			2009-2010	15.280	11798.0	22.0	30.0	7.8	8.4	-	-	1.0	3.1	2.9	27.8
19	Tikarapara	Maahanadi	2007-2008	-	-	17.5	32.0	7.7	8.3	-	-	0.6	3.2	6.5	15.2
			2008-2009	-	-	19.0	31.0	7.2	8.2	-	-	3.6	13.6	5.8	10.9
			2009-2010	-	-	20.0	30.0	7.3	8.5	-	-	1.2	2.4	3.8	15.0

Contd/…

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

I Basin : Mahanadi

Sl. No.	Site Name	Name of the River/ Stream	Years	Calcium (Ca)		Magnesium (Mg)		Aluminium		Iron (Fe)		Ammonia (NH3-N)		Carbonate (CO3)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)	(25)	(26)	(27)	(28)
1	Baronda	Pairi	2007-2008	4	14	1.5	8.9	-	-	0.0	0.1	-	-	0.0	0.0
			2008-2009	6	36	3.4	22.9	-	-	0.0	0.1	-	-	0.0	20.0
			2009-2010	4	9	1.9	4.9	-	-	0.0	0.0	-	-	0.0	0.0
2	Rajim	Pairi	2007-2008	3	22	0.6	20.4	-	-	0.0	0.1	-	-	0.0	0.0
			2008-2009	2	43	0.4	19.9	-	-	0.0	0.0	-	-	0.0	15.5
			2009-2010	5	22	2.9	15.1	-	-	0.0	0.0	-	-	0.0	0.0
3	Seorinaryan	Pairi	2007-2008												
			2008-2009	<---------- Data not available ---------->											
			2009-2010												
4	Basantpur	Pairi	2007-2008	9	14	0.8	11.8	-	-	0.0	0.1	-	-	0.0	0.0
			2008-2009	9	23	4.9	13.6	-	-	0.0	0.1	-	-	0.0	8.9
			2009-2010	14	26	7.3	14.1	-	-	0.0	0.1	-	-	0.0	0.0
5	Kotni	Seonath	2007-2008												
			2008-2009	<---------- Data not available ---------->											
			2009-2010												
6	Pathardih	Seonath	2007-2008	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A
			2008-2009	14	52	9.7	24.3	-	-	0.0	0.1	-	-	0.0	0.0
			2009-2010	14	34	9.7	19.4	-	-	0.0	0.1	-	-	0.0	0.0
7	Simga	Seonath	2007-2008	9	36	5.3	20.9	-	-	0.0	0.1	-	-	0.0	0.5
			2008-2009	18	49	7.8	20.4	-	-	0.0	0.1	-	-	0.0	17.7
			2009-2010	20	37	10.7	22.4	-	-	0.0	0.1	-	-	0.0	13.3
8	Andhiyarkore	Seonath	2007-2008	12	45	10.2	28.2	-	-	0.0	0.1	-	-	0.0	0.0
			2008-2009	14	46	6.8	28.2	-	-	0.0	0.1	-	-	0.0	8.9
			2009-2010	2	49	1.8	29.7	-	-	0.0	0.1	-	-	0.0	0.0
9	Ghatora	Seonath	2007-2008	9	34	6.8	19.9	-	-	0.0	0.0	-	-	0.0	0.0
			2008-2009	10	63	4.4	32.6	-	-	0.0	0.1	-	-	0.0	0.0
			2009-2010	10	41	10.7	19.0	-	-	0.0	0.1	-	-	0.0	0.0
10	Jondhra	Seonath	2007-2008	8	36	6.8	21.4	-	-	0.0	0.4	-	-	0.0	15.5
			2008-2009	10	35	3.9	21.4	-	-	0.0	0.1	-	-	0.0	26.6
			2009-2010	15	31	9.7	30.6	-	-	0.0	0.1	-	-	0.0	26.6

Contd/

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

I Basin : Mahanadi

Sl. No.	Site Name	Name of the River/ Stream	Years	Calcium (Ca)		Magnesium (Mg)		Aluminium		Iron (Fe)		Ammonia (NH3-N)		Carbonate (CO3)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)	(25)	(26)	(27)	(28)
11	Rampur	Jonk	2007-2008	3	22	2.9	16.0	-	-	0.0	0.1	-	-	0.0	0.0
			2008-2009	7	21	4.9	13.6	-	-	0.0	0.0	-	-	0.0	0.0
			2009-2010	6	22	4.9	15.1	-	-	0.0	0.0	-	-	0.0	0.0
12	Manendragarh	Hasdeo	2007-2008	5	14	1.0	6.8	-	-	0.0	0.1	-	-	0.0	11.1
			2008-2009	11	14	5.3	6.9	-	-	0.0	0.0	-	-	0.0	0.0
			2009-2010	11	17	5.3	9.2	-	-	0.0	0.0	-	-	0.0	19.9
13	Bamnidhi	Hasdeo	2007-2008	6	15	1.9	16.0	-	-	0.0	0.1	-	-	0.0	0.0
			2008-2009	9	24	4.4	10.2	-	-	0.0	0.1	-	-	0.0	0.0
			2009-2010	11	23	7.3	14.6	-	-	0.0	0.0	-	-	0.0	0.0
14	Kurubhata	Mond	2007-2008	6	23	1.5	21.9	-	-	0.0	0.2	-	-	0.0	0.0
			2008-2009	3	31	2.0	23.8	-	-	0.0	0.1	-	-	0.0	8.9
			2009-2010	5	12	1.9	6.3	-	-	0.0	0.1	-	-	0.0	0.0
15	Sundergarh	Ib	2007-2008	6	22	2.9	21.9	-	-	0.0	0.1	-	-	0.0	8.9
			2008-2009	2	41	1.5	18.5	-	-	0.0	0.1	-	-	0.0	0.0
			2009-2010	3	32	2.9	10.7	-	-	0.0	0.0	-	-	0.0	0.0
16	Salebhata	Ong	2007-2008	9	31	5.3	17.1	-	-	0.0	0.1	-	-	0.0	0.0
			2008-2009	19	32	8.8	19.9	-	-	0.0	0.1	-	-	0.0	11.1
			2009-2010	14	29	8.3	17.0	-	-	0.0	0.1	-	-	0.0	13.3
17	Kesinga	Tel	2007-2008	4	18	3.4	9.2	-	-	0.0	0.1	-	-	0.0	20.0
			2008-2009	5	34	2.0	19.4	-	-	0.0	0.0	-	-	0.0	0.0
			2009-2010	12	21	6.8	10.7	-	-	0.0	0.0	-	-	0.0	22.1
18	Kantamal	Tel	2007-2008	6	22	4.9	21.4	-	-	0.0	0.2	-	-	0.0	8.9
			2008-2009	6	38	0.5	22.4	-	-	0.0	0.0	-	-	0.0	19.9
			2009-2010	7	20	4.9	12.6	-	-	0.0	0.1	-	-	0.0	17.7
19	Tikarapara	Maahanadi	2007-2008	5	25	2.4	13.5	-	-	0.1	0.4	-	-	0.0	0.0
			2008-2009	6	27	3.6	13.6	-	-	0.1	0.4	-	-	0.0	0.0
			2009-2010	13	24	2.9	11.7	-	-	0.0	0.2	-	-	0.0	14.4

Contd/

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

I Basin : Mahanadi

Sl. No.	Site Name	Name of the River/ Stream	Years	Bicarbonate (HCO3)		Chloride (CL)		Fluoride (F)		Sulphate (SO4)		Sulphite		Nitrate (NO3-N)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(29)	(30)	(31)	(32)	(33)	(34)	(35)	(36)	(37)	(38)	(39)	(40)
1	Baronda	Pairi	2007-2008	24	131	2.8	37.8	0.05	0.25	12.0	19.0	-	-	0.04	0.34
			2008-2009	35	310	1.0	14.3	0.05	0.18	6.0	40.0	-	-	0.10	1.30
			2009-2010	27	56	2.6	6.0	0.05	0.16	5.0	26.0	-	-	-	-
2	Rajim	Pairi	2007-2008	23	122	0.5	43.7	0.05	0.56	1.8	17.5	-	-	0.01	0.65
			2008-2009	29	235	0.9	31.7	0.10	0.70	5.4	25.8	-	-	0.05	1.00
			2009-2010	24	137	1.9	13.9	0.05	0.30	6.0	26.0	-	-	-	-
3	Seorinaryan	Pairi	2007-2008												
			2008-2009	<---------- Data not available ---------->											
			2009-2010												
4	Basantpur	Pairi	2007-2008	56	119	6.2	26.3	0.08	0.18	5.0	26.0	-	-	0.02	1.03
			2008-2009	12	119	5.9	22.6	0.06	0.25	2.0	31.8	-	-	0.10	1.18
			2009-2010	70	137	6.3	23.3	0.08	0.26	14.0	24.0	-	-	-	-
5	Kotni	Seonath	2007-2008												
			2008-2009	<---------- Data not available ---------->											
			2009-2010												
6	Pathardih	Seonath	2007-2008	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A
			2008-2009	104	239	11.7	78.6	0.11	0.20	7.4	37.0	-	-	0.25	2.00
			2009-2010	86	198	10.2	27.8	0.12	0.27	12.0	20.0	-	-	-	-
7	Simga	Seonath	2007-2008	21	205	9.4	64.8	0.10	0.30	10.0	24.0	-	-	0.06	0.75
			2008-2009	81	200	15.4	79.5	0.07	0.21	8.6	40.0	-	-	0.25	1.10
			2009-2010	103	220	13.2	53.9	0.08	0.38	16.0	36.0	-	-	-	-
8	Andhiyarkore	Seonath	2007-2008	108	297	12.9	87.8	0.14	0.50	15.0	74.0	-	-	0.05	0.90
			2008-2009	80	347	17.0	171.0	0.05	0.48	12.4	64.0	-	-	0.22	1.60
			2009-2010	23	317	10.9	48.1	0.14	1.10	11.4	76.0	-	-	-	-
9	Ghatora	Seonath	2007-2008	21	205	3.7	54.1	0.06	0.40	10.0	22.4	-	-	0.06	0.22
			2008-2009	57	265	5.7	75.5	0.09	0.80	6.4	126.0	-	-	0.20	1.10
			2009-2010	86	214	9.4	14.2	0.14	0.29	13.0	80.0	-	-	-	-
10	Jondhra	Seonath	2007-2008	59	214	4.8	82.9	0.05	0.40	12.0	42.0	-	-	0.05	0.80
			2008-2009	65	205	5.7	58.6	0.05	0.25	4.5	52.8	-	-	0.16	0.88
			2009-2010	15	115	8.8	15.1	0.05	0.32	12.0	31.0	-	-	-	-

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

I Basin : Mahanadi

Sl. No.	Site Name	Name of the River/ Stream	Years	Bicarbonate (HCO3)		Chloride (CL)		Fluoride (F)		Sulphate (SO4)		Sulphite		Nitrate (NO3-N)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(29)	(30)	(31)	(32)	(33)	(34)	(35)	(36)	(37)	(38)	(39)	(40)
11	Rampur	Jonk	2007-2008	23	140	3.7	27.1	0.05	0.20	2.0	20.0	-	-	0.01	0.5
			2008-2009	58	126	8.1	24.8	0.07	0.15	5.4	29.4	-	-	0.25	0.60
			2009-2010	26	137	5.9	10.1	0.07	0.18	7.0	23.0	-	-	-	-
12	Manendragarh	Hasdeo	2007-2008	29	74	3.3	24.3	0.0	11.1	5.0	32.0	-	-	0.05	0.27
			2008-2009	75	84	5.5	11.1	0.06	0.11	5.4	16.6	-	-	0.24	1.00
			2009-2010	23	95	3.7	10.1	0.05	0.24	13.0	60.0	-	-	-	-
13	Bamnidhi	Hasdeo	2007-2008	48	74	5.7	24.8	0.05	0.2	3.4	24.0	-	-	0.02	0.55
			2008-2009	49	97	7.8	35.5	0.05	0.23	7.4	20.3	-	-	0.12	3.75
			2009-2010	70	142	5.8	18.3	0.07	0.21	12.0	25.0	-	-	-	-
14	Kurubhata	Mond	2007-2008	25	212	5.0	67.0	0.05	0.25	4.0	17.0	-	-	0.06	1.10
			2008-2009	22	243	2.3	13.5	0.05	0.12	4.4	18.0	-	-	0.10	3.50
			2009-2010	29	68	2.3	9.2	0.05	1.20	7.0	15.0	-	-	-	-
15	Sundergarh	Ib	2007-2008	21	90	3.5	284.0	0.05	0.20	3.0	21.0	-	-	0.05	1.05
			2008-2009	22	241	1.6	20.4	0.05	0.17	5.4	15.0	-	-	0.10	2.00
			2009-2010	27	108	4.5	10.0	0.05	0.16	5.0	17.0	-	-	-	-
16	Salebhata	Ong	2007-2008	21	216	5.0	293.2	0.05	0.29	2.0	22.4	-	-	0.01	0.65
			2008-2009	117	186	7.2	32.3	0.07	0.28	7.4	31.2	-	-	0.15	1.80
			2009-2010	79	164	5.3	41.3	0.07	0.40	7.0	36.2	-	-	-	-
17	Kesinga	Tel	2007-2008	34	95	5.7	15.7	0.05	0.20	3.4	18.0	-	-	0.05	0.14
			2008-2009	23	204	7.8	15.8	0.05	0.60	6.0	20.8	-	-	0.15	1.80
			2009-2010	62	106	3.2	8.8	0.12	0.24	8.0	18.0	-	-	-	-
18	Kantamal	Tel	2007-2008	21	79	2.2	32.9	0.05	0.20	2.0	20.0	-	-	0.05	0.60
			2008-2009	18	90	3.3	34.8	0.05	0.20	4.4	22.0	-	-	0.10	2.00
			2009-2010	45	113	3.7	23.5	0.05	0.24	10.0	19.0	-	-	-	-
19	Tikarapara	Maahanadi	2007-2008	22	113	10.7	22.4	0.00	0.05	3.5	11.5	-	-	0.00	5.60
			2008-2009	33	113	9.8	15.7	0.05	0.05	4.2	13.2	-	-	0.21	1.37
			2009-2010	29	102	5.8	19.4	0.05	0.05	3.4	22.4	-	-	-	-

Contd/…

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

I Basin : Mahanadi

Sl. No.	Site Name	Name of the River/ Stream	Years	Nitrite (NO2-N)		Phosphate(pO4)		Silica (SiO2)		DO		BOD3-27		Total Coliform (no.per 10 ml)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(41)	(42)	(43)	(44)	(45)	(46)	(47)	(48)	(49)	(50)	(51)	(52)
1	Baronda	Pairi	2007-2008	0.01	0.01	-	-	4.1	28.0	4.3	8.8	0.6	3.5	-	-
			2008-2009	0.01	0.08	-	-	1.4	36.0	5.2	9.6	0.3	1.5	-	-
			2009-2010	0.00	0.01	-	-	22.0	38.0	5.0	8.2	0.6	1.7	-	-
2	Rajim	Pairi	2007-2008	0.00	0.12	-	-	2.4	23.0	4.4	10.4	0.6	6.0	-	-
			2008-2009	0.01	0.08	-	-	1.0	22.2	2.6	7.5	0.2	5.2	-	-
			2009-2010	0.01	0.02	-	-	8.8	21.4	3.5	7.8	0.2	6.0	-	-
3	Seorinaryan	Pairi	2007-2008												
			2008-2009	<---------- Data not available ---------->											
			2009-2010												
4	Basantpur	Pairi	2007-2008	0.01	0.03	-	-	13.0	29.0	5.0	10.8	0.4	2.9	-	-
			2008-2009	0.01	0.04	0.080	0.080	16.6	30.0	5.0	8.7	0.4	1.6	-	-
			2009-2010												
5	Kotni	Seonath	2007-2008	<---------- Data not available ---------->											
			2008-2009												
			2009-2010	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	Pathardih	Seonath	2007-2008	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A
			2008-2009	0.01	0.04	-	-	12.0	24.4	5.2	8.1	0.4	1.1	-	-
			2009-2010		0.01	0.05	-	-	18.0	28.4	6.0	9.6	1.0	3.0	-
7	Simga	Seonath	2007-2008	0.01	0.03	-	-	10.2	33.6	4.8	9.8	0.3	3.5	-	-
			2008-2009	0.01	0.03	0.098	0.098	11.2	44.2	4.5	7.8	0.2	1.4	-	-
			2009-2010	0.01	0.10	-	-	7.0	36.2	1.4	8.0	0.8	2.6	-	-
8	Andhiyarkore	Seonath	2007-2008	0.01	0.03	-	-	11.0	30.0	4.6	9.5	0.5	7.0	-	-
			2008-2009	0.01	0.09	-	-	16.8	36.0	3.9	6.3	0.4	1.2	-	-
			2009-2010	0.01	0.05	-	-	12.2	63.2	4.0	8.2	0.5	3.5	-	-
9	Ghatora	Seonath	2007-2008	0.01	0.01	-	-	5.4	26.0	5.0	8.0	0.6	2.9	-	-
			2008-2009	0.02	0.20	-	-	11.2	100.0	4.0	9.6	0.6	3.2	-	-
			2009-2010	0.03	0.04	-	-	18.0	31.0	3.5	6.6	1.8	3.7	-	-
10	Jondhra	Seonath	2007-2008	0.05	0.80	-	-	2.0	27.0	5.2	11.0	0.5	12.0	-	-
			2008-2009	0.01	0.04	-	-	11.4	40.0	2.9	9.6	0.3	2.4	-	-
			2009-2010	0.03	0.04	-	-	18.0	31.0	3.5	6.6	1.8	3.7	-	-

Contd/…

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

I Basin : Mahanadi

Sl. No.	Site Name	Name of the River/ Stream	Years	Nitrite (NO2-N)		Phosphate		Silica (SiO2)		DO		BOD3-27		Total Coliform (no.per 10 ml)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(41)	(42)	(43)	(44)	(45)	(46)	(47)	(48)	(49)	(50)	(51)	(52)
11	Rampur	Jonk	2007-2008	0.01	0.04	-	-	10.8	27.4	4.2	9.8	0.3	3.3	-	-
			2008-2009	0.01	0.03	-	-	16.0	28.6	5.7	7.5	0.3	2.3	-	-
			2009-2010	0.01	0.04	-	-	11.4	25.4	6.0	7.5	0.2	2.7	-	-
12	Manendragarh	Hasdeo	2007-2008	0.01	0.01	-	-	3.6	15.0	8.3	9.7	0.5	1.6	-	-
			2008-2009	0.01	0.04	-	-	8.0	18.2	6.9	8.4	0.3	1.3	-	-
			2009-2010	0.01	0.02	-	-	7.0	12.1	6.0	8.7	0.7	2.0	-	-
13	Bamnidhi	Hasdeo	2007-2008	0.01	0.01	-	-	8.4	26.0	4.0	10.3	0.3	3.9	-	-
			2008-2009	0.01	0.03	0.080	0.080	5.3	28.0	5.1	8.4	0.2	0.8	-	-
			2009-2010	0.01	0.03	-	-	10.8	23.6	4.0	8.7	0.2	2.8	-	-
14	Kurubhata	Mond	2007-2008	0.01	1.01	-	-	3.0	24.0	6.3	10.7	0.3	3.8	-	-
			2008-2009	0.01	0.01	-	-	0.1	42.0	4.8	8.7	0.2	1.5	-	-
			2009-2010	0.01	0.07	-	-	5.6	25.0	6.2	8.8	0.4	1.7	-	-
15	Sundergarh	Ib	2007-2008	0.01	0.01	-	-	5.0	22.8	4.1	11.0	0.3	3.6	-	-
			2008-2009	0.01	0.09	-	-	3.2	44.0	6.0	9.6	0.4	1.8	-	-
			2009-2010	0.01	0.02	-	-	2.0	29.0	5.8	7.6	0.3	1.7	-	-
16	Salebhata	Ong	2007-2008	0.01	0.04	-	-	4.4	28.0	4.9	11.3	0.3	8.5	-	-
			2008-2009	0.01	0.07	-	-	14.6	36.0	4.7	8.9	0.2	1.5	-	-
			2009-2010	0.01	0.05	-	-	2.0	30.4	6.2	8.3	0.5	2.3	-	-
17	Kesinga	Tel	2007-2008	0.01	0.01	-	-	6.8	13.2	5.6	9.7	0.6	1.2	-	-
			2008-2009	0.01	0.07	0.014	0.014	7.4	37.0	5.8	7.1	0.4	1.0	-	-
			2009-2010	0.01	0.04	-	-	9.0	29.0	6.5	9.1	0.5	1.2	-	-
18	Kantamal	Tel	2007-2008	0.01	0.03	-	-	5.4	28.0	5.5	10.2	0.3	0.9	-	-
			2008-2009	0.01	0.07	0.024	0.024	6.0	46.0	5.9	10.0	0.5	2.0	-	-
			2009-2010	0.01	0.03	-	-	6.0	21.6	5.0	8.2	0.5	1.7	-	-
19	Tikarapara	Maahanadi	2007-2008	0.00	0.11	-	-	8	14	6.1	8.0	0.7	1.0	-	-
			2008-2009	0.00	0.00	-	-	8	12	5.8	8.9	0.7	1.8	-	-
			2009-2010	0.25	2.58	-	-	7.0	11.0	6.6	8.3	1.0	2.0	-	-

Contd/…

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

I Basin : Mahanadi

Sl. No.	Site Name	Name of the River/ Stream	Years	Faecal Coliform (no.per 10 ml)		Total plate count (no.per 10 ml)		Phytoplankton (no.per ml)		Zooplankton (no.per litre)		Arsenic (ppm)		Boron (ppm)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(53)	(54)	(55)	(56)	(57)	(58)	(59)	(60)	(61)	(62)	(63)	(64)
1	Baronda	Pairi	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
2	Rajim	Pairi	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
3	Seorinaryan	Pairi	2007-2008												
			2008-2009	<---------- Data not available ---------->											
			2009-2010												
4	Basantpur	Pairi	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-		-	-	-	-	-	-	-	-	-	-
5	Kotni	Seonath	2007-2008												
			2008-2009	<---------- Data not available ---------->											
			2009-2010												
6	Pathardih	Seonath	2007-2008	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
7	Simga	Seonath	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
8	Andhiyarkore	Seonath	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
9	Ghatora	Seonath	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
10	Jondhra	Seonath	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/…

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

I Basin : Mahanadi

Sl. No.	Site Name	Name of the River/ Stream	Years	Faecal Coliform (no.per 10 ml)		Total plate count (no.per 10 ml)		Phytoplankton (no.per ml)		Zooplankton (no.per litre)		Arsenic (ppm)		Boron (ppm)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(53)	(54)	(55)	(56)	(57)	(58)	(59)	(60)	(61)	(62)	(63)	(64)
11	Rampur	Jonk	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
12	Manendragarh	Hasdeo	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
13	Bamnidhi	Hasdeo	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
14	Kurubhata	Mond	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
15	Sundergarh	Ib	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
16	Salebhata	Ong	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
17	Kesinga	Tel	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
18	Kantamal	Tel	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
19	Tikarapara	Maahanadi	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

I Basin : Mahanadi

Sl. No.	Site Name	Name of the River/ Stream	Years	Cadmium (ppm)		Chromium (ppm)		Copper (ppm)		Cyanide (ppm)		Lead (ppm)		Manganese (ppm)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(65)	(66)	(67)	(68)	(69)	(70)	(71)	(72)	(73)	(74)	(75)	(76)
1	Baronda	Pairi	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
2	Rajim	Pairi	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
3	Seorinaryan	Pairi	2007-2008												
			2008-2009	<---------- Data not available ---------->											
			2009-2010												
4	Basantpur	Pairi	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
5	Kotni	Seonath	2007-2008												
			2008-2009	<---------- Data not available ---------->											
			2009-2010												
6	Pathardih	Seonath	2007-2008	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
7	Simga	Seonath	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
8	Andhiyarkore	Seonath	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
9	Ghatora	Seonath	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
10	Jondhra	Seonath	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/…

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

I Basin : Mahanadi

Sl. No.	Site Name	Name of the River/ Stream	Years	Cadmium (ppm)		Chromium (ppm)		Copper (ppm)		Cyanide (ppm)		Lead (ppm)		Manganese (ppm)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(65)	(66)	(67)	(68)	(69)	(70)	(71)	(72)	(73)	(74)	(75)	(76)
11	Rampur	Jonk	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
12	Manendragarh	Hasdeo	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
13	Bamnidhi	Hasdeo	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
14	Kurubhata	Mond	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
15	Sundergarh	Ib	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
16	Salebhata	Ong	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
17	Kesinga	Tel	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
18	Kantamal	Tel	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
19	Tikarapara	Maahanadi	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/…

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

I Basin : Mahanadi

Sl. No.	Site Name	Name of the River/ Stream	Years	Mercury (ppm)		Zinc (ppm)		Total Hardness		Sodium % (Na%)		SAR		RSC	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(77)	(78)	(79)	(80)	(81)	(82)	(83)	(84)	(85)	(86)	(87)	(88)
1	Baronda	Pairi	2007-2008	-	-	-	-	24	60	35	62	0.8	1.7	0.0	0.9
			2008-2009	-	-	-	-	30	183	4	57	0.1	1.7	0.0	4.5
			2009-2010	-	-	-	-	18	42	11	42	0.1	0.8	0.0	0.1
2	Rajim	Pairi	2007-2008	-	-	-	-	18	129	10	37	0.2	1.2	0.0	0.4
			2008-2009	-	-	-	-	12	190	9	51	0.2	1.6	0.0	0.6
			2009-2010	-	-	-	-	24	117	8	29	0.2	0.5	0.0	0.0
3	Seorinaryan	Pairi	2007-2008												
			2008-2009	<---------- Data not available ---------->											
			2009-2010												
4	Basantpur	Pairi	2007-2008	-	-	-	-	39	81	12	34	0.2	0.8	0.0	0.6
			2008-2009	-	-	-	-	42	109	17	27	0.3	0.6	0.0	0.5
			2009-2010	-	-	-	-	71	113	11	36	0.3	1.2	0.0	0.2
5	Kotni	Seonath	2007-2008												
			2008-2009	<---------- Data not available ---------->											
			2009-2010												
6	Pathardih	Seonath	2007-2008	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A
			2008-2009	-	-	-	-	75	232	16	44	0.3	1.9	0.0	0.3
			2009-2010	-	-	-	-	74	165	16	30	0.4	0.9	0.0	0.0
7	Simga	Seonath	2007-2008	-	-	-	-	44	177	19	42	0.5	1.6	0.0	0.6
			2008-2009	-	-	-	-	81	185	16	47	0.5	2.0	0.0	0.6
			2009-2010	-	-	-	-	95	186	11	42	0.3	2.1	0.0	0.0
8	Andhiyarkore	Seonath	2007-2008	-	-	-	-	97	220	25	49	0.9	2.4	0.0	1.2
			2008-2009	-	-	-	-	63	220	19	62	0.5	3.3	0.0	1.4
			2009-2010	-	-	-	-	13	246	16	44	0.4	1.0	0.0	1.5
9	Ghatora	Seonath	2007-2008	-	-	-	-	60	167	24	31	0.6	1.0	0.0	0.1
			2008-2009	-	-	-	-	44	292	13	32	0.3	1.3	0.0	1.3
			2009-2010	-	-	-	-	71	179	10	15	0.3	0.5	0.3	0.5
10	Jondhra	Seonath	2007-2008	-	-	-	-	50	177	17	47	0.5	2.1	0.0	0.8
		-	2009-2010	-	-	-	-	44	177	12	31	0.2	1.2	0.0	0.6
			2009-2010	-	-	-	-	78	198	8	20	0.2	0.6	0.0	0.4

Contd/…

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

I Basin : Mahanadi

Sl. No.	Site Name	Name of the River/ Stream	Years	Mercury (ppm)		Zinc (ppm)		Total Hardness		Sodium % (Na%)		SAR		RSC	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(77)	(78)	(79)	(80)	(81)	(82)	(83)	(84)	(85)	(86)	(87)	(88)
11	Rampur	Jonk	2007-2008	-	-	-	-	20	117	12	29	0.2	0.8	0.0	0.6
			2008-2009	-	-	-	-	39	107	21	28	0.4	0.8	0.0	0.2
			2009-2010	-	-	-	-	36	119	14	19	0.2	0.4	0.0	0.4
12	Manendragarh	Hasdeo	2007-2008	-	-	-	-	16	60	29	58	0.7	1.2	0.0	0.2
			2008-2009					51	63	0.0	0.4	0.3	0.5	0.0	0.4
			2009-2010	-	-	-	-	52	80	8	21	0.1	0.5	0.0	0.0
13	Bamnidhi	Hasdeo	2007-2008	-	-	-	-	36	99	10	32	0.2	0.7	0.0	0.4
			2008-2009	-	-	-	-	42	103	9	34	0.1	0.9	0.0	0.4
			2009-2010	-	-	-	-	58	119	13	33	0.3	1.0	0.0	0.2
14	Kurubhata	Mond	2007-2008	-	-	-	-	20	148	15	57	0.4	1.3	0.0	0.5
			2008-2009	-	-	-	-	16	178	4	50	0.1	0.9	0.0	0.5
			2009-2010	-		-	-	20	56	14	45	0.2	1.1	0.0	0.2
15	Sundergarh	Ib	2007-2008	-	-	-	-	28	146	19	55	0.6	1.4	0.0	0.3
			2008-2009	-	-	-	-	12	180	5	49	0.1	0.9	0.0	0.4
			2009-2010	-	-	-	-	20	125	14	55	0.2	1.8	0.0	0.1
16	Salebhata	Ong	2007-2008	-	-	-	-	44	150	19	41	0.5	1.3	0.0	1.1
			2008-2009	-	-	-	-	85	164	10	34	0.3	1.1	0.0	0.4
			2009-2010	-	-	-	-	69	143	10	42	0.2	1.8	0.0	0.2
17	Kesinga	Tel	2007-2008	-	-	-	-	23	84	29	56	0.7	1.3	0.0	0.1
			2008-2009	-	-	-	-	20	166	7	35	0.2	0.6	0.0	0.5
			2009-2010	-	-	-	-	58	97	11	21	0.2	0.4	0.0	0.0
18	Kantamal	Tel	2007-2008	-	-	-	-	37	145	18	49	0.5	1.3	0.0	0.4
			2008-2009	-	-	-	-	28	188	4	29	0.1	0.5	0.0	0.4
			2009-2010	-	-	-	-	38	103	10	39	0.2	1.3	0.0	0.4
19	Tikarapara	Maahanadi	2007-2008	-	-	-	-	36	95	19	37	0.4	0.7	0.0	0.1
			2008-2009	-	-	-	-	36	109	15	32	0.3	0.6	0.0	0.0
			2009-2010	-	-	-	-	52	89	13	31	0.2	0.8	0.0	0.2

Source: Water Quality Year Book for the period of 2007-2008 to 2009-2010.

Note : 1. All the ionic concentrations are expressed in mg./lit. unless mentioned otherwise.

2. (-) indicate that analyis of a particular parameter has not been carried out.

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

II Basin : Subarnarekha, Burhabalang & Baitarni

Sl. No.	Site Name	Name of the River/ Stream	Years	Q (Cumecs)		Temperature °C		pH		Sp.Conductance		Potassium (K+)		Sodium (Na)	
					Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
a)	Basin : Subarnarekha														
1	Champua	Baitarani	2007-2008	-	-	17.0	28.0	7.0	8.1	-	-	0.2	2.2	5.8	8.5
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	18.0	30.0	7.5	7.8	-	-	0.9	2.5	3.2	9.7
2	Muri	Subarnarekha	2007-2008	-	-	14.5	35.0	7.8	9.1	-	-	1.6	11.0	12.0	24.8
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	18.5	29.5	7.7	8.7	-	-	1.9	9.5	11.2	120.0
3	Adityapur	Subarnarekha	2007-2008	-	-	10.0	32.0	7.7	8.9	-	-	1.4	8.2	8.1	20.2
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	14.0	31.5	7.4	8.4	-	-	0.7	20.0	6.0	98.9
4	Jamshedpur	Subarnarekha	2007-2008	-	-	15.0	33.0	7.3	8.3	-	-	1.8	4.3	10.2	28.5
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	18.0	32.0	7.2	8.2	-	-	1.0	10.3	6.0	48.6
5	Ghatsila	Subarnarekha	2007-2008	-	-	9.5	30.5	7.6	8.3	-	-	2.0	4.6	8.0	20.1
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	14.0	29.0	7.5	8.6	-	-	1.2	6.3	7.9	30.2
6	Fekoghat	Subarnarekha	2007-2008	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	Ghatsila Road Brd	Subarnarekha	2007-2008	-	-	9.5	30.5	7.6	8.5	-	-	1.1	8.5	7.8	24.0
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	11.5	29.0	7.6	8.5	-	-	1.2	6.1	11.1	33.9
8	Baridhinala	Subarnarekha	2007-2008	-	-	16.5	34.0	7.3	8.3	-	-	2.3	27.5	8.5	69.6
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	19.0	33.0	7.0	8.6	-	-	3.3	32.5	42.7	82.1
9	Kulpatanga	Subarnarekha	2007-2008	-	-	11.0	35.0	7.7	8.7	-	-	1.6	4.6	10.0	22.4
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	16.0	32.0	7.4	8.4	-	-	0.6	28.7	8.3	98.2
10	NH-Govindpur	Burhabalang	2007-2008	-	-	14.0	27.5	7.1	8.3	-	-	0.8	3.4	8.9	11.1
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	16.0	28.5	7.5	8.4	-	-	0.4	1.5	4.6	22.7
b)	Basin : Baitarni														
1	Anandpur	Baitarani	2007-2008	-	-	20.0	30.5	7.6	8.2	-	-	0.6	3.4	4.9	24.2
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	17.0	30.0	7.7	8.6	-	-	0.4	2.1	4.1	9.8

Contd/--

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

II Basin : Subarnarekha, Burhabalang & Baitarni

Sl. No.	Site Name	Name of the River/ Stream	Years	Calcium (Ca++)		Magnesium (Mg)		Aluminium (AL+++)		Ferric ion (Fe+++)		Ammonia(NH4)		Carbonate (CO3--)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)	(25)	(26)	(27)	(28)
a)	Basin : Subarnarekha														
1	Champua	Baitarani	2007-2008	6	16	1.5	5.8	18	122	0.0	0.0	-	-	0.0	0.0
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	6	13	2.9	6.8	-	-	0.0	0.0	-	-	0.0	0.0
2	Muri	Subarnarekha	2007-2008	15	93	5.0	13.6	-	-	0.0	0.2	-	-	0.0	2.9
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	14	63	4.9	31.6	-	-	0.1	0.3	-	-	0.0	19.2
3	Adityapur	Subarnarekha	2007-2008	17	80	5	21.6	-	-	0.0	0.2	0.05	0.05	0.0	0.0
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	16	104	3.9	34.0	-	-	0.1	0.3	-	-	0.0	19.2
4	Jamshedpur	Subarnarekha	2007-2008	16	46	5.2	12.8	-	-	0.1	0.3	0.05	0.05	0.0	0.0
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	14	104	6.8	58.3	-	-	0.1	0.4	0.43	9.52	0.0	0.0
5	Ghatsila	Subarnarekha	2007-2008	14	59	5.6	20.2	44	398	0.1	0.7	0.05	0.05	0.0	0.0
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	13	40	6.8	31.1	-	-	0.1	0.5	-	-	0.0	0.0
6	Fekoghat	Subarnarekha	2007-2008	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	Ghatsila Road Bridge	Subarnarekha	2007-2008	10	68	1.5	17.9	-	-	0.1	0.6	-	-	0.0	1.7
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	14	35	7.8	18.5	-	-	0.1	0.6	-	-	0.0	9.6
8	Baridhinala	Subarnarekha	2007-2008	18	120	6.8	57.6	-	-	0.1	3.9	0.05	0.05	0.0	0.0
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	34	125	10.7	28.2	-	-	0.1	0.4	-	-	0.0	9.6
9	Kulpatanga	Subarnarekha	2007-2008	5	79	1.9	11.9	-	-	0.0	0.6	0.05	0.05	0.0	3.6
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	13	99	7.8	39.8	-	-	0.1	0.6	-	-	0.0	19.2
10	NH-Govindpur	Burhabalang	2007-2008	10	25	4.1	5.8	-	-	0.1	0.1	-	-	0.0	0.0
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	8	19	5.8	17.5	-	-	0.0	0.2	-	-	0.0	7.0
1	Anandpur	Baitarani	2007-2008	9	38	1.9	9.5	25	118	0.0	0.2	0.05	0.05	0.0	0.0
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	8	21	3.9	8.8	20	67	0.1	0.2	0.38	1.19	0.0	4.8

Contd/---

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

II Basin : Subarnarekha, Burhabalang & Baitarni

Sl. No.	Site Name	Name of the River/ Stream	Years	Bicarbonate (HCO3--)		Chloride (CL-)		Fluoride (F-)		Sulphate (SO4-)		Sulphite (SO3)		Nitrate (NO3)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(29)	(30)	(31)	(32)	(33)	(34)	(35)	(36)	(37)	(38)	(39)	(40)
a)	Basin : Subarnarekha														
1	Champua	Baitarani	2007-2008	23	74	7.8	13.1	0.00	0.23	1.2	9.2	-	-	0.10	1.23
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	24	71	5.6	15.5	0.00	0.05	1.4	6.5	-	-	0.21	0.71
2	Muri	Subarnarekha	2007-2008	41	306	16.7	39.4	0.00	0.36	4.7	24.6	-	-	0.39	3.25
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	29	93	15.5	157.4	0.00	0.40	8.6	196.2	-	-	0.59	6.66
3	Adityapur	Subarnarekha	2007-2008	68	256	11.1	32.1	0.00	0.53	6.0	49.2	-	-	0.35	9.35
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	49	321	9.7	128.2	0.00	0.67	9.7	136.0	-	-	0.43	9.67
4	Jamshedpur	Subarnarekha	2007-2008	61	173	13.6	38.6	0.00	0.15	1.0	24.2	-	-	0.27	2.52
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	54	486	9.7	87.4	0.00	0.70	11.0	71.4	-	-	0.43	7.52
5	Ghatsila	Subarnarekha	2007-2008	48	248	11.6	29.3	0.00	1.39	8.5	38.1	-	-	0.64	2.35
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	24	132	11.7	40.9	0.00	1.42	12.9	57.8	-	-	0.52	4.44
6	Fekoghat	Subarnarekha	2007-2008	63	-	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	Ghatsila Road Bridge	Subarnarekha	2007-2008	-	22	10.6	39.8	0.00	0.53	8.0	36.7	-	-	0.53	4.18
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	15	-	15.5	46.4	0.04	0.47	13.7	54.0	-	-	0.57	6.66
8	Baridhinala	Subarnarekha	2007-2008	-	63	13.6	112.0	0.00	4.60	15.8	98.7	-	-	0.99	19.08
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	24	303	58.3	107.7	0.06	3.63	60.0	192.0	-	-	0.57	20.63

Contd/

9	Kulpatanga	Subarnarekha	2007-2008	-	15	13.6	32.7	0.00	1.14	4.7	15.8	-	-	0.39	7.45
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	49	329	13.6	128.2	0.19	0.89	13.7	128.0	-	-	0.43	14.71
10	NH-Govindpur	Burhabalang	2007-2008	47	89	11.7	15.5	0.00	0.05	3.7	22.2	-	-	0.22	0.67
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	49	107	7.8	31.6	0.00	0.13	3.1	20.1	-	-	0.21	0.57
b)	Basin : Baitarni														
1	Anandpur	Baitarani	2007-2008	31	144	6.7	31.8	0.00	0.19	0.9	12.5	-	-	0.13	4.18
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	24	71	7.8	17.5	0.00	0.09	4.6	13.2	-	-	0.38	1.19

Contd/---

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

II Basin : Subarnarekha, Burhabalang & Baitarni

Sl. No.	Site Name	Name of the River/ Stream	Years	Nitrite (NO2)		Phosphate (PO4)		Silica (SiO2)		DO (ppm)		BOD (ppm)		Total Coliform (no.per 10 ml)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(41)	(42)	(43)	(44)	(45)	(46)	(47)	(48)	(49)	(50)	(51)	(52)
a)	Basin : Subarnarekha														
1	Champua	Baitarani	2007-2008	0.00	0.00	0.000	0.010	6	10	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	0.00	0.00	-	-	7	9	-	-	-	-	-	-
2	Muri	Subarnarekha	2007-2008	0.00	0.06	0.000	0.100	9	10	6.1	9.4	0.9	3.0	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	0.00	0.06	-	-	8	10	5.9	8.9	1.0	2.0	-	-
3	Adityapur	Subarnarekha	2007-2008	0.00	0.00	0.001	0.240	9	14	4.0	11.0	0.9	2.5	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	0.00	0.00	-	-	8	10	0.0	8.3	1.2	20.0	-	-
4	Jamshedpur	Subarnarekha	2007-2008	0.00	0.00	0.000	0.620	9	10	2.1	9.1	1.5	37.0	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	0.00	0.10	-	-	8	10	0.0	7.7	2.0	3.0	-	-
5	Ghatsila	Subarnarekha	2007-2008	0.00	0.00	0.000	0.021	8	10	5.4	10.2	0.9	1.3	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	0.00	0.00	-	-	7	10	6.0	9.7	1.0	2.6	-	-
6	Fekoghat	Subarnarekha	2007-2008	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	Ghatsila Road Bridge	Subarnarekha	2007-2008	0.00	0.06	0.000	0.062	8	15	5.4	10.1	1.0	1.7	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	0.02	0.12	0.090	0.200	7	10	5.8	9.7	1.2	4.0	-	-
8	Baridhinala	Subarnarekha	2007-2008	0.00	0.34	0.000	2.211	6	10	0.0	5.5	3.3	105.0	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	0.00	0.50	0.010	0.300	8	10	0.0	3.2	3.0	140.0	-	-
9	Kulpatanga	Subarnarekha	2007-2008	0.00	0.11	0.000	0.165	8	13	4.4	10.8	1.0	8.1	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	0.02	0.10	0.160	0.510	8	10	0.0	8.9	1.4	20.0	-	-

Contd/..

10	**NH-Govindpur**	**Burhabalang**	**2007-2008**	**0.00**	**0.00**	**0.000**	**0.000**	**8**	**10**	**-**	**-**	**-**	**-**	**-**	**-**
			2008-2009	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
			2009-2010	**0.00**	**0.00**	**-**	**-**	**6**	**8**	**-**	**-**	**-**	**-**	**-**	**-**
b)	**Basin : Baitarni**															
1	**Anandpur**	**Baitarani**	**2007-2008**	**0.00**	**0.00**	**0.000**	**0.000**	**6**	**14**	**6.1**	**8.9**	**0.7**	**1.3**	**-**	**-**
			2008-2009	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
			2009-2010	**0.00**	**0.00**	**0.000**	**0.052**	**8**	**9**	**6.8**	**9.3**	**1.0**	**1.8**	**-**	**-**

Contd/---

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

II Basin : Subarnarekha, Burhabalang & Baitarni

Sl. No.	Site Name	Name of the River/ Stream	Years	Faecal Coliform (no.per 10 ml)		Total plate count (no.per 10 ml)		Phytoplankton (no.per ml)		Zooplankton (no.per litre)		Arsenic (ppm)		Boron (ppm)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(53)	(54)	(55)	(56)	(57)	(58)	(59)	(60)	(61)	(62)	(63)	(64)
a)	Basin : Subarnarekha														
1	Champua	Baitarani	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
2	Muri	Subarnarekha	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
3	Adityapur	Subarnarekha	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
4	Jamshedpur	Subarnarekha	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
5	Ghatsila	Subarnarekha	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
6	Fekoghat	Subarnarekha	2007-2008	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
7	Ghatsila Road Bridge	Subarnarekha	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
8	Baridhinala	Subarnarekha	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/..

9	**Kulpatanga**	**Subarnarekha**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-	-
10	**NH-Govindpur**	**Burhabalang**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-	-
b)	**Basin : Baitarni**															
1	**Anandpur**	**Baitarani**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-	-

Contd/---

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

II Basin : Subarnarekha, Burhabalang & Baitarni

Sl. No.	Site Name	Name of the River/ Stream	Years	Cadmium (ppm)		Chromium (ppm)		Copper (ppm)		Cyanide (ppm)		Lead (ppm)		Manganese (ppm)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(65)	(66)	(67)	(68)	(69)	(70)	(71)	(72)	(73)	(74)	(75)	(76)
a)	**Basin : Subarnarekha**														
1	Champua	Baitarani	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
2	Muri	Subarnarekha	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
3	Adityapur	Subarnarekha	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
4	Jamshedpur	Subarnarekha	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
5	Ghatsila	Subarnarekha	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
6	Fekoghat	Subarnarekha	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
7	Ghatsila Road Bridge	Subarnarekha	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
8	Baridhinala	Subarnarekha	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
9	Kulpatanga	Subarnarekha	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/..3

10	**NH-Govindpur**	**Burhabalang**	**2007-2008**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**
			2008-2009	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
b)	**Basin : Baitarni**															
1	**Anandpur**	**Baitarani**	**2007-2008**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**
			2008-2009	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/---

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

II Basin : Subarnarekha, Burhabalang & Baitarni

Sl. No.	Site Name	Name of the River/ Stream	Years	Mercury (ppm)		Zinc (ppm)		Hardness		Sodium % Na%		SAR		RSC	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(77)	(78)	(79)	(80)	(81)	(82)	(83)	(84)	(85)	(86)	(87)	(88)
a)	Basin : Subarnarekha														
1	Champua	Baitarani	2007-2008	-	-	-	-	22	63	21	39	0.4	0.7	0.0	0.0
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	28	60	10	36	0.2	0.6	0.0	0.0
2	Muri	Subarnarekha	2007-2008	-	-	-	-	58	267	13	47	0.5	1.4	0.0	0.0
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	60	268	24	47	0.6	3.1	0.0	0.0
3	Adityapur	Subarnarekha	2007-2008	-	-	-	-	63	258	13	32	0.4	0.9	0.0	0.2
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	68	402	14	34	0.3	2.2	0.0	0.0
4	Jamshedpur	Subarnarekha	2007-2008	-	-	-	-	61	169	14	33	0.4	1.1	0.0	0.1
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	64	504	14	31	0.3	0.9	0.0	0.0
5	Ghatsila	Subarnarekha	2007-2008	-	-	-	-	58	231	14	28	0.4	0.9	0.0	0.0
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
6	Fekoghat	Subarnarekha	2007-2008	-	-	-	-	58	231	N.A	N.A	N.A	N.A	N.A	N.A
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
7	Ghatsila Road Bridge	Subarnarekha	2007-2008	N.A	N.A	N.A	N.A	30	223	14	42	0.4	1.0	0.0	0.0
			2008-2009	N.A.	N.A.	N.A.	N.A.	68	153	18	37	0.5	1.3	0.0	0.0
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
8	Baridhinala	Subarnarekha	2007-2008	-	-	-	-	89	502	15	31	0.4	1.7	0.0	0.7
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	129	394	22	42	1.0	2.5	0.0	0.0
9	Kulpatanga	Subarnarekha	2007-2008	-	-	-	-	20	31	17	49	0.5	1.0	0.0	0.2
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	64	415	12	33	0.3	2.1	0.0	0.0

Contd/..

10	NH-Govindpur	Burhabalang	2007-2008	-	-	-	-	13	87	20	29	0.5	0.6	0.0	0.0
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	48	117	16	30	0.3	0.9	0.0	0.0
b)	Basin : Baitarni														
1	Anandpur	Baitarani	2007-2008	-	-	-	-	31	135	17	32	0.3	0.9	0.0	0.0
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	20	52	15	32	0.3	0.6	0.0	0.0

Source: Water Quality Year Book 2007-2008 to 2009-2010.

Note : 1. All the ionic concentrations are expressed in mg./lit. unless mentioned otherwise.

2. (-) indicate that analyis of a particular parameter has not been carried out.

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

III Basin : Brahmani

Sl. No.	Site Name	Name of the River/ Stream	Years	Q (Cumecs)		Temperature °C		pH		Sp.Conductance		Potassium (K+)		Sodium (Na)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
1	Tilga	Sankh	2007-2008	-	-	13.5	33.0	7.3	7.9	-	-	0.8	2.0	4.5	7.8
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	73	164	14.0	27.0	6.4	7.8	-	-	1.0	2.2	4.8	8.9
2	Jarikala	Koel	2007-2008	-	-	18.5	31.5	7.3	8.3	-	-	0.5	2.3	6.9	9.9
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	99	320	17.0	30.0	7.5	7.8	-	-	1.0	4.1	4.0	15.6
3	Panposh	Brahmani	2007-2008	-	-	19.0	32.0	7.6	8.2	-	-	0.5	3.8	5.4	10.0
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	18.0	31.0	7.1	8.3	-	-	1.0	3.6	4.3	12.9
4	Gomlai	Brahmani	2007-2008	-	-	18.0	32.0	7.4	8.2	-	-	0.6	5.6	6.0	15.6
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	17.5	31.0	7.4	8.2	-	-	0.6	3.9	3.2	10.7
5	Jenapur	Brahmani	2007-2008	-	-	18.0	30.0	7.7	8.2	-	-	0.2	2.3	5.6	11.8
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	17.0	30.0	7.2	8.4	-	-	1.0	2.1	5.0	10.8
6	Altuma	Brahmani	2007-2008	-	-	N.A.	N.A.	N.A.	N.A.	-	-	N.A.	N.A.	N.A.	N.A.
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A
7	Talcher	Brahmani	2007-2008	-	-	22.0	32.5	7.5	8.2	-	-	0.4	2.3	4.1	10.6
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	23.0	30.0	7.4	8.3	-	-	1.0	2.3	4.0	11.5
8	Nandira	Brahmani	2007-2008	-	-	19.0	33.0	7.7	8.6	-	-	1.1	4.6	4.8	25.3
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	24.0	31.0	7.6	8.2	-	-	1.2	6.5	6.4	21.6
9	Kamalang	Brahmani	2007-2008	-	-	20.0	33.0	6.3	8.2	-	-	0.7	20.3	4.9	16.6
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	24.0	30.5	7.5	8.2	-	-	1.1	3.6	5.7	15.7
10	RSP Nala	Brahmani	2007-2008	-	-	19.0	33.0	7.1	8.1	-	-	1.9	6.6	10.1	27.3
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	18.0	31.0	7.1	7.9	-	-	1.3	5.8	10.2	20.8

Contd/---

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

III Basin : Brahmani

Sl. No.	Site Name	Name of the River/ Stream	Years	Calcium (Ca++)		Magnesium (Mg)		Aluminium (AL+++)		Ferric ion (Fe+++)		Ammonia(NH4)		Carbonate (CO3--)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)	(25)	(26)	(27)	(28)
1	Tilga	Sankh	2007-2008	7	11	1.1	2.9	-	-	0.0	0.2	-	-	0.0	0.0
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	5	13	1.9	5.8	-	-	0.0	18.7	-	-	0.0	0.0
2	Jarikala	Koel	2007-2008	12	18	3.9	9.5	39	154	0.0	0.3	-	-	0.0	0.0
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	10	24	2.9	13.6	-	-	0.1	0.2	-	-	0.0	4.8
3	Panposh	Brahmani	2007-2008	8	24	3.2	5.9	30	178	0.0	0.3	0.05	0.05	0.0	0.0
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	8	29	3.9	12.6	-	-	0.1	0.2	-	-	0.0	0.0
4	Gomlai	Brahmani	2007-2008	8	34	2.9	10.6	20	112	0.0	0.4	0.05	0.05	0.0	0.0
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	8	19	3.9	10.7	-	-	0.1	0.3	-	-	0.0	0.0
5	Jenapur	Brahmani	2007-2008	8	18	1.0	7.2	20	115	0.1	0.3	0.05	0.05	0.0	0.0
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	8	14	2.9	10.7	-	-	0.1	0.3	-	-	0.0	4.8
6	Altuma	Brahmani	2007-2008	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A
7	Talcher	Brahmani	2007-2008	8	22	0.9	8.3	20	148	0.1	0.2	-	-	0.0	0.0
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	6	21	2.9	10.7	-	-	0.0	0.1	-	-	0.0	0.0
8	Nandira	Brahmani	2007-2008	9	62	3.3	17.5	20	143	0.0	0.4	-	-	0.0	1.2
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	10	43	5.8	24.3	-	-	0.0	0.1	-	-	0.0	0.0
9	Kamalang	Brahmani	2007-2008	10	43	1.5	9.5	25	123	0.1	0.2	0.05	0.05	0.0	0.0
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	8	27	3.9	17.5	-	-	0.1	0.1	-	-	0.0	0.0
10	RSP Nala	Brahmani	2007-2008	11	69	3.2	24.1	17	179	0.0	14.5	-	-	0.0	0.0
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	14	40	5.8	20.4	-	-	0.0	0.4	-	-	0.0	0.0

Contd/---

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

III Basin : Brahmani

Sl. No.	Site Name	Name of the River/ Stream	Years	Bicarbonate (HCO3--)		Chloride (CL-)		Fluoride (F-)		Sulphate (SO4-)		Sulphite (SO3)		Nitrate (NO3)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(29)	(30)	(31)	(32)	(33)	(34)	(35)	(36)	(37)	(38)	(39)	(40)
1	Tilga	Sankh	2007-2008	27	45	7.7	13.6	0.00	0.00	1.3	6.3	-	-	0.11	0.31
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	20	50	7.4	13.6	0.05	0.05	1.7	15.8	-	-	0.04	0.21
2	Jarikala	Koel	2007-2008	48	94	11.1	14.1	0.00	0.15	1.3	11.2	-	-	0.03	0.95
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	24	107	5.8	27.2	0.05	0.05	3.1	17.9	-	-	0.24	0.43
3	Panposh	Brahmani	2007-2008	37	94	7.3	13.8	0.00	0.53	0.8	10.4	-	-	0.14	0.81
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	24	122	5.8	21.4	0.05	0.42	1.6	46.4	-	-	0.13	0.91
4	Gomlai	Brahmani	2007-2008	25	137	8.4	25.3	0.00	0.21	1.3	13.4	-	-	0.11	5.87
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	24	73	5.8	20.4	0.00	0.09	3.8	18.2	-	-	0.41	9.21
5	Jenapur	Brahmani	2007-2008	25	70	7.7	16.5	0.00	0.05	1.3	11.4	-	-	0.21	2.68
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	15	62	9.3	19.4	0.05	0.05	3.8	18.0	-	-	0.57	2.40
6	Altuma	Brahmani	2007-2008	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A
7	Talcher	Brahmani	2007-2008	24	90	6.9	18.7	0.00	0.09	1.5	10.9	-	-	0.21	4.25
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	15	92	5.8	17.5	0.05	0.05	4.8	18.8	-	-	0.15	0.38
8	Nandira	Brahmani	2007-2008	24	24	7.6	35.7	0.23	1.29	3.8	34.5	-	-	1.57	16.60
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	20	157	11.1	35.3	0.11	0.93	6.2	72.2	-	-	1.92	6.81
9	Kamalang	Brahmani	2007-2008	30	30	7.5	21.3	0.05	0.34	6.0	27.2	-	-	0.22	10.90
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	15	98	9.3	21.4	0.08	0.23	9.0	47.2	-	-	1.61	6.82
10	RSP Nala	Brahmani	2007-2008	20	20	14.9	38.6	0.20	1.10	10.1	63.6	-	-	3.19	32.56
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	15	122	15.5	38.9	0.20	0.59	17.4	91.2	-	-	4.46	14.71

Contd/---

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

III Basin : Brahmani

Sl. No.	Site Name	Name of the River/ Stream		Nitrite (NO2)		Phosphate (PO4)		Silica (SiO2)		DO		BOD		Total Coliform	
				Min	Max	Min	Max	Min	Max	(ppm)		(ppm)		(no.per 10 ml)	
										Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(41)	(42)	(43)	(44)	(45)	(46)	(47)	(48)	(49)	(50)	(51)	(52)
1	Tilga	Sankh	2007-2008	0.00	0.00	0.000	0.000	6	11	5.7	9.6	0.7	1.7	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	0.00	0.01	0.000	0.000	6	7	6.7	7.8	0.8	1.2	-	-
2	Jarikala	Koel	2007-2008	0.00	0.11	0.000	0.000	6	18	6.3	9.2	0.8	1.0	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	0.00	0.00	0.000	0.000	6	10	6.3	8.3	1.0	1.8	-	-
3	Panposh	Brahmani	2007-2008	0.00	0.22	0.000	0.000	8	19	4.9	9.1	0.9	2.1	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	0.00	0.00	0.000	0.000	7	9	6.0	9.1	1.0	2.7	-	-
4	Gomlai	Brahmani	2007-2008	0.00	0.08	0.000	0.000	8	17	4.9	8.7	0.7	1.4	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	0.00	0.00	0.000	0.000	7	11	5.8	8.9	1.0	193.0	-	-
5	Jenapur	Brahmani	2007-2008	0.00	0.17	0.000	0.000	6	16	6.2	8.9	0.7	1.3	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	0.00	0.00	0.000	0.000	7	11	6.5	9.3	0.8	1.6	-	-
6	Altuma	Brahmani	2007-2008	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A
7	Talcher	Brahmani	2007-2008	0.00	0.00	0.000	0.010	6	20	6.9	8.1	0.7	1.1	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	0.00	0.00	0.000	0.000	6	9	7.2	8.3	0.8	1.8	-	-
8	Nandira	Brahmani	2007-2008	0.00	0.23	0.000	0.227	8	14	4.8	8.3	1.1	2.9	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	0.00	0.00	0.000	0.140	7	10	6.2	7.9	1.6	3.3	-	-
9	Kamalang	Brahmani	2007-2008	0.00	0.22	0.000	0.062	8	13	6.3	8.2	1.1	2.7	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	0.00	0.10	0.020	0.170	7	9	6.9	8.1	1.0	2.2	-	-
10	RSP Nala	Brahmani	2007-2008	0.00	0.43	0.000	0.124	5	10	3.3	8.8	0.9	2.5	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	0.00	0.50	0.000	0.020	8	12	3.4	8.7	1.2	2.8	-	-

Contd/---

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

III Basin : Brahmani

Sl. No.	Site Name	Name of the River/ Stream	Years	Faecal Coliform (no.per 10 ml)		Total plate count (no.per 10 ml)		Phytoplankton (no.per ml)		Zooplankton (no.per litre)		Arsenic (ppm)		Boron (ppm)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(53)	(54)	(55)	(56)	(57)	(58)	(59)	(60)	(61)	(62)	(63)	(64)
1	Tilga	Sankh	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
2	Jarikala	Koel	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
3	Panposh	Brahmani	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
4	Gomlai	Brahmani	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
5	Jenapur	Brahmani	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
6	Altuma	Brahmani	2007-2008	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
7	Talcher	Brahmani	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
8	Nandira	Brahmani	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
9	Kamalang	Brahmani	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
10	RSP Nala	Brahmani	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/---

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

III Basin : Brahmani

Sl. No.	Site Name	Name of the River/ Stream	Years	Cadmium (ppm)		Chromium (ppm)		Copper (ppm)		Cyanide (ppm)		Lead (ppm)		Manganese (ppm)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(65)	(66)	(67)	(68)	(69)	(70)	(71)	(72)	(73)	(74)	(75)	(76)
1	Tilga	Sankh	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
2	Jarikala	Koel	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
3	Panposh	Brahmani	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
4	Gomlai	Brahmani	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
5	Jenapur	Brahmani	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
6	Altuma	Brahmani	2007-2008	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
7	Talcher	Brahmani	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
8	Nandira	Brahmani	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
9	Kamalang	Brahmani	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
10	RSP Nala	Brahmani	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/---

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

III Basin : Brahmani

Sl. No.	Site Name	Name of the River/ Stream	Years	Mercury (ppm)		Zinc (ppm)		Hardness		Sodium % / Na%		SAR		RSC	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(77)	(78)	(79)	(80)	(81)	(82)	(83)	(84)	(85)	(86)	(87)	(88)
1	Tilga	Sankh	2007-2008	-	-	-	-	26	40	25.0	31.0	0.4	0.6	0.0	0.0
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	20	56	20	42	0.3	0.7	0.0	0.0
2	Jarikala	Koel	2007-2008	-	-	-	-	48	84	18	27	0.4	0.6	0.0	0.1
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	40	117	12	23	0.3	0.6	0.0	0.0
3	Panposh	Brahmani	2007-2008	-	-	-	-	35	83	14	27	0.3	0.6	0.0	0.2
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	36	125	12	22	0.3	0.6	0.0	0.0
4	Gomlai	Brahmani	2007-2008	-	-	-	-	33	129	14	37	0.4	1.0	0.0	0.0
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	36	85	13	23	0.2	0.5	0.0	0.0
5	Jenapur	Brahmani	2007-2008	-	-	-	-	29	67	20	31	0.4	0.6	0.0	0.0
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	32	73	15	36	0.3	0.7	0.0	0.0
6	Altuma	Brahmani	2007-2008	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
7	Talcher	Brahmani	2007-2008	-	-	-	-	28	83	17	27	0.3	0.5	0.0	1.0
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	28	97	15	39	0.3	0.8	0.0	0.0
8	Nandira	Brahmani	2007-2008	-	-	-	-	42	207	12	34	0.3	1.0	0.0	0.0
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	48	209	15	29	0.4	0.7	0.0	0.0
9	Kamalang	Brahmani	2007-2008	-	-	-	-	33	142	15	27	0.3	0.6	0.0	0.0
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	44	137	14	36	0.3	0.8	0.0	0.0
10	RSP Nala	Brahmani	2007-2008	-	-	-	-	40	271	12	38	0.4	0.9	0.0	0.0
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	68	173	12	27	0.4	0.8	0.0	0.0

Source: Water Quality Year Book 2007-2008 to 2009-2010.

Note : 1. All the ionic concentrations are expressed in mg./lit. unless mentioned otherwise.

2. (-) indicate that analyis of a particular parameter has not been carried out.

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

IV Basin : Rushikulya, Vamsadhara, Sarada & Nagavali

Sl. No.	Site Name	Name of the River/ Stream	Years	Q (Cumecs)		Temperature °C		pH		Sp.Conductance		Potassium		Sodium	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
	Basin : Rushikulya														
1	Purushottampur	Rushikulya	2007-2008	-	-	21.0	33.4	7.3	8.6	-	-	2.1	3.7	9.2	16.4
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	20.5	33.0	7.7	7.9	-	-	1.7	4.7	11.8	22.6
	Basin : Vamsdhara														
1	Gunupur	Vamsadhara	2007-2008	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	Kashinagar	Vamsadhara	2007-2008	-	-	18.2	31.0	7.2	8.2	-	-	2.8	3.8	11.6	19.3
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	18.0	29.0	7.5	8.4	-	-	1.8	18.8	6.2	43.6
	Basin : Nagavali														
1	Srikakulam	Nagavali	2007-2008	-	-	23.0	32.4	7.5	8.2	-	-	1.9	22.6	13.1	20.8
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	20.0	29.1	7.5	8.4	-	-	1.7	4.7	9.3	31.8
	Basin : Sarada		2007-2008												
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010												
1	Anakapalli	Sarada	2007-2008	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.

Contd/---

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

IV Basin : Rushikulya, Vamsadhara, Sarada & Nagavali

Sl. No.	Site Name	Name of the River/ Stream	Years	Calcium		Magnesium		Aluminium		Iron		Ammonia(NH_3)		Carbonate	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)	(25)	(26)	(27)	(28)
	Basin : Rushikulya														
1	Purushottampur	Rushikulya	2007-2008	22	31	6.3	12.4	66	115	0.0	0.1	-	-	0.0	0.0
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	19	30	8.8	17.5	76	120	0.0	0.2	-	-	0.0	0.0
	Basin : Vamsdhara														
1	Gunupur	Vamsadhara	2007-2008	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	Kashinagar	Vamsadhara	2007-2008	19	34	4.7	7.8	66	94	0.1	0.3	0.05	0.05	0.0	0.0
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	14	38	4.9	16.5	40.0	136.0	0.1	0.3	0.17	0.52	0.0	4.8
	Basin : Nagavali														
1	Srikakulam	Nagavali	2007-2008	28	43	5.8	11.9	105	111	0.1	0.1	0.06	0.06	0.0	0.0
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	14	42	4.9	24.3	54	170	0.0	0.1	-	-	0.0	0.6
	Basin : Sarada														
1	Anakapalli	Sarada	2007-2008	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.

Contd/---

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

IV Basin : Rushikulya, Vamsadhara, Sarada & Nagavali

Sl. No.	Site Name	Name of the River/ Stream	Years	Bicarbonate		Chloride		Fluoride		Sulphate		Sulphite		Nitrate	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(29)	(30)	(31)	(32)	(33)	(34)	(35)	(36)	(37)	(38)	(39)	(40)
	Basin : Rushikulya														
1	Purushottampur	Rushikulya	2007-2008	81	140	13.6	24.3	0.00	0.47	10.0	12.2	-	-	0.43	1.23
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	93	146	15.5	33.1	0.00	0.15	10.1	21.4	-	-	0.29	0.99
	Basin : Vamsdhara														
1	Gunupur	Vamsadhara	2007-2008	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	Kashinagar	Vamsadhara	2007-2008	81	124	15.5	25.3	0.00	0.08	3.5	12.6	-	-	0.11	2.86
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	49	156	11.7	60.2	0.00	0.09	11.7	23.5	-	-	0.17	0.52
	Basin : Nagavali														
1	Srikakulam	Nagavali	2007-2008	128	159	17.7	32.1	0.00	11.74	2.8	12.0	-	-	0.52	3.42
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	65	207	15.5	42.7	0.00	0.11	6.8	16.3	-	-	0.22	0.99
	Basin : Sarada														
1	Anakapalli	Sarada	2007-2008	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.

Contd/…

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

IV Basin : Rushikulya, Vamsadhara, Sarada & Nagavali

Sl. No.	Site Name	Name of the River/ Stream	Years	Nitrite		Phosphate		Silica (SiO_3)		DO (ppm)		BOD (ppm)		Total Coliform (no.per 10 ml)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(41)	(42)	(43)	(44)	(45)	(46)	(47)	(48)	(49)	(50)	(51)	(52)
	Basin : Rushikulya														
1	Purushottampur	Rushikulya	2007-2008	0.00	0.00	0.000	0.072	8	10	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	0.00	0.00	0.000	0.070	8	10	-	-	-	-	-	-
	Basin : Vamsdhara														
1	Gunupur	Vamsadhara	2007-2008	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	Kashinagar	Vamsadhara	2007-2008	0.00	0.00	0.000	0.103	9	13	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	0.00	0.01	0.000	0.100	9	10	-	-	-	-	-	-
	Basin : Nagavali														
1	Srikakulam	Nagavali	2007-2008	0.00	0.00	0.000	0.093	8	22	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	0.00	0.00	-	-	7	10	-	-	-	-	-	-
	Basin : Sarada														
1	Anakapalli	Sarada	2007-2008	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.

Contd/…

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

IV Basin : Rushikulya, Vamsadhara, Sarada & Nagavali

Sl. No.	Site Name	Name of the River/ Stream	Years	Faecal Coliform (no.per 10 ml)		Total plate count (no.per 10 ml)		Phytoplankton (no.per ml)		Zooplankton (no.per litre)		Arsenic (ppm)		Boron (ppm)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(53)	(54)	(55)	(56)	(57)	(58)	(59)	(60)	(61)	(62)	(63)	(64)
	Basin : Rushikulya														
1	Purushottampur	Rushikulya	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
	Basin : Vamsdhara														
2	Gunupur	Vamsadhara	2007-2008	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	Kashinagar	Vamsadhara	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
	Basin : Nagavali														
4	Srikakulam	Nagavali	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
	Basin : Sarada														
5	Anakapalli	Sarada	2007-2008	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.

Contd/---

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

IV Basin : Rushikulya, Vamsadhara, Sarada & Nagavali

Sl. No.	Site Name	Name of the River/ Stream	Years	Cadmium (ppm)		Chromium (ppm)		Copper (ppm)		Cyanide (ppm)		Lead (ppm)		Manganese (ppm)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(65)	(66)	(67)	(68)	(69)	(70)	(71)	(72)	(73)	(74)	(75)	(76)
	Basin : Rushikulya														
	Purushottampur	Rushikulya	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
	Basin : Vamsdhara														
	Gunupur	Vamsadhara	2007-2008	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Kashinagar	Vamsadhara	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
	Basin : Nagavali														
	Srikakulam	Nagavali	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Basin : Sarada														
	Anakapalli	Sarada	2007-2008	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/---

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

IV Basin : Rushikulya, Vamsadhara, Sarada & Nagavali

Sl.	Site Name	Name of Stream	Years	Mercury		Zinc		Hardness		Sodium %		SAR		RSC	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(77)	(78)	(79)	(80)	(81)	(82)	(83)	(84)	(85)	(86)	(87)	(88)
	Basin : Rushikulya														
	Purushottampur	Rushikulya	2007-2008	-	-	-	-	82	119	16	23	0.4	0.7	0.0	0.0
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	89	149	19	34	0.5	1.0	0.0	0.0
	Basin : Vamsdhara														
	Gunupur	Vamsadhara	2007-2008	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	N.A.	N.A.	N.A.	N.A.								
	Kashinagar	Vamsadhara	2007-2008	-	-	-	-	67	122	22	29	0.6	0.9	0.0	0.1
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	56	153	17	35	0.4	1.5	0.0	0.0
	Basin : Nagavali														
	Srikakulam	Nagavali	2007-2008	-	-	-	-	100	160	15	27	0.5	0.8	0.0	0.3
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	-	-	-	-	68	173	22	30	0.5	1.1	0.0	0.0
	Basin : Sarada														
	Anakapalli	Sarada	2007-2008	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.

Source: Water Quality Year Book for 2007-08 to 2009-2010.

Note : 1. All the ionic concentrations are expressed in mg./lit. unless mentioned otherwise.

2. (-) indicate that analyis of a particular parameter has not been carried out.

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

V Basin : Godavari

Sl. No.	Site Name	Name of the River/ Stream	Years	Q (Cumecs)		Temperature °C		pH_GEN		Sp.Conductance		Potassium (K)		Sodium (Na)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
1	Polavaram	Godavari	2007-2008	93.83	47249	24.5	32.0	7.5	8.6	-	-	0.2	4.4	5.4	32.4
			2008-2009	34.00	26975	26.0	32.0	7.7	8.4	-	-	1.6	3.3	5.0	13.0
			2009-2010	74.63	11249	24.0	32.0	7.6	8.5	-	-	1.0	2.7	5.9	12.9
2	Bhadrachelam	Godavari	2007-2008	25.82	42755	21.0	31.0	7.9	8.8	-	-	0.2	5.5	11.8	45.0
			2008-2009	10.30	25440	25.5	31.0	7.5	8.8	-	-	1.6	4.5	4.5	40.0
			2009-2010	0.346	11661	24.5	31.0	7.8	8.6	-	-	0.9	6.0	5.1	43.4
3	Konta	Sabari	2007-2008	106.3	6924	24.0	33.0	7.3	8.3	-	-	0.1	3.5	3.2	40.1
			2008-2009	58.86	4193	24.0	33.0	7.6	8.3	-	-	0.7	1.8	4.0	14.0
			2009-2010	9.349	1832	19.0	34.0	7.6	8.3	-	-	0.5	2.1	2.5	7.7
4	Perur	Godavari	2007-2008	0.000	37378	25.0	29.0	7.3	8.8	-	-	0.2	4.4	5.7	42.5
			2008-2009	4.467	25946	25.0	29.5	8.1	8.5	-	-	1.8	4.5	8.0	41.6
			2009-2010	4.420	12393	22.0	28.0	7.0	8.6	-	-	1.1	5.0	3.6	48.5
5	Pathagudem	Indravati	2007-2008	0.988	16810	25.0	31.0	7.3	9.0	-	-	0.1	3.2	4.0	15.1
			2008-2009	0.100	12703	22.0	31.0	8.1	8.4	-	-	0.8	1.7	4.5	7.4
			2009-2010	0.000	10446	20.0	29.0	7.1	8.8	-	-	0.5	3.0	1.6	9.7
6	Jagdalpur	Indravati	2007-2008	0.433	1737	17.0	28.0	7.7	8.6	-	-	0.1	3.1	3.8	21.0
			2008-2009	0.817	1152	20.0	27.5	7.8	8.5	-	-	1.0	2	4.0	7.0
			2009-2010	1.427	831.6	19.0	28.0	7.5	8.5	-	-	0.7	2.4	3.9	6.4
7	Tekra	Pranhita	2007-2008	6.827	25540	19.0	24.4	8.2	8.8	-	-	1.2	4.7	3.5	59.8
			2008-2009	1.287	14223	18.8	28.5	8.0	8.9	-	-	1.1	4.0	5.0	65.6
			2009-2010	1.730	8737.0	9.2	30.0	8.2	8.7	-	-	1.6	5.3	3.9	72.6
8	Bhatpalli	Indravati	2007-2008	0.517	1422	21.0	30.0	8.3	8.8	-	-	1.2	9.8	8.1	68.5
			2008-2009	0.475	925.5	20.0	28.0	8.1	8.8	-	-	1.4	4.3	17.0	81.9
			2009-2010	0.000	201.5	20.0	28.0	8.0	8.6	-	-	1.5	3.5	9.9	65.1
9	Bamni	Wardha	2007-2008	1.732	7867	22.0	33.5	7.8	8.8	-	-	1.6	21.9	6.7	109.9
			2008-2009	0.264	4688	23.5	33.0	7.5	8.4	-	-	0.8	23.1	11.7	256.7
			2009-2010	0.000	783.7	22.0	32.0	7.3	8.3	-	-	2.7	18.0	20.5	192.1
10	P.G. Bridge	Penganga	2007-2008	0.001	2877	18.0	28.0	8.2	8.9	-	-	1.2	6.3	5.8	61.0
			2008-2009	0.028	1411	23.0	29.0	8.1	8.7	-	-	1.6	3.5	9.0	38.4
			2009-2010	0.000	833.0	19.5	28.0	8.2	8.6	-	-	1.6	2.3	4.1	20.2

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

V Basin : Godavari

Sl. No.	Site Name	Name of the River/ Stream	Years	Q (Cumecs)		Temperature °C		pH_GEN		Sp.Conductance		Potassium (K)		Sodium (Na)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
11	Nandgaon	Wunna	2007-2008	0.186	3567	17.0	29.0	8.2	8.8	-	-	1.2	6.6	7.4	49.2
			2008-2009	0.048	597.4	19.0	29.0	7.9	8.6	-	-	1.6	5.9	9.0	77.5
			2009-2010	0.000	404.3	18.0	28.0	7.9	8.5	-	-	2.0	4.7	10.4	45.9
12	Hivra	Wardha	2007-2008	2.313	4261	21.0	29.0	8.3	8.8	-	-	1.2	3.1	4.8	74.5
			2008-2009	0.059	160.1	23.0	29.5	8.0	8.9	-	-	1.2	3.1	16.1	95.7
			2009-2010	0.000	54.56	27.5	28.5	8.1	8.3	-	-	3.1	3.5	27.6	45.5
13	Ashti	Wainganga	2007-2008	2.417	20614	24.0	31.0	8.2	8.9	-	-	1.2	3.1	2.3	31.3
			2008-2009	0.046	10718	25.0	30.5	7.7	8.9	-	-	0.8	3.9	1.7	58.2
			2009-2010	1.721	8058	21.5	30.0	8.3	8.8	-	-	1.2	7.7	4.6	54.3
14	Pauni	Wainganga	2007-2008	-	-	19.0	32.0	7.9	8.8	-	-	1.2	5.9	3.9	58.2
			2008-2009	-	-	19.0	31.0	7.7	9.0	-	-	1.2	4.3	4.6	72.7
			2009-2010	-	-	19.0	30.0	7.6	8.6	-	-	1.2	39.1	5.5	61.9
15	Satrapur	Kanhan	2007-2008	1.718	1850	21.0	31.0	7.9	8.7	-	-	1.2	2.7	4.8	56.8
			2008-2009	1.263	121.2	19.0	27.5	7.8	8.5	-	-	1.2	4.3	9.7	68.1
			2009-2010	0.931	1562	14.0	25.8	7.6	8.5	-	-	1.6	3.9	12.4	58.9
16	Mancherial	Godavari	2007-2008	3.440	611.5	18.5	27.5	8.1	8.9	-	-	0.2	5.3	37.1	68.0
			2008-2009	0.000	2560	14.5	31.0	8.3	8.6	-	-	1.6	3.9	28.0	51.0
			2009-2010	0.000	296.8	19.5	27.5	7.9	8.8	-	-	1.0	5.0	18.2	54.0
17	Gandlapet	Peddavagu	2007-2008	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A
			2008-2009	<---------- No Flow in the River ---------->											
			2009-2010	<---------- No Flow in the River ---------->											
18	Saigaon	Manjira	2007-2008	0.000	1206	23.0	27.0	8.2	8.8	-	-	0.6	3.6	12.0	24.3
			2008-2009	0.000	2142	24.0	25.0	8.2	8.2	-	-	3.2	5.1	7.0	28.0
			2009-2010	0.000	170.4	25.0	27.0	7.8	8.6	-	-	2.7	3.5	6.5	22.1
19	Dhalegaon	Godavari	2007-2008	0.000	1630	25.0	30.0	8.2	8.7	-	-	0.4	4.0	42.6	77.4
			2008-2009	<---------- No Flow in the River ---------->											
			2009-2010	<---------- No Flow in the River ---------->											

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

V Basin : Godavari

Sl. No.	Site Name	Name of the River/ Stream	Years	Calcium (Ca)		Magnesium (Mg)		Aluminium		Iron (Fe)		Ammonia (NH3-N)		Carbonate (CO3)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)	(25)	(26)	(27)	(28)
1	Polavaram	Godavari	2007-2008	7	20	4.0	13.6	-	-	0.0	0.7	0.05	1.08	0.0	9.1
			2008-2009	11	23	4.1	14.8	-	-	0.1	0.5	0.00	0.39	0.0	7.4
			2009-2010	8	27	4.9	17.5	-	-	0.1	0.8	0.00	0.28	0.0	14.3
2	Bhadrachelam	Godavari	2007-2008	10	34	6.0	26.8	-	-	0.1	0.4	0.05	1.03	0.0	16.8
			2008-2009	10	30	7.8	23.1	-	-	0.1	0.3	0.00	0.30	0.0	17.5
			2009-2010	9	36	4.4	20.8	-	-	0.1	0.3	0.00	0.63	0.0	18.6
3	Konta	Sabari	2007-2008	4	14	3.9	11.4	-	-	0.1	0.8	0.05	0.89	0.0	0.0
			2008-2009	8	18	4.1	7.0	-	-	0.1	0.4	0.00	0.28	0.0	2.3
			2009-2010	6	27	4.8	10.7	-	-	0.0	0.3	0.00	1.23	0.0	4.8
4	Perur	Godavari	2007-2008	9	30	4.4	24.3	-	-	0.0	0.5	0.05	1.32	0.0	14.5
			2008-2009	14	30	3.9	21.2	-	-	0.1	0.5	0.00	0.21	0.0	14.3
			2009-2010	5	36	3.9	23.8	-	-	0.1	0.3	0.00	0.51	0.0	14.1
5	Pathagudem	Indravati	2007-2008	4	22	1.0	12.9	-	-	0.0	0.4	0.05	0.96	0.0	12.0
			2008-2009	8	20	4.4	8.9	-	-	0.2	0.4	0.00	0.29	0.0	21.8
			2009-2010	7	23	3.4	9.8	-	-	0.0	0.3	0.00	0.28	0.0	16.5
6	Jagdalpur	Indravati	2007-2008	6	44	4.4	24.6	-	-	0.1	0.4	0.05	0.89	0.0	7.2
			2008-2009	8	43	6.8	16.8	-	-	0.2	0.4	0.00	0.84	0.0	13.1
			2009-2010	8	37	4.9	16.5	-	-	0.1	0.3	0.00	0.24	0.0	18.8
7	Tekra	Pranhita	2007-2008	18	36	1.1	18.8	-	-	0.0	0.7	0.03	0.77	0.0	9.3
			2008-2009	22	44	5.1	27.6	-	-	0.0	0.0	0.03	0.81	0.0	7.8
			2009-2010	22	34	9.7	32.3	-	-	0.0	0.4	0.03	0.31	0.0	9.0
8	Bhatpalli	Indravati	2007-2008	20	48	13.7	36.6	-	-	0.0	0.1	0.01	0.88	3.0	9.3
			2008-2009	25	42	13.7	30.9	-	-	0.0	0.0	0.03	1.10	0.0	7.8
			2009-2010	26	65	10.7	31.3	-	-	0.0	0.1	0.04	0.56	0.0	9.9
9	Bamni	Wardha	2007-2008	23	54	7.4	30.9	-	-	0.0	0.1	0.01	0.77	0.0	6.9
			2008-2009	24	236	6.8	74.1	-	-	0.0	0.0	0.03	1.63	0.0	9.9
			2009-2010	16	156	4.6	107.8	-	-	0.0	0.3	0.13	0.93	0.0	3.9
10	P.G. Bridge	Penganga	2007-2008	20	40	4.0	27.9	-	-	0.0	0.0	0.01	0.81	0.0	9.3
			2008-2009	23	48	8.6	27.5	-	-	0.0	0.0	0.08	0.94	0.0	9.9
			2009-2010	11	46	3.8	20.3	-	-	0.0	0.4	0.11	0.48	0.0	8.7

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

V Basin : Godavari

Sl. No.	Site Name	Name of the River/ Stream	Years	Calcium (Ca)		Magnesium (Mg)		Aluminium		Iron (Fe)		Ammonia (NH3-N)		Carbonate (CO3)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)	(25)	(26)	(27)	(28)
11	Nandgaon	Wunna	2007-2008	18	53	10.3	21.7	-	-	0.0	0.1	0.03	0.77	0.0	11.4
			2008-2009	24	54	7.4	31.5	-	-	0.0	0.0	0.04	1.43	0.0	7.8
			2009-2010	28	58	11.7	29.2	-	-	0.0	0.0	0.18	0.66	0.0	6.0
12	Hivra	Wardha	2007-2008	22	45	5.7	31.5	-	-	0.0	0.3	0.03	0.63	3.0	6.9
			2008-2009	18	31	6.8	26.9	-	-	0.0	0.0	0.04	1.80	0.0	7.8
			2009-2010	24	26	8.6	15.9	-	-	0.0	0.1	0.20	0.25	0.0	2.1
13	Ashti	Wainganga	2007-2008	13	34	1.7	15.4	-	-	0.0	0.6	0.00	0.77	0.0	9.3
			2008-2009	13	40	0.0	20.2	-	-	0.0	0.0	0.04	1.07	0.0	7.8
			2009-2010	18	36	6.2	15.9	-	-	0.0	0.2	0.08	0.45	0.9	25.5
14	Pauni	Wainganga	2007-2008	22	48	2.9	25.8	-	-	0.0	0.4	0.01	0.77	0.0	6.9
			2008-2009	21	43	4.6	15.9	-	-	0.0	0.0	0.18	1.21	0.0	7.8
			2009-2010	21	55	3.2	20.7	-	-	0.0	0.1	0.10	0.62	0.0	4.2
15	Satrapur	Kanhan	2007-2008	28	47	7.4	22.2	-	-	0.0	0.1	0.01	0.69	0.0	6.9
			2008-2009	26	58	5.7	39.2	-	-	0.0	0.0	0.03	1.17	0.0	7.8
			2009-2010	26	51	9.8	32.6	-	-	0.0	0.1	0.04	0.80	0.0	6.6
16	Mancherial	Godavari	2007-2008	9	36	19.5	40.4	-	-	0.1	0.4	0.05	3.78	0.0	32.9
			2008-2009	24.75	36.84	22.52	28.66	-	-	0.11	0.46	0.00	0.38	9.0	24.0
			2009-2010	23	42	13.2	33.5	-	-	0.1	0.9	0.00	0.53	0.0	28.5
17	Gandlapet	Peddavagu	2007-2008	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A
			2008-2009	<---------- No Flow in the River ---------->											
			2009-2010	<---------- No Flow in the River ---------->											
18	Saigaon	Manjira	2007-2008	21	29	6.3	19.0	-	-	0.1	0.3	0.05	0.05	0.0	24.0
			2008-2009	15	38	3.9	23.1	-	-	0.2	0.3	0.0	0.21	0.0	0.0
			2009-2010	13	27	3.9	13.9	-	-	0.1	0.3	0.03	0.04	0.0	14.3
19	Dhalegaon	Godavari	2007-2008	19	64	17.0	28.5	-	-	0.1	0.3	0.05	0.13	0.0	28.2
			2008-2009	<---------- No Flow in the River ---------->											
			2009-2010	<---------- No Flow in the River ---------->											

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

V Basin : Godavari

Sl. No.	Site Name	Name of the River/ Stream	Years	Bicarbonate (HCO3)		Chloride (CL)		Fluoride (F)		Sulphate (SO4)		Sulphite		Nitrate (NO3-N)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(29)	(30)	(31)	(32)	(33)	(34)	(35)	(36)	(37)	(38)	(39)	(40)
1	Polavaram	Godavari	2007-2008	24	130	11.4	38.0	0.05	0.58	3.0	10.0	-	-	0.25	4.69
			2008-2009	50	111	9.0	23.1	0.09	0.47	1.0	12.0	-	-	0.04	1.00
			2009-2010	41	159	8.1	16.9	0.04	0.40	2.0	11.8	-	-	0.04	0.79
2	Bhadrachelam	Godavari	2007-2008	95	199	10.0	45.0	0.17	0.66	4.0	22.0	-	-	0.08	3.72
			2008-2009	61	200	8.5	52.0	0.29	1.13	4.0	29.0	-	-	0.00	2.01
			2009-2010	43	160	6.9	47.9	0.19	0.76	1.6	30.2	-	-	0.01	0.73
3	Konta	Sabari	2007-2008	42	88	8.0	47.0	0.05	0.93	1.0	10.0	-	-	0.10	3.71
			2008-2009	46	91	5.7	19.0	0.01	0.37	0.0	12.0	-	-	0.00	0.52
			2009-2010	36	121	4.5	10.2	0.01	0.31	0.0	1.7	-	-	0.00	0.41
4	Perur	Godavari	2007-2008	29	193	11.4	45.0	0.05	0.59	1.0	31.0	-	-	0.06	5.24
			2008-2009	60	210	11.3	65.0	0.22	0.69	1.0	30.3	-	-	0.00	1.93
			2009-2010	29	177	6.5	62.7	0.00	0.74	0.3	30.7	-	-	0.05	0.74
5	Pathagudem	Indravati	2007-2008	29	110	4.0	13.0	0.05	0.98	1.0	1.0	-	-	0.01	1.03
			2008-2009	52	99	6.0	10.0	0.00	0.46	0.0	1.1	_	_	0.01	0.51
			2009-2010	41	105	2.9	11.6	0.09	0.40	0.0	4.9	-	-	0.01	0.38
6	Jagdalpur	Indravati	2007-2008	45	206	5.6	21.0	0.05	0.43	1.0	2.0	-	-	0.02	3.21
			2008-2009	54	213	7.0	12.0	0.09	0.36	0.0	2.0	_	_	0.02	0.71
			2009-2010	41	182	5.5	11.6	0.11	0.45	0.0	5.9	-	-	0.00	1.19
7	Tekra	Pranhita	2007-2008	52	205	2.8	47.6	0.04	0.65	8.6	1104.0	-	-	0.14	1.82
			2008-2009	99	265	5.7	50.4	0.00	0.86	3.8	44.6	_	_	0.06	1.26
			2009-2010	104	314	6.4	53.3	0.06	0.89	10.1	36.0	-	-	0.06	0.43
8	Bhatpalli	Indravati	2007-2008	168	326	5.7	43.3	0.25	0.89	7.7	37.9	-	-	0.14	3.50
			2008-2009	183	343	9.9	71.0	0.28	1.01	5.3	31.2	_	_	0.08	1.68
			2009-2010	183	351	8.5	41.2	0.46	0.89	7.7	22.1	-	-	0.07	0.73
9	Bamni	Wardha	2007-2008	93	381	4.3	62.5	0.25	0.72	12.5	55.2	-	-	0.14	5.89
			2008-2009	110	598	17.0	738.4	0.28	1.50	20.6	68.2	_	_	0.14	3.92
			2009-2010	99	486	19.2	458.7	0.23	0.89	11.0	65.3	-	-	0.14	1.96
10	P.G. Bridge	Penganga	2007-2008	137	259	2.8	27.0	0.00	1.12	5.3	25.4	-	-	0.14	7.29
			2008-2009	126	223	6.4	31.2	0.00	0.70	9.9	28.3	_	_	0.11	0.28
			2009-2010	66	218	5.0	17.0	0.10	0.61	5.3	11.5	-	-	0.13	0.14

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

V Basin : Godavari

Sl. No.	Site Name	Name of the River/ Stream	Years	Bicarbonate (HCO3)		Chloride (CL)		Fluoride (F)		Sulphate (SO4)		Sulphite		Nitrate (NO3-N)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(29)	(30)	(31)	(32)	(33)	(34)	(35)	(36)	(37)	(38)	(39)	(40)
11	Nandgaon	Wunna	2007-2008	135	214	9.2	38.3	0.00	0.61	6.7	32.6	-	-	0.14	6.03
			2008-2009	123	305	12.1	105.1	0.09	0.70	11.0	41.8	_	_	0.10	0.42
			2009-2010	159	250	10.7	67.5	0.23	0.61	10.1	24.5	-	-	0.11	0.38
12	Hivra	Wardha	2007-2008	86	310	5.7	23.4	0.00	0.49	7.2	1104.0	-	-	0.14	4.34
			2008-2009	110	362	6.4	32.7	0.09	0.87	11.0	34.1	_	_	0.0	0.31
			2009-2010	134	183	11.4	35.5	0.29	0.61	12.5	16.8	-	-	0.14	0.28
13	Ashti	Wainganga	2007-2008	32	182	2.8	26.3	0.00	0.53	6.2	22.6	-	-	0.14	1.12
			2008-2009	18	217	2.1	36.2	0.00	0.86	4.8	19.2	_	_	0.06	0.42
			2009-2010	74	154	3.6	49.0	0.10	0.89	4.3	14.9	-	-	0.00	0.42
14	Pauni	Wainganga	2007-2008	82	259	6.4	71.0	0.00	0.72	4.8	25.9	-	-	0.14	1.96
			2008-2009	79	221	5.7	46.2	0.00	0.82	4.3	29.8	_	_	0.06	1.26
			2009-2010	107	209	6.4	62.5	0.06	1.16	6.2	17.3	-	-	0.14	0.70
15	Satrapur	Kanhan	2007-2008	117	219	5.0	61.8	0.00	0.63	12.0	35.0	-	-	0.14	2.52
			2008-2009	118	259	4.3	106.5	0.09	0.91	11.5	53.3	_	_	0.14	0.81
			2009-2010	107	234	12.1	80.9	0.10	0.86	19.7	55.2	-	-	0.00	0.98
16	Mancherial	Godavari	2007-2008	120	284	27.0	51.0	0.71	1.64	19.0	35.0	-	-	0.09	1.35
			2008-2009	170	235	37.0	64.0	0.67	1.09	18.0	37	_	_	0.05	1.61
			2009-2010	139	246	24.1	69.6	0.51	1.10	12.6	31.2			0.02	0.77
17	Gandlapet	Peddavagu	2007-2008	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A
			2008-2009	<---------- No Flow in the River ---------->											
			2009-2010	<---------- No Flow in the River ---------->											
18	Saigaon	Manjira	2007-2008	72	105	19.9	40.0	0.22	0.51	14.0	17.0	-	-	0.65	2.22
			2008-2009	49	191	11.0	40.7	0.31	0.39	8.0	25.0	_	_	1.00	1.17
			2009-2010	43	116	9.2	36.1	0.11	0.44	8.9	22.2	-	-	0.10	0.86
19	Dhalegaon	Godavari	2007-2008	90	267	54.0	74.0	0.31	0.60	37.0	103.0	-	-	0.44	1.68
			2008-2009	<---------- No Flow in the River ---------->											
			2009-2010	<---------- No Flow in the River ---------->											

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

V Basin : Godavari

Sl. No.	Site Name	Name of the River/ Stream	Years	Nitrite (NO2-N)		Phosphate		Silica (SiO2)		DO		BOD3-27		Total Coliform (no.per 10 ml)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(41)	(42)	(43)	(44)	(45)	(46)	(47)	(48)	(49)	(50)	(51)	(52)
1	Polavaram	Godavari	2007-2008	0.00	0.07	0.001	0.344	5.0	21.2	4.7	6.9	0.2	1.2	-	-
			2008-2009	0.00	0.18	0.000	0.070	9.7	20.1	5.0	7.1	0.4	1.1	-	-
			2009-2010	0.00	0.09	0.000	0.024	4.8	19.6	4.6	7.3	0.1	1.3	-	-
2	Bhadrachelam	Godavari	2007-2008	0.00	0.09	0.001	0.469	11.9	25.4	4.6	8.6	0.2	1.4	-	-
			2008-2009	0.00	0.21	0.000	0.015	8.8	20.4	5.3	6.6	0.2	1.3	-	-
			2009-2010	0.00	0.10	0.000	0.118	5.1	23.4	5.0	7.2	0.2	1.6	-	-
3	Konta	Sabari	2007-2008	0.00	0.07	0.001	0.312	0.9	32.0	4.3	7.2	0.2	1.2	-	-
			2008-2009	0.00	0.18	0.000	0.070	11.6	17.6	5.5	7.2	0.2	0.9	-	-
			2009-2010	0.00	0.09	0.000	0.040	4.7	16.7	5.3	7.6	0.2	1.0	-	-
4	Perur	Godavari	2007-2008	0.00	0.21	0.001	0.460	9.6	26.6	4.1	7.2	0.1	1.6	-	-
			2008-2009	0.00	0.19	0.000	0.054	10.7	29.8	5.1	6.9	0.2	1.3	-	-
			2009-2010	0.00	0.08	0.000	0.026	5.0	24.3	4.6	7.4	0.2	1.4	-	-
5	Pathagudem	Indravati	2007-2008	0.00	0.06	0.001	0.540	4.3	17.0	4.7	7.9	0.2	1.5	-	-
			2008-2009	0.00	0.22	0.000	0.023	10.7	18.4	5.5	6.7	0.2	0.8	-	-
			2009-2010	0.00	0.02	0.000	0.140	5.3	21.9	4.6	7.8	0.2	1.0	-	-
6	Jagdalpur	Indravati	2007-2008	0.00	0.08	0.001	0.428	5.0	28.6	4.2	7.9	0.2	1.1	-	-
			2008-2009	0.00	0.19	0.000	0.055	8.1	19.3	5.1	6.9	0.2	1.4	-	-
			2009-2010	0.00	0.10	0.005	0.123	5.6	18.4	5.2	8.3	0.2	1.8	-	-
7	Tekra	Pranhita	2007-2008	0.00	0.14	0.031	0.620	21.0	42.9	6.3	8.2	0.7	2.9	-	-
			2008-2009	0.00	0.40	0.000	0.238	15.6	102.0	6.2	8.1	0.4	2.2	-	-
			2009-2010	0.00	0.12	0.000	0.083	12.5	164.4	6.2	8.4	0.8	2.4	-	-
8	Bhatpalli	Indravati	2007-2008	0.01	0.29	0.021	0.641	29.4	61.2	6.3	9.0	0.5	2.8	-	-
			2008-2009	0.00	0.63	0.010	0.145	18.3	150.0	5.7	9.4	1.0	3.1	-	-
			2009-2010	0.00	0.18	0.000	1.447	5.8	200.0	6.1	8.3	0.4	4.3	-	-
9	Bamni	Wardha	2007-2008	0.01	0.29	0.031	0.196	13.5	64.5	1.0	7.1	0.4	60.0	-	-
			2008-2009	0.00	1.17	0.021	1.085	12.3	132.6	0.0	7.2	0.8	130.0	-	-
			2009-2010	0.00	0.29	0.000	0.061	17.4	131.7	0.0	6.0	1.6	85.0	-	-
10	P.G. Bridge	Penganga	2007-2008	0.00	0.48	0.010	0.062	24.0	54.0	5.0	8.5	0.2	8.0	-	-
			2008-2009	0.0	0.37	0.021	0.103	28.8	47.4	6.2	7.8	1.1	2.4	-	-
			2009-2010	0.01	0.15	0.021	0.083	48.3	124.5	6.0	8.9	1.3	2.4	-	-

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

V Basin : Godavari

Sl. No.	Site Name	Name of the River/ Stream	Years	Nitrite (NO2-N)		Phosphate		Silica (SiO2)		DO		BOD3-27		Total Coliform (no.per 10 ml)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(41)	(42)	(43)	(44)	(45)	(46)	(47)	(48)	(49)	(50)	(51)	(52)
11	Nandgaon	Wunna	2007-2008	0.01	0.22	0.021	0.093	20.7	62.4	2.3	8.4	1.0	50.0	-	-
			2008-2009	0.00	0.12	0.021	0.248	21.2	86.7	3.2	8.4	0.7	15.0	-	-
			2009-2010	0.00	0.52	0.010	0.155	27.7	92.1	4.4	7.2	0.9	30.0	-	-
12	Hivra	Wardha	2007-2008	0.01	0.19	0.021	0.155	21.0	57.0	6.2	8.7	0.9	3.7	-	-
			2008-2009	0.01	0.06	0.000	0.134	19.2	48.6	4.0	7.5	0.7	70.0	-	-
			2009-2010	0.01	0.01	0.021	0.041	22.5	60.6	2.6	6.0	2.5	9.0	-	-
13	Ashti	Wainganga	2007-2008	0.00	0.39	0.010	0.052	14.7	70.6	5.9	8.0	0.5	4.0	-	-
			2008-2009	0.0	0.32	0.031	0.072	13.5	67.2	6.0	8.0	1.0	2.5	-	-
			2009-2010	0.00	0.11	0.010	0.072	8.7	107.4	6.0	8.4	0.8	1.6	-	-
14	Pauni	Wainganga	2007-2008	0.01	0.87	0.021	0.269	18.9	39.9	5.4	7.8	0.7	15.0	-	-
			2008-2009	0.00	0.58	0.011	0.413	20.1	74.1	5.5	7.5	1.3	5.4	-	-
			2009-2010	0.00	0.18	0.041	0.424	2.5	121.8	4.0	8.5	1.4	7.2	-	-
15	Satrapur	Kanhan	2007-2008	0.01	0.12	0.010	0.062	15.9	45.0	6.6	9.4	0.7	4.8	-	-
			2008-2009	0.00	0.18	0.010	0.083	18.3	89.7	6.5	8.9	0.9	2.9	-	-
			2009-2010	0.00	2.06	0.000	0.300	19.8	155.9	3.5	9.0	1.3	11.4	-	-
16	Mancherial	Godavari	2007-2008	0.00	0.11	0.001	0.360	13.0	33.8	4.6	7.8	0.2	1.4	-	-
			2008-2009	0.003	0.234	0.000	0.011	8.23	23.1	4.9	6.7	0.2	2.0	-	-
			2009-2010	0.00	0.07	0.005	0.040	6.3	27.9	3.5	7.5	0.1	1.0	-	-
17	Gandlapet	Peddavagu	2007-2008	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A	-	-
			2008-2009	<---------- No Flow in the River ---------->											
			2009-2010	<---------- No Flow in the River ---------->											
18	Saigaon	Manjira	2007-2008	0.00	0.06	0.004	0.086	7.8	19.0	4.1	6.8	0.2	2.0	-	-
			2008-2009	0.10	0.24	0.004	0.008	9.6	12.8	5.3	5.9	0.4	1.6	-	-
			2009-2010	0.01	0.14	0.000	0.024	6.1	16.2	5.6	5.8	0.2	0.7	-	-
19	Dhalegaon	Godavari	2007-2008	0.01	0.15	0.028	0.066	15.5	29.1	4.7	6.9	0.2	1.2	-	-
			2008-2009	<---------- No Flow in the River ---------->											
			2009-2010	<---------- No Flow in the River ---------->											

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

V Basin : Godavari

Sl. No.	Site Name	Name of the River/ Stream	Years	Faecal Coliform (no.per 10 ml)		Total plate count (no.per 10 ml)		Phytoplankton (no.per ml)		Zooplankton (no.per litre)		Arsenic (ppm)		Boron (ppm)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(53)	(54)	(55)	(56)	(57)	(58)	(59)	(60)	(61)	(62)	(63)	(64)
1	Polavaram	Godavari	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
2	Bhadrachelam	Godavari	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
3	Konta	Sabari	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
4	Perur	Godavari	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
5	Pathagudem	Indravati	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
6	Jagdalpur	Indravati	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
7	Tekra	Pranhita	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
8	Bhatpalli	Indravati	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
9	Bamni	Wardha	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
10	P.G. Bridge	Penganga	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

V Basin : Godavari

Sl. No.	Site Name	Name of the River/ Stream	Years	Faecal Coliform (no.per 10 ml)		Total plate count (no.per 10 ml)		Phytoplankton (no.per ml)		Zooplankton (no.per litre)		Arsenic (ppm)		Boron (ppm)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(53)	(54)	(55)	(56)	(57)	(58)	(59)	(60)	(61)	(62)	(63)	(64)
11	Nandgaon	Wunna	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
12	Hivra	Wardha	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
13	Ashti	Wainganga	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
14	Pauni	Wainganga	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
15	Satrapur	Kanhan	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
16	Mancherial	Godavari	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
17	Gandlapet	Peddavagu	2007-2008	<---------- No Flow in the River ---------->											
			2008-2009	<---------- No Flow in the River ---------->											
			2009-2010	<---------- No Flow in the River ---------->											
18	Saigaon	Manjira	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
19	Dhalegaon	Godavari	2007-2008	<---------- No Flow in the River ---------->											
			2008-2009	<---------- No Flow in the River ---------->											
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/…

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

V Basin : Godavari

Sl. No.	Site Name	Name of the River/ Stream	Years	Cadmium (ppm)		Chromium (ppm)		Copper (ppm)		Cyanide (ppm)		Lead (ppm)		Manganese (ppm)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(65)	(66)	(67)	(68)	(69)	(70)	(71)	(72)	(73)	(74)	(75)	(76)
1	Polavaram	Godavari	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
2	Bhadrachelam	Godavari	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
3	Konta	Sabari	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
4	Perur	Godavari	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
5	Pathagudem	Indravati	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
6	Jagdalpur	Indravati	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
7	Tekra	Pranhita	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
8	Bhatpalli	Indravati	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
9	Bamni	Wardha	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
10	P.G. Bridge	Penganga	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
			2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/…

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

V Basin : Godavari

Sl. No.	Site Name	Name of the River/ Stream	Years	Cadmium (ppm)		Chromium (ppm)		Copper (ppm)		Cyanide (ppm)		Lead (ppm)		Manganese (ppm)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(65)	(66)	(67)	(68)	(69)	(70)	(71)	(72)	(73)	(74)	(75)	(76)
11	Nandgaon	Wunna	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
12	Hivra	Wardha	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
13	Ashti	Wainganga	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
14	Pauni	Wainganga	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
15	Satrapur	Kanhan	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
16	Mancherial	Godavari	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
17	Gandlapet	Peddavagu	2007-2008	<---------- No Flow in the River ---------->											
			2008-2009	<---------- No Flow in the River ---------->											
			2009-2010	<---------- No Flow in the River ---------->											
18	Saigaon	Manjira	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
19	Dhalegaon	Godavari	2007-2008	<---------- No Flow in the River ---------->											
			2008-2009	<---------- No Flow in the River ---------->											
			2009-2010	<---------- No Flow in the River ---------->											

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

V Basin : Godavari

Sl. No.	Site Name	Name of the River/ Stream	Years	Mercury (ppm)		Zinc (ppm)		Total Hardness		Sodium % (Na%)		SAR		RSC	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(77)	(78)	(79)	(80)	(81)	(82)	(83)	(84)	(85)	(86)	(87)	(88)
1	Polavaram	Godavari	2007-2008	-	-	-	-	34	91	13	59	0.3	1.8	0.0	0.7
			2008-2009	-	-	-	-	45	119	19	31	0.3	0.7	0.0	0.1
			2009-2010	-	-	-	-	40	141	15	25	0.3	0.6	0.0	0.1
2	Bhadrachelam	Godavari	2007-2008	-	-	-	-	63	157	21	55	0.5	2.0	0.0	0.8
			2008-2009	-	-	-	-	60	166	14	37	0.3	1.4	0.0	0.3
			2009-2010	-	-	-	-	40	169	16	42	0.3	1.7	0.0	0.5
3	Konta	Sabari	2007-2008	-	-	-	-	30	76	13	68	0.2	2.5	0.0	0.5
			2008-2009	-	-	-	-	40	66	13	34	0.3	0.8	0.0	0.2
			2009-2010	-	-	-	-	36	104	9	17	0.2	0.3	0.0	0.1
4	Perur	Godavari	2007-2008	-	-	-	-	41	141	17	54	0.4	1.8	0.0	0.7
			2008-2009	-	-	-	-	35	75	22	42	0.5	1.6	0.0	0.2
			2009-2010	-	-	-	-	28	162	15	40	0.3	1.7	0.0	0.5
5	Pathagudem	Indravati	2007-2008	-	-	-	-	29	97	14	36	0.3	0.8	0.0	0.3
			2008-2009	-	-	-	-	38	87	12	20	0.3	0.4	0.0	0.1
			2009-2010	-	-	-	-	32	96	6	21	0.1	0.5	0.0	0.4
6	Jagdalpur	Indravati	2007-2008	-	-	-	-	33	181	8	56	0.2	1.6	0.0	0.4
			2008-2009	-	-	-	-	48	170	6	16	0.2	0.3	0.0	0.1
			2009-2010	-	-	-	-	40	149	6	17	0.2	0.3	0.0	0.2
7	Tekra	Pranhita	2007-2008	-	-	-	-	49	163	10	52	0.2	2.5	0.0	1.2
			2008-2009	-	-	-	-	82	211	11	50	0.2	2.4	0.0	1.4
			2009-2010	-	-	-	-	102	213	7	49	0.2	2.5	0.0	1.1
8	Bhatpalli	Indravati	2007-2008	-	-	-	-	128	202	10	50	0.3	2.6	0.0	2.8
			2008-2009	-	-	-	-	140	220	21	47	0.6	2.6	0.0	2.0
			2009-2010	-	-	-	-	117	285	13	53	0.4	2.5	0.0	2.0
9	Bamni	Wardha	2007-2008	-	-	-	-	87	225	11	51	0.3	3.4	0.0	2.3
			2008-2009	-	-	-	-	103	876	14	51	0.5	4.2	0.0	2.3
			2009-2010	-	-	-	-	58	782	7	51	0.4	3.4	0.0	0.5
10	P.G. Bridge	Penganga	2007-2008	-	-	-	-	108	197	8	48	0.2	2.3	0.0	1.6
			2008-2009	-	-	-	-	97	181	17	32	0.4	1.3	0.0	0.6
			2009-2010	-	-	-	-	43	190	11	40	0.2	0.9	0.0	0.2

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

V Basin : Godavari

Sl. No.	Site Name	Name of the River/ Stream	Years	Mercury (ppm)		Zinc (ppm)		Total Hardness		Sodium % (Na%)		SAR		RSC	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(77)	(78)	(79)	(80)	(81)	(82)	(83)	(84)	(85)	(86)	(87)	(88)
11	Nandgaon	Wunna	2007-2008	-	-	-	-	119	189	11	42	0.3	1.8	0.0	0.8
			2008-2009	-	-	-	-	106	236	15	47	0.4	2.5	0.0	0.6
			2009-2010	-	-	-	-	134	202	13	35	0.4	1.4	0.0	0.3
12	Hivra	Wardha	2007-2008	-	-	-	-	78	209	12	49	0.2	2.5	0.0	1.9
			2008-2009	-	-	-	-	85	168	29	56	0.8	3.3	0.1	2.9
			2009-2010	-	-	-	-	95	132	38	42	1.2	1.7	0.4	0.4
13	Ashti	Wainganga	2007-2008	-	-	-	-	40	132	8	45	0.2	1.5	0.0	0.8
			2008-2009	-	-	-	-	33	176	10	63	0.1	3.0	0.0	1.6
			2009-2010	-	-	-	-	75	134	12	54	0.2	2.5	0.0	0.8
14	Pauni	Wainganga	2007-2008	-	-	-	-	76	213	9	37	0.2	1.7	0.0	0.5
			2008-2009	-	-	-	-	83	160	11	58	0.2	3.0	0.0	1.5
			2009-2010	-	-	-	-	94	180	11	49	0.2	2.3	0.0	0.9
15	Satrapur	Kanhan	2007-2008	-	-	-	-	101	203	8	41	0.2	1.9	0.0	0.4
			2008-2009	-	-	-	-	92	255	17	60	0.4	3.0	0.0	1.3
			2009-2010	-	-	-	-	107	233	14	39	0.4	1.7	0.0	0.1
16	Mancherial	Godavari	2007-2008	-	-	-	-	129	212	30	47	1.2	2.3	0.0	1.3
			2008-2009	-	-	-	-	159	205	24	38	0.9	1.6	0.0	0.5
			2009-2010	-	-	-	-	113	246	24	39	0.7	1.7	0.0	0.4
17	Gandlapet	Peddavagu	2007-2008	<---------- No Flow in the River ---------->											
			2008-2009	<---------- No Flow in the River ---------->											
			2009-2010	<---------- No Flow in the River ---------->											
18	Saigaon	Manjira	2007-2008	-	-	-	-	91	131	22	29	0.5	0.9	0.0	0.0
			2008-2009	-	-	-	-	54	191	21	24	0.4	0.9	0.0	0.0
			2009-2010	-	-	-	-	48	126	21	27	0.4	0.9	0.0	0
19	Dhalegaon	Godavari	2007-2008	-	-	-	-	124	231	34	47	1.4	2.5	0.0	0.0
			2008-2009	<---------- No Flow in the River ---------->											
			2009-2010	<---------- No Flow in the River ---------->											

Source: Water Quality Year Book for the period of 2007-2008 to 2009-2010.

Note : 1. All the ionic concentrations are expressed in mg./lit. unless mentioned otherwise.

2. (-) indicate that analyis of a particular parameter has not been carried out.

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

VI Basin : Krishna

Sl. No.	Site Name	Name of the River/ Stream	Ywars	Q (Cumecs)		Temperature °C		pH		Sp.Conductance		Potassium (K+)		Sodium (Na)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
1	Vijayawada	Krishna	2007-2008	0.431	14590	25.0	28.0	8.0	8.6	-	-	2.6	3.7	40.0	74.0
			2008-2009	-	-	21.0	28.0	8.1	8.6	-	-	2.6	3.4	46.0	75.0
			2009-2010	23.72	27660	25.0	26.0	8.1	8.2	-	-	2.9	34	45.9	80.1
2	Keesara	Munneru	2007-2008	0.211	864.2	24.0	30.5	8.1	9.1	-	-	2.9	6.5	46.0	180.0
			2008-2009	0.000	4691	20.0	28.0	8.1	8.4	-	-	2.7	4.6	45.0	114.5
			2009-2010	0.000	1104	25.5	29.0	8.1	8.6	-	-	2.4	7.0	37.1	116.2
3	Paleru Bridge	Paleru	2007-2008	-	-	25.0	30.0	7.1	8.2	-	-	1.4	7.1	45.0	85.0
			2008-2009	-	-	21.0	28.0	6.8	8.2	-	-	2.0	4.5	41.0	145.0
			2009-2010	-	-	24.0	28.0	7.2	8.2	-	-	2.0	6.5	49.3	79.3
4	Wadenapally	Krishna	2007-2008	16.27	15956	24.0	32.0	7.1	8.4	-	-	2.0	4.6	39.0	87.0
			2008-2009	9.436	8408	25.0	29.0	7.2	8.4	-	-	2.0	4.3	45.0	90.0
			2009-2010	7.808	31803	23.5	28.5	5.8	8.9	-	-	1.9	3.3	42.0	73.2
5	Dameracherla	Musi	2007-2008	0.000	353.8	20.0	28.5	7.6	8.5	-	-	1.2	4.7	72.0	185.0
			2008-2009	0.827	1327	20.0	26.0	7.9	8.3	-	-	1.6	7.1	59.0	175.0
			2009-2010	-	-	24.0	31.0	7.9	8.7	-	-	1.6	9.1	53.3	178.5
6	Halia	Halia	2007-2008	0.280	524.3	18.0	29.0	8.0	8.9	-	-	3.3	48.0	80.0	185.0
			2008-2009	0.000	535.1	21.0	28.0	8.0	8.4	-	-	2.4	5.1	79.5	145.0
			2009-2010	-	-	21.5	29.0	7.9	8.6	-	-	2.3	4.5	36.4	142.0
7	Bawapuram	Tungabhadra	2007-2008	0.666	8101	21.0	24.0	7.8	8.9	-	-	3.0	6.2	44.0	200.0
			2008-2009	0.000	6397	22.0	25.0	8.0	8.7	-	-	1.2	14.2	4.7	417.0
			2009-2010	-	-	21.0	24.5	7.8	9.2	-	-	2.2	5.7	22.8	184.2
8	T.Rampuram	Hagari	2007-2008	0.000	1809	25.0	28.0	7.8	8.3	-	-	3.9	7.1	160.0	420.0
			2008-2009	0.000	1433	25.0	27.0	7.9	8.3	-	-	1.8	6.4	78.0	320.0
			2009-2010	0.000	3692	25.0	27.0	7.9	8.5	-	-	3.0	6.5	94.2	316.5
9	Kellodu	Vedavati	2007-2008	0.000	1.570	24.5	24.5	8.2	8.2	-	-	3.1	3.1	25.8	25.8
			2008-2009	<---------- Water Samples not collected due to no flow on the specific date of collection of samples for analysis ---------->											
			2009-2010	0.000	117.2	22.5	24.5	8.0	8.2	-	-	4.2	5.7	69.8	123.1

Contd/…

10	Hoovinahahole	Swarnamukhi	2007-2008	<---------- Site not available ---------->												
			2008-2009	0.000	75.85	28.0	28.0	8.2	8.2	-	-	3.5	3.5	95.0	95.0
			2009-2010	0.000	67.38	23.5	28.0	8.0	8.1	-	-	1.7	2.8	140.5	322
11	Marol	Varada	2007-2008	0.000	1540	25.5	26.0	7.6	8.0	-	-	0.4	4.7	3.8	68.5
			2008-2009	0.000	13176	25.0	26.5	7.8	8.1	-	-	0.8	3.9	9.2	50.9
			2009-2010	0.000	1076	23.0	24.5	7.4	8.0	-	-	1.0	3.5	4.3	69.5
12	Harlahalli	Tungabhadra	2007-2008	0.000	5239	24.0	26.6	7.2	8.2	-	-	0.2	2.7	13.7	55.2
			2008-2009	0.000	4550	24.5	26.0	7.6	8.3	-	-	1.3	3.9	9.5	48.3
			2009-2010	0.000	3629	25.0	26.0	7.4	8.1	-	-	1.6	5.0	13.9	62.7
13	Byaladahalli	Haridra	2007-2008	0.000	99.30	27.0	27.0	7.8	7.8	-	-	7.0	7.0	52.0	52.0
			2008-2009	0.000	104.3	24.5	26.5	7.8	8.2	-	-	2.3	6.1	42.3	78.2
			2009-2010	0.000	167.8	22.3	27.0	7.6	8.2	-	-	3.5	5.8	37.3	94.4
14	Kuppelur	Kumudavathi	2007-2008	0.000	776.3	27.0	27.0	8.2	8.2	-	-	4.7	4.7	42.5	42.5
			2008-2009	0.000	509.7	23.0	27.0	7.9	8.1	-	-	2.3	3.5	10.2	26.2
			2009-2010	0.000	394.1	24.5	26.5	7.8	8.2	-	-	2.1	4.3	13.8	40.5
15	Honnali	Tungabhadra	2007-2008	3.444	5361	32.0	32.0	7.0	7.0	-	-	2.3	2.3	15.6	15.6
			2008-2009	0.576	6732	25.0	30.5	7.2	8.1	-	-	1.2	3.5	7.1	17.0
			2009-2010	10.87	3651	25.5	28.2	7.3	8.0	-	-	1.2	3.5	4.9	18.7

Contd/…

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

VI Basin : Krishna

Sl. No.	Site Name	Name of the River/ Stream	Ywars	Q (Cumecs)		Temperature °C		pH		Sp.Conductance		Potassium (K+)		Sodium (Na)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
16	Shimoga	Tunga	2007-2008	0.000	2563	23.0	33.0	7.4	8.2	-	-	0.4	8.2	4.1	17.5
			2008-2009	0.000	3069	22.0	29.5	7.5	7.7	-	-	0.6	3.9	2.9	11.5
			2009-2010	0.000	3688	24.5	26.0	7.3	8.2	-	-	0.7	1.1	3.2	4.1
17	Holehonnur	Bhadra	2007-2008	5.273	1176	21.5	28.0	7.2	8.2	-	-	0.8	4.7	8.1	44.2
			2008-2009	0.000	1758	22.5	26.5	7.2	8.0	-	-	1.2	3.8	8.7	43
			2009-2010	0.846	1114	22.0	25.5	7.4	7.8	-	-	1.0	3.5	3.1	23.7
18	Yadgir	Bhima	2007-2008	0.000	3177	24.5	26.0	8.1	8.4	-	-	3.6	56.0	74.0	133.0
			2008-2009	0.000	3189	26.0	27.0	8.0	8.5	-	-	2.1	3.2	42.3	67.1
			2009-2010	0.000	7980	23.0	26.0	8.1	8.6	-	-	2.5	3.6	35.0	100.4
19	Malkhed	Kanga	2007-2008	0.000	922.7	21.0	30.0	7.9	8.2	-	-	3.2	4.7	30.0	50.0
			2008-2009	0.000	1499	25.0	30.0	7.9	8.3	-	-	2.2	4.0	31.0	62.0
			2009-2010	0.000	1254	19.0	27.0	7.9	8.4	-	-	2.8	4.1	24.4	46.7
20	Takali	Bhima	2007-2008	0.000	2303	26.0	27.0	8.1	8.5	-	-	0.1	2.0	16.2	65.0
			2008-2009	<---------- Water Samples not collected due to no flow on the specific date of collection of samples for analysis ---------->											
			2009-2010	0.000	3669	24.0	29.0	7.4	8.2	-	-	0.2	0.8	40.0	85.0
21	Phulgaon	Bhima	2007-2008	0.000	1256	22.0	25.0	7.5	8.1	-	-	0.1	8.0	5.9	10.9
			2008-2009	0.000	1725	22.0	25.0	7.5	7.9	-	-	1.0	1.3	3.9	10.0
			2009-2010	0.000	459.9	22.0	23.5	7.6	7.8	-	-	0.1	0.2	7.7	8.8
22	Cholachagudda	Malaprabha	2007-2008	0.000	2181	22.0	24.5	7.7	8.5	-	-	0.1	40.9	15.0	100.0
			2008-2009	0.000	356.7	22.0	23.5	7.5	8.4	-	-	0.4	5.7	16.7	110.0
			2009-2010	0.000	2752	17.0	23.5	7.0	8.4	-	-	0.3	15.7	36.8	149.0
23	Kurundwad	Krishna	2007-2008	0.000	5673	22.5	25.0	7.7	7.8	-	-	0.1	8.0	6.5	21.1
			2008-2009	0.000	5743	24.0	27.0	7.5	8.2	-	-	0.5	2.0	3.1	16.3
			2009-2010	0.000	3782	25.0	25.0	7.5	7.5	-	-	0.1	0.3	8.0	16.5
24	Karad	Krishna	2007-2008	0.000	3868	19.0	24.0	7.4	8.4	-	-	0.1	1.0	3.2	13.2
			2008-2009	4.620	2884	20.5	24.0	7.3	8.1	-	-	0.5	3.0	5.2	11.1
			2009-2010	0.000	1258	22.5	24.5	7.3	8.2	-	-	0.1	2.2	3.8	18.0

Contd/---

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

VI Basin : Krishna

Sl. No.	Site Name	Name of the River/ Stream	Ywars	Calcium (Ca++)		Magnesium (Mg)		Aluminium (AL+++)		Ferric ion (Fe+++)		Ammonia(NH4)		Carbonate(CO3--)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)	(25)	(26)	(27)	(28)
1	Vijayawada	Krishna	2007-2008	30	46	10.0	21.0	-	-	0.0	0.0	0.05	0.05	0.0	24.0
			2008-2009	30	64	1.9	16.5	-	-	0.0	0.0	0.05	0.05	0.0	9.6
			2009-2010	26	47	15.5	19.4	-	-	0.0	0.0	0.00	0.00	0.0	0.0
2	Keesara	Munneru	2007-2008	29	37	17.0	23.0	-	-	0.0	0.0	0.05	0.05	0.0	38.0
			2008-2009	22	66	1.9	18.5	-	-	0.0	0.0	0.05	0.05	0.0	9.6
			2009-2010	22	37	6.8	23.3	-	-	0.0	0.0	0.00	0.00	0.0	9.6
3	Paleru Bridge	Paleru	2007-2008	40	62	14.0	34.0	-	-	0.0	0.0	0.05	0.05	0.0	0.0
			2008-2009	45	130	6.8	44.7	-	-	0.0	0.0	0.01	0.01	0.0	0.0
			2009-2010	40	66	19.4	33.0	-	-	0.0	0.0	0.00	0.00	0.0	0.0
4	Wadenapally	Krishna	2007-2008	27	64	10.0	22.0	-	-	0.0	0.0	0.05	0.05	0.0	14.0
			2008-2009	34	62	5.8	23.3	-	-	0.0	0.0	0.05	0.05	0.0	9.6
			2009-2010	35	58	5.8	24.2	-	-	0.0	0.0	0.00	0.00	0.0	9.6
5	Dameracherla	Musi	2007-2008	43	64	14.0	35.0	-	-	0.0	0.0	0.05	0.05	0.0	10.0
			2008-2009	40	77	3.9	42.8	-	-	0.0	0.0	0.05	0.05	0.0	9.6
			2009-2010	24	63	14.6	27.2	-	-	0.0	0.0	0.00	0.00	0.0	9.6
6	Halia	Halia	2007-2008	30	56	14.0	22.0	-	-	0.0	0.0	0.05	0.05	0.0	24.0
			2008-2009	32	58	4.9	18.5	-	-	0.0	0.0	0.05	0.05	0.0	9.6
			2009-2010	32	43	12.6	32.1	-	-	0.0	0.0	0.00	0.00	0.0	9.6
7	Bawapuram	Tungabhadra	2007-2008	27	61	7.0	23.0	-	-	0.0	0.0	0.05	0.05	0.0	19.0
			2008-2009	34	66	1.0	26.2	-	-	0.0	0.0	0.05	0.05	0.0	9.6
			2009-2010	22	61	4.9	24.3	-	-	0.0	0.0	0.00	0.00	0.0	14.4
8	T.Rampuram	Hagari	2007-2008	43	107	13.0	52.0	-	-	0.0	0.0	0.05	0.05	0.0	24.0
			2008-2009	38	78	2.9	33.0	-	-	0.0	0.0	0.05	0.05	0.0	14.4
			2009-2010	34	79	8.7	36.0	-	-	0.0	0.0	0.00	0.00	0.0	9.6
9	Kellodu	Vedavati	2007-2008	6	6	3.9	3.9	-	-	0.4	0.4	-	-	0.0	0.0
			2008-2009	<---------- Water Samples not collected due to no flow on the specific date of collection of samples for analysis ---------->											
			2009-2010	32	45	17.5	27.2	-	-	0.0	0.1	-	-	0.0	0.0

Contd/..

10	Hoovinahahole	Swarnamukhi	2007-2008	<---------- Site not available ---------->												
			2008-2009	34	34	17.5	17.5	-	-	0.1	0.1	-	-	0.0	0.0
			2009-2010	29	34	17.5	28.2	-	-	0.0	0.0	-	-	0.0	0.0
11	Marol	Varada	2007-2008	6	36	2.7	12.4	-	-	0.0	0.2	-	-	0.0	0.0
			2008-2009	10	50	4.9	8.7	-	-	0.1	0.1	-	-	0.0	0.0
			2009-2010	6	38	2.9	13.6	-	-	0.0	0.5	-	-	0.0	0.0
12	Harlahalli	Tungabhadra	2007-2008	10	32	3.5	11.9	-	-	0.0	1.1	-	-	0.0	0.0
			2008-2009	6	27	3.9	10.7	-	-	0.1	0.1	-	-	0.0	0.0
			2009-2010	11	27	3.9	12.6	-	-	0.0	0.1	-	-	0.0	0.0
13	Byaladahalli	Haridra	2007-2008	44	44	24.5	24.5	-	-	0.1	0.1	-	-	0.0	0.0
			2008-2009	29	42	4.9	20.4	-	-	0.1	0.1	-	-	0.0	0.0
			2009-2010	27	14	11.7	18.5	-	-	0.0	0.1	-	-	0.0	0.0
14	Kuppelur	Kumudavathi	2007-2008	28	28	10.9	10.9	-	-	0.0	0.0	-	-	0.0	0.0
			2008-2009	26	35	5.8	13.6	-	-	0.1	0.1	-	-	0.0	0.0
			2009-2010	21	42	6.8	16.5	-	-	0.1	0.5	-	-	0.0	0.0
15	Honnali	Tungabhadra	2007-2008	17	17	6.2	6.2	-	-	0.0	0.0	-	-	0.0	0.0
			2008-2009	10	40	2.9	8.7	-	-	0.1	0.2	-	-	0.0	0.0
			2009-2010	6	21	3.9	8.7	-	-	0.1	0.3	-	-	0.0	0.0

Contd/…

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

VI Basin : Krishna

Sl. No.	Site Name	Name of the River/ Stream	Ywars	Calcium (Ca++)		Magnesium (Mg)		Aluminium (AL+++)		Ferric ion (Fe+++)		Ammonia(NH4)		Carbonate(CO3--)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)	(25)	(26)	(27)	(28)
16	Shimoga	Tunga	2007-2008	6	20	3.2	13.6	-	-	0.0	0.1	-	-	0.0	0.0
			2008-2009	3	10	1.9	3.9	-	-	0.1	0.1	-	-	0.0	0.0
			2009-2010	3	8	2.9	2.9	-	-	0.1	0.2	-	-	0.0	0.0
17	Holehonnur	Bhadra	2007-2008	9	20	3.9	8.0	-	-	0.1	0.5	-	-	0.0	0.0
			2008-2009	10	22	3.9	11.7	-	-	0.2	0.3	-	-	0.0	0.0
			2009-2010	5	21	2.9	8.7	-	-	0.0	0.6	0.00	0.00	0.0	0.0
18	Yadgir	Bhima	2007-2008	40	51	18.0	22.0	-	-	0.0	0.0	0.05	0.05	0.0	14.0
			2008-2009	37	51	6.8	10.7	-	-	0.0	0.0	0.05	0.05	0.0	9.6
			2009-2010	32	53	13.6	31.1	-	-	0.0	0.0	0.00	0.00	0.0	9.6
19	Malkhed	Kanga	2007-2008	32	74	17.0	25.0	-	-	0.0	0.0	0.05	0.05	0.0	0.0
			2008-2009	37	56	13.6	20.4	-	-	0.0	0.0	0.05	0.05	0.0	4.8
			2009-2010	27	40	12.6	20.4	-	-	0.0	0.0	0.00	0.00	0.0	9.6
20	Takali	Bhima	2007-2008	10	22	26.5	41.5	-	-	0.0	0.6	-	-	0.0	2.4
			2008-2009	<---------- Water Samples not collected due to no flow on the specific date of collection of samples for analysis ---------->											
			2009-2010	17	67	9.7	15.3	-	-	0.1	1.0	-	-	0.0	0.0
21	Phulgaon	Bhima	2007-2008	8	22	4.4	5.8	-	-	0.0	0.2	-	-	0.0	0.0
			2008-2009	16	23	4.9	13.1	-	-	0.1	0.4	-	-	0.0	0.0
			2009-2010	20	32	3.4	8.3	-	-	0.3	0.5	-	-	0.0	0.0
22	Cholachagudda	Malaprabha	2007-2008	15	55	1.2	35.0	-	-	0.3	0.5	-	-	0.0	2.4
			2008-2009	15	63	3.7	33.5	-	-	0.0	0.4	-	-	0.0	2.4
			2009-2010	10	83	6.3	28.0	-	-	0.1	1.4	-	-	0.0	0.0
23	Kurundwad	Krishna	2007-2008	13	38	1.5	9.2	-	-	0.1	0.3	-	-	0.0	0.0
			2008-2009	10	31	2.9	13.6	-	-	0.1	0.3	-	-	0.0	0.0
			2009-2010	21	37	4.4	14.1	-	-	0.0	0.4	-	-	0.0	0.0
24	Karad	Krishna	2007-2008	5	17	0.5	5.8	-	-	0.0	1.0	-	-	0.0	2.4
			2008-2009	4	35	1.0	16.0	-	-	0.0	0.6	-	-	0.0	0.0
			2009-2010	10	56	2.4	22.8	-	-	0.0	0.2	-	-	0.0	0.0

Contd/---

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

VI Basin : Krishna

Sl. No.	Site Name	Name of the River/ Stream	Ywars	Bicarbonate(HCO3--)		Chloride (CL-)		Fluoride (F-)		Sulphate (SO4-)		Sulphite (SO3)		Nitrate (NO3)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(29)	(30)	(31)	(32)	(33)	(34)	(35)	(36)	(37)	(38)	(39)	(40)
1	Vijayawada	Krishna	2007-2008	179	224	31.2	63.4	0.63	1.02	29.0	48.0	-	-	0.01	0.01
			2008-2009	190	239	48.4	57.6	0.48	0.87	42.8	54.2	-	-	0.01	0.01
			2009-2010	166	283	39.6	76.6	0.48	0.64	46.0	62.2	-	-	1.31	1.92
2	Keesara	Munneru	2007-2008	220	298	29.7	131.8	0.97	1.78	20.0	58.0	-	-	0.01	0.01
			2008-2009	176	332	38.3	209.7	0.68	1.07	27.1	59.4	-	-	0.01	0.01
			2009-2010	107	331	24.5	187.4	0.55	2.36	30.0	80.8	-	-	0.00	1.20
3	Paleru Bridge	Paleru	2007-2008	233	371	39.9	74.5	0.63	4.15	34.0	69.0	-	-	0.01	0.01
			2008-2009	264	478	41.4	153.3	0.45	1.29	36.0	261.0	-	-	0.01	0.01
			2009-2010	220	371	30.9	100.4	0.64	3.35	50.6	85.2	-	-	0.00	1.76
4	Wadenapally	Krishna	2007-2008	127	283	32.3	74.0	0.51	1.32	29.0	63.0	-	-	0.01	0.01
			2008-2009	137	307	44.4	87.4	0.05	0.89	44.8	61.8	-	-	0.01	0.01
			2009-2010	156	307	30.2	72.7	0.48	1.38	25.6	68.0	-	-	0.00	1.70
5	Dameracherla	Musi	2007-2008	229	327	52.0	125.8	0.68	2.00	35.0	185.0	-	-	0.01	0.01
			2008-2009	161	390	51.4	251.8	0.76	1.32	38.6	124.0	-	-	0.01	0.01
			2009-2010	171	322	57.2	250.3	0.64	2.62	33.4	106.0	-	-	0.00	2.09
6	Halia	Halia	2007-2008	185	386	45.0	85.8	0.86	3.90	30.0	52.0	-	-	0.01	0.01
			2008-2009	268	405	21.4	89.3	0.56	1.34	39.6	532.0	-	-	0.01	0.01
			2009-2010	176	405	29.0	96.6	0.55	2.48	49.6	62.2	-	-	0.00	1.59
7	Bawapuram	Tungabhadra	2007-2008	146	244	54.4	161.2	0.64	1.56	45.0	170.0	-	-	0.01	0.01
			2008-2009	161	254	38.3	232.9	0.23	1.34	39.8	179.2	-	-	0.01	0.01
			2009-2010	107	244	24.2	181.4	0.17	1.46	32.4	346.0	-	-	0.00	1.31
8	T.Rampuram	Hagari	2007-2008	229	322	127.2	333.2	0.80	1.84	95.0	540.0	-	-	0.01	1.70
			2008-2009	161	283	69.5	236.7	0.58	0.97	56.0	620.0	-	-	0.01	0.01
			2009-2010	142	283	83.5	362.6	0.70	1.08	131.2	588.0	-	-	0.00	2.59
9	Kellodu	Vedavati	2007-2008	35	35	33.4	33.4	0.11	0.11	12.5	12.5	-	-	0.78	0.78
			2008-2009	<---------- Water Samples not collected due to no flow on the specific date of collection of samples for analysis ---------->											
			2009-2010	272	412	53.9	93.3	0.38	0.59	9.9	23.0	-	-	0.46	1.28
10	Hoovinahahole	Swarnamukhi	2007-2008	<---------- Site not available ---------->											

Contd/..

			2008-2009	297	297	66.4	66.4	0.47	0.47	24.6	24.6	-	-	-	-
			2009-2010	319	574	88.6	252.8	0.76	1.43	19.1	35.2	-	-	1.88	2.19
11	Marol	Varada	2007-2008	22	182	5.7	78.9	0.00	0.36	0.8	25.2	-	-	0.13	1.74
			2008-2009	52	190	15.4	68.3	0.02	0.59	3.9	30.8	-	-	0.39	2.24
			2009-2010	29	188	7.8	62.8	0.02	0.55	4.3	30.0	-	-	0.55	2.16
12	Harlahalli	Tungabhadra	2007-2008	39	126	19.0	72.8	0.06	0.57	2.9	47.0	-	-	0.03	10.37
			2008-2009	33	124	13.5	47.2	0.06	0.23	7.3	43.0	-	-	0.81	1.35
			2009-2010	52	152	15.4	64.1	0.11	0.27	7.1	59.9	-	-	0.83	1.21
13	Byaladahalli	Haridra	2007-2008	243	243	71.6	71.6	0.30	0.30	13.7	13.7	-	-	1.23	1.23
			2008-2009	141	256	41.2	88.6	0.08	0.86	14.0	63.5	-	-	0.39	2.47
			2009-2010	172	280	32.7	70.0	0.48	0.84	11.4	54.0	-	-	0.45	2.58
14	Kuppelur	Kumudavathi	2007-2008	85	85	57.5	57.5	0.61	0.61	40.1	40.1	-	-	1.01	1.01
			2008-2009	71	164	19.5	43.0	0.08	0.30	4.8	19.4	-	-	0.85	1.88
			2009-2010	85	182	23.1	56.8	0.15	0.53	6.4	39.7	-	-	0.92	1.54
15	Honnali	Tungabhadra	2007-2008	77	77	21.9	21.9	0.15	0.15	3.8	3.8	-	-	0.34	0.34
			2008-2009	47	74	13.5	23.1	0.02	0.15	2.2	3.4	-	-	0.42	0.49
			2009-2010	33	100	9.6	23.1	0.04	0.19	1.6	6.2	-	-	0.63	1.28

Contd/---

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

VI Basin : Krishna

Sl. No.	Site Name	Name of the River/ Stream	Ywars	Bicarbonate(HCO3--)		Chloride (CL-)		Fluoride (F-)		Sulphate (SO4-)		Sulphite (SO3)		Nitrate (NO3)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(29)	(30)	(31)	(32)	(33)	(34)	(35)	(36)	(37)	(38)	(39)	(40)
16	Shimoga	Tunga	2007-2008	29	113	6.5	23.1	0.00	1.18	0.5	9.1	-	-	0.00	1.21
			2008-2009	14	71	3.9	13.5	0.02	0.08	1.2	3.6	-	-	0.42	0.64
			2009-2010	19	38	5.8	7.8	0.02	0.06	0.8	3.2	-	-	0.36	0.48
17	Holehonnur	Bhadra	2007-2008	41	99	10.9	57.5	0.04	0.23	2.9	27.0	-	-	0.00	1.01
			2008-2009	48	108	13.5	55.7	0.02	0.23	2.4	7.9	-	-	0.46	1.23
			2009-2010	24	90	5.8	41.2	0.04	0.19	1.5	6.3	-	-	0.52	1.39
18	Yadgir	Bhima	2007-2008	171	234	61.3	73.0	0.52	0.86	55.0	135.0	-	-	0.01	0.01
			2008-2009	181	205	30.8	63.3	0.48	0.87	46.0	68.8	-	-	0.01	0.01
			2009-2010	132	234	18.5	95.9	0.17	0.55	40.4	133.6	-	-	0.00	2.53
19	Malkhed	Kanga	2007-2008	210	417	16.3	60.5	0.68	0.88	13.0	28.0	-	-	0.01	0.01
			2008-2009	249	298	17.7	23.7	0.48	0.81	14.1	29.7	-	-	0.01	0.01
			2009-2010	171	298	9.5	26.3	0.17	1.16	16.7	32.4	-	-	0.00	2.31
20	Takali	Bhima	2007-2008	46	139	56.4	100.0	0.06	0.39	57.2	107.5	-	-	0.03	1.70
			2008-2009	<---------- Water Samples not collected due to no flow on the specific date of collection of samples for analysis ---------->											
			2009-2010	54	229	54.6	137.2	0.06	0.72	44.0	57.1	-	-	0.16	2.53
21	Phulgaon	Bhima	2007-2008	33	95	13.2	17.3	0.05	0.27	14.4	18.2	-	-	0.34	1.78
			2008-2009	68	105	7.7	13.9	0.05	0.12	2.5	17.2	-	-	0.42	2.03
			2009-2010	61	107	11.1	15.7	0.12	0.50	13.0	31.2	-	-	0.41	0.92
22	Cholachagudda	Malaprabha	2007-2008	42	227	28.2	150.9	0.19	0.97	14.6	113.2	-	-	0.01	18.03
			2008-2009	44	144	28.6	154.7	0.22	1.05	12.3	109.3	-	-	0.34	2.06
			2009-2010	29	254	59.1	282.0	0.05	0.85	25.5	89.3	-	-	0.35	3.21
23	Kurundwad	Krishna	2007-2008	37	100	11.4	40.6	0.19	0.97	13.2	41.7	-	-	0.28	0.83
			2008-2009	37	98	3.8	24.3	0.05	0.20	4.6	46.1	-	-	0.05	0.94
			2009-2010	76	132	13.3	29.1	0.09	0.32	17.2	26.0	-	-	0.18	1.56
24	Karad	Krishna	2007-2008	17	81	5.4	20.8	0.05	1.05	1.5	10.0	-	-	0.29	0.64
			2008-2009	24	205	7.7	17.8	0.05	0.80	1.0	13.0	-	-	0.01	1.36
			2009-2010	37	232	5.1	24.1	0.05	1.55	10.1	30.1	-	-	0.17	2.77

Contd/---

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

VI Basin : Krishna

Sl. No.	Site Name	Name of the River/ Stream	Ywars	Nitrite (NO_2)		Phosphate (PO_4)		Silica (SiO_3)		DO (ppm)		BOD (ppm)		Total Coliform (no.per 10 ml)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(41)	(42)	(43)	(44)	(45)	(46)	(47)	(48)	(49)	(50)	(51)	(52)
1	Vijayawada	Krishna	2007-2008	0.00	0.00	-	-	10.9	18.0	5.9	7.7	0.2	2.0	-	-
			2008-2009	0.00	0.00	-	-	11.8	21.0	4.7	8.1	0.4	2.6	-	-
			2009-2010	0.00	0.00	-	-	12.2	17.0	5.3	7.5	1.3	1.8	-	-
2	Keesara	Munneru	2007-2008	0.00	0.00	-	-	9.4	21.8	5.6	8.0	0.4	1.8	-	-
			2008-2009	0.00	0.00	-	-	3.8	16.9	4.6	7.4	0.3	1.4	-	-
			2009-2010	0.00	0.00	-	-	9.1	17.3	4.9	6.6	0.4	2.2	-	-
3	Paleru Bridge	Paleru	2007-2008	0.00	0.00	-	-	12.8	35.1	1.8	8.6	0.1	3.3	-	-
			2008-2009	0.00	0.00	-	-	16.5	45.3	1.1	6.4	0.4	1.5	-	-
			2009-2010	0.00	0.00	-	-	19.1	54.8	1.3	6.9	0.7	2.8	-	-
4	Wadenapally	Krishna	2007-2008	0.00	0.00	-	-	9.0	24.1	5.9	8.1	0.2	3.8	-	-
			2008-2009	0.00	0.00	-	-	1.0	26.7	4.7	7.1	0.3	1.8	-	-
			2009-2010	0.00	0.00	-	-	13.0	22.3	5.0	7.6	0.3	1.8	-	-
5	Dameracherla	Musi	2007-2008	0.00	0.00	-	-	10.5	31.7	4.8	7.9	0.5	3.3	-	-
			2008-2009	0.00	0.00	-	-	14.3	37.7	4.8	9.1	0.3	2.9	-	-
			2009-2010	0.00	0.00	-	-	12.2	44.4	4.6	8.2	0.3	2.0	-	-
6	Halia	Halia	2007-2008	0.00	0.01	-	-	12.4	31.7	5.8	10.0	0.1	3.0	-	-
			2008-2009	0.00	0.00	-	-	14.8	41.5	4.8	8.2	0.2	3.1	-	-
			2009-2010	0.00	0.00	-	-	13.5	24.4	5.3	7.0	0.3	1.2	-	-
7	Bawapuram	Tungabhadra	2007-2008	0.00	0.00	-	-	10.1	22.0	4.8	7.2	0.3	4.5	-	-
			2008-2009	0.00	0.00	-	-	10.5	23.1	5.3	7.1	0.6	2.8	-	-
			2009-2010	0.00	0.00	-	-	10.0	19.9	5.4	7.3	1.3	5.9	-	-
8	T.Rampuram	Hagari	2007-2008	0.00	0.00	-	-	11.6	24.2	4.8	7.1	0.8	4.5	-	-
			2008-2009	0.00	0.00	-	-	12.2	21.6	3.9	6.6	0.1	0.9	-	-
			2009-2010	0.00	0.00	0.000	0.000	8.3	21.3	5.6	6.9	0.7	1.1	-	-
9	Kellodu	Vedavati	2007-2008	0.00	0.00	0.010	0.010	12.6	12.6	-	-	-	-	-	-
			2008-2009	<---------- Water Samples not collected due to no flow on the specific date of collection of samples for analysis ---------->											
			2009-2010	0.00	0.06	0.000	0.010	17.1	23.4	-	-	-	-	-	-
10	Hoovinahahole	Swarnamukhi	2007-2008	<---------- Site not available ---------->											

Contd/..

			2008-2009	0.01	0.01	0.052	0.052	17.4	17.4	-	-	-	-	-	-
			2009-2010	0.00	0.03	0.000	0.000	26.6	30.0	-	-	-	-	-	-
11	Marol	Varada	2007-2008	0.00	0.08	0.000	0.000	9.6	16.8	-	-	-	-	-	-
			2008-2009	0.00	0.12	0.000	0.000	12.0	12.0	-	-	-	-	-	-
			2009-2010	0.01	0.10	0.000	0.041	6.4	10.5	-	-	-	-	-	-
12	Harlahalli	Tungabhadra	2007-2008	0.00	0.04	0.010	0.641	8.6	18.0	-	-	-	-	-	-
			2008-2009	0.00	0.03	0.021	0.052	10.3	13.3	-	-	-	-	-	-
			2009-2010	0.00	0.06	0.010	0.072	10.7	17.5	-	-	-	-	-	-
13	Byaladahalli	Haridra	2007-2008	0.00	0.00	0.052	0.052	38.6	38.6	-	-	-	-	-	-
			2008-2009	0.01	0.10	0.114	0.186	9.1	11.5	-	-	-	-	-	-
			2009-2010	0.00	0.00	0.031	0.434	8.7	14.8	-	-	-	-	-	-
14	Kuppelur	Kumudavathi	2007-2008	0.11	0.11	0.052	0.052	14.0	14.0	-	-	-	-	-	-
			2008-2009	0.01	0.06	0.000	0.031	10.0	11.7	-	-	-	-	-	-
			2009-2010	0.00	0.08	0.000	0.031	10.3	13.2	-	-	-	-	-	-
15	Honnali	Tungabhadra	2007-2008	0.00	0.00	0.000	0.000	12.1	12.1	-	-	-	-	-	-
			2008-2009	0.00	0.03	0.000	0.041	9.5	12.7	-	-	-	-	-	-
			2009-2010	0.00	0.06	0.000	0.279	10.1	14.7	-	-	-	-	-	-

Contd/---

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

VI Basin : Krishna

Sl. No.	Site Name	Name of the River/ Stream	Ywars	Nitrite (NO2)		Phosphate (PO4)		Silica (SiO_3)		DO (ppm)		BOD (ppm)		Total Coliform (no.per 10 ml)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(41)	(42)	(43)	(44)	(45)	(46)	(47)	(48)	(49)	(50)	(51)	(52)
16	Shimoga	Tunga	2007-2008	0.00	0.22	0.000	0.238	0.6	17.9	3.8	8.6	0.2	2.2	-	-
			2008-2009	0.00	0.17	0.031	0.217	10.8	14.0	6.4	8.2	1.1	1.9	-	-
			2009-2010	0.00	0.01	0.000	0.010	9.3	11.1	6.5	8.4	0.6	1.0	-	-
17	Holehonnur	Bhadra	2007-2008	0.00	0.08	0.000	1.157	0.3	18.6	2.4	6.0	0.5	2.3	-	-
			2008-2009	0.00	0.03	0.000	0.062	9.5	14.6	3.2	6.2	0.2	1.8	-	-
			2009-2010	0.00	0.04	0.000	0.041	9.5	14.6	4.9	7.2	0.4	2.0	-	-
18	Yadgir	Bhima	2007-2008	0.00	0.00	-	-	15.8	22.0	5.7	6.9	0.4	1.6	-	-
			2008-2009	0.00	0.00	-	-	19.0	21.7	5.5	6.4	0.8	3.1	-	-
			2009-2010	0.00	0.00	-	-	15.6	18.7	5.6	7.4	0.9	2.8	-	-
19	Malkhed	Kanga	2007-2008	0.00	0.00	-	-	17.1	23.7	5.7	7.1	0.3	3.7	-	-
			2008-2009	0.00	0.00	-	-	21.2	29.4	4.3	6.8	0.4	1.2	-	-
			2009-2010	0.00	0.00	-	-	16.1	23.5	4.3	7.4	0.1	1.3	-	-
20	Takali	Bhima	2007-2008	0.00	0.01	-	-	8.8	12.6	3.9	3.9	0.1	3.4	-	-
			2008-2009	<---------- Water Samples not collected due to no flow on the specific date of collection of samples for analysis ---------->											
			2009-2010	0.00	0.01	-	-	7.4	9.6	-	-	0.2	1.6	-	-
21	Phulgaon	Bhima	2007-2008	0.01	0.01	-	-	5.0	19.3	-	-	0.1	2.0	-	-
			2008-2009	0.01	0.01	-	-	3.8	5.5	-	-	0.9	1.7	-	-
			2009-2010	0.00	0.01	-	-	9.5	9.9	-	-	0.8	1.1	-	-
22	Cholachagudda	Malaprabha	2007-2008	0.01	0.18	-	-	0.3	16.3	6.8	7.5	0.1	1.8	-	-
			2008-2009	0.01	0.38	-	-	3.3	16.2	7.0	7.4	0.2	4.5	-	-
			2009-2010	0.00	0.01	-	-	2.7	12.1	7.0	7.8	0.3	1.1	-	-
23	Kurundwad	Krishna	2007-2008	0.01	0.01	-	-	10.0	12.7	4.7	4.7	0.1	0.5	-	-
			2008-2009	0.01	0.01	-	-	4.3	5.9	-	-	0.1	1.4	-	-
			2009-2010	0.00	0.00	-	-	7.1	11.8	5.1	8.5	0.2	1.5	-	-
24	Karad	Krishna	2007-2008	0.01	0.03	-	-	0.5	9.5	6.0	6.2	0.1	2.4	-	-
			2008-2009	0.01	0.31	-	-	2.0	13.5	3.8	6.2	0.1	3.4	-	-
			2009-2010	0.00	0.01	-	-	1.3	12.3	6.1	6.3	0.2	3.2	-	-

Contd/---

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

VI Basin : Krishna

Sl. No.	Site Name	Name of the River/ Stream	Ywars	Faecal Coliform (no.per 10 ml)		Total plate count (no.per 10 ml)		Phytoplankton (no.per ml)		Zooplankton (no.per litre)		Arsenic (ppm)		Boron (ppm)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(53)	(54)	(55)	(56)	(57)	(58)	(59)	(60)	(61)	(62)	(63)	(64)
1	Vijayawada	Krishna	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
2	Keesara	Munneru	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
3	Paleru Bridge	Paleru	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
4	Wadenapally	Krishna	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
5	Dameracherla	Musi	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
6	Halia	Halia	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
7	Bawapuram	Tungabhadra	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
8	T.Rampuram	Hagari	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
9	Kellodu	Vedavati	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	<---------- Water Samples not collected due to no flow on the specific date of collection of samples for analysis ---------->											
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/…

10	**Hoovinahahole**	**Swarnamukhi**	**2007-2008**	<---------- **Site not available** ---------->													
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-	-	-
11	**Marol**	**Varada**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-	-	-
12	**Harlahalli**	**Tungabhadra**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-	-	-
13	**Byaladahalli**	**Haridra**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-	-	-
14	**Kuppelur**	**Kumudavathi**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-	-	-
15	**Honnali**	**Tungabhadra**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Contd/---

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

VI Basin : Krishna

Sl. No.	Site Name	Name of the River/ Stream	Ywars	Faecal Coliform (no.per 10 ml)		Total plate count (no.per 10 ml)		Phytoplankton (no.per ml)		Zooplankton (no.per litre)		Arsenic (ppm)		Boron (ppm)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(53)	(54)	(55)	(56)	(57)	(58)	(59)	(60)	(61)	(62)	(63)	(64)
16	Shimoga	Tunga	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
17	Holehonnur	Bhadra	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
18	Yadgir	Bhima	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
19	Malkhed	Kanga	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
20	Takali	Bhima	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	<---------- Water Samples not collected due to no flow on the specific date of collection of samples for analysis ---------->											
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
21	Phulgaon	Bhima	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
22	Cholachagudda	Malaprabha	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
23	Kurundwad	Krishna	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
24	Karad	Krishna	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/---

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

VI Basin : Krishna

Sl. No.	Site Name	Name of the River/ Stream	Ywars	Cadmium (ppm)		Chromium (ppm)		Copper (ppm)		Cyanide (ppm)		Lead (ppm)		Manganese (ppm)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(65)	(66)	(67)	(68)	(69)	(70)	(71)	(72)	(73)	(74)	(75)	(76)
1	Vijayawada	Krishna	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
2	Keesara	Munneru	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
3	Paleru Bridge	Paleru	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
4	Wadenapally	Krishna	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
5	Dameracherla	Musi	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
6	Halia	Halia	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
7	Bawapuram	Tungabhadra	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
8	T.Rampuram	Hagari	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
9	Kellodu	Vedavati	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	<---------- Water Samples not collected due to no flow on the specific date of collection of samples for analysis ---------->											
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
10	Hoovinahahole	Swarnamukhi	2007-2008	<---------- Site not available ---------->											

Contd/…

			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
11	Marol	Varada	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
12	Harlahalli	Tungabhadra	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
13	Byaladahalli	Haridra	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
14	Kuppelur	Kumudavathi	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
15	Honnali	Tungabhadra	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
16	Shimoga	Tunga	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/---

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

VI Basin : Krishna

Sl. No.	Site Name	Name of the River/ Stream	Ywars	Cadmium (ppm)		Chromium (ppm)		Copper (ppm)		Cyanide (ppm)		Lead (ppm)		Manganese (ppm)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(65)	(66)	(67)	(68)	(69)	(70)	(71)	(72)	(73)	(74)	(75)	(76)
17	Holehonnur	Bhadra	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
18	Yadgir	Bhima	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
19	Malkhed	Kanga	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
20	Takali	Bhima	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	<---------- Water Samples not collected due to no flow on the specific date of collection of samples for analysis ---------->											
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
21	Phulgaon	Bhima	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
22	Cholachagudda	Malaprabha	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
23	Kurundwad	Krishna	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
24	Karad	Krishna	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/---

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

VI Basin : Krishna

Sl. No.	Site Name	Name of the River/ Stream	Ywars	Mercury (ppm)		Zinc (ppm)		Hardness		Sodium %		SAR		RSC	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(77)	(78)	(79)	(80)	(81)	(82)	(83)	(84)	(85)	(86)	(87)	(88)
1	Vijayawada	Krishna	2007-2008	-	-	-	-	134	183	37	49	1.4	2.5	0.1	0.8
			2008-2009	-	-	-	-	140	181	38	53	1.6	2.7	0.1	0.7
			2009-2010	-	-	-	-	129	197	35	53	1.5	2.8	0.0	1.6
2	Keesara	Munneru	2007-2008	-	-	-	-	143	183	40	71	1.6	6.4	0.9	2.2
			2008-2009	-	-	-	-	104	181	41	62	1.7	4.1	0.5	2.8
			2009-2010	-	-	-	-	84	189	48	65	1.8	4.3	0.0	2.0
3	Paleru Bridge	Paleru	2007-2008	-	-	-	-	173	297	31	45	1.3	2.3	0.0	1.7
			2008-2009	-	-	-	-	182	511	31	45	1.3	2.8	0.0	1.5
			2009-2010	-	-	-	-	181	286	34	46	1.5	2.3	0.0	1.7
4	Wadenapally	Krishna	2007-2008	-	-	-	-	109	243	29	50	1.3	2.7	0.0	0.6
			2008-2009	-	-	-	-	121	204	39	49	1.7	2.8	0.0	1.1
			2009-2010	-	-	-	-	124	221	37	48	1.6	2.4	0.0	1.4
5	Dameracherla	Musi	2007-2008	-	-	-	-	200	306	40	64	2.1	5.4	0.0	0.7
			2008-2009	-	-	-	-	120	371	37	65	1.7	4.7	0.0	1.4
			2009-2010	-	-	-	-	153	250	34	65	1.6	5.6	0.0	1.9
6	Halia	Halia	2007-2008	-	-	-	-	143	228	50	69	2.7	5.8	0.4	3.4
			2008-2009	-	-	-	-	148	185	50	66	2.7	5.1	1.4	3.5
			2009-2010	-	-	-	-	141	222	33	68	1.3	5.2	0.0	4.2
7	Bawapuram	Tungabhadra	2007-2008	-	-	-	-	130	215	40	71	1.6	6.3	0.0	1.1
			2008-2009	-	-	-	-	89	224	5	82	0.1	13.1	0.0	1.0
			2009-2010	-	-	-	-	76	249	26	67	0.8	5.8	0.0	0.6
8	T.Rampuram	Hagari	2007-2008	-	-	-	-	191	484	58	69	4.4	8.3	0.0	0.0
			2008-2009	-	-	-	-	127	330	56	67	3.0	7.7	0.0	0.4
			2009-2010	-	-	-	-	120	306	50	69	3.0	7.9	0.0	0.0
9	Kellodu	Vedavati	2007-2008	-	-	-	-	30	30	62	62	2.0	2.0	0.0	0.0
			2008-2009	<---------- Water Samples not collected due to no flow on the specific date of collection of samples for analysis ---------->											
			2009-2010	-	-	-	-	153	221	41	54	2.1	3.6	0.8	2.4

Contd/…

10	Hoovinahahole	Swaarnamukhi	2007-2008	<---------- Site not available ---------->												
			2008-2009	-	-	-	-	157	157	56	56	3.3	3.3	1.8	1.8
			2009-2010	-	-	-	-	145	201	67	78	5.1	9.9	2.4	5.4
11	Marol	Varada	2007-2008	-	-	-	-	25	143	25	62	0.3	2.5	0.0	0.1
			2008-2009	-	-	-	-	44	156	24	41	0.6	1.8	0.0	0.0
			2009-2010	-	-	-	-	28	153	24	49	0.4	2.5	0.0	0.0
12	Harlahalli	Tungabhadra	2007-2008	-	-	-	-	41	130	37	51	0.9	2.1	0.0	0.0
			2008-2009	-	-	-	-	32	97	38	52	0.7	2.1	0.0	0.1
			2009-2010	-	-	-	-	44	121	40	54	0.9	2.6	0.0	0.3
13	Byaladahalli	Haridra	2007-2008	-	-	-	-	213	213	34	34	1.6	1.6	0.0	0.0
			2008-2009	-	-	-	-	92	189	42	52	1.7	2.7	0.0	0.9
			2009-2010	-	-	-	-	121	177	39	53	1.5	3.1	0.4	1.2
14	Kuppelur	Kumudavathi	2007-2008	-	-	-	-	117	117	43	43	1.7	1.7	0.0	0.0
			2008-2009	-	-	-	-	88	145	19	28	0.5	1.0	0.0	0.0
			2009-2010	-	-	-	-	80	173	25	43	0.7	1.7	0.0	0.0
15	Honnali	Tungabhadra	2007-2008	-	-	-	-	69	69	32	32	0.8	0.8	0.0	0.0
			2008-2009	-	-	-	-	36	68	27	44	0.5	1.1	0.0	0.1
			2009-2010	-	-	-	-	32	88	24	32	0.4	0.9	0.0	0.0

Contd/…

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

VI Basin : Krishna

Sl. No.	Site Name	Name of the River/ Stream	Ywars	Mercury (ppm)		Zinc (ppm)		Hardness		Sodium %		SAR		RSC	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(77)	(78)	(79)	(80)	(81)	(82)	(83)	(84)	(85)	(86)	(87)	(88)
16	Shimoga	Tunga	2007-2008	-	-	-	-	27	98	15	37	0.3	0.8	0.0	0.0
			2008-2009	-	-	-	-	16	40	25	36	0.3	0.8	0.0	0.6
			2009-2010	-	-	-	-	20	32	21	26	0.3	0.4	0.0	0.0
17	Holehonnur	Bhadra	2007-2008	-	-	-	-	39	84	28	52	0.6	2.1	0.0	0.0
			2008-2009	-	-	-	-	40	101	28	54	0.6	2.1	0.0	0.1
			2009-2010	-	-	-	-	24	84	19	41	0.3	1.2	0.0	0.0
18	Yadgir	Bhima	2007-2008	-	-	-	-	180	215	41	60	2.2	4.2	0.0	0.0
			2008-2009	-	-	-	-	121	172	35	48	1.4	2.3	0.0	0.7
			2009-2010	-	-	-	-	137	262	35	49	1.3	2.7	0.0	0.0
19	Malkhed	Kanga	2007-2008	-	-	-	-	155	256	20	36	0.8	1.5	0.3	1.7
			2008-2009	-	-	-	-	157	197	30	42	1.1	2.0	0.8	1.4
			2009-2010	-	-	-	-	125	181	29	41	1.0	1.7	0.3	2.0
20	Takali	Bhima	2007-2008	-	-	-	-	153	210	19	44	0.6	2.0	0.0	0.0
			2008-2009	<---------- Water Samples not collected due to no flow on the specific date of collection of samples for analysis ---------->											
			2009-2010	-	-	-	-	84	225	40	69	1.7	4.1	0.0	0.0
21	Phulgaon	Bhima	2007-2008	-	-	-	-	41	80	20	26	0.4	0.6	0.0	0.0
			2008-2009	-	-	-	-	60	113	12	23	0.2	0.5	0.0	0.0
			2009-2010	-	-	-	-	84	93	15	19	0.3	0.4	0.0	0.0
22	Cholachagudda	Malaprabha	2007-2008	-	-	-	-	71	187	28	69	0.8	4.8	0.0	2.1
			2008-2009	-	-	-	-	62	222	20	56	0.6	3.6	0.0	0.2
			2009-2010	-	-	-	-	51	309	28	67	1.2	4.5	0.0	0.0
23	Kurundwad	Krishna	2007-2008	-	-	-	-	43	100	21	33	0.4	0.9	0.0	0.0
			2008-2009	-	-	-	-	38	133	15	22	0.2	0.6	0.0	0.0
			2009-2010	-	-	-	-	75	150	19	21	0.4	0.6	0.0	0.0
24	Karad	Krishna	2007-2008	-	-	-	-	16	59	22	57	0.3	1.1	0.0	0.2
			2008-2009	-	-	-	-	14	155	0.0	0.3	0.3	1.0	0.0	0.3
			2009-2010	-	-	-	-	36	235	13	22	0.3	0.5	0.0	0.1

Source: Water Quality Year Book 2007-2008 to 2009-2010.

Note : All the ionic concentrations are expressed in mg./lit., unless mentioned otherwise.

2. (-) indicate that analyis of a particular parameter has not been carried out.

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

VII Basin : Cauvery

Sl. No.	Site Name	Name of the River/ Stream	Years	Q (Cumecs)		Temperature °C		pH		Sp.Conductance		Potassium		Sodium	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
1	Gopurajapuram	Puravidaiyanar	2007-2008	<---------- Site not available ---------->											
			2008-2009	0.000	47.43	28.5	28.5	6.8	6.8	-	-	-	-	-	-
			2009-2010	0.000	30.51	24.0	27.0	7.5	8.0	-	-	4.0	6.4	70.2	154.6
2	Annavasal	Natter	2007-2008	0.000	9.203	22.5	26.0	7.3	8.2	-	-	-	-	19.2	39.8
			2008-2009	0.000	9.354	24.3	29.5	7.2	8.0	-	-	-	-	-	-
			2009-2010	0.000	7.793*	24.0	28.5	7.3	8.1	-	-	1.0	15.0	32.3	110.5
3	Nallathur	Nandalar	2007-2008	<---------- Site not available ---------->											
			2008-2009	0.000	92.33	26.0	26.3	7.0	7.2	-	-	-	-	-	-
			2009-2010	0.000	48.13	24.3	27.5	7.5	7.7	-	-	6.9	8.6	102.1	112.1
4	Menangudi	Noolar	2007-2008	<---------- Site not available ---------->											
			2008-2009	0.000	26.24	28.0	32.5	7.3	7.8	-	-	-	-	-	-
			2009-2010	0.000	26.51	25.0	29.5	7.5	7.7	-	-	1.2	8.8	28.5	114.1
5	Porakudi	Arasalar	2007-2008	<---------- Site not available ---------->											
			2008-2009	0.000	111.3	30.0	34.5	7.0	8.3	-	-	-	-	-	-
			2009-2010	0.000	54.25	25.5	29.0	7.5	7.8	-	-	1.2	10.0	25.9	106.5
6	Peralam	Vanjiyar	2007-2008	<---------- Site not available ---------->											
			2008-2009	0.000	8.207	25.5	32.0	7.2	7.9	-	-	-	-	-	-
			2009-2010	0.000	3.315*	25.5	28.0	7.4	8.3	-	-	1.2	20.0	28.5	109.5
7	Thengudi	Thirumalairajanar	2007-2008	0.000	88.14	26.0	32.0	7.3	8.4	-	-	-	-	24.5	39.8
			2008-2009	0.000	89.73	26.0	30.5	7.2	7.9	-	-	-	-	-	-
			2009-2010	0.000	68.08	26.0	29.0	7.6	8.3	-	-	2.3	14.0	60.5	122.1
8	Musiri	Cauvery	2007-2008	2.858	3940	23.5	27.0	7.5	8.7	-	-	2.2	7.6	19.6	116.0
			2008-2009	3.349	984.9	23.0	28.0	7.0	8.4	-	-	2.0	17.6	28.0	94.2
			2009-2010	3.179	1283	26.0	28.0	7.7	8.5	-	-	1.1	7.5	11.3	103.2
9	Nallamaranpatty	Amaravathy	2007-2008	0.000	1355	24.0	25.5	8.0	8.6	-	-	3.6	6.5	19.9	104.6
			2008-2009	0.000	228.2	18.0	26.0	8.0	8.7	-	-	1.6	6.1	27.2	122.0
			2009-2010	0.000	201.7	20.0	26.0	8.3	8.6	-	-	2.3	5.2	22.0	62.0
10	Elunuthimangalam	Noyyal	2007-2008	0.778	75.97	21.5	29.0	7.8	9.0	-	-	10.0	46.7	214.0	1620.0
			2008-2009	0.493	50.13	19.0	30.0	8.2	8.9	-	-	9.1	70.0	201.0	1726.0
			2009-2010	0.185	78.48	25.5	29.3	8.2	9.1	-	-	12.3	60.0	241.5	1980.0

Contd/…

11	**Kodumudi**	**Cauvery**	**2007-2008**	**28.69**	**4202**	**26.5**	**31.0**	**7.8**	**8.6**	**-**	**-**	**2.2**	**8.5**	**18.0**	**96.6**
			2008-2009	**26.38**	**719.8**	**25.5**	**31.5**	**7.0**	**8.3**	**-**	**-**	**1.8**	**7.7**	**24.5**	**68.5**
			2009-2010	**26.70**	**864.1**	**25**	**30.5**	**7.7**	**8.6**	**-**	**-**	**2.4**	**6.0**	**18.5**	**69.7**
12	**Savandapur**	**Bhavani**	**2007-2008**	**2.251**	**293.1**	**25.0**	**30.0**	**7.1**	**8.0**	**-**	**-**	**0.8**	**3.8**	**2.9**	**31.5**
			2008-2009	**4.298**	**75.00**	**24.0**	**30.0**	**7.6**	**8.1**	**-**	**-**	**0.5**	**4.4**	**16.0**	**31.5**
			2009-2010	**2.242**	**107.2**	**25.5**	**30.0**	**7.1**	**7.8**	**-**	**-**	**1.8**	**3.4**	**8.6**	**23.5**

Contd/…

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

VII Basin : Cauvery

Sl. No.	Site Name	Name of the River/ Stream	Years	Q (Cumecs)		Temperature °C		pH		Sp.Conductance		Potassium		Sodium	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
13	Thengumarahada	Moyar	2007-2008	2.173	176.8	21.0	27.3	7.2	8.0	-	-	0.9	2.7	3.8	7.5
			2008-2009	1.364	104.5	20.5	25.8	6.9	7.7	-	-	0.7	2.3	4.6	13.7
			2009-2010	0.781	510.1	23.0	27.5	7.1	7.8	-	-	0.9	2.3	3.5	7.0
14	Nellithurai	Bhavani	2007-2008	0.655	1045	21.0	25.5	7.4	7.9	-	-	0.8	1.6	2.7	12.8
			2008-2009	0.632	745.2	21.0	26.0	7.3	7.9	-	-	0.1	3.3	3.0	10.4
			2009-2010	0.844	1478	22.5	27.5	6.4	8.4	-	-	0.7	1.4	3.3	9.9
15	Urachikottai	Cauvery	2007-2008	0.000	3422	23.0	27.0	7.8	8.8	-	-	1.7	2.8	9.4	35.2
			2008-2009	0.000	484.8	24.0	29.0	7.8	8.4	-	-	0.9	3.1	15.1	39.1
			2009-2010	0.000	838.8	24.0	29.0	8.0	8.5	-	-	2.0	3.3	16.0	32.8
16	Thevur	Sarabenga	2007-2008	0.000	5.017	27.0	27.5	8.0	8.2	-	-	4.8	5.3	76.4	77.4
			2008-2009	0.000	40.32	27.5	27.5	7.9	7.9	-	-	5.8	5.8	60.0	60.0
			2009-2010	0.000	3.284	-	-	7.9	8.0	-	-	3.6	4.4	72.8	79.0
17	Sevanur	Chittar	2007-2008	0.000	6.090	0.5	28.0	7.8	8.2	-	-		7.3	43.0	64.2
			2008-2009	0.000	4.913	-	-	7.7	8.1	-	-		7.8	48.1	99.4
			2009-2010	0.000	54.40	-	-	7.6	8.0	-	-	4.7	8.6	41.0	75.2

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

Basin : Cauvery

Sl. No.	Site Name	Name of the River/ Stream	Years	Q (Cumecs)		Temperature °C		pH_GEN		Sp.Conductance		Potassium (K)		Sodium (Na)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
18	Thoppur	Thoppaiyar	2007-2008	0.000	0.727	25.0	28.0	7.9	8.5	-	-	3.5	5.9	115.2	160.5
			2008-2009	<----------Dry Bed---------->											
			2009-2010	0.000	0.000	-	-	-	-	-	-	-	-	-	-
19	Kudlur	Palar	2007-2008	0.000	48.11	20.0	26.0	8.3	8.7	-	-	4.4	6.6	47.2	98.8
			2008-2009	0.000	30.52	18.5	24.0	8.2	8.5	-	-	2.1	5.7	33.8	93.9
			2009-2010	0.000	14.99	-	-	7.7	8.3	-	-	5.0	6.9	32.4	94.7
20	Hogenekkal	Chinar	2007-2008	<----------Dry Bed---------->											
			2008-2009	<----------Dry Bed---------->											
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
21	Billgundulu	Cauvery	2007-2008	11.22	3883	23.5	28.0	7.8	8.2	-	-	0.9	31.7	10.8	55.3
			2008-2009	18.59	2702	23.0	28.0	8.0	8.6	-	-	1.5	8.2	9.8	57.7
			2009-2010	11.62	1602	23.0	28.0	8.0	8.6	-	-	1.0	7.4	5.5	64.9
22	T.Bekuppe	Arkavathi	2007-2008	0.000	11.83	19.0	27.0	7.5	8.2	-	-	1.0	28.0	30.5	112.8
			2008-2009	0.347	164.5	18.0	27.5	7.3	7.9	-	-	10.2	16.5	65.6	149.7
			2009-2010	2.442	147.2	22.0	29.0	7.5	7.8	-	-	8.4	14.9	69.9	145.6
23	T.K.Halli	Shimsha	2007-2008	0.000	206.1	23.5	26.5	7.7	8.2	-	-	0.5	1.8	16.9	48.9
			2008-2009	0.029	277.0	23.5	27.0	7.8	8.2	-	-	1.6	8.7	35.2	92.0
			2009-2010	0.716	946.2	4.1	29.0	7.8	8.2	-	-	1.1	4.1	39.1	82.2
24	Kollegal	Cauvery	2007-2008	12.21	3473	23.5	28.0	7.8	8.2	-	-	0.7	23.6	15.7	49.8
			2008-2009	30.64	5109	24.0	27.6	7.5	8.4	-	-	0.8	2.3	8.8	32.0
			2009-2010	14.410	1792	22.0	26.0	7.8	8.4	-	-	0.9	2.3	8.6	27.7

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

Basin : Cauvery

Sl. No.	Site Name	Name of the River/ Stream	Years	Q (Cumecs)		Temperature °C		pH_GEN		Sp.Conductance		Potassium (K)		Sodium (Na)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
25	Bendrahalli	Suvarnavathi	2007-2008	0.000	36.89	26.5	27.0	7.7	7.8	-	-	0.6	2.9	19.0	21.1
			2008-2009	0.213	59.90	21.5	26.6	7.6	8.1	-	-	0.5	55.5	38.9	121.0
			2009-2010	0.000	9.359	20.0	25.0	7.6	7.9	-	-	2.5	11.2	40.3	122.5
26	T.Narasipur	Kabini	2007-2008	7.030	1752	7.0	28.0	7.6	8.2	-	-	0.5	2.9	7.8	59.6
			2008-2009	2.677	1241	21.5	29.0	7.6	8.3	-	-	1.5	2.7	4.9	38.0
			2009-2010	2.732	1675	25.0	30.0	7.5	8.6	-	-	1.1	3.2	4.8	43.8
27	Muthankera	Kabini	2007-2008	<---------- Site not available ---------->											
			2008-2009	2.350	466.6	23.5	29.0	6.3	7.7	-	-	0.4	3.5	3	7
			2009-2010	1.545	1180	24.0	29.0	6.5	7.3	-	-	1.0	3.2	4	8
28	K.M.Vadi	Lakshmanatirtha	2007-2008	0.000	374.6	24.5	24.5	7.8	7.8	-	-	1.2	1.2	49.0	49.0
			2008-2009	0.000	154.7	21.5	24.0	7.4	7.6	-	-	1.6	2.0	6.7	18.9
			2009-2010	0.000	583.2	23.0	24.5	7.3	7.8	-	-	1.5	2.3	8.6	41.5
29	Akkihebbal	Hemavathi	2007-2008	2.157	859.7	22.0	29.0	7.6	8.2	-	-	0.4	3.5	10.8	40.3
			2008-2009	1.090	1480	23.0	27.5	7.5	8.3	-	-	0.8	2.0	4.7	23.0
			2009-2010	1.705	638.9	23.5	27.0	7.4	8.1	-	-	0.4	2.2	4.9	21.5
30	M.H.Halli	Hemavathi	2007-2008	0.351	358.4	24.0	25.0	7.4	7.8	-	-	1.2	6.3	5.1	30.6
			2008-2009	3.677	792.1	25.0	26.0	7.0	8.4	-	-	1.6	2.3	6.9	13.1
			2009-2010	2.409	1037	24.0	26.0	7.2	7.7	-	-	1.2	1.7	5.4	9.9
31	Thimmanahalli	Yagachi	2007-2008	0.218	365.3	25.0	29.0	6.7	8.3	-	-	0.2	3.4	5.1	49.8
			2008-2009	0.267	301.7	20.0	26.0	7.4	8.1	-	-	1.6	3.8	9.8	21.2
			2009-2010	0.186	393.1	19.0	26.0	7.5	7.9	-	-	1.5	3.6	10.2	20.5
32	Sakleshpur	Hemavathi	2007-2008	0.010	613.1	22.0	25.0	6.8	7.7	-	-	0.4	2.3	2.4	16.8
			2008-2009	0.263	383.4	21.0	26.0	7.1	7.8	-	-	0.8	2.3	2.5	6.9
			2009-2010	0.711	717.9	22.0	26.0	7.1	7.6	-	-	0.4	2.2	3.1	6.8
33	Chunchankatte	Cauvery	2007-2008	<---------- Site not available ---------->											
			2008-2009	0.000	1456	23.5	26.0	7.8	7.9	-	-	0.8	1.2	11.5	17.7
			2009-2010	0.000	941.4	23.5	26.5	7.5	8.3	-	-	0.3	1.2	2.8	13.5
34	Kudige	Cauvery	2007-2008	2.452	1409	28.5	28.5	7.6	7.6	-	-	1.6	1.6	10.8	10.8
			2008-2009	0.407	1094	22.0	29.0	7.2	8.0	-	-	0.7	2.0	4.6	11.0
			2009-2010	2.324	1426	23.0	29.0	7.3	7.7	-	-	0.6	1.9	2.3	6.6

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

Basin : Cauvery

Sl. No.	Site Name	Name of the River/ Stream	Years	Calcium (Ca)		Magnesium (Mg)		Aluminium		Iron (Fe)		Ammonia (NH3-N)		Carbonate (CO3)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)	(25)	(26)	(27)	(28)
1	Gopurajapuram	Puravidaiyanar	2007-2008	<---------- Site not available ---------->											
			2008-2009	14	14	10.2	10.2	-	-	-	-	-	-	0.0	0.0
			2009-2010	23	41	4.9	24.3	-	-	-	-	-	-	0.0	0.0
2	Annavasal	Natter	2007-2008	19	37	10.7	21.4	-	-	-	-	-	-	0.0	0.0
			2008-2009	22	37	14.9	21.4	-	-	-	-	-	-	0.0	0.0
			2009-2010	23	31	12.6	24.3	-	-	-	-	-	-	0.0	0.0
3	Nallathur	Nandalar	2007-2008	<---------- Site not available ---------->											
			2008-2009	19	42	7.8	11.2	-	-	-	-	-	-	0.0	0.0
			2009-2010	24	34	13.6	14.6	-	-	-	-	-	-	0.0	0.0
4	Menangudi	Noolar	2007-2008	<---------- Site not available ---------->											
			2008-2009	22	30	10.7	18.5	-	-	-	-	-	-	0.0	0.0
			2009-2010	24	33	11.7	14.6	-	-	-	-	-	-	0.0	0.0
5	Porakudi	Arasalar	2007-2008	<---------- Site not available ---------->											
			2008-2009	14	30	10.2	20.9	-	-	-	-	-	-	0.0	0.0
			2009-2010	26	34	10.7	21.4	-	-	-	-	-	-	0.0	0.0
6	Peralam	Vanjiyar	2007-2008	<---------- Site not available ---------->											
			2008-2009	13	29	10.7	28.2	-	-	-	-	-	-	0.0	0.0
			2009-2010	21	34	9.7	26.2	-	-	-	-	-	-	0.0	40.0
7	Thengudi	Thirumalairajanar	2007-2008	24	42	9.7	25.8	-	-	-	-	-	-	0.0	12.5
			2008-2009	26	47	12.6	34.0	-	-	-	-	-	-	0.0	0.0
			2009-2010	8	44	8.7	34.0	-	-	-	-	-	-	0.0	40.0
8	Musiri	Cauvery	2007-2008	21	44	9.7	31.6	-	-	0.060	0.070	0.04	0.10	0.0	34.1
			2008-2009	24	43	15.6	25.3	-	-	0.001	0.101	0.05	0.17	0.0	33.6
			2009-2010	13	50	6.1	31.1	-	-	0.000	0.240	0.00	0.20	0.0	24.0
9	Nallamaranpatty	Amaravathy	2007-2008	24	48	9.7	31.6	-	-	0.060	0.070	0.05	0.06	0.0	20.9
			2008-2009	19	40	8.8	29.4	-	-	0.062	0.089	0.06	0.06	0.0	28.8
			2009-2010	22	43	11.6	25.3	-	-	0.000	0.310	0.00	0.14	0.0	30.4
10	Elunuthimangalam	Noyyal	2007-2008	45	144	26.3	121.5	-	-	0.070	0.110	0.03	0.12	0.0	95.5

Contd/…

			2008-2009	32	176	58.3	141.0	-	-	0.001	1.049	0.05	2.01	0.0	120.0
			2009-2010	56	152	32.1	194.4	-	-	0.024	0.819	0.00	0.35	0.0	0.144
11	Kodumudi	Cauvery	2007-2008	18	64	6.8	29.2	-	-	0.060	0.070	0.04	0.06	0.0	24.4
			2008-2009	24	58	8.8	31.1	-	-	0.001	0.165	0.05	0.17	0.0	0.0
			2009-2010	19	42	10.7	25.3	-	-	0.000	0.190	0.00	0.29	0.0	14.4
12	Savandapur	Bhavani	2007-2008	3	45	1.9	17.5	-	-	0.060	0.070	0.03	0.05	0.0	0.0
			2008-2009	21	45	8.7	19.4	-	-	0.055	0.101	0.05	0.09	0.0	0.0
			2009-2010	16	42	3.9	17.5	-	-	0.000	0.420	0.00	0.17	0.0	0.0

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

Basin : Cauvery

Sl. No.	Site Name	Name of the River/ Stream	Years	Calcium (Ca)		Magnesium (Mg)		Aluminium		Iron (Fe)		Ammonia (NH3-N)		Carbonate (CO3)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)	(25)	(26)	(27)	(28)
13	Thengumarahada	Moyar	2007-2008	10	22	1.9	5.8	-	-	0.060	0.080	0.02	0.05	0.0	0.0
			2008-2009	8	26	2.9	10.2	-	-	0.001	0.469	0.05	0.16	0.0	0.0
			2009-2010	11	22	1.0	7.8	-	-	0.000	2.034	0.01	0.29	0.0	0.0
14	Nellithurai	Bhavani	2007-2008	3	13	2.9	9.7	-	-	0.060	0.070	0.02	0.06	0.0	0.0
			2008-2009	3	11	1.9	8.3	-	-	0.001	0.220	0.05	0.13	0.0	0.0
			2009-2010	5	12	1.0	7.8	-	-	0.000	0.264	0.00	0.13	0.0	9.6
15	Urachikottai	Cauvery	2007-2008	13	27	6.8	15.6	-	-	0.060	0.070	0.03	0.06	0.0	51.9
			2008-2009	15	38	6.8	22.4	-	-	0.001	0.127	0.05	0.22	0.0	21.1
			2009-2010	14	35	9.7	24.3	-	-	0.000	0.420	0.00	0.14	0.0	19.2
16	Thevur	Sarabenga	2007-2008	24	53	13.6	28.2	-	-	0.070	0.070	0.05	0.06	0.0	0.0
			2008-2009	56	56	34.3	34.3	-	-	-	-	-	-	0.0	0.0
			2009-2010	41	56	32.0	39.7	-	-	0.000	0.280	0.03	0.09	0	0.0
17	Sevanur	Chittar	2007-2008	42	64	24.3	36.9	-	-	0.070	0.070	0.05	0.06	0.0	0.0
			2008-2009	38	72	9.5	60.3	-	-	0.001	0.147	0.05	0.13	0.0	0.0
			2009-2010	51	69	26.2	38.9	-	-	0.000	0.420	0.01	0.19	0.0	0.0
18	Thoppur	Thoppaiyar	2007-2008	44	55	52.5	66.1	-	-	0.060	0.100	0.04	0.08	0.0	48.2
			2008-2009	<----------Dry Bed----------											
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
19	Kudlur	Palar	2007-2008	24	40	24.3	51.0	-	-	0.070	0.090	0.04	0.06	20.9	48.5
			2008-2009	18	46	17.5	50.1	-	-	0.066	0.081	0.05	0.21	0.0	53.9
			2009-2010	26	61	16.5	59.2	-	-	0.060	0.400	0.01	0.23	0.0	43.2
20	Hogenekkal	Chinar	2007-2008	<----------Dry Bed----------											
			2008-2009	Dry	bed										
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
21	Billgundulu	Cauvery	2007-2008	11	36	5.7	21.0	-	-	0.0	0.5	-	-	0.0	0.0
			2008-2009	13	38	3.9	21.4	-	-	0.1	0.1	-	-	0.0	32.4
			2009-2010	14	37	4.9	21.4	-	-	0.0	0.1	0.41	3.08	0.0	37.3

Contd/…

22	T.Bekuppe	Arkavathi	2007-2008	14	66	7.2	64.3	-	-	0.3	0.3	-	-	0.0	0.0
			2008-2009	32	80	17.5	34.0	-	-	0.1	0.1	-	-	0.0	0.0
			2009-2010	40	77	16.5	34.0	-	-	0.0	0.2	3.64	12.71	0	0.0
23	T.K.Halli	Shimsha	2007-2008	26	36	10.0	20.0	-	-	0.0	0.3	-	-	0.0	0.0
			2008-2009	27	42	15.6	31.1	-	-	0.1	0.1	-	-	0.0	0.0
			2009-2010	26	42	1.9	27.2	-	-	0.0	0.2	-	-	0.0	0.0
24	Kollegal	Cauvery	2007-2008	16	36	7.7	19.1	-	-	0.0	0.2	-	-	0.0	0.0
			2008-2009	14	35	6.8	20.4	-	-	0.1	0.1	-	-	0.0	9.3
			2009-2010	13	34	3.9	17.5	-	-	0.0	0.1	0.32	0.78	0.0	18.6

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

Basin : Cauvery

Sl. No.	Site Name	Name of the River/ Stream	Years	Calcium (Ca)		Magnesium (Mg)		Aluminium		Iron (Fe)		Ammonia (NH3-N)		Carbonate (CO3)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)	(25)	(26)	(27)	(28)
25	Bendrahalli	Suvarnavathi	2007-2008	22	23	12.4	13.2	-	-	0.1	0.1	-	-	0.0	0.0
			2008-2009	21	58	11.7	27.2	-	-	0.1	0.2	-	-	0.0	0.0
			2009-2010	26	58	11.7	30.1	-	-	0.0	0.1	0.84	2.63	0.0	0.0
26	T.Narasipur	Kabini	2007-2008	11	25	5.3	23.8	-	-	0.0	0.3	-	-	0.0	0.0
			2008-2009	8	35	4.9	26.2	-	-	0.1	0.2	-	-	0.0	4.8
			2009-2010	10	40	3.9	28.2	-	-	0.0	0.2	0.35	0.92	0.0	0.0
27	Muthankera	Kabini	2007-2008	<---------- Site not available ---------->											
			2008-2009	4.0	8.8	0.5	4.9	-	-	0.0	0.2	0.05	0.07	0.0	0.0
			2009-2010	4.0	8.0	2.5	4.9	-	-	0.0	0.1	0.10	0.19	0.0	0.0
28	K.M.Vadi	Lakshmanatirtha	2007-2008	39	39	19.1	19.1	-	-	0.2	0.2	-	-	0.0	0.0
			2008-2009	8	24	5.8	11.7	-	-	0.1	0.1	-	-	0.0	0.0
			2009-2010	10	37	6.8	27.2	-	-	0.0	0.5	-	-	0.0	0.0
29	Akkihebbal	Hemavathi	2007-2008	8	25	3.8	22.0	-	-	0.1	0.3	-	-	0.0	0.0
			2008-2009	6	38	2.9	24.3	-	-	0.1	0.2	-	-	0.0	0.0
			2009-2010	8	30	3.9	15.6	-	-	0.0	0.3	0.00	0.00	0.0	0.0
30	M.H.Halli	Hemavathi	2007-2008	8	14	1.9	7.7	-	-	0.2	0.3	-	-	0.0	0.0
			2008-2009	10	18	2.9	6.8	-	-	0.1	0.1	0.00	0.00	0.0	8.7
			2009-2010	8	16	2.9	5.8	-	-	0.0	0.1	-	-	0.0	0.0
31	Thimmanahalli	Yagachi	2007-2008	6	20	1.4	10.4	-	-	0.1	0.3	-	-	0.0	0.0
			2008-2009	13	26	4.9	10.7	-	-	0.1	0.2	-	-	0.0	0.0
			2009-2010	14	22	3.9	8.7	-	-	0.0	0.3	-	-	0.0	0.0
32	Sakleshpur	Hemavathi	2007-2008	2	9	0.2	4.7	-	-	0.1	0.2	-	-	0.0	0.0
			2008-2009	3	13	1.9	4.9	-	-	0.1	0.2	-	-	0.0	0.0
			2009-2010	5	8	1.9	4.9	-	-	0.1	0.5	-	-	0.0	0.0
33	Chunchankatte	Cauvery	2007-2008	<---------- Site not available ---------->											
			2008-2009	18	27	7.8	13.4	-	-	0.1	0.2	-	-	0.0	0.0
			2009-2010	5	24	2.9	9.7	-	-	0.0	0.2	-	-	0.0	0.0
34	Kudige	Cauvery	2007-2008	13	13	3.4	3.4	-	-	0.1	0.1	-	-	0.0	0.0
			2008-2009	5	14	1.9	8.7	-	-	0.1	0.1	-	-	0.0	0.0
			2009-2010	3	11	1.9	6.8	-	-	0.1	0.3	-	-	0.0	0.0

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

Basin : Cauvery

Sl. No.	Site Name	Name of the River/ Stream	Years	Bicarbonate (HCO3)		Chloride (CL)		Fluoride (F)		Sulphate (SO4)		Sulphite		Nitrate (NO3-N)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(29)	(30)	(31)	(32)	(33)	(34)	(35)	(36)	(37)	(38)	(39)	(40)
1	Gopurajapuram	Puravidaiyanar	2007-2008	<---------- Site not available ---------->											
			2008-2009	97	97	42.0	42.0	-	-	-	-	-	-	-	-
			2009-2010	217	352	55.8	171.5	0.27	0.41	6.1	49.2	-	-	-	-
2	Annavasal	Natter	2007-2008	112	216	21.0	85.8	-	-	7.4	25.7	-	-	-	-
			2008-2009	152	264	45.8	95.4	-	-	10.2	19.7	-	-	-	-
			2009-2010	171	367	36.2	81.8	0.27	0.40	10.5	30.9	-	-	-	-
3	Nallathur	Nandalar	2007-2008	<---------- Site not available ---------->											
			2008-2009	122	243	43.8	47.7	-	-	-	-	-	-	-	-
			2009-2010	352	321	87.6	89.3	0.35	0.45	8.3	17.9	-	-	-	-
4	Menangudi	Noolar	2007-2008	<---------- Site not available ---------->											
			2008-2009	137	198	40.0	57.2	-	-	18.8	18.8	-	-	-	-
			2009-2010	160	372	30.5	89.6	0.26	0.41	9.2	19.4				
5	Porakudi	Arasalar	2007-2008	<---------- Site not available ---------->											
			2008-2009	137	287	53.4	95.4	-	-	37.4	37.4	-	-	-	-
			2009-2010	197	341	32.4	102.9	0.28	0.40	6.8	18.1				
6	Peralam	Vanjiyar	2007-2008	<---------- Site not available ---------->											
			2008-2009	137	287	42.0	68.7	-	-	13.8	13.8	-	-	-	-
			2009-2010	176	336	41.9	102.3	0.25	1.07	7.2	31.7				
7	Thengudi	Thirumalairajanar	2007-2008	137	328	28.6	80.1	-	-	9.9	25.4	-	-	-	-
			2008-2009	176	285	43.8	102.9	-	-	14.1	27.9	-	-	-	-
			2009-2010	135	403	49.6	106.0	0.33	0.98	10.6	31.9				
8	Musiri	Cauvery	2007-2008	117	218	26.0	160.4	0.23	0.77	7.5	67.5	-	-	1.09	5.77
			2008-2009	153	269	29.7	136.6	0.31	0.64	3.2	57.6	-	-	0.08	2.78
			2009-2010	71	278	15.2	154.0	0.06	0.84	1.5	65.9	-	-	0.52	3.73
9	Nallamaranpatty	Amaravathy	2007-2008	118	170	20.4	225.9	0.39	0.73	10.4	36.7	-	-	1.36	2.92
			2008-2009	97	179	21.1	148.0	0.47	0.94	10.4	82.0	-	-	0.37	0.76
			2009-2010	125	230	19.0	62.4	0.33	0.76	10.2	63.0	-	-	0.06	1.71

Contd/…

10	**Elunuthimangalam**	**Noyyal**	**2007-2008**	**215**	**577**	**289.9**	**2098.9**	**0.76**	**1.69**	**68.2**	**472.2**	**-**	**-**	**2.99**	**26.01**
			2008-2009	**222**	**798**	**329.9**	**2422.4**	**0.89**	**1.51**	**97.4**	**740.0**	**-**	**-**	**1.88**	**22.56**
			2009-2010	**268**	**732**	**310.4**	**3054.0**	**0.48**	**1.57**	**113.0**	**707.4**	**-**	**-**	**3.55**	**15.10**
11	**Kodumudi**	**Cauvery**	**2007-2008**	**87**	**292**	**18.0**	**102.9**	**0.24**	**0.80**	**6.6**	**71.0**	**-**	**-**	**1.54**	**3.91**
			2008-2009	**133**	**390**	**25.1**	**76.0**	**0.26**	**1.01**	**4.7**	**47.0**	**-**	**-**	**0.21**	**2.46**
			2009-2010	**122**	**250**	**22.7**	**90.8**	**0.15**	**0.84**	**1.0**	**59.1**	**-**	**-**	**0.60**	**2.49**
12	**Savandapur**	**Bhavani**	**2007-2008**	**10**	**213**	**8.0**	**38.5**	**0.05**	**0.38**	**3.3**	**27.1**	**-**	**-**	**0.76**	**3.44**
			2008-2009	**110**	**248**	**20.0**	**34.0**	**0.23**	**0.52**	**13.1**	**34.7**	**-**	**-**	**0.09**	**3.17**
			2009-2010	**88**	**206**	**15.8**	**28.4**	**0.12**	**0.63**	**0.7**	**41.5**	**-**	**-**	**0.55**	**1.84**

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

Basin : Cauvery

Sl. No.	Site Name	Name of the River/ Stream	Years	Bicarbonate (HCO3)		Chloride (CL)		Fluoride (F)		Sulphate (SO4)		Sulphite		Nitrate (NO3-N)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(29)	(30)	(31)	(32)	(33)	(34)	(35)	(36)	(37)	(38)	(39)	(40)
13	Thengumarahada	Moyar	2007-2008	24	59	12.0	36.2	0.11	0.19	3.1	10.9	-	-	1.76	3.44
			2008-2009	33	71	11.5	49.5	0.05	0.20	1.0	13.1	-	-	0.17	2.35
			2009-2010	38	62	15.5	33.3	0.00	0.57	0.4	6.0	-	-	0.92	2.52
14	Nellithurai	Bhavani	2007-2008	15	64	4.0	15.4	0.06	0.21	2.9	6.4	-	-	0.64	2.11
			2008-2009	16	69	3.7	17.9	0.05	0.22	1.0	10.3	-	-	0.19	1.27
			2009-2010	24	82	5.7	17.0	0.04	0.61	0.3	3.5	-	-	0.40	1.19
15	Urachikottai	Cauvery	2007-2008	54	162	14.0	25.9	0.24	0.62	4.7	20.6	-	-	0.81	2.65
			2008-2009	101	230	17.4	35.6	0.17	0.61	1.0	40.7	-	-	0.09	2.36
			2009-2010	107	201	20.7	39.7	0.17	0.88	0.6	46.3	-	-	0.41	1.91
16	Thevur	Sarabenga	2007-2008	243	345	32.8	50.0	0.73	0.87	41.8	49.2	-	-	5.16	5.32
			2008-2009	364	364	64.0	64.0	0.81	0.81	28.2	28.2	-	-	8.38	8.38
			2009-2010	378	412	60.8	68.2	1.01	1.37	62.0	70.0	-	-	1.75	3.47
17	Sevanur	Chittar	2007-2008	291	392	34.0	53.0	0.69	0.81	14.6	32.5	-	-	3.47	9.22
			2008-2009	317	446	45.5	69.3	0.82	2.71	1.0	65.0	-	-	0.33	6.61
			2009-2010	331	465	37.1	97.5	0.42	1.21	17.1	60.0	-	-	1.88	5.67
18	Thoppur	Thoppaiyar	2007-2008	418	539	91.3	110.2	0.89	1.45	78.7	121.4	-	-	7.56	14.00
			2008-2009	<----------Dry Bed---------->											
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
19	Kudlur	Palar	2007-2008	233	419	17.8	42.5	0.69	1.62	10.6	27.5	-	-	1.99	8.55
			2008-2009	213	405	13.5	51.4	0.82	1.47	9.8	55.0	-	-	0.19	3.98
			2009-2010	220	527	16.0	71.0	0.56	1.59	8.4	72.0	-	-	0.96	5.26
20	Hogenekkal	Chinar	2007-2008	<----------Dry Bed---------->											
			2008-2009	<----------Dry Bed---------->											
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
21	Billgundulu	Cauvery	2007-2008	45	228	19.0	79.1	0.00	0.47	0.1	48.0	-	-	0.01	3.00
			2008-2009	62	248	13.6	70.0	0.06	0.61	2.6	12.9	-	-	0.52	3.36
			2009-2010	66	230	9.7	62.8	0.09	0.57	4.3	12.8	-	-	0.41	3.08

Contd/…

22	**T.Bekuppe**	**Arkavathi**	**2007-2008**	**72**	**416**	**44.3**	**155.3**	**0.02**	**1.42**	**3.8**	**46.8**	**-**	**-**	**0.08**	**0.90**
			2008-2009	**211**	**445**	**88.6**	**175.4**	**0.42**	**0.91**	**7.3**	**31.0**	**-**	**-**	**3.67**	**12.20**
			2009-2010	**230**	**431**	**77.0**	**171.4**	**0.49**	**0.70**	**2.4**	**27.6**	**-**	**-**	**3.64**	**12.71**
23	**T.K.Halli**	**Shimsha**	**2007-2008**	**126**	**188**	**28.0**	**71.9**	**0.04**	**1.18**	**0.1**	**0.4**	**-**	**-**	**0.01**	**0.84**
			2008-2009	**197**	**352**	**25.2**	**88.6**	**0.04**	**0.67**	**4.1**	**32.2**	**-**	**-**	**0.45**	**0.81**
			2009-2010	**225**	**313**	**26.9**	**52.5**	**0.40**	**0.65**	**8.5**	**30.8**	**-**	**-**	**0.43**	**0.77**
24	**Kollegal**	**Cauvery**	**2007-2008**	**77**	**200**	**21.9**	**64.2**	**0.02**	**0.87**	**0.1**	**0.9**	**-**	**-**	**0.03**	**2.61**
			2008-2009	**66**	**230**	**13.6**	**24.9**	**0.04**	**0.34**	**3.0**	**10.6**	**-**	**-**	**0.25**	**0.73**
			2009-2010	**66**	**208**	**9.7**	**23.4**	**0.09**	**0.38**	**3.1**	**8.3**	**-**	**-**	**0.32**	**0.78**

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

Basin : Cauvery

Sl. No.	Site Name	Name of the River/ Stream	Years	Bicarbonate (HCO3)		Chloride (CL)		Fluoride (F)		Sulphate (SO4)		Sulphite		Nitrate (NO3-N)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(29)	(30)	(31)	(32)	(33)	(34)	(35)	(36)	(37)	(38)	(39)	(40)
25	Bendrahalli	Suvarnavathi	2007-2008	104	122	33.0	34.0	0.02	0.42	0.4	4.3	-	-	0.01	0.03
			2008-2009	206	464	25.2	131.0	0.02	0.40	5.8	24.4	-	-	0.55	1.26
			2009-2010	190	483	25.3	62.8	0.23	0.44	6.1	22.7	-	-	0.84	2.63
26	T.Narasipur	Kabini	2007-2008	62	190	12.2	86.0	0.00	0.38	0.0	6.0	-	-	0.00	0.17
			2008-2009	38	281	7.8	32.7	0.04	0.36	2.4	8.1	-	-	0.38	0.73
			2009-2010	48	317	7.8	29.2	0.06	0.51	2.8	7.2	-	-	0.35	0.92
27	Muthankera	Kabini	2007-2008	<---------- Site not available ---------->											
			2008-2009	11.0	45.6	6	12	0.05	0.19	1	3	-	-	0.10	0.32
			2009-2010	24.4	43.9	7	11	0.08	0.35	1	1	-	-	0.21	0.21
28	K.M.Vadi	Lakshmanatirtha	2007-2008	202	202	66.0	66.0	0.53	0.53	4.2	4.2	-	-	0.04	0.04
			2008-2009	48	142	9.7	23.1	0.02	0.23	2.8	4.1	-	-	0.52	0.83
			2009-2010	62	287	13.6	34.7	0.08	0.42	2.0	6.2	-	-	0.69	0.90
29	Akkihebbal	Hemavathi	2007-2008	34	136	15.1	58.1	0.00	0.34	0.3	61.4	-	-	0.03	1.21
			2008-2009	33	246	7.6	23.4	0.02	0.25	2.2	6.5	-	-	0.34	0.76
			2009-2010	38	189	9.7	21.2	0.04	0.25	1.2	5.2	-	-	0.38	0.83
30	M.H.Halli	Hemavathi	2007-2008	32	76	8.1	42.0	0.00	1.10	0.3	41.3	-	-	0.03	0.95
			2008-2009	27	85	11.4	19.2	0.04	0.13	1.2	3.7	-	-	0.42	0.67
			2009-2010	47	71	9.7	17.3	0.08	0.11	1.3	3.9	-	-	0.10	0.69
31	Thimmanahalli	Yagachi	2007-2008	40	108	8.1	66.9	0.04	1.04	1.6	3.6	-	-	0.03	1.18
			2008-2009	66	132	15.4	24.5	0.04	0.19	1.3	6.5	-	-	0.31	1.23
			2009-2010	62	108	15.5	26.9	0.09	0.21	2.0	6.2	-	-	0.36	1.26
32	Sakleshpur	Hemavathi	2007-2008	16	38	3.8	21.8	0.04	0.38	6.2	8.9	-	-	0.01	1.12
			2008-2009	13	56	3.9	11.7	0.02	0.09	6.2	4.1	-	-	0.27	0.84
			2009-2010	19	48	5.8	9.7	0.02	0.08	1.1	4.2	-	-	0.32	0.88
33	Chunchankatte	Cauvery	2007-2008	<---------- Site not available ---------->											
			2008-2009	111	166	7.8	15.3	0.11	0.17	1.5	2.3	-	-	0.34	0.56
			2009-2010	24	137	5.8	11.7	0.01	0.19	1.7	2.5	-	-	0.29	0.64
34	Kudige	Cauvery	2007-2008	47	47	19.9	19.9	0.04	0.04	3.2	3.2	-	-	0.01	0.01
			2008-2009	23	95	7.8	17.0	0.00	0.13	0.9	2.5	-	-	0.45	0.67
			2009-2010	19	67	5.8	9.7	0.02	0.09	1.2	1.9	-	-	0.39	0.59

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

Basin : Cauvery

Sl. No.	Site Name	Name of the River/ Stream	Years	Nitrite (NO2-N)		Phosphate (PO4)		Silica (SiO2)		DO		BOD3-27		Total Coliform (no.per 10 ml)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(41)	(42)	(43)	(44)	(45)	(46)	(47)	(48)	(49)	(50)	(51)	(52)
1	Gopurajapuram	Puravidaiyanar	2007-2008	<---------- Site not available ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	1.7	2.0		
2	Annavasal	Natter	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	0.1	1.1	-	-
3	Nallathur	Nandalar	2007-2008	<---------- Site not available ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	0.6	1.6	-	-
4	Menangudi	Noolar	2007-2008	<---------- Site not available ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	0.3	0.6	-	-
5	Porakudi	Arasalar	2007-2008	<---------- Site not available ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	0.3	0.9	-	-
6	Peralam	Vanjiyar	2007-2008	<---------- Site not available ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	0.2	3.2	-	-
7	Thengudi	Thirumalairajanar	2007-2008	-	-	-	-	-	-	4.7	8.3	0.5	3.3	-	-
			2008-2009	-	-	-	-	-	-	5.7	7.9	0.1	2.8	-	-
			2009-2010	-	-	-	-	-	-	4.4	6.7	0.6	3.5	-	-
8	Musiri	Cauvery	2007-2008	0.00	0.49	-	-	14.8	30.6	6.8	7.3	0.3	2.7	-	-
			2008-2009	0.00	0.01	0.010	0.025	2.3	24.7	6.9	7.3	0.3	2.5	-	-
			2009-2010	-	-	0.000	0.128	15.9	48.5	6.9	7.2	0.2	2.7	-	-
9	Nallamaranpatty	Amaravathy	2007-2008	0.00	0.03	-	-	11.1	29.5	7.4	8.7	0.7	3.0	-	-
			2008-2009	0.02	0.02	0.010	0.010	2.5	19.8	7.3	9.0	1.0	1.8	-	-
			2009-2010	-	-	0.000	0.050	17.2	28.2	-	-	0.1	2.4	-	-

Contd/…

10	**Elunuthimangalam**	**Noyyal**	**2007-2008**	**0.01**	**0.81**	**-**	**-**	**21.5**	**49.2**	**5.9**	**6.9**	**1.1**	**7.1**	**-**	**-**
			2008-2009	**0.26**	**2.17**	**0.649**	**1.520**	**2.3**	**41.7**	**6.1**	**6.5**	**1.0**	**5.0**	**-**	**-**
			2009-2010	**-**	**-**	**0.100**	**1.540**	**25.2**	**134.5**	**5.9**	**6.5**	**0.1**	**5.4**	**-**	**-**
11	**Kodumudi**	**Cauvery**	**2007-2008**	**0.01**	**0.11**	**-**	**-**	**13.6**	**28.1**	**6.2**	**6.7**	**0.4**	**3.4**	**-**	**-**
			2008-2009	**0.01**	**0.02**	**0.010**	**0.095**	**2.6**	**27.7**	**6.0**	**7.0**	**0.5**	**2.0**	**-**	**-**
			2009-2010	**-**	**-**	**0.000**	**0.150**	**13.6**	**40.7**	**6.2**	**7.0**	**0.3**	**2.4**	**-**	**-**
12	**Savandapur**	**Bhavani**	**2007-2008**	**0.00**	**0.06**	**-**	**-**	**8.2**	**26.1**	**6.4**	**8.2**	**0.4**	**1.7**	**-**	**-**
			2008-2009	**0.01**	**0.01**	**0.010**	**0.017**	**2.4**	**20.1**	**6.2**	**8.3**	**0.5**	**2.0**	**-**	**-**
			2009-2010	**-**	**-**	**0.000**	**0.250**	**6.3**	**34.8**	**4.1**	**7.8**	**0.1**	**1.8**	**-**	**-**

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

Basin : Cauvery

Sl. No.	Site Name	Name of the River/ Stream	Years	Nitrite (NO2-N)		Phosphate (PO4)		Silica (SiO2)		DO		BOD3-27		Total Coliform (no.per 10 ml)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(41)	(42)	(43)	(44)	(45)	(46)	(47)	(48)	(49)	(50)	(51)	(52)
13	Thengumarahada	Moyar	2007-2008	0.01	0.18	-	-	5.2	11.6	6.6	8.1	0.3	5.2	-	-
			2008-2009	0.01	0.03	0.010	0.033	0.6	10.1	6.8	8.3	0.6	2.3	-	-
			2009-2010	-	-	0.000	0.100	3.6	16.3	5.8	8.2	0.2	3.0	-	-
14	Nellithurai	Bhavani	2007-2008	0.01	0.11	-	-	6.1	12.5	7.4	8.3	0.2	1.1	-	-
			2008-2009	0.01	0.01	0.010	0.010	1.2	6.8	7.9	8.5	0.2	1.8	-	-
			2009-2010	-	-	0.000	0.042	2.7	19.0	7.1	8.2	0.2	1.9	-	-
15	Urachikottai	Cauvery	2007-2008	0.00	0.09	-	-	12.5	18.1	7.4	8.9	0.3	2.1	-	-
			2008-2009	0.00	0.23	0.010	0.017	2.3	20.7	7.6	8.0	0.6	3.9	-	-
			2009-2010	-	-	0.000	1.100	12.8	33.1	5.4	8.6	0.5	2.0	-	-
16	Thevur	Sarabenga	2007-2008	0.02	0.18	-	-	27.3	33.5	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	0.040	0.150	26.9	46.5	-	-	-	-	-	-
17	Sevanur	Chittar	2007-2008	0.01	0.17	-	-	25.3	45.8	-	-	-	-	-	-
			2008-2009	-	-	0.010	0.050	2.0	27.7	-	-	-	-	-	-
			2009-2010	-	-	0.000	0.160	25.1	75.0	-	-	-	-	-	-
18	Thoppur	Thoppaiyar	2007-2008	0.01	0.45	-	-	29.4	55.2	-	-	-	-	-	-
			2008-2009	<----------Dry Bed---------->											
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
19	Kudlur	Palar	2007-2008	0.01	0.04	-	-	23.1	55.5	-	-	0.4	2.5	-	-
			2008-2009	0.01	0.01	0.010	0.012	5.8	55.3	-	-	0.4	1.4	-	-
			2009-2010	-	-	0.000	0.130	24.1	76.4	-	-	0.1	2.1		
20	Hogenekkal	Chinar	2007-2008	<----------Dry Bed---------->											
			2008-2009	<----------Dry Bed---------->											
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
21	Billgundulu	Cauvery	2007-2008	0.00	0.04	0.000	0.155	6.2	26.4	4.1	7.4	0.4	1.9	-	-
			2008-2009	0.00	0.44	0.000	0.124	16.9	22.6	5.2	7.3	0.4	2.2	-	-
			2009-2010	0.00	0.14	0.010	0.382	10.0	22.7	4.5	7.6	0.2	2.0	-	-

Contd/…

22	T.Bekuppe	Arkavathi	2007-2008	0.00	0.00	0.021	2.770	8.0	25.8	2.1	7.2	0.5	5.1	-	-
			2008-2009	0.00	1.01	1.013	1.953	33.7	39.6	2.0	6.8	0.3	5.2	-	-
			2009-2010	0.00	1.02	0.682	43.744	20.6	41.3	0.1	9.5	0.1	8.2	-	-
23	T.K.Halli	Shimsha	2007-2008	0.00	0.00	0.000	0.083	11.6	19.6	3.8	6.2	1.1	2.8	-	-
			2008-2009	0.00	0.03	0.000	0.072	18.7	28.2	3.4	6.3	0.8	2.6	-	-
			2009-2010	0.00	0.08	0.010	0.176	16.7	30.2	3.3	6.6	0.2	2.5	-	-
24	Kollegal	Cauvery	2007-2008	0.00	0.00	0.010	0.455	1.6	14.6	5.4	7.7	1.0	2.1	-	-
			2008-2009	0.00	0.04	0.000	0.103	16.9	20.6	3.0	7.5	0.6	2.8	-	-
			2009-2010	0.00	0.06	0.010	0.062	10.4	23.4	4.8	8.0	0.4	1.9	-	-

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

Basin : Cauvery

Sl. No.	Site Name	Name of the River/ Stream	Years	Nitrite (NO2-N)		Phosphate (po4)		Silica (SiO2)		DO		BOD3-27		Total Coliform (no.per 10 ml)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(41)	(42)	(43)	(44)	(45)	(46)	(47)	(48)	(49)	(50)	(51)	(52)
25	Bendrahalli	Suvarnavathi	2007-2008	0.00	0.00	0.000	0.114	10.6	13.6	-	-	-	-	-	-
			2008-2009	0.00	0.04	0.041	0.083	18.3	39.1	-	-	-	-	-	-
			2009-2010	0.00	0.14	0.021	0.176	19.0	42.6	-	-	-	-	-	-
26	T.Narasipur	Kabini	2007-2008	0.00	0.11	0.000	0.085	1.6	8.7	5.2	9.7	1.1	2.2	-	-
			2008-2009	0.00	0.01	0.000	0.114	17.5	25.9	4.2	6.9	0.6	2.2	-	-
			2009-2010	0.00	0.07	0.010	0.155	9.9	28.1	5.2	6.8	0.6	1.4	-	-
27	Muthankera	Kabini	2007-2008	<---------- Site not available ---------->											
			2008-2009	0.0	0.0	0.010	0.095	16.40	27.90	5.4	7.2	0.2	1.0	-	-
			2009-2010	-	-	0.010	0.129	26.87	31.30	7.0	7.2	0.2	0.6	-	-
28	K.M.Vadi	Lakshmanatirtha	2007-2008	0.00	0.00	0.703	0.703	2.8	2.8	-	-	-	-	-	-
			2008-2009	0.00	0.06	0.041	0.041	16.9	16.9	-	-	-	-	-	-
			2009-2010	0.00	0.12	0.000	0.031	12.7	25.2	-	-	-	-	-	-
29	Akkihebbal	Hemavathi	2007-2008	0.00	0.00	0.000	0.909	12.8	26.8	-	-	-	-	-	-
			2008-2009	0.00	0.04	0.000	0.062	15.8	23.1	-	-	-	-	-	-
			2009-2010	0.00	0.03	0.000	0.052	8.8	21.3	4.5	6.6	0.1	2.8	-	-
30	M.H.Halli	Hemavathi	2007-2008	0.00	0.00	0.041	1.013	1.9	16.8	5.3	7.0	0.9	2.1	-	-
			2008-2009	0.00	0.10	0.021	0.031	10.2	13.6	4.6	6.5	0.6	2.5	-	-
			2009-2010	0.00	0.03	0.000	0.010	9.7	13.9	4.8	6.8	0.8	1.6	-	-
31	Thimmanahalli	Yagachi	2007-2008	0.00	0.03	0.021	0.889	5.6	18.6	-	-	-	-	-	-
			2008-2009	0.00	0.04	0.000	0.052	12.0	19.9	-	-	-	-	-	-
			2009-2010	0.00	0.07	0.000	0.021	12.5	18.4	-	-	-	-	-	-
32	Sakleshpur	Hemavathi	2007-2008	0.00	0.00	0.017	0.083	5.9	15.6	-	-	-	-	-	-
			2008-2009	0.00	0.03	0.000	0.041	11.9	20.7	-	-	-	-	-	-
			2009-2010	0.00	0.04	0.000	0.031	10.9	19.5	-	-	-	-	-	-
33	Chunchankatte	Cauvery	2007-2008	<---------- Site not available ---------->											
			2008-2009	0.01	0.03	0.000	0.041	14.3	20.4	-	-	-	-	-	-
			2009-2010	0.00	0.06	0.000	0.010	7.9	17.3	-	-	-	-	-	-
34	Kudige	Cauvery	2007-2008	0.00	0.00	0.041	0.041	12.6	12.6	7.1	7.1	1.2	1.2	-	-
			2008-2009	0.00	0.00	0.000	0.041	15.5	20.0	5.6	7.2	0.5	1.4	-	-
			2009-2010	0.00	0.01	0.000	0.010	7.7	17.0	5.6	6.9	0.8	3.1	-	-

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

Basin : Cauvery

Sl. No.	Site Name	Name of the River/ Stream	Years	Faecal Coliform (no.per 10 ml)		Total plate count (no.per 10 ml)		Phytoplankton (no.per ml)		Zooplankton (no.per litre)		Arsenic (ppm)		Boron (ppm)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(53)	(54)	(55)	(56)	(57)	(58)	(59)	(60)	(61)	(62)	(63)	(64)
1	Gopurajapuram	Puravidaiyanar	2007-2008	<---------- Site not available ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
2	Annavasal	Natter	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
3	Nallathur	Nandalar	2007-2008	<---------- Site not available ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
4	Menangudi	Noolar	2007-2008	<---------- Site not available ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
5	Porakudi	Arasalar	2007-2008	<---------- Site not available ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
6	Peralam	Vanjiyar	2007-2008	<---------- Site not available ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
7	Thengudi	Thirumalairajanar	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
8	Musiri	Cauvery	2007-2008	-	-	-	-	-	-	-	-	5.03	5.03	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
9	Nallamaranpatty	Amaravathy	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/…

10	**Elunuthimangalam**	**Noyyal**	**2007-2008**	-	-	-	-	-	-	-	-	**23.69**	**23.69**	-	-
			2008-2009	-	-	-	-	-	-	-	-	**212.01**	**212.01**	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
11	**Kodumudi**	**Cauvery**	**2007-2008**	-	-	-	-	-	-	-	-	**6.83**	**6.83**	-	-
			2008-2009	-	-	-	-	-	-	-	-	**1.14**	**1.14**	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
12	**Savandapur**	**Bhavani**	**2007-2008**	-	-	-	-	-	-	-	-	**4.99**	**4.99**	-	-
			2008-2009	-	-	-	-	-	-	-	-	**8.13**	**8.13**	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

Basin : Cauvery

Sl. No.	Site Name	Name of the River/ Stream	Years	Faecal Coliform (no.per 10 ml)		Total plate count (no.per 10 ml)		Phytoplankton (no.per ml)		Zooplankton (no.per litre)		Arsenic (ppm)		Boron (ppm)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(53)	(54)	(55)	(56)	(57)	(58)	(59)	(60)	(61)	(62)	(63)	(64)
13	Thengumarahada	Moyar	2007-2008	-	-	-	-	-	-	-	-	3.64	3.64	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
14	Nellithurai	Bhavani	2007-2008	-	-	-	-	-	-	-	-	3.20	3.20	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
15	Urachikottai	Cauvery	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
16	Thevur	Sarabenga	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
17	Sevanur	Chittar	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	25.03	25.03	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
18	Thoppur	Thoppaiyar	2007-2008	-	-	-	-	-	-	-	-	14.33	14.33	-	-
			2008-2009	<----------Dry Bed---------->											
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
19	Kudlur	Palar	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
20	Hogenekkal	Chinar	2007-2008	<----------Dry Bed---------->											
			2008-2009	<----------Dry Bed---------->											
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
21	Billgundulu	Cauvery	2007-2008	-	-	-	-	-	-	-	-	12.9	12.9	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
22	T.Bekuppe	Arkavathi	2007-2008	-	-	-	-	-	-	-	-	11.9	11.9	-	-

Contd/…

			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
23	**T.K.Halli**	**Shimsha**	**2007-2008**	-	-	-	-	-	-	-	-	**4.5**	**4.5**	-	-
			2008-2009	-	-	-	-	-	-	-	-	**23.83**	**23.83**	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
24	**Kollegal**	**Cauvery**	**2007-2008**	-	-	-	-	-	-	-	-	**11.7**	**11.7**	-	-
			2008-2009	-	-	-	-	-	-	-	-	**24.38**	**24.38**	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

Basin : Cauvery

Sl. No.	Site Name	Name of the River/ Stream	Years	Faecal Coliform (no.per 10 ml)		Total plate count (no.per 10 ml)		Phytoplankton (no.per ml)		Zooplankton (no.per litre)		Arsenic (ppm)		Boron (ppm)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(53)	(54)	(55)	(56)	(57)	(58)	(59)	(60)	(61)	(62)	(63)	(64)
25	Bendrahalli	Suvarnavathi	2007-2008	-	-	-	-	-	-	-	-	15.5	15.5	-	-
			2008-2009	-	-	-	-	-	-	-	-	32.02	32.02	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
26	T.Narasipur	Kabini	2007-2008	-	-	-	-	-	-	-	-	9.5	9.5	-	-
			2008-2009	-	-	-	-	-	-	-	-	1.69	1.69	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
27	Muthankera	Kabini	2007-2008	<---------- Site not available ---------->											
			2008-2009	-	-	-	-	-	-	-	-	12.53	12.53	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
28	K.M.Vadi	Lakshmanatirtha	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
29	Akkihebbal	Hemavathi	2007-2008	-	-	-	-	-	-	-	-	7.6	7.6	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
30	M.H.Halli	Hemavathi	2007-2008	-	-	-	-	-	-	-	-	6.6	6.6	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
31	Thimmanahalli	Yagachi	2007-2008	-	-	-	-	-	-	-	-	8.4	8.4	-	-
			2008-2009												
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
32	Sakleshpur	Hemavathi	2007-2008	-	-	-	-	-	-	-	-	10.0	10.0	-	-
			2008-2009	-	-	-	-	-	-	-	-	7.42	7.42	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
33	Chunchankatte	Cauvery	2007-2008	<---------- Site not available ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
34	Kudige	Cauvery	2007-2008	-	-	-	-	-	-	-	-	7.3	7.3	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-		-	-	-	-

Contd/…

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

Basin : Cauvery

Sl. No.	Site Name	Name of the River/ Stream	Years	Cadmium (ppm)		Chromium (ppm)		Copper (ppm)		Cyanide (ppm)		Lead (ppm)		Manganese (ppm)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(65)	(66)	(67)	(68)	(69)	(70)	(71)	(72)	(73)	(74)	(75)	(76)
1	Gopurajapuram	Puravidaiyanar	2007-2008	<---------- Site not available ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
2	Annavasal	Natter	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
3	Nallathur	Nandalar	2007-2008	<---------- Site not available ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
4	Menangudi	Noolar	2007-2008	<---------- Site not available ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
5	Porakudi	Arasalar	2007-2008	<---------- Site not available ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
6	Peralam	Vanjiyar	2007-2008	<---------- Site not available ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
7	Thengudi	Thirumalairajanar	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
8	Musiri	Cauvery	2007-2008	0.73	0.73	-	-	1.05	1.05	-	-	2.29	2.29	-	-
			2008-2009	-	-	2.24	2.24	2.41	2.41	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
9	Nallamaranpatty	Amaravathy	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/…

10	**Elunuthimangalam**	**Noyyal**	**2007-2008**	**39.40**	**39.40**	**-**	**-**	**26.15**	**26.15**	**-**	**-**	**20.98**	**20.98**	**-**	**-**
			2008-2009	**-**	**-**	**8.84**	**8.84**	**18.08**	**18.08**	**-**	**-**	**5.16**	**5.16**	**-**	**-**
			2009-2010	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**
11	**Kodumudi**	**Cauvery**	**2007-2008**	**0.73**	**0.73**	**-**	**-**	**1.04**	**1.04**	**-**	**-**	**2.25**	**2.25**	**-**	**-**
			2008-2009	**-**	**-**	**2.98**	**2.98**	**3.17**	**3.17**	**-**	**-**	**-**	**-**	**-**	**-**
			2009-2010	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**
12	**Savandapur**	**Bhavani**	**2007-2008**	**0.57**	**0.57**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**
			2008-2009	**-**	**-**	**-**	**-**	**1.47**	**1.47**	**-**	**-**	**1.25**	**1.25**	**-**	**-**
			2009-2010	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**

Contd/…

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

Basin : Cauvery

Sl. No.	Site Name	Name of the River/ Stream	Years	Cadmium (ppm)		Chromium (ppm)		Copper (ppm)		Cyanide (ppm)		Lead (ppm)		Manganese (ppm)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(65)	(66)	(67)	(68)	(69)	(70)	(71)	(72)	(73)	(74)	(75)	(76)
13	Thengumarahada	Moyar	2007-2008	0.58	0.58	-	-	-	-	-	-	1.38	1.38	-	-
			2008-2009	-	-	-	-	1.55	1.55	-	-	1.01	1.01	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
14	Nellithurai	Bhavani	2007-2008	0.60	0.60	-	-	-	-	-	-	1.45	1.45	-	-
			2008-2009	-	-	-	-	1.48	1.48	-	-	1.65	1.65	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
15	Urachikottai	Cauvery	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	3.05	3.05	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
16	Thevur	Sarabenga	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
17	Sevanur	Chittar	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	4.76	4.76	9.18	9.18	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
18	Thoppur	Thoppaiyar	2007-2008	0.84	0.84	-	-	3.33	3.33	-	-	-	-	-	-
			2008-2009	<----------Dry Bed---------->											
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
19	Kudlur	Palar	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
20	Hogenekkal	Chinar	2007-2008	<----------Dry Bed---------->											
			2008-2009	<----------Dry Bed---------->											
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
21	Billgundulu	Cauvery	2007-2008	1.0	1.0	-	-	4.0	4.0	-	-	1.5	1.5	-	-
			2008-2009	-	-	-	-	4.66	4.66	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
22	T.Bekuppe	Arkavathi	2007-2008	1.0	1.0	-	-	14.8	14.8	-	-	1.6	1.6	-	-
			2008-2009	-	-	2.01	2.01	12.49	12.49	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/…

23	**T.K.Halli**	**Shimsha**	**2007-2008**	**1.2**	**1.2**	**-**	**-**	**-**	**-**	**-**	**-**	**3.1**	**3.1**	**-**	**-**
			2008-2009	**-**	**-**	**3.49**	**3.49**	**5.00**	**5.00**	**-**	**-**	**-**	**-**	**-**	**-**
			2009-2010	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**
24	**Kollegal**	**Cauvery**	**2007-2008**	**1.1**	**1.1**	**-**	**-**	**2.4**	**2.4**	**-**	**-**	**-**	**-**	**-**	**-**
			2008-2009	**-**	**-**	**2.09**	**2.09**	**17.94**	**17.94**	**-**	**-**	**1.84**	**1.84**	**-**	**-**
			2009-2010	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	

Contd/…

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

Basin : Cauvery

Sl. No.	Site Name	Name of the River/ Stream	Years	Cadmium (ppm)		Chromium (ppm)		Copper (ppm)		Cyanide (ppm)		Lead (ppm)		Manganese (ppm)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(65)	(66)	(67)	(68)	(69)	(70)	(71)	(72)	(73)	(74)	(75)	(76)
25	Bendrahalli	Suvarnavathi	2007-2008	1.1	1.1	-	-	3.0	3.0	-	-	-	-	-	-
			2008-2009	-	-	3.22	3.22	15.37	15.37	-	-	2.11	2.11	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
26	T.Narasipur	Kabini	2007-2008	0.9	0.9	-	-	3.1	3.1	-	-	1.3	1.3	-	-
			2008-2009	-	-	-	-	3.72	3.72	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
27	Muthankera	Kabini	2007-2008	<---------- Site not available ---------->											
			2008-2009	-	-	2.00	2.00	1.00	1.00	-	-	1.00	1.00	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
28	K.M.Vadi	Lakshmanatirtha	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
29	Akkihebbal	Hemavathi	2007-2008	1.0	1.0	-	-	3.0	3.0	-	-	1.6	1.6	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
30	M.H.Halli	Hemavathi	2007-2008	1.0	1.0	-	-	3.0	3.0	-	-	9.6	9.6	-	-
			2008-2009	-	-	-	-	1.69	1.69	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
31	Thimmanahalli	Yagachi	2007-2008	1.0	1.0	-	-	3.9	3.9	-	-	1.8	1.8	-	-
			2008-2009	-	-	-	-	3.18	3.18	-	-	-	-	-	-
			2009-2010												
32	Sakleshpur	Hemavathi	2007-2008	1.1	1.1	-	-	3.4	3.4	-	-	1.5	1.5	-	-
			2008-2009	-	-	2.39	2.39	6.35	6.35	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
33	Chunchankatte	Cauvery	2007-2008	<---------- Site not available ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
34	Kudige	Cauvery	2007-2008	1.0	1.0	-	-	4.3	4.3	-	-	1.4	1.4	-	-
			2008-2009	-	-	-	-	1.13	1.13	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

Basin : Cauvery

Sl. No.	Site Name	Name of the River/ Stream	Years	Mercury (ppm)		Zinc (ppm)		Total Hardness		Sodium % (Na%)		SAR		RSC	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(77)	(78)	(79)	(80)	(81)	(82)	(83)	(84)	(85)	(86)	(87)	(88)
1	Gopurajapuram	Puravidaiyanar	2007-2008	<---------- Site not available ---------->											
			2008-2009	-	-	-	-	77	77	-	-	-	-	0.1	0.1
			2009-2010	-	-	-	-	77	203	55	64	3.0	4.7	1.7	2.3
2	Annavasal	Natter	2007-2008	-	-	-	-	97	169	-	-	0.8	1.6	0.0	0.2
			2008-2009	-	-	-	-	124	181	-	-	-	-	0.0	0.7
			2009-2010	-	-	-	-	110	179	36	63	1.3	4.2	0.4	2.9
3	Nallathur	Nandalar	2007-2008	<---------- Site not available ---------->											
			2008-2009	-	-	-	-	95	136	-	-	-	-	0.1	1.3
			2009-2010	-	-	-	-	122	142	62	63	4.0	4.1	2.8	2.9
4	Menangudi	Noolar	2007-2008	<---------- Site not available ---------->											
			2008-2009	-	-	-	-	101	153	-	-	-	-	0.2	0.4
			2009-2010	-	-	-	-	110	138	34	64	1.2	4.2	0.1	3.4
5	Porakudi	Arasalar	2007-2008	<---------- Site not available ---------->											
			2008-2009	-	-	-	-	103	149	-	-	-	-	0.2	2.3
			2009-2010	-	-	-	-	126	175	28	62	1.0	3.9	0.6	2.8
6	Peralam	Vanjiyar	2007-2008	<---------- Site not available ---------->											
			2008-2009	-	-	-	-	105	189	-	-	-	-	0.1	0.9
			2009-2010	-	-	-	-	106	195	30	66	1.1	4.3	0.5	2.8
7	Thengudi	Thirumalairajanar	2007-2008	-	-	-	-	109	201	-	-	0.8	1.6	0.0	2.5
			2008-2009	-	-	-	-	117	236	-	-	-	-	0.0	0.0
			2009-2010	-	-	-	-	57	191	49	69	2.6	4.0	0.2	3.1
8	Musiri	Cauvery	2007-2008	-	-	9.00	9.00	93	242	31	55	0.9	3.5	0.0	0.4
			2008-2009	-	-	-	-	125	213	32	51	1.1	3.0	0.0	0.7
			2009-2010	-	-	-	-	57	254	30	52	0.7	3.0	0.0	0.4
9	Nallamaranpatty	Amaravathy	2007-2008	-	-	-	-	101	252	29	48	0.9	2.9	0.0	0.3
			2008-2009	-	-	-	-	85	223	38	54	1.3	3.6	0.0	0.4
			2009-2010	-	-	-	-	104	213	31	38	0.9	1.9	0.0	0.5
10	Elunuthimangalam	Noyyal	2007-2008	-	-	19.0	19.0	226	847	53	80	5.0	24.3	0.0	0.0
			2008-2009	-	-	-	-	394	1028	50	84	4.2	29.5	0.0	4.3
			2009-2010	-	-	-	-	318	1041	57	83	5.7	29.9	0.0	0.4

Contd/…

11	**Kodumudi**	**Cauvery**	**2007-2008**	**-**	**-**	**7.00**	**7.00**	**76**	**252**	**29**	**49**	**0.8**	**2.9**	**0.0**	**0.5**
			2008-2009	**-**	**-**	**-**	**-**	**97**	**274**	**33**	**45**	**1.0**	**2.2**	**0.0**	**1.0**
			2009-2010	**-**	**-**	**-**	**-**	**93**	**201**	**29**	**45**	**0.8**	**2.3**	**0.0**	**0.4**
12	**Savandapur**	**Bhavani**	**2007-2008**	**-**	**-**	**7.00**	**7.00**	**16**	**185**	**19**	**32**	**0.3**	**1.1**	**0.0**	**0.3**
			2008-2009	**-**	**-**	**-**	**-**	**96**	**189**	**20**	**29**	**0.6**	**1.0**	**0.0**	**0.5**
			2009-2010	**-**	**-**	**-**	**-**	**68**	**169**	**19**	**33**	**0.4**	**0.8**	**0.0**	**0.1**

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

Basin : Cauvery

Sl. No.	Site Name	Name of the River/ Stream	Years	Mercury (ppm)		Zinc (ppm)		Total Hardness		Sodium % (Na%)		SAR		RSC	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(77)	(78)	(79)	(80)	(81)	(82)	(83)	(84)	(85)	(86)	(87)	(88)
13	Thengumarahada	Moyar	2007-2008	-	-	7.00	7.00	36	76	13	22	0.2	0.4	0.0	0.0
			2008-2009	-	-	-	-	40	93	13	27	0.3	0.7	0.0	0.0
			2009-2010	-	-	-	-	44	84	12	19	0.2	0.4	0.0	0.0
14	Nellithurai	Bhavani	2007-2008	-	-	7.00	7.00	20	57	22	33	0.3	0.7	0.0	0.0
			2008-2009	-	-	-	-	16	60	16	33	0.2	0.7	0.0	0.2
			2009-2010	-	-	-	-	20	61	19	28	0.3	0.6	0.0	0.1
15	Urachikottai	Cauvery	2007-2008	-	-	-	-	60	133	24	38	0.5	1.4	0.0	0.6
			2008-2009	-	-	-	-	76	177	25	42	0.8	1.4	0.0	0.7
			2009-2010	-	-	-	-	84	189	27	34	0.8	1.2	0.0	0.4
16	Thevur	Sarabenga	2007-2008	-	-	-	-	117	250	0.7	1.7	2.1	3.1	0.7	1.7
			2008-2009	-	-	-	-	283	283	31	31	1.6	1.6	0.3	0.3
			2009-2010	-	-	-	-	267	298	36	39	1.9	2.1	0.8	1.2
17	Sevanur	Chittar	2007-2008	-	-	-	-	242	298	27	31	1.2	1.6	0.0	0.6
			2008-2009	-	-	-	-	216	347	28	49	1.4	3.0	0.0	2.6
			2009-2010	-	-	-	-	261	334	24	32	1.1	1.8	0.0	1.1
18	Thoppur	Thoppaiyar	2007-2008	-	-	11.00	11.00	335	404	43	46	2.8	3.5	0.2	1.6
			2008-2009	<----------Dry Bed---------->											
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
19	Kudlur	Palar	2007-2008	-	-	-	-	161	313	37	43	1.6	2.6	1.3	2.3
			2008-2009	-	-	-	-	129	290	34	41	1.3	2.4	0.9	2.6
			2009-2010	-	-	-	-	149	399	31	43	1.2	2.5	0.0	3.0
20	Hogenekkal	Chinar	2007-2008	<----------Dry Bed---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
21	Billgundulu	Cauvery	2007-2008	-	-	64.0	64.0	51	178	12	58	0.4	2.6	0.0	0.2
			2008-2009	-	-	-	-	48	177	20	47	0.6	2.1	0.0	1.1
			2009-2010	-	-	-	-	56	181	17	43	0.3	2.1	0.0	0.6
22	T.Bekuppe	Arkavathi	2007-2008	-	-	35.0	35.0	65	399	30	50	1.6	2.8	0.0	0.5
			2008-2009	-	-	-	-	153	342	41	49	2.3	3.6	0.0	0.7
			2009-2010	-	-	-	-	169	334	42	51	2.2	3.7	0.0	1.1

Contd/…

23	**T.K.Halli**	**Shimsha**	**2007-2008**	**-**	**-**	**35.0**	**35.0**	**107**	**173**	**17**	**41**	**0.6**	**1.7**	**0.0**	**0.1**
			2008-2009	**-**	**-**	**-**	**-**	**141**	**209**	**34**	**50**	**1.3**	**2.8**	**0.0**	**1.8**
			2009-2010	**-**	**-**	**-**	**-**	**108**	**185**	**33**	**50**	**1.3**	**2.7**	**0.6**	**2.5**
24	**Kollegal**	**Cauvery**	**2007-2008**	**-**	**-**	**32.0**	**32.0**	**71**	**169**	**23**	**47**	**0.8**	**2.2**	**0.0**	**0.5**
			2008-2009	**-**	**-**	**-**	**-**	**64**	**169**	**15**	**30**	**0.4**	**1.1**	**0.0**	**0.5**
			2009-2010	**-**	**-**	**-**	**-**	**48**	**157**	**25**	**29**	**0.5**	**1.0**	**0.1**	**0.5**

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

Basin : Cauvery

Sl. No.	Site Name	Name of the River/ Stream	Years	Mercury (ppm)		Zinc (ppm)		Total Hardness		Sodium % (Na%)		SAR		RSC	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(77)	(78)	(79)	(80)	(81)	(82)	(83)	(84)	(85)	(86)	(87)	(88)
25	Bendrahalli	Suvarnavathi	2007-2008	-	-	60.0	60.0	106	114	26	30	0.8	0.9	0.0	0.0
			2008-2009	-	-	-	-	101	249	33	50	1.7	3.3	0.3	2.7
			2009-2010	-	-	-	-	113	261	40	50	1.7	3.3	0.9	2.7
26	T.Narasipur	Kabini	2007-2008	-	-	29.0	29.0	51	155	12	71	0.3	3.6	0.0	0.1
			2008-2009	-	-	-	-	40	197	20	30	0.3	1.2	0.0	0.8
			2009-2010	-	-	-	-	40	217	20	34	0.3	1.4	0.0	0.9
27	Muthankera	Kabini	2007-2008	<---------- Site not available ---------->											
			2008-2009	-	-	-	-	16	38	25	33	0.0	1.0	0.0	0.0
			2009-2010	-	-	-	-	24	33	25	34	0	1	0.00	0.12
28	K.M.Vadi	Lakshmanatirtha	2007-2008	-	-	-	-	177	177	37	37	1.6	1.6	0.0	0.0
			2008-2009	-	-	-	-	44	109	24	30	0.4	0.9	0.0	0.5
			2009-2010	-	-	-	-	52	201	26	31	0.5	1.3	0.0	0.7
29	Akkihebbal	Hemavathi	2007-2008	-	-	32.0	32.0	35	140	22	55	0.5	1.7	0.0	0.0
			2008-2009	-	-	-	-	28	197	14	27	0.4	0.8	0.0	0.4
			2009-2010	-	-	-	-	36	141	22	25	0.4	0.8	0.0	0.3
30	M.H.Halli	Hemavathi	2007-2008	-	-	41.0	41.0	28	67	14	54	0.3	1.8	0.0	0.2
			2008-2009	-	-	-	-	36	72	23	43	0.4	1.0	0.0	0.1
			2009-2010	-	-	-	-	40	64	19	29	0.4	0.6	0.0	0.1
31	Thimmanahalli	Yagachi	2007-2008	-	-	33.0	33.0	36	95	13	69	0.3	3.2	0.0	0.2
			2008-2009	-	-	-	-	52	100	24	35	0.6	0.9	0.0	0.2
			2009-2010	-	-	-	-	52	88	28	34	0.6	1.0	0.0	0.2
32	Sakleshpur	Hemavathi	2007-2008	-	-	29.0	29.0	13	43	14	61	0.2	1.6	0.0	0.0
			2008-2009	-	-	-	-	16	44	19	34	0.3	0.6	0.0	0.1
			2009-2010	-	-	-	-	20	36	21	30	0.3	0.5	0.0	0.1
33	Chunchankatte	Cauvery	2007-2008	<---------- Site not available ---------->											
			2008-2009	-	-	-	-	76	121	22	25	0.6	0.7	0.1	0.3
			2009-2010	-	-	-	-	24	101	18	24	0.2	0.6	0.0	0.3
34	Kudige	Cauvery	2007-2008	-	-	30.0	30.0	48	48	32	32	0.7	0.7	0.0	0.0
			2008-2009	-	-	-	-	20	72	20	45	0.3	0.8	0.0	0.1
			2009-2010	-	-	-	-	20	52	19	22	0.2	0.4	0.0	0.1

Source: Water Quality Year Book for the period of 2007-2008 to 2009-2010.

Note : 1. All the ionic concentrations are expressed in mg./lit. unless mentioned otherwise.

2. (-) indicate that analyis of a particular parameter has not been carried out.

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

VIII Basin : East Flowing River

Sl. No.	Site Name	Name of the River/ Stream	Years	Q (Cumecs)		Temperature °C		pH_GEN		Sp.Conductance		Potassium (K)		Sodium (Na)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
1	Marella	Gundalakamma	2007-2008	0.000	396.8	26.0	28.0	6.8	8.1	-	-	3.2	8.7	92.0	155.0
			2008-2009	0.025	1067.00	25.0	28.0	6.7	8.8	-	-	1.1	8.5	45.3	290.0
			2009-2010	0.000	1054	25.0	31.0	6.7	8.4	-	-	3.5	13.7	92.4	192.0
2	Nellore	Pennar	2007-2008	0.000	757.4	26.0	27.5	7.6	8.2	-	-	-	-	26	32
			2008-2009	0.000	61.66	24.0	26.5	7.3	7.8	-	-	3.0	3.0	79.4	79.4
			2009-2010	0.000	412.1	25.0	27.0	7.8	8.3	-	-	4.3	11.1	58.9	142.6
3	Nandipalli	Pennar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	0.000	519.20	26.0	32.5	7.5	8.5	-	-	2.3	2.3	139.9	139.9
			2009-2010	0.000	99.19	26.0	30.0	7.9	8.4	-	-	2.2	15.5	42.0	285.1
4	Chennur	Pennar	2007-2008	0.000	3954	22.0	28.0	7.3	8.5	-	-	-	-	40.1	64.3
			2008-2009	0.000	833.60	22.0	29.0	7.6	8.6	-	-	3.2	4.1	146.5	232.5
			2009-2010	0.000	4330	23.5	27.5	7.5	8.5	-	-	2.5	13.0	56.7	207.1
5	Kamalapuram	Papagni	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	0.000	39.67	25.0	26.5	7.7	8.4	-	-	-	-	-	-
			2009-2010	0.000	9.824	23.5	23.5	8.1	8.1	-	-	3.4	3.4	40.5	40.5
6	Alladupalli	Kunderu	2007-2008	0.000	2752	20.0	30.0	7.3	8.4	-	-	-	-	40.0	62.8
			2008-2009	0.000	442.9	20.0	29.5	7.4	8.6	-	-	2.9	5.0	179.8	197.1
			2009-2010	0.000	2667	21.0	28.5	7.0	7.0	-	-	3.1	14.0	35.5	182.6
7	Tadipatri	Pennar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	0.000	50.35	23.0	28.5	7.7	8.5	-	-	-	-	-	-
			2009-2010	0.000	24.71	24.0	29.0	8.0	8.5	-	-	6.5	10.2	92.5	245.1
8	Nagalamadike	Pennar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	0.000	48.58	29.0	29.0	7.1	7.1	-	-	-	-	-	-
			2009-2010	<----------Dry Bed ---------->											
9	Singavaram	Chitravathi	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	<----------Dry Bed ---------->											
			2009-2010	<----------Dry Bed ---------->											

Contd/…

10	**Naidupeta**	**Swarnamukhi**	**2007-2008**	**0.000**	**1480**	**24.0**	**27.0**	**7.2**	**8.9**	**-**	**-**	**-**	**-**		**23.9**	**28.5**
			2008-2009	**0.000**	**612.6**	**23.0**	**25.5**	**7.3**	**7.8**	**-**	**-**	**-**	**-**	**-**		**-**
			2009-2010	**0.000**	**26.00**	**25.5**	**26.5**	**7.5**	**8.4**	**-**	**-**	**4.3**	**13.5**		**37.8**	**91.0**
11	**Sulurpet**	**Kalingi**	**2007-2008**	<---------- **Site is not avalable** ---------->												
			2008-2009	**0.000**	**3937.0**	**25.0**	**27.0**	**6.9**	**7.6**	**-**	**-**	**-**	**-**	**-**		**-**
			2009-2010	**0.000**	**408.1**	**26.0**	**28.0**	**7.8**	**8.0**	**-**	**-**	**5.6**	**6.2**		**63.5**	**85.4**
12	**Chengalpet**	**Palar**	**2007-2008**	**0.000**	**301.2**	**20.5**	**27.0**	**7.1**	**7.9**	**-**	**-**	**-**	**-**		**19.9**	**27.5**
			2008-2009	**0.000**	**458.1**	**23.0**	**26.0**	**7.1**	**7.7**	**-**	**-**	**-**	**-**	**-**		**-**
			2009-2010	**0.000**	**39.26**	**24.0**	**25.5**	**6.9**	**8.1**	**-**	**-**	**5.0**	**11.0**		**22.1**	**110.5**
13	**Magaral**	**Cheyar**	**2007-2008**	**0.000**	**218.4**	**23.5**	**23.5**	**7.7**	**7.7**	**-**	**-**	**-**	**-**		**29.7**	**29.7**
			2008-2009	**0.000**	**225.7**	**33.0**	**33.0**	**7.8**	**7.8**	**-**	**-**	**-**	**-**	**-**		**-**
			2009-2010	<----------**Dry Bed** ---------->												

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

VIII Basin : East Flowing River

Sl. No.	Site Name	Name of the River/ Stream	Years	Q (Cumecs)		Temperature °C		pH_GEN		Sp.Conductance		Potassium (K)		Sodium (Na)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
14	Arcot	Palar	2007-2008	0.000	9.913	22.0	25.0	7.9	8.4	-	-	-	-	43.8	43.8
			2008-2009	0.000	1.650	27.0	27.0	7.1	7.1	-	-	-	-	-	-
			2009-2010	<----------Dry Bed ---------->											
15	Avarankuppam	Palar	2007-2008	0.000	4.801	20.5	23.0	8.2	8.6	-	-	2.2	3.3	109.4	145.6
			2008-2009	0.000	43.37	21.5	22.5	8.2	8.4	-	-	1.2	2.6	71.7	143.0
			2009-2010	0.000	32.81	22.5	23.5	7.9	8.7	-	-	1.9	3.2	93.8	181.8
16	Kumarapalayam	Varahandi	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	0.000	200.30	28.5	28.5	7.0	7.0	-	-	-	-	-	-
			2009-2010	0.000	43.88	24.3	28.0	7.8	7.9	-	-	3.1	5.0	23.5	48.6
17	Villupuram	Ponnaiyar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	0.000	330.70	25.0	25.0	7.8	7.8	-	-	-	-	-	-
			2009-2010	0.000	25.91	26.5	26.5	8.6	8.6	-	-	7.0	7.0	70.1	70.1
18	Vazhavachanur	Ponnaiyar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	0.000	141.90	24.5	30.5	7.7	7.9	-	-	2.1	3.0	102.0	111.0
			2009-2010	0.000	49.90	25.0	32.0	7.4	8.4	-	-	4.7	15.0	92.0	226.6
19	Gummanur	Ponniyar	2007-2008	0.000	82.53	22.0	24.0	8.0	9.0	-	-	13.4	22.5	88.6	132.4
			2008-2009	0.000	94.97	19.0	26.0	7.9	8.7	-	-	4.4	19.8	72.9	133.0
			2009-2010	0.000	102.7	21.5	26.5	8.0	8.9	-	-	10.2	21.1	82.4	151.0
20	Kudalaiyathur	Vellar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	0.000	1692.00	23.0	26.0	7.3	8.3	-	-	-	-	-	-
			2009-2010	0.000	532.8	27.0	28.5	8.0	8.1	-	-	6.5	7.8	50.5	94.5
21	Paramakudi	Vaigai	2007-2008	0.000	293.6	26.0	28.5	8.7	8.7	-	-	5.2	6.1	41.3	45.8
			2008-2009	0.000	81.5	27.5	27.5	8.5	8.5	-	-	4.5	4.5	25.3	25.3
			2009-2010	0.000	32.14	26.5	26.5	7.6	7.6	-	-	4.0	4.0	13.6	13.6
22	Theni	Suruliyar	2007-2008	0.000	500.5	20.0	25.0	7.4	8.1	-	-	1.3	6.9	4.1	54.1
			2008-2009	0.000	123.7	20.0	25.5	7.4	8.1	-	-	0.9	7.2	5.1	29.8
			2009-2010	0.000	79.69	22.5	26.0	7.4	8.3	-	-	1.2	6.4	4.9	20.9

Contd//.

23	**Ambasamudram**	**Vaigai**	**2007-2008**	**0.000**	**160.0**	**20.0**	**23.0**	**8.1**	**8.7**	**-**	**-**	**3.2**	**6.3**	**14.8**	**72.3**
			2008-2009	**0.000**	**107.8**	**20.5**	**22.5**	**7.9**	**8.6**	**-**	**-**	**2.6**	**11.6**	**17.7**	**87.2**
			2009-2010	**0.000**	**74.00**	**21.0**	**22.0**	**8.0**	**8.3**	**-**	**-**	**2.5**	**3.9**	**4.4**	**16.9**
24	**Irukkankudi**	**Vaippar**	**2007-2008**	**0.000**	**16.50**	**16.3**	**22.5**	**7.9**	**9.1**	**-**	**-**	**5.2**	**8.1**	**46.2**	**146.6**
			2008-2009	**0.000**	**137.40**	**16.0**	**19.3**	**7.9**	**8.5**	**-**	**-**	**4.7**	**7.5**	**122.1**	**136.2**
			2009-2010	**<----------Dry Bed ----------->**											
25	**Murappanadu**	**Tambraparani**	**2007-2008**	**3.132**	**631.8**	**25.5**	**29.5**	**7.2**	**8.1**	**-**	**-**	**1.5**	**5.7**	**8.8**	**38.0**
			2008-2009	**1.816**	**486.8**	**25.0**	**31.0**	**7.2**	**8.0**	**-**	**-**	**1.1**	**7.6**	**8.1**	**32.2**
			2009-2010	**2.084**	**271.3**	**25.5**	**29.0**	**7.2**	**7.7**	**-**	**-**	**1.1**	**3.9**	**7.5**	**20.3**
26	**A.P. Puram**	**Chittar**	**2007-2008**	**0.000**	**112.3**	**21.0**	**25.5**	**8.0**	**8.6**	**-**	**-**	**6.5**	**10.3**	**103.5**	**417.0**
			2008-2009	**0.000**	**1.804**	**19.0**	**25.0**	**7.6**	**8.6**	**-**	**-**	**4.7**	**16.2**	**146.5**	**378.0**
			2009-2010	**0.000**	**105.0**	**20.5**	**26.5**	**7.5**	**8.3**	**-**	**-**	**6.6**	**10.5**	**171.4**	**422.0**

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

VIII Basin : East Flowing River

Sl. No.	Site Name	Name of the River/ Stream	Years	Calcium (Ca)		Magnesium (Mg)		Aluminium		Iron (Fe)		Ammonia (NH3-N)		Carbonate (CO3)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)	(25)	(26)	(27)	(28)
1	Marella	Gundalakamma	2007-2008	34	42	11.0	22.0	-	-	0.0	0.0	0.05	0.05	0.0	0.0
			2008-2009	34	71	7.8	21.4	-	-	0.0	0.0	0.05	0.05	0.0	9.6
			2009-2010	24	51	10.7	25.3	-	-	0.0	0.0	0.00	0.00	0.0	9.6
2	Nellore	Pennar	2007-2008	26	32	13.6	14.6	-	-	-	-	-	-	0.0	0.0
			2008-2009	23	37	10.7	10.7	-	-	-	-	-	-	0.0	0.0
			2009-2010	23	31	8.7	21.4	-	-	-	-	-	-	0.0	25.0
3	Nandipalli	Pennar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	11	32	7.8	25.8	-	-	-	-	-	-	0.0	61.1
			2009-2010	10	28	15.6	29.2	-	-	-	-	-	-	0.0	55.0
4	Chennur	Pennar	2007-2008	30	42	8.7	23.8	-	-	-	-	-	-	0.0	12.5
			2008-2009	13	41	11.2	38.9	-	-	-	-	-	-	0.0	45.0
			2009-2010	23	53	8.7	38.9	-	-	-	-	-	-	0.0	50.0
5	Kamalapuram	Papagni	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	14	26	9.7	15.1	-	-	-	-	-	-	0.0	25.0
			2009-2010	16	16	4.9	4.9	-	-	-	-	-	-	0.0	0.0
6	Alladupalli	Kunderu	2007-2008	16	50	7.8	30.6	-	-	-	-	-	-	0.0	17.5
			2008-2009	19	55	10.7	37.9	-	-	-	-	-	-	0.0	45.8
			2009-2010	21	60	9.7	36.9	-	-	-	-	-	-	0.0	50.0
7	Tadipatri	Pennar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	14	38	7.3	33.0	-	-	-	-	-	-	0.0	50.0
			2009-2010	18	26	13.6	24.3	-	-	-	-	-	-	0.0	60.0
8	Nagalamadike	Pennar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	18	18	6.8	6.8	-	-	-	-	-	-	0.0	0.0
			2009-2010	<----------Dry Bed ---------->											
9	Singavaram	Chitravathi	2007-2008	<---------- Site is not avalable ---------->											

Contd/…

			2008-2009		<----------Dry Bed ---------->											
			2009-2010		<----------Dry Bed ---------->											
10	Naidupeta	Swarnamukhi	2007-2008	18	30	5.8	19.0	-	-	-	-	-	-	0.0	18.8
			2008-2009	18	26	8.7	11.7	-	-	-	-	-	-	0.0	0.0
			2009-2010	11	31	8.7	22.4	-	-	-	-	-	-	0.0	25.0
11	Sulurpet	Kalingi	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	17	29	5.8	14.6	-	-	-	-	-	-	0.0	0.0
			2009-2010	16	26	7.8	8.7	-	-	-	-	-	-	0.0	0.0
12	Chengalpet	Palar	2007-2008	18	40	9.7	21.9	-	-	-	-	-	-	0.0	0.0
			2008-2009	19	42	11.7	23.3	-	-	-	-	-	-	0.0	0.0
			2009-2010	21	33	13.6	28.2	-	-	-	-	-	-	0.0	0.0
13	Magaral	Cheyar	2007-2008	22	22	7.8	7.8	-	-	-	-	-	-	0.0	0.0
			2008-2009	27	27	17.5	17.5	-	-	-	-	-	-	0.0	0.0
			2009-2010	<----------Dry Bed ---------->											

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

VIII Basin : East Flowing River

Sl. No.	Site Name	Name of the River/ Stream	Years	Calcium (Ca)		Magnesium (Mg)		Aluminium		Iron (Fe)		Ammonia (NH3-N)		Carbonate (CO3)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)	(25)	(26)	(27)	(28)
14	Arcot	Palar	2007-2008	22	32	19.0	41.8	-	-	-	-	-	-	0.0	12.5
			2008-2009	55	55	26.7	26.7	-	-	-	-	-	-	0.0	0.0
			2009-2010	<----------Dry Bed ---------->											
15	Avarankuppam	Palar	2007-2008	27	37	14.6	24.3	-	-	0.050	0.070	0.05	0.08	0.0	38.6
			2008-2009	26	46	13.6	30.1	-	-	0.111	0.111	-	-	0.0	33.6
			2009-2010	29	56	15.5	30.1	-	-	0.080	0.160	0.05	0.12	0.0	38.4
16	Kumarapalayam	Varahandi	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	22	22	11.2	11.2	-	-	-	-	-	-	0.0	0.0
			2009-2010	13	18	9.7	12.6	-	-	-	-	-	-	0.0	0.0
17	Villupuram	Ponnaiyar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	32	32	18.5	18.5	-	-	-	-	-	-	0.0	0.0
			2009-2010	18	18	43.7	43.7	-	-	-	-	-	-	40.0	40.0
18	Vazhavachanur	Ponnaiyar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	29	67	18.5	50.5	-	-	-	-	-	-	0.0	0.0
			2009-2010	24	101	25.3	53.5	-	-	-	-	-	-	0.0	55.0
19	Gummanur	Ponniyar	2007-2008	59	80	15.6	27.2	-	-	0.070	0.100	0.05	0.13	0.0	57.1
			2008-2009	48	77	14.6	36.2	-	-	0.031	0.089	0.05	0.22	0.0	41.5
			2009-2010	59	93	12.6	37.9	-	-	0.020	0.400	0.08	0.44	0.0	43.2
20	Kudalaiyathur	Vellar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	30	34	11.7	19.9	-	-	-	-	-	-	0.0	25.0
			2009-2010	13	34	17.5	26.2	-	-	-	-	-	-	0.0	0.0
21	Paramakudi	Vaigai	2007-2008	32	37	18.5	21.4	-	-	0.050	0.060	0.05	0.05	14.6	20.9
			2008-2009	32	32	17.5	17.5	-	-	-	-	-	-	19.8	19.8
			2009-2010	24	24	15.6	15.6	-	-	0.310	0.310	-	-	0.0	0.0

Contd/…

22	Theni	Suruliyar	2007-2008	8	45	3.9	22.4	-	-	0.060	0.070	0.03	0.05	0.0	0.0
			2008-2009	11	48	3.9	22.4	-	-	0.040	0.133	0.05	0.06	0.0	0.0
			2009-2010	10	56	5.8	26.2	-	-	0.020	1.109	0.06	0.23	0.0	0.0
23	Ambasamudram	Vaigai	2007-2008	18	54	6.8	28.2	-	-	0.060	0.070	0.03	0.05	0.0	48.5
			2008-2009	18	54	8.3	30.1	-	-	0.061	0.079	0.05	0.23	0.0	36.9
			2009-2010	10	27	3.9	14.6	-	-	0.250	0.450	0.06	0.12	0.0	9.6
24	Irukkankudi	Vaippar	2007-2008	22	38	8.8	24.3	-	-	0.060	0.060	0.05	0.12	0.0	14.3
			2008-2009	32	48	24.3	36.5	-	-	-	-	-	-	0.0	33.6
			2009-2010	<----------Dry Bed ---------->											
25	Murappanadu	Tambraparani	2007-2008	8	30	1.0	13.6	-	-	0.060	0.080	0.03	0.05	0.0	0.0
			2008-2009	6	35	2.9	19.4	-	-	0.001	0.117	0.05	0.16	0.0	0.0
			2009-2010	6	22	2.9	10.7	-	-	0.050	0.490	0.06	0.17	0.0	0.0
26	A.P. Puram	Chittar	2007-2008	35	96	38.9	126.4	-	-	0.060	0.100	0.05	0.07	0.0	31.3
			2008-2009	42	83	43.7	89.9	-	-	0.001	0.109	0.05	0.22	0.0	42.2
			2009-2010	61	93	56.4	114.0	-	-	0.026	0.169	0.08	0.14	0.0	14.4

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

VIII Basin : East Flowing River

Sl. No.	Site Name	Name of the River/ Stream	Years	Bicarbonate (HCO3)		Chloride (CL)		Fluoride (F)		Sulphate (SO4)		Sulphite		Nitrate (NO3-N)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(29)	(30)	(31)	(32)	(33)	(34)	(35)	(36)	(37)	(38)	(39)	(40)
1	Marella	Gundalakamma	2007-2008	288	385	42.4	72.0	0.86	2.24	36.0	66.0	-	-	0.01	0.01
			2008-2009	146	468	21.1	249.5	0.18	1.44	23.5	160.0	-	-	0.01	0.01
			2009-2010	234	424	59.7	154.1	0.64	2.36	57.6	120.0	-	-	0.00	2.48
2	Nellore	Pennar	2007-2008	193	226	51.5	57.2	-	-	26.4	29.4	-	-	-	-
			2008-2009	142	290	53.4	71.5	-	-	27.5	27.5	-	-	-	-
			2009-2010	129	326	53.9	118.1	0.49	4.71	39.9	75.0	-	-	0.19	0.19
3	Nandipalli	Pennar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	152	374	59.0	129.6	-	-	20.9	69.9	-	-	-	-
			2009-2010	207	636	36.2	178.6	0.56	1.29	10.0	26.4	-	-	2.42	2.42
4	Chennur	Pennar	2007-2008	132	234	34.3	160.2	-	-	32.8	157.1	-	-	-	-
			2008-2009	109	321	78.2	179.2	-	-	39.3	195.4	-	-	-	-
			2009-2010	165	403	49.6	180.4	0.52	0.79	37.5	180.7	-	-	0.32	1.80
5	Kamalapuram	Papagni	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	9.7	15.1	34.3	47.7	-	-	-	-	-	-	-	-
			2009-2010	124	124	36.2	36.2	3.34	3.34	8.4	8.4	-	-	-	-
6	Alladupalli	Kunderu	2007-2008	132	259	36.2	131.6	-	-	23.1	109.9	-	-	-	-
			2008-2009	150	352	83.9	137.3	-	-	43.3	185.9	-	-	-	-
			2009-2010	155	465	43.8	169.3	0.56	0.78	57.5	178.3	-	-	0.05	1.00
7	Tadipatri	Pennar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	155	361	45.8	122.0	-	-	45.1	45.1	-	-	-	-
			2009-2010	279	429	74.3	148.4	0.65	1.29	17.5	42.5	-	-	-	-
8	Nagalamadike	Pennar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	122	122	43.8	43.8	-	-	-	-	-	-	-	-
			2009-2010	<----------Dry Bed ---------->											
9	Singavaram	Chitravathi	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	<----------Dry Bed ---------->											
			2009-2010	<----------Dry Bed ---------->											
10	Naidupeta	Swarnamukhi	2007-2008	97	223	27.7	74.4	-	-	8.1	16.8	-	-	-	-
			2008-2009	104	193	51.5	74.4	-	-	-	-	-	-	-	-
			2009-2010	124	273	43.8	80.0	0.20	0.48	19.9	49.7	-	-	0.39	0.39

Contd/…

11	**Sulurpet**	**Kalingi**	**2007-2008**	<---------- Site is not avalable ---------->												
			2008-2009	**107**	**173**	**40.0**	**62.9**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**
			2009-2010	**207**	**212**	**50.2**	**61.0**	**0.37**	**0.44**	**17.1**	**20.8**	**-**	**-**	**-**	**-**	
12	**Chengalpet**	**Palar**	**2007-2008**	**97**	**267**	**21.0**	**65.8**	**-**	**-**	**5.6**	**19.0**	**-**	**-**	**-**	**-**	
			2008-2009	**117**	**259**	**42.0**	**99.2**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	
			2009-2010	**119**	**347**	**27.9**	**100.4**	**0.16**	**0.43**	**10.3**	**21.8**	**-**	**-**	**-**	**-**	
13	**Magaral**	**Cheyar**	**2007-2008**	**122**	**122**	**24.8**	**24.8**	**-**	**-**	**5.8**	**5.8**	**-**	**-**	**-**	**-**	
			2008-2009	**160**	**160**	**43.8**	**43.8**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	
			2009-2010	<----------Dry Bed ---------->												

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

VIII Basin : East Flowing River

Sl. No.	Site Name	Name of the River/ Stream	Years	Bicarbonate (HCO3)		Chloride (CL)		Fluoride (F)		Sulphate (SO4)		Sulphite		Nitrate (NO3-N)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(29)	(30)	(31)	(32)	(33)	(34)	(35)	(36)	(37)	(38)	(39)	(40)
14	Arcot	Palar	2007-2008	107	135	196.4	419.5	-	-	63.7	200.7	-	-	-	-
			2008-2009	219	219	209.7	209.7	-	-	-	-	-	-	-	-
			2009-2010	<----------Dry Bed ---------->											
15	Avarankuppam	Palar	2007-2008	306	463	42.6	57.7	1.10	1.61	13.3	38.1	-	-	1.60	5.07
			2008-2009	274	442	40.0	81.1	1.17	1.25	13.3	96.0	-	-	0.24	1.28
			2009-2010	331	600	36.1	82.2	0.85	1.27	33.0	92.0	-	-	1.14	3.18
16	Kumarapalayam	Varahandi	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	130	130	51.5	51.5	-	-	-	-	-	-	-	-
			2009-2010	88	176	26.7	46.5	0.16	0.24	9.7	11.4	-	-	-	-
17	Villupuram	Ponnaiyar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	213	213	76.3	76.3	-	-	-	-	-	-	-	-
			2009-2010	259	259	85.6	85.6	0.39	0.39	26.4	26.4	-	-	-	-
18	Vazhavachanur	Ponnaiyar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	234	460	85.8	125.8	-	-	25.8	40.7	-	-	-	-
			2009-2010	347	631	100.4	169.8	0.35	0.69	14.9	69.6	-	-	0.42	9.28
19	Gummanur	Ponniyar	2007-2008	202	324	118.0	175.8	0.69	1.21	18.0	37.1	-	-	3.63	18.30
			2008-2009	193	346	100.4	174.0	0.44	0.90	10.0	68.0	-	-	0.52	16.11
			2009-2010	205	406	106.4	232.6	0.49	1.07	38.0	64.0	-	-	-	-
20	Kudalaiyathur	Vellar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	160	191	49.6	76.3	-	-	-	-	-	-	-	-
			2009-2010	217	326	59.1	68.8	0.25	0.38	15.3	36.9	-	-	0.00	0.00
21	Paramakudi	Vaigai	2007-2008	183	186	50.0	61.4	0.43	0.58	17.5	21.9	-	-	1.05	1.23
			2008-2009	127	127	33.7	33.7	0.55	0.55	27.3	27.3	-	-	-	-
			2009-2010	130	130	19.5	19.5	0.31	0.31	23.5	23.5	-	-	1.78	1.78
22	Theni	Suruliyar	2007-2008	34	280	8.0	53.8	0.19	0.41	3.2	28.2	-	-	1.15	4.57
			2008-2009	43	269	9.6	41.5	0.08	0.85	1.1	25.4	-	-	0.08	1.70
			2009-2010	49	275	9.0	28.4	0.19	0.82	1.0	15.4	-	-	0.33	1.86
23	Ambasamudram	Vaigai	2007-2008	98	232	14.1	56.0	0.32	1.07	7.2	73.8	-	-	2.20	5.46
			2008-2009	82	268	22.0	67.3	0.39	0.93	17.7	64.8	-	-	0.21	4.97
			2009-2010	48	149	7.8	22.7	0.22	0.79	6.2	23.5	-	-	0.70	2.25

Contd/…

24	Irukkankudi	Vaippar	2007-2008	83	261	30.9	110.1	0.33	0.94	40.0	147.0	-	-	0.90	3.42
			2008-2009	154	185	162.2	190.0	0.63	0.65	130.0	136.0	-	-	0.60	0.72
			2009-2010	<----------Dry Bed ---------->											
25	Murappanadu	Tambraparani	2007-2008	29	154	10.1	57.4	0.08	0.31	4.8	23.8	-	-	0.58	2.21
			2008-2009	33	166	11.5	52.0	0.05	0.48	1.4	25.0	-	-	0.11	1.89
			2009-2010	34	106	11.8	34.0	0.05	0.53	0.6	7.0	-	-	0.02	1.53
26	A.P. Puram	Chittar	2007-2008	153	380	179.3	803.8	0.76	1.62	57.6	196.8	-	-	1.85	12.60
			2008-2009	187	448	243.0	676.1	0.96	1.55	46.7	165.0	-	-	1.44	5.39
			2009-2010	283	413	294.0	720.0	1.02	1.61	56.5	228.3	-	-	2.10	3.68

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

VIII Basin : East Flowing River

Sl. No.	Site Name	Name of the River/ Stream	Years	Nitrite (NO2-N)		Phosphate (PO4)		Silica (SiO2)		DO		BOD3-27		Total Coliform (no.per 10 ml)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(41)	(42)	(43)	(44)	(45)	(46)	(47)	(48)	(49)	(50)	(51)	(52)
1	Marella	Gundalakamma	2007-2008	0.00	0.00	-	-	15.0	25.0	4.7	7.7	0.5	3.3	-	-
			2008-2009	0.00	0.00	-	-	9.2	31.7	3.7	8.5	0.1	2.8	-	-
			2009-2010	0.00	0.00	-	-	14.8	45.2	4.9	7.7	0.1	1.8	-	-
2	Nellore	Pennar	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
3	Nandipalli	Pennar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	0.4	1.0	-	-
4	Chennur	Pennar	2007-2008	-	-	-	-	-	-	5.2	7.3	0.2	2.3	-	-
			2008-2009	-	-	-	-	-	-	5.0	6.7	0.1	2.9	-	-
			2009-2010	-	-	-	-	-	-	5.4	6.9	0.1	3.4	-	-
5	Kamalapuram	papagni	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	0.2	0.2	-	-
6	Alladupalli	Kunderu	2007-2008	-	-	-	-	-	-	5.5	6.1	0.6	2.5	-	-
			2008-2009	-	-	-	-	-	-	5.3	6.3	0.3	2.1	-	-
			2009-2010	-	-	-	-	-	-	5.5	7.8	0.2	3.9	-	-
7	Tadipatri	Pennar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	0.6	2.0	-	-
8	Nagalamadike	Pennar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	<----------Dry Bed ---------->											
9	Singavaram	Chitravathi	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	<----------Dry Bed ---------->											
			2009-2010	<----------Dry Bed ---------->											

Contd/..

10	**Naidupeta**	**Swarnamukhi**	**2007-2008**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**
			2008-2009	**-**		**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**
			2009-2010	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**0.4**	**3.3**	**-**	**-**
11	**Sulurpet**	**Kalingi**	**2007-2008**	**<---------- Site is not avalable ----------->**											
			2008-2009	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**
			2009-2010	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**1.4**	**2.6**	**-**	**-**
12	**Chengalpet**	**Palar**	**2007-2008**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**
			2008-2009	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**
			2009-2010	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**0.3**	**0.7**	**-**	**-**
13	**Magaral**	**Cheyar**	**2007-2008**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**
			2008-2009	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**
			2009-2010	**<----------Dry Bed ----------->**											

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

VIII Basin : East Flowing River

Sl. No.	Site Name	Name of the River/ Stream	Years	Nitrite (NO2-N)		Phosphate(PO4)		Silica (SiO2)		DO		BOD3-27		Total Coliform(no per 10 ml)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(41)	(42)	(43)	(44)	(45)	(46)	(47)	(48)	(49)	(50)	(51)	(52)
14	Arcot	Palar	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	<----------Dry Bed ---------->											
15	Avarankuppam	Palar	2007-2008	0.00	0.10	-	-	26.2	39.7	-	-	-	-	-	-
			2008-2009	-	-	-	-	3.2	3.2	-	-	-	-	-	-
			2009-2010	-	-	0.020	0.080	26.3	48.5	-	-	-	-	-	-
16	Kumarapalayam	Varahandi	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	0.3	0.6	-	-
17	Villupuram	Ponnaiyar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	1.1	1.1	-	-
18	Vazhavachanur	Ponnaiyar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	-	-	-	-	-	-	4.1	6.8	0.6	3.4	-	-
			2009-2010	-	-	-	-	-	-	3.0	9.6	0.4	3.3	-	-
19	Gummanur	Ponniyar	2007-2008	0.03	0.29	-	-	22.0	33.7	-	-	-	-	-	-
			2008-2009	0.01	0.52	-	-	3.4	34.1	4.4	6.7	1.8	5.5	-	-
			2009-2010	-	-	0.821	1.860	18.9	41.9	4.6	7.3	0.4	4.9	-	-
20	Kudalaiyathur	Vellar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	0.6	1.4	-	-
21	Paramakudi	Vaigai	2007-2008	-	-	-	-	24.4	25.6	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	0.130	0.130	22.4	22.4	-	-	-	-	-	-
22	Theni	Suruliyar	2007-2008	0.00	1.24	-	-	7.5	24.4	4.2	9.8	0.7	2.4	-	-
			2008-2009	0.01	0.03	-	-	3.0	20.6	4.9	8.1	0.7	4.7	-	-
			2009-2010	-	-	0.029	0.100	9.9	25.5	5.0	8.2	0.2	3.0	-	-

Contd/…

23	**Ambasamudram**	**Vaigai**	**2007-2008**	**0.01**	**0.03**	**-**	**-**	**9.1**	**41.3**	**4.0**	**9.4**	**0.3**	**2.9**	**-**	**-**
			2008-2009	**0.01**	**0.07**	**-**	**-**	**4.2**	**30.4**	**5.4**	**7.5**	**0.4**	**3.2**	**-**	**-**
			2009-2010	**-**	**-**	**0.030**	**0.130**	**21.4**	**38.4**	**4.0**	**7.4**	**0.1**	**0.4**	**-**	**-**
24	**Irukkankudi**	**Vaippar**	**2007-2008**	**0.01**	**2.36**	**-**	**-**	**11.2**	**29.6**	**-**	**-**	**-**	**-**	**-**	**-**
			2008-2009	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**
			2009-2010	**<----------Dry Bed ----------->**											
25	**Murappanadu**	**Tambraparani**	**2007-2008**	**0.00**	**0.07**	**-**	**-**	**7.3**	**18.2**	**5.4**	**6.3**	**0.4**	**2.3**	**-**	**-**
			2008-2009	**0.01**	**0.05**	**-**	**-**	**1.3**	**16.2**	**5.3**	**6.9**	**0.1**	**2.8**	**-**	**-**
			2009-2010	**-**	**-**	**0.030**	**0.100**	**4.6**	**20.9**	**5.5**	**6.7**	**0.4**	**4.0**	**-**	**-**
26	**A.P. Puram**	**Chittar**	**2007-2008**	**0.00**	**0.10**	**-**	**-**	**21.4**	**46.3**	**-**	**-**	**-**	**-**	**-**	**-**
			2008-2009	**0.00**	**0.02**	**-**	**-**	**5.0**	**52.8**	**-**	**-**	**-**	**-**	**-**	**-**
			2009-2010	**-**	**-**	**0.030**	**0.110**	**15.1**	**100.1**	**-**	**-**	**-**	**-**	**-**	**-**

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

VIII Basin : East Flowing River

Sl. No.	Site Name	Name of the River/ Stream	Years	Faecal Coliform (no.per 10 ml)		Total plate count (no.per 10 ml)		Phytoplankton (no.per ml)		Zooplankton (no.per litre)		Arsenic (ppm)		Boron (ppm)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(53)	(54)	(55)	(56)	(57)	(58)	(59)	(60)	(61)	(62)	(63)	(64)
1	Marella	Gundalakamma	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	3.38	3.38	-	-
2	Nellore	Pennar	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
3	Nandipalli	Pennar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
4	Chennur	Pennar	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
5	Kamalapuram	papagni	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
6	Alladupalli	Kunderu	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
7	Tadipatri	Pennar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
8	Nagalamadike	Pennar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	<----------Dry Bed ---------->											
9	Singavaram	Chitravathi	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	<----------Dry Bed ---------->											

Contd/…

10	**Naidupeta**	**Swarnamukhi**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-	-	-
11	**Sulurpet**	**Kalingi**	**2007-2008**	**<---------- Site is not avalable ----------->**													
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-	-	-
12	**Chengalpet**	**Palar**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-	-	-
13	**Magaral**	**Cheyar**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	**<----------Dry Bed ----------->**													

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

VIII Basin : East Flowing River

Sl. No.	Site Name	Name of the River/ Stream	Years	Faecal Coliform (no.per 10 ml)		Total plate count (no.per 10 ml)		Phytoplankton (no.per ml)		Zooplankton (no.per litre)		Arsenic (ppm)		Boron (ppm)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(53)	(54)	(55)	(56)	(57)	(58)	(59)	(60)	(61)	(62)	(63)	(64)
14	Arcot	Palar	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	<----------Dry Bed ---------->											
15	Avarankuppam	Palar	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
16	Kumarapalayam	Varahandi	2007-2008	<----------Dry Bed ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
17	Villupuram	Ponnaiyar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
18	Vazhavachanur	Ponnaiyar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
19	Gummanur	Ponniyar	2007-2008	-	-	-	-	-	-	-	-	10.72	10.72	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
20	Kudalaiyathur	Vellar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
21	Paramakudi	Vaigai	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
22	Theni	Suruliyar	2007-2008	-	-	-	-	-	-	-	-	6.67	6.67	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

23	**Ambasamudram**	**Vaigai**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
24	**Irukkankudi**	**Vaippar**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	**<----------Dry Bed ----------->**											
25	**Murappanadu**	**Tambraparani**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
26	**A.P. Puram**	**Chittar**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/…

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

VIII Basin : East Flowing River

Sl. No.	Site Name	Name of the River/ Stream	Years	Cadmium (ppm)		Chromium (ppm)		Copper (ppm)		Cyanide (ppm)		Lead (ppm)		Manganese (ppm)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(65)	(66)	(67)	(68)	(69)	(70)	(71)	(72)	(73)	(74)	(75)	(76)
1	Marella	Gundalakamma	2007-2008	0.9	0.9	2.0	2.0	-	-	-	-	16.6	16.6	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	0.00	0.00	0.00	0.00	-	-	-	-	0.00	0.00	-	-
2	Nellore	Pennar	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
3	Nandipalli	Pennar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
4	Chennur	Pennar	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
5	Kamalapuram	papagni	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
6	Alladupalli	Kunderu	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
7	Tadipatri	Pennar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
8	Nagalamadike	Pennar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
9	Singavaram	Chitravathi	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	<----------Dry Bed ---------->											

Contd/…

10	**Naidupeta**	**Swarnamukhi**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-	-	-
11	**Sulurpet**	**Kalingi**	**2007-2008**	**<---------- Site is not avalable ----------->**													
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-	-	-
12	**Chengalpet**	**Palar**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-	-	-
13	**Magaral**	**Cheyar**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	**<----------Dry Bed ----------->**													

Contd/…

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

VIII Basin : East Flowing River

Sl. No.	Site Name	Name of the River/ Stream	Years	Cadmium (ppm)		Chromium (ppm)		Copper (ppm)		Cyanide (ppm)		Lead (ppm)		Manganese (ppm)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(65)	(66)	(67)	(68)	(69)	(70)	(71)	(72)	(73)	(74)	(75)	(76)
14	Arcot	Palar	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	<----------Dry Bed ---------->											
15	Avarankuppam	Palar	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
16	Kumarapalayam	Varahandi	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
17	Villupuram	Ponnaiyar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
18	Vazhavachanur	Ponnaiyar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
19	Gummanur	Ponniyar	2007-2008	-	-	2.56	2.56	2.22	2.22	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
20	Kudalaiyathur	Vellar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
21	Paramakudi	Vaigai	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
22	Theni	Suruliyar	2007-2008	0.61	0.61	-	-	1.41	1.41	-	-	1.56	1.56	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/..

23	**Ambasamudram**	**Vaigai**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
24	**Irukkankudi**	**Vaippar**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	**<----------Dry Bed ----------->**											
25	**Murappanadu**	**Tambraparani**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
26	**A.P. Puram**	**Chittar**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

VIII Basin : East Flowing River

Sl. No.	Site Name	Name of the River/ Stream	Years	Mercury (ppm)		Zinc (ppm)		Total Hardness		Sodium % (Na%)		SAR		RSC	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(77)	(78)	(79)	(80)	(81)	(82)	(83)	(84)	(85)	(86)	(87)	(88)
1	Marella	Gundalakamma	2007-2008	0.0	0.0	5.0	5.0	138	184	54	68	3.2	5.6	1.6	3.0
			2008-2009	-	-	-	-	128	223	40	80	1.6	9.9	0.2	3.9
			2009-2010	-	-	12.76	12.76	113	234	55	73	3.4	6.9	0.8	4.0
2	Nellore	Pennar	2007-2008	-	-	-	-	121	141	-	-	-	-	0.8	0.9
			2008-2009	-	-	-	-	103	137	55	55	3.0	3.0	0.3	2.0
			2009-2010	-	-	-	-	94	159	43	67	2.0	5.1	1.0	2.7
3	Nandipalli	Pennar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	-	-	-	-	69	181	70	70	5.4	5.4	1.1	5.1
			2009-2010	-	-	-	-	122	187	43	82	1.7	10.9	1.0	7.4
4	Chennur	Pennar	2007-2008	-	-	-	-	112	205	-	-	1.3	2.5	0.0	0.3
			2008-2009	-	-	-	-	129	222	64	73	4.8	7.4	0.0	2.9
			2009-2010	-	-	-	-	110	241	52	69	2.4	6.4	0.5	3.0
5	Kamalapuram	papagni	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	-	-	-	-	75	127	-	-	-	-	0.1	1.5
			2009-2010	-	-	-	-	61	61	58	58	2.3	2.3	0.8	0.8
6	Alladupalli	Kunderu	2007-2008	-	-	-	-	111	220	-	-	1.4	2.4	0.0	0.6
			2008-2009	-	-	-	-	161	244	70	71	6.2	6.4	0.0	2.6
			2009-2010	-	-	-	-	122	281	33	64	1.3	5.1	0.0	3.3
7	Tadipatri	Pennar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	-	-	-	-	84	174	-	-	-	-	0.8	3.4
			2009-2010	-	-	-	-	122	146	61	80	3.7	9.7	2.2	6.5
8	Nagalamadike	Pennar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	-	-	-	-	74	74	-	-	-	-	0.5	0.5
			2009-2010	<----------Dry Bed ---------->											
9	Singavaram	Chitravathi	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	-	-	-	-	Dry	Bed						
			2009-2010	<----------Dry Bed ---------->											

Contd/…

10	**Naidupeta**	**Swarnamukhi**	**2007-2008**	**-**	**-**	**-**	**-**	**68**	**147**	**-**		**-**	**0.9**	**1.5**	**0.0**	**1.3**
			2008-2009	**-**	**-**	**-**	**-**	**80**	**113**	**-**		**-**	**-**	**-**	**0.0**	**0.9**
			2009-2010	**-**	**-**	**-**	**-**	**98**	**146**		**42**	**60**	**1.6**	**3.5**	**0.0**	**2.0**
11	**Sulurpet**	**Kalingi**	**2007-2008**	<---------- **Site is not avalable** ---------->												
			2008-2009	**-**	**-**	**-**	**-**	**66**	**133**	**-**		**-**	**-**	**-**	**0.2**	**0.5**
			2009-2010	**-**	**-**	**-**	**-**	**73**	**102**		**56**	**70**	**2.7**	**4.4**	**1.5**	**1.9**
12	**Chengalpet**	**Palar**	**2007-2008**	**-**	**-**	**-**	**-**	**0.0**	**1.0**	**-**		**-**	**0.9**	**1.0**	**0.0**	**1.0**
			2008-2009	**-**	**-**	**-**	**-**	**97**	**201**	**-**		**-**	**-**	**-**	**0.0**	**0.6**
			2009-2010	**-**	**-**	**-**	**-**	**110**	**183**		**20**	**59**	**0.7**	**3.8**	**0.0**	**2.5**
13	**Magaral**	**Cheyar**	**2007-2008**	**-**	**-**	**-**	**-**	**86**	**86**	**-**		**-**	**1.4**	**1.4**	**0.3**	**0.3**
			2008-2009	**-**	**-**	**-**	**-**	**141**	**141**	**-**		**-**	**-**	**-**	**0.0**	**0.0**
			2009-2010	<----------**Dry Bed** ---------->												

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

VIII Basin : East Flowing River

Sl. No.	Site Name	Name of the River/ Stream	Years	Mercury (ppm)		Zinc (ppm)		Total Hardness		Sodium % (Na%)		SAR		RSC	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(77)	(78)	(79)	(80)	(81)	(82)	(83)	(84)	(85)	(86)	(87)	(88)
14	Arcot	Palar	2007-2008	-	-	-	-	135	254	-	-	1.6	1.6	0.0	0.0
			2008-2009	-	-	-	-	249	249	-	-	-	-	0.0	0.0
			2009-2010	<----------Dry Bed ---------->											
15	Avarankuppam	Palar	2007-2008	-	-	-	-	141	189	62	63	4.0	4.6	3.2	3.9
			2008-2009	-	-	-	-	121	233	52	57	2.8	4.1	1.8	2.6
			2009-2010	-	-	-	-	137	265	59	66	3.5	5.3	2.7	4.6
16	Kumarapalayam	Varahandi	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	-	-	-	-	103	103	-	-	-	-	0.1	0.1
			2009-2010	-	-	-	-	73	98	40	51	1.2	2.1	0.0	0.9
17	Villupuram	Ponnaiyar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	-	-	-	-	157	157	-	-	-	-	0.4	0.4
			2009-2010	-	-	-	-	227	227	39	39	2.0	2.0	1.1	1.1
18	Vazhavachanur	Ponnaiyar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	-	-	-	-	149	283	47	49	2.8	3.1	0.0	2.6
			2009-2010	-	-	-	-	195	358	46	67	2.7	6.5	1.4	4.4
19	Gummanur	Ponniyar	2007-2008	-	-	10.00	10.00	221	314	44	50	2.6	3.6	0.0	0.6
			2008-2009	-	-	-	-	181	341	34	48	2.0	3.4	0.0	1.0
			2009-2010	-	-	-	-	233	390	41	46	2.3	3.3	0.0	0.3
20	Kudalaiyathur	Vellar	2007-2008	<---------- Site is not avalable ---------->											
			2008-2009	-	-	-	-	123	169	-	-	-	-	0.1	0.7
			2009-2010	-	-	-	-	142	159	42	55	1.9	3.3	0.7	2.2
21	Paramakudi	Vaigai	2007-2008	-	-	-	-	157	181	35	36	1.4	1.5	0.1	0.4
			2008-2009	-	-	-	-	127	127	26	26	0.9	0.9	0.0	0.0
			2009-2010	-	-	-	-	125	125	19	19	0.5	0.5	0.0	0.0
22	Theni	Suruliyar	2007-2008	-	-	9.00	9.00	36	205	19	36	0.3	1.6	0.0	0.5
			2008-2009	-	-	-	-	44	233	19	29	0.3	0.9	0.0	0.5
			2009-2010	-	-	-	-	48	249	15	24	0.3	0.6	0.0	0.1

Contd/..

23	Ambasamudram	Vaigai	2007-2008	-	-	8.00	8.00	72	238	24	41	0.8	2.1	0.0	0.8
			2008-2009	-	-	-	-	80	238	31	44	0.9	2.5	0.0	0.9
			2009-2010	-	-	-	-	40	121	18	23	0.3	0.7	0.0	0.0
24	Irukkankudi	Vaippar	2007-2008	-	-	9.00	9.00	93	193	45	61	2.0	4.6	0.0	0.5
			2008-2009	-	-	-	-	221	292	53	55	3.5	3.8	0.0	0.0
			2009-2010	<----------Dry Bed ---------->											
25	Murappanadu	Tambraparani	2007-2008	-	-	7.00	7.00	24	133	25	42	0.5	1.4	0.0	0.0
			2008-2009	-	-	-	-	28	147	25	38	0.5	1.2	0.0	0.0
			2009-2010	-	-	-	-	28	101	25	35	0.5	0.9	0.0	0.1
26	A.P. Puram	Chittar	2007-2008	-	-	13.00	13.00	266	757	45	55	2.8	6.6	0.0	0.0
			2008-2009	-	-	-	-	310	552	40	64	3.0	7.2	0.0	0.0
			2009-2010	-	-	-	-	399	655	47	58	3.6	7.2	0.0	0.0

Source: Water Quality Year Book (East Flowing Rivers) for the period of 2007-2008 to 2009-2010.

Note : 1. All the ionic concentrations are expressed in mg./lit. unless mentioned otherwise.

2. (-) indicate that analyis of a particular parameter has not been carried out.

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

IX Basin : West Flowing Rivers

Sl. No.	Site Name	Name of the River/Stream	Years	Q (Cumecs)		Temperature °C		pH_GEN		Sp.Conductance		Potassium (K)		Sodium (Na)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
1	Badalapur	Ulhas	2007-2008	0.153	1575	22.0	27.0	7.2	8.0	-	-	0.1	9.5	6	17
			2008-2009	0.472	2209	21.5	32.5	7.2	8.0	-	-	0.5	7.0	4.9	22.5
			2009-2010	0.007	2597	20.0	33.0	6.5	8.0	-	-	0.2	2.4	8	20
2	Mangaon	Kal	2007-2008	0.000	2028	25.0	28.0	7.0	7.9	-	-	0.1	2.0	3	10
			2008-2009	0.000	663.9	26.0	27.0	7.1	7.6	-	-	1.0	1.0	2.2	6.3
			2009-2010	0.000	1119	25.0	28.5	7.4	7.5	-	-	0.1	0.5	6	8
3	Belne Bridge	Gad	2007-2008	0.000	1005	16.0	27.5	7.1	8.4	-	-	0.1	2.1	4	10
			2008-2009	0.000	1022	20.0	27.0	7.3	8.1	-	-	0.5	1.5	2.8	15.0
			2009-2010	0.000	1261	24.5	27.5	7.1	8.5	-	-	0.1	1.5	5	8
4	Santeguli	Aghanashini	2007-2008	0.000	2412	21.5	30.0	7.0	7.8	-	-	0.4	1.6	3.2	5.1
			2008-2009	0.247	2053	23.5	31.5	7.0	7.8	-	-	0.4	2.0	2.8	5.5
			2009-2010	1.071	1848	23.0	28.0	6.8	7.3	-	-	0.4	1.2	3.2	4.8
5	Haladi	Haladi	2007-2008	10.6	613.0	25.5	26.5	6.7	7.1	-	-	0.3	1.2	1.8	1.8
			2008-2009	1.082	640.9	23.0	29.5	6.5	7.7	-	-	0.4	1.6	1.8	4.3
			2009-2010	4.077	741.4	25.0	28.0	6.3	7.2	-	-	0.3	1.1	2.0	4.6
6	Aversha	Sita	2007-2008	0.000	545.4	25.5	25.5	7.5	7.5	-	-	0.8	0.8	3.5	3.5
			2008-2009	0.000	806.5	25.5	26.0	6.6	7.3	-	-	0.4	0.4	2.8	3.5
			2009-2010	0.000	555.7	25.0	26.5	6.5	7.0	-	-	0.3	0.8	2.3	2.7
7	Yennehole	Yennehole	2007-2008	0.023	721.0	26.0	31.0	6.8	7.6	-	-	0.2	1.6	2.3	3.7
			2008-2009	0.003	746.7	25.0	27.0	6.8	7.5	-	-	0.4	0.6	3.0	3.9
			2009-2010	0.000	1531	28.0	28.5	6.7	7.0	-	-	0.3	0.7	2.5	3.8
8	Addoor	Gurpur	2007-2008	0.000	754.9	23.5	24.5	7.2	7.5	-	-	0.6	1.2	2.8	3.5
			2008-2009	0.000	1043	25.5	26.0	7.0	7.5	-	-	0.2	0.9	3.2	3.8
			2009-2010	0.000	1028	25.0	25.5	6.8	7.3	-	-	0.3	0.8	2.0	3.1
9	Bantwal	Nethravathi	2007-2008	<----------Site is not available---------->											
			2008-2009	14.05	3752	23.5	25.5	7.2	7.4	-	-	0.7	2.0	2.7	4.4
			2009-2010	0.000	4218	27.0	30.0	7.1	7.3	-	-	0.5	1.6	2.7	4.4
10	Erinjipuzha	Payaswani	2007-2008	0.000	866.0	25.0	28.0	6.9	7.2	-	-	0.6	1.0	2.9	7.0
			2008-2009	0.000	840.5	25.0	28.5	6.6	7.3	-	-	0.5	1.8	3	4
			2009-2010	0.000	850.5	24.5	29.5	6.8	7.3	-	-	0.8	2.4	3	4

Contd/..

11	Perumannu	Valapatanam	2007-2008	0.002	2370	25.5	31.0	6.8	7.4	-	-	0.5	1.4	2.4	5.2
			2008-2009	1.641	1285	24.5	31.0	6.6	7.2	-	-	0.5	1.3	3	5
			2009-2010	2.683	2202	26.0	31.5	6.6	7.5	-	-	0.6	1.7	3	4
12	Kuttyadi	Kuttyadi	2007-2008	<----------Site is not available---------->											
			2008-2009	0.799	273.0	24.0	28.0	5.8	6.9	-	-	0.2	1.0	2	3
			2009-2010	0.313	957.8	25.0	29.0	6.2	7.1	-	-	0.5	1.0	2	3
13	Kuniyil	Chaliyar	2007-2008	0.000	3256	26.5	27.0	6.8	7.0	-	-	0.8	1.5	3.7	7.2
			2008-2009	0.000	1482	25.5	29.0	6.7	6.7	-	-	0.8	0.8	3	5
			2009-2010	0.000	2730	24.0	24.5	6.9	7.3	-	-	0.9	1.2	4	7
14	Karathodu	Kadalundi	2007-2008	<----------Site is not available---------->											
			2008-2009	0.000	389.9	26.0	27.0	6.6	7.2	-	-	0.4	1.3	4	7
			2009-2010	0.000	781.7	27.0	27.5	7.2	7.5	-	-	1.0	1.2	4	7
15	Kumbidi	Bharathapuzha	2007-2008	3.805	3032	27.0	29.5	7.3	7.8	-	-	1.5	2.4	9.2	16.6
			2008-2009	0.592	978.2	26.5	30.0	7.3	8.1	-	-	0.8	3.3	7	23
			2009-2010	0.000	3545	27.0	32.0	7.2	7.7	-	-	1.5	2.4	5	15

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

IX Basin : West Flowing Rivers

Sl. No.	Site Name	Name of the River/Stream	Years	Q (Cumecs)		Temperature °C		pH_GEN		Sp.Conductance		Potassium (K)		Sodium (Na)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
16	Pulamanthole	Pulanthodu	2007-2008	<----------Site is not available---------->											
			2008-2009	0.000	632.8	26.5	28.5	6.6	7.3	-	-	0.4	1.8	4	6
			2009-2010	0.000	1125	27.5	32.5	6.3	7.2	-	-	1.1	1.6	4	6
17	Mankara	Bharathapuzha	2007-2008	<----------Site is not available---------->											
			2008-2009	0.000	316.3	25.5	30.5	7.3	8.3	-	-	2.1	3.7	12	31
			2009-2010	0.000	371.3	21.5	27.5	7.2	8.1	-	-	2.2	5.7	10	25
18	Pudur	Kannadipuzha	2007-2008	<----------Site is not available---------->											
			2008-2009	0.000	140.8	28.0	30.0	7.8	8.4	-	-	1.5	4.3	18	33
			2009-2010	0.000	740.1	27.0	29.0	7.6	8.0	-	-	2.7	4.7	15	21
19	Ambaramplayam	Bharathapuzha	2007-2008	0.541	88.15	24.0	28.5	7.6	8.2	-	-	1.6	5.5	5.0	33.2
			2008-2009	0.449	24.42	23.0	28.5	7.5	8.2	-	-	0.6	5.2	4.1	22.5
			2009-2010	1.273	1287	25.0	28.0	7.3	8.1	-	-	1.3	7.0	5.3	45.4
20	Arangaly	Chalakudy	2007-2008	0.000	1265	24.5	26.5	6.2	7.7	-	-	0.8	1.4	2.3	4.4
			2008-2009	0.000	379.4	25.0	26.5	6.5	6.7	-	-	0.4	1.4	3	4
			2009-2010	0.000	1363	24.0	24.5	6.9	7.1	-	-	1.0	1.3	3	4
21	Neeleshwaram	Periyar	2007-2008	0.023	2474	28.5	29.5	5.8	6.9	-	-	1.2	1.9	2.4	4.1
			2008-2009	0.000	1169	27.0	29.0	6.0	6.8	-	-	0.3	1.8	2	5
			2009-2010	0.000	2303	25.5	28.5	6.2	7.1	-	-	0.9	1.3	3	4
22	Vandiperiyar	Periyar	2007-2008	0.000	152.0	23.0	26.0	6.3	7.0	-	-	1.3	3.2	3.7	9.5
			2008-2009	0.000	65.11	22.0	24.0	6.8	7.1	-	-	0.3	1.8	3	6
			2009-2010	0.000	69.31	23.0	24.0	6.3	7.1	-	-	1.6	2.8	4	9
23	Ramangalam	Muvattupuzha	2007-2008	43.67	1139	26.5	29.0	6.0	7.6	-	-	0.7	1.5	2.8	5.1
			2008-2009	21.28	685.7	27.0	29.0	6.2	6.9	-	-	0.4	1.6	3	4
			2009-2010	38.47	917.0	26.5	29.5	6.1	7.1	-	-	0.9	1.4	3	5
24	Kalampur	Kaliyar	2007-2008	<----------Site is not available---------->											
			2008-2009	0.000	235.7	26.0	27.5	6.2	7.0	-	-	0.3	1.1	3	5
			2009-2010	0.000	424.7	25.5	27.5	6.2	6.8	-	-	1.0	1.5	3	5
25	Kidangoor	Meenachil	2007-2008	0.000	706.2	26.0	28.0	5.8	7.5	-	-	0.8	2.2	2.6	4.0
			2008-2009	0.000	594.4	26.0	28.0	6.1	6.6	-	-	0.3	1.5	3	5
			2009-2010	0.000	465.7	26.0	27.0	6.3	6.9	-	-	0.8	1.6	3	4

Contd/…

26	Kalloopara	Manimala	2007-2008	0.000	747.9	26.5	28.0	6.1	6.9	-	-	1.0	1.2	3.7	4.2
			2008-2009	0.000	559.8	27.0	29.0	6.1	7.0	-	-	0.4	1.6	3	5
			2009-2010	0.000	464.9	26.5	29.5	5.9	6.9	-	-	1.0	2.3	3	5
27	Malakkara	Pamba	2007-2008	0.000	1126	24.5	27.5	6.1	7.1	-	-	0.8	1.4	2.6	4.0
			2008-2009	0.000	662.7	24.0	28.0	6.4	6.5	-	-	0.3	1.2	3	4
			2009-2010	0.000	832.8	25.0	27.5	5.9	7.0	-	-	0.9	1.4	3	3
28	Thumpamon	Achankovil	2007-2008	<----------Site is not available---------->											
			2008-2009	0.000	229.6	26.0	27.0	6.3	6.7	-	-	0.6	1.9	4	5
			2009-2010	0.000	301.9	26.0	26.5	6.5	7.0	-	-	1.0	1.3	4	5
29	Pattazhy	Kallada	2007-2008	<----------Site is not available---------->											
			2008-2009	4.888	103.6	25.0	27.0	6.3	6.9	-	-	0.8	2.3	3	5
			2009-2010	2.882	253.4	26.0	28.6	6.2	7.0	-	-	1.1	2.0	3	5
30	Ayilam	Vamanapuram	2007-2008	<----------Site is not available---------->											
			2008-2009	0.000	223.1	25.0	26.5	6.5	6.9	-	-	1.5	1.8	5	6
			2009-2010	0.000	331.4	24.5	27.0	7.0	7.2	-	-	1.8	2.0	5	6

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

IX Basin : West Flowing Rivers

Sl. No.	Site Name	Name of the River/ Stream	Years	Calcium (Ca)		Magnesium (Mg)		Aluminium (AL)		Iron (Fe)		Ammonia (NH3-N)		Carbonate (CO3)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)	(25)	(26)	(27)	(28)
1	Badalapur	Ulhas	2007-2008	4.8	20.8	0.2	5.8	-	-	0.2	1.1	-	-	0.0	0.0
			2008-2009	5	26	1.0	10.7	-	-	0.0	0.2	-	-	0.0	0.0
			2009-2010	9.6	22.0	4.9	12.4	-	-	0.0	0.9	-	-	0.0	0.0
2	Mangaon	Kal	2007-2008	4.7	8.8	0.5	1.5	-	-	0.0	0.6	-	-	0.0	0.0
			2008-2009	6	8	0.5	5.3	-	-	0.0	1.2	-	-	0.0	0.0
			2009-2010	10.4	16.0	0.5	4.9	-	-	0.0	0.6	-	-	0.0	0.0
3	Belne Bridge	Gad	2007-2008	4.0	11.6	0.5	5.8	-	-	0.0	0.4	-	-	0.0	2.4
			2008-2009	4	16	0.5	5.8	-	-	0.0	0.8	-	-	0.0	0.0
			2009-2010	8.0	19.6	2.4	10.5	-	-	0.0	0.7	-	-	0.0	0.0
4	Santeguli	Aghanashini	2007-2008	3	6	1.5	3.9	-	-	0.0	0.1	-	-	0.0	0.0
			2008-2009	3	6	1.0	2.9	-	-	0.1	0.1	-	-	0.0	0.0
			2009-2010	3	5	1.0	2.9	-	-	0.1	0.1	-	-	0.0	0.0
5	Haladi	Haladi	2007-2008	2	2	1.9	1.9	-	-	0.1	0.1	-	-	0.0	0.0
			2008-2009	2	5	1.0	1.9	-	-	0.1	0.1	-	-	0.0	0.0
			2009-2010	2	5	1.0	2.9	-	-	0.0	0.1	-	-	0.0	0.0
6	Aversha	Sita	2007-2008	2	2	3.9	3.9	-	-	0.1	0.1	-	-	0.0	0.0
			2008-2009	2	3	1.0	2.9	-	-	0.1	0.1	-	-	0.0	0.0
			2009-2010	2	3	1.0	1.0	-	-	0.1	0.1	-	-	0.0	0.0
7	Yennehole	Yennehole	2007-2008	2	5	1.0	2.9	-	-	0.0	0.1	-	-	0.0	0.0
			2008-2009	3	5	1.0	1.9	-	-	0.1	0.8	-	-	0.0	0.0
			2009-2010	2	3	1.0	1.9	-	-	0.1	0.1	-	-	0.0	0.0
8	Addoor	Gurpur	2007-2008	2	3	1.9	1.9	-	-	0.1	0.2	-	-	0.0	0.0
			2008-2009	3	5	1.0	1.9	-	-	0.1	0.1	-	-	0.0	0.0
			2009-2010	2	3	1.0	1.9	-	-	0.1	0.2	-	-	0.0	0.0
9	Bantwal	Nethravathi	2007-2008	<----------Site is not available---------->											
			2008-2009	3	5	1.0	1.9	-	-	0.1	0.1	-	-	0.0	0.0
			2009-2010	3	5	1.0	1.9	-	-	0.1	0.3	-	-	0.0	0.0

Contd/…

10	Erinjipuzha	Payaswani	2007-2008	4	6	2.0	3.5	-	-	0.0	1.3	0.11	0.15	0.0	0.0
			2008-2009	3.2	4.8	2.0	3.5	-	-	0.1	0.2	0.10	0.14	0.0	0.0
			2009-2010	3.2	5.6	0.5	2.9	-	-	0.0	0.1	0.05	0.34	0.0	0.0
11	Perumannu	Valapatanam	2007-2008	5	6	2.0	3.0	-	-	0.2	1.6	0.05	0.05	0.0	0.0
			2008-2009	3.2	4.8	1.0	2.5	-	-	0.0	0.2	0.09	0.09	0.0	0.0
			2009-2010	3.2	4.8	1.0	2.9	-	-	0.0	0.1	0.12	0.36	0.0	0.0
12	Kuttyadi	Kuttyadi	2007-2008	<----------Site is not available---------->											
			2008-2009	2.4	3.2	0.9	1.5	-	-	0.0	0.3	0.05	0.09	0.0	0.0
			2009-2010	2.4	4.0	0.5	1.0	-	-	0.0	0.1	0.09	0.29	0.0	0.0
13	Kuniyil	Chaliyar	2007-2008	6	10	3.0	8.5	-	-	0.2	0.2	-	-	0.0	0.0
			2008-2009	4.0	4.8	2.4	2.9	-	-	0.1	0.1	-	-	0.0	0.0
			2009-2010	4.8	7.2	1.5	2.0	-	-	0.0	0.1	0.20	0.42	0.0	0.0
14	Karathodu	Kadalundi	2007-2008	<----------Site is not available---------->											
			2008-2009	4.0	8.0	2.0	2.9	-	-	0.1	0.1	0.05	0.05	0.0	0.0
			2009-2010	4.0	4.0	1.5	2.5	-	-	0.0	0.0	0.21	0.21	0.0	0.0
15	Kumbidi	Bharathapuzha	2007-2008	8	15	5.0	10.5	-	-	0.0	0.7	0.05	0.05	0.0	0.0
			2008-2009	5.6	18.4	3.4	18.4	-	-	0.0	0.1	0.05	0.08	0.0	0.0
			2009-2010	6.4	15.2	1.0	7.4	-	-	0.0	0.1	0.10	0.49	0.0	0.0

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

IX Basin : West Flowing Rivers

Sl. No.	Site Name	Name of the River/Stream	Years	Calcium (Ca)		Magnesium (Mg)		Aluminium (AL)		Iron (Fe)		Ammonia (NH3-N)		Carbonate (CO3)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)	(25)	(26)	(27)	(28)
16	Pulamanthole	Pulanthodu	2007-2008	<----------Site is not available---------->											
			2008-2009	2.4	6.4	1.9	2.9	-	-	0.1	0.1	-	-	0.000	0.000
			2009-2010	3.2	5.6	1.0	2.5	-	-	0.0	0.1	0.12	0.24	0.0	0.0
17	Mankara	Bharathapuzha	2007-2008	<----------Site is not available---------->											
			2008-2009	19.2	49.6	10.7	19.6	-	-	0.0	0.1	0.10	0.10	0.0	0.0
			2009-2010	12.8	29.6	2.5	18.1	-	-	0.0	0.1	0.19	0.31	0.0	0.0
18	Pudur	Kannadipuzha	2007-2008	<----------Site is not available---------->											
			2008-2009	26.4	42.4	16.0	19.1	-	-	0.1	0.1	-	-	0.0	0.8
			2009-2010	28.8	33.6	5.9	18.1	-	-	0.0	0.1	0.17	0.41	0.0	0.0
19	Ambaramplayam	Bharathapuzha	2007-2008	8	32	3.9	14.6	-	-	0.050	0.060	0.03	0.06	0.0	0.0
			2008-2009	8	38	3.9	17.5	-	-	0.060	0.133	0.05	0.20	0.0	0.0
			2009-2010	16	35	3.9	23.3	-	-	0.030	0.430	0.11	0.16	0.0	0.0
20	Arangaly	Chalakudy	2007-2008	4	6	1.0	23.3	-	-	0.2	0.2	0.05	0.05	0.0	0.0
			2008-2009	2.4	5.6	0.5	1.9	-	-	-	-	-	-	0.0	0.0
			2009-2010	4.0	5.6	0.5	1.0	-	-	0.0	0.1	0.16	0.19	0.0	0.0
21	Neeleshwaram	Periyar	2007-2008	4	5	1.0	2.5	-	-	0.0	0.2	0.22	0.22	0.0	0.0
			2008-2009	3.2	5.6	1.5	2.0	-	-	0.0	0.1	0.05	0.05	0.0	0.0
			2009-2010	2.0	5.0	0.5	1.5	-	-	0.0	0.1	0.17	0.27	0.0	0.0
22	Vandiperiyar	Periyar	2007-2008	5	9	2.0	3.5	-	-	0.1	0.7	0.15	0.15	0.0	0.0
			2008-2009	3.2	6.4	1.5	2.9	-	-	0.1	0.1	0.06	0.06	0.0	0.0
			2009-2010	3.2	7.2	1.0	2.9	-	-	0.0	0.1	0.18	0.21	0.0	0.0
23	Ramangalam	Muvattupuzha	2007-2008	5	6	1.0	2.0	-	-	0.3	0.5	0.05	0.05	0.0	0.0
			2008-2009	3.2	4.0	1.5	2.4	-	-	0.0	0.1	0.05	0.09	0.0	0.0
			2009-2010	4.0	5.0	0.5	2.0	-	-	0.0	0.6	0.12	0.34	0.0	0.0
24	Kalampur	Kaliyar	2007-2008	<----------Site is not available---------->											
			2008-2009	2.4	3.2	1.0	2.0	-	-	0.0	0.1	-	-	0.0	0.0
			2009-2010	3.2	5.0	1.0	2.9	-	-	0.0	0.1	0.08	0.25	0.0	0.0
25	Kidangoor	Meenachil	2007-2008	3	5	1.5	2.5	-	-	1.3	1.3	0.10	0.10	0.0	0.0
			2008-2009	2.4	4.8	1.0	1.5	-	-	0.0	0.2	0.05	0.05	0.0	0.0
			2009-2010	2.0	3.2	0.5	1.0	-	-	0.1	0.1	0.21	0.31	0.0	0.0
26	Kalloopara	Manimala	2007-2008	4	6	1.0	1.5	-	-	1.0	1.0	0.05	0.05	0.0	0.0

Contd/…

			2008-2009	3.2	4.8	0.5	1.5	-	-	0.2	0.2	0.05	0.05	0.0	0.0
			2009-2010	2.4	3.2	0.5	1.0	-	-	0.0	0.1	0.13	0.28	0.0	0.0
27	Malakkara	Pamba	2007-2008	4	5	1.0	1.5	-	-	0.7	0.7	0.05	0.06	0.0	0.0
			2008-2009	2.4	4.0	1.0	1.5	-	-	0.1	0.1	-	-	0.0	0.0
			2009-2010	2.4	4.0	0.5	1.0	-	-	0.0	0.1	0.15	0.36	0.0	0.0
28	Thumpamon	Achankovil	2007-2008	<----------Site is not available---------->											
			2008-2009	3.2	4.8	1.5	2.0	-	-	0.1	0.2	0.05	0.05	0.0	0.0
			2009-2010	3.2	4.0	1.0	1.0	-	-	0.0	0.0	0.19	0.20	0.0	0.0
29	Pattazhy	Kallada	2007-2008	<----------Site is not available---------->											
			2008-2009	3.2	4.0	1.5	3.4	-	-	0.0	0.2	0.05	0.09	0.0	0.0
			2009-2010	2.4	4.8	1.0	1.5	-	-	0.0	0.1	0.07	0.27	0.0	0.0
30	Ayilam	Vamanapuram	2007-2008	<----------Site is not available---------->											
			2008-2009	3.2	4.0	1.5	1.9	-	-	0.0	0.0	0.05	0.05	0.0	0.0
			2009-2010	2.4	4.0	0.5	1.0	-	-	0.1	0.1	0.08	0.39	0.0	0.0

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

IX Basin : West Flowing Rivers

Sl. No.	Site Name	Name of the River/ Stream	Years	Bicarbonate (HCO3)		Chloride (CL)		Fluoride (F)		Sulphate (SO4)		Sulphite		Nitrate (NO3-N)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(29)	(30)	(31)	(32)	(33)	(34)	(35)	(36)	(37)	(38)	(39)	(40)
1	Badalapur	Ulhas	2007-2008	22.0	67.2	5	29	0.05	1.10	2	29	-	-	0.02	0.97
			2008-2009	24	132	5.9	31.6	0.05	0.95	6.4	16.1	-	-	0.01	2.08
			2009-2010	26.8	78.1	10	26	0.05	0.54	15	38	-	-	0.22	1.75
2	Mangaon	Kal	2007-2008	17.1	41.7	3	11	0.05	0.21	1	5	-	-	0.03	0.59
			2008-2009	20	32	3.4	9.1	0.05	0.05	2.7	14.2	-	-	0.05	0.28
			2009-2010	29.3	48.8	7	11	0.0	0.6	3	21	-	-	0.13	0.24
3	Belne Bridge	Gad	2007-2008	17.1	61.0	5	12	0.05	0.90	3	10	-	-	0.03	0.97
			2008-2009	17	66	5.2	27.0	0.05	0.29	1.0	5.8	-	-	0.03	0.36
			2009-2010	24.4	56.1	7	14	0.05	0.81	10	40	-	-	0.18	0.36
4	Santeguli	Aghanashini	2007-2008	13	42	5.0	7.8	0.00	0.09	0.6	1.7	-	-	0.20	0.35
			2008-2009	18	38	3.9	7.8	0.00	0.06	0.7	2.7	-	-	0.21	0.42
			2009-2010	14	28	5.8	7.8	0.00	0.04	0.9	2.0	-	-	0.25	0.35
5	Haladi	Haladi	2007-2008	14	15	2.5	2.8	0.00	0.06	0.8	1.2	-	-	0.24	0.28
			2008-2009	9	19	1.8	6.0	0.00	0.02	0.5	1.9	-	-	0.21	0.32
			2009-2010	9	14	3.8	3.9	0.00	0.04	0.9	1.7	-	-	0.25	0.42
6	Aversha	Sita	2007-2008	23	23	4.6	4.6	0.04	0.04	0.5	0.5	-	-	0.43	0.43
			2008-2009	13	23	3.9	3.9	0.00	0.02	0.5	1.2	-	-	0.28	0.42
			2009-2010	9	14	3.9	5.8	0.00	0.02	0.8	1.1	-	-	0.25	0.41
7	Yennehole	Yennehole	2007-2008	10	28	3.3	5.0	0.00	0.06	0.4	1.0	-	-	0.25	0.36
			2008-2009	9	19	3.9	6.0	0.00	0.02	0.5	3.2	-	-	0.31	0.62
			2009-2010	9	19	3.9	5.8	0.00	0.04	0.9	1.1	-	-	0.24	0.32
8	Addoor	Gurpur	2007-2008	12	17	4.0	5.9	0.00	0.04	0.8	1.2	-	-	0.31	0.45
			2008-2009	9	19	5.8	6.0	0.00	0.02	0.7	3.0	-	-	0.39	0.62
			2009-2010	9	14	3.9	6.0	0.00	0.02	1.0	1.2	-	-	0.27	0.42
9	Bantwal	Nethravathi	2007-2008	<----------Site is not available---------->											
			2008-2009	14	19	3.9	7.8	0.04	0.04	0.8	2.3	-	-	0.31	0.32
			2009-2010	14	23	3.9	6.0	0.02	0.02	1.1	2.0	-	-	0.25	0.62

Contd/…

10	Erinjipuzha	Payaswani	2007-2008	16	27	6.4	11.2	0.21	0.26	1.0	2.0	-	-		0.81	2.28
			2008-2009	17.1	30.5	6	9	0.05	0.11	1	3	-	-		0.06	0.28
			2009-2010	13.4	23.2	6	9	0.10	0.42	1	1	-	-	-		-
11	Perumannu	Valapatanam	2007-2008	16	24	6.1	9.2	0.16	0.23	1.0	2.2	-	-		0.33	2.08
			2008-2009	11.0	26.8	6	9	0.05	0.39	1	1	-	-		0.08	0.20
			2009-2010	14.6	26.8	6	8	0.05	0.23	1	1	-	-		0.03	0.03
12	Kuttyadi	Kuttyadi	2007-2008	<----------Site is not available---------->												
			2008-2009	8.6	15.9	4	6	0.05	0.11	1	1	-	-		0.03	0.13
			2009-2010	8.5	12.2	4	5	0.06	0.94	1	1	-	-		0.03	0.03
13	Kuniyil	Chaliyar	2007-2008	23	51	6.4	14.2	0.15	0.24	1.2	1.8	-	-		2.36	3.06
			2008-2009	17.1	28.1	7	9	0.05	0.05	1	2	-	-		0.12	0.23
			2009-2010	19.5	22.0	6	11	0.11	0.39	1	14	-	-	-		-
14	Karathodu	Kadalundi	2007-2008	<----------Site is not available---------->												
			2008-2009	19.6	32.9	7	11	0.05	0.05	2	4	-	-		0.26	0.28
			2009-2010	18.3	22.0	7	10	0.09	0.10	1	1	-	-	-		-
15	Kumbidi	Bharathapuzha	2007-2008	42	81	14.3	22.7	0.19	0.39	2.4	17.0	-	-		0.98	4.69
			2008-2009	31.7	113.5	10	36	0.05	0.31	3	15	-	-		0.12	0.86
			2009-2010	22.0	81.7	9	20	0.08	0.26	1	6	-	-		0.12	0.12

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

IX Basin : West Flowing Rivers

Sl. No.	Site Name	Name of the River/Stream	Years	Bicarbonate (HCO3)		Chloride (CL)		Fluoride (F)		Sulphate (SO4)		Sulphite		Nitrate (NO3-N)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(29)	(30)	(31)	(32)	(33)	(34)	(35)	(36)	(37)	(38)	(39)	(40)
16	Pulamanthole	Pulanthodu	2007-2008	<----------Site is not available---------->											
			2008-2009	14.4	29.3	6	9	0.05	0.05	1	1	-	-	0.05	0.34
			2009-2010	15.9	29.3	7	9	0.08	0.28	1	1	-	-	0.11	0.11
17	Mankara	Bharathapuzha	2007-2008	<----------Site is not available---------->											
			2008-2009	97.6	195.2	16	43	0.05	0.42	5	21	-	-	0.34	0.41
			2009-2010	48.0	178.1	14	34	0.11	0.24	1	28	-	-	-	-
18	Pudur	Kannadipuzha	2007-2008	<----------Site is not available---------->											
			2008-2009	151.3	191.5	25	58	0.46	0.63	6	24	-	-	0.39	0.42
			2009-2010	119.6	197.6	22	27	0.05	0.43	12	24	-	-	-	-
19	Ambaramplayam	Bharathapuzha	2007-2008	44	212	7.2	22.4	0.19	0.60	3.0	21.9	-	-	0.79	3.97
			2008-2009	43	208	7.7	30.0	0.26	0.66	1.0	32.3	-	-	0.02	1.58
			2009-2010	73	229	9.5	59.6	0.11	0.67	0.4	29.5	-	-	0.04	1.64
20	Arangaly	Chalakudy	2007-2008	13	21	7.1	9.9	0.10	0.12	1.0	4.4	-	-	1.10	1.45
			2008-2009	13.4	18.3	6	9	0.05	0.08	1	1	-	-	0.10	0.14
			2009-2010	12.2	18.3	5	7	0.05	0.10	1	5	-	-	-	-
21	Neeleshwaram	Periyar	2007-2008	11	15	6.4	9.0	0.05	0.17	1.0	3.2	-	-	0.17	1.37
			2008-2009	11.0	20.7	5	9	0.05	0.09	1	1	-	-	0.08	0.27
			2009-2010	9.8	15.9	5	7	0.08	0.24	1	1	-	-	0.10	0.10
22	Vandiperiyar	Periyar	2007-2008	15	37	9.2	14.9	0.05	0.18	1.0	1.4	-	-	0.21	2.10
			2008-2009	14.4	26.8	6	11	0.07	0.37	1	1	-	-	0.19	0.27
			2009-2010	13.1	36.6	7	12	0.08	0.23	1	12	-	-	-	-
23	Ramangalam	Muvattupuzha	2007-2008	13	21	7.1	9.2	0.11	0.20	1.0	1.8	-	-	0.72	1.34
			2008-2009	12.2	18.3	6	9	0.05	0.11	1	3	-	-	0.12	0.47
			2009-2010	13.4	24.0	6	9	0.05	0.23	1	1	-	-	0.10	0.10
24	Kalampur	Kaliyar	2007-2008	<----------Site is not available---------->											
			2008-2009	11.0	15.9	5	9	0.05	0.32	1	2	-	-	0.09	0.22
			2009-2010	11.0	25.9	6	9	0.08	0.23	1	7	-	-	0.15	0.15
25	Kidangoor	Meenachil	2007-2008	10	12	7.1	9.2	0.05	0.20	1.0	2.4	-	-	0.11	1.22
			2008-2009	9.8	19.8	6	9	0.05	0.05	1	2	-	-	0.17	0.46
			2009-2010	9.8	12.2	5	7	0.07	0.11	1	1	-	-	-	-

Contd/…

26	Kalloopara	Manimala	2007-2008	10	12	8.5	9.2	0.05	0.17	1.0	4.3	-	-		0.29	1.48
			2008-2009	11.0	15.9	7	9	0.05	0.09	1	3	-	-		0.11	0.35
			2009-2010	9.8	15.9	6	9	0.05	0.41	1	1	-	-	-		-
27	Malakkara	Pamba	2007-2008	11	13	6.4	7.8	0.05	0.24	1.0	1.8	-	-		0.39	1.11
			2008-2009	9.8	14.6	6	9	0.05	0.10	1	1	-	-		0.19	0.25
			2009-2010	11.0	13.4	4	6	0.08	0.35	1	1	-	-		0.08	0.08
28	Thumpamon	Achankovil	2007-2008	<----------Site is not available---------->												
			2008-2009	11.0	18.3	7	10	0.05	0.09	1	6	-	-		0.07	0.27
			2009-2010	13.4	18.3	8	8	0.07	0.47	1	1	-	-	-		-
29	Pattazhy	Kallada	2007-2008	<----------Site is not available---------->												
			2008-2009	12.2	18.3	6	10	0.05	0.16	1	4	-	-		0.10	0.33
			2009-2010	12.2	19.5	4	9	0.07	0.23	1	1	-	-		0.05	0.05
30	Ayilam	Vamanapuram	2007-2008	<----------Site is not available---------->												
			2008-2009	12.2	17.1	9	10	0.05	0.07	1	3	-	-		0.13	0.15
			2009-2010	13.4	14.6	7	10	0.05	0.10	1	1	-	-	-		-

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

IX Basin : West Flowing Rivers

Sl. No.	Site Name	Name of the River/ Stream	Years	Nitrite (NO2-N)		Phosphate (PO4)		Silica (SiO2)		DO		BOD3-27		Total Coliform (no.per 10 ml)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(41)	(42)	(43)	(44)	(45)	(46)	(47)	(48)	(49)	(50)	(51)	(52)
1	Badalapur	Ulhas	2007-2008	0.0	0.1	-	-	0.24	20.14	3.9	5.3	0.2	2.6	-	-
			2008-2009	0.01	5.22	-	-	3.2	14.5	3.0	6.9	0.1	1.6	-	-
			2009-2010	0.0	0.0	-	-	2.32	11.95	3.9	7.1	0.2	2.2	-	-
2	Mangaon	Kal	2007-2008	0.0	0.0	-	-	8.84	11.98	6.8	7.1	0.3	1.9	-	-
			2008-2009	0.01	0.01	-	-	4.8	6.0	6.3	6.3	0.1	1.1	-	-
			2009-2010	0.0	0.0	-	-	8.71	11.95	5.7	7.6	0.3	2.0	-	-
3	Belne Bridge	Gad	2007-2008	0.0	0.1	-	-	5.91	18.63	-	-	0.1	1.7	-	-
			2008-2009	0.00	0.12	-	-	2.3	10.4	0.0	0.0	0.1	1.8	-	-
			2009-2010	0.0	0.0	-	-	6.30	12.27	6.4	7.4	0.1	1.8	-	-
4	Santeguli	Aghanashini	2007-2008	0.00	0.00	0.000	0.062	9.8	13.2	-	-	-	-	-	-
			2008-2009	0.00	0.01	0.000	0.041	9.1	12.2	-	-	-	-	-	-
			2009-2010	0.00	0.00	0.000	0.010	6.5	10.9	-	-	-	-	-	-
5	Haladi	Haladi	2007-2008	0.00	0.00	0.000	0.000	1.8	3.2	-	-	-	-	-	-
			2008-2009	0.00	0.01	0.000	0.041	2.2	6.7	-	-	-	-	-	-
			2009-2010	0.00	0.00	0.000	0.052	3.4	8.8	-	-	-	-	-	-
6	Aversha	Sita	2007-2008	0.00	0.00	0.062	0.062	15.6	15.6	-	-	-	-	-	-
			2008-2009	0.00	0.01	0.021	0.041	7.9	10.3	-	-	-		-	-
			2009-2010	0.00	0.00	0.000	0.010	6.3	10.1	-	-	-	-	-	-
7	Yennehole	Yennehole	2007-2008	0.00	0.04	0.000	0.083	8.2	11.2	-	-	-	-	-	-
			2008-2009	0.00	0.01	0.021	0.041	8.7	9.9	-	-	-	-	-	-
			2009-2010	0.00	0.00	0.000	0.010	7.4	8.5	-	-	-	-	-	-
8	Addoor	Gurpur	2007-2008	0.00	0.03	0.000	0.258	10.0	12.5	-	-	-	-	-	-
			2008-2009	0.00	0.01	0.021	0.021	0.3	0.3	-	-	-	-	-	-
			2009-2010	0.00	0.00	0.000	0.000	7.8	9.3	-	-	-	-	-	-
9	Bantwal	Nethravathi	2007-2008												
			2008-2009	0.01	0.06	0.031	0.031	12.3	12.3	6.1	9.0	0.1	0.8	-	-
			2009-2010	0.00	0.04	0.000	0.010	10.0	11.8	5.8	6.8	0.6	1.4	-	-

Contd/…

10	Erinjipuzha	Payaswani	2007-2008	16	27	0.010	0.246	14.3	22.0	7.0	7.8	0.4	1.8	-	-
			2008-2009	0.0	0.1	0.014	0.042	19.90	29.00	6.0	7.8	0.2	0.8	-	-
			2009-2010	-	-	0.026	0.067	20.00	28.30	7.8	8.0	0.2	0.6	-	-
11	Perumannu	Valapatanam	2007-2008	16	24	0.023	0.968	12.3	23.0	7.0	7.8	0.2	1.0	-	-
			2008-2009	0.0	0.1	0.010	0.040	15.40	26.40	6.8	7.6	0.2	1.2	-	-
			2009-2010	-	-	0.017	0.075	24.40	39.90	6.6	7.4	0.2	1.4	-	-
12	Kuttyadi	Kuttyadi	2007-2008	<----------Site is not available---------->											
			2008-2009	0.0	0.0	0.010	0.073	12.10	19.40	-	-	-	-	-	-
			2009-2010	-	-	0.010	0.112	19.90	28.52	-	-	0.2	0.8	-	-
13	Kuniyil	Chaliyar	2007-2008	11	32	0.046	0.283	15.7	21.4	5.4	7.0	0.2	0.8	-	-
			2008-2009	0.0	0.0	0.027	0.037	18.20	21.40	6.0	7.0	0.4	0.4	-	-
			2009-2010	-	-	0.031	0.076	28.44	35.30	8.0	8.0	0.2	2.2	-	-
14	Karathodu	Kadalundi	2007-2008	<----------Site is not available---------->											
			2008-2009	0.0	0.1	0.039	0.071	19.80	21.40	7.0	7.2	0.4	0.4	-	-
			2009-2010	-	-	0.028	0.085	29.90	29.90	-	-	0.4	0.4	-	-
15	Kumbidi	Bharathapuzha	2007-2008	0.5	0.26	0.034	0.390	12.1	24.6	6.4	7.4	0.4	1.8	-	-
			2008-2009	0.0	0.1	0.010	0.472	17.60	27.40	5.8	7.8	0.2	1.6	-	-
			2009-2010	-	-	0.010	0.090	27.40	42.80	9.2	9.2	0.2	0.6	-	-

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

IX Basin : West Flowing Rivers

Sl. No.	Site Name	Name of the River/ Stream	Years	Nitrite (NO2-N)		Phosphate (PO4)		Silica (SiO2)		DO		BOD3-27		Total Coliform (no.per 10 ml)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(41)	(42)	(43)	(44)	(45)	(46)	(47)	(48)	(49)	(50)	(51)	(52)
16	Pulamanthole	Pulanthodu	2007-2008	<----------Site is not available---------->											
			2008-2009	0.1	0.1	0.010	0.044	20.60	23.40	6.6	6.8	0.4	1.6	-	-
			2009-2010	-	-	0.010	0.075	28.20	30.47	-	-	0.2	0.8	-	-
17	Mankara	Bharathapuzha	2007-2008	<----------Site is not available---------->											
			2008-2009	0.1	0.1	0.025	0.144	22.80	27.80	-	-	-	-	-	-
			2009-2010	-	-	0.010	0.284	28.80	33.20	-	-	0.6	0.6	-	-
18	Pudur	Kannadipuzha	2007-2008	<----------Site is not available---------->											
			2008-2009	0.1	0.1	0.083	0.132	16.70	21.20	-	-	-	-	-	-
			2009-2010	-	-	0.059	0.112	28.57	40.90	-	-	-	-	-	-
19	Ambaramplayam	Bharathapuzha	2007-2008	0.00	0.09	-	-	7.6	17.6	-	-	0.3	1.1	-	-
			2008-2009	0.01	0.02	0.010	0.033	1.6	26.0	6.3	7.7	0.3	2.4	-	-
			2009-2010	-	-	0.010	0.110	11.9	43.4	6.1	6.9	0.1	1.6	-	-
20	Arangaly	Chalakudy	2007-2008	0.00	0.09	0.058	0.210	17.5	21.4	5.6	7.6	0.2	1.2	-	-
			2008-2009	0.0	0.1	0.035	0.101	18.80	22.10	6.7	7.4	0.4	0.9	-	-
			2009-2010	-	-	0.047	0.075	20.60	28.61	7.7	7.9	0.2	1.0	-	-
21	Neeleshwaram	Periyar	2007-2008	0.00	0.13	0.018	0.879	16.4	22.4	5.4	8.2	0.2	1.0	-	-
			2008-2009	0.0	0.1	0.010	0.098	16.70	21.40	6.6	7.8	0.2	1.0	-	-
			2009-2010	-	-	0.010	0.056	21.90	33.80	7.2	7.9	0.2	1.0	-	-
22	Vandiperiyar	Periyar	2007-2008	0.00	0.13	0.047	0.273	11.8	21.0	4.0	7.0	0.1	1.2	-	-
			2008-2009	0.0	0.0	0.038	0.105	18.20	20.10	6.0	7.8	0.4	1.2	-	-
			2009-2010	-	-	0.010	0.062	12.00	28.80	8.0	8.0	0.2	1.6	-	-
23	Ramangalam	Muvattupuzha	2007-2008	0.01	0.09	0.049	0.208	16.0	22.2	7.0	7.8	0.2	1.6	-	-
			2008-2009	0.0	0.1	0.010	0.081	14.50	23.50	6.6	7.6	0.2	1.8	-	-
			2009-2010	-	-	0.010	0.070	22.40	36.10	7.2	7.8	0.2	1.0	-	-
24	Kalampur	Kaliyar	2007-2008	<----------Site is not available---------->											
			2008-2009	0.1	0.1	0.025	0.054	14.60	19.90	6.4	7.6	0.4	0.6	-	-
			2009-2010	-	-	0.026	0.071	9.90	30.23	7.2	7.2	0.6	1.0	-	-

Contd/…

25	Kidangoor	Meenachil	2007-2008	0.03	0.10	0.102	0.227	10.9	21.0	6.8	7.8	0.2	1.2	-	-
			2008-2009	0.1	0.1	0.018	0.067	17.90	23.10	5.8	6.8	0.4	0.8	-	-
			2009-2010	-	-	0.036	0.112	12.80	28.69	6.6	7.8	0.2	1.6	-	-
26	Kalloopara	Manimala	2007-2008	0.00	0.11	0.086	0.170	14.8	22.0	6.4	7.6	0.6	1.2	-	-
			2008-2009	0.1	0.1	0.014	0.038	20.40	24.50	6.2	6.8	0.2	0.4	-	-
			2009-2010	-	-	0.012	0.056	27.00	31.60	7.6	8.4	0.2	0.8	-	-
27	Malakkara	Pamba	2007-2008	0.00	0.09	0.064	0.660	13.3	19.9	6.0	7.2	0.2	1.6	-	-
			2008-2009	0.1	0.1	0.021	0.045	19.50	22.70	6.0	7.2	0.2	0.6	-	-
			2009-2010	-	-	0.010	0.071	15.60	28.60	7.4	7.6	0.4	0.8	-	-
28	Thumpamon	Achankovil	2007-2008	<----------Site is not available---------->											
			2008-2009	0.0	0.0	0.016	0.067	18.00	24.90	6.2	7.2	0.6	1.0	-	-
			2009-2010	-	-	0.026	0.070	28.20	28.57	6.4	6.8	0.2	0.2	-	-
29	Pattazhy	Kallada	2007-2008	<----------Site is not available---------->											
			2008-2009	0.0	0.1	0.010	0.124	17.60	29.40	5.8	7.4	0.6	0.8	-	-
			2009-2010	-	-	0.010	0.069	23.50	29.76	7.5	7.8	0.2	1.2	-	-
30	Ayilam	Vamanapuram	2007-2008	<----------Site is not available---------->											
			2008-2009	0.1	0.2	0.010	0.055	22.30	24.20	6.8	7.6	0.6	1.8	-	-
			2009-2010	-	-	0.031	0.077	29.35	38.80	-	-	0.2	1.2	-	-

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

IX Basin : West Flowing Rivers

Sl. No.	Site Name	Name of the River/ Stream	Years	Faecal Coliform (no.per 10 ml)		Total plate count (no.per 10 ml)		Phytoplankton (no.per ml)		Zooplankton (no.per litre)		Arsenic (ppm)		Boron (ppm)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(53)	(54)	(55)	(56)	(57)	(58)	(59)	(60)	(61)	(62)	(63)	(64)
1	Badalapur	Ulhas	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
2	Mangaon	Kal	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
3	Belne Bridge	Gad	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
4	Santeguli	Aghanashini	2007-2008	-	-	-	-	-	-	-	-	5.9	5.9	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
5	Haladi	Haladi	2007-2008	-	-	-	-	-	-	-	-	5.4	5.4	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
6	Aversha	Sita	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
7	Yennehole	Yennehole	2007-2008	-	-	-	-	-	-	-	-	14.1	14.1	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
8	Addoor	Gurpur	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
9	Bantwal	Nethravathi	2007-2008	<----------Site is not available---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-		-	-	-	-	-	-	-	-	-

Contd/…

10	**Erinjipuzha**	**Payaswani**	**2007-2008**	-	-	-	-	-	-	-	-	**4.1**	**4.1**	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
11	**Perumannu**	**Valapatanam**	**2007-2008**	-	-	-	-	-	-	-	-	**4.6**	**4.6**	-	-
			2008-2009	-	-	-	-	-	-	-	-	**1.00**	**1.00**	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
12	**Kuttyadi**	**Kuttyadi**	**2007-2008**	<----------Site is not available---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
13	**Kuniyil**	**Chaliyar**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
14	**Karathodu**	**Kadalundi**	**2007-2008**	<----------Site is not available---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
15	**Kumbidi**	**Bharathapuzha**	**2007-2008**	-	-	-	-	-	-	-	-	**4.4**	**4.4**	-	-
			2008-2009	-	-	-	-	-	-	-	-	**1.49**	**1.49**	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

IX Basin : West Flowing Rivers

Sl. No.	Site Name	Name of the River/ Stream	Years	Faecal Coliform (no.per 10 ml)		Total plate count (no.per 10 ml)		Phytoplankton (no.per ml)		Zooplankton (no.per litre)		Arsenic (ppm)		Boron (ppm)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(53)	(54)	(55)	(56)	(57)	(58)	(59)	(60)	(61)	(62)	(63)	(64)
16	Pulamanthole	Pulanthodu	2007-2008	<----------Site is not available---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
17	Mankara	Bharathapuzha	2007-2008	<----------Site is not available---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
18	Pudur	Kannadipuzha	2007-2008	<----------Site is not available---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
19	Ambaramplayam	Bharathapuzha	2007-2008	-	-	-	-	-	-	-	-	4.4	4.4	-	-
			2008-2009	-	-	-	-	-	-	-	-	10.41	1.41	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
20	Arangaly	Chalakudy	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
21	Neeleshwaram	Periyar	2007-2008	-	-	-	-	-	-	-	-	4.3	4.3	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
22	Vandiperiyar	Periyar	2007-2008	-	-	-	-	-	-	-	-	2.9	2.9	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
23	Ramangalam	Muvattupuzha	2007-2008	-	-	-	-	-	-	-	-	4.3	4.3	-	-
			2008-2009	-	-	-	-	-	-	-	-	1.00	1.00	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
24	Kalampur	Kaliyar	2007-2008	<----------Site is not available---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/…

25	**Kidangoor**	**Meenachil**	**2007-2008**	-	-	-	-	-	-	-	-	**4.5**	**4.5**	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
26	**Kalloopara**	**Manimala**	**2007-2008**	-	-	-	-	-	-	-	-	**4.2**	**4.2**	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
27	**Malakkara**	**Pamba**	**2007-2008**	-	-	-	-	-	-	-	-	**4.0**	**4.0**	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
28	**Thumpamon**	**Achankovil**	**2007-2008**	**<----------Site is not available----------></**											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
29	**Pattazhy**	**Kallada**	**2007-2008**	**<----------Site is not available----------></**											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
30	**Ayilam**	**Vamanapuram**	**2007-2008**	**<----------Site is not available----------></**											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/…

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

IX Basin : West Flowing Rivers

Sl. No.	Site Name	Name of the River/ Stream	Years	Cadmium (ppm)		Chromium (ppm)		Copper (ppm)		Cyanide (ppm)		Lead (ppm)		Manganese (ppm)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(65)	(66)	(67)	(68)	(69)	(70)	(71)	(72)	(73)	(74)	(75)	(76)
1	Badalapur	Ulhas	2007-2008	0.01	0.01	2.00	2.00	-	-	-	-	4.39	4.39	-	-
			2008-2009	2.19	2.19	2.00	2.00	-	-	-	-	3.85	3.85	-	-
			2009-2010	0.01	0.01	2.00	2.00	-	-	-	-	1.00	1.00	-	-
2	Mangaon	Kal	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
3	Belne Bridge	Gad	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
4	Santeguli	Aghanashini	2007-2008	1.0	1.0	-	-	3.2	3.2	-	-	1.4	1.4	-	-
			2008-2009	-	-	-	-	7.27	7.27	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
5	Haladi	Haladi	2007-2008	1.1	1.1	-	-	3.2	3.2	-	-	2.0	2.0	-	-
			2008-2009	-	-	-	-	1.78	1.78	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
6	Aversha	Sita	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
7	Yennehole	Yennehole	2007-2008	1.2	1.2	-	-	3.4	3.4	-	-	2.0	2.0	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
8	Addoor	Gurpur	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
9	Bantwal	Nethravathi	2007-2008	<----------Site is not available---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/…

10	Erinjipuzha	Payaswani	2007-2008	2.1	2.1	-	-	3.3	3.3	-	-	1.9	1.9	-	-
			2008-2009	-	-	2.00	2.00	1.00	1.00	-	-	1.00	1.00	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
11	Perumannu	Valapatanam	2007-2008	0.5	0.5	-	-	8.3	8.3	-	-	2.4	2.4	-	-
			2008-2009	-	-	2.00	2.00	6.79	6.79	-	-	1.00	1.00	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
12	Kuttyadi	Kuttyadi	2007-2008	<----------Site is not available---------->											
			2008-2009	-	-	2.00	2.00	1.00	1.00	-	-	1.00	1.00	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
13	Kuniyil	Chaliyar	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
14	Karathodu	Kadalundi	2007-2008	<----------Site is not available---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
15	Kumbidi	Bharathapuzha	2007-2008	0.6	0.6	2.5	2.5	5.6	5.6	-	-	1.0	1.0	-	-
			2008-2009	-	-	2.00	2.00	1.09	1.09	-	-	1.00	1.00	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/…

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

IX Basin : West Flowing Rivers

Sl. No.	Site Name	Name of the River/ Stream	Years	Cadmium (ppm)		Chromium (ppm)		Copper (ppm)		Cyanide (ppm)		Lead (ppm)		Manganese (ppm)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(65)	(66)	(67)	(68)	(69)	(70)	(71)	(72)	(73)	(74)	(75)	(76)
16	Pulamanthole	Pulanthodu	2007-2008	<----------Site is not available---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
17	Mankara	Bharathapuzha	2007-2008	<----------Site is not available---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
18	Pudur	Kannadipuzha	2007-2008	<----------Site is not available---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
19	Ambaramplayam	Bharathapuzha	2007-2008	0.5	0.5	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	1.66	1.66	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
20	Arangaly	Chalakudy	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
21	Neeleshwaram	Periyar	2007-2008	0.5	0.5	-	-	1.5	1.5	-	-	1.2	1.2	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
22	Vandiperiyar	Periyar	2007-2008	0.5	0.5	-	-	2.8	2.8	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
23	Ramangalam	Muvattupuzha	2007-2008	0.5	0.5	-	-	1.6	1.6	-	-	2.6	2.6	-	-
			2008-2009	-	-	2.00	2.00	1.00	1.00	-	-	1.04	1.04	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
24	Kalampur	Kaliyar	2007-2008	<----------Site is not available---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
25	Kidangoor	Meenachil	2007-2008	0.5	0.5	-	-	3.5	3.5	-	-	1.7	1.7	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/…

26	Kalloopara	Manimala	2007-2008	0.5	0.5	-	-	2.3	2.3	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
27	Malakkara	Pamba	2007-2008	1.1	1.1	-	-	3.2	3.2	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
28	Thumpamon	Achankovil	2007-2008	<----------Site is not available---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
-	-	-	2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
29	Pattazhy	Kallada	2007-2008	<----------Site is not available---------->											
			2008-2009	-	-	2.00	2.00	1.00	1.00	-	-	1.00	1.00	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
30	Ayilam	Vamanapuram	2007-2008	<----------Site is not available---------->											
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

IX Basin : West Flowing Rivers

Sl. No.	Site Name	Name of the River/ Stream	Years	Mercury (ppm)		Zinc (ppm)		Total Hardness		Sodium % (Na%)		SAR		RSC	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(77)	(78)	(79)	(80)	(81)	(82)	(83)	(84)	(85)	(86)	(87)	(88)
1	Badalapur	Ulhas	2007-2008	-	-	4.33	4.33	16	59	20	57	0	1	0.00	0.29
			2008-2009	-	-	15.81	15.81	16	111	12	50	0.3	1.4	0.0	0.2
			2009-2010	-	-	8.45	8.45	49	100	14	31	0	1	0.00	0.00
2	Mangaon	Kal	2007-2008	-	-	-	-	14	25	25	54	0	1	0.00	0.20
			2008-2009	-	-	-	-	22	38	14	33	0.2	0.5	0.0	0.1
			2009-2010	-	-	-	-	34	55	19	26	0	0	0.00	0.00
3	Belne Bridge	Gad	2007-2008	-	-	-	-	16	51	22	57	0	1	0.00	0.06
			2008-2009	-	-	-	-	14	51	18	50	0.2	1.2	0.0	0.1
			2009-2010	-	-	-	-	34	207	7	33	0	1	0.00	0.00
4	Santeguli	Aghanashini	2007-2008	-	-	26.0	26.0	13	32	24	40	0.3	0.5	0.0	0.1
			2008-2009	-	-	-	-	16	28	27	33	0.3	0.5	0.0	0.1
			2009-2010	-	-	-	-	16	24	27	33	0.3	0.5	0.0	0.0
5	Haladi	Haladi	2007-2008	-	-	32.0	32.0	12	12	23	24	0.2	0.2	0.0	0.0
			2008-2009	-	-	-	-	8	16	24	52	0.2	0.7	0.0	0.0
			2009-2010	-	-	-	-	8	24	26	42	0.3	0.4	0.0	0.0
6	Aversha	Sita	2007-2008	-	-	-	-	20	20	26	26	0.3	0.3	0.0	0.0
			2008-2009	-	-	-	-	12	20	27	33	0.3	0.4	0.0	0.0
			2009-2010	-	-	-	-	8	12	28	41	0.3	0.4	0.0	0.0
7	Yennehole	Yennehole	2007-2008	-	-	34.0	34.0	8	24	24	48	0.3	0.5	0.0	0.0
			2008-2009	-	-	-	-	12	16	28	34	0.3	0.4	0.0	0.0
			2009-2010	-	-	-	-	8	16	30	41	0.3	0.4	0.0	0.0
8	Addoor	Gurpur	2007-2008	-	-	-	-	12	16	26	32	0.3	0.4	0.0	0.0
			2008-2009	-	-	-	-	12	20	28	35	0.3	0.4	0.0	0.0
			2009-2010	-	-	-	-	12	16	26	35	0.3	0.4	0.0	0.0
9	Bantwal	Nethravathi	2007-2008	<----------Site is not available---------->											
			2008-2009	-	-	-	-	12	20	22	40	0.3	0.5	0.0	0.0
			2009-2010	-	-	-	-	12	20	28	31	0.3	0.4	0.0	0.0

Contd/…

10	Erinjipuzha	Payaswani	2007-2008	-	-		42.0	42.0	18	31	19	36	0.2	0.6	0.0	0.0
			2008-2009	-	-	-		-	18	27	25	31	0	0	0.00	0.05
			2009-2010	-	-	-		-	12	22	27	36	0	0	0.00	0.00
11	Perumannu	Valapatanam	2007-2008	-	-		51.0	51.0	22	27	19	32	0.2	0.5	0.0	0.0
			2008-2009	-	-	-		-	12	22	28	33	0	0	0.00	0.04
			2009-2010	-	-	-		-	14	20	28	33	0	0	0.00	0.04
12	Kuttyadi	Kuttyadi	2007-2008	<----------Site is not available---------->												
			2008-2009	-	-	-		-	10	14	29	35	0	0	0.00	0.00
			2009-2010	-	-	-		-	8	12	32	41	0	0	0.00	0.00
13	Kuniyil	Chaliyar	2007-2008	-	-	-		-	29	61	20	26	0.3	0.4	0.0	0.0
			2008-2009	-	-	-		-	22	22	23	32	0	0	0.00	0.02
			2009-2010	-	-	-		-	18	26	26	36	0	1	0.00	0.00
14	Karathodu	Kadalundi	2007-2008	<----------Site is not available---------->												
			2008-2009	-	-	-		-	18	32	30	31	0	1	0.00	0.00
			2009-2010	-	-	-		-	16	20	35	40	0	1	0.00	0.00
15	Kumbidi	Bharathapuzha	2007-2008	-	-		30.0	30.0	41	78	25	32	0.5	0.8	0.0	0.0
			2008-2009	-	-	-		-	29	123	29	32	0	1	0.00	0.00
			2009-2010	-	-	-		-	20	69	29	38	0	1	0.00	0.06

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

IX Basin : West Flowing Rivers

Sl. No.	Site Name	Name of the River/Stream	Years	Mercury (ppm)		Zinc (ppm)		Total Hardness		Sodium % (Na%)		SAR		RSC	
								Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(77)	(78)	(79)	(80)	(81)	(82)	(83)	(84)	(85)	(86)	(87)	(88)
16	Pulamanthole	Pulanthodu	2007-2008	<----------Site is not available---------->											
			2008-2009	-	-	-	-	14	26	29	35	0	1	0.00	0.00
			2009-2010	-	-	-	-	14	20	32	42	0	1	0.00	0.08
17	Mankara	Bharathapuzha	2007-2008	<----------Site is not available---------->											
			2008-2009	-	-	-	-	93	183	20	29	1	1	0.00	0.00
			2009-2010	-	-	-	-	42	149	26	34	1	1	0.00	0.07
18	Pudur	Kannadipuzha	2007-2008	<----------Site is not available---------->											
			2008-2009	-	-	-	-	133	186	22	27	1	1	0.00	0.00
			2009-2010	-	-	-	-	103	159	20	25	1	1	0.00	0.07
19	Ambaramplayam	Bharathapuzha	2007-2008	-	-	7.0	7.0	36	141	22	35	0.4	1.2	0.0	0.7
			2008-2009	-	-	-	-	36	167	18	43	0.3	1.1	0.0	0.6
			2009-2010	-	-	-	-	56	185	15	44	0.3	1.8	0.0	0.3
20	Arangaly	Chalakudy	2007-2008	-	-	-	-	16	24	20	32	0.2	0.5	0.0	0.0
			2008-2009	-	-	-	-	14	20	29	30	0	0	0.00	0.00
			2009-2010	-	-	-	-	14	16	28	32	0	0	0.00	0.00
21	Neeleshwaram	Periyar	2007-2008	-	-	16.0	16.0	14	20	19	35	0.2	0.5	0.0	0.0
			2008-2009	-	-	-	-	14	22	25	38	0	1	0.00	0.00
			2009-2010	-	-	-	-	10	16	27	42	0	1	0.00	0.00
22	Vandiperiyar	Periyar	2007-2008	-	-	19.0	19.0	20	35	25	35	0.4	0.7	0.0	0.0
			2008-2009	-	-	-	-	14	24	32	34	0	1	0.00	0.00
			2009-2010	-	-	-	-	12	30	35	38	0	1	0.00	0.00
23	Ramangalam	Muvattupuzha	2007-2008	-	-	20.0	20.0	18	20	24	33	0.3	0.5	0.0	0.0
			2008-2009	-	-	-	-	14	20	29	33	0	0	0.00	0.00
			2009-2010	-	-	-	-	14	18	2.9	3.6	0	0	0.00	0.03
24	Kalampur	Kaliyar	2007-2008	<----------Site is not available---------->											
			2008-2009	-	-	-	-	12	14	33	43	0	1	0.00	0.00
			2009-2010	-	-	-	-	12	22	27	39	0	0	0.00	0.00
25	Kidangoor	Meenachil	2007-2008	-	-	34.0	34.0	16	18	23	33	0.3	0.4	0.0	0.0
			2008-2009	-	-	-	-	12	16	31	39	0	1	0.00	0.00
			2009-2010	-	-	-	-	8	12	35	46	0	1	0.00	0.02

Contd/…

26	Kalloopara	Manimala	2007-2008	-	-		23.0	23.0	16	18	31	33	0.4	0.4	0.0	0.0
			2008-2009	-	-	-		-	12	16	29	42	0	0	0.00	0.00
			2009-2010	-	-	-		-	8	12	37	45	0	1	0.00	0.02
27	Malakkara	Pamba	2007-2008	-	-		48.0	48.0	14	18	25	36	0.3	0.5	0.0	0.0
			2008-2009	-	-	-		-	10	16	29	36	0	0	0.00	0.00
			2009-2010	-	-	-		-	10	12	32	35	0	0	0.00	0.00
28	Thumpamon	Achankovil	2007-2008	<----------Site is not available---------->												
			2008-2009	-	-	-		-	16	18	33	38	0	1	0.00	0.00
			2009-2010	-	-	-		-	12	14	40	45	1	1	0.00	0.02
29	Pattazhy	Kallada	2007-2008	<----------Site is not available---------->												
			2008-2009	-	-	-		-	14	22	29	38	0	1	0.00	0.00
			2009-2010	-	-	-		-	10	16	24	43	0	1	0.00	0.00
30	Ayilam	Vamanapuram	2007-2008	<----------Site is not available---------->												
			2008-2009	-	-	-		-	14	16	37	43	1	1	0.00	0.00
			2009-2010	-	-	-		-	10	12	43	52	1	1	0.00	0.04

Source: Water Quality Year Book for the period of 2007-2008 to 2009-2010.

Note : 1. All the ionic concentrations are expressed in mg./lit. unless mentioned otherwise.

2. (-) indicate that analyis of a particular parameter has not been carried out.

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

X Basin : Tapi

Sl. No.	Site Name	Name of the River/ Stream	Years	Q (Cumecs)		Temperature °C		pH_GEN		Sp.Conductance		Potassium (K)		Sodium (Na)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
1	Burhanpur	Tapi	2007-2008	0.000	32686	18.0	29.0	7.1	8.8	-	-	0.1	26.8	12.9	62.9
			2008-2009	0.000	3797	17.0	28.0	5.8	8.5	-	-	0.1	4.8	6.1	92.0
			2009-2010	0.000	2810	20.0	30.0	6.3	8.8	-	-	2.1	15.2	15.5	98.5
2	Gopalkheda	Purna	2007-2008	0.020	3608	18.0	29.0	7.7	8.7	-	-	2.2	9.8	41.9	128.8
			2008-2009	0.109	256.5	12.0	28.0	5.9	8.3	-	-	1.2	8.5	31.6	286.0
			2009-2010	0.000	286.4	14.0	29.0	6.7	9.2	-	-	3.0	9.5	55.0	170.0
3	Sarangkheda	Tapi	2007-2008	0.000	11827	17.0	27.0	8.1	8.6	-	-	3.3	7.9	29.1	44.0
			2008-2009	47.30	3406	25.0	27.0	7.6	8.4	-	-	0.6	0.8	17.6	42.5
			2009-2010	0.000	3942	25.0	26.0	7.6	7.7	-	-	2.7	4.7	31.9	45.7
4	Mahuwa	Purna	2007-2008	1.116	3058	8.1	28.0	7.3	8.7	-	-	0.3	4.6	38.7	63.9
			2008-2009	0.412	1853	19.0	29.0	6.1	8.5	-	-	0.1	3.6	13.6	118.6
			2009-2010	0.000	677.2	19.0	30.0	7.7	8.6	-	-	1.2	5.5	33.3	114.4

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

X Basin : Tapi

Sl. No.	Site Name	Name of the River/ Stream	Years	Calcium (Ca)		Magnesium (Mg)		Aluminium		Iron (Fe)		Ammonia (NH3-N)		Carbonate (CO3)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)	(25)	(26)	(27)	(28)
1	Burhanpur	Tapi	2007-2008	26	35	5.0	11.7	0.02	0.18	-	-	0.05	0.19	0.0	6.0
			2008-2009	32	37	5.8	11.7	0.06	0.16	-	-	0.05	0.24	0.0	6.0
			2009-2010	32	35	6.8	11.7	0.02	0.16	-	-	0.05	0.24	0.0	6.0
2	Gopalkheda	Purna	2007-2008	31	38	5.8	10.0	0.0	0.12	-	-	0.05	0.08	0.0	6.0
			2008-2009	32	40	5.8	12.7	0.04	0.16	-	-	0.08	0.20	0.0	0.0
			2009-2010	32	36	6.8	12.6	0.01	0.12	-	-	0.05	0.26	0.0	6.0
3	Sarangkheda	Tapi	2007-2008	32	32	5.8	7.8	0.08	0.12	-	-	0.07	0.08	0.0	6.0
			2008-2009	32	32	5.8	7.8	0.04	0.06	-	-	0.07	0.10	0.0	6.0
			2009-2010	32	32	6.8	9.7	0.06	0.06	-	-	0.08	0.08	0.0	0.0
4	Mahuwa	Purna	2007-2008	32	35	6.8	9.7	0.02	0.06	-	-	0.05	0.13	0.0	12.0
			2008-2009	32	34	5.8	8.7	0.02	0.08	-	-	0.05	0.18	0.0	6.0
			2009-2010	32	34	6.8	8.7	0.02	0.12	-	-	0.05	0.08	0.0	12.0

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

X Basin : Tapi

Sl. No.	Site Name	Name of the River/ Stream	Years	Bicarbonate (HCO3)		Chloride (CL)		Fluoride (F)		Sulphate (SO4)		Sulphite		Nitrate (NO3-N)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	29	(30)	(31)	(32)	(33)	(34)	(35)	(36)	(37)	(38)	(39)	(40)
1	Burhanpur	Tapi	2007-2008	104	183	16.6	84.9	0.05	0.32	1.0	14.4	-	-	0.03	0.60
			2008-2009	98	162	10.5	158.4	0.05	0.36	4.4	22.5	-	-	0.09	0.40
			2009-2010	110	195	26.7	141.0	0.08	0.36	13.3	22.5	-	-	0.08	0.40
2	Gopalkheda	Purna	2007-2008	134	212	62.5	167.0	0.05	0.32	2.1	35.0	-	-	0.05	0.18
			2008-2009	110	232	54.5	460.0	0.08	0.38	7.7	64.0	-	-	0.13	0.50
			2009-2010	61	134	84.7	277.3	0.08	0.28	13.5	28.8	-	-	0.15	0.40
3	Sarangkheda	Tapi	2007-2008	122	134	43.6	70.4	0.08	0.13	1.0	7.2	-	-	0.10	0.15
			2008-2009	85	110	30.5	73.4	0.07	0.16	8.5	16.9	-	-	0.04	0.20
			2009-2010	98	134	55.1	63.1	0.12	0.18	13.4	13.4	-	-	0.10	0.10
4	Mahuwa	Purna	2007-2008	122	168	62.7	86.0	0.05	0.15	1.0	10.1	-	-	0.03	0.26
			2008-2009	98	195	23.4	184.0	0.05	0.22	1.2	16.3	-	-	0.03	0.18
			2009-2010	98	146	46.2	169.9	0.08	0.22	12.1	17.9	-	-	0.08	0.18

Contd/…

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

X Basin : Tapi

Sl. No.	Site Name	Name of the River/ Stream	Years	Nitrite (NO2-N)		Phosphate		Silica (SiO2)		DO		BOD3-27		Total Coliform (no.per 10 ml)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(41)	(42)	(43)	(44)	(45)	(46)	(47)	(48)	(49)	(50)	(51)	(52)
1	Burhanpur	Tapi	2007-2008	0.00	0.06	-	-	18.4	28.4	-	-	0.2	13.0	-	-
			2008-2009	0.00	0.06	-	-	18.5	28.4	-	-	0.2	2.7	-	-
			2009-2010	0.00	0.08	-	-	13.2	28.4	2.3	10.2	0.2	3.7	-	-
2	Gopalkheda	Purna	2007-2008	0.00	0.05	-	-	22.3	28.4	-	-	0.2	7.0	-	-
			2008-2009	0.00	0.07	-	-	22.4	28.7	7.6	7.7	0.3	26.0	-	-
			2009-2010	0.04	0.06	-	-	14.1	25.8	5.6	7.7	0.2	19.0	-	-
3	Sarangkheda	Tapi	2007-2008	0.02	0.06	-	-	24.3	24.4	1.6	5.5	0.3	1.6	-	-
			2008-2009	0.00	0.05	-	-	18.2	24.5	6.3	7.0	0.7	1.7	-	-
			2009-2010	0.02	0.06	-	-	19.4	24.4	-	-	0.3	4.5	-	-
4	Mahuwa	Purna	2007-2008	0.00	0.06	-	-	16.9	24.8	5.5	7.8	0.4	2.1	-	-
			2008-2009	0.00	0.06	-	-	14.9	24.3	4.3	9.7	0.2	1.0	-	-
			2009-2010	0.02	0.04	-	-	12.8	20.3	4.2	10.3	0.2	1.9	-	-

Contd/…

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

X Basin : Tapi

Sl. No.	Site Name	Name of the River/ Stream	Years	Faecal Coliform (no.per 10 ml)		Total plate count (no.per 10 ml)		Phytoplankton (no.per ml)		Zooplankton (no.per litre)		Arsenic (ppm)		Boron (ppm)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(53)	(54)	(55)	(56)	(57)	(58)	(59)	(60)	(61)	(62)	(63)	(64)
1	Burhanpur	Tapi	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
2	Gopalkheda	Purna	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
3	Sarangkheda	Tapi	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
4	Mahuwa	Purna	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/…

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

X Basin : Tapi

Sl. No.	Site Name	Name of the River/ Stream	Years	Cadmium (ppm)		Chromium (ppm)		Copper (ppm)		Cyanide (ppm)		Lead (ppm)		Manganese (ppm)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(65)	(66)	(67)	(68)	(69)	(70)	(71)	(72)	(73)	(74)	(75)	(76)
1	Burhanpur	Tapi	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
2	Gopalkheda	Purna	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
3	Sarangkheda	Tapi	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
4	Mahuwa	Purna	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/…

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

X Basin : Tapi

Sl. No.	Site Name	Name of the River/ Stream	Years	Mercury (ppm)		Zinc (ppm)		Total Hardness		Sodium % (Na%)		SAR		RSC	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(77)	(78)	(79)	(80)	(81)	(82)	(83)	(84)	(85)	(86)	(87)	(88)
1	Burhanpur	Tapi	2007-2008	-	-	-	-	86	132	24	56	0.6	2.6	0.0	0.6
			2008-2009	-	-	-	-	106	137	11	60	0.3	3.5	0.0	0.2
			2009-2010	-	-	-	-	108	137	22	62	0.6	4.0	0.0	0.6
2	Gopalkheda	Purna	2007-2008	-	-	-	-	100	137	46	69	1.8	5.0	0.0	1.0
			2008-2009	-	-	-	-	108	153	38	83	1.3	11.1	0.0	1.2
			2009-2010	-	-	-	-	108	142	46	75	2.1	6.7	0.0	0.0
3	Sarangkheda	Tapi	2007-2008	-	-	-	-	104	113	35	47	1.2	1.9	0.0	0.2
			2008-2009	-	-	-	-	104	113	25	47	0.7	1.8	0.0	0.0
			2009-2010	-	-	-	-	108	121	38	45	1.3	1.8	0.0	0.0
4	Mahuwa	Purna	2007-2008	-	-	-	-	108	124	40	52	1.5	2.5	0.0	0.3
			2008-2009	-	-	-	-	104	120	21	68	0.6	4.8	0.0	0.8
			2009-2010	-	-	-	-	108	120	40	67	1.4	4.6	0.0	0.0

Source: Water Quality Data Year Book (2007-2008 to 2009-2010) Tapi Basin.

Note : 1. All the ionic concentrations are expressed in mg./lit. unless mentioned otherwise.

2. (-) indicate that analyis of a particular parameter has not been carried out.

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

XI Basin : Narmada

Sl. No.	Site Name	Name of the River/ Stream	Years	Q (Cumecs)		Temperature °C		pH_GEN		Sp.Conductance		Potassium (K)		Sodium (Na)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
1	Chandwada	Orsang	2007-2008	0.00	4086	24.0	26.0	8.4	8.4	-	-	8.6	24.6	26.6	40.8
			2008-2009	-	-	26.0	26.0	8.0	8.6	-	-	0.7	1.2	35.2	40.1
			2009-2010	-	-	26.0	28.0	7.5	8.2	-	-	3.5	4.6	51.4	76.6
2	Garudeshwar	Narmada	2007-2008	-	-	17.0	30.0	7.4	8.9	-	-	0.4	30.6	8.5	41.1
			2008-2009	-	-	20.0	27.0	5.4	8.5	-	-	5.8	7.8	6.0	115.1
			2009-2010	-	-	18.0	27.0	7.4	9.3	-	-	1.2	35.8	22.8	109.2
3	Rajghat	Narmada	2007-2008	52.97	900.0	-	-	8.3	8.3	-	-	1.2	1.2	15.3	15.3
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	Pati	Goi	2007-2008	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2008-2009	-	-	-	-	8.0	8.5	-	-	0.4	2.8	12.0	26.0
			2009-2010	-	-	20.0	28.5	8.0	8.4	-	-	0.7	3.1	8.6	20.1
5	Dhulsar	Uri	2007-2008	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2008-2009	0.190	16.15	-	-	7.8	8.3	-	-	0.2	3.7	6.9	26.2
			2009-2010	-	-	22.0	28.0	7.9	9.1	-	-	1.2	4.7	13.8	21.9
6	Mandleshwar	Narmada	2007-2008	69.90	10692	19.0	31.0	8.0	8.5	-	-	0.9	6.9	6.3	10.9
			2008-2009	149.8	1650	12.0	30.0	8.0	8.4	-	-	1.4	3.3	5.3	14.5
			2009-2010	82.57	15828	21.0	31.0	7.9	8.4	-	-	1.3	2.4	6.4	13.2
7	Kogaon	Kundi	2007-2008	0.000	1150	20.0	30.0	8.3	8.6	-	-	1.3	5.0	3.8	99.9
			2008-2009	-	-	27.5	29.5	7.9	8.1	-	-	1.4	6.6	10.9	58.8
			2009-2010	-	-	20.0	29.0	8.0	8.5	-	-	1.5	5.5	9.0	22.6
8	Mortakka	Narmada	2007-2008	13.94	800.0	26.0	27.5	7.6	8.4	-	-	1.1	10.6	7.8	11.2
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
9	Handia	Narmada	2007-2008	63.04	10884	17.0	30.5	7.6	8.5	-	-	0.7	6.8	6.7	87.8
			2008-2009	95.94	4570	18.5	31.5	7.5	8..6	-	-	1.2	5.1	6.9	16.3
			2009-2010	100.5	20786	16.0	29.5	8.0	8.6	-	-	1.1	4.6	4.5	20.0

Contd/…

10	**Chhidgaon**	**Ganjal**	**2007-2008**	**0.328**	**9500**	**13.0**	**30.0**	**8.0**	**8.5**	**-**	**-**	**0.6**	**6.2**	**5.0**	**48.8**
			2008-2009	**0.000**	**810.9**	**14.0**	**31.0**	**7.6**	**8.9**	**-**	**-**	**1.0**	**4.9**	**5.4**	**51.4**
			2009-2010	**-**	**-**	**15.0**	**31.5**	**7.9**	**8.5**	**-**	**-**	**1.1**	**3.2**	**10.0**	**31.3**
11	**Hoshangabad**	**Narmada**	**2007-2008**	**37.54**	**9373**	**13.0**	**28.0**	**7.8**	**8.4**	**-**	**-**	**0.7**	**5.7**	**5.7**	**15.5**
			2008-2009	**60.00**	**6240**	**16.0**	**28.0**	**7.7**	**8.4**	**-**	**-**	**1.0**	**5.3**	**7.0**	**26.3**
			2009-2010	**48.93**	**20984**	**16.0**	**28.0**	**7.8**	**8.4**	**-**	**-**	**1.2**	**3.5**	**8.3**	**18.7**
12	**Sandia**	**Narmada**	**2007-2008**	**34.29**	**3900**	**13.0**	**32.0**	**7.6**	**8.4**	**-**	**-**	**0.8**	**6.1**	**4.2**	**14.5**
			2008-2009	**67.00**	**6200**	**18.0**	**31.0**	**7.7**	**8.5**	**-**	**-**	**1.0**	**5.8**	**5.4**	**17.8**
			2009-2010	**47.75**	**25288**	**14.0**	**31.0**	**7.9**	**8.5**	**-**	**-**	**1.2**	**3.9**	**7.9**	**14.6**

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

XI Basin : Narmada

Sl. No.	Site Name	Name of the River/ Stream	Years	Q (Cumecs)		Temperature °C		pH_GEN		Sp.Conductance		Potassium (K)		Sodium (Na)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
13	Gadarwara	Shakker	2007-2008	0.000	3280	14.0	25.0	7.7	8.7	-	-	0.6	4.5	3.4	18.1
			2008-2009	0.000	227.7	18.5	27.5	7.6	8.5	-	-	0.2	5.3	5.6	17.8
			2009-2010	0.00	3279	17.0	24.0	7.9	8.4	-	-	0.5	2.6	7.7	16.9
14	Barmanghat	Narmada	2007-2008	30.89	817.7	20.0	30.0	-	-	-	-	0.7	4.4	4.6	9.2
			2008-2009	-	-	20.0	29.5	7.6	8.3	-	-	0.9	4.7	4.7	9.5
			2009-2010	25.54	7728	19.5	31.0	7.9	8.4	-	-	0.1	3.5	4.4	13.2
15	Belkheri	Sher	2007-2008	0.130	222.1	17.0	30.0	7.7	8.5	-	-	0.3	4.8	4.3	19.2
			2008-2009	0.130	232.9	20.0	29.0	7.5	8.4	-	-	0.7	4.5	3.4	21.0
			2009-2010	-	-	19.0	28.0	7.6	8.4	-	-	0.9	2.3	3.3	20.1
16	Patan	Hiran	2007-2008	-	-	14.0	31.8	-	-	-	-	1.8	12.8	12.9	54.8
			2008-2009	0.000	904.5	19.0	28.5	7.3	8.7	-	-	2.5	6.3	5.5	79.3
			2009-2010	-	-	19.5	30.0	6.6	8.7	-	-	2.6	7.2	9.3	65.6
17	Bamni	Banjar	2007-2008	0.000	391.5	28.5	28.5	7.8	7.8	-	-	6.8	6.8	6.3	6.3
			2008-2009	0.000	406.0	18.0	29.0	7.1	8.4	-	-	1.4	6.4	2.6	16.4
			2009-2010	0.00	489	16.0	28.0	7.2	8.2	-	-	1.6	2.8	5.2	10.2
18	Mohgaon	Burhner	2007-2008	0.000	1085	16.0	30.0	7.6	8.4	-	-	0.5	5.2	3.1	15.1
			2008-2009	0.000	939.8	16.5	28.5	7.4	8.4	-	-	0.9	3.9	3.1	17.9
			2009-2010	0.00	364	15.0	30.0	7.3	8.4	-	-	1.3	4.1	7.1	19.7
19	Manot	Narmada	2007-2008	0.277	970.7	17.5	34.0	7.7	8.3	-	-	0.1	4.2	3.7	13.5
			2008-2009	0.210	1265	18.5	29.5	7.4	8.4	-	-	0.6	4.2	3.3	16.4
			2009-2010	0.00	1069	16.5	30.0	8.3	8.3	-	-	0.6	2.9	3.8	16.5
20	Dindori	Narmada	2007-2008	0.663	288.4	14.0	30.0	7.8	8.6	-	-	0.6	6.0	3.9	12.6
			2008-2009	-	-	15.5	29.5	7.6	8.3	-	-	0.8	5.7	4.7	18.0
			2009-2010	-	-	15.5	28.0	7.7	8.1	-	-	1.2	6.0	7.7	16.0

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

XI Basin : Narmada

Sl. No.	Site Name	Name of the River/ Stream	Years	Calcium (Ca)		Magnesium (Mg)		Aluminium		Iron (Fe)		Ammonia (NH3-N)		Carbonate (CO3)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)	(25)	(26)	(27)	(28)
1	Chandwada	Orsang	2007-2008	32	37	5.8	9.7	-	-	-	-	0.05	0.06	10.0	10.0
			2008-2009	32	34	6.8	9.7	-	-	-	-	0.09	0.10	0.0	20.0
			2009-2010	32	32	5.8	7.8	-	-	-	-	0.1	0.1	0.0	0.0
2	Garudeshwar	Narmada	2007-2008	31	32	5.8	7.8	-	-	-	-	0.05	0.07	0.0	10.0
			2008-2009	30	32	5.8	7.8	-	-	-	-	0.05	0.14	0.0	10.0
-	-	-	2009-2010	31	34	6.8	8.7	-	-	-	-	0.1	0.1	0.0	6.0
3	Rajghat	Narmada	2007-2008	27	27	15.1	15.1	-	-	-	-	-	-	12.3	12.3
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	Pati	Goi	2007-2008	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2008-2009	23	41	10.4	19.7	-	-	-	-	-	-	0.0	12.7
			2009-2010	26	39	11.4	19.0	-	-	-	-	-	-	0.0	14.2
5	Dhulsar	Uri	2007-2008	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2008-2009	24	25	14.6	19.0			-	-	-	-	0.0	10.1
			2009-2010	24	33	6.8	19.0	-	-	-	-	-	-	0.0	17.8
6	Mandleshwar	Narmada	2007-2008	23	34	1.9	15.3	-	-	-	-	-	-	0.0	15.4
			2008-2009	23	30	6.8	10.7	-	-	-	-	-	-	0.0	11.5
			2009-2010	23	31	5.6	13.1	-	-	-	-	-	-	0.0	10.7
7	Kogaon	Kundi	2007-2008	21	39	8.3	37.2	-	-	-	-	-	-	6.2	70.5
			2008-2009	24	34	9.5	23.3	-	-	-	-	-	-	0.0	0.0
			2009-2010	20	47	2.4	44.7	-	-	-	-	-	-	0.0	21.3
8	Mortakka	Narmada	2007-2008	26	37	3.4	20.1	-	-	-	-	-	-	0.0	15.4
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
9	Handia	Narmada	2007-2008	20	38	3.5	107.0	-	-	-	-	-	-	0.0	21.5
			2008-2009	22	33	7.5	15.1	-	-	-	-	-	-	0.0	20.3
			2009-2010	16	38	2.9	17.7	-	-	-	-	-	-	0.0	24.9

Contd/…

10	**Chhidgaon**	**Ganjal**	**2007-2008**	**21**	**46**	**3.4**	**23.8**	**-**	**-**	**-**	**-**	**-**	**-**	**0.0**	**63.4**
			2008-2009	**16**	**48**	**6.6**	**22.8**	**-**	**-**	**-**	**-**	**-**	**-**	**0.0**	**25.9**
			2009-2010	**23**	**40**	**10.0**	**23.8**	**-**	**-**	**-**	**-**	**-**	**-**	**0.0**	**60.6**
11	**Hoshangabad**	**Narmada**	**2007-2008**	**19**	**36**	**3.9**	**17.5**	**-**	**-**	**-**	**-**	**-**	**-**	**0.0**	**15.4**
			2008-2009	**24**	**39**	**4.9**	**17.0**	**-**	**-**	**-**	**-**	**-**	**-**	**0.0**	**20.2**
			2009-2010	**27**	**44**	**1.0**	**19.0**	**-**	**-**	**-**	**-**	**-**	**-**	**0.0**	**14.3**
12	**Sandia**	**Narmada**	**2007-2008**	**21**	**37**	**3.9**	**14.3**	**-**	**-**	**-**	**-**	**-**	**-**	**0.0**	**20.2**
			2008-2009	**21**	**42**	**4.4**	**14.3**	**-**	**-**	**-**	**-**	**-**	**-**	**0.0**	**11.5**
			2009-2010	**24**	**38**	**3.7**	**17.3**	**-**	**-**	**-**	**-**	**-**	**-**	**0.0**	**17.8**

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

XI Basin : Narmada

Sl. No.	Site Name	Name of the River/ Stream	Years	Calcium (Ca)		Magnesium (Mg)		Aluminium		Iron (Fe)		Ammonia (NH3-N)		Carbonate (CO3)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)	(25)	(26)	(27)	(28)
13	Gadarwara	Shakker	2007-2008	21	47	3.5	25.0	-	-	-	-	-	-	0.0	24.6
			2008-2009	22	38	6.8	31.4	-	-	-	-	-	-	0.0	12.7
			2009-2010	28	44	9.7	26.0	-	-	-	-	-	-	0.0	14.2
14	Barmanghat	Narmada	2007-2008	18	32	3.8	23.1	-	-	-	-	-	-	0.0	15.4
			2008-2009	20	31	4.6	17.3	-	-	-	-	-	-	0.0	14.4
			2009-2010	22	42	8.8	15.1	-	-	-	-	-	-	0.0	14.2
15	Belkheri	Sher	2007-2008	19	46	2.6	29.9	-	-	-	-	-	-	0.0	33.8
			2008-2009	17	53	3.9	33.5	-	-	-	-	-	-	0.0	23.0
			2009-2010	18	42	5.4	32.3	-	-	-	-	-	-	0.0	46.3
16	Patan	Hiran	2007-2008	21	50	8.9	28.2	-	-	-	-	-	-	0.0	30.8
			2008-2009	21	53	4.4	26.5	-	-	-	-	-	-	0.0	20.4
			2009-2010	20	60	6.3	33.3	-	-	-	-	-	-	0.0	60.6
17	Bamni	Banjar	2007-2008	18	18	3.4	3.4	-	-	-	-	-	-	0.0	0.0
			2008-2009	8	14	1.2	15.3	-	-	-	-	-	-	0.0	15.2
			2009-2010	8	22	3.7	9.7	-	-	-	-	-	-	0.0	0.0
18	Mohgaon	Burhner	2007-2008	17	33	2.9	14.1	-	-	-	-	-	-	0.0	36.9
			2008-2009	10	31	3.6	17.3	-	-	-	-	-	-	0.0	17.3
			2009-2010	14	27	6.8	18.5	-	-	-	-	-	-	0.0	21.4
19	Manot	Narmada	2007-2008	17	35	4.4	21.1	-	-	-	-	-	-	0.0	28.8
			2008-2009	11	33	3.9	53.8	-	-	-	-	-	-	0.0	17.3
			2009-2010	20	32	2.7	19.7	-	-	-	-	-	-	0.0	14.2
20	Dindori	Narmada	2007-2008	19	33	4.4	21.1	-	-	-	-	-	-	0.0	17.3
			2008-2009	20	34	6.6	18.5	-	-	-	-	-	-	0.0	10.2
			2009-2010	21	40	1.9	21.1	-	-	-	-	-	-	0.0	0.0

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

XI Basin : Narmada

Sl. No.	Site Name	Name of the River/ Stream	Years	Bicarbonate (HCO3)		Chloride (CL)		Fluoride (F)		Sulphate (SO4)		Sulphite		Nitrate (NO3-N)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(29)	(30)	(31)	(32)	(33)	(34)	(35)	(36)	(37)	(38)	(39)	(40)
1	Chandwada	Orsang	2007-2008	160	340	30.8	122.5	0.05	0.05	1.0	5.4	-	-	0.04	0.05
			2008-2009	70	110	39.6	54.2	0.06	0.07	8.7	10.0	-	-	0.09	0.11
			2009-2010	98	134	88.8	106.2	0.05	0.20	12.1	13.5	-	-	0.03	0.04
2	Garudeshwar	Narmada	2007-2008	80	190	4.1	65.6	0.05	0.50	1.5	11.9	-	-	0.04	0.14
			2008-2009	80	180	10.4	177.2	0.05	0.16	1.9	16.3	-	-	0.04	0.20
			2009-2010	98	146	31.6	155.3	0.06	0.44	10.3	16.7	-	-	0.03	0.10
3	Rajghat	Narmada	2007-2008	219	219	22.0	22.0	0.19	0.19	1.3	1.3	-	-	0.23	0.23
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	Pati	Goi	2007-2008	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2008-2009	139	365	7.6	26.5	0.29	0.72	6.0	36.4	-	-	0.17	5.36
			2009-2010	136	245	20.1	24.6	0.22	0.59	9.00	10.40	-	-	0.34	4.00
5	Dhulsar	Uri	2007-2008	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2008-2009	201	203	21.4	22.2	0.51	0.83	10.4	17.7	-	-	0.50	3.10
			2009-2010	134	190	14.6	19.1	0.21	0.54	8.9	12.2	-	-	0.40	3.02
6	Mandleshwar	Narmada	2007-2008	135	288	6.3	18.0	0.06	1.00	3.2	18.5	-	-	0.04	5.00
			2008-2009	134	209	7.1	11.7	0.10	0.62	1.0	19.0	-	-	0.01	1.99
			2009-2010	113	304	6.8	11.7	0.14	0.42	4.8	12.1	-	-	0.01	2.60
7	Kogaon	Kundi	2007-2008	213	504	9.0	84.3	0.20	0.80	10.0	23.7	-	-	0.30	7.20
			2008-2009	147	252	9.0	53.0	0.51	0.86	12.1	23.6	-	-	3.20	4.20
			2009-2010	138	523	7.8	66.2	0.10	0.60	10.1	12.3	-	-	0.31	3.90
8	Mortakka	Narmada	2007-2008	156	325	7.1	19.0	0.25	1.30	1.6	18.5	-	-	0.40	4.80
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
9	Handia	Narmada	2007-2008	103	357	5.0	20.0	0.19	0.78	2.2	19.4	-	-	0.02	4.20
			2008-2009	119	264	5.1	15.0	0.11	0.79	1.0	37.2	-	-	0.01	3.20
			2009-2010	84	390	5.2	13.6	0.09	0.45	4.8	13.0	-	-	0.01	1.14

Contd/…

10	**Chhidgaon**	**Ganjal**	**2007-2008**	**61**	**394**	**9.0**	**22.0**	**0.08**	**0.50**	**2.5**	**16.5**	**-**	**-**	**0.01**	**4.80**
			2008-2009	**95**	**375**	**4.8**	**19.3**	**0.07**	**1.10**	**6.0**	**11.9**	**-**	**-**	**0.01**	**3.20**
			2009-2010	**107**	**475**	**6.8**	**17.9**	**0.10**	**0.45**	**5.8**	**13.2**	**-**	**-**	**0.01**	**1.15**
11	**Hoshangabad**	**Narmada**	**2007-2008**	**132**	**441**	**5.4**	**20.0**	**0.11**	**2.00**	**2.5**	**14.8**	**-**	**-**	**0.01**	**5.00**
			2008-2009	**124**	**297**	**3.9**	**12.6**	**0.17**	**0.80**	**1.0**	**15.5**	**-**	**-**	**0.01**	**3.32**
			2009-2010	**138**	**312**	**7.3**	**14.3**	**0.05**	**0.43**	**3.8**	**8.5**	**-**	**-**	**0.01**	**0.95**
12	**Sandia**	**Narmada**	**2007-2008**	**126**	**319**	**4.8**	**16.0**	**0.20**	**1.00**	**1.0**	**10.0**	**-**	**-**	**0.02**	**4.40**
			2008-2009	**116**	**243**	**3.9**	**11.6**	**0.17**	**0.80**	**1.0**	**14.5**	**-**	**-**	**0.06**	**3.80**
			2009-2010	**130**	**283**	**6.3**	**10.4**	**0.05**	**0.41**	**3.8**	**8.9**	**-**	**-**	**0.01**	**1.30**

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

XI Basin : Narmada

Sl. No.	Site Name	Name of the River/ Stream	Years	Bicarbonate (HCO3)		Chloride (CL)		Fluoride (F)		Sulphate (SO4)		Sulphite		Nitrate (NO3-N)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(29)	(30)	(31)	(32)	(33)	(34)	(35)	(36)	(37)	(38)	(39)	(40)
13	Gadarwara	Shakker	2007-2008	0.6	4.5	5.0	17.3	0.05	0.90	2.5	10.0	-	-	0.09	6.60
			2008-2009	131	274	6.8	13.2	0.14	0.66	4.0	16.2	-	-	0.01	3.00
			2009-2010	156	254	7.0	20.6	0.16	0.40	6.1	9.6	-	-	0.30	2.10
14	Barmanghat	Narmada	2007-2008	138	316	1.0	18.0	0.05	1.00	1.3	10.0	-	-	0.05	4.30
			2008-2009	113	261	4.9	12.5	0.09	0.71	1.0	12.8	-	-	0.22	3.28
			2009-2010	138	260	7.2	15.4	0.18	0.59	3.8	10.0	-	-	0.01	2.00
15	Belkheri	Sher	2007-2008	118	560	4.7	17.0	0.05	0.82	1.0	14.2	-	-	0.01	3.60
			2008-2009	90	331	2.3	14.3	0.22	0.70	1.0	14.5	-	-	0.01	3.42
			2009-2010	112	540	4.6	13.8	0.22	0.49	3.8	9.4	-	-	0.01	1.20
16	Patan	Hiran	2007-2008	0	439	10.3	34.4	0.30	0.83	1.6	22.0	-	-	0.01	4.80
			2008-2009	100	310	5.0	115.8	0.20	0.76	2.8	12.0	-	-	0.10	3.30
			2009-2010	156	409	10.9	41.2	0.26	0.51	3.3	7.3	-	-	0.01	1.50
17	Bamni	Banjar	2007-2008	163	163	6.6	6.6	0.58	0.58	12.0	12.0	-	-	3.50	3.50
			2008-2009	46	253	2.2	12.6	0.29	0.74	2.2	13.8	-	-	0.24	3.30
			2009-2010	78	141	5.7	9.9	0.27	0.50	4.1	5.0	-	-	0.40	1.40
18	Mohgaon	Burhner	2007-2008	80	835	4.7	23.0	0.05	0.45	1.0	12.0	-	-	0.01	5.00
			2008-2009	54	237	2.7	16.4	0.18	0.76	1.0	22.7	-	-	0.03	3.20
			2009-2010	78	348	6.1	14.1	0.18	0.76	3.8	6.6	-	-	0.01	1.90
19	Manot	Narmada	2007-2008	116	360	5.1	20.0	0.05	0.92	1.3	14.5	-	-	0.01	3.60
			2008-2009	54	231	3.4	20.2	0.14	0.78	1.0	16.5	-	-	0.01	3.14
			2009-2010	33	391	6.9	16.3	0.12	0.49	2.3	7.1	-	-	0.01	1.10
20	Dindori	Narmada	2007-2008	106	313	6.3	21.0	0.05	0.82	1.3	40.6	-	-	0.09	5.00
			2008-2009	88	225	7.3	33.2	0.07	0.80	1.0	14.1	-	-	0.01	452.00
			2009-2010	71	370	7.6	21.6	0.08	0.77	4.3	5.9	-	-	0.01	3.70

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

XI Basin : Narmada

Sl. No.	Site Name	Name of the River/ Stream	Years	Nitrite (NO2-N)		Phosphate (PO4)		Silica (SiO2)		DO		BOD3-27		Total Coliform (no.per 10 ml)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(41)	(42)	(43)	(44)	(45)	(46)	(47)	(48)	(49)	(50)	(51)	(52)
1	Chandwada	Orsang	2007-2008	0.01	0.02	-	-	1.0	5.4	-	-	0.8	5.0	-	-
			2008-2009	0.02	0.08	0.389	0.392	20.3	22.2	-	-	0.2	0.6	-	-
			2009-2010	0.00	0.00	-	-	17.1	18.4	-	-	0.6	2.4	-	-
2	Garudeshwar	Narmada	2007-2008	0.01	0.06	-	-	15.4	22.4	-	-	0.4	1.6	-	-
			2008-2009	0.02	0.06	0.039	0.322	16.2	23.8	-	-	0.3	1.1	-	-
			2009-2010	0.00	0.00	-	-	11.3	22.8	7.3	7.3	0.2	1.3	-	-
3	Rajghat	Narmada	2007-2008	0.00	0.00	0.030	0.030	26.0	26.0	7.5	7.5	1.6	1.6	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	Pati	Goi	2007-2008	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2008-2009	0.00	0.03	0.01	0.160	24.9	44.2	-	-	-	-	-	-
			2009-2010	0.00	0.05	0.050	0.315	31.4	58.0	-	-	-	-	-	-
5	Dhulsar	Uri	2007-2008	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2008-2009	0.00	0.10	0.010	0.210	15.8	31.6	-	-	-	-	-	-
			2009-2010	0.01	0.04	0.045	0.420	33.1	84.6	-	-	-	-	-	-
6	Mandleshwar	Narmada	2007-2008	0.00	0.94	0.010	0.230	15.0	28.4	6.2	8.6	0.8	2.3	-	-
			2008-2009	0.00	0.03	0.010	0.090	17.4	36.2	4.7	7.8	0.6	2.5	-	-
			2009-2010	0.00	0.07	0.015	0.358	17.6	37.3	-	-	0.7	2.6	-	-
7	Kogaon	Kundi	2007-2008	0.01	0.76	0.010	0.400	14.2	61.5	-	-	0.7	2.5	-	-
			2008-2009	0.00	0.20	0.028	0.218	23.2	38.0	-	-	1.2	2.8	-	-
			2009-2010	0.00	0.28	0.045	0.317	18.9	51.2	-	-	0.5	2.2	-	-
8	Mortakka	Narmada	2007-2008	0.00	0.64	0.010	0.230	15.8	26.8	-	-	0.7	2.7	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
9	Handia	Narmada	2007-2008	0.00	0.60	0.010	0.230	15.8	31.9	6.0	6.3	0.6	2.0	-	-
			2008-2009	0.00	0.06	0.010	0.164	14.9	30.1	5.7	7.4	0.3	2.1	-	-
			2009-2010	0.00	0.44	0.020	0.242	22.0	58.6	-	-	0.5	1.7	-	-

Contd/…

10	**Chhidgaon**	**Ganjal**	**2007-2008**	**0.01**	**0.90**	**0.010**	**0.300**	**11.1**	**52.1**	**-**	**-**	**-**	**-**	**-**	**-**	**-**
			2008-2009	**0.00**	**0.11**	**0.010**	**0.320**	**12.8**	**58.7**	**-**	**-**	**-**	**-**	**-**	**-**	**-**
			2009-2010	**0.00**	**0.09**	**0.024**	**0.200**	**21.0**	**52.4**	**-**	**-**	**-**	**-**	**-**	**-**	**-**
11	**Hoshangabad**	**Narmada**	**2007-2008**	**0.00**	**0.64**	**0.010**	**0.300**	**13.4**	**35.9**	**6.4**	**8.4**	**0.6**	**1.7**	**-**	**-**	
			2008-2009	**0.00**	**0.08**	**0.010**	**0.138**	**17.4**	**36.1**	**5.6**	**8.4**	**0.4**	**2.5**	**-**	**-**	
			2009-2010	**0.00**	**0.16**	**0.029**	**0.241**	**15.8**	**50.0**	**-**	**-**	**0.3**	**2.4**	**-**	**-**	
12	**Sandia**	**Narmada**	**2007-2008**	**0.00**	**0.35**	**0.010**	**0.230**	**16.6**	**29.2**	**7.5**	**7.9**	**-**	**-**	**-**	**-**	
			2008-2009	**0.00**	**0.70**	**0.010**	**0.290**	**14.2**	**30.0**	**-**	**-**	**-**	**-**	**-**	**-**	
			2009-2010	**0.00**	**0.27**	**0.032**	**0.243**	**17.4**	**39.1**	**-**	**-**	**-**	**-**	**-**	**-**	

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

XI Basin : Narmada

Sl. No.	Site Name	Name of the River/ Stream	Years	Nitrite (NO2-N)		Phosphate (PO4)		Silica (SiO2)		DO		BOD3-27		Total Coliform (no.per 10 ml)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(41)	(42)	(43)	(44)	(45)	(46)	(47)	(48)	(49)	(50)	(51)	(52)
13	Gadarwara	Shakker	2007-2008	0.00	0.80	0.010	0.200	15.8	39.5	-	-	0.8	2.1	-	-
			2008-2009	0.00	0.04	0.010	0.240	14.1	27.8	7.2	8.4	0.8	3.3	-	-
			2009-2010	0.00	0.02	0.032	0.250	26.0	42.4	-	-	0.7	2.3	-	-
14	Barmanghat	Narmada	2007-2008	0.00	0.14	0.010	0.220	17.4	30.8	6.2	8.0	0.6	1.4	-	-
			2008-2009	0.00	0.55	0.010	0.114	14.7	30.3	5.5	8.3	0.7	3.0	-	-
			2009-2010	0.00	0.18	0.030	0.522	20.0	42.1	-	-	0.4	2.5	-	-
15	Belkheri	Sher	2007-2008	0.00	0.37	0.010	0.230	8.7	52.9	-	-	-	-	-	-
			2008-2009	0.00	0.41	0.010	0.120	16.6	66.6	-	-	-	-	-	-
			2009-2010	0.00	0.22	0.010	0.392	22.1	43.6	-	-	-	-	-	-
16	Patan	Hiran	2007-2008	0.00	0.20	0.020	0.460	5.2	31.5	-	-	0.6	3.0	-	-
			2008-2009	0.00	0.08	0.030	0.442	6.6	24.8	4.1	8.3	1.0	3.5	-	-
			2009-2010	0.00	0.02	0.010	0.682	12.6	30.2	-	-	0.7	2.3	-	-
17	Bamni	Banjar	2007-2008	0.86	0.86	0.290	0.290	11.8	11.8	-	-	-	-	-	-
			2008-2009	0.00	0.06	0.010	0.212	7.9	31.9	-	-	-	-	-	-
			2009-2010	0.00	0.01	0.033	0.180	15.0	22.0	-	-	-	-	-	-
18	Mohgaon	Burhner	2007-2008	0.00	0.39	0.010	0.160	18.2	39.2	-	-	-	-	-	-
			2008-2009	0.00	0.05	0.010	0.120	13.4	48.6	-	-	-	-	-	-
			2009-2010	0.00	0.03	0.010	0.256	17.4	49.3	-	-	-	-	-	-
19	Manot	Narmada	2007-2008	0.00	0.66	0.010	0.240	18.2	34.6	5.8	8.6	0.7	2.0	-	-
			2008-2009	0.00	0.02	0.010	0.160	1.0	16.5	5.4	8.5	0.3	3.1	-	-
			2009-2010	0.00	0.03	0.010	0.133	20.0	47.5	4.7	6.9	0.6	2.5	-	-
20	Dindori	Narmada	2007-2008	0.00	0.40	0.010	0.200	21.3	35.5	-	-	-	-	-	-
			2008-2009	0.00	0.50	0.010	0.154	1.0	14.1	-	-	-	-	-	-
			2009-2010	0.00	0.65	0.027	0.220	19.7	41.7	-	-	-	-	-	-

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

XI Basin : Narmada

Sl. No.	Site Name	Name of the River/ Stream	Years	Faecal Coliform (no.per 10 ml)		Total plate count (no.per 10 ml)		Phytoplankton (no.per ml)		Zooplankton (no.per litre)		Arsenic (ppm)		Boron (ppm)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(53)	(54)	(55)	(56)	(57)	(58)	(59)	(60)	(61)	(62)	(63)	(64)
1	Chandwada	Orsang	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
2	Garudeshwar	Narmada	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
3	Rajghat	Narmada	2007-2008												
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	Pati	Goi	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
5	Dhulsar	Uri	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
6	Mandleshwar	Narmada	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
7	Kogaon	Kundi	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
8	Mortakka	Narmada	2007-2008												
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
9	Handia	Narmada	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/…

10	**Chhidgaon**	**Ganjal**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-	-
11	**Hoshangabad**	**Narmada**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-	-
12	**Sandia**	**Narmada**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-	-

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

XI Basin : Narmada

Sl. No.	Site Name	Name of the River/ Stream	Years	Faecal Coliform (no.per 10 ml)		Total plate count (no.per 10 ml)		Phytoplankton (no.per ml)		Zooplankton (no.per litre)		Arsenic (ppm)		Boron (ppm)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(53)	(54)	(55)	(56)	(57)	(58)	(59)	(60)	(61)	(62)	(63)	(64)
13	Gadarwara	Shakker	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
14	Barmanghat	Narmada	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
15	Belkheri	Sher	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
16	Patan	Hiran	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
17	Bamni	Banjar	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
18	Mohgaon	Burhner	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
19	Manot	Narmada	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
20	Dindori	Narmada	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/…

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

XI Basin : Narmada

Sl. No.	Site Name	Name of the River/ Stream	Years	Cadmium (ppm)		Chromium (ppm)		Copper (ppm)		Cyanide (ppm)		Lead (ppm)		Manganese (ppm)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(65)	(66)	(67)	(68)	(69)	(70)	(71)	(72)	(73)	(74)	(75)	(76)
1	Chandwada	Orsang	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
2	Garudeshwar	Narmada	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
3	Rajghat	Narmada	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	Pati	Goi	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
5	Dhulsar	Uri	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
6	Mandleshwar	Narmada	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
7	Kogaon	Kundi	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
8	Mortakka	Narmada	2007-2008												
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
9	Handia	Narmada	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/…

10	**Chhidgaon**	**Ganjal**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-	-
11	**Hoshangabad**	**Narmada**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-	-
12	**Sandia**	**Narmada**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-	-

Contd/…

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

XI Basin : Narmada

Sl. No.	Site Name	Name of the River/ Stream	Years	Cadmium (ppm)		Chromium (ppm)		Copper (ppm)		Cyanide (ppm)		Lead (ppm)		Manganese (ppm)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(65)	(66)	(67)	(68)	(69)	(70)	(71)	(72)	(73)	(74)	(75)	(76)
13	Gadarwara	Shakker	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
14	Barmanghat	Narmada	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
15	Belkheri	Sher	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
16	Patan	Hiran	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
17	Bamni	Banjar	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
18	Mohgaon	Burhner	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
19	Manot	Narmada	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
20	Dindori	Narmada	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

XI Basin : Narmada

Sl. No.	Site Name	Name of the River/ Stream	Years	Mercury (ppm)		Zinc (ppm)		Total Hardness		Sodium % (Na%)		SAR		RSC	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(77)	(78)	(79)	(80)	(81)	(82)	(83)	(84)	(85)	(86)	(87)	(88)
1	Chandwada	Orsang	2007-2008	-	-	-	-	104	133	33	35	1.1	1.5	0.9	3.3
			2008-2009	-	-	-	-	112	121	39	43	1.4	1.6	0.0	0.0
			2009-2010	-	-	-	-	104	113	50	59	2.2	3.1	0.0	0.0
2	Garudeshwar	Narmada	2007-2008	-	-	-	-	100	113	15	43	0.4	1.8	0.0	1.0
			2008-2009	-	-	-	-	104	113	11	54	0.3	4.7	0.0	0.7
			2009-2010	-	-	-	-	105	120	31	66	1.0	4.3	0.0	0.1
3	Rajghat	Narmada	2007-2008	-	-	-	-	130	130	20	20	0.6	0.6	1.4	1.4
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	Pati	Goi	2007-2008	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2008-2009	-	-	-	-	101	176	13	24	0.4	0.9	0.3	2.6
			2009-2010	-	-	-	-	112	165	14	21	0.4	0.7	0.0	0.7
5	Dhulsar	Uri	2007-2008	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2008-2009	-	-	-	-	121	142	11	30	0.3	1.0	0.8	0.9
			2009-2010	-	-	-	-	87	155	17	27	0.5	0.8	0.0	0.8
6	Mandleshwar	Narmada	2007-2008	-	-	-	-	-	-	10	19	0.3	0.5	0.9	2.0
			2008-2009	-	-	-	-	89	118	10	22	0.2	0.6	0.3	1.5
			2009-2010	-	-	-	-	86	128	10	21	0.2	0.6	0.0	2.8
7	Kogaon	Kundi	2007-2008	-	-	-	-	108	223	5	49	0.1	2.9	1.1	6.2
			2008-2009	-	-	-	-	103	175	18	46	0.5	2.1	0.4	1.3
			2009-2010	-	-	-	-	91	305	12	25	0.4	0.8	0.5	2.5
8	Mortakka	Narmada	2007-2008	-	-	-	-	80	177	9	17	0.3	0.4	1.0	1.8
			2008-2009	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
			2009-2010	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
9	Handia	Narmada	2007-2008	-	-	-	-	64	511	5	64	0.2	3.7	0.0	2.9
			2008-2009	-	-	-	-	90	133	13	23	0.3	0.6	0.3	2.3
			2009-2010	-	-	-	-	53	161	15	23	0.3	0.7	0.0	4.9

Contd/…

10	**Chhidgaon**	**Ganjal**	**2007-2008**	-	-	-	-	**68**	**199**	**5**	**43**	**0.2**	**1.8**	**0.0**	**4.0**
			2008-2009	-	-	-	-	**68**	**210**	**13**	**44**	**0.3**	**1.8**	**0.0**	**3.1**
			2009-2010	-	-	-	-	**114**	**175**	**14**	**32**	**0.4**	**1.1**	**0.0**	**6.7**
11	**Hoshangabad**	**Narmada**	**2007-2008**	-	-	-	-	**77**	**155**	**12**	**20**	**0.3**	**0.6**	**0.5**	**4.5**
			2008-2009	-	-	-	-	**81**	**147**	**14**	**40**	**0.3**	**1.3**	**0.2**	**2.2**
			2009-2010	-	-	-	-	**79**	**179**	**14**	**24**	**0.4**	**0.7**	**0.4**	**2.9**
12	**Sandia**	**Narmada**	**2007-2008**	-	-	-	-	**77**	**153**	**9**	**23**	**0.2**	**0.5**	**0.4**	**2.8**
			2008-2009	-	-	-	-	**71**	**165**	**10**	**19**	**0.2**	**0.6**	**0.2**	**2.0**
			2009-2010	-	-	-	-	**89**	**163**	**12**	**23**	**0.3**	**0.6**	**0.2**	**2.4**

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

XI Basin : Narmada

Sl. No.	Site Name	Name of the River/ Stream	Years	Mercury (ppm)		Zinc (ppm)		Total Hardness		Sodium % (Na%)		SAR		RSC	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(77)	(78)	(79)	(80)	(81)	(82)	(83)	(84)	(85)	(86)	(87)	(88)
13	Gadarwara	Shakker	2007-2008	-	-	-	-	79	183	4	21	0.1	0.7	0.2	3.0
			2008-2009	-	-	-	-	86	226	11	23	0.3	0.7	0.0	1.3
			2009-2010	-	-	-	-	111	212	11	18	0.3	0.6	0.0	0.9
14	Barmanghat	Narmada	2007-2008	-	-	-	-	82	169	8	16	0.2	0.4	0.6	2.1
			2008-2009	-	-	-	-	76	141	10	17	0.2	0.4	0.0	2.3
			2009-2010	-	-	-	-	102	166	8	22	0.2	0.6	0.0	2.2
15	Belkheri	Sher	2007-2008	-	-	-	-	67	221	10	19	0.2	0.6	0.4	5.3
			2008-2009	-	-	-	-	60	221	11	18	0.2	0.6	0.0	2.1
			2009-2010	-	-	-	-	68	226	5	16	0.1	0.6	0.2	5.9
16	Patan	Hiran	2007-2008	-	-	-	-	105	205	18	42	0.5	1.8	0.0	3.7
			2008-2009	-	-	-	-	72	218	13	49	0.3	2.6	0.2	1.4
			2009-2010	-	-	-	-	91	253	8	49	0.3	2.4	0.4	5.8
17	Bamni	Banjar	2007-2008	-	-	-	-	59	59	17	17	0.4	0.4	1.5	1.5
			2008-2009	-	-	-	-	26	166	14	19	0.2	0.6	0.2	0.8
			2009-2010	-	-	-	-	35	89	15	23	0.3	0.5	0.0	0.7
18	Mohgaon	Burhner	2007-2008	-	-	-	-	56	126	8	21	0.2	0.6	0.2	12.6
			2008-2009	-	-	-	-	-	-	11	21	0.2	0.6	0.1	1.7
			2009-2010	-	-	-	-	63	131	13	24	0.3	0.8	0.0	3.8
19	Manot	Narmada	2007-2008	-	-	-	-	-	-	11	18	0.2	0.5	0.6	3.5
			2008-2009	-	-	-	-	45	297	5	22	0.2	0.6	0.0	1.3
			2009-2010	-	-	-	-	60	156	7	22	0.2	0.6	0.0	3.4
20	Dindori	Narmada	2007-2008	-	-	-	-	65	148	9	17	0.2	0.5	0.2	0.5
			2008-2009	-	-	-	-	80	148	8	23	0.2	0.7	0.0	1.1
			2009-2010	-	-	-	-	68	173	9	32	0.3	0.8	0.0	3.4

Source: Water Quality Year Book for the period of 2007-2008 to 2009-2010.

Note : 1. All the ionic concentrations are expressed in mg./lit. unless mentioned otherwise.

2. (-) indicate that analyis of a particular parameter has not been carried out.

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

XII Basin : Mahi, Sabarmati and Other West Flowing Rivers.

Sl. No.	Site Name	Name of the River/ Stream	Year	Q (Cumecs)		Temperature °C		pH_GEN		Sp.Conductance		Potassium (K)		Sodium (Na)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
1	Mataji	Mahi	2007-2008	0.000	8074	19.0	31.1	8.2	8.5	-	-	0.1	0.9	16.0	22.0
			2008-2009	0.000	364.1	19.9	31.7	7.7	8.4	-	-	0.9	1.5	13.0	21.0
			2009-2010	0.000	6579	24.4	31.4	8.1	8.5	-	-	0.8	1.1	15.0	25.0
2	Rangeli	Som	2007-2008	0.000	187.5	18.0	30.0	8.2	8.6	-	-	0.2	2.8	37.2	71.4
			2008-2009	0.000	228.7	25.0	27.0	7.7	8.5	-	-	1.7	1.8	29.0	36.6
			2009-2010	0.476	331.3	20.0	28.0	8.1	8.4	-	-	0.9	1.7	44.9	51.4
3	Paderdibadi	Mahi	2007-2008	0.000	3802	19.0	32.0	8.2	8.6	-	-	0.1	2.0	21.2	42.0
			2008-2009	0.000	348.4	23.0	30.9	7.8	8.5	-	-	0.7	1.9	15.8	27.8
			2009-2010	0.000	438.9	25.0	31.1	7.7	8.4	-	-	0.7	1.6	32.0	48.3
4	Khanpur	Mahi	2007-2008	14.01	11480	18.0	32.5	8.0	8.6	-	-	0.1	1.7	16.4	36.4
			2008-2009	8.545	441.7	19.0	29.5	7.7	8.7	-	-	0.2	3.2	23.8	39.4
			2009-2010	5.203	465.4	18.5	30.5	7.7	8.3	-	-	0.8	2.0	31.0	62.1
5	Derol Bridge	Sabarmati	2007-2008	0.000	1082	24.0	25.0	8.2	8.3	-	-	0.1	1.5	21.4	52.6
			2008-2009	0.000	66.49	28.0	28.0	8.1	8.1	-	-	1.9	2.0	54.8	56.4
			2009-2010	0.000	72.99	26.0	26.0	8.5	8.5	-	-	1.4	1.4	42.8	42.8
6	Vautha	Sabarmati	2007-2008	5.683	5360	22.4	36.6	7.6	8.0	-	-	1.0	15.8	36.7	266.0
			2008-2009	7.516	704.2	22.9	35.5	7.7	8.2	-	-	7.1	17.6	164.3	368.1
			2009-2010	10.19	972.9	20.0	36.9	7.4	8.4	-	-	6.3	19.1	139.4	412.0
7	Abu Road	Banas	2007-2008	0.000	471.3	25.0	27.0	8.1	8.2	-	-	0.2	1.9	47.1	50.8
			2008-2009	0.000	13.92	25.0	26.0	8.0	8.1	-	-	2.4	3.2	56.1	58.6
			2009-2010	0.000	115.7	24.0	24.0	8.1	8.1	-	-	2.3	2.3	47.1	47.1
8	Kamalpur	Banas	2007-2008	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry
			2008-2009	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry
			2009-2010	0.000	11.25	18.2	28.6	8.0	8.5	-	-	0.8	0.9	12.0	19.3
9	Chitrasani	Balaram	2007-2008	0.00	40.71	27.0	30.0	8.4	8.4	-	-	0.7	1.5	40.7	44.1
			2008-2009	0.000	6.999	26.4	28.0	7.9	8.0	-	-	2.3	2.9	56.9	62.5
			2009-2010	0.000	30.40	26.8	26.8	8.2	8.2	-	-	2.1	2.1	55.6	55.6

Contd/…

10	**Luwara**	**Shetrunji**	**2007-2008**	**0.000**	**2070**	**15.0**	**27.0**	**7.9**	**8.5**	**-**	**-**	**0.7**	**2.7**	**21.4**	**1274.0**
			2008-2009	**0.000**	**2705**	**21.0**	**28.0**	**8.1**	**8.2**	**-**	**-**	**1.5**	**5.2**	**38.6**	**672.0**
			2009-2010	**0.000**	**1378**	**28.0**	**28.0**	**7.8**	**8.3**	**-**	**-**	**15.7**	**24.4**	**642.0**	**1552**
11	**Ganod**	**Bhadar**	**2007-2008**	**0.000**	**3474**	**21.0**	**29.0**	**8.1**	**8.3**	**-**	**-**	**0.3**	**1.0**	**39.7**	**147.0**
			2008-2009	**0.000**	**1902**	**23.0**	**28.0**	**8.1**	**8.5**	**-**	**-**	**2.5**	**4.6**	**39.8**	**216.7**
			2009-2010	**0.000**	**1102**	**28.0**	**28.0**	**8.4**	**8.4**	**-**	**-**	**2.8**	**4.5**	**38.5**	**108.2**
12	**Gadat**	**Ambika**	**2007-2008**	**5.400**	**1601**	**20.0**	**31.0**	**7.2**	**8.6**	**-**	**-**	**0.3**	**6.4**	**32.1**	**49.9**
			2008-2009	**40.43**	**1295**	**23.0**	**30.0**	**6.3**	**8.4**	**-**	**-**	**0.1**	**3.1**	**16.0**	**30.0**
			2009-2010	**0.000**	**599.0**	**19.0**	**27.0**	**7.6**	**8.6**	**-**	**-**	**1.1**	**3.3**	**33.6**	**101.0**
13	**Durvesh**	**Vaitarna**	**2007-2008**	**0.000**	**2034**	**8.3**	**29.0**	**7.8**	**8.5**	**-**	**-**	**2.4**	**12.1**	**24.0**	**765.0**
			2008-2009	**0.000**	**3296**	**24.0**	**30.0**	**7.6**	**8.1**	**-**	**-**	**0.1**	**440.0**	**7.3**	**3078.0**
			2009-2010	**0.000**	**1633**	**23.0**	**30.0**	**7.3**	**8.4**	**-**	**-**	**1.5**	**165.5**	**15.4**	**2960**
14	**Pingalwada**	**Dhadar**	**2007-2008**	**2.134**	**586.9**	**16.0**	**29.0**	**6.9**	**8.6**	**-**	**-**	**1.8**	**18.3**	**15.3**	**228.0**
			2008-2009	**1.250**	**940.0**	**22.0**	**28.0**	**5.7**	**8.7**	**-**	**-**	**2.7**	**36.6**	**77.6**	**376.5**
			2009-2010	**0.000**	**25.10**	**23.0**	**28.0**	**6.8**	**8.3**	**-**	**-**	**4.4**	**23.7**	**74.0**	**205.2**
15	**Motinaroli**	**Kim**	**2007-2008**	**0.280**	**851.7**	**17.0**	**39.0**	**6.8**	**8.7**	**-**	**-**	**0.5**	**8.4**	**10.0**	**226.9**
			2008-2009	**0.500**	**735.6**	**20.0**	**30.0**	**6.0**	**8.5**	**-**	**-**	**0.1**	**32.0**	**22.3**	**228.1**
			2009-2010	**0.000**	**206.8**	**20.0**	**30.0**	**7.5**	**8.5**	**-**	**-**	**2.1**	**16.6**	**45.7**	**173.0**

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

XII Basin : Mahi, Sabarmati and Other West Flowing Rivers.

Sl. No.	Site Name	Name of the River/ Stream	Year	Calcium (Ca)		Magnesium (Mg)		Aluminium		Iron (Fe)		Ammonia (NH3-N)		Carbonate (CO3)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)	(25)	(26)	(27)	(28)
1	Mataji	Mahi	2007-2008	26	34	5.8	18.5	0.00	0.02	0.0	0.1	0.05	0.14	0.0	5.0
			2008-2009	22	42	4.9	8.8	0.00	0.03	0.0	1.6	0.23	1.11	0.0	5.0
			2009-2010	29	45	5.8	11.7	0.00	0.02	0.3	0.4	0.07	0.44	0.0	5.0
2	Rangeli	Som	2007-2008	35	48	7.8	21.4	0.02	0.03	0.0	0.1	0.02	0.10	0.0	10.0
			2008-2009	27	46	7.8	8.8	0.00	0.03	0.6	0.7	0.67	0.82	0.0	10.0
			2009-2010	43	59	9.7	13.6	0.00	0.02	0.3	0.6	0.06	0.82	0.0	2.0
3	Paderdibadi	Mahi	2007-2008	30	48	7.8	12.6	0.01	0.07	0.0	0.2	0.04	0.17	0.0	12.0
			2008-2009	24	45	5.8	8.8	0.02	0.03	0.0	0.8	0.22	0.68	0.0	7.0
			2009-2010	30	63	7.8	14.6	0.02	0.03	0.4	0.6	0.06	0.62	0.0	2.0
4	Khanpur	Mahi	2007-2008	26	51	4.9	12.6	0.00	0.08	0.0	0.1	0.03	0.30	0.0	7.0
			2008-2009	35	53	5.8	12.6	0.01	0.04	0.0	0.3	0.13	1.21	0.0	10.0
			2009-2010	32	69	5.8	23.3	0.02	0.04	0.1	0.4	0.11	0.61	0.0	0.0
5	Derol Bridge	Sabarmati	2007-2008	32	43	3.9	15.6	0.02	0.07	0.1	0.2	0.02	0.07	0.0	0.0
			2008-2009	45	46	11.7	13.6	0.01	0.02	0.2	0.2	0.05	0.07	0.0	0.0
			2009-2010	40	40	12.6	12.6	0.02	0.02	0.2	0.2	0.46	0.46	7.0	7.0
6	Vautha	Sabarmati	2007-2008	38	99	9.7	25.3	0.01	0.12	0.1	0.8	3.00	28.90	0.0	0.0
			2008-2009	63	170	13.6	26.2	0.03	0.05	0.2	1.7	14.90	37.50	0.0	0.0
			2009-2010	10.19	972.9	18.5	29.2	0.03	0.08	0.6	1.4	9.90	29.80	0.0	2.0
7	Abu Road	Banas	2007-2008	42	67	15.6	20.4	0.05	0.07	0.2	0.3	0.02	0.03	0.0	0.0
			2008-2009	45	53	12.6	16.5	0.02	0.03	0.6	0.8	0.52	0.54	0.0	0.0
			2009-2010	46	46	10.7	10.7	0.03	0.03	0.4	0.4	0.29	0.29	0.0	0.0
8	Kamalpur	Banas	2007-2008	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry
			2008-2009	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry
			2009-2010	29	34	3.9	5.8	0.02	0.04	0.3	0.3	0.09	0.17	0.0	5.0
9	Chitrasani	Balaram	2007-2008	32	46	9.7	13.6	0.00	0.05	0.1	0.3	0.02	0.05	2.0	7.0
			2008-2009	48	56	8.8	13.6	0.01	0.02	0.3	0.3	0.05	0.51	0.0	0.0
			2009-2010	30	30	22.4	22.4	0.02	0.02	0.2	0.2	0.46	0.46	0.0	0.0

Contd/…

10	**Luwara**	**Shetrunji**	**2007-2008**	**29**	**271**	**7.8**	**55.4**	**0.03**	**0.14**	**0.1**	**0.4**	**0.01**	**0.20**	**0.0**	**5.0**
			2008-2009	**42**	**257**	**8.8**	**71.0**	**0.02**	**0.03**	**0.8**	**1.3**	**0.36**	**0.56**	**0.0**	**0.0**
			2009-2010	**138**	**156**	**65.1**	**92.3**	**0.03**	**0.07**	**0.4**	**0.9**	**0.11**	**0.46**	**0.0**	**0.0**
11	**Ganod**	**Bhadar**	**2007-2008**	**45**	**74**	**9.7**	**11.7**	**0.02**	**0.07**	**0.01**	**0.4**	**0.02**	**0.05**	**0.0**	**5.0**
			2008-2009	**45**	**101**	**8.8**	**26.2**	**0.03**	**0.08**	**0.9**	**1.2**	**0.47**	**0.60**	**0.0**	**5.0**
			2009-2010	**45**	**79**	**10.7**	**18.5**	**0.02**	**0.02**	**0.9**	**1.1**	**0.32**	**0.44**	**2.0**	**5.0**
12	**Gadat**	**Ambika**	**2007-2008**	**32**	**35**	**5.8**	**8.0**	**0.04**	**0.08**	**-**	**-**	**0.05**	**0.13**	**0.0**	**12.0**
			2008-2009	**32**	**32**	**6.8**	**9.7**	**0.02**	**0.06**	**-**	**-**	**0.06**	**0.16**	**0.0**	**6.0**
			2009-2010	**32**	**34**	**6.7**	**9.7**	**0.02**	**0.10**	**-**	**-**	**0.05**	**0.10**	**0.0**	**12.0**
13	**Durvesh**	**Vaitarna**	**2007-2008**	**28**	**35**	**5.8**	**11.7**	**0.02**	**0.08**	**-**	**-**	**0.05**	**0.13**	**0.0**	**6.0**
			2008-2009	**30**	**40**	**5.8**	**12.6**	**0.04**	**0.14**	**-**	**-**	**0.05**	**0.26**	**0.0**	**0.0**
			2009-2010	**31**	**36**	**5.8**	**12.6**	**0.01**	**0.12**	**-**	**-**	**0.05**	**0.16**	**0.0**	**6.0**
14	**Pingalwada**	**Dhadar**	**2007-2008**	**28**	**42**	**6.8**	**12.8**	**0.08**	**0.32**	**-**	**-**	**0.05**	**0.23**	**0.0**	**6.0**
			2008-2009	**35**	**40**	**9.7**	**14.7**	**0.04**	**0.14**	**-**	**-**	**0.05**	**16.86**	**0.0**	**6.0**
			2009-2010	**39**	**40**	**10.7**	**12.6**	**0.04**	**0.14**	**-**	**-**	**1.24**	**16.86**	**0.0**	**0.0**
15	**Motinaroli**	**Kim**	**2007-2008**	**25**	**45**	**5.0**	**12.7**	**0.02**	**0.16**	**-**	**-**	**0.05**	**0.26**	**0.0**	**12.0**
			2008-2009	**34**	**40**	**7.8**	**12.6**	**0.04**	**0.08**	**-**	**-**	**0.05**	**15.84**	**0.0**	**6.0**
			2009-2010	**35**	**40**	**8.7**	**12.6**	**0.02**	**14.0**	**-**	**-**	**0.05**	**1.42**	**0.0**	**6.0**

Contd/….

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

XII Basin : Mahi, Sabarmati and Other West Flowing Rivers.

Sl. No.	Site Name	Name of the River/ Stream	Year	Bicarbonate (HCO3)		Chloride (CL)		Fluoride (F)		Sulphate (SO4)		Sulphite		Nitrate (NO3-N)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(29)	(30)	(31)	(32)	(33)	(34)	(35)	(36)	(37)	(38)	(39)	(40)
1	Mataji	Mahi	2007-2008	88	144	22.0	32.0	0.26	0.68	12.4	18.2	-	-	0.18	1.68
			2008-2009	83	132	18.0	30.0	0.44	0.77	4.5	8.2	-	-	0.91	3.31
			2009-2010	93	142	24.0	36.0	0.41	0.78	10.3	12.1	-	-	2.92	4.13
2	Rangeli	Som	2007-2008	137	200	48.0	94.0	0.42	0.95	20.0	29.2	-	-	0.71	1.98
			2008-2009	107	142	38.0	48.0	0.54	0.97	11.3	14.2	-	-	0.46	1.91
			2009-2010	171	224	60.0	70.0	0.55	0.91	13.4	15.8	-	-	0.31	0.68
3	Paderdibadi	Mahi	2007-2008	112	156	34.0	56.0	0.40	0.97	20.4	24.8	-	-	0.08	2.31
			2008-2009	88	142	24.0	40.0	0.33	0.92	7.8	23.3	-	-	0.42	0.83
			2009-2010	127	239	48.0	66.0	0.66	0.88	10.2	20.9	-	-	0.14	0.82
4	Khanpur	Mahi	2007-2008	83	185	22.0	50.0	0.38	0.94	12.0	19.5	-	-	0.74	2.14
			2008-2009	112	171	34.0	58.0	0.38	0.97	14.0	20.5	-	-	0.60	2.61
			2009-2010	132	254	46.0	80.0	0.35	0.88	16.4	22.6	-	-	0.38	2.30
5	Derol Bridge	Sabarmati	2007-2008	93	185	32.0	72.0	0.39	1.32	12.8	20.5	-	-	1.18	2.14
			2008-2009	171	171	78	80	0.5	0.90	17.0	20.0	-	-	3.19	3.58
			2009-2010	142	142	70.0	70.0	0.95	0.95	15.4	15.4	-	-	0.85	0.85
6	Vautha	Sabarmati	2007-2008	127	366	48.0	346.0	0.35	1.03	24.4	86.0	-	-	0.99	3.00
			2008-2009	220	522	214.0	530.0	0.55	0.98	76.8	126.8	-	-	1.21	4.71
			2009-2010	239	722	210.0	614.0	0.44	0.90	85.9	126.6	-	-	1.88	4.18
7	Abu Road	Banas	2007-2008	171	190	68.0	96.0	0.39	1.32	23.7	39.2	-	-	1.04	2.26
			2008-2009	166	185	78.0	84.0	0.96	1.03	31.8	35.2	-	-	1.13	4.68
			2009-2010	166	166	62.0	62.0	0.95	0.95	31.0	31.0	-	-	2.07	2.07
8	Kamalpur	Banas	2007-2008	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry
			2008-2009	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry
			2009-2010	88	98	18.0	30.0	0.68	0.84	11.0	14.0	-	-	0.77	1.27

Contd/…

9	Chitrasani	Balaram	2007-2008	146	151	58.0	64.0	0.55	1.32	14.0	18.2	-	-	0.57	1.04
			2008-2009	171	200	74.0	86.0	0.93	1.11	20.0	26.2	-	-	0.58	1.02
			2009-2010	190	190	76.0	76.0	0.96	0.96	22.8	22.8	-	-	0.07	0.07
10	Luwara	Shetrunji	2007-2008	98	752	32.0	1884.0	0.46	0.72	6.4	148.4	-	-	0.85	5.98
			2008-2009	112	834	54.0	952.0	0.57	1.04	26.1	158.2	-	-	4.76	9.04
			2009-2010	610	869	950	2119	0.99	1.16	75.4	107.0	-	-	2.27	6.86
11	Ganod	Bhadar	2007-2008	151	190	64.0	206.0	0.44	0.77	21.9	61.4	-	-	0.18	5.18
			2008-2009	132	317	58.0	320.0	0.33	0.77	29.4	80.0	-	-	1.08	7.99
			2009-2010	132	190	56.0	182.0	0.87	0.92	29.2	53.9	-	-	2.71	3.38
12	Gadat	Ambika	2007-2008	120	148	42.5	77.2	0.05	0.31	1.0	7.8	-	-	0.06	0.27
			2008-2009	98	140	27.3	48.0	0.05	0.32	6.1	18.7	-	-	0.03	0.20
			2009-2010	98	146	45.0	162.0	0.06	0.24	12.2	18.9	-	-	0.10	0.20
13	Durvesh	Vaitarna	2007-2008	104	198	36.0	1077.0	0.05	0.05	4.0	55.9	-	-	0.09	0.30
			2008-2009	98	488	13.8	4731.2	0.07	0.44	8.5	284.9	-	-	0.01	0.70
			2009-2010	98	346	21.1	4272	0.05	0.28	8.4	83.6	-	-	0.08	0.20
14	Pingalwada	Dhadar	2007-2008	98	286	20.3	333.0	0.05	0.38	1.6	28.1	-	-	0.03	0.60
			2008-2009	98	260	144.9	488.3	0.07	0.38	13.7	66.1	-	-	0.03	0.70
			2009-2010	98	219	126.5	276.0	0.22	0.38	34.4	66.1	-	-	0.40	0.65
15	Motinaroli	Kim	2007-2008	86	285	18.0	297.6	0.05	0.28	1.0	25.3	-	-	0.04	0.60
			2008-2009	85	204	38.5	396.1	0.05	0.38	15.1	32.5	-	-	0.03	0.50
			2009-2010	98	236	63.3	245.6	0.20	0.38	18.5	48.6	-	-	0.16	0.40

Contd/…

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

XII Basin : Mahi, Sabarmati and Other West Flowing Rivers.

Sl. No.	Site Name	Name of the River/ Stream	Year	Nitrite (NO2-N)		Phosphate(PO4)		Silica (SiO2)		DO		BOD3-27		Total Coliform (no.per 10 ml)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(41)	(42)	(43)	(44)	(45)	(46)	(47)	(48)	(49)	(50)	(51)	(52)
1	Mataji	Mahi	2007-2008	0.01	0.06	-	-	24.6	43.2	6.7	9.9	0.7	2.9	-	-
			2008-2009	0.03	0.25	-	-	25.0	35.6	6.6	10.1	1.1	2.4	-	-
			2009-2010	0.03	0.05	-	-	27.6	39.7	8.0	8.4	1.3	2.1	-	-
2	Rangeli	Som	2007-2008	0.01	0.07	-	-	19.8	32.0	7.1	14.0	0.1	3.0	-	-
			2008-2009	0.01	0.08	-	-	19.9	25.4	6.5	9.9	1.6	2.7	-	-
			2009-2010	0.01	0.07	-	-	17.7	36.5	5.8	11.1	0.2	2.3	-	-
3	Paderdibadi	Mahi	2007-2008	0.01	0.07	-	-	17.5	36.0	5.2	14.0	0.5	3.3	-	-
			2008-2009	0.01	0.08	-	-	20.5	32.4	8.1	10.9	1.6	2.9	-	-
			2009-2010	0.01	0.15	-	-	15.8	36.5	7.2	9.8	1.2	2.9	-	-
4	Khanpur	Mahi	2007-2008	0.01	0.10	-	-	13.7	36.9	5.0	10.3	1.0	2.3	-	-
			2008-2009	0.01	0.08	-	-	19.0	39.5	4.7	8.7	0.6	2.3	-	-
			2009-2010	0.01	0.07	-	-	24.0	45.6	5.0	9.8	1.0	2.8	-	-
5	Derol Bridge	Sabarmati	2007-2008	0.00	0.06	-	-	23.9	39.3	5.3	7.8	0.3	1.4	-	-
			2008-2009	0.01	0.07	-	-	29.7	37.9	6.1	6.4	0.4	1.1	-	-
			2009-2010	0.03	0.03	-	-	24.1	24.1	8.5	8.5	2.5	2.5	-	-
6	Vautha	Sabarmati	2007-2008	0.01	0.15	-	-	18.9	44.2	4.0	7.1	2.9	58.0	-	-
			2008-2009	0.00	0.22	-	-	31.1	63.2	4.3	6.7	3.0	33.0	-	-
			2009-2010	0.01	0.04	-	-	26.5	56.9	5.2	6.7	7.0	30.0	-	-
7	Abu Road	Banas	2007-2008	0.03	0.03	-	-	32.0	32.8	6.3	7.5	0.5	1.6	-	-
			2008-2009	0.04	0.06	-	-	18.4	28.5	6.5	7.0	0.4	1.6	-	-
			2009-2010	0.09	0.09	-	-	20.5	20.5	4.5	4.5	1.9	1.9	-	-
8	Kamalpur	Banas	2007-2008	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry
			2008-2009	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry
			2009-2010	0.01	0.03	-	-	22.1	26.7	6.5	9.1	0.1	0.7	-	-
9	Chitrasani	Balaram	2007-2008	0.01	0.03	-	-	33.9	41.9	8.2	9.2	1.4	1.8	-	-
			2008-2009	0.00	0.01	-	-	26.2	31.7	6.4	8.5	1.9	2.5	-	-
			2009-2010	0.03	0.03	-	-	21.6	21.6	7.4	7.4	2.6	2.6	-	-

Contd/…

10	**Luwara**	**Shetrunji**	**2007-2008**	**0.03**	**0.17**	**-**	**-**	**23.7**	**34.8**	**6.2**	**11.6**	**0.7**	**3.0**	**-**	**-**
			2008-2009	**0.01**	**0.32**	**-**	**-**	**23.0**	**35.1**	**8.6**	**10.1**	**0.9**	**3.2**	**-**	**-**
			2009-2010	**0.03**	**0.09**	**-**	**-**	**20.5**	**29.4**	**6.0**	**9.9**	**1.4**	**3.3**	**-**	**-**
11	**Ganod**	**Bhadar**	**2007-2008**	**0.03**	**0.08**	**-**	**-**	**26.8**	**44.0**	**7.1**	**7.8**	**1.2**	**1.9**	**-**	**-**
			2008-2009	**0.03**	**0.62**	**-**	**-**	**22.5**	**34.9**	**6.5**	**8.2**	**1.8**	**3.3**	**-**	**-**
			2009-2010	**0.02**	**0.07**	**-**	**-**	**18.2**	**28.2**	**6.7**	**7.7**	**1.7**	**2.9**	**-**	**-**
12	**Gadat**	**Ambika**	**2007-2008**	**0.00**	**0.03**	**-**	**-**	**16.5**	**24.8**	**-**	**-**	**0.2**	**1.1**	**-**	**-**
			2008-2009	**0.00**	**0.08**	**-**	**-**	**15.1**	**28.7**	**-**	**-**	**0.2**	**1.1**	**-**	**-**
			2009-2010	**0.02**	**0.04**	**-**	**-**	**12.7**	**22.8**	**6.8**	**10.4**	**0.2**	**2.5**	**-**	**-**
13	**Durvesh**	**Vaitarna**	**2007-2008**	**0.00**	**0.03**	**-**	**-**	**18.4**	**28.8**	**5.6**	**5.9**	**0.2**	**8.0**	**-**	**-**
			2008-2009	**0.00**	**0.06**	**-**	**-**	**22.5**	**28.5**	**5.7**	**5.9**	**0.5**	**9.0**	**-**	**-**
			2009-2010	**0.02**	**0.08**	**-**	**-**	**11.2**	**20.5**	**5.5**	**7.1**	**0.2**	**8.0**	**-**	**-**
14	**Pingalwada**	**Dhadar**	**2007-2008**	**0.00**	**0.08**	**-**	**-**	**24.3**	**28.9**	**4.5**	**7.2**	**1.2**	**55.0**	**-**	**-**
			2008-2009	**0.00**	**0.06**	**-**	**-**	**24.3**	**29.0**	**4.0**	**7.2**	**0.5**	**20..0**	**-**	**-**
			2009-2010	**0.04**	**0.12**	**-**	**-**	**18.4**	**26.8**	**3.0**	**6.6**	**3.0**	**43.0**	**-**	**-**
15	**Motinaroli**	**Kim**	**2007-2008**	**0.00**	**0.09**	**-**	**-**	**20.4**	**28.9**	**7.5**	**10.4**	**0.3**	**8.0**	**-**	**-**
			2008-2009	**0.00**	**0.06**	**-**	**-**	**18.4**	**28.4**	**6.5**	**10.0**	**0.2**	**32.0**	**-**	**-**
			2009-2010	**0.02**	**0.08**	**-**	**-**	**13.2**	**24.9**	**5.0**	**11.4**	**0.2**	**10.0**	**-**	**-**

Contd/…

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

XII Basin : Mahi, Sabarmati and Other West Flowing Rivers.

Sl. No.	Site Name	Name of the River/ Stream	Year	Faecal Coliform (no.per 10 ml)		Total plate count (no.per 10 ml)		Phytoplankton (no.per ml)		Zooplankton (no.per litre)		Arsenic (ppm)		Boron (ppm)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(53)	(54)	(55)	(56)	(57)	(58)	(59)	(60)	(61)	(62)	(63)	(64)
1	Mataji	Mahi	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
2	Rangeli	Som	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
3	Paderdibadi	Mahi	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
4	Khanpur	Mahi	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
5	Derol Bridge	Sabarmati	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
6	Vautha	Sabarmati	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
7	Abu Road	Banas	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
8	Kamalpur	Banas	2007-2008	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry
			2008-2009	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
9	Chitrasani	Balaram	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/…

10	**Luwara**	**Shetrunji**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-	-
11	**Ganod**	**Bhadar**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-	-
12	**Gadat**	**Ambika**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-	-
13	**Durvesh**	**Vaitarna**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-	-
14	**Pingalwada**	**Dhadar**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-	-
15	**Motinaroli**	**Kim**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-	-

Contd/…

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

XII Basin : Mahi, Sabarmati and Other West Flowing Rivers.

Sl. No.	Site Name	Name of the River/ Stream	Year	Cadmium (ppm)		Chromium (ppm)		Copper (ppm)		Cyanide (ppm)		Lead (ppm)		Manganese (ppm)	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(65)	(66)	(67)	(68)	(69)	(70)	(71)	(72)	(73)	(74)	(75)	(76)
1	Mataji	Mahi	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
2	Rangeli	Som	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
3	Paderdibadi	Mahi	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
4	Khanpur	Mahi	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
5	Derol Bridge	Sabarmati	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
6	Vautha	Sabarmati	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
7	Abu Road	Banas	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
8	Kamalpur	Banas	2007-2008	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry
			2008-2009	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
9	Chitrasani	Balaram	2007-2008	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-

Contd/…

10	**Luwara**	**Shetrunji**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-	-
11	**Ganod**	**Bhadar**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-	-
12	**Gadat**	**Ambika**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-	-
13	**Durvesh**	**Vaitarna**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-	-
14	**Pingalwada**	**Dhadar**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-	-
15	**Motinaroli**	**Kim**	**2007-2008**	-	-	-	-	-	-	-	-	-	-	-	-	-
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-	-

Contd/…

Table 13 : Maximum and minimum values of water quality parameters by site and river basin

XII Basin : Mahi, Sabarmati and Other West Flowing Rivers.

Sl. No.	Site Name	Name of the River/ Stream	Year	Mercury (ppm)		Zinc (ppm)		Total Hardness		Sodium % (Na%)		SAR		RSC	
				Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max
(1)	(2)	(3)	(4)	(77)	(78)	(79)	(80)	(81)	(82)	(83)	(84)	(85)	(86)	(87)	(88)
1	Mataji	Mahi	2007-2008	-	-	-	-	88	149	24	30	0.7	0.9	0.0	0.0
			2008-2009	-	-	-	-	84	133	24	27	0.6	0.8	0.0	0.0
			2009-2010	-	-	-	-	105	149	23	28	0.6	0.9	0.0	0.0
2	Rangeli	Som	2007-2008	-	-	-	-	149	189	34	45	1.3	2.3	0.0	0.0
			2008-2009	-	-	-	-	105	149	35	37	1.2	1.3	0.0	0.0
			2009-2010	-	-	-	-	153	201	36	39	1.6	1.6	0.0	0.0
3	Paderdibadi	Mahi	2007-2008	-	-	-	-	121	161	25	43	0.8	1.7	0.0	0.0
			2008-2009	-	-	-	-	84	137	27	31	0.8	1.1	0.0	0.0
			2009-2010	-	-	-	-	121	217	33	38	1.3	1.6	0.0	0.0
4	Khanpur	Mahi	2007-2008	-	-	-	-	84	181	25	45	0.7	1.5	0.0	0.0
			2008-2009	-	-	-	-	116	169	27	37	0.9	1.3	0.0	0.0
			2009-2010	-	-	-	-	128	229	34	40	1.2	1.8	0.0	0.0
5	Derol Bridge	Sabarmati	2007-2008	-	-	-	-	96	173	32	40	1.0	1.7	0.0	0.0
			2008-2009	-	-	-	-	165	169	41	42	1.8	1.9	0.0	0.0
			2009-2010	-	-	-	-	153	153	38	38	1.5	1.5	0.0	0.0
6	Vautha	Sabarmati	2007-2008	-	-	-	-	137	342	36	72	1.4	7.2	0.0	0.0
			2008-2009	-	-	-	-	213	534	57	65	4.8	6.9	0.0	0.0
			2009-2010	-	-	-	-	314	675	49	60	3.4	6.9	0.0	0.2
7	Abu Road	Banas	2007-2008	-	-	-	-	169	253	30	38	1.4	1.6	0.0	0.0
			2008-2009	-	-	-	-	181	185	40	41	1.8	1.9	0.0	0.0
			2009-2010	-	-	-	-	161	161	39	39	1.6	1.6	0.0	0.0
8	Kamalpur	Banas	2007-2008	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry
			2008-2009	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry	River dry
			2009-2010	-	-	-	-	96	108	21	30	0.5	0.9	0.0	0.0
9	Chitrasani	Balaram	2007-2008	-	-	-	-	137	157	38	39	1.5	1.5	0.0	0.0
			2008-2009	-	-	-	-	157	197	40	44	1.9	2.0	0.0	0.0
			2009-2010	-	-	-	-	169	169	41	41	1.9	1.9	0.0	0.0

Contd/…

10	Luwara	Shetrunji	2007-2008	-	-	-	-	105	908	31	75	0.9	18.4	0.0	0.0
			2008-2009	-	-	-	-	141	937	37	61	1.4	9.6	0.0	0.0
			2009-2010	-	-	-	-	616	774	69	81	11.3	24.4	0.0	0.0
11	Ganod	Bhadar	2007-2008	-	-	-	-	161	229	35	58	1.4	4.2	0.0	0.0
			2008-2009	-	-	-	-	-	-	-	-	-	-	-	-
			2009-2010	-	-	-	-	-	-	-	-	-	-	-	-
12	Gadat	Ambika	2007-2008	-	-	-	-	104	121	38	48	1.3	2.0	0.0	0.2
			2008-2009	-	-	-	-	108	121	24	37	0.7	1.2	0.0	0.1
			2009-2010	-	-	-	-	108	125	39	64	1.4	4.0	0.0	0.0
13	Durvesh	Vaitarna	2007-2008	-	-	-	-	94	137	34	92	1.1	28.5	0.0	0.7
			2008-2009	-	-	-	-	100	150	13	90	0.3	110.1	0.0	5.0
			2009-2010	-	-	-	-	100	142	22	95	0.6	108.8	0.0	2.9
14	Pingalwada	Dhadar	2007-2008	-	-	-	-	98	158	25	74	0.7	7.9	0.0	1.8
			2008-2009	-	-	-	-	129	157	55	83	3.0	13.3	0.0	1.1
			2009-2010	-	-	-	-	142	153	52	73	2.7	7.2	0.0	0.6
15	Motinaroli	Kim	2007-2008	-	-	-	-	83	165	20	74	0.5	7.7	0.0	1.8
			2008-2009	-	-	-	-	117	153	27	72	0.9	8.1	0.0	0.4
			2009-2010	-	-	-	-	125	153	38	70	1.6	6.2	0.0	0.9

Source: Water Quality Year Book for the period of 2007-2008 to 2009-2010.

Note : 1. All the ionic concentrations are expressed in mg./lit. unless mentioned otherwise.

2. (-) indicate that analyis of a particular parameter has not been carried out.

Table 14 : Land utilisation pattern by river basin and State for 2007-2008

(Area in hectare)

Sl. No.	Basin/State/District Name	District Area	District Basin Area	Reporting Area For Land Utilisation	Classification of Reporting Area					Area Sown more than once	Total Cropped Area
					Forest	Not available for Cultivation	Other uncultivated Lands Excluding Fallow Lands	Fallow Lands	Net Area Sown		
1	2	3	4	5	6	7	8	9	10	11	12
I	**Basin : Mahanadi, Year 2007-2008**										
i)	**JHARKHAND**										
	Gumla	907700	63500	**534320**	135341	61436	37838	169134	130571	23258	153829
	Sub Total	**907700**	**63500**	**534320**	135341	61436	37838	169134	130571	23258	153829
ii)	**ORISSA**										
1	**Sambalpur**	1751600	1390400	666000	363000	56000	36000	44000	167000	113070	280070
2	**Sundergarh**	971200	410000	971000	496000	95000	67000	24000	289000	79370	368370
3	**Cuttak**	1114200	752800	393000	79000	93000	32000	11000	178000	147160	325160
4	**Dhenkanal**	1082700	311000	445000	174000	47000	18000	41000	165000	102460	267460
5	**Phulbani**	1111900	907500	802000	571000	39000	58000	12000	122000	65020	187020
6	**Balangir**	891300	891300	657000	154000	76000	68000	32000	327000	140870	467870
7	**Kalahandi**	1177200	981900	792000	254000	92000	52000	21000	373000	225250	598250
8	**Koraput**	2696100	197700	881000	188000	264000	106000	37000	286000	102880	388880
9	**Puri**	1018200	606100	348000	14000	123000	21000	53000	137000	151830	288830
	Sub Total	**11814400**	**6448700**	**5955000**	**2293000**	**885000**	**458000**	**275000**	**2044000**	**1127910**	**3171910**
iii)	**MADHYA PRADESH**										
1	**Shahdol**	1402800	8400	561006	227886	54005	48620	59524	170971	25438	196409
	Sub Total	**1402800**	**8400**	**561006**	**227886**	**54005**	**48620**	**59524**	**170971**	**25438**	**196409**
											Contd.

iv)	**CHHATISGARH**										
1	**Surguja**	2233700	496200	1603440	771513	87214	183612	81941	479160	74540	553700
2	**Bilaspur**	1989700	1895700	856885	330871	52331	79561	28605	365517	115970	481487
3	**Rajgarh**	1292400	1090600	616300	17636	71534	73829	5632	427669	205732	633401
4	**Rajnandgaon**	1112700	756500	802252	259292	67538	71886	45988	357548	97679	455227
5	**Durg**	853700	853700	870180	99603	100143	89117	30493	550824	268369	819193
6	**Raipur**	2125800	2115200	1344628	524968	101593	129418	43386	545263	141057	686320
7	**Bastar**	3911400	222100	1010288	497823	75350	92497	30300	316318	10065	326383
	Sub Total	**13519400**	**7430000**	**7103973**	**2501706**	**555703**	**719920**	**266345**	**3042299**	**913412**	**3955711**
v)	**MAHARASHTRA**										
1	**Chandrapur+**	2585500	28600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Gadchiroli**	1441200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**4026700**	**28600**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Grand Total	**31671000**	**13979200**	**14154299**	**5157933**	**1556144**	**1264378**	**770003**	**5387841**	**2090018**	**7477859**

Contd/…

Table 14 : Land utilisation pattern by river basin and State for 2007-2008

(Area in hectare)

Sl. No.	Basin/State/District Name	District Area	District Basin Area	Reporting Area For Land Utilisation	Classification of Reporting Area					Area Sown more than once	Total Cropped Area
					Forest	Not available for Cultivation	Other uncultivated Lands Excluding Fallow Lands	Fallow Lands	Net Area Sown		
1	2	3	4	5	6	7	8	9	10	11	12
II	**Subernarekha, Burhabalang and Baitarni, Year 2007-2008**										
i)	**Jharkhand**										
1	**Ranchi**	769800	488000	497307	99584	71570	28012	151699	146442	130	146572
2	**Singhbhum**	1344000	902100	556696	124846	203660	52285	85422	90483	9122	99605
	Sub Total	**2113800**	**1390100**	**1054003**	**224430**	**275230**	**80297**	**237121**	**236925**	**9252**	**246177**
ii)	**ORISSA**										
1	**Mayurbhanj**	1041800	751800	1042000	439000	74000	79000	61000	389000	127430	516430
2	**Balasore**	631100	472100	381000	33000	43000	50000	42000	213000	117900	330900
	Sub Total	**1672900**	**1223900**	3531006	920860	667460	289594	577242	1075850	263834	1339684
iii)	WEST BENGAL										
1	Midnapur (East)	1408100	311600	396594	899	97054	2974	2940	292727	229754	522481
2	Purulia	625900	101800	625646	75048	104426	13050	120198	312924	72234	385158
	Sub Total	**2034000**	**413400**	1022240	75947	201480	16024	123138	605651	301988	907639
	Grand Total	**5820700**	**3027400**	**5607249**	**1221237**	**1144170**	**385915**	**937501**	**1918426**	**575074**	**2493500**
III	**Basin : Brahamani, Year 2007-2008**										
i)	**JHARKHAND**										
1	**Lohardaga**	149100	89100	153621	44355	21303	6515	41184	40264	11165	51429
2	**Gumla**	907700	794200	534320	135341	61436	37838	169134	130571	23258	153829
3	**Ranchi**	769800	230000	497307	99584	71570	28012	151699	146442	130	146572
4	**Pa. Singhbhum**	1344000	412000	567769	142336	90722	39734	152105	142872	5658	148530
	Sub Total	**3170600**	**1525300**	**1753017**	**421616**	**245031**	**112099**	**514122**	**460149**	**40211**	**500360**

Contd/…

ii)	**MADHYA PRADESH**										
1	**Raigarh**	1292400	126800	652774	207896	64471	71575	32927	275905	33240	309145
	Sub Total	**1292400**	**126800**	**652774**	**207896**	**64471**	**71575**	**32927**	**275905**	**33240**	**309145**
	ORISSA										
1	**Sambalpur**	1751600	361200	666000	363000	56000	36000	44000	167000	113070	280070
2	**Sundergarh**	971200	561200	971000	496000	95000	67000	24000	289000	79370	368370
3	**Keonjhar**	830300	830300	830000	310000	170000	52000	4000	294000	139150	433150
4	**Mayurbhanj**	1041800	290000	1042000	439000	74000	79000	61000	389000	127430	516430
5	**Balasore**	631100	159000	381000	33000	43000	50000	42000	213000	117900	330900
6	**Cuttak**	1114200	361400	393000	79000	93000	32000	11000	178000	147160	325160
7	**Dhenkanal**	1082700	771700	445000	174000	47000	18000	41000	165000	102460	267460
	Sub Total	**7422900**	**3334800**	4728000	1894000	578000	334000	227000	1695000	826540	2521540
	Grand Total	**11885900**	**4986900**	**7133791**	**2523512**	**887502**	**517674**	**774049**	**2431054**	**899991**	**3331045**

IV Rushikulya, Vamsadhra, Sarada and Nagavali

<----- Not Available Data ----->

Contd/…

Table 14 : Land utilisation pattern by river basin and State for 2007-2008

(Area in hectare)

Sl. No.	Basin/State/District Name	District Area	District Basin Area	Reporting Area For Land Utilisation	Classification of Reporting Area					Area Sown more than once	Total Cropped Area
					Forest	Not available for Cultivation	Other uncultivated Lands Excluding Fallow Lands	Fallow Lands	Net Area Sown		
1	2	3	4	5	6	7	8	9	10	11	12
V	**Basin : Godavari, Year 2007-2008**										
i)	**ANDHRA PRADESH**										
1	**Visakhapatnam**	1116100	370400	1116100	441166	233539	47789	81539	312067	72363	384430
2	**East Godavari**	1080700	154900	1080700	323244	221934	47364	50218	437940	351862	789802
3	**West Godavari**	774200	151000	774200	81166	183667	42016	25811	441540	265400	706940
4	**Rangareddy**	749300	34200	749300	73075	129267	59306	281654	205998	31893	237891
5	**Medak**	969900	835500	970000	91390	130099	53938	236538	458035	77955	535990
6	**Nizamabad**	795600	795600	795600	169343	134736	42107	181078	268336	161560	429896
7	**Adilabad**	1610500	1610500	1610500	689517	104593	42011	267603	506776	22913	529689
8	**Karimnagar**	1182300	1178700	1182300	250410	186036	78672	238095	429087	260189	689276
9	**Warangal**	1284600	724200	1284600	371014	112362	106682	242323	452219	141237	593456
10	**Khammam**	1602900	1616200	1602900	759438	217899	72853	99527	453183	56176	509359
	Sub Total	**11166100**	**7471200**	**11166200**	**3249763**	**1654132**	**592738**	**1704386**	**3965181**	**1441548**	**5406729**
ii)	**KARNATAKA**										
	Bidar	544800	448700	541765	27707	41133	44066	74554	354305	85141	439446
	Sub Total	**544800**	**448700**	**541765**	**27707**	**41133**	**44066**	**74554**	**354305**	**85141**	**439446**
iii)	**MADHYA PRADESH**										
1	**Betul**	1004300	224300	1007800	396718	72701	66529	53080	418772	152936	571708
2	**Mandla**	1326900	82400	965559	593228	53254	41315	62543	215219	67648	282867
3	**Chhindwara**	1181500	896100	1184923	479639	74437	75001	68829	487017	138959	625976
4	**Seoni**	875800	654000	875401	328341	60322	60763	53756	372219	133417	505636
5	**Balaghat**	922900	701400	924500	505004	57033	59984	29663	272816	69552	342368
	Sub Total	**5311400**	**2558200**	**4958183**	**2302930**	**317747**	**303592**	**267871**	**1766043**	**562512**	**2328555**
											Contd/…

iv)	**CHHATISGARH**										
1	**Rajnandgaon**	1112700	259000	802252	259292	67538	71886	45988	357548	97679	455227
2	**Raipur**	2125800	10600	1344628	524968	101593	129418	43386	545263	141057	686320
3	**Bastar**	3911400	3689300	1010288	497823	73350	92497	30300	316318	10065	326383
	Sub Total	**7149900**	**3958900**	**3157168**	**1282083**	**242481**	**293801**	**119674**	**1219129**	**248801**	**1467930**
v)	**MAHARASHTRA**										
1	**Nashik**	1553000	736100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Jalgaon**	1176500	6000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Ahmadnagar**	1704800	1089100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Pune**	1564300	14000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Solapur**	1489500	11900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Aurangabad**	1010700	899100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	**Jalana**	771800	771800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.

Contd/…

Table 14 : Land utilisation pattern by river basin and State for 2007-2008

(Area in hectare)

Sl. No.	Basin/State/District Name	District Area	District Basin Area	Reporting Area For Land Utilisation	Classification of Reporting Area					Area Sown more than once	Total Cropped Area
					Forest	Not available for Cultivation	Other uncultivated Lands Excluding Fallow Lands	Fallow Lands	Net Area Sown		
1	2	3	4	5	6	7	8	9	10	11	12
8	**Parbhani**	1104100	1104100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
9	**Beed**	1069300	946900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
10	**Nanded**	1052800	1052800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
11	**Osmanabad**	756900	226400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
12	**Latur**	715700	715700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
13	**Buldghana**	966100	384600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
14	**Akola**	1057400	374500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
15	**Amravati**	1221000	419600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
16	**Yavatmal**	1358200	1358200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
17	**Wardha**	630900	630900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
18	**Nagpur**	989200	989200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
19	**Bhandara**	932100	932100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
20	**Chandrapur**	1144300	1115700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
21	**Gadchiroli**	1441200	1441200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**23709803**	**15219904**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
v)	**ORISSA**										
1	**Kalahandi**	1177200	145300	792000	254000	92000	52000	21000	373000	225250	598250
2	**Koraput**	2696100	1629900	881000	188000	264000	106000	37000	286000	102880	388880
	Sub Total	**3873300**	**1775200**	**1673000**	**442000**	**356000**	**158000**	**58000**	**659000**	**328130**	**987130**
	Grand Total	**51755303**	**31432104**	**21496316**	**7304483**	**2611493**	**1392197**	**2224485**	**7963658**	**2666132**	**10629790**

Sources:- Directorate of Economics & Statistics, Ministry of Agriculture.

VI	**Basin : Krishna, Year 2007-2008**										
	ANDHRA PRADESH										
1	**Krishna**	872700	385400	872700	76186	216477	47997	55773	476267	261501	737768
2	**Anantapur**	1913000	451400	1913000	196978	304689	70500	226906	1113927	73944	1187871
3	**Guntoor +**	5975100	1567700	1139100	161941	191150	82229	79821	623959	207690	831649
4	**Prakasam**	1762600	N.A.	1762600	442499	329803	139358	204344	646596	46720	693316
5	**Nellore +**	1307600	N.A.	1307600	262787	390106	203353	106515	344839	65680	410519
6	**Kurnool**	1765800	N.A.	1765800	340669	265109	53730	212722	893570	141213	1034783
7	**Mahaboobnagar**	1843200	1843200	1843200	255596	169676	46472	599467	771989	55729	827718
8	**Rangareddy**	749300	715100	749300	73075	129267	59306	281654	205998	31893	237891
9	**Hyderabad**	21700	21700	21700	N.A.	21700	N.A.	0	0	2	2
10	**Medak**	969900	134400	970000	91390	130099	53938	236538	458035	77955	535990
11	**Karimnagar**	1182300	3600	1182300	250410	186036	78672	238095	429087	260189	689276
12	**Warangal**	1284600	560400	1284600	371014	112362	106682	242323	452219	141237	593456
13	**East Godavari**	1080700	N.A.	1080700	323244	221934	47364	50218	437940	351862	789802

Contd/…

Table 14 : Land utilisation pattern by river basin and State for 2007-2008

(Area in hectare)

Sl. No.	Basin/State/District Name	District Area	District Basin Area	Reporting Area For Land Utilisation	Classification of Reporting Area					Area Sown more than once	Total Cropped Area
					Forest	Not available for Cultivation	Other uncultivated Lands Excluding Fallow Lands	Fallow Lands	Net Area Sown		
1	2	3	4	5	6	7	8	9	10	11	12
14	**Khammam**	2683600	518300	1602900	759438	217899	72853	99527	453183	56176	509359
15	**Nalgonda**	1424000	1424000	1424000	83693	236902	103062	489096	511247	154889	666136
	Sub Total	**8625103**	**2640704**	**7544505**	**1879195**	**1105239**	**462579**	**1355806**	**2741721**	**1042319**	**3784031**
ii)	**KARNATAKA**										
1	**Belgaum**	1341500	1244900	1344382	190424	113710	40653	166574	833021	218926	1051947
2	**Bellary**	988500	988500	813196	97017	122100	33917	96101	464061	138377	602438

Contd/…

3	**Bidar**	544800	96100	541765	27707	41133	44207	98491	330227	80953	411180
4	**Bijapur**	1706900	1706900	1053471	1977	64906	16393	90982	879213	181628	1060841
5	**Chikmagalur**	720100	620800	722075	200485	70961	130839	23041	296749	26265	323014
6	**Chitradurga**	1085200	1085200	770702	73719	76646	121672	63229	435436	49114	484550
7	**Dharwad**	1373800	1188000	427329	35235	25732	6418	41450	318494	210027	528521
8	**Gulbarga**	1622400	1622400	1610208	69089	131107	51257	200985	1157770	287153	1444923
9	**Hassan**	681400	131800	662602	58775	109046	54042	71084	369655	71064	440719
10	**Raichur**	1401700	1401700	835843	18167	40647	44208	157270	575551	146967	722518
11	**Shimoga**	1055300	783500	847784	276855	101765	206638	41637	220889	35274	256163
12	**Tumkur**	1059800	393700	1064755	45177	151780	160128	99477	608193	56121	664314
13	**Uttar Kannada**	1029100	63700	1024679	813595	50656	28116	17620	114692	10571	125263
	Sub Total	**14610500**	**11327200**	11718791	1908222	1100189	938488	1167941	6603951	1512440	8116391
iii)	**MAHARASHTRA**										
1	**Ratnagiri**	820800	11700	N.A.	N.A	N .A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Ahmadnagar**	1704800	618000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Pune**	1564300	1548300	N.A	N.A.	N.A.	N.A.	N.A.	.N.A.	N.A.	N.A.
4	**Satara**	1048000	1048000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Sangli**	857200	857200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Solapur**	1489500	1488400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	**Kolhapur**	768500	758600	N.A.	N.A	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
8	**Bid**	1069300	156700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
9	**Osmanabad+**	1472600	455600	N.A	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
10	**Latur**	737200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**11532200**	**6942500**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Grand Total	**34767803**	**20910404**	**19263296**	**3787417**	**2205428**	**1401067**	**2523747**	**9345672**	**2554759**	**11900422**

Sources:- Directorate of Economics & Statistics, Ministry of Agriculture. (data taken from Internet)

Note : 1. Totals may not tally due to rounding off. 2. N.A. : Not availabe data.

3. Estimated on the basis of the percentage of the area of each district, within the basin, to the district as a whole.

Contd/…

Table 14 : Land utilisation pattern by river basin and State for 2007-2008

(Area in hectare)

Sl. No.	Basin/State/District Name	District Area	District Basin Area	Reporting Area For Land Utilisation	Classification of Reporting Area					Area Sown more than once	Total Cropped Area
					Forest	Not available for Cultivation	Other uncultivated Lands Excluding Fallow Lands	Fallow Lands	Net Area Sown		
1	2	3	4	5	6	7	8	9	10	11	12
VII	**Basin : Cauvery, Year 2007-2008**										
i)	**KARNATAKA**										
1	**Bangalore**	219000	171500	217410	5055	116347	17616	19508	58884	1930	60814
2	**Bangalore R.**	581500	395500	229519	11322	50965	20004	43376	103852	30232	134084
3	**Chikmagalur**	722075	84800	722075	200485	70961	130839	23041	296749	26265	323014
4	**Hassan**	681400	489600	662602	58775	109046	54042	71084	369655	71064	440719
5	**Kodagu (Coorg)**	410200	217200	410775	134597	54971	47354	6501	167352	11877	179229
6	**Mandya**	496100	496100	498244	24765	82425	83386	73723	233945	49983	283928
7	**Mysore**	1195400	1195400	676382	62851	112840	83587	75798	341306	238433	579739
8	**Tumkur**	1059800	445300	1064755	45177	151780	160128	99477	608193	56121	664314
	Sub Total	**5365475**	**3495400**	**4481762**	**543027**	**749335**	**596956**	**412508**	**2179936**	**485905**	**2665841**
ii)	**KERALA**										
1	**Kannur**	297112	65000	297112	48734	36453	6193	6939	198793	19813	218606
2	**Wayanad**	213100	-	212966	78787	16014	1208	1503	115454	84605	200059
3	**Kozhikode**	447500	120000	234641	41386	32101	1552	3236	156366	55210	211576
4	**Palakkad**	448000	57500	447584	136257	60408	27859	26273	196787	125384	322171
5	**Idukki**	501900	40000	436328	198413	25692	1936	1924	208363	87420	295783
	Sub Total	**1907612**	**282500**	**1628631**	**503577**	**170668**	**38748**	**39875**	**875763**	**372432**	**1248195**
iii)	**TAMIL NADU**										
1	**Dharmapuri +**	1827100	1042100	449777	164177	67216	12956	47041	158387	21995	180382
2	**Salem**	520530	N.A.	520530	125682	98036	12472	80240	204100	14323	218423

Contd/…

3	**South Arcot**	1089500	62500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Coimbatore+Periyar**	1567800	1323800	747079	158801	116503	16552	147872	307351	14175	321526
5	**Nilgiri**	254900	209900	254485	142577	13351	10880	10105	77572		77572
6	**Madurai +**	1262300	445300	374173	48473	88371	9764	85740	141825	9151	150976
7	**Dindigul**	626664	N.A.	626664	138923	102325	20258	128937	236221	8955	245176
8	**Pudukottai**	1574700	1117200	466329	23535	139670	43734	107630	151760	894	152654
9	**Triuchirapalli**	511400	N.A.	440383	36773	97710	10054	121566	174280	17702	191982
10	**Thanjavur**	828000	543000	339657	3390	83678	19058	38220	195311	84909	280220
	Sub Total	**10062894**	**4743800**	**4219077**	**842331**	**806860**	**155728**	**767351**	**1646807**	**172104**	**1818911**
iv)	**PONDICHERY**										
1	**Karaikal**	49200	16000	16012	-	4905	2835	1884	6388	4153	10541
2	**Sub Total**	**49200**	**16000**	16012	-	4905	2835	1884	6388	4153	10541
	Grand Total	**17385181**	**8537700**	**10345482**	**1888935**	**1731768**	**794267**	**1221618**	**4708894**	**1034594**	**5743488**

Sources: Directorate of Economics & Statistics, Ministry of Agriculture.

Contd/…

Table 14 : Land utilisation pattern by river basin and State for 2007-2008

(Area in hectare)

Sl. No.	Basin/State/District Name	District Area	District Basin Area	Reporting Area For Land Utilisation	Classification of Reporting Area					Area Sown more than once	Total Cropped Area
					Forest	Not available for Cultivation	Other uncultivated Lands Excluding Fallow Lands	Fallow Lands	Net Area Sown		
1	2	3	4	5	6	7	8	9	10	11	12
VIII	**Basin : East Folowing Rivers from Mahanadi to Kanyakumari, Year 2007-2008**										
i)	**ANDHRA PRADESH**										
1	**Srikakulam**	2353700	1983300	583700	68641	149938	10176	27707	327238	132922	460160
2	**Vizianagaram**	653900	N.A	653900	119303	151428	15067	44943	323159	106423	429582
3	**Vishakhapatnam**	1116100	N.A	1116100	441166	233539	47789	81539	312067	72363	384430
4	**East Godavari**	1854900	619300	1080700	323244	221934	47364	50218	437940	351862	789802
5	**West Godavari**	778000	N.A	774200	81166	183667	42016	25811	441540	265400	706940
6	**Krishna**	872700	487300	872700	76186	216477	47997	55773	476267	261501	737768
7	**Guntur+**	5975100	2997800	1139100	161941	191150	82229	79821	623959	207690	831649
8	**Prakasam+**	1762600	N.A.	1762600	442499	329803	139358	204344	646596	46720	693316
9	**Nellore**	1307600	N.A	1307600	262787	390106	203353	106515	344839	65680	410519
10	**Khammam**	1602900	549100	1602900	759438	217899	72853	99527	453183	56176	509359
11	**kurnool**	1765800	N.A	1765800	340669	265109	53730	212722	893570	141213	1034783
12	**Chittoor**	1515200	1030000	1515100	452018	300741	104612	292563	365166	43346	408512
	Sub Total	**21558500**	**7666800**	**14174400**	**3529058**	**2851791**	**866544**	**1281483**	**5645524**	**1751296**	**7396820**
ii)	**KARNATAKA**										
1	**Bangalore**	219000	47500	217410	5055	116347	17616	19508	58884	1930	60814
2	**Bangalore R.**	581500	142500	229519	11322	50965	20004	43376	103852	30232	134084
3	**Kolar**	822300	465700	374966	20620	74547	52824	54114	172861	6494	179355
	Sub Total	**1622800**	**655700**	**821895**	**36997**	**241859**	**90444**	**116998**	**335597**	**38656**	**374253**

Contd/…

iii)	**KERALA**										
	Thiruvantrum	219200	300	218781	49861	24711	542	2786	140881	17946	158827
	Sub Total	**219200**	**300**	**218781**	**49861**	**24711**	**542**	**2786**	**140881**	**17946**	**158827**
iv)	**ORISSA**										
1	**Phulbani**	1111900	204400	802000	571000	39000	58000	12000	122000	65020	187020
2	**Kalahandi**	1177200	50000	792000	254000	92000	52000	21000	373000	225250	598250
3	**Koraput**	2696100	868500	881000	188000	264000	106000	37000	286000	102880	388880
4	**Ganjam**	1253100	1253100	821000	315000	41000	53000	31000	381000	306960	687960
5	**Puri**	1018200	412100	348000	14000	123000	21000	53000	137000	151830	288830
	Sub Total	**7256500**	**2788100**	**3644000**	**1342000**	**559000**	**290000**	**154000**	**1299000**	**851940**	**2150940**
v)	**TAMIL NADU**										
1	**Chennai**	17400	17400	17098	300	16798	-	0	0	-	0
2	**Chengai-Anna**	785700	785700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**North Arcot**	607700	607700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Dharmapuri+**	1827100	785000	449777	164177	67216	12956	47041	158387	21995	180382
5	**Salem**	520530	N.A	520530	125682	98036	12472	80240	204100	14323	218423
6	**Tiruchirapalli**	619100	619100	440383	36773	97710	10054	121566	174280	17702	191982
7	**South Arcot**	1089500	1027000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.

Contd/…

Table 14 : Land utilisation pattern by river basin and State for 2007-2008

(Area in hectare)

Sl. No.	Basin/State/District Name	District Area	District Basin Area	Reporting Area For Land Utilisation	Classification of Reporting Area					Area Sown more than once	Total Cropped Area
					Forest	Not available for Cultivation	Other uncultivated Lands Excluding Fallow Lands	Fallow Lands	Net Area Sown		
1	2	3	4	5	6	7	8	9	10	11	12
8	**Dindugul +**	1262300	817000	626664	138923	102325	20258	128937	236221	8955	245176
9	**Madurai**	374173	N.A	374173	48473	88371	9764	85740	141825	9151	150976
10	**Thanjavur**	828000	285000	339657	3390	83678	19058	38220	195311	84909	280220
11	**Pudukottai**	465100	465100	466329	23535	139670	43734	107630	151760	894	152654
12	**PMT+**	1260100	1260100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
13	**Kamarajar+**	344573	N.A	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
14	**Ramanathpuram**	417500	N.A	408957	4488	91277	43274	82751	187167	-	187167
15	**Chidambaranar+**	1143100	1143100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
16	**Tirunelveli**	682300	N.A	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
17	**Kanyakumari**	168400	168400	167200	54155	32262	812	0	79971	11029	91000
	Sub Total	**12412579**	**7980604**	**3810773**	**599902**	**817350**	**172390**	**692134**	**1529032**	**168969**	**1697992**
vi)	**PONDICHERY**										
	Pondicherry (District)	49200	29300	29378	-	11882	2167	3064	12265	10146	22411
	Sub Total	**49200**	**29300**	**29378**	**-**	**11882**	**2167**	**3064**	**12265**	**10146**	**22411**
	Basin : Penner, Year 2007-2008										
i)	**ANDHRA PRADESH**										
1	**Kurnool**	1765800	1409600	1765800	340669	265109	53730	212722	893570	141213	1034783
2	**Cuddapah**	1535900	1535900	1535900	500295	402085	66144	174955	392421	79832	472253
3	**Anantapur**	1913000	1461600	1913000	196978	304689	70500	226906	1113927	73944	1187871
4	**Prakasam+**	1762600	N.A.	1762600	442499	329803	139358	204344	646596	46720	693316
5	**Guntur+**	5975100	1567700	1139100	161941	191150	82229	79821	623959	207690	831649

Contd/…

6	**Nellore+**	1307600	N.A.	1307600	262787	390106	203353	106515	344839	65680	410519
7	**Chittor**	1535900	N.A.	1515100	452018	300741	104612	292563	365166	43346	408512
	Sub Total	**15795900**	**5974800**	**10939100**	**2357187**	**2183683**	**719926**	**1297826**	**4380478**	**658425**	**5038903**
ii)	**KARNATAKA**										
1	**Bangalore R.**	581500	43500	229519	11322	50965	20004	43376	103852	30232	134084
2	**Kolar**	822300	356600	374966	20620	74547	52824	54114	172861	6494	179355
3	**Tumkur**	1059800	220800	1064755	45177	151780	160128	99477	608193	56121	664314
	Sub Total	**2463600**	**620900**	**1669240**	**77119**	**277292**	**232956**	**196967**	**884906**	**92847**	**977753**
	Grand Total	**61378276**	**25716500**	**35307567**	**7992124**	**6967568**	**2374969**	**3745258**	**14227683**	**3590225**	**17817899**
IX	**Basin : West Flowing Rivers fro Kanyakumari to Tapi**										
i)	**DADRA & NAGAR HAVELI**										
1	**Daman & Diu**	11200	7200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Dadra & Nagar Haveli**	49100	49100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**60300**	**56300**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
ii)	**Goa**	370200	370200	361113	125473	37137	54714	9581	134208	35310	169518
	Sub Total	**370200**	**370200**	361113	125473	37137	54714	9581	134208	35310	169518
iii)	**GUJARAT**										
1	**Surat**	765700	282700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Valsad**	524400	524400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.

Contd/…

Table 14 : Land utilisation pattern by river basin and State for 2007-2008

(Area in hectare)

Sl. No.	Basin/State/District Name	District Area	District Basin Area	Reporting Area For Land Utilisation	Classification of Reporting Area					Area Sown more than once	Total Cropped Area
					Forest	Not available for Cultivation	Other uncultivated Lands Excluding Fallow Lands	Fallow Lands	Net Area Sown		
1	2	3	4	5	6	7	8	9	10	11	12
3	**Dangs**	176400	176400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**176403**	**176404**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
iv)	**KARNATAKA**										
1	**Belgaum**	1341500	96600	1344382	190424	113710	40653	166574	833021	218926	1051947
2	**Dharwad**	1373800	185800	427329	35235	25732	6418	41450	318494	210027	528521
3	**Chikmaglur**	722075	14500	722075	200485	70961	130839	23041	296749	26265	323014
4	**Dak. Kannada**	844100	844100	477149	128476	122853	82409	13012	130399	27780	158179
5	**Hassan**	681400	60000	662602	58775	109046	54042	71084	369655	71064	440719
6	**Kodagu**	410200	193000	410775	134597	54971	47354	6501	167352	11877	179229
7	**Shimoga**	1055300	271800	847784	276855	101765	206638	41637	220889	35274	256163
8	**Utt. Kannada**	1029100	120000	1024679	813595	50656	28116	17620	114692	10571	125263
	Sub Total	**7457475**	**1785800**	5916775	1838442	649694	596469	380919	2451251	611784	3063035
v)	**KERALA**										
1	**Kasargod**	199200	199200	199166	5625	37472	14690	5060	136319	8764	145083
2	**Kannur**	296600	231600	297112	48734	36453	6193	6939	198793	19813	218606
3	**Kozhikode**	447500	327500	234641	41386	32101	1552	3236	156366	55210	211576
4	**Malappuram**	355000	355000	355446	103417	45826	5656	15386	185161	61870	247031
5	**Palakkad**	448000	390500	447584	136257	60408	27859	26273	196787	125384	322171
6	**Thrissur**	303200	303200	302919	103619	42804	6479	20667	129350	44871	174221
7	**Ernakulam**	240700	240700	305826	70617	52139	8314	15057	159699	25074	184773
8	**Idukki**	501900	461900	436328	198413	25692	1936	1924	208363	87420	295783
9	**Kottayam**	220300	220300	220442	8141	31441	6737	7257	166866	49036	215902
10	**Alappuzha**	141400	141400	141011	-	33327	14109	9096	84479	24976	109455

Contd/…

11	**Pathanamthitt**	264200	264200	265277	155214	18244	3029	6621	82169	24537	106706
12	**Kollam**	249100	249100	248788	81438	31573	1073	6362	128342	42559	170901
13	**Thiruvantrum**	219200	218900	218781	49861	24711	542	2786	140881	17946	158827
	Sub Total	**3886300**	**3603500**	3673321	1002722	472191	98169	126664	1973575	587460	2561035
vi)	**MAHARASHTRA**										
1	**Mumbai Sub**	60300	60300	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Thane**	955800	955800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Raigarh**	715200	715200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Sindhudurg**	1341500	1329800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Nasik**	1553000	420600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Dhule**	1315000	7500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	**Kolhapur**	768500	9900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**6709300**	**3499100**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**

Contd/…

Table 14 : Land utilisation pattern by river basin and State for 2007-2008

(Area in hectare)

Sl. No.	Basin/State/District Name	District Area	District Basin Area	Reporting Area For Land Utilisation	Classification of Reporting Area					Area Sown more than once	Total Cropped Area
					Forest	Not available for Cultivation	Other uncultivated Lands Excluding Fallow Lands	Fallow Lands	Net Area Sown		
1	2	3	4	5	6	7	8	9	10	11	12
vii)	**TAMIL NADU**										
1	**The Nilgiri**	254900	45000	254485	142577	13351	10880	10105	77572	-	77572
2	**Coimbatore**	746900	244000	747079	158801	116503	16552	147872	307351	14175	321526
	Sub Total	**1001800**	**289000**	**1001564**	**301378**	**129854**	**27432**	**157977**	**384923**	**14175**	**399098**
viii)	**PONDICHERY**										
1	**Yanam**	3000	3000	2391	-	1194	498	90	609	511	1120
2	**Mahe**	900	900	870	-	232	15	16	607	3	610
	Sub Total	**3900**	**3900**	**3261**	**0**	**1426**	**513**	**106**	**1216**	**514**	**1730**
	Grand Total	**19665678**	**9784204**	**10956034**	**3268015**	**1290302**	**777297**	**675247**	**4945173**	**1249243**	**6194416**
X	**Basin : Tapi, Year 2007-2008**										
	<---------- Not Available Data ---------->										
XI	**Basin : Narmada, Year 2007-2008**										
i)	**GUJARAT**										
1	**Vadodara**	779400	396000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Bharuch**	903800	468000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Surat**	765700	18000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**2448900**	**882000**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
ii)	**MADHYA PRADESH**										
1	**Sagar**	1025200	171600	1022759	298010	67910	93664	23518	539657	270464	810121
2	**Damoh**	730600	65100	728583	267109	91536	47566	10565	311807	155422	467229
3	**Dewas**	702000	394400	701307	206636	46755	58315	1238	388363	236249	624612

Contd/…

4	**Jhabua**	678200	335700	675716	131877	140819	33967	9324	359729	77882	437611
5	**Dhar**	815300	471400	819541	120632	129385	62143	5298	502083	274468	776551
6	**Indore**	389800	97400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	**West Nimar (khargaon)**	1345000	1171000	818657	247663	68533	87118	10426	404917	83130	488047
8	**East Nimar (Khandwa)**	1077900	725900	775616	309276	90912	55802	17695	301931	87907	389838
9	**Vidisha**	737100	46100	730197	109615	47086	35675	5669	532152	196720	728872
10	**Sehore**	657800	225600	656368	172616	46080	48670	3625	385377	255438	640815
11	**Raisen**	846600	467800	848746	333672	43350	36411	3294	432019	130409	562428
12	**Betul**	1004300	370000	1007800	396718	72701	66529	53080	418772	152936	571708
13	**Hoshangabad**	1003700	1003700	668689	256081	46180	51353	13148	301927	213352	515279
14	**Jabalpur**	1016000	648300	519757	77655	73793	62615	31505	274189	103208	377397
15	**Narsimhapur**	513300	513300	513651	136512	25846	38792	8154	304347	95372	399719
16	**Mandla**	1326900	1139500	965559	593228	53254	41315	62543	215219	67648	282867
17	**Chhindwara**	1181500	285400	1184923	479639	74437	75001	68829	487017	138959	625976
18	**Seoni**	875800	221800	875401	328341	60322	60763	53756	372219	133417	505636
19	**Balaghat**	922900	221500	924500	505004	57033	59984	29663	272816	69552	342368
20	**Shahdol**	1402800	77800	561006	227886	54005	48620	59524	170971	25438	196409
	Sub Total	**18252700**	**8653300**	**14998776**	**5198170**	**1289937**	**1064303**	**470854**	**6975512**	**2767971**	**9743483**

Contd/…

Table 14 : Land utilisation pattern by river basin and State for 2007-2008

(Area in hectare)

Sl. No.	Basin/State/District Name	District Area	District Basin Area	Reporting Area For Land Utilisation	Classification of Reporting Area					Area Sown more than once	Total Cropped Area
					Forest	Not available for Cultivation	Other uncultivated Lands Excluding Fallow Lands	Fallow Lands	Net Area Sown		
1	2	3	4	5	6	7	8	9	10	11	12
iii)	**CHHATISGARH**										
1	**Rajnandgaon**	1112700	97200	802252	259292	67538	71886	45988	357548	97679	455227
	Sub Total	**1112700**	**97200**	**802252**	**259292**	**67538**	**71886**	**45988**	**357548**	**97679**	**455227**
iv)	**MAHARASHTRA**										
	Dhule	1315000	396000	N.A	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**1315000**	**396000**	N.A	N.A	N.A	N.A	N.A	N.A	N.A	N.A
	Grand Total	**23129300**	**10028500**	**15801028**	**5457462**	**1357475**	**1136189**	**516842**	**7333060**	**2865650**	**10198710**
XII	**Basin : Mahi and Sabarmati**										
i)	**GUJARAT**										
1	**Kheda**	719400	105000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Panchmahals**	886600	885600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Vadodara**	779400	383400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Bharuch**	903800	294800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**3289200**	**1668800**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
ii)	**MADHYA PRADESH**										
1	**Ratlam**	486100	180700	486007	34295	72577	43332	2551	333252	170215	503467
2	**Jhabua**	678200	342500	675716	131877	140819	33967	9324	359729	77882	437611
3	**Dhar**	815300	150000	819541	120632	129385	62143	5298	502083	274468	776551
4	**Mandsaur**	979100	3300	551790	40593	121053	30181	2372	357591	178705	536296
	Sub Total	**2958700**	**676500**	**2533054**	**327397**	**463834**	**169623**	**19545**	**1552655**	**701270**	**2253925**

Contd/…

iii)	**RAJASTHAN**										
1	**Udaipur**	1727900	637500	1462105	419657	485955	209417	81377	265699	120462	386161
2	**Chittorgarh**	1085600	289700	1035826	196084	134803	228956	40660	435323	255342	690665
3	**Dungarpur**	377000	327000	385593	62204	94382	58168	41486	129353	63219	192572
4	**Bansewara**	503700	503700	506257	113570	68500	42041	41849	240297	120997	361294
	Sub Total	**3694200**	**1757900**	**3389781**	**791515**	**783640**	**538582**	**205372**	**1070672**	**560020**	**1630692**
b)	**Basin: Sabarmati**										
i)	**GUJARAT**										
1	**Surendranagar**	1048900	365000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Banaskantha**	1270300	52500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Sabarkantha**	739000	739000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Mahesana**	902700	102000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Gandhinagar**	64900	64900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Ahmedabad**	870700	460000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	**Kheda**	719400	614400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**5615900**	**2397800**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**

Contd/…

Table 14 : Land utilisation pattern by river basin and State for 2007-2008

(Area in hectare)

Sl. No.	Basin/State/District Name	District Area	District Basin Area	Reporting Area For Land Utilisation	Classification of Reporting Area					Area Sown more than once	Total Cropped Area
					Forest	Not available for Cultivation	Other uncultivated Lands Excluding Fallow Lands	Fallow Lands	Net Area Sown		
1	2	3	4	5	6	7	8	9	10	11	12
ii)	**RAJASTHAN**										
1	**Sirohi**	513600	10000	517947	155461	100070	42874	56754	162788	63136	225924
2	**Udaipur**	1727900	258900	1462105	419657	485955	209417	81377	265699	120462	386161
3	**Dungarpur**	377000	50000	385593	62204	94382	58168	41486	129353	63219	192572
	Sub Total	**2618500**	**318900**	**2365645**	**637322**	**680407**	**310459**	**179617**	**557840**	**246817**	**804657**
c)	**Basin : Luni & Others**										
i)	**GUJARAT**										
1	**Jamnagar**	1412500	1412500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Rajkot**	1120300	1120300	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Surendranagar**	1048900	683900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Bhavnagar**	1115500	1115500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Amreli**	676000	676000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Junagadh**	1060700	1060700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	**Kachch**	4565200	4565200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
8	**Banaskantha**	1270300	1217800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
9	**Mahesana**	902700	800700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
10	**Ahemdabad**	870700	410700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**14042800**	**13063300**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
ii)	**RAJASTHAN**										
1	**Ajmer**	848100	84900	843604	56209	139062	150759	75501	422073	41202	463275
2	**Jodhpur**	2285000	685500	2256405	6996	225495	162728	606526	1254660	124033	1378693
3	**Nagaur**	1771800	708900	1764380	18553	145666	86879	243577	1269705	194246	1463951

Contd/…

4	**Pali**	1238700	1238700	1233079	85274	199129	130911	198721	619044	87133	706177
5	**Jalor**	1064000	1064000	1056602	22063	123093	78856	155913	676677	178222	854899
6	**Sirohi**	513600	503600	517947	155461	100070	42874	56754	162788	63136	225924
	Sub Total	**7721200**	**4285600**	**7672017**	**344556**	**932515**	**653007**	**1336992**	**4404947**	**687972**	**5092919**
iii)	**Daman& Diu**										
	Diu	11200	4000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**11200**	**4000**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
	Grant Total	**39951700**	**24172800**	**15960497**	**2100790**	**2860396**	**1671671**	**1741526**	**7586114**	**2196079**	**9782193**

Sources:- Directorate of Economics & Statistics, Ministry of Agriculture. (Data received from DES website)

Table 14 : Land utilisation pattern by river basin and State for 2008-2009

(Area in hectare)

Sl. No.	Basin/State/District Name	District Area	District Basin Area	Reporting Area For Land Utilisation	Classification of Reporting Area					Area Sown more than once	Total Cropped Area
					Forest	Not available for Cultivation	Other uncultivated Lands Excluding Fallow Lands	Fallow Lands	Net Area Sown		
1	2	3	4	5	6	7	8	9	10	11	12
I	**Basin : Mahanadi, Year 2008-2009**										
i)	**JHARKHAND**										
	Gumla	907700	63500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**907700**	**63500**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
ii)	**ORISSA**										
1	**Sambalpur**	1751600	1390400	666000	363000	56000	36000	47000	164000	117590	281590
2	**Sundergarh**	971200	410000	971000	496000	95000	67000	21000	292000	85670	377670
3	**Cuttak**	1114200	752800	393000	79000	93000	32000	32000	157000	152390	309390
4	**Dhenkanal**	1082700	311000	445000	174000	47000	18000	51000	155000	107790	262790
5	**Phulbani**	1111900	907500	802000	571000	39000	58000	16000	118000	72250	190250
6	**Balangir**	891300	891300	657000	154000	76000	68000	35000	324000	148050	472050
7	**Kalahandi**	1177200	981900	792000	254000	92000	52000	19000	375000	231140	606140
8	**Koraput**	2696100	197700	881000	188000	264000	106000	32000	291000	103290	394290
9	**Puri**	1018200	606100	348000	14000	123000	21000	56000	134000	152700	286700
	Sub Total	**11814400**	**6448700**	**5955000**	**2293000**	**885000**	**458000**	**309000**	**2010000**	**1170870**	**3180870**
iii)	**MADHYA PRADESH**										
1	**Shahdol**	1402800	8400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**1402800**	**8400**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
iv)	**CHHATISGARH**										
1	**Surguja**	2233700	496200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Bilaspur**	1989700	1895700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.

Contd/…

3	**Raigarh**	1292400	1090600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Rajnandgaon**	1112700	756500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Durg**	853700	853700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Raipur**	2125800	2115200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	**Bastar**	3911400	222100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**13519400**	**7430000**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
v)	**MAHARASHTRA**										
1	**Chandrapur+**	2585500	28600	NA	NA	NA	NA	NA	NA	NA	NA
2	**Gadchiroli**	1441200	N.A.	NA	NA	NA	NA	NA	NA	NA	NA
	Sub Total	**4026700**	**28600**	NA	NA	NA	NA	NA	NA	NA	NA
	Grand Total	**31671000**	**13979200**	**5955000**	**2293000**	**885000**	**458000**	**309000**	**2010000**	**1170870**	**3180870**

Contd/…

Table 14 : Land utilisation pattern by river basin and State for 2008-2009

(Area in hectare)

Sl. No.	Basin/State/District Name	District Area	District Basin Area	Reporting Area For Land Utilisation	Classification of Reporting Area					Area Sown more than once	Total Cropped Area
					Forest	Not available for Cultivation	Other uncultivated Lands Excluding Fallow Lands	Fallow Lands	Net Area Sown		
1	2	3	4	5	6	7	8	9	10	11	12
II	**Subernarekha, Burhabalang and Baitarni, Year 2008-2009**										
i)	**JHARKHAND**										
1	**Ranchi**	769800	488000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Singhbhum**	1344000	902100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**2113800**	**1390100**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
ii)	**ORISSA**										
1	**Mayurbhanj**	1041800	751800	1042000	439000	74000	79000	52000	398000	120840	518840
2	**Balasore**	631100	472100	381000	33000	43000	50000	39000	216000	116610	332610
	Sub Total	**1672900**	**1223900**	**1423000**	**472000**	**117000**	**129000**	**91000**	**614000**	**237450**	**851450**
iii)	WEST BENGAL										
1	Midnapur(East)	1408100	311600	396594	899	102045	2674	3009	287967	231955	519922
2	Purulia	625900	101800	625646	75048	108645	13508	111353	317092	56815	373907
	Sub Total	**2034000**	**413400**	**1022240**	**75947**	**210690**	**16182**	**114362**	**605059**	**288770**	**893829**
	Grand Total	**5820700**	**3027400**	**2445240**	**547947**	**327690**	**145182**	**205362**	**1219059**	**526220**	**1745279**
III	**Basin : Brahamani, Year 2008-2009**										
i)	**JHARKHAND**										
1	**Lohardaga**	149100	89100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Gumla**	907700	794200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Ranchi**	769800	230000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Pa. Singhbhum**	1344000	412000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**3170600**	**1525300**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.

Contd/…

ii)	**MADHYA PRADESH**										
	Raigarh	1292400	126800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**1292400**	**126800**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
iii)	**ORISSA**										
1	**Sambalpur**	1751600	361200	666000	363000	56000	36000	47000	164000	117590	281590
2	**Sundergarh**	971200	561200	971000	496000	95000	67000	21000	292000	85670	377670
3	**Keonjhar**	830300	830300	830000	310000	170000	52000	8000	290000	149950	439950
4	**Mayurbhanj**	1041800	290000	1042000	439000	74000	79000	52000	398000	120840	518840
5	**Balasore**	631100	159000	381000	33000	43000	50000	39000	216000	116610	332610
6	**Cuttak**	1114200	361400	393000	79000	93000	32000	32000	157000	152390	309390
7	**Dhenkanal**	1082700	771700	445000	174000	47000	18000	51000	155000	107790	262790
	Sub Total	**7422900**	**3334800**	**4728000**	**1894000**	**578000**	**334000**	**250000**	**1672000**	**850840**	**2522840**
	Grand Total	**11885900**	**4986900**	**4728000**	**1894000**	**578000**	**334000**	**250000**	**1672000**	**850840**	**2522840**

IV Rushikulya, Vamsadhra, Sarada and Nagavali, Year 2008-2009

<---------- Not Available Data ---------->

Contd/…

Table 14 : Land utilisation pattern by river basin and State for 2008-2009

(Area in hectare)

Sl. No.	Basin/State/District Name	District Area	District Basin Area	Reporting Area For Land Utilisation	Classification of Reporting Area					Area Sown more than once	Total Cropped Area
					Forest	Not available for Cultivation	Other uncultivated Lands Excluding Fallow Lands	Fallow Lands	Net Area Sown		
1	2	3	4	5	6	7	8	9	10	11	12
V	**Basin : Godavari, Year 2008-2009**										
i)	**ANDHRA PRADESH**										
1	**Visakhapatnam**	1116100	370400	1116100	441166	233539	48317	85206	307872	72055	379927
2	**East Godavari**	1080700	154900	1080700	323244	223454	46915	60322	426765	312506	739271
3	**West Godavari**	774200	151000	774200	81166	187221	39850	25574	440389	284195	724584
4	**Rangareddy**	749300	34200	749300	73075	129789	59307	286402	200727	23955	224682
5	**Medak**	969900	835500	969900	91390	130328	53938	261008	433336	111634	544970
6	**Nizamabad**	795600	795600	795600	169343	135161	41690	159032	290374	185577	475951
7	**Adilabad**	1610500	1610500	1610500	689517	104604	37475	181929	596975	94097	691072
8	**Karimnagar**	1182300	1178700	1182300	250410	186056	78673	197375	469786	286821	756607
9	**Warangal**	1284600	724200	1284600	371014	112398	106426	217447	477315	161317	638632
10	**Khammam**	1602900	1616200	1602900	759438	218116	72811	82825	469710	55242	524952
	Sub Total	**11166100**	**7471200**	**11166100**	**3249763**	**1660666**	**585402**	**1557120**	**4113249**	**1587399**	**5700648**
ii)	**KARNATAKA**										
	Bidar	544800	448700	541765	27707	41133	44285	88547	340093	60089	400182
	Sub Total	**544800**	**448700**	541765	27707	41133	44285	88547	340093	60089	400182
iii)	**MADHYA PRADESH**										
1	**Betul**	1004300	224300	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Mandla**	1326900	82400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Chhindwara**	1181500	896100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Seoni**	875800	654000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Balaghat**	922900	701400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**5311400**	**2558200**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
iv)	**CHHATISGARH**										
1	**Rajnandgaon**	1112700	259000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Raipur**	2125800	10600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.

Contd/…

3	**Bastar**	3911400	3689300	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**7149900**	**3958900**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
v)	**MAHARASHTRA**										
1	**Nashik**	1553000	736100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Jalgaon**	1176500	6000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Ahmadnagar**	1704800	1089100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Pune**	1564300	14000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Solapur**	1489500	11900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Aurangabad**	1010700	899100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	**Jalana**	771800	771800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.

Contd/…

Table 14 : Land utilisation pattern by river basin and State for 2008-2009

(Area in hectare)

Sl. No.	Basin/State/District Name	District Area	District Basin Area	Reporting Area For Land Utilisation	Classification of Reporting Area					Area Sown more than once	Total Cropped Area
					Forest	Not available for Cultivation	Other uncultivated Lands Excluding Fallow Lands	Fallow Lands	Net Area Sown		
1	2	3	4	5	6	7	8	9	10	11	12
8	**Parbhani**	1104100	1104100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
9	**Beed**	1069300	946900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
10	**Nanded**	1052800	1052800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
11	**Osmanabad**	756900	226400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
12	**Latur**	715700	715700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
13	**Buldghana**	966100	384600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
14	**Akola**	1057400	374500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
15	**Amravati**	1221000	419600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
16	**Yavatmal**	1358200	1358200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
17	**Wardha**	630900	630900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.

Contd/…

18	**Nagpur**	989200	989200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
19	**Bhandara**	932100	932100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
20	**Chandrapur**	1144300	1115700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
21	**Gadchiroli**	1441200	1441200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**23709803**	**15219904**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
vi)	**ORISSA**										
1	**Kalahandi**	1177200	145300	792000	254000	92000	52000	19000	375000	231140	606140
2	**Koraput**	2696100	1629900	881000	188000	264000	106000	32000	291000	103290	394290
	Sub Total	**3873300**	**1775200**	**1673000**	**442000**	**356000**	**158000**	**51000**	**666000**	**334430**	**1000430**
	Grand Total	**51755300**	**31432100**	**13380865**	**3719470**	**2057799**	**787687**	**1696667**	**5119342**	**1981918**	**7101260**
Sources:- Directorate of Economics & Statistics, Ministry of Agriculture.											
VI	**Basin : Krishna, Year 2008-2009**										
	ANDHRA PRADESH										
1	**Krishna**	872700	385400	872700	76186	216682	47294	47166	485372	270870	756242
2	**Anantapur**	1913000	451400	1913000	196978	304689	71197	257378	1082758	70872	1153630
3	**Guntoor +**	5975100	1567700	1139100	161941	191191	81413	93612	610943	220895	831838
4	**Prakasam**	1762600	N.A.	1762600	442499	330324	138709	218460	632608	31514	664122
5	**Nellore +**	1307600	N.A.	1307600	262787	392787	199979	113018	339029	78978	418007
6	**Kurnool**	1765800	N.A.	1765800	340669	265892	53609	216508	889122	104564	993686
7	**Mahaboobnagar**	1843200	1843200	1843200	255596	169830	43247	633863	740664	68977	809641
8	**Rangareddy**	749300	715100	749300	73075	129789	59307	286402	200727	23955	224682
9	**Hyderabad**	21700	21700	21700	N.A.	21700	N.A.	N.A.	N.A.	N.A.	N.A.
10	**Medak**	969900	134400	969900	91390	130328	53938	261008	433336	111634	544970
11	**Karimnagar**	1182300	3600	1182300	250410	186056	78673	197375	469786	286821	756607
12	**Warangal**	1284600	560400	1284600	371014	112398	106426	217447	477315	161317	638632
13	**East Godavari**	1080700	N.A.	1080700	323244	223454	46915	60322	426765	312506	739271
14	**Khammam**	2683600	518300	1602900	759438	218116	72811	82825	469710	55242	524952
15	**Nalgonda**	1424000	1424000	1424000	83693	236478	102968	447313	553548	175258	728806
	Sub Total	**24836100**	**7625200**	**18919400**	**3688920**	**3129714**	**1156486**	**3132697**	**7811683**	**1973403**	**9785086**

Contd/…

Table 14 : Land utilisation pattern by river basin and State for 2008-2009

(Area in hectare)

Sl. No.	Basin/State/District Name	District Area	District Basin Area	Reporting Area For Land Utilisation	Classification of Reporting Area					Area Sown more than once	Total Cropped Area
					Forest	Not available for Cultivation	Other uncultivated Lands Excluding Fallow Lands	Fallow Lands	Net Area Sown		
1	2	3	4	5	6	7	8	9	10	11	12
ii)	**KARNATAKA**										
1	**Belgaum**	1341500	1244900	1344382	190424	113853	39357	202459	798289	211008	1009297
2	**Bellary**	988500	988500	813196	97017	122100	33917	125244	434918	140869	575787
3	**Bidar**	544800	96100	541765	27707	41133	44285	88547	340093	60089	400182
4	**Bijapur**	1706900	1706900	1053471	1977	64906	16393	224205	745990	103510	849500
5	**Chikmagalur**	720100	620800	722075	200485	70961	130839	23870	295920	33349	329269
6	**Chitradurga**	1085200	1085200	770702	73719	76646	121672	68685	429980	51450	481430
7	**Dharwad**	1373800	1188000	427329	35235	25802	6442	63366	296484	202408	498892
8	**Gulbarga**	1622400	1622400	1610208	69089	131107	51263	164080	1194669	232428	1427097
9	**Hassan**	681400	131800	662602	58775	109119	54048	82884	357776	90392	448168
10	**Raichur**	1401700	1401700	835843	18167	40647	44212	221743	511074	140409	651483
11	**Shimoga**	1055300	783500	847784	276855	101765	206638	44443	218083	37771	255854
12	**Tumkur**	1059800	393700	1064755	45177	151815	160128	92561	615074	69641	684715
13	**Uttar Kannada**	1029100	63700	1024679	813595	50694	27881	18211	114298	10698	124996
	Sub Total	**14610500**	**11327200**	**11718791**	**1908222**	**1100548**	**937075**	**1420298**	**6352648**	**1384022**	**7736670**
iii)	**MAHARASHTRA**										
1	**Ratnagiri**	820800	11700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Ahmadnagar**	1704800	618000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Pune**	1564300	1548300	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Satara**	1048000	1048000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Sangli**	857200	857200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.

Contd/…

6	**Solapur**	1489500	1488400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	**Kolhapur**	768500	758600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
8	**Bid**	1069300	156700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
9	**Osmanabad+**	1472600	455600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
10	**Latur**	737200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**11532200**	**6942500**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Grand Total	**50978800**	**25894900**	**30638191**	**5597142**	**4230262**	**2093561**	**4552995**	**14164331**	**3357425**	**17521756**

Sources:- Directorate of Economics & Statistics, Ministry of Agriculture. (data taken from Internet)

Note : 1. Totals may not tally due to rounding off. 2. N.A. : Not availabe data.

3. Estimated on the basis of the percentage of the area of each district, within the basin, to the district as a whole.

Table 14 : Land utilisation pattern by river basin and State for 2008-2009

(Area in hectare)

Sl. No.	Basin/State/District Name	District Area	District Basin Area	Reporting Area For Land Utilisation	Classification of Reporting Area					Area Sown more than once	Total Cropped Area
					Forest	Not available for Cultivation	Other uncultivated Lands Excluding Fallow Lands	Fallow Lands	Net Area Sown		
1	2	3	4	5	6	7	8	9	10	11	12
VII	**Basin : Cauvery, Year 2008-2009**										
i)	**KARNATAKA**										
1	**Bangalore**	219000	171500	217410	5055	119791	16893	21321	54350	2049	56399
2	**Bangalore R.**	581500	395500	229519	11322	51102	20004	23338	123753	5769	129522
3	**Chikmagalur**	722075	84800	722075	200485	70961	130839	23870	295920	33349	329269
4	**Hassan**	681400	489600	662602	58775	109119	54048	82884	357776	90392	448168
5	**Kodagu (Coorg)**	410200	217200	410775	134597	54971	47245	8927	165035	13444	178479
6	**Mandya**	496100	496100	498244	24765	82425	77386	60347	253321	50253	303574
7	**Mysore**	1195400	1195400	676382	62851	112840	83587	78918	338186	185329	523515
8	**Tumkur**	1059800	445300	1064755	45177	151815	160128	92561	615074	69341	684415
	Sub Total	**5365475**	**3495400**	**4481762**	**543027**	**753024**	**590130**	**392166**	**2203415**	**449926**	**2653341**
ii)	**KERALA**										
1	**Kannur**	297112	65000	297112	48734	37442	7467	6165	197304	15366	212670
2	**Wayanad**	213100	N.A.	212966	78787	16568	1009	1364	115238	75045	190283
3	**Kozhikode**	447500	120000	234641	41386	32662	2182	2582	155829	48438	204267
4	**Palakkad**	448000	57500	447584	136257	62827	30977	20319	197204	117483	314687
5	**Idukki**	501900	40000	436328	198413	25879	1809	1680	208547	76755	285302
	Sub Total	**1907612**	**282500**	**1628631**	**503577**	**175378**	**43444**	**32110**	**874122**	**333087**	**1207209**
iii)	**TAMIL NADU**										
1	**Dharmapuri +**	1827100	1042100	449777	164177	67223	12937	52138	153302	19423	172725
2	**Salem**	520530	N.A.	520530	125682	98105	12477	73704	210562	48839	259401

Contd/…

3	**South Arcot**	1089500	62500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Coimbatore+Periyar**	1567800	1323800	472322	111871	78988	12308	86849	182306	8840	191146
5	**Nilgiri**	254900	209900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Madurai +**	1262300	445300	374173	48473	88322	9428	88804	139146	11375	150521
7	**Dindigul**	626664	N.A.	626664	138923	102368	20352	135340	229681	5175	234856
8	**Pudukottai**	1574700	1117200	466329	23535	139682	43299	106421	153392	856	154248
9	**Triuchirapalli**	511400	N.A.	440383	36773	97595	10191	121135	174689	18892	193581
10	**Thanjavur**	828000	543000	339657	3390	83683	18365	36671	197548	75064	272612
	Sub Total	**10062894**	**4743800**	**3689835**	**652824**	**755966**	**139357**	**701062**	**1440626**	**188464**	**1629090**
iv)	**PONDICHERY**										
1	**Karaikal**	49200	16000	16012	-	5008	2928	1814	6262	2902	9164
2	**Sub Total**	**49200**	**16000**	16012	-	5008	2928	1814	6262	2902	9164
	Grand Total	**17385181**	**8537700**	**9816240**	**1699428**	**1689376**	**775859**	**1127152**	**4524425**	**974379**	**5498804**

Sources: Directorate of Economics & Statistics , Ministry of Agriculture.

Contd/…

Table 14 : Land utilisation pattern by river basin and State for 2008-2009

(Area in hectare)

Sl. No.	Basin/State/District Name	District Area	District Basin Area	Reporting Area For Land Utilisation	Classification of Reporting Area					Area Sown more than once	Total Cropped Area
					Forest	Not available for Cultivation	Other uncultivated Lands Excluding Fallow Lands	Fallow Lands	Net Area Sown		
1	2	3	4	5	6	7	8	9	10	11	12
VIII	**Basin : East Folowing Rivers from Mahanadi to Kanyakumari, Year 2008-2009**										
i)	**ANDHRA PRADESH**										
1	**Srikakulam**	2353700	1983300	583700	68641	149353	9038	35168	321500	110711	432211
2	**Vizianagaram**	653900	N.A.	653900	119303	151247	14332	67144	301874	103685	405559
3	**Vishakhapatnam**	1116100	N.A.	1116100	441166	233539	48317	85206	307872	72055	379927
4	**East Godavari**	1854900	619300	1080700	323244	223454	46915	60322	426765	312506	739271
5	**West Godavari**	778000	N.A.	774200	81166	187221	39850	25574	440389	284195	724584
6	**Krishna**	872700	487300	872700	76186	216682	47294	47166	485372	270870	756242
7	**Guntur+**	5975100	2997800	1139100	161941	191191	81413	93612	610943	220895	831838
8	**Prakasam+**	1762600	N.A.	1762600	442499	330324	138709	218460	632608	31514	664122
9	**Nellore**	1307600	N.A.	1307600	262787	392787	199979	113018	339029	78978	418007
10	**Khammam**	1602900	549100	1602900	759438	218116	72811	82825	469710	55242	524952
11	**kurnool**	1765800	N.A.	1765800	340669	265892	53609	216508	889122	104564	993686
12	**Chittoor**	1515200	1030000	1515100	452018	302922	104956	264717	390487	40899	431386
	Sub Total	**21558500**	**7666800**	**14174400**	**3529058**	**2862728**	**857223**	**1309720**	**5615671**	**1686114**	**7301785**
ii)	**KARNATAKA**										
1	**Bangalore**	219000	47500	217410	5055	119791	16893	21321	54350	2049	56399
2	**Bangalore R.**	581500	142500	229519	11322	51102	20004	23338	123753	5769	129522
3	**Kolar**	822300	465700	374966	20620	74547	52824	47387	179588	7953	187541
	Sub Total	**1622800**	**655700**	**821895**	**36997**	**245440**	**89721**	**92046**	**357691**	**15771**	**373462**

Contd/…

iii)	**KERALA**										
	Thiruvantrum	219200	300	218781	49861	29241	378	3546	135755	27530	163285
	Sub Total	**219200**	**300**	218781	49861	29241	378	3546	135755	27530	163285
iv)	**ORISSA**										
1	**Phulbani**	1111900	204400	802000	571000	39000	58000	16000	118000	72250	190250
2	**Kalahandi**	1177200	50000	792000	254000	92000	52000	19000	375000	231140	606140
3	**Koraput**	2696100	868500	881000	188000	264000	106000	32000	291000	103290	394290
4	**Ganjam**	1253100	1253100	821000	315000	41000	53000	32000	380000	306090	686090
5	**Puri**	1018200	412100	348000	14000	123000	21000	56000	134000	152700	286700
	Sub Total	**7256500**	**2788100**	**3644000**	**1342000**	**559000**	**290000**	**155000**	**1298000**	**865470**	**2163470**
v)	**TAMIL NADU**										
1	**Chennai**	17400	17400	17098	300	16798	-	0	0	0	0
2	**Chengai-Anna**	785700	785700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**North Arcot**	607700	607700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Dharmapuri+**	1827100	785000	449777	164177	67223	12937	52138	153302	19423	172725
5	**Salem**	520530	N.A.	520530	125682	98105	12477	73704	210562	48839	259401
6	**Tiruchirapalli**	619100	619100	440383	36773	97595	10191	121135	174689	18892	193581
7	**South Arcot**	1089500	1027000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
8	**Dindugul +**	1262300	817000	626664	138923	102368	20352	135340	229681	5175	234856
9	**Madurai**	374173	N.A.	374173	48473	88322	9428	88804	139146	11375	150521

Contd/…

Table 14 : Land utilisation pattern by river basin and State for 2008-2009

(Area in hectare)

Sl. No.	Basin/State/District Name	District Area	District Basin Area	Reporting Area For Land Utilisation	Classification of Reporting Area					Area Sown more than once	Total Cropped Area
					Forest	Not available for Cultivation	Other uncultivated Lands Excluding Fallow Lands	Fallow Lands	Net Area Sown		
1	2	3	4	5	6	7	8	9	10	11	12
10	**Thanjavur**	828000	285000	339657	3390	83683	18365	36671	197548	75064	272612
11	**Pudukottai**	465100	465100	466329	23535	139682	43299	106421	153392	856	154248
12	**PMT+**	1260100	1260100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
13	**Kamarajar+**	344573	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
14	**Ramanathpuram**	417500	N.A.	408957	4488	91278	43274	81349	188568	-	188568
15	**Chidambaranar+**	1143100	1143100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
16	**Tirunelveli**	682300	N.A.	670638	120801	134976	56436	195408	163017	30885	193902
17	**Kanyakumari**	168400	168400	167200	54155	32333	807	1408	78497	10295	88792
	Sub Total	**12412579**	**7980604**	**4481411**	**720703**	**952370**	**227574**	**892387**	**1688412**	**220815**	**1909218**
vi)	**PONDICHERY**										
	Pondicherry (District)	49200	29300	29378	-	11920	2150	3552	11756	10206	21962
	Sub Total	**49200**	**29300**	29378	-	11920	2150	3552	11756	10206	21962
	Basin : Penner, Year 2008-2009										
i)	**ANDHRA PRADESH**										
1	**Kurnool**	1765800	1409600	1765800	340669	265892	53609	216508	889122	104564	993686
2	**Cuddapah**	1535900	1535900	1535900	500295	403553	65013	159850	407189	97126	504315
3	**Anantapur**	1913000	1461600	1913000	196978	304689	71197	257378	1082758	70872	1153630
4	**Prakasam+**	1762600	N.A.	1762600	442499	330324	138709	218460	632608	31514	664122
5	**Guntur+**	5975100	1567700	1139100	161941	191191	81413	93612	610943	220895	831838
6	**Nellore+**	1307600	N.A.	1307600	262787	392787	199979	113018	339029	78978	418007
7	**Chittoor**	1535900	N.A.	1515100	452018	302922	104956	264717	390487	40899	431386

Contd/…

	Sub Total	**15795900**	**5974800**	**10939100**	**2357187**	**2191358**	**714876**	**1323543**	**4352136**	**644848**	**4996984**
ii)	**KARNATAKA**										
1	**Bangalore R.**	581500	43500	229519	11322	51102	20004	23338	123753	5769	129522
2	**Kolar**	822300	356600	374966	20620	74547	52824	47387	179588	7953	187541
3	**Tumkur**	1064800	220800	1064755	45177	151815	160128	92561	615074	69341	684415
	Sub Total	**2468600**	**620900**	**1669240**	**77119**	**277464**	**232956**	**163286**	**918415**	**83063**	**1001478**
	Grand Total	**61383279**	**25716504**	**35978205**	**8112925**	**7129521**	**2414878**	**3943080**	**14377836**	**3553817**	**17931644**
IX	**Basin : West Flowing Rivers fro Kanyakumari to Tapi, Year 2008-2009**										
i)	**DADRA & NAGAR HAVELI**										
1	**Daman & Diu**	11200	7200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Dadra & Nagar Haveli**	49100	49100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**60300**	**56300**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
ii)	**Goa**	370200	370200	361113	125473	37137	54418	9484	134601	31352	165953
	Sub Total	**370200**	**370200**	361113	125473	37137	54418	9484	134601	31352	165953
iii)	**GUJARAT**										
1	**Surat**	765700	282700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Valsad**	524400	524400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Dangs**	176400	176400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**1466500**	**983500**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.

Contd/…

Table 14 : Land utilisation pattern by river basin and State for 2008-2009

(Area in hectare)

Sl. No.	Basin/State/District Name	District Area	District Basin Area	Reporting Area For Land Utilisation	Classification of Reporting Area					Area Sown more than once	Total Cropped Area
					Forest	Not available for Cultivation	Other uncultivated Lands Excluding Fallow Lands	Fallow Lands	Net Area Sown		
1	2	3	4	5	6	7	8	9	10	11	12
iv)	**KARNATAKA**										
1	**Belgaum**	1341500	96600	1344382	190424	113853	39357	202459	798289	211008	1009297
2	**Dharwad**	1373800	185800	427329	35235	25802	6442	63366	296484	202408	498892
3	**Chikmaglur**	720100	14500	722075	200485	70961	130839	23870	295920	33349	329269
4	**Dak. Kannada**	844100	844100	477149	128476	123383	81914	12299	131077	26849	157926
5	**Hassan**	681400	60000	662602	58775	109119	54048	82884	357776	90392	448168
6	**Kodagu**	410775	193000	410775	134597	54971	47245	8927	165035	13444	178479
7	**Shimoga**	1055300	271800	847784	276855	101765	206638	44443	218083	37771	255854
8	**Utt. Kannada**	1029100	120000	1024679	813595	50694	27881	18211	114298	10698	124996
	Sub Total	**7456075**	**1785800**	**5916775**	**1838442**	**650548**	**594364**	**456459**	**2376962**	**625919**	**3002881**
v)	**KERALA**										
1	**Kasargod**	199200	199200	199166	5625	37017	12134	5065	139325	72	139397
2	**Kannur**	296600	231600	297112	48734	37442	7467	6165	197304	15366	212670
3	**Kozhikode**	447500	327500	234641	41386	32662	2182	2582	155829	48438	204267
4	**Malappuram**	355000	355000	355446	103417	47534	5733	14605	184157	58580	242737
5	**Palakkad**	448000	390500	447584	136257	62827	30977	20319	197204	117483	314687
6	**Thrissur**	303200	303200	302919	103619	44785	8934	16247	129334	44010	173344
7	**Ernakulam**	240700	240700	305826	70617	49711	8990	17307	159201	19993	179194
8	**Idukki**	501900	461900	436328	198413	25879	1809	1680	208547	76755	285302
9	**Kottayam**	220300	220300	220442	8141	31462	5511	5893	169435	46955	216390
10	**Alappuzha**	141400	141400	141011	-	33716	13635	7237	86423	18620	105043
11	**Pathanamthitt**	264200	264200	265277	155214	18362	2355	6545	82801	18701	101502
12	**Kollam**	249100	249100	248788	81438	32479	1310	5159	128402	38440	166842
13	**Thiruvantrum**	219200	218900	218781	49861	29241	378	3546	135755	27530	163285
	Sub Total	**3886300**	**3603500**	**3673321**	**1002722**	**483117**	**101415**	**112350**	**1973717**	**530943**	**2504660**

Contd/…

vi)	**MAHARASHTRA**										
1	**Mumbai Sub**	60300	60300	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Thane**	955800	955800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Raigarh**	715200	715200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Sindhudurg**	1341500	1329800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Nasik**	1553000	420600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Dhule**	1315000	7500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	**Kolhapur**	768500	9900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**6709300**	**3499100**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.

Contd/…

Table 14 : Land utilisation pattern by river basin and State for 2008-2009

(Area in hectare)

Sl. No.	Basin/State/District Name	District Area	District Basin Area	Reporting Area For Land Utilisation	Classification of Reporting Area					Area Sown more than once	Total Cropped Area
					Forest	Not available for Cultivation	Other uncultivated Lands Excluding Fallow Lands	Fallow Lands	Net Area Sown		
1	2	3	4	5	6	7	8	9	10	11	12
vii)	**TAMIL NADU**										
1	**The Nilgiri**	254900	45000	254485	142577	13352	10875	10159	77522	-	77522
2	**Coimbatore**	746900	244000	472322	111871	78988	12308	86849	182306	8840	191146
	Sub Total	**1001800**	**289000**	**726807**	**254448**	**92340**	**23183**	**97008**	**259828**	**8840**	**268668**
viii)	**PONDICHERY**										
1	**Yanam**	3000	3000	2391	-	1189	497	111	594	453	1047
2	**Mahe**	900	900	870	-	238	27	12	593	2	595
	Sub Total	**3900**	**3900**	**3261**		**1427**	**524**	**123**	**1187**	**455**	**1642**
	Grand Total	**20954375**	**10591300**	**10681277**	**3221085**	**1264569**	**773904**	**675424**	**4746295**	**1197509**	**5943804**

Contd/…

X	**Basin : Tapi, Year 2008-2009**	<---------- Not Available Data ---------->									
XI	**Basin : Narmada, Year 2008-2009**										
i)	**GUJARAT**										
1	**Vadodara**	779400	396000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Bharuch**	903800	468000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Surat**	765700	18000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**2448900**	**882000**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
ii)	**MADHYA PRADESH**										
1	**Sagar**	1025200	171600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Damoh**	730600	65100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Dewas**	702000	394400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Jhabua**	678200	335700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Dhar**	815300	471400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Indore**	389800	97400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	**West Nimar (khargaon)**	1345000	1171000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
8	**East Nimar Khandwa)**	1077900	725900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
9	**Vidisha**	737100	46100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
10	**Sehore**	657800	225600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
11	**Raisen**	846600	467800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
12	**Betul**	1004300	370000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
13	**Hoshangabad**	1003700	1003700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
14	**Jabalpur**	1016000	648300	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
15	**Narsimhapur**	513300	513300	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
16	**Mandla**	1326900	1139500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
17	**Chhindwara**	1181500	285400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
18	**Seoni**	875800	221800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
19	**Balaghat**	922900	221500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
20	**Shahdol**	1402800	77800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**18252700**	**8653300**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.

Contd/…

Table 14 : Land utilisation pattern by river basin and State for 2008-2009

(Area in hectare)

Sl. No.	Basin/State/District Name	District Area	District Basin Area	Reporting Area For Land Utilisation	Classification of Reporting Area					Area Sown more than once	Total Cropped Area
					Forest	Not available for Cultivation	Other uncultivated Lands Excluding Fallow Lands	Fallow Lands	Net Area Sown		
1	2	3	4	5	6	7	8	9	10	11	12
iii)	**CHHATISGARH**										
1	**Rajnandgaon**	1112700	97200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**1112700**	**97200**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
iv)	**MAHARASHTRA**										
	Dhule	1315000	396000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**1315000**	**396000**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Grand Total	**23129300**	**10028500**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
XII	**Basin : Mahi and Sabarmati, Year 2008-2009**										
i)	**GUJARAT**										
1	**Kheda**	719400	105000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Panchmahals**	886600	885600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Vadodara**	779400	383400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Bharuch**	903800	294800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**3289200**	**1668800**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
ii)	**MADHYA PRADESH**										
1	**Ratlam**	486100	180700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Jhabua**	678200	342500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Dhar**	815300	150000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Mandsaur**	979100	3300	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**2958700**	**676500**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.

Contd/…

iii)	**RAJASTHAN**										
1	**Udaipur**	1727900	637500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Chittorgarh**	1085600	289700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Dungarpur**	377000	327000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Bansewara**	503700	503700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**3694200**	**1757900**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
b)	**Basin: Sabarmati**										
i)	**GUJARAT**										
1	**Surendranagar**	1048900	365000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Banaskantha**	1270300	52500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Sabarkantha**	739000	739000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Mahesana**	902700	102000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Gandhinagar**	64900	64900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Ahmedabad**	870700	460000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	**Kheda**	719400	614400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**5615900**	**2397800**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.

Contd/…

Table 14 : Land utilisation pattern by river basin and State for 2008-2009

(Area in hectare)

Sl. No.	Basin/State/District Name	District Area	District Basin Area	Reporting Area For Land Utilisation	Classification of Reporting Area					Area Sown more than once	Total Cropped Area
					Forest	Not available for Cultivation	Other uncultivated Lands Excluding Fallow Lands	Fallow Lands	Net Area Sown		
1	2	3	4	5	6	7	8	9	10	11	12
ii)	**RAJASTHAN**										
1	**Sirohi**	513600	10000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Udaipur**	1727900	258900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Dungarpur**	377000	50000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**2618500**	**318900**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
c)	**Basin : Luni & Others**										
i)	**GUJARAT**										
1	**Jamnagar**	1412500	1412500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Rajkot**	1120300	1120300	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Surendranagar**	1048900	683900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Bhavnagar**	1115500	1115500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Amreli**	676000	676000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Junagadh**	1060700	1060700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	**Kachch**	4565200	4565200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
8	**Banaskantha**	1270300	1217800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
9	**Mahesana**	902700	800700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
10	**Ahemdabad**	870700	410700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**14042800**	**13063300**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
ii)	**RAJASTHAN**										
1	**Ajmer**	848100	84900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.

Contd/…

2	**Jodhpur**	2285000	685500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Nagaur**	1771800	708900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Pali**	1238700	1238700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Jalor**	1064000	1064000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Sirohi**	513600	503600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**7721200**	**4285600**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
iii)	**Daman& Diu**										
	Diu	11200	4000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**11200**	**4000**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Grant Total	**39951700**	**24172800**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.

Sources:- Directorate of Economics & Statistics, Ministry of Agriculture. (Data received from DES website)

Table 15 : Gross area irrigated by Sources by river basin and State for 2006-2007

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
I	**Basin : Mahanadi, Year 2006-2007**										
i)	**JHARKHAND**										
	Gumla	907700	63500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**907700**	**63500**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
ii)	**ORISSA**										
1	**Sambalpur**	1751600	1390400	65860	-	65860	-	7280	9380	13490	96010
2	**Sundergarh**	971200	410000	38990	-	38990	-	14110	15090	29940	98130
3	**Cuttak**	1114200	752800	107380	-	107380	-	28260	4980	33200	173820
4	**Dhenkanal**	1082700	311000	38790	-	38790	-	3230	11290	18870	72180
5	**Phulbani**	1111900	907500	11650	-	11650	-	2560	2650	12980	29840
6	**Bolangir**	891300	891300	20600	-	20600	-	12930	24710	19660	77900
7	**Kalahandi**	1177200	981900	164720	-	164720	-	16010	10200	31460	222390
8	**Koraput**	2696100	197700	73400	-	73400	-	22180	-	58300	153880
9	**Puri**	1018200	606100	133280	-	133280	-	18160	1080	22800	175320
	Sub Total	**11814400**	**6448700**	**654670**	**-**	**654670**	**-**	**124720**	**79380**	**240700**	**1099470**
iii)	**MADHYA PRADESH**										
1	**Shahdol**	1402800	8400	4364	-	4364	2385	1317	3835	8897	20798
	Sub Total	**1402800**	**8400**	**4364**	**-**	**4364**	**2385**	**1317**	**3835**	**8897**	**20798**
iv)	**CHHISGARH**										
1	**Surguja**	2233700	496200	9740	259	9999	2057	945	7221	21867	42089
2	**Bilaspur**	1989700	1895700	117259	-	117259	4308	23035	6766	2217	153585
3	**Raigarh**	1292400	1090600	22932	42	22974	5518	26329	917	7481	63219
4	**Rajnandgaon**	1112700	756500	54991	76	55067	4159	14393	4213	2880	80712
5	**Durg**	853700	853700	139228	-	139228	5290	123153	3562	19334	290567
6	**Raipur**	2125800	2115200	246234	-	246234	8479	36929	5153	13605	310400
7	**Bastar**	3911400	222100	182	-	182	1520	1890	811	3329	7732
	Sub Total	**13519400**	**7430000**	**590566**	**377**	**590943**	**31331**	**226674**	**28643**	**70713**	**948304**
v)	**MAHARASHTRA**										
1	**Chandrapur+**	2585500	28600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Gadchiroli**	1441200		N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**4026700**	**28600**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
	Grand Total	**31671000**	**13979200**	**1249600**	**377**	**1249977**	**33716**	**352711**	**111858**	**320310**	**2068572**

Contd./….

Table 15 : Gross area irrigated by Sources by river basin and State for 2006-2007

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
II	**Subernarekha, Burhabalang and Baitarni, Year 2006-2007**										
i)	**JHARKHAND**										
	Ranchi	769800	488000	11	-	11	702	-	3909	659	5281
	Singhbhum	1344000	902100	352	-	352	310	-	238	213	1113
	Sub Total	**2113800**	**1390100**	**363**	**-**	**363**	**1012**	**-**	**4147**	**872**	**6394**
ii)	**ORISSA**										
	Mayurbhanj	1041800	751800	70930	-	70930	-	38210	3900	30290	143330
	Balasore	631100	472100	39120	-	39120	-	104380	-	21580	165080
	Sub Total	1672900	1223900	110050	-	110050	-	142590	3900	51870	308410
iii)	**WEST BENGAL**										
	Medinipur	1408100	311600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Purulia	625900	101800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	2034000	413400	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
	Grand Total	**5820700**	**3027400**	**110413**	**0**	**110413**	**1012**	**142590**	**8047**	**52742**	**314804**
III	**Basin : Brahamani, Year 2006-2007**										
i)	**JHARKHAND**										
1	**Lohardaga**	149100	89100	274	-	274	1498	-	2175	2424	6371
2	**Gumla**	907700	794200	378	-	378	1478	-	3225	1439	6520
3	**Ranchi**	769800	230000	11	-	11	702	-	3909	659	5281
4	**Pa. Singhbhum**	1344000	412000	352	-	352	310	-	238	213	1113
	Sub Total	**3170600**	**1525300**	**1015**	**-**	**1015**	**3988**	**-**	**9547**	**4735**	**19285**
ii)	**MADHYA PRADESH**										
	Raigarh	1292400	126800	22932	42	22974	5518	26329	917	7481	63219
	Sub Total	**1292400**	**126800**	**22932**	**42**	**22974**	**5518**	**26329**	**917**	**7481**	**63219**
iii)	**ORISSA**										
1	**Sambalpur**	1751600	361200	65860	-	65860	-	7280	9380	13490	96010
2	**Sundergarh**	971200	561200	38990	-	38990	-	14110	15090	29940	98130
3	**Keonjhar**	830300	830300	60430	-	60430	-	10480	11730	18380	101020
4	**Mayurbhanj**	1041800	290000	70930	-	70930	-	38210	3900	30290	143330

Contd/…

5	**Balasore**	631100	159000	39120	-	39120	-	104380	-	21580	165080
6	**Cuttack**	1114200	361400	107380	-	107380	-	28260	4980	33200	173820
7	**Dhenkanal**	1082700	771700	38790	-	38790	-	3230	11290	18870	72180
	Sub Total	**7422900**	**3334800**	**421500**	-	**421500**	-	**205950**	**56370**	**165750**	**849570**
	Grand Total	**11885900**	**4986900**	**445447**	**42**	**445489**	**9506**	**232279**	**66834**	**177966**	**932074**
IV	**Rushikulya, Vamsadhra, Sarada and Nagavali, Year 2006-2007**										
	<---------- Not Available Data ---------->										

Table 15 : Gross area irrigated by Sources by river basin and State for 2006-2007

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
V	**Basin Godavari, Year 2006-2007**										
i)	**ANDHRA PRADESH**										
1	**Visakhapatnam**	1116100	370400	46035	-	46035	33722	18631	14438	21121	133947
2	**East Godavari**	1080700	154900	341283	-	341283	31002	105969	369	11960	490583
3	**West Godavari**	774200	151000	365077	-	365077	20139	203848	13155	11133	613352
4	**Rangareddy**	749300	34200	26	-	26	1525	53927	11915	2435	69828
5	**Medak**	969900	835500	3591	-	3591	16133	164109	15073	1728	200634
6	**Nizamabad**	795600	795600	50756	-	50756	21286	215301	7560	7225	302128
7	**Adilabad**	1610500	1610500	16245	-	16245	15834	58630	17264	4749	112722
8	**Karimnagar**	1182300	1178700	139519	-	139519	67177	54241	285369	1105	547411
9	**Warangal**	1284600	724200	3707	-	3707	94313	97242	212791	3425	411478
10	**Khammam**	1602900	1616200	63404	-	63404	50844	44009	46948	20653	225858
	Sub Total	**11166100**	**7471200**	**1029643**	**-**	**1029643**	**351975**	**1015907**	**624882**	**85534**	**3107941**
ii)	**KARNATAKA**										
	Bidar	544800	448700	981	-	981	1331	17878	27334	1014	48538
	Sub Total	**544800**	**448700**	**981**	**-**	**981**	**1331**	**17878**	**27334**	**1014**	**48538**
iii)	**MADHYA PRADESH**										
1	**Betul**	1004300	224300	18888	-	18888	212	12623	71634	12580	115937
2	**Mandla**	1326900	82400	15854	-	15854	12	-	2924	1650	20440
											Contd/…

3	**Chhindwara**	1181500	896100	10749	-	10749	4234	36732	92854	5842	150411
4	**Seoni**	875800	654000	56693	59	56752	8890	2983	31822	13235	113682
5	**Balaghat**	922900	701400	84086	-	84086	29081	150	22624	5532	141473
	Sub Total	**5311400**	**2558200**	**186270**	**59**	**186329**	**42429**	**52488**	**221858**	**38839**	**541943**
	CHHATISGARH										
1	**Rajnandgaon**	1112700	259000	54991	76	55067	4159	14393	4213	2880	80712
2	**Raipur**	2125800	10600	246234	-	246234	8479	36929	5153	13605	310400
3	**Bastar**	3911400	3689300	182	-	182	1520	1890	811	3329	7732
	Sub Total	**7149900**	**3958900**	**301407**	**76**	**301483**	**14158**	**53212**	**10177**	**19814**	**398844**
iv)	**MAHARASHTRA**										
1	**Nashik**	1553000	736100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Jalgaon**	1176500	6000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Ahmadnagar**	1704800	1089100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Pune**	1564300	14000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Solapur**	1489500	11900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Aurangabad**	1010700	899100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	**Jalana**	771800	771800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
8	**Parbhani**	1104100	1104100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
9	**Bid**	1069300	946900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
10	**Nanded**	1052800	1052800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
11	**Osmanabad**	756900	226400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
12	**Latur**	715700	715700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.

Table 15 : Gross area irrigated by Sources by river basin and State for 2006-2007

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
13	**Buldghana**	966100	384600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
14	**Akola**	1057400	374500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
15	**Amravati**	1221000	419600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
16	**Yavatmal**	1358200	1358200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
17	**Wardha**	630900	630900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.

Contd/…

18	**Nagpur**	989200	989200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
19	**Bhandara**	932100	932100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
20	**Chandrapur**	1144300	1115700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
21	**Gadchiroli**	1441200	1441200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**23709800**	**15219900**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
v)	**ORISSA**										
1	**Kalahandi**	1177200	145300	164720	-	164720	-	16010	10200	31460	222390
2	**Koraput**	2696100	1629900	73400	-	73400	-	22180	-	58300	153880
	Sub Total	**3873300**	**1775200**	**238120**	**-**	**238120**	**-**	**38190**	**10200**	**89760**	**376270**
	Grand Total	**51755300**	**31432100**	**1756421**	**135**	**1756556**	**409893**	**1177675**	**894451**	**234961**	**4473536**
VI	**Basin : Krishna, Year 2006-2007**										
i)	**ANDHRA PRADESH**										
1	**Krishna**	872700	385400	315604	-	315604	27844	59485	12132	12848	427913
2	**Anantapur**	1913000	451400	23868	-	23868	1869	97333	13776	571	137417
3	**Guntoor+**	5975100	1567700	322534	-	322534	5177	77136	7427	14970	427244
4	**Praksham+**	1762600	N.A.	73721	-	73721	19863	69147	8044	17484	188259
5	**Kurnool+**	1307600	N.A.	80028	-	80028	11281	85379	26419	9491	212598
6	**Nellore**	1765800	N.A.	136024	-	136024	72542	66581	22547	8823	306517
7	**Mehbubnagar**	1843200	1843200	22737	-	22737	694	151988	11630	7636	194685
8	**Rangareddy**	749300	715100	26	-	26	1525	53927	11915	2435	69828
9	**Hyderabad**	21700	21700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
10	**Medak**	969900	134400	3591	-	3591	16133	164109	15073	1728	200634
11	**Karimnagar**	1182300	3600	139519	-	139519	67177	54241	285369	1105	547411
12	**Warangal**	1284600	560400	3707	-	3707	94313	97242	212791	3425	411478
13	**East Godavari**	1080700	-	341283	-	341283	31002	105969	369	11960	490583
14	**Khammam**	2683600	518300	63404	-	63404	50844	44009	46948	20653	225858
15	**Nalgonda**	1424000	1424000	120424	-	120424	24662	129644	58159	15935	348824
	Sub Total	**24836100**	**7625200**	**1646470**	**-**	**1646470**	**424926**	**1256190**	**732599**	**129064**	**4189249**
ii)	**KARNATAKA**										
1	**Belgaum**	1341500	1244900	92565	-	92565	2206	114954	126833	135985	472543
2	**Bellary**	988500	988500	119872	-	119872	3006	79445	15208	35814	253345
3	**Bidar**	544800	96100	981	-	981	1331	17878	27334	1014	48538
4	**Bijapur**	1706900	1706900	124805	-	124805	3640	74427	63448	27636	293956
5	**Chikmaglur**	720100	620800	9540	-	9240	11610	10825	695	8720	41090

Contd/…

6	**Chitradurga**	1085200	1085200	6678	-	6678	460	94104	-	-	101242
7	**Dharwad**	1373800	1188000	44980	-	44980	-	17892	-	280	63152
8	**Gulbarga**	1622400	1622400	169231	-	169231	2748	14466	30969	9610	227024
9	**Hassan**	681400	131800	34604	-	34604	32958	38192	1428	1158	108340
10	**Raichur**	1401700	1401700	192707	-	192707	2747	17113	19138	8481	240186
11	**Shimoga**	1055300	783500	62176	-	62176	55221	25683	7926	12343	163349
12	**Tumkur**	1059800	393700	3516	-	3516	27035	129180	1773	-	161504
13	**Uttar Kannada**	1029100	63700	-	-	-	5078	2117	7770	11781	26746
	Sub Total	**14610500**	**11327200**	**861655**	**-**	**861355**	**148040**	**636276**	**302522**	**252822**	**2201015**

Contd/…

Table 15 : Gross area irrigated by Sources by river basin and State for 2006-2007

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
iii)	**MAHARASHTRA**										
1	**Ratnagiri**	820800	11700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Ahmadnagar**	1704800	618000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Pune**	1564300	1548300	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Satara**	1048000	1048000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Sangli**	857200	857200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Solapur**	1489500	1488400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	**Kolhapur**	768500	758600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
8	**Bid**	1069300	156700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
9	**Osmanabad+**	1472600	455600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
10	**Latur**	737200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**11532200**	**6942500**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
	Grand Total	**50978800**	**25894900**	**2508125**	**N.A.**	**2507825**	**572966**	**1892466**	**1035121**	**381886**	**6390264**

Source : Directorate of Economics and Statistics, Ministry of Agriculture

Note : 1. Totals may not tally due to rounding off. 2. N.A. : Not availabe data.
3. Estimated on the basis of the percentage of the area of each district, within the basin, to the district as a whole

VII	**Basin : Cauvery, Year 2006-2007**										
i)	**KARNATAKA**										
1	**Bangalore (Urban)**	219000	171500	-	-	-	1329	10939	352	-	12620
2	**Bangalore R.**	581500	395500	2774	-	2774	186	65747	-	290	68997
3	**Chikmagalur**	722075	84800	9240	-	9240	11610	10825	695	8720	41090
4	**Hassan**	681400	489600	34604	-	34604	32958	38192	1428	1158	108340
5	**Kadagu**	410200	217200	2479	-	2479	131	529	94	1442	4675
6	**Mandya**	496100	496100	109480	-	109480	20988	6259	8437	3871	149035
7	**Mysore**	1195400	1195400	115286	-	115286	22480	13309	20810	353	172238
8	**Tumkur**	1059800	445300	3516	-	3516	27035	129180	1773	-	161504
	Sub Total	**5365475**	**3495400**	**277379**	**-**	**277379**	**116717**	**274980**	**33589**	**15834**	**718499**
ii)	**KERALA**										
1	**Kannur**	297112	65000	-	-	-	-	-	-	-	-
2	**Wayanad**	213100	-	-	-	-	-	-	-	-	-
3	**Kozhikode**	447500	120000	-	-	-	-	-	-	-	-
4	**Palakkad**	448000	57500	-	-	-	-	-	-	-	-
5	**Idukki**	501900	40000	-	-	-	-	-	-	-	-
	Sub Total	**1907612**	**282500**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**
iii)	**TAMIL NADU**										
1	**Dharmapuri+**	1827100	1042100	1561	-	1561	6462	2196	67374	57	77650
2	**Salem**	520530	N.A.	2316	-	2316	2319	11667	95127	210	111639
3	**South Arcot**	1089500	62500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Coimbatore+Periyar**	1567800	1323800	52934	560	53494	575	23037	108687	-	185793
5	**Nilgiri**	254900	209900	3	-	3	-	-	544	179	726
6	**Madurai**	1262300	445300	40687	-	40687	21480	393	32481	-	95041
7	**Dindigul**	626664	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
8	**Pudukottai+**	1574700	1117200	10343	-	10343	70506	22425	6108	-	109382
9	**Tiruchirapalli**	511400	N.A.	41247	-	41247	6399	10534	57971	-	116151
10	**Thanjavur**	828000	543000	167118	-	167118	258	39759	370	-	207505
	Sub Total	**10062894**	**4743800**	**316209**	**560**	**316769**	**107999**	**110011**	**368662**	**446**	**903887**
	PONDICHERY										
1	**Karaikal**	49200	16000	6254	-	6254	-	615	-	18	6887
	Sub Total	**49200**	**16000**	**6254**	**-**	**6254**	**0**	**615**	**0**	**18**	**6887**
	Grand Total	**17385181**	**8537700**	**599842**	**560**	**600402**	**224716**	**385606**	**402251**	**16298**	**1629273**

Contd/…

Table 15 : Gross area irrigated by Sources by river basin and State for 2006-2007

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
VIII	**Basin : East Folowing Rivers from Mahanadi to Kanyakumari, Year 2006-2007**										
i)	**ANDHRA PRADESH**										
1	**Srikakulam**	2353700	1983300	107306	-	107306	71574	13038	16702	3260	211880
2	**Vizianagaram**	653900	N.A	44997	-	44997	83545	18241	19667	5524	171974
3	**Vishakhapatnam**	1116100	N.A	46035	-	46035	33722	18631	14438	21121	133947
4	**East Godavari**	1854900	619300	341283	-	341283	31002	105969	369	11960	490583
5	**West Godavari**	778000	N.A	365077	-	365077	20139	203848	13155	11133	613352
6	**Krishna**	872700	487300	315604	-	315604	27844	59485	12132	12848	427913
7	**Guntur+**	5975100	2997800	322534	-	322534	5177	77136	7427	14970	427244
8	**Prakasam+**	1762600	N.A.	73721	-	73721	19863	69147	8044	17484	188259
9	**Nellore**	1307600	N.A	136024	-	136024	72542	66581	22547	8823	306517
10	**Khammam**	1602900	549100	63404	-	63404	50844	44009	46948	20653	225858
11	**Kurnool**	1765800	N.A	80028	-	80028	11281	85379	26419	9491	212598
12	**Chittoor**	1515200	1030000	35	-	35	22189	117615	44631	39	184509
	Sub Total	**21558500**	**7666800**	**1896048**	**-**	**1896048**	**449722**	**879079**	**232479**	**137306**	**3594634**
ii)	**KARNATAKA**										
1	**Bangalore (Urban)**	219000	47500	-	-	-	1329	10939	352	-	12620
2	**Bangalore R.**	581500	142500	2774	-	2774	186	65747	-	290	68997
3	**Kolar**	822300	465700	-	-	-	-	79940	-	-	79940
	Sub Total	**1622800**	**655700**	**2774**	**-**	**2774**	**1515**	**156626**	**352**	**290**	**161557**
iii)	**KERALA**										
1	**Thiruvantrum**	219200	300	-	-	-	-	-	-	-	-
	Sub Total	**219200**	**300**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**
iv)	**ORISSA**										
1	**Phulbani**	1111900	204400	11650	-	11650	-	2560	2650	12980	29840
2	**Kalahandi**	1177200	50000	164720	-	164720	-	16010	10200	31460	222390
3	**Koraput**	2696100	868500	73400	-	73400	-	22180	-	58300	153880
4	**Ganjam**	1253100	1253100	236240	-	236240	-	15390	22560	24200	298390
5	**Puri**	1018200	412100	133280	-	133280	-	18160	1080	22800	175320
	Sub Total	**7256500**	**2788100**	**619290**	**-**	**619290**	**0**	**74300**	**36490**	**149740**	**879820**
											Contd.

v)	**TAMIL NADU**										
1	**Madras**	17400	17400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Chengai-Anna**	785700	785700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**North Arcot**	607700	607700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Dharmapuri+**	1827100	785000	1561	-	1561	6462	2196	67374	57	77650
5	**Salem**	520530	N.A	2316	-	2316	2319	11667	95127	210	111639
6	**Tiruvannmalai**	619100	619100	150	-	150	31296	951	159127	-	191524
7	**South Arcot**	1089500	1027000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
8	**Dindigul +**	1262300	817000	7841	-	7841	4675	2226	89256	1292	105290
9	**Madurai**	374173	N.A	40687	-	40687	21480	393	32481	-	95041
10	**Thanjavur**	828000	285000	167118	-	167118	258	39759	370	-	207505
11	**Pudukottai**	465100	465100	10343	-	10343	70506	22425	6108	-	109382
12	**PMT**	1260100	1260100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
13	**Kamarajar**	344573	N.A	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
14	**Ramanathapuram**	417500	N.A	-	-	-	58723	681	10274	-	69678
15	**Chidambaranar+**	1143100	1143100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
16	**Tirunelveli**	682300	N.A	29126	-	29126	63028	931	52389	250	145724
17	**Kanyakumari**	168400	168400	22989	-	22989	14316	200	386	187	38078
	Sub Total	**12412576**	**7980600**	**282131**	**-**	**282131**	**273063**	**81429**	**512892**	**1996**	**1151511**
vi)	**PONDICHERY**										
	Pondicherry	49200	29300	-	-	-	-	20654	-	-	20654
	Sub Total	**49200**	**29300**	**-**	**-**	**-**	**-**	**20654**	**-**	**-**	**20654**

Contd/…

Table 15 : Gross area irrigated by Sources by river basin and State for 2006-2007

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
	Basin : Penner, 2006-2007										
i)	**ANDHRA PRADESH**										
1	**Kurnool**	1765800	1409600	80028	-	80028	11281	85379	26419	9491	212598
2	**Cuddapah**	1535900	1535900	21528	-	21528	2595	118437	5688	1561	149809
3	**Anantapur**	1913000	1461600	23868	-	23868	1869	97333	13776	571	137417
4	**Prakasam+**	1762600	N.A.	73721	-	73721	19863	69147	8044	17484	188259

Contd.

5	**Guntur+**	5975100	1567700	322534	-	322534	5177	77136	7427	14970	427244
6	**Nellore**	1307600	N.A.	136024	-	136024	72542	66581	22547	8823	306517
7	**Chittoor**	1535900	N.A.	35	-	35	22189	117615	44631	39	184509
	Sub Total	**15795900**	**5974800**	**657738**	**-**	**657738**	**135516**	**631628**	**128532**	**52939**	**1606353**
ii)	**KARNATAKA**										
1	**Bangalore R.**	581500	43500	2774	-	2774	186	65747	-	290	68997
2	**Kolar**	822300	356600	-	-	-	-	79940	-	-	79940
3	**Tumkur**	1059800	220800	3516	-	3516	27035	129180	1773	-	161504
	Sub Total	**2463600**	**620900**	**6290**	**-**	**6290**	**27221**	**274867**	**1773**	**290**	**310441**
	Grand Total	**61378276**	**25716500**	**3464271**	**-**	**3464271**	**887037**	**2118583**	**912518**	**342561**	**7724970**
IX	**Basin : West Flowing Rivers from Kanyakumari to Tapi, Year 2006-2007**										
	DADRA & NAGAR HAVELI										
1	**Daman & Diu**	11200	7200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Dadra & Nagar Haveli**	49100	49100	2635	-	2635	-	174	1663	2936	7408
3	**Sub Total**	**60300**	**56300**	**2635**	**-**	**2635**	**-**	**174**	**1663**	**2936**	**7408**
4	**Goa**	370200	370200	7106	-	7106	-	-	30585	-	37691
	Sub Total	**370200**	**370200**	**12376**	**-**	**12376**	**-**	**348**	**33911**	**5872**	**52507**
	GUJARAT										
1	**Surat**	765700	282700	182400	-	182400	-	-	119500	300	302200
2	**Valsad**	524400	524400	17800	-	17800	900	300	21200	21900	62100
3	**Dangs**	176400	176400	-	-	-	-	-	1400	-	1400
	Sub Total	**1466500**	**983500**	**200200**	**-**	**200200**	**900**	**300**	**142100**	**22200**	**365700**
	KARNATAKA										
1	**Belgaum**	1341500	96600	92565	-	92565	2206	114954	126833	135985	472543
2	**Dharwad**	1373800	185800	44980	-	44980	-	17892	-	280	63152
3	**Chikmaglur**	720100	14500	9240	-	9240	11610	10825	695	8720	41090
4	**Dak. Kannada**	844100	844100	-	-	-	-	9510	41668	22557	73735
5	**Hassan**	681400	60000	34604	-	34604	32958	38192	1428	1158	108340
6	**Kodagu**	410200	193000	2479	-	2479	131	529	94	1442	4675
7	**Shimoga**	1055300	271800	62176	-	62176	55221	25683	7926	12343	163349
8	**Utt. Kannada**	1029100	120000	-	-	-	5078	2117	7770	11781	26746
	Sub Total	**7455500**	**1785800**	**246044**	**-**	**246044**	**107204**	**219702**	**186414**	**194266**	**953630**
	KERALA										
1	**Kasargod**	199200	199200	-	-	-	-	-	-	-	-
2	**Kannur**	296600	231600	-	-	-	-	-	-	-	-
3	**Kozhikode**	447500	327500	-	-	-	-	-	-	-	-

Contd.

4	**Mallapuram**	355000	355000	-	-	-	-	-	-	-	-
5	**Palakkad**	448000	390500	-	-	-	-	-	-	-	-
6	**Thrissur**	303200	303200	-	-	-	-	-	-	-	-
7	**Ernakulam**	240700	240700	-	-	-	-	-	-	-	-
8	**Idukki**	501900	461900	-	-	-	-	-	-	-	-
9	**Kottayam**	220300	220300	-	-	-	-	-	-	-	-
10	**Alappuzha**	141400	141400	-	-	-	-	-	-	-	-
11	**Pathaamthitta**	264200	264200	-	-	-	-	-	-	-	-
12	**Kollam**	249100	249100	-	-	-	-	-	-	-	-
13	**Thiruvananthapuram**	219200	218900	-	-	-	-	-	-	-	-
	Sub Total	**3886300**	**3603500**	-	-	-	-	-	-	-	-

Contd/…

Table 15 : Gross area irrigated by Sources by river basin and State for 2006-2007

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
	MAHARASHTRA										
1	**Bombay**	60300	60300	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Thane**	955800	955800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Raigarh**	715200	715200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Sindhudurg**	1341500	1329800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Nasik**	1553000	420600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Dhule**	1315000	7500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	**Kolhapur**	768500	9900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**6709300**	**3499100**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	TAMIL NADU										
1	**Nilgiri**	254900	45000	3	-	3	-	-	544	179	726
2	**Coimbatore**	746900	244000	52934	560	53494	575	23037	108687	-	185793
	Sub Total	**1001800**	**289000**	**52937**	**560**	**53497**	**575**	**23037**	**109231**	**179**	**186519**
	PONDICHERY										
1	**Yanam**	3000	3000	598	-	598	-	-	-	-	598
2	**Mahe**	900	900	-	-	-	-	-	-	44	44
	Sub Total	**3900**	**3900**	**598**	**-**	**598**	**0**	**0**	**0**	**44**	**642**
	Grand Total	**20953800**	**10591300**	**514790**	**560**	**515350**	**108679**	**243561**	**473319**	**225497**	**1566406**

Contd.

X	**Basin : Tapi, Year 2006-2007**										
	<---------- Not Available Data ---------->										
XI	**Basin : Narmada, Year 2006-2007**										
i)	**GUJARAT**										
1	**Vadodara**	779400	396000	35400	-	35400	5900	122600	88600	12800	265300
2	**Bharuch**	903800	468000	56100	-	56100	1700	9300	57100	400	124600
3	**Surat**	765700	18000	182400	-	182400	-	-	119500	300	302200
	Sub Total	**2448900**	**882000**	**273900**	**-**	**273900**	**7600**	**131900**	**265200**	**13500**	**692100**
ii)	**MADHYA PRADESH**										
1	**Sagar**	1025200	171600	8166	-	8166	2645	36962	116988	76295	241056
2	**Damoh**	730600	65100	14456	-	14456	783	29798	28296	45300	118633
3	**Dewas**	702000	394400	5311	-	5311	2372	87620	66912	11307	173522
4	**Jhabua**	678200	335700	9907	-	9907	10698	1876	22600	23558	68639
5	**Dhar**	815300	471400	13274	-	13274	11961	122671	82158	51854	281918
6	**Indore**	389800	97400	17735	-	17735	5093	118232	18264	17993	177317
7	**West Nimar (Khargaon)**	1345000	1171000	24188	-	24188	444	28914	87690	49081	190317
8	**East Nimar (Khandwa)**	1077900	725900	6305	-	6305	545	18261	82323	15401	122835
9	**Vidisha**	737100	46100	39894	-	39894	4854	106261	42634	61897	255540
10	**Sehore**	657800	225600	41217	-	41217	6264	53880	83431	44856	229648
11	**Raisen**	846600	467800	64225	-	64225	2002	81122	27991	34728	210068
12	**Betul**	1004300	370000	18888	-	18888	212	12623	71634	12580	115937
13	**Hoshangabad**	1003700	1003700	147080	-	147080	1069	52317	53491	16290	270247
14	**Jabalpur**	1016000	648300	9445	-	9445	99	81500	26063	16082	133189
15	**Narsimhapur**	513300	513300	1095	-	1095	8	77270	92766	7350	178489
16	**Mandla**	1326900	1139500	15854	-	15854	12	-	2924	1650	20440
17	**Chhindwara**	1181500	285400	10749	-	10749	4234	36732	92854	5842	150411
18	**Seoni**	875800	221800	56693	59	56752	8890	2983	31822	13235	113682
19	**Balaghat**	922900	221500	84086	-	84086	29081	150	22624	5532	141473
20	**Shahdol**	1402800	77800	4364	-	4364	2385	1317	3835	8897	20798
	Sub Total	**18252700**	**8653300**	**592932**	**59**	**592991**	**93651**	**950489**	**1057300**	**519728**	**3214159**
iii)	**CHHATISGARH**										
1	**Rajnandgaon**	1112700	97200	54991	76	55067	4159	14393	4213	2880	80712
	Sub Total	**1112700**	**97200**	**54991**	**76**	**55067**	**4159**	**14393**	**4213**	**2880**	**80712**
	MAHARASHTRA										
	Dhule	**1315000**	**396000**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
	Sub Total	**1315000**	**396000**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
	Grand Total	**23129300**	**10028500**	**921823**	**135**	**921958**	**105410**	**1096782**	**1326713**	**536108**	**3986971**

Contd./….

Table 15 : Gross area irrigated by Sources by river basin and State for 2006-2007

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
XII	**Basin : Mahi and Sabarmati, Year 2006-2007**										
a)	**Basin:Mahi**										
i)	**GUJARAT**										
1	**Kheda**	719400	105000	92200	-	92200	6300	84600	94500	5700	283300
2	**Panchmahals**	886600	885600	17200	-	17200	2500	2500	39700	2100	64000
3	**Vadodara**	779400	383400	35400	-	35400	5900	122600	88600	12800	265300
4	**Bharuch**	903800	294800	56100	-	56100	1700	9300	57100	400	124600
	Sub Total	**3289200**	**1668800**	**200900**	**-**	**200900**	**16400**	**219000**	**279900**	**21000**	**737200**
ii)	**MADHYA PRADESH**										
1	**Ratlam**	486100	180700	2345	-	2345	3278	79479	48810	10800	144712
2	**Jhabua**	678200	342500	9907	-	9907	10698	1876	22600	23558	68639
3	**Dhar**	815300	150000	13274	-	13274	11961	122671	82158	51854	281918
4	**Mandsaur**	979100	3300	1012	-	1012	2699	18326	152756	14357	189150
	Sub Total	**2958700**	**676500**	26538	-	26538	28636	222352	306324	100569	684419
iii)	**RAJASTHAN**										
1	**Udaipur**	1727900	637500	17963	-	17963	20056	6779	81666	1282	127746
2	**Chittorgarh**	1085600	289700	19865	-	19865	7130	111159	154355	231	292740
3	**Dungarpur**	377000	327000	7039	-	7039	3341	1802	25635	2795	40612
4	**Bansewara**	503700	503700	55835	-	55835	6854	3024	18310	19437	103460
	Sub Total	**3694200**	**1757900**	**100702**	**-**	**100702**	**37381**	**122764**	**279966**	**23745**	**564558**
b)	**Basin: Sabarmati**										
i)	**GUJARAT**										
1	**Surendranagar**	1048900	365000	9600	-	9600	900	187800	54000	400	252700
2	**Banaskantha**	1270300	52500	13500	-	13500	1800	324500	177200	600	517600
3	**Sabarkantha**	739000	739000	27600	-	27600	700	73000	183100	2100	286500
4	**Mahesana**	902700	102000	21100	-	21100	1800	228900	20600	900	273300
5	**Gandhinagar**	64900	64900	3500	-	3500	600	118300	18900	600	141900
6	**Ahmedabad**	870700	460000	71400	-	71400	4500	106400	93100	1600	277000
7	**Kheda**	719400	614400	92200	-	92200	6300	84600	94500	5700	283300
	Sub Total	**5615900**	**2397800**	**238900**	**-**	**238900**	**16600**	**1123500**	**641400**	**11900**	**2032300**

Contd./….

Table 15 : Gross area irrigated by Sources by river basin and State, Year 2006-2007

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
ii)	**RAJASTHAN**										
1	**Sirohi**	513600	10000	11637	-	11637	4787	1472	103634	24	121554
2	**Udaipur**	1727900	258900	17963	-	17963	20056	6779	81666	1282	127746
	Dungarpur	377000	50000	7039	-	7039	3341	1802	25635	2795	40612
	Sub Total	**2618500**	**318900**	**36639**	**-**	**36639**	**28184**	**10053**	**210935**	**4101**	**289912**
c)	**Basin: Luni & Others**										
i)	**GUJARAT**										
1	**Jamnagar**	1412500	1412500	14200	-	14200	1100	11900	230800	800	258800
2	**Rajkot**	1120300	1120300	37800	-	37800	1500	12500	344600	4400	400800
3	**Surendranagar**	1048900	683900	9600	-	9600	900	187800	54000	400	252700
4	**Bhavnagar**	1115500	1115500	32500	-	32500	2000	500	256200	6200	297400
5	**Amreli**	676000	676000	7700	-	7700	500	2300	199000	1800	211300
6	**Junagadh**	1060700	1060700	16200	-	16200	500	500	373400	6900	397500
7	**Kachch**	4565200	4565200	21300	-	21300	300	6300	180900	400	209200
8	**Banaskantha**	1270300	1217800	13500	-	13500	1800	324500	177200	600	517600
9	**Mahesana**	902700	800700	21100	-	21100	1800	228900	20600	900	273300
10	**Ahemdabad**	870700	410700	71400	-	71400	4500	106400	93100	1600	277000
	Sub Total	**14042800**	**13063300**	**245300**	**-**	**245300**	**14900**	**881600**	**1929800**	**24000**	**3095600**
ii)	**RAJASTHAN**										
1	**Ajmer**	848100	84900	1716	-	1716	3717	1909	70522	612	78476
2	**Jodhpur**	2285000	685500	-	-	-	-	270934	3510	1834	276278
3	**Nagaur**	1771800	708900	-	-	-	-	232293	130308	-	362601
4	**Pali**	1238700	1238700	-	-	-	43528	17441	102179	654	163802
5	**Jalor**	1064000	1064000	15014	-	15014	306	58608	212401	-	286329
6	**Sirohi**	513600	503600	11637	-	11637	4787	1472	103634	24	121554
	Sub Total	**7721200**	**4285600**	**28367**	**-**	**28367**	**52338**	**582657**	**622554**	**3124**	**1289040**
iii)	**Daman& Diu**										
	Diu	11200	4000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**11200**	**4000**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
	Grand Total	**39951700**	**24172800**	**877346**	**N.A.**	**877346**	**194439**	**3161926**	**4270879**	**188439**	**8693029**

Sources:- Directorate of Economics & Statistics, Ministry of Agriculture. (datataken from Internet)

Table 15 : Gross area irrigated by Sources by river basin and State for 2007-2008

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
I	**Basin : Mahanadi, Year 2007-2008**										
i)	**JHARKHAND**										
	Gumla	907700	63500	402	-	402	1480	-	3832	399	883
	Sub Total	**907700**	**63500**	**402**	**-**	**402**	**1480**	**-**	**3832**	**399**	**883**
ii)	**ORISSA**										
1	**Sambalpur**	1751600	1390400	70660	-	70660	-	7280	9380	13490	100810
2	**Sundergarh**	971200	410000	39440	-	39440	-	15160	16590	31960	103150
3	**Cuttak**	1114200	752800	118300	-	118300	-	27370	5200	28880	179750
4	**Dhenkanal**	1082700	311000	38130	-	38130	-	4860	11060	18870	72920
5	**Phulbani**	1111900	907500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Balangir**	891300	891300	25790	-	25790	-	19820	15000	14160	74770
7	**Kalahandi**	1177200	981900	155400	-	155400	-	17090	10310	35050	217850
8	**Koraput**	2696100	197700	79150	-	79150	-	12180	-	44680	136010
9	**Puri**	1018200	606100	131280	-	131280	-	18160	1080	19670	170190
	Sub Total	**11814400**	**6448700**	**658150**	**-**	**658150**	**-**	**121920**	**68620**	**206760**	**1055450**
iii)	**MADHYA PRADESH**										
	Shahdol	1402800	8400	4650	-	4650	2048	1358	3966	8027	20049
	Sub Total	**1402800**	**8400**	**4650**	**-**	**4650**	**2048**	**1358**	**3966**	**8027**	**20049**
iv)	**CHATTISGARH**										
1	**Surguja**	2233700	496200	7896	243	8139	2088	1147	7173	22359	40906
2	**Bilaspur**	1989700	1895700	118024	-	118024	4928	25326	6104	3288	157670
3	**Raigarh**	1292400	1090600	20574	40	20614	4747	31446	923	5893	63623
4	**Rajnandgaon**	1112700	756500	54725	76	54801	5652	18634	3437	4338	86862
5	**Durg**	853700	853700	143552	-	143552	4955	136212	2884	22262	309865
6	**Raipur**	2125800	2115200	251664	-	251664	7621	40652	4020	12420	316377
7	**Bastar**	3911400	222100	200	-	200	1143	2487	741	3221	7792
	Sub Total	**13519400**	**7430000**	**596635**	**359**	**596994**	**31134**	**255904**	**25282**	**73781**	**983095**
iv)	**MAHARASHTRA**										
1	**Chandrapur+**	2585500	28600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Gadchiroli**	1441200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**4026700**	**28600**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Grand Total	**31671000**	**13979200**	**1259837**	**359**	**1260196**	**34662**	**379182**	**101700**	**288967**	**2059477**

Contd./….

Table 15 : Gross area irrigated by Sources by river basin and State for 2007-2008

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
II	**Subernarekha, Burhabalang and Baitarni, Year 2007-2008**										
i)	**JHARKLHAND**										
	Ranchi	769800	488000	-	-	-	990	-	11094	1727	13811
	Singhbhum	1344000	902100	392	-	392	395	-	218	133	1138
	Sub Total	**2113800**	**1390100**	**392**	**-**	**392**	**1385**	**-**	**11312**	**1860**	**14949**
ii)	**ORISSA**										
	Mayurbhanj	1041800	751800	72640	-	72640	-	44180	3870	44490	165180
	Balasore	631100	472100	39200	-	39200	-	112180	-	25580	176960
	Sub Total	**1672900**	**1223900**	**111840**	**-**	**111840**	**-**	**156360**	**3870**	**70070**	**342140**
iii)	**WEST BENGAL**										
	Medinipur	1408100	311600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Purulia	625900	101800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	2034000	413400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Grand Total	**5820700**	**3027400**	**112232**	**N.A.**	**112232**	**1385**	**156360**	**15182**	**71930**	**357089**
III	**Basin : Brahamani, Year 2007-2008**										
i)	**JHARKLHAND**										
1	**Lohardaga**	149100	89100	301	-	301	1443	-	2154	2230	6128
2	**Gumla**	907700	794200	402	-	402	1480	-	3832	3099	8813
3	**Ranchi**	769800	230000	-	-	-	990	-	11094	1727	13811
4	**Pa. Singhbhum**	1344000	412000	392	-	392	395	-	218	133	1138
	Sub Total	**3170600**	**1525300**	**1095**	**-**	**1095**	**4308**	**-**	**17298**	**7189**	**29890**
ii)	**MADHYA PRADESH**										
	Raigarh	1292400	126800	5775	-	5775	3986	36236	138353	13881	198231
	Sub Total	**1292400**	**126800**	**5775**	**-**	**5775**	**3986**	**36236**	**138353**	**13881**	**198231**
iii)	**ORISSA**										
1	**Sambalpur**	1751600	361200	70660	-	70660	-	7280	9380	13490	100810
2	**Sundergarh**	971200	561200	39440	-	39440	-	15160	16590	31960	103150
3	**Keonjhar**	830300	830300	83720	-	83720	-	10420	12330	20860	127330
4	**Mayurbhanj**	1041800	290000	72640	-	72640	-	44180	3870	44490	165180
5	**Balasore**	631100	159000	39200	-	39200	-	112180	-	25580	176960
6	**Cuttack**	1114200	361400	118300	-	118300	-	27370	5200	28880	179750
7	**Dhenkanal**	1082700	771700	38130	-	38130	-	4860	11060	18870	72920
	Sub Total	**7422900**	**3334800**	**462090**	**-**	**462090**	**-**	**221450**	**58430**	**184130**	**926100**
	Grand Total	**11885900**	**4986900**	**468960**	**-**	**468960**	**8294**	**257686**	**214081**	**205200**	**1154221**
IV	**Rushikulya, Vamsadhra, Sarada and Nagavali, Year 2007-2008**										
	<---------- Not Available Data ---------->										

Contd./….

Table 15 : Gross area irrigated by Sources by river basin and State for 2007-2008

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
V	**Basin Godavari, Year 2007-2008**										
i)	**ANDHRA PRADESH**										
1	**Visakhapatnam**	1116100	370400	50915	-	50915	32758	32351	-	21998	138022
2	**East Godavari**	1080700	154900	341335	-	341335	37486	114850	-	12142	505813
3	**West Godavari**	774200	151000	363426	-	363426	22823	228862	-	12221	627332
4	**Rangareddy**	749300	34200	669	-	669	2218	67561	-	2371	72819
5	**Medak**	969900	835500	1857	-	1857	3749	195580	-	1487	202673
6	**Nizamabad**	795600	795600	17258	-	17258	7213	252889	-	7959	285319
7	**Adilabad**	1610500	1610500	6152	-	6152	10019	63982	-	1078	81231
8	**Karimnagar**	1182300	1178700	55425	-	55425	40825	417228	-	519	513997
9	**Warangal**	1284600	724200	2860	-	2860	71501	315108	-	3881	393350
10	**Khammam**	1602900	1616200	88920	-	88920	45172	88066	-	21848	244006
	Sub Total	**11166100**	**7471200**	**928817**	**0**	**928817**	**273764**	**1776477**	-	**85504**	**3064562**
ii)	**KARNATAKA**										
	Bidar	544800	448700	1168	-	1168	1057	19602	26173	1116	49116
	Sub Total	**544800**	**448700**	**1168**	**0**	**1168**	**1057**	**19602**	**26173**	**1116**	**49116**
iii)	**MADHYA PRADESH**										
1	**Betul**	1004300	224300	19085	-	19085	197	14765	72617	14658	121322
2	**Mandla**	1326900	82400	15987	-	15987	15	-	2954	1585	20541
3	**Chhindwara**	1181500	896100	11461	-	11461	4487	42284	92059	6353	156644
4	**Seoni**	875800	654000	64672	59	64731	9145	3721	33402	14037	125036
5	**Balaghat**	922900	701400	85328	-	85328	28956	323	22511	5387	142505
	Sub Total	**5311400**	**2558200**	**196533**	**59**	**196592**	**42800**	**61093**	**223543**	**42020**	**566048**
iv)	**CHATTISGARH**										
6	**Rajnandgaon**	1112700	259000	54725	76	54801	5652	18634	3437	4338	86862
7	**Raipur**	2125800	10600	251664	-	251664	7621	40652	4020	12420	316377
8	**Bastar**	3911400	3689300	200	-	200	1143	2487	741	3221	7792
	Sub Total	**7149900**	**3958900**	**306589**	**76**	**306665**	**14416**	**61773**	**8198**	**19979**	**411031**
iv)	**MAHARASHTRA**										
1	**Nashik**	1553000	736100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Jalgaon**	1176500	6000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Ahmadnagar**	1704800	1089100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Pune**	1564300	14000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Solapur**	1489500	11900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Aurangabad**	1010700	899100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.

Contd.

7	**Jalana**	771800	771800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
8	**Parbhani**	1104100	1104100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
9	**Bid**	1069300	946900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
10	**Nanded**	1052800	1052800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
11	**Osmanabad**	756900	226400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
12	**Latur**	715700	715700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
13	**Buldghana**	966100	384600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
14	**Akola**	1057400	374500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
15	**Amravati**	1221000	419600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
16	**Yavatmal**	1358200	1358200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
17	**Wardha**	630900	630900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
18	**Nagpur**	989200	989200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
19	**Bhandara**	932100	932100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
20	**Chandrapur**	1144300	1115700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
21	**Gadchiroli**	1441200	1441200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**23709800**	**15219900**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.

Contd/…

Table 15 : Gross area irrigated by Sources by river basin and State for 2007-2008

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
v)	**ORISSA**										
1	**Kalahandi**	1177200	145300	155400	-	155400	-	17090	10310	35050	217850
2	**Koraput**	2696100	1629900	79150	-	79150	-	12180	-	44680	136010
	Sub Total	**3873300**	**1775200**	**234550**	**0**	**234550**	**0**	**29270**	**10310**	**79730**	**353860**
	Grand Total	**51755300**	**31432100**	**1667657**	**135**	**1667792**	**332037**	**1948215**	**268224**	**228349**	**4444617**
VI	**Basin : Krishna, Year 2007-2008**										
i)	**ANDHRA PRADESH**										
1	**Krishna**	872700	385400	315757	-	315757	26929	80421	-	15867	438974
2	**Anantapur**	1913000	451400	25361	-	25361	5402	118758	-	1934	151455
3	**Guntoor+**	5975100	1567700	334701	-	334701	4676	96894	-	16647	452918
4	**Praksham+**	1762600	N.A.	69626	-	69626	29305	95953	-	15751	210635
5	**Kurnool+**	1307600	N.A.	102204	-	102204	18144	121460	-	11990	253798
6	**Nellore**	1765800	N.A.	115210	-	115210	77443	93203	-	9790	295646
7	**Mehbubnagar**	1843200	1843200	39068	-	39068	8449	208149	-	9304	264970
8	**Rangareddy**	749300	715100	669	-	669	2218	67561	-	2371	72819
9	**Hyderabad**	21700	21700	-	-	-	-	-	-	-	-
10	**Medak**	969900	134400	1857	-	1857	3749	195580	-	1487	202673
11	**Karimnagar**	1182300	3600	55425	-	55425	40825	417228	-	519	513997
12	**Warangal**	1284600	560400	2860	-	2860	71501	315108	-	3881	393350
13	**East Godavari**	1080700	N.A.	341335	-	341335	37486	114850	-	12142	505813
14	**Khammam**	2683600	518300	88920	-	88920	45172	88066	-	21848	244006

Contd.

15	**Nalgonda**	1424000	1424000	130326	-	130326	25431	214743	-	16558	387058
	Sub Total	**24836100**	**7625200**	**1623319**	**-**	**1623319**	**396730**	**2227974**	**-**	**140089**	**4388112**
ii)	**KARNATAKA**										
1	**Belgaum**	1341500	1244900	99454	-	99454	2362	122038	126477	136825	487156
2	**Bellary**	988500	988500	120351	-	120351	3440	90908	8061	55632	278392
3	**Bidar**	544800	96100	1168	-	1168	1057	19602	26173	1116	49116
4	**Bijapur**	1706900	1706900	82337	-	82337	4074	98502	123028	23184	331125
5	**Chikmaglur**	720100	620800	2765	-	2765	10790	13094	807	4541	31997
6	**Chitradurga**	1085200	1085200	5643	-	5643	806	87989	-	-	94438
7	**Dharwad**	1373800	1188000	44406	-	44406	60	17129	-	283	61878
8	**Gulbarga**	1622400	1622400	174181	-	174181	3248	19101	39237	7931	243698
9	**Hassan**	681400	131800	36028	-	36028	37588	33365	1325	1357	109663
10	**Raichur**	1401700	1401700	206608	-	206608	2981	24097	22838	14726	271250
11	**Shimoga**	1055300	783500	54381	-	54381	61292	28926	6654	11880	163133
12	**Tumkur**	1059800	393700	2318	-	2318	27714	135225	969	32	166258
13	**Uttar Kannada**	1029100	63700	-	-	-	5304	2400	8056	11746	27506
	Sub Total	**14610500**	**11327200**	**829640**	**-**	**829640**	**160716**	**692376**	**363625**	**269253**	**2315610**
iii)	**MAHARASHTRA**										
1	**Ratnagiri**	820800	11700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Ahmadnagar**	1704800	618000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Pune**	1564300	1548300	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Satara**	1048000	1048000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Sangli**	857200	857200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Solapur**	1489500	1488400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	**Kolhapur**	768500	758600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
8	**Bid**	1069300	156700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.

Contd/…

Table 15 : Gross area irrigated by Sources by river basin and State for 2007-2008

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
9	**Osmanabad+**	1472600	455600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
10	**Latur**	737200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**11532200**	**6942500**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
	Grand Total	**50978800**	**25894900**	**2452959**	**N.A.**	**2452959**	**557446**	**2920350**	**363625**	**409342**	**6703722**

Source : Directorate of Economics and Statistics, Ministry of Agriculture

Note : 1. Totals may not tally due to rounding off. 2. N.A. : Not availabe data.
3. Estimated on the basis of the percentage of the area of each district, within the basin, to the district as a whole.

VII	**Basin : Cauvery, Year 2007-2008**										
i)	**KARNATAKA**										
1	**Bangalore (Urban)**	219000	171500	-	-	-	757	11824	217	-	12798
2	**Bangalore R.**	581500	395500	-	-	-	128	30010	65	43	30246
3	**Chikmagalur**	722075	84800	2765	-	2765	10790	13094	807	8541	35997
4	**Hassan**	681400	489600	36028	-	36028	37588	33365	1325	1357	109663
5	**Kadagu**	410200	217200	2100	-	2100	394	1073	74	632	4273
6	**Mandya**	496100	496100	127062	-	127062	20988	6259	8437	4431	167177
7	**Mysore**	1195400	1195400	121512	-	121512	26349	13146	23674	358	185039
8	**Tumkur**	1059800	445300	2318	-	2318	27714	135225	969	32	166258
	Sub Total	**5365475**	**3495400**	**291785**	**-**	**291785**	**124708**	**243996**	**35568**	**15394**	**711451**
ii)	**KERALA**										
1	**Kannur**	297112	65000	-	-	-	-	-	-	-	-
2	**Wayanad**	213100	N.A	-	-	-	-	-	-	-	-
3	**Kozhikode**	447500	120000	-	-	-	-	-	-	-	-
4	**Palakkad**	448000	57500	-	-	-	-	-	-	-	-
5	**Idukki**	501900	40000	-	-	-	-	-	-	-	-
	Sub Total	**1907612**	**282500**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**
iii)	**TAMIL NADU**										
1	**Dharmapuri+**	1827100	1042100	1072	-	1072	3568	834	70368	-	75842
2	**Salem**	520530	N.A	4023	-	4023	1399	9958	92243	1	107624
3	**South Arcot**	1089500	62500	N.A	N.A.	N.A.	N.A.	N.A	N.A.	N.A.	N.A.
4	**Coimbatore+Periyar**	1567800	1323800	48919	664	49583	1452	26755	108030	1446	187266
5	**Nilgiri**	254900	209900	15	-	15	-	-	534	140	689
6	**Madurai**	1262300	445300	34002	-	34002	25721	584	32288	5	92600
7	**Dindigul**	626664									
8	**Pudukottai+**	1574700	1117200	8658	-	8658	65828	23376	7772	-	105634
9	**Tiruchirapalli**	511400	N.A	42591	-	42591	4935	8317	55451	-	111294
10	**Thanjavur**	828000	543000	151815	-	151815	306	53103	1094	-	206318
	Sub Total	**10062894**	**4743800**	**291095**	**664**	**291759**	**103209**	**122927**	**367780**	**1592**	**887267**
iv)	**PONDICHERY**										
1	**Karaikal**	49200	16000	5898	-	5898	-	627	-	17	6542
	Sub Total	**49200**	**16000**	**5898**	**-**	**5898**	**-**	**627**	**-**	**17**	**6542**
	Grand Total	**17385181**	**8537700**	**588778**	**664**	**589442**	**227917**	**367550**	**403348**	**17003**	**1605260**
VIII	**Basin : East Folowing Rivers from Mahanadi to Kanyakumari, Year 2007-2008**										
i)	**ANDHRA PRADESH**										
1	**Srikakulam**	2353700	1983300	109542	-	109542	74032	31343	-	2377	217294
2	**Vizianagaram**	653900	N.A	49890	-	49890	84450	40961	-	5560	180861
3	**Vishakhapatnam**	1116100	N.A	50915	-	50915	32758	32351	-	21998	138022
											Contd.

4	**East Godavari**	1854900	619300	341335	-	341335	37486	114850	-	12142	505813
5	**West Godavari**	778000	N.A	363426	-	363426	22823	228862	-	12221	627332
6	**Krishna**	872700	487300	315757	-	315757	26929	80421	-	15867	438974
7	**Guntur+**	5975100	2997800	334701	-	334701	4676	96894	-	16647	452918
8	**Prakasam+**	1762600	N.A.	69626	-	69626	29305	95953	-	15751	210635
9	**Nellore**	1307600	N.A	217414	-	217414	25587	214663	-	21780	479444
10	**Khammam**	1602900	549100	88920	-	88920	45172	88066	-	21848	244006
11	**Kurnool**	1765800	N.A	102204	-	102204	18144	121460	-	11990	253798
12	**Chittoor**	1515200	1030000	297	-	297	25100	161573	-	41	187011
	Sub Total	**21558500**	**7666800**	**2044027**	**-**	**2044027**	**426462**	**1307397**	**-**	**158222**	**3936108**

Contd/…

Table 15 : Gross area irrigated by Sources by river basin and State for 2007-2008

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
ii)	**KARNATAKA**										
1	**Bangalore (Urban)**	219000	47500	-	-	-	757	11824	217	-	12798
2	**Bangalore R.**	581500	142500	-	-	-	128	30010	65	43	30246
3	**Kolar**	822300	465700	-	-	-	-	37481	-	-	37481
	Sub Total	**1622800**	**655700**	**-**	**-**	**-**	**885**	**79315**	**282**	**43**	**80525**
iii)	**KERALA**										
1	**Thiruvantrum**	219200	300	-	-	-	-	-	-	-	-
	Sub Total	**219200**	**300**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**
iv)	**ORISSA**										
1	**Phulbani**	1111900	204400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Kalahandi**	1177200	50000	155400	-	155400	-	17090	10310	35050	217850
3	**Koraput**	2696100	868500	79150	-	79150	-	12180	-	44680	136010
4	**Ganjam**	1253100	1253100	237130	-	237130	-	18640	25850	24200	305820
5	**Puri**	1018200	412100	131280	-	131280	-	18160	1080	19670	170190
	Sub Total	**7256500**	**2788100**	**602960**	**-**	**602960**	**-**	**66070**	**37240**	**123600**	**829870**
v)	**TAMIL NADU**										
1	**Madras**	17400	17400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Chengai-Anna**	785700	785700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**North Arcot**	607700	607700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Dharmapuri+**	1827100	785000	1072	-	1072	3568	834	70368	-	75842
5	**Salem**	520530	N.A	4023	-	4023	1399	9958	92243	1	107624
6	**Tiruvannmalai**	619100	619100	1427	-	1427	38074	1242	156676	-	197419
7	**South Arcot**	1089500	1027000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
8	**Dindigul +**	1262300	817000	6217	-	6217	6541	3686	90256	1199	107899

Contd.

9	**Madurai**	374173	N.A	34002	-	34002	25721	584	32288	5	92600
10	**Thanjavur**	828000	285000	151815	-	151815	306	53103	1094	-	206318
11	**Pudukottai**	465100	465100	8658		8658	65828	23376	7772	-	105634
12	**PMT**	1260100	1260100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
13	**Kamarajar**	344573	N.A								
14	**Ramanathapuram**	417500	N.A	-	-	-	53110	2922	17213	-	73245
15	**Chidambaranar+**	1143100	1143100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
16	**Tirunelveli**	682300	N.A	1427	-	1427	38074	1242	156676	-	197419
17	**Kanyakumari**	168400	168400	13437		13437	22777	200	409	151	36974
	Sub Total	**12412576**	**7980600**	**222078**	**N.A.**	**222078**	**255398**	**97147**	**624995**	**1356**	**1200974**
vi)	**PONDICHERY**										
1	**Pondicherry**	49200	29300	-	-	-	-	19832	-	-	19832
	Sub Total	**49200**	**29300**	-	-	-	-	19832	-	-	19832
	Basin : Penner, Year 2007-2008										
i)	**ANDHRA PRADESH**										
1	**Kurnool**	1765800	1409600	102204	-	102204	18144	121460	-	11990	253798
2	**Cuddapah**	1535900	1535900	28894	-	28894	15747	134344	-	615	179600
3	**Anantapur**	1913000	1461600	25361	-	25361	5402	118758	-	1934	151455
4	**Prakasam+**	1762600	N.A.	69626	-	69626	29305	95953	-	15751	210635
5	**Guntur**	5975100	1567700	334701	-	334701	4676	96894	-	16647	452918
6	**Nellore**	1307600	N.A.	115210	-	115210	77443	93203	-	9790	295646
7	**Chittoor**	1535900	N.A.	297	-	297	25100	161573	-	41	187011
	Sub Total	**15795900**	**5974800**	**676293**	**-**	**676293**	**175817**	**822185**	**-**	**56768**	**1731063**
ii)	**KARNATAKA**										
1	**Bangalore R.**	581500	43500	-	-	-	128	30010	65	43	30246
2	**Kolar**	822300	356600	-	-	-	-	37481	-	-	37481
3	**Tumkur**	1059800	220800	2318	-	2318	27714	135225	969	32	166258
	Sub Total	**2463600**	**620900**		**-**	**2318**	**27842**	**202716**	**1034**	**75**	**233985**
	Grand Total	**61378276**	**25716500**	**3545358**	**-**	**3547676**	**886404**	**2594662**	**663551**	**340064**	**8032357**

Contd/…

Table 15 : Gross area irrigated by Sources by river basin and State for 2007-2008

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
IX	**Basin : West Flowing Rivers from Kanyakumari to Tapi, Year 2007-2008**										
	DADRA & NAGAR HAVELI										
i)	**Daman & Diu**	11200	7200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
1	**Dadra & Nagar Haveli**	49100	49100	-	-	-	-	-	-	-	-
2	**Sub Total**	60300	56300	-	-	-	-	-	-	-	-

Contd.

3	**Goa**	370200	370200	7981	-	7981	-	-	31324	-	39305
	Sub Total	**370200**	**370200**	**7981**	**N.A.**	**7981**	**N.A.**	**N.A.**	**31324**	**N.A.**	**39305**
	GUJARAT										
ii)	**Surat**	765700	282700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
1	**Valsad**	524400	524400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Dangs**	176400	176400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**1466500**	**983500**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
iii)	**KARNATAKA**										
1	**Belgaum**	1341500	96600	99454	-	99454	2362	122038	126477	136825	487156
2	**Dharwad**	1373800	185800	44406	-	44406	60	17129	-	283	61878
3	**Chikmaglur**	720100	14500	2765	-	2765	10790	13094	807	8541	35997
4	**Dak. Kannada**	844100	844100	-	-	-	-	9855	41075	21279	72209
5	**Hassan**	681400	60000	36028	-	36028	37588	33365	1325	1357	109663
6	**Kodagu**	410200	193000	2100	-	2100	394	1073	74	632	4273
7	**Shimoga**	1055300	271800	54381	-	54381	61292	28926	6654	11880	163133
8	**Utt. Kannada**	1029100	120000	-	-	-	5304	2400	8056	11746	27506
	Sub Total	**7455500**	**1785800**	**239134**	**-**	**239134**	**117790**	**227880**	**184468**	**192543**	**961815**
iv)	**KERALA**										
1	**Kasargod**	199200	199200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Kannur**	296600	231600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Kozhikode**	447500	327500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Mallapuram**	355000	355000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Palakkad**	448000	390500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Thrissur**	303200	303200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	**Ernakulam**	240700	240700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
8	**Idukki**	501900	461900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
9	**Kottayam**	220300	220300	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
10	**Alappuzha**	141400	141400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
11	**Pathaamthitta**	264200	264200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
12	**Kollam**	249100	249100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
13	**Thiruvananthapuram**	219200	218900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**3886300**	**3603500**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
v)	**MAHARASHTRA**										
1	**Bombay**	60300	60300	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Thane**	955800	955800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Raigarh**	715200	715200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.

Contd/…

Table 15 : Gross area irrigated by Sources by river basin and State for 2007-2008

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
4	**Sindhudurg**	1341500	1329800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Nasik**	1553000	420600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Dhule**	1315000	7500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	**Kolhapur**	768500	9900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**6709300**	**3499100**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
vi)	**TAMIL NADU**										
1	**Nilgiri**	254900	45000	15	-	15	-	-	534	140	689
2	**Coimbatore**	746900	244000	48919	664	49583	1452	26755	108030	1446	187266
	Sub Total	**1001800**	**289000**	**48934**	**664**	**49598**	**1452**	**26755**	**108564**	**1586**	**187955**
vii)	**PONDICHERY**										
1	**Yanam**	3000	3000	530	-	530	-	-	-	-	530
2	**Mahe**	900	900	-	-	-	-	-	-	33	33
	Sub Total	**3900**	**3900**	**530**	**0**	**530**	**0**	**0**	**0**	**33**	**563**
	Grand Total	**20953800**	**10591300**	**296579**	**664**	**297243**	**119242**	**254635**	**324356**	**194162**	**1189638**
X	**Basin : Tapi, Year 2007-2008**										
	<---------- Not Available Data ---------->										
XI	**Basin : Narmada, Year 2007-2008**										
I	**GUJARAT**										
1	**Vadodara**	779400	396000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Bharuch**	903800	468000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Surat**	765700	18000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**2448900**	**882000**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
II	**MADHYA PRADESH**										
1	**Sagar**	1025200	171600	4037	-	4037	2201	40322	108218	75916	230694
2	**Damoh**	730600	65100	13316	-	13316	790	30146	26360	42375	112987
3	**Dewas**	702000	394400	6760	-	6760	4769	93100	65910	23160	193699
4	**Jhabua**	678200	335700	11063	-	11063	11203	2040	24707	26654	75667
5	**Dhar**	815300	471400	25936	-	25936	13065	127002	89305	71200	326508
6	**Indore**	389800	97400	3990	96	4086	1808	133610	24058	7922	171484
7	**West Nimar (Khargaon)**	1345000	1171000	26555	-	26555	869	30926	93662	53507	205519
8	**East Nimar (Khandwa)**	1077900	725900	6915	-	6915	987	20457	88504	12536	129399
9	**Vidisha**	737100	46100	41881	-	41881	4959	124858	37431	74516	283645
10	**Sehore**	657800	225600	37741	-	37741	7511	74355	84565	52073	256245
11	**Raisen**	846600	467800	26158	-	26158	2258	132159	26359	33833	220767

Contd.

12	**Betul**	1004300	370000	19085	-	19085	197	14765	72617	14658	121322
13	**Hoshangabad**	1003700	1003700	143146	-	143146	1183	56240	57837	17329	275735
14	**Jabalpur**	1016000	648300	11420	-	11420	325	79785	29126	16227	136883
15	**Narsimhapur**	513300	513300	1113	-	1113	6	88513	88836	6173	184641
16	**Mandla**	1326900	1139500	15987	-	15987	15	-	2954	1585	20541
17	**Chhindwara**	1181500	285400	11461	-	11461	4487	42284	92059	6353	156644
18	**Seoni**	875800	221800	64672	59	64731	9145	3721	33402	14037	125036
19	**Balaghat**	922900	221500	85328	-	85328	28956	323	22511	5387	142505
20	**Shahdol**	1402800	77800	4650	-	4650	2048	1358	3966	8027	20049
	Sub Total	18252700	8653300	561214	155	561369	96782	1095964	1072387	563468	3389970
III	**CHATTISGARH**										
1	**Rajnandgaon**	1112700	97200	54725	76	54801	5652	18634	3437	4338	86862
	Sub Total	1112700	97200	54725	76	54801	5652	18634	3437	4338	86862
iv)	**MAHARASHTRA**										
1	**Dhule**	**1315000**	**396000**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
	Sub Total	**1315000**	**396000**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
	Grand Total	**23129300**	**10028500**	**615939**	**231**	**616170**	**102434**	**1114598**	**1075824**	**567806**	**3476832**

Contd./….

Table 15 : Gross area irrigated by Sources by river basin and State for 2007-2008

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
	Basin : Mahi and Sabarmati, Year 2007-2008										
XII	**Basin:Mahi**										
a)	**GUJARAT**										
1	**Kheda**	719400	105000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Panchmahals**	886600	885600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Vadodara**	779400	383400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Bharuch**	903800	294800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**3289200**	**1668800**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
ii)	**MADHYA PRADESH**										
1	**Ratlam**	486100	180700	1155	975	2130	2323	66400	64052	10348	145253
2	**Jhabua**	678200	342500	11063	-	11063	11203	2040	24707	26654	75667
3	**Dhar**	815300	150000	25936	-	25936	13065	127002	89305	71200	326508
4	**Mandsaur**	979100	3300	1394	-	1394	2531	10958	138176	11053	164112
	Sub Total	**2958700**	**676500**	**39548**	**975**	**40523**	**29122**	**206400**	**316240**	**119255**	**711540**
iii)	**RAJASTHAN**										
1	**Udaipur**	1727900	637500	19637	-	19637	8621	6741	77251	613	112863
2	**Chittorgarh**	1085600	289700	10684	-	10684	2124	103326	147410	2872	266416
3	**Dungarpur**	377000	327000	5983	-	5983	3751	1679	28148	2783	42344

Contd.

4	**Banswara**	503700	503700	61024	-	61024	6823	3748	16911	21491	109997
	Sub Total	**3694200**	**1757900**	**97328**	**-**	**97328**	**21319**	**115494**	**269720**	**27759**	**531620**
b)	**Basin: Sabarmati**										
i)	**GUJARAT**										
1	**Surendranagar**	1048900	365000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Banaskantha**	1270300	52500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Sabarkantha**	739000	739000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Mahesana**	902700	102000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Gandhinagar**	64900	64900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Ahmedabad**	870700	460000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	**Kheda**	719400	614400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**5615900**	**2397800**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**

Contd./….

Table 15 : Gross area irrigated by Sources by river basin and State for 2007-2008

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
I	**RAJASTHAN**										
1	**Sirohi**	513600	10000	8948	-	8948	4520	1791	107590	74	122923
2	**Udaipur**	1727900	258900	19637	-	19637	8621	6741	77251	613	112863
3	**Dungarpur**	377000	50000	5983	-	5983	3751	1679	28148	2783	42344
	Sub Total	**2618500**	**318900**	**34568**	**-**	**34568**	**16892**	**10211**	**212989**	**3470**	**278130**
	Basin: Luni & Others										
II	**GUJARAT**										
1	**Jamnagar**	1412500	1412500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Rajkot**	1120300	1120300	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Surendranagar**	1048900	683900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Bhavnagar**	1115500	1115500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Amreli**	676000	676000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Junagadh**	1060700	1060700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	**Kachch**	4565200	4565200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
8	**Banaskantha**	1270300	1217800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
9	**Mahesana**	902700	800700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
10	**Ahemdabad**	870700	410700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**14042800**	**13063300**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
III	**RAJASTHAN**										
1	**Ajmer**	848100	84900	550	-	550	1270	1846	61777	1572	67015
2	**Jodhpur**	2285000	685500	-	-	-	-	296035	7251	1532	304818
3	**Nagaur**	1771800	708900	-	-	-	-	224763	132314	20	357097
4	**Pali**	1238700	1238700	-	-	-	51496	17192	102920	315	171923
5	**Jalore**	1064000	1064000	12686	-	12686	110	73144	223598	117	309655
6	**Sirohi**	513600	503600	8948	-	8948	4520	1791	107590	74	122923
	Sub Total	**7721200**	**4285600**	**22184**	**-**	**22184**	**57396**	**614771**	**635450**	**3630**	**1333431**
IV	**Daman& Diu**										
	Diu	11200	4000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**11200**	**4000**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Grand Total	**39951700**	**24172800**	**193628**	**975**	**194603**	**124729**	**946876**	**1434399**	**154114**	**2854721**

Sources:- Directorate of Economics & Statistics, Ministry of Agriculture. (data taken from Internet)

Table 15 : Gross area irrigated by Sources by river basin and State for 2008-2009

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
I	**Basin : Mahanadi, Year 2008-2009**										
i)	**JHARKHAND**										
	Gumla	907700	63500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	907700	63500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
ii)	**ORISSA**										
1	**Sambalpur**	1751600	1390400	71920	-	71920	-	7130	9380	12540	100970
2	**Sundergarh**	971200	410000	35280	-	35280	-	19110	16800	24510	95700
3	**Cuttak**	1114200	752800	89850	-	89850	-	30600	4200	24950	149600
4	**Dhenkanal**	1082700	311000	42000	-	42000	-	3280	11160	18330	74770
5	**Phulbani**	1111900	907500	12510	-	12510	-	4480	2680	11120	30790
6	**Balangir**	891300	891300	26550	-	26550	-	20110	21150	16230	84040
7	**Kalahandi**	1177200	981900	147360	-	147360	-	21720	10400	35140	214620
8	**Koraput**	2696100	197700	83340	-	83340	-	9570	1510	41340	135760
9	**Puri**	1018200	606100	115840	-	115840	-	21130	-	18140	155110
	Sub Total	**11814400**	**6448700**	**624650**	**-**	**624650**	**-**	**137130**	**77280**	**202300**	**1041360**
iii)	**MADHYA PRADESH**										
1	**Shahdol**	1402800	8400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**21194600**	**10352600**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
iv)	**CHATTISGARH**										
1	**Surguja**	2233700	496200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Bilaspur**	1989700	1895700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Raigarh**	1292400	1090600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Rajnandgaon**	1112700	756500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Durg**	853700	853700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Raipur**	2125800	2115200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	**Bastar**	3911400	222100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**13519400**	**7430000**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
											Contd.

v)	**MAHARASHTRA**										
1	**Chandrapur+**	2585500	28600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Gadchiroli**	1441200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**2585500**	**28600**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
	Grand Total	**50021600**	**24323400**	**624650**	**N.A.**	**624650**	**N.A.**	**137130**	**77280**	**202300**	**1041360**

Contd./….

Table 15 : Gross area irrigated by Sources by river basin and State for 2008-2009

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
II	**Subernarekha, Burhabalang and Baitarni, Year 2008-2009**										
i)	**JHARKHAND**										
	Ranchi	769800	488000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Singhbhum	1344000	902100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	2113800	1390100	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
ii)	**ORISSA**										
	Mayurbhanj	1041800	751800	70160	-	70160	-	49280	3880	29670	152990
	Balasore	631100	472100	33720	-	33720	-	125090	-	18720	177530
	Sub Total	1672900	1223900	103880	0	103880	0	174370	3880	48390	330520
iii)	**WEST BENGAL**										
	Medinipur	1408100	311600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Purulia	625900	101800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	2034000	413400	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
	Grand Total	5820700	3027400	103880	0	103880	0	174370	3880	48390	330520
III	**Basin : Brahamani, Year 2008-2009**										
i)	**JHARKHAND**										
1	**Lohardaga**	149100	89100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Gumla**	907700	794200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Ranchi**	769800	230000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Pa. Singhbhum**	1344000	412000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**3170600**	**1525300**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
ii)	**CHATTISGARH**										
	Raigarh	1292400	126800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**1292400**	**126800**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
											Contd.

iii)	**ORISSA**										
1	**Sambalpur**	1751600	361200	71920	-	71920	-	7130	9380	12540	100970
2	**Sundergarh**	971200	561200	35280	-	35280	-	19110	16800	24510	95700
3	**Keonjhar**	830300	830300	63850	-	63850	-	9880	12230	20790	106750
4	**Mayurbhanj**	1041800	290000	70160	-	70160	-	49280	3880	29670	152990
5	**Balasore**	631100	159000	33720	-	33720	-	125090	-	18720	177530
6	**Cuttack**	1114200	361400	89850	-	89850	-	30600	4200	24950	149600
7	**Dhenkanal**	1082700	771700	42000	-	42000	-	3280	11160	18330	74770
	Sub Total	**7422900**	**3334800**	**406780**	**0**	**406780**		**244370**	**57650**	**149510**	**858310**
	Grand Total	**11885900**	**4986900**	**406780**	**-**	**406780**	**0**	**244370**	**57650**	**149510**	**858310**
IV	**Rushikulya, Vamsadhra, Sarada and Nagavali, Year 2008-2009**										
	<---------- Not Available Data ---------->										

Contd./….

Table 15 : Gross area irrigated by Sources by river basin and State for 2008-2009

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
V	**Basin Godavari, Year 2008-2009**										
i)	**ANDHRA PRADESH**										
1	**Visakhapatnam**	1116100	370400	48937	-	48937	32357	22739	13144	23026	140203
2	**East Godavari**	1080700	154900	340832	-	340832	35362	114045	193	12696	503128
3	**West Godavari**	774200	151000	363665	-	363665	22725	236953	11605	14715	649663
4	**Rangareddy**	749300	34200	646	-	646	2241	59624	8522	2700	73733
5	**Medak**	969900	835500	2199	-	2199	16483	171823	22664	4288	217457
6	**Nizamabad**	795600	795600	50355	-	50355	14780	246486	8981	9519	330121
7	**Adilabad**	1610500	1610500	8425	-	8425	38622	8010	63689	197	118943
8	**Karimnagar**	1182300	1178700	58952	-	58952	41308	59738	411034	2223	573255
9	**Warangal**	1284600	724200	4828	-	4828	89586	108157	235905	6469	444945
10	**Khammam**	1602900	1616200	77669	-	77669	51967	49259	51221	25186	255302
	Sub Total	**11166100**	**7471200**	**956508**	**-**	**956508**	**345431**	**1076834**	**826958**	**101019**	**3306750**
ii)	**KARNATAKA**										
	Bidar	544800	448700	1973	-	1973	973	19540	27532	1179	51197
	Sub Total	**544800**	**448700**	**1973**	**-**	**1973**	**973**	**19540**	**27532**	**1179**	**51197**
iii)	**MADHYA PRADESH**										
1	**Betul**	1004300	224300	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Mandla**	1326900	82400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Chhindwara**	1181500	896100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Seoni**	875800	654000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Balaghat**	922900	701400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**5311400**	**2558200**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	CHATTISGARH										
1	**Rajnandgaon**	1112700	259000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Raipur**	2125800	10600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Bastar**	3911400	3689300	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**7149900**	**3958900**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**

Contd.

iv)	**MAHARASHTRA**										
1	**Nashik**	1553000	736100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Jalgaon**	1176500	6000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Ahmadnagar**	1704800	1089100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Pune**	1564300	14000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Solapur**	1489500	11900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Aurangabad**	1010700	899100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	**Jalana**	771800	771800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
8	**Parbhani**	1104100	1104100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
9	**Bid**	1069300	946900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
10	**Nanded**	1052800	1052800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
11	**Osmanabad**	756900	226400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
12	**Latur**	715700	715700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
13	**Buldghana**	966100	384600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
14	**Akola**	1057400	374500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
15	**Amravati**	1221000	419600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
16	**Yavatmal**	1358200	1358200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
17	**Wardha**	630900	630900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
18	**Nagpur**	989200	989200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
19	**Bhandara**	932100	932100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
20	**Chandrapur**	1144300	1115700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
21	**Gadchiroli**	1441200	1441200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**23709800**	**15219900**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**

Table 15 : Gross area irrigated by Sources by river basin and State for 2008-2009

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
v)	**ORISSA**										
1	**Kalahandi**	1177200	145300	147360	-	147360	-	21720	10400	35140	214620
2	**Koraput**	2696100	1629900	83340	-	83340	-	9570	1510	41340	135760
	Sub Total	**3873300**	**1775200**	**230700**	**-**	**230700**	**-**	**31290**	**11910**	**76480**	**350380**
	Grand Total	**51755300**	**31432100**	**1189181**	**-**	**1189181**	**346404**	**1127664**	**866400**	**178678**	**3708327**
											Contd.

VI	Basin : Krishna, Year 2008-2009											
i)	**ANDHRA PRADESH**											
1	**Krishna**	872700	385400	335070	-	335070	29880	95300	10945	17234	488429
2	**Anantapur**	1913000	451400	21340	-	21340	8917	103128	9854	2364	145603
3	**Guntoor+**	5975100	1567700	383530	-	383530	5410	97242	7121	22865	516168
4	**Praksham+**	1762600	N.A.	76781	-	76781	21413	104444	7952	18010	228600
5	**Kurnool+**	1307600	N.A.	112170	-	112170	11920	81593	35248	12418	253349
6	**Nellore**	1765800	N.A.	136618	-	136618	79821	83912	14922	11110	326383
7	**Mehbubnagar**	1843200	1843200	34094	-	34094	3516	209121	14766	10219	271716
8	**Rangareddy**	749300	715100	646	-	646	2241	59624	8522	2700	73733
9	**Hyderabad**	21700	21700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
10	**Medak**	969900	134400	2199	-	2199	16483	171823	22664	4288	217457
11	**Karimnagar**	1182300	3600	58952	-	58952	41308	59738	411034	2223	573255
12	**Warangal**	1284600	560400	4828	-	4828	89586	108157	235905	6469	444945
13	**East Godavari**	1080700	N.A.	340832	-	340832	35362	114045	193	12696	503128
14	**Khammam**	2683600	518300	77669	-	77669	51967	49259	51221	25186	255302
15	**Nalgonda**	1424000	1424000	137299	-	137299	27261	199132	52785	19053	435530
	Sub Total	**24836100**	**7625200**	**1722028**	**-**	**1722028**	**425085**	**1536518**	**883132**	**166835**	**4733598**
ii)	**KARNATAKA**											
1	**Belgaum**	1341500	1244900	105165	-	105165	2095	143376	132465	136054	519155
2	**Bellary**	988500	988500	122860	-	122860	2996	90240	8392	56773	281261
3	**Bidar**	544800	96100	1973	-	1973	973	19540	27532	1179	51197
4	**Bijapur**	1706900	1706900	81290	-	81290	2020	103074	102985	28540	317909
5	**Chikmaglur**	720100	620800	7044	-	7044	10001	10606	617	9062	37330
6	**Chitradurga**	1085200	1085200	5292	-	5292	596	87282	-	-	93170
7	**Dharwad**	1373800	1188000	54971	-	54971	401	18436	-	13	73821
8	**Gulbarga**	1622400	1622400	185104	-	185104	3209	22682	29440	10861	251296
9	**Hassan**	681400	131800	39820	-	39820	42252	31533	1504	1697	116806
10	**Raichur**	1401700	1401700	216590	-	216590	2354	30679	20335	15523	285481
11	**Shimoga**	1055300	783500	46860	-	46860	64737	30707	6079	11725	160108
12	**Tumkur**	1059800	393700	3868	-	3868	29524	150701	1074	-	185167
13	**Uttar Kannada**	1029100	63700	-	-	-	5175	3048	9593	10913	28729
	Sub Total	**14610500**	**11327200**	**870837**	**-**	**870837**	**166333**	**741904**	**340016**	**282340**	**2401430**
											Contd.

iii)	**MAHARASHTRA**										
1	**Ratnagiri**	820800	11700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Ahmadnagar**	1704800	618000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Pune**	1564300	1548300	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Satara**	1048000	1048000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Sangli**	857200	857200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Solapur**	1489500	1488400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	**Kolhapur**	768500	758600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
8	**Bid**	1069300	156700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
9	**Osmanabad+**	1472600	455600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
10	**Latur**	737200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**11532200**	**6942500**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
	Grand Total	**50978800**	**25894900**	**2592865**	**N.A.**	**2592865**	**591418**	**2278422**	**1223148**	**449175**	**7135028**

Source : Directorate of Economics and Statistics, Ministry of Agriculture

Note : 1. Totals may not tally due to rounding off. 2. N.A. : Not availabe data.

3. Estimated on the basis of the percentage of the area of each district, within the basin, to the district as a whole.

Table 15 : Gross area irrigated by Sources by river basin and State for 2008-2009

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
VII	**Basin : Cauvery, Year 2008-2009**										
i)	**KARNATAKA**										
1	**Bangalore (Urban)**	219000	171500	-	-	-	485	11730	-	-	12215
2	**Bangalore R.**	581500	395500	-	-	-	128	28931	55	43	29157
3	**Chikmagalur**	722075	84800	7044	-	7044	10001	10606	617	9062	37330
4	**Hassan**	681400	489600	39820	-	39820	42252	31533	1504	1697	116806
5	**Kadagu**	410200	217200	2481	-	2481	352	972	116	971	4892
6	**Mandya**	496100	496100	130376	-	130376	23018	7539	8437	5159	174529
7	**Mysore**	1195400	1195400	121150	-	121150	25969	13319	23254	358	184050
8	**Tumkur**	1059800	445300	3868	-	3868	29524	150701	1074	-	185167
	Sub Total	**5365475**	**3495400**	**304739**	**-**	**304739**	**131729**	**255331**	**35057**	**17290**	**744146**
ii)	**KERALA**										
1	**Kannur**	297112	65000	-	-	-	-	-	-	-	-
2	**Wayanad**	213100	-	-	-	-	-	-	-	-	-
3	**Kozhikode**	447500	120000	-	-	-	-	-	-	-	-
4	**Palakkad**	448000	57500	-	-	-	-	-	-	-	-
5	**Idukki**	501900	40000	-	-	-	-	-	-	-	-
	Sub Total	**1907612**	**282500**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**
iii)	**TAMIL NADU**										
1	**Dharmapuri+**	1827100	1042100	667	-	667	4367	975	70147	-	76156
2	**Salem**	520530	N.A.	3095	-	3095	392	10676	121273	29	135465
3	**South Arcot**	1089500	62500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Coimbatore+periyar**	1567800	1323800	23326	-	23326	43	19315	72165	1170	116019
5	**Nilgiri**	254900	209900	-	-	-	-	-	273	26	299
6	**Madurai**	1262300	445300	33240	-	33240	27036	945	34263	5	95489
7	**Dindigul**	626664									
8	**Pudukottai+**	1574700	1117200	5484	-	5484	75905	23029	7986	-	112404
9	**Tiruchirapalli**	511400	N.A.	47263	-	47263	5176	7868	57335	-	117642
10	**Thanjavur**	828000	543000	171740	-	171740	350	52342	973	-	225405
	Sub Total	**10062894**	**4743800**	**284815**	**0**	**284815**	**113269**	**115150**	**364415**	**1230**	**878879**
											Contd.

1	**PONDICHERY**										
2	**Karaikal**	49200	16000	5839	-	5839	-	691	-	23	6553
	Sub Total	**49200**	**16000**	**5839**	**-**	**5839**	**0**	**691**	**0**	**23**	**6553**
	Grand Total	**17385181**	**8537700**	**595393**	**-**	**595393**	**244998**	**371172**	**399472**	**18543**	**1629578**

Contd/…

Table 15 : Gross area irrigated by Sources by river basin and State for 2008-2009

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
VIII	**Basin : East Folowing Rivers from Mahanadi to Kanyakumari, Year 2008-2009**										
i)	**ANDHRA PRADESH**										
1	**Srikakulam**	2353700	1983300	110385	-	110385	72261	11257	15513	2088	211504
2	**Vizianagaram**	653900	N.A	40753	-	40753	88748	25914	16451	4840	176706
3	**Vishakhapatnam**	1116100	N.A	48937	-	48937	32357	22739	13144	23026	140203
4	**East Godavari**	1854900	619300	340832	-	340832	35362	114045	193	12696	503128
5	**West Godavari**	778000	N.A	363665	-	363665	22725	236953	11605	14715	649663
6	**Krishna**	872700	487300	335070	-	335070	29880	95300	10945	17234	488429
7	**Guntur+**	5975100	2997800	383530	-	383530	5410	97242	7121	22865	516168
8	**Prakasam+**	1762600	N.A.	76781	-	76781	21413	104444	7952	18010	228600
9	**Nellore**	1307600	N.A	136618	-	136618	79821	83912	14922	11110	326383
10	**Khammam**	1602900	549100	77669	-	77669	51967	49259	51221	25186	255302
11	**Kurnool**	1765800	N.A	112170	-	112170	11920	81593	35248	12418	253349
12	**Chittoor**	1515200	1030000	320	-	320	24108	130033	33084	26	187571
	Sub Total	**21558500**	**7666800**	**2026730**	**-**	**2026730**	**475972**	**1052691**	**217399**	**164214**	**3937006**
ii)	**KARNATAKA**										
	Bangalore (Urban)	219000	47500	-	-	-	485	11730	-	-	12215
	Bangalore R.	581500	142500	-	-	-	128	28931	55	43	29157
	Kolar	822300	465700	-	-	-	-	37659	-	-	37659
	Sub Total	**1622800**	**655700**	**-**	**-**	**-**	**613**	**78320**	**55**	**43**	**79031**
iii)	**KERALA**										
	Thiruvantrum	219200	300	-	-	-	-	-	-	-	-
	Sub Total	**219200**	**300**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**
											Contd.

iv)	**ORISSA**										
1	**Phulbani**	1111900	204400	12510	-	12510	-	4480	2680	11120	30790
2	**Kalahandi**	1177200	50000	147360	-	147360	-	21720	10400	35140	214620
3	**Koraput**	2696100	868500	83340	-	83340	-	9570	1510	41340	135760
4	**Ganjam**	1253100	1253100	222320	-	222320	-	16430	26330	32380	297460
5	**Puri**	1018200	412100	115840	-	115840	-	21130	-	18140	155110
	Sub Total	**7256500**	**2788100**	**581370**	**-**	**581370**	**-**	**73330**	**40920**	**138120**	**833740**
v)	**TAMIL NADU**										
1	**Madras**	17400	17400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Chengai-Anna**	785700	785700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**North Arcot**	607700	607700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Dharmapuri+**	1827100	785000	667	-	667	4367	975	70147	-	76156
5	**Salem**	520530	N.A	3095	-	3095	392	10676	121273	29	135465
6	**Tiruvannmalai**	619100	619100	856	-	856	43163	1034	152173	-	197226
7	**South Arcot**	1089500	1027000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
8	**Dindigul +**	1262300	817000	5975	-	5975	8046	5208	93244	1537	114010
9	**Madurai**	374173	N.A								
10	**Thanjavur**	828000	285000	33240	-	33240	27036	945	34263	5	95489
11	**Pudukottai**	465100	465100	171740	-	171740	350	52342	973	-	225405
12	**PMT**	1260100	1260100	5484	-	5484	75905	23029	7986	-	112404
13	**Kamarajar**	344573	N.A	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
14	**Ramanathapuram**	417500	N.A	-	-	-	53017	2102	14545	-	69664
15	**Chidambaranar+**	1143100	1143100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
16	**Tirunelveli**	682300	N.A	32037	-	32037	59947	1038	57070	-	150092
17	**Kanyakumari**	168400	168400	13802	-	13802	22427	201	422	151	37003
	Sub Total	**12412576**	**7980600**	**266896**	**-**	**266896**	**294650**	**97550**	**552096**	**1722**	**1212914**

Contd/…

Table 15 : Gross area irrigated by Sources by river basin and State for 2008-2009

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
vi)	**PONDICHERY**										
	Pondicherry	49200	29300	-	-	-	-	19662	-	-	19662
	Sub Total	**49200**	**29300**	-	-	-	-	**19662**	-	-	**19662**
	Basin : Penner, Year 2008-2009										
i)	**ANDHRA PRADESH**										
1	**Kurnool**	1765800	1409600	112170	-	112170	11920	81593	35248	12418	253349
2	**Cuddapah**	1535900	1535900	30571	-	30571	7524	147486	6030	642	192253
3	**Anantapur**	1913000	1461600	21340	-	21340	8917	103128	9854	2364	145603
4	**Prakasam+**	1762600	N.A.	76781	-	76781	21413	104444	7952	18010	228600
5	**Guntur+**	5975100	1567700	383530	-	383530	5410	97242	7121	22865	516168
6	**Nellore**	1307600	N.A.	136618		136618	79821	83912	14922	11110	326383
7	**Chittoor**	1535900	N.A.	320	-	320	24108	130033	33084	26	187571
	Sub Total	**15795900**	**5974800**	**761330**	**-**	**761330**	**159113**	**747838**	**114211**	**67435**	**1849927**
ii)	**KARNATAKA**										
1	**Bangalore R.**	581500	43500	-	-	-	128	28931	55	43	29157
2	**Kolar**	822300	356600	-	-	-	-	37659	-	-	37659
3	**Tumkur**	1059800	220800	3868	-	3868	29524	150701	1074	-	185167
	Sub Total	**2463600**	**620900**	**3868**	**-**	**3868**	**29652**	**217291**	**1129**	**43**	**251983**
	Grand Total	**61378276**	**25793281**	**3640194**	**76781**	**3661607**	**1064444**	**2294634**	**943820**	**600177**	**8184263**
IX	**Basin : West year Rivers from Kanyakumari to Tapi, year 2008-2009**										
	DADRA & NAGAR HAVELI										
1	**Daman & Diu**	11200	7200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Dadra & Nagar Haveli**	49100	49100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Sub Total**	**60300**	**56300**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
4	**Goa**	370200	370200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**370200**	**370200**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	GUJARAT										
1	**Surat**	765700	282700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Valsad**	524400	524400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.

Contd.

3	**Dangs**	176400	176400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**1466500**	**983500**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	KARNATAKA										
1	**Belgaum**	1341500	96600	105165	-	105165	2095	143376	132465	136054	519155
2	**Dharwad**	1373800	185800	54971	-	54971	401	18436	-	13	73821
3	**Chikmaglur**	720100	14500	7044	-	7044	10001	10606	617	9062	37330
4	**Dak. Kannada**	844100	844100	-	-	-	-	9932	41129	20914	71975
5	**Hassan**	681400	60000	39820	-	39820	42252	31533	1504	1697	116806
6	**Kodagu**	410200	193000	2481	-	2481	352	972	116	971	4892
7	**Shimoga**	1055300	271800	46860	-	46860	64737	30707	6079	11725	160108
8	**Utt. Kannada**	1029100	120000	-	-	-	5175	3048	9593	10913	28729
	Sub Total	**7455500**	**1785800**	**256341**	**-**	**256341**	**125013**	**248610**	**191503**	**191349**	**1012816**
	KERALA										
1	**Kasargod**	199200	199200	-	-	-	-	-	-	-	-
2	**Kannur**	296600	231600	-	-	-	-	-	-	-	-
3	**Kozhikode**	447500	327500	-	-	-	-	-	-	-	-
4	**Mallapuram**	355000	355000	-	-	-	-	-	-	-	-
5	**Palakkad**	448000	390500	-	-	-	-	-	-	-	-

Contd.

Table 15 : Gross area irrigated by Sources by river basin and state for 2008-2009

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
6	**Thrissur**	303200	303200	-	-	-	-	-	-	-	-
7	**Ernakulam**	240700	240700	-	-	-	-	-	-	-	-
8	**Idukki**	501900	461900	-	-	-	-	-	-	-	-
9	**Kottayam**	220300	220300	-	-	-	-	-	-	-	-
10	**Alappuzha**	141400	141400	-	-	-	-	-	-	-	-
11	**Pathaamthitta**	264200	264200	-	-	-	-	-	-	-	-
12	**Kollam**	249100	249100	-	-	-	-	-	-	-	-
13	**Thiruvananthapuram**	219200	218900	-	-	-	-	-	-	-	-
	Sub Total	**3886300**	**3603500**	-	-	-	-	-	-	-	-
	MAHARASHTRA										
1	**Bombay**	60300	60300	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
											Contd.

2	**Thane**	955800	955800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Raigarh**	715200	715200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Sindhudurg**	1341500	1329800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Nasik**	1553000	420600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Dhule**	1315000	7500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	**Kolhapur**	768500	9900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**6709300**	**3499100**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	TAMIL NADU										
1	**Nilgiri**	254900	45000	-	-	-	-	-	273	26	299
2	**Coimbatore**	746900	244000	23326	-	23326	43	19315	72165	1170	116019
3	**Sub Total**	**1001800**	**289000**	**23326**	**-**	**23326**	**43**	**19315**	**72438**	**1196**	**116318**
4	**PONDICHERY**										
5	**Yanam**	3000	3000	521	-	521	-	-	-	-	521
6	**Mahe**	900	900	-	-	-	-	-	-	32	32
	Sub Total	**3900**	**3900**	**521**	**-**	**521**	**-**	**-**	**-**	**32**	**553**
	Grand Total	**20953800**	**10591300**	**280188**	**-**	**280188**	**125056**	**267925**	**263941**	**192577**	**1129687**
X	**Basin : Tapi, Year 2008-2009**										
	<---------- Not Available Data ---------->										
XI	**Basin : Narmada, Year 2008-2009**										
	GUJARAT										
1	**Vadodara**	779400	396000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Bharuch**	903800	468000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Surat**	765700	18000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**2448900**	**882000**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	MADHYA PRADESH										
1	**Sagar**	1025200	171600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Damoh**	730600	65100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Dewas**	702000	394400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Jhabua**	678200	335700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Dhar**	815300	471400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Indore**	389800	97400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	**West Nimar (khargaon)**	1345000	1171000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
8	**East Nimar (khandwa)**	1077900	725900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
9	**Vidisha**	737100	46100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.

Contd.

10	**Sehore**	657800	225600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
11	**Raisen**	846600	467800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
12	**Betul**	1004300	370000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
13	**Hoshangabad**	1003700	1003700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
14	**Jabalpur**	1016000	648300	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
15	**Narsimhapur**	513300	513300	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
16	**Mandla**	1326900	1139500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
17	**Chhindwara**	1181500	285400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
18	**Seoni**	875800	221800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
19	**Balaghat**	922900	221500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
20	**Shahdol**	1402800	77800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**18252700**	**8653300**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**

Contd.

Table 15 : Gross area irrigated by Sources by river basin and state for 2008-2009

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
	CHHATISGARH										
1	**Rajnandgaon**	1112700	97200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**1112700**	**97200**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
	MAHARASHTRA										
	Dhule	1315000	396000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**1315000**	**396000**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
	Grand Total	**23129300**	**10028500**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
XII	**Basin : Mahi and Sabarmati 2008-2009**										
a)	**Basin:Mahi**										
i)	**GUJARAT**										
1	**Kheda**	719400	105000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Panchmahals**	886600	885600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Vadodara**	779400	383400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Bharuch**	903800	294800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**3289200**	**1668800**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.

Contd.

ii)	**MADHYA PRADESH**										
1	**Ratlam**	486100	180700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Jhabua**	678200	342500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Dhar**	815300	150000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Mandsaur**	979100	3300	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**2958700**	**676500**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
iii)	**RAJASTHAN**										
1	**Udaipur**	1727900	637500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Chittorgarh**	1085600	289700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Dungarpur**	377000	327000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Bansewara**	503700	503700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**3694200**	**1757900**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.

Contd.

Table 15 : Gross area irrigated by Sources by river basin and State for 2008-2009

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
b)	**Basin: Luni & Others, Year 2008-2009**										
i)	**GUJARAT**										
1	**Surendranagar**	1048900	365000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Banaskantha**	1270300	52500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Sabarkantha**	739000	739000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Mahesana**	902700	102000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Gandhinagar**	64900	64900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Ahmedabad**	870700	460000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	**Kheda**	719400	614400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**5615900**	**2397800**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
ii)	**RAJASTHAN**										
1	**Sirohi**	513600	10000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Udaipur**	1727900	258900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Dungarpur	377000	50000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**2618500**	**318900**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
											Contd.

c)	**Basin: Luni & Others**										
i)	**GUJARAT**										
1	**Jamnagar**	1412500	1412500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Rajkot**	1120300	1120300	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Surendranagar**	1048900	683900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Bhavnagar**	1115500	1115500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Amreli**	676000	676000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Junagadh**	1060700	1060700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	**Kachch**	4565200	4565200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
8	**Banaskantha**	1270300	1217800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
9	**Mahesana**	902700	800700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
10	**Ahemdabad**	870700	410700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**14042800**	**13063300**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
ii)	**RAJASTHAN**										
1	**Ajmer**	848100	84900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Jodhpur**	2285000	685500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Nagaur**	1771800	708900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Pali**	1238700	1238700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Jalor**	1064000	1064000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Sirohi**	513600	503600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**7721200**	**4285600**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
iii)	**Daman& Diu**										
	Diu	11200	4000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**11200**	**4000**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Grand Total	**39951700**	**24172800**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.

Sources:- Directorate of Economics & Statistics, Ministry of Agriculture. (Through receeived the data from Internet)

Table 16 : Net area Irrigated by sources by river basin and State for 2006-2007

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
I	Basin : Mahanadi, Year 2006-2007										
i)	JHARKHAND										
	Gumla	907700	63500	362	-	362	952	-	2227	709	4250
	Sub Total	**907700**	**63500**	**362**	**-**	**362**	**952**	**-**	**2227**	**709**	**4250**
ii)	ORISSA										
1	Sambalpur	1751600	1390400	46350	-	46350	-	3510	5030	6740	61630
2	Sundergarh	971200	410000	28820	-	28820	-	10480	10510	18410	68220
3	Cuttak	1114200	752800	68660	-	68660	-	14730	2490	17220	103100
4	Dhenkanal	1082700	311000	32560	-	32560	-	1370	5310	7640	46880
5	Phulbani	1111900	907500	7910	-	7910	-	1310	1450	6490	17160
6	Balangir	891300	891300	18180	-	18180	-	7960	14950	10070	51160
7	Kalahandi	1177200	981900	104470	-	104470	-	8810	5340	13350	131970
8	Koraput	2696100	197700	48770	-	48770	-	14620	-	38650	102040
9	Puri	1018200	606100	77010	-	77010	-	9360	560	10950	97880
	Sub Total	**11814400**	**6448700**	**432730**	**-**	**432730**	**0**	**72150**	**45640**	**129520**	**680040**
iii)	MADHYA PRADESH										
1	Shahdol	1402800	8400	4364	-	4364	2385	1317	3835	8897	20798
	Sub Total	**1402800**	**8400**	**4364**	**-**	**4364**	**2385**	**1317**	**3835**	**8897**	**20798**
iv)	CHHATISGARH										
1	Surguja	2233700	496200	9485	259	9744	2057	927	6636	20250	39614
2	Bilaspur	1989700	1895700	115504	-	115504	4207	16615	4357	2172	142855
3	Raigarh	1292400	1090600	21942	42	21984	5218	24733	770	6894	59599
4	Rajnandgaon	1112700	756500	52669	75	52744	3594	8927	2945	2622	70832
5	Durg	853700	853700	129366	-	129366	4941	75728	2431	16681	229147
6	Raipur	2125800	2115200	234220	-	234220	8280	31834	5052	13274	292660
7	Bastar	3911400	222100	182	-	182	1520	1890	811	3329	7732
	Sub Total	**13519400**	**7430000**	**563368**	**376**	**563744**	**29817**	**160654**	**23002**	**65222**	**842439**

Contd.

v)	MAHARASHTRA										
1	Chandrapur+	2585500	28600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	Gadchiroli	1441200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**4026700**	**28600**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
	Grand Total	**31671000**	**13979200**	**1000824**	**376**	**1001200**	**33154**	**234121**	**74704**	**204348**	**1547527**

Contd.

Table 16 : Net area Irrigated by sources by river basin and State for 2006-2007

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
II	Basin : Subernarekha, Burhabalang and Baitarni, Year 2006-2007										
i)	JHARKHAND										
1	Ranchi	769800	488000	-	-	-	629	-	2907	459	3995
2	Singhbhum	1344000	902100	348	-	348	108	-	173	193	822
	Sub Total	**2113800**	**1390100**	**348**	**-**	**348**	**737**	**-**	**3080**	**652**	**4817**
ii)	ORISSA										
1	Mayurbhanj	1041800	751800	64960	-	64960	-	21240	1950	13020	101170
2	Balasore	631100	472100	26000	-	26000	-	52190	-	12200	90390
	Sub Total	**1672900**	**1223900**	**90960**	**-**	**90960**	**-**	**73430**	**1950**	**25220**	**191560**
iii)	WEST BENGAL										
1	Medinipur	1408100	311600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	Purulia	625900	101800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**2034000**	**413400**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
	Grand Total	**5820700**	**3027400**	**91308**	**N.A.**	**91308**	**737**	**73430**	**5030**	**25872**	**196377**
III	Basin : Brahamani , Year 2006-2007										
i)	JHARKHAND										
1	Lohardaga	149100	89100	258	-	258	1108	-	1428	1231	4025

Contd.

2	Gumla	907700	794200	362	-	362	952	-	2227	709	4250
3	Ranchi	769800	230000	-	-	-	629	-	2907	459	3995
4	Pa. Singhbhum	1344000	412000	348	-	348	108	-	173	193	822
	Sub Total	**3170600**	**1525300**	**968**	**-**	**968**	**2797**	**-**	**6735**	**2592**	**13092**
ii)	CHHATISGARH										
	Raigarh	1292400	126800	21942	42	21984	5218	24733	770	6894	59599
	Sub Total	**1292400**	**126800**	**21942**	**42**	**21984**	**5218**	**24733**	**770**	**6894**	**59599**
iii)	ORISSA										
1	Sambalpur	1751600	361200	46350	-	46350	-	3510	5030	6740	61630
2	Sundergarh	971200	561200	28820	-	28820	-	10480	10510	18410	68220
3	Keonjhar	830300	830300	47340	-	47340	-	5360	5590	7190	65480
4	Mayurbhanj	1041800	290000	64960	-	64960	-	21240	1950	13020	101170
5	Balasore	631100	159000	26000	-	26000	-	52190	-	12200	90390
6	Cuttack	1114200	361400	68660	-	68660	-	14730	2490	17220	103100
7	Dhenkanal	1082700	771700	32560	-	32560	-	1370	5310	7640	46880
	Sub Total	**7422900**	**3334800**	**314690**	**-**	**314690**	**-**	**108880**	**30880**	**82420**	**536870**
	Grand Total	**11885900**	**4986900**	**337600**	**42**	**337642**	**8015**	**133613**	**38385**	**91906**	**609561**
IV	Basin : Rushikulya, Vamsadhra, Sarada and Nagavali, Year 2006-2007										
	<---------- Not Available Data ---------->										

Contd./…

Table 16 : Net area Irrigated by sources by river basin and State for 2006-2007

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
V	Basin : Godavari, Year 2006-2007										
i)	ANDHRA PRADESH										
1	Visakhapatnam	1116100	370400	37920	-	37920	30400	9258	4752	18213	100543
2	East Godavari	1080700	154900	177463	-	177463	23808	59873	334	16316	277794
3	West Godavari	774200	151000	190830	-	190830	20139	134727	10577	8253	364526
4	Rangareddy	749300	34200	26	-	26	1160	41082	9434	1620	53322
5	Medak	969900	835500	3484	-	3484	14117	109097	10460	1412	138570
6	Nizamabad	795600	795600	31225	-	31225	16665	117576	4085	4746	174297
7	Adilabad	1610500	1610500	15602	-	15602	14645	37854	15608	4346	88055
8	Karimnagar	1182300	1178700	77584	-	77584	42690	28590	191302	815	340981
9	Warangal	1284600	724200	2287	-	2287	77134	72473	168896	3099	323889
10	Khammam	1602900	1616200	51428	-	51428	47655	38060	41346	18501	196990
	Sub Total	**11166100**	**7471200**	**587849**	**-**	**587849**	**288413**	**648590**	**456794**	**77321**	**2058967**
ii)	KARNATAKA										
	Bidar	544800	448700	981	-	981	1284	17154	26790	986	47195
	Sub Total	**544800**	**448700**	**981**	**-**	**981**	**1284**	**17154**	**26790**	**986**	**47195**
iii)	MADHYA PRADESH										
1	Betul	1004300	224300	18888	-	18888	212	12623	71634	12580	115937
2	Mandla	1326900	82400	15854	-	15854	12	-	2924	1650	20440
3	Chhindwara	1181500	896100	10749	-	10749	4234	29867	76113	5842	126805
4	Seoni	875800	654000	56693	59	56752	8890	2983	31822	13235	113682
5	Balaghat	922900	701400	73640	-	73640	25470	99	20590	4919	124718
	Sub Total	**5311400**	**2558200**	**175824**	**59**	**175883**	**38818**	**45572**	**203083**	**38226**	**501582**
											Contd.

iv)	CHHATISGARH										
1	Rajnandgaon	1112700	259000	52669	75	52744	3594	8927	2945	2622	70832
2	Raipur	2125800	10600	234220	-	234220	8280	31834	5052	13274	292660
3	Bastar	3911400	3689300	182	-	182	1520	1890	811	3329	7732
	Sub Total	**7149900**	**3958900**	**287071**	**75**	**287146**	**13394**	**42651**	**8808**	**19225**	**371224**

Contd.

Table 16 : Net area Irrigated by sources by river basin and State for 2006-2007

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
v)	MAHARASHTRA										
1	Nashik	1553000	736100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	Jalgaon	1176500	6000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	Ahmadnagar	1704800	1089100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	Pune	1564300	14000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	Solapur	1489500	11900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	Aurangabad	1010700	899100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	Jalana	771800	771800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
8	Parbhani	1104100	1104100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
9	Bid	1069300	946900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
10	Nanded	1052800	1052800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
11	Osmanabad	756900	226400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
12	Latur	715700	715700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
13	Buldghana	966100	384600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
14	Akola	1057400	374500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
15	Amravati	1221000	419600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
16	Yavatmal	1358200	1358200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
17	Wardha	630900	630900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
18	Nagpur	989200	989200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
19	Bhandara	932100	932100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
20	Chandrapur	1144300	1115700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
21	Gadchiroli	1441200	1441200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**23709800**	**15219900**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**

Contd.

v)	ORISSA										
1	Kalahandi	1177200	145300	104470	-	104470	-	8810	5340	13350	131970
2	Koraput	2696100	1629900	48770	-	48770	-	14620	-	38650	102040
	Sub Total	**3873300**	**1775200**	**153240**	**-**	**153240**	**-**	**23430**	**5340**	**52000**	**234010**
	Grand Total	**51755300**	**31432100**	**1204965**	**134**	**1205099**	**341909**	**777397**	**700815**	**187758**	**3212978**

Contd.

Table 16 : Net area Irrigated by sources by river basin and State for 2006-2007

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
VI	Basin : Krishna , Year 2006-2007										
i)	ANDHRA PRADESH										
1	Krishna	872700	385400	224427	-	224427	22070	39469	10021	11924	307911
2	Anantapur	1913000	451400	18722	-	18722	1369	76819	11450	512	108872
3	Guntoor	5975100	1567700	301468	-	301468	4937	48187	4684	14288	373564
4	Prakasam	1762600	N.A.	66699	-	66699	19073	64214	8039	15095	173120
5	Nellore	1307600	N.A.	89785	-	89785	69456	49190	21304	7628	237363
6	Kurnool	1765800	N.A.	71233	-	71233	9948	66423	20858	7245	175707
7	Mehbubnagar	1843200	1843200	21482	-	21482	595	117989	9605	6639	156310
8	Rangareddy	749300	715100	26	-	26	1160	41082	9434	1620	53322
9	Hyderabad	21700	21700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
10	Medak	969900	134400	3484	-	3484	14117	109097	10460	1412	138570
11	Karimnagar	1182300	3600	77584	-	77584	42690	28590	191302	815	340981
12	Warangal	1284600	560400	2287	-	2287	77134	72473	168896	3099	323889
13	East Godavari	1080700	N.A.	177463	-	177463	28808	59873	334	11316	277794
14	Khammam	2683600	518300	51428	-	51428	47655	38060	41346	18501	196990
15	Nalgonda	1424000	1424000	76375	-	76375	14374	92501	42694	9683	235627
	Sub Total	**24836100**	**7625200**	**1182463**	**-**	**1182463**	**353386**	**903967**	**550427**	**109777**	**3100020**

Contd.

ii)	KARNATAKA										
1	Belgaum	1341500	1244900	86520	-	86520	2206	103797	115771	122902	431196
2	Bellary	988500	988500	77836	-	77836	2253	54245	8330	25222	167886
3	Bidar	544800	96100	981	-	981	1284	17154	26790	986	47195
4	Bijapur	1706900	1706900	99953	-	99953	3640	53720	56062	24018	237393
5	Chikmaglur	720100	620800	5342	-	5342	10939	10122	572	8391	35366
6	Chitradurga	1085200	1085200	6090	-	6090	382	76971	-	-	83443
7	Dharwad	1373800	1188000	35393	-	35393	-	15623	-	259	51275
8	Gulbarga	1622400	1622400	130688	-	130688	2728	12634	28991	7552	182593
9	Hassan	681400	131800	31043	-	31043	27471	34010	968	907	94399
10	Raichur	1401700	1401700	118666	-	118666	2497	13509	13360	6837	154869
11	Shimoga	1055300	783500	45540	-	45540	52639	18061	6416	11126	133782
12	Tumkur	1059800	393700	3387	-	3387	25914	118098	1755	-	149154
13	Uttar Kannada	1029100	63700	-	-	-	4752	1935	7720	11540	25947
	Sub Total	**14610500**	**11327200**	**641439**	**-**	**641439**	**136705**	**529879**	**266735**	**219740**	**1794498**

Contd.

Table 16 : Net area Irrigated by sources by river basin and State for 2006-2007

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
iii)	MAHARASHTRA										
1	Ratnagiri	820800	11700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	Ahmadnagar	1704800	618000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	Pune	1564300	1548300	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	Satara	1048000	1048000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	Sangli	857200	857200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	Solapur	1489500	1488400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	Kolhapur	768500	758600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
8	Bid	1069300	156700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
9	Osmanabad+	1472600	455600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
10	Latur	737200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**11532200**	**6942500**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
	Grand Total	**50978800**	**25894900**	**1823902**	**N.A.**	**1823902**	**490091**	**1433846**	**817162**	**329517**	**4894518**

Source : Directorate of Economics and Statistics, Ministry of Agriculture (Through NET)

Note : 1. Totals may not tally due to rounding off.

2. N.A. = Not Available

Contd.

VII	**Basin : Cauvery , Year 2006-2007**										
i)	KARNATAKA										
1	Bangalore Rural	219000	171500	2774	-	2774	186	60650	-	236	63846
2	Bangalore Urban	581500	395500	-	-	-	1156	9311	352	-	10819
3	Chikmagalur	722075	84800	5342	-	5342	10939	10122	572	8391	35366
4	Hassan	681400	489600	31043	-	31043	27471	34010	968	907	94399
5	Kodagu (Coorg)	410200	217200	2479	-	2479	131	426	84	1371	4491
6	Mandya	496100	496100	92916	-	92916	18840	4512	7057	2879	126204
7	Mysore	1195400	1195400	105346	-	105346	17200	9455	17400	353	149754
8	Tumkur	1059800	445300	3387	-	3387	25914	118098	1755	-	149154
	Sub Total	**5365475**	**3495400**	**243287**	**-**	**243287**	**101837**	**246584**	**28188**	**14137**	**634033**
ii)	KERALA										
1	Kannur	297112	65000	1169	709	1878	1944	11	9692	7015	20540
2	Wynad	213100	-	702	511	1213	164	41	83	9465	10966
3	Kozhikode	447500	120000	1209	28	1237	247	240	1977	1616	5317
4	Palakkad	448000	57500	42159	595	42754	4213	1481	16029	14867	79344
5	Idukki	501900	40000	2483	558	3041	5615	12	1732	5510	15910
	Sub Total	**1907612**	**282500**	**47722**	**2401**	**50123**	**12183**	**1785**	**29513**	**38473**	**132077**

Contd./…

Table 16 : Net area Irrigated by sources by river basin and State for 2006-2007

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
iii)	TAMIL NADU										
1	Dharmapuri+	1827100	1042100	1536	-	1536	6109	2073	55884	55	65657
2	Salem	520530	N.A.	2312	-	2312	2236	10035	83976	205	98764
3	South Arcot	1089500	62500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	Coimbatore+Periyar	1567800	1323800	50734	560	51294	511	22719	100908	-	175432
5	Nilgiri	254900	209900	3	-	3	-	-	521	169	693
6	Madurai+	1262300	445300	33421	-	33421	21052	393	31085	-	85951
7	Dindugul	626664	N.A.	7329	-	7329	4634	2212	84327	926	99428
8	Pudukottai+	1574700	1117200	10269	-	10269	69779	21521	5895	-	107464
9	Tiruchirapalli	511400	N.A.	36645	-	36645	5789	9920	56434	-	108788
10	Thanjavur	828000	543000	131964	-	131964	258	34357	370	-	166949
	Sub Total	**10062894**	**4743800**	**274213**	**-**	**274773**	**110368**	**103230**	**419400**	**1355**	**909126**
iv)	PONDICHERY										
	Karaikal	49200	16000	6136	-	6136	-	34	-	15	6185
	Sub Total	**49200**	**16000**	**6136**	**-**	**6136**	**0**	**34**	**0**	**15**	**6185**
	Grand Total	**17385181**	**8537700**	**571358**	**2401**	**574319**	**224388**	**351633**	**477101**	**53980**	**1681421**
VIII	**Basin : East Folowing Rivers from Mahanadi to Kanyakumari , Year 2006-2007**										
i)	ANDHRA PRADESH										
1	Srikakulam	2353700	1983300	102976	-	102976	67363	10302	13207	2831	196679
2	Vizianagaram	653900	N.A	41397	-	41397	76158	12537	12355	4591	147038
3	Vishakhapatnam	1116100	N.A	37920	-	37920	30400	9258	4752	18213	100543
4	East Godavari	1854900	619300	177463	-	177463	28808	59873	334	11316	277794

Contd.

5	West Godavari	778000	N.A	190830	-	190830	20139	134727	10577	8253	364526
6	Krishna	872700	487300	224427	-	224427	22070	39469	10021	11924	307911
7	Guntur+	5975100	2997800	301468	-	301468	4937	48187	4684	14288	373564
8	Prakasam+	1762600	N.A.	66699	-	66699	19073	64214	8039	15095	173120
9	Nellore+	1307600	N.A	89785	-	89785	69456	49190	21304	7628	237363
10	Khammam	1602900	549100	51428	-	51428	47655	38060	41346	18501	196990
11	kurnool	1765800	N.A	71233	-	71233	9948	66423	20858	7245	175707
12	Chittoor	1515200	1030000	35	-	35	21062	98524	37748	39	157408
	Sub Total	**21558500**	**7666800**	**1355661**	**-**	**1355661**	**417069**	**630764**	**185225**	**119924**	**2708643**

Contd.

Table 16 : Net area Irrigated by sources by river basin and State for 2006-2007

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
ii)	KARNATAKA										
1	Bangalore	219000	47500	-	-	-	1156	9311	352	-	10819
2	Bangalore R.	581500	142500	2774	-	2774	186	60650	-	236	63846
3	Kolar	822300	465700	-	-	-	-	71880	-	-	71880
	Sub Total	**1622800**	**655700**	**2774**	**0**	**2774**	**1342**	**141841**	**352**	**236**	**146545**
iii)	KERALA										
	Thiruvanatrum	219200	300	2842	231	3073	388	2	816	423	4702
	Sub Total	**219200**	**300**	**2842**	**231**	**3073**	**388**	**2**	**816**	**423**	**4702**
iv)	ORISSA										
1	Phulbani	1111900	204400	7910	-	7910	-	1310	1450	6490	17160
2	Kalahandi	1177200	50000	104470	-	104470	-	8810	5340	13350	131970
3	Koraput	2696100	868500	48770	-	48770	-	14620	-	38650	102040
4	Ganjam	1253100	1253100	201340	-	201340	-	9640	11280	12100	234360
5	Puri	1018200	412100	77010	-	77010	-	9360	560	10950	97880
	Sub Total	**7256500**	**2788100**	**439500**	**-**	**439500**	**0**	**43740**	**18630**	**81540**	**583410**
											Contd.

v)	TAMIL NADU										
1	Madras	17400	17400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	Chengai-Anna	785700	785700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	North Arcot	607700	607700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	Dharmapuri+	1827100	785000	1536	-	1536	6109	2073	55884	55	65657
5	Salem	520530	N.A	2312	-	2312	2236	10035	83976	205	98764
6	Tiruvannmalai	619100	619100	126	-	126	25609	841	121091	-	147667
7	South Arcot	1089500	1027000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
8	Dindigul +	1262300	817000	7329	-	7329	4634	2212	84327	926	99428
9	Madurai	374173	N.A	33421	-	33421	21052	393	31085	-	85951
10	Thanjavur	828000	285000	131964	-	131964	258	34357	370	-	166949
11	Pudukottai	465100	465100	10269	-	10269	69779	21521	5895	-	107464
12	PMT	1260100	1260100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
13	Kamarajar	344573	N.A	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
14	Ramanathapuram	417500	N.A	-	-	-	58723	681	10274	-	69678
15	Chidambaranar+	1143100	1143100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
16	Tirunelveli	682300	N.A	17681	-	17681	52031	874	47585	227	118398
17	Kanyakumari	168400	168400	16045	-	16045	10360	157	347	187	27096
	Sub Total	**12412576**	**7980600**	**220683**	**-**	**220683**	**250791**	**73144**	**440834**	**1600**	**987052**
vi)	PONDICHERY										
	Pondicherry	49200	29300	-	-	-	-	11188	-	-	11188
	Sub Total	**49200**	**29300**	-	-	-	-	**11188**	-	-	**11188**

Contd./…

Table 16 : Net area Irrigated by sources by river basin and State for 2006-2007

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
	Basin : Penner , Year 2006-2007										
i)	ANDHRA PRADESH										
1	Kurnool	1765800	1409600	71233	-	71233	9948	66423	20858	7245	175707
2	Cuddapah	1535900	1535900	20306	-	20306	2409	95334	4702	1561	124312
3	Anantapur	1913000	1461600	18722	-	18722	1369	76819	11450	512	108872
4	Prakasam+	1762600	N.A.	66699	-	66699	19073	64214	8039	15095	173120
5	Guntur+	5975100	1567700	301468	-	301468	4937	48187	4684	14288	373564
6	Nellor+	1307600	N.A.	89785	-	89785	69456	49190	21304	7628	237363
7	Chittoor	1535900	N.A.	35	-	35	21062	98524	37748	39	157408
	Sub Total	**15795900**	**5974800**	**568213**	-	**568213**	**107192**	**400167**	**71037**	**46329**	**1192938**
ii)	KARNATAKA										
1	Bangalore R.	581500	43500	2774	-	2774	186	60650	-	236	63846
2	Kolar	822300	356600	-	-	-	-	71880	-	-	71880
3	Tumkur	1059800	220800	3387	-	3387	25914	118098	1755	-	149154
	Sub Total	**2463600**	**620900**	**6161**	**-**	**6161**	**26100**	**250628**	**1755**	**236**	**284880**
	Grand Total	**61378276**	**25716500**	**2595834**	**231**	**2596065**	**802882**	**1551474**	**718649**	**250288**	**5919358**
IX	**Basin : West Flowing Rivers from Kanyakumari to Tapi , Year 2006-2007**										
	DADRA & NAGAR HAVELI										
1	Daman & Diu	11200	7200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	Dadra & Nagar Haveli	49100	49100	2635	-	2635	-	174	1663	2936	7408
	Sub Total	60300	56300	2635	N.A.	2635	0	174	1663	2936	7408
	Goa	370200	370200	4115	-	4115	-	-	19617	-	23732
	Sub Total	**370200**	**370200**	**4115**	-	**4115**	**0**	**0**	**19617**	**0**	**23732**
											Contd.

	GUJARAT										
1	Surat	765700	282700	162500	-	162500	-	-	98600	200	261300
2	Valsad	524400	524400	17800	-	17800	900	300	19200	21900	60100
3	Dangs	176400	176400	-	-	-	-	-	1400	-	1400
	Sub Total	**1466500**	**983500**	**180300**	**0**	**180300**	**900**	**300**	**119200**	**22100**	**322800**
	KARNATAKA										
1	Belgaum	1341500	96600	86520	-	86520	2206	103797	115771	122902	431196
2	Dharwad	1373800	185800	35393	-	35393	-	15623	-	259	51275
3	Chikmaglur	720100	14500	5342	-	5342	10939	10122	572	8391	35366

Contd./…

Table 16 : Net area Irrigated by sources by river basin and State for 2006-2007

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
4	Dak. Kannada	844100	844100	-	-	-	-	9271	40691	21934	71896
5	Hassan	681400	60000	31043	-	31043	27471	34010	968	907	94399
6	Kodagu	410200	193000	2479	-	2479	131	426	84	1371	4491
7	Shimoga	1055300	271800	45540	-	45540	52639	18061	6416	11126	133782
8	Utt. Kannada	1029100	120000	-	-	-	4752	1935	7720	11540	25947
	Sub Total	**7455500**	**1785800**	**206317**	**-**	**206317**	**98138**	**193245**	**172222**	**178430**	**848352**
	KERALA										
1	Kasargod	199200	199200	103	701	804	12081	305	23479	8006	44675
2	Kannur	296600	231600	1169	709	1878	1944	11	9692	7015	20540
3	Kozhikode	447500	327500	1209	28	1237	247	240	1977	1616	5317
4	Mallapuram	355000	355000	972	550	1522	2916	4619	7161	8096	24314
5	Palakkad	448000	390500	42159	595	42754	4213	1481	16029	14867	79344

Contd.

6	Thrissur	303200	303200	23819	147	23966	6605	999	36583	14139	82292
7	Ernakulam	240700	240700	19512	70	19582	2346	356	9668	8708	40660
8	Idukki	501900	461900	2483	558	3041	5615	12	1732	5510	15910
9	Kottayam	220300	220300	559	6	565	119	2	1089	12797	14572
10	Alappuzha	141400	141400	5278	71	5349	5073	4091	2514	22610	39637
11	Pathaamthitta	264200	264200	1912	23	1935	96	2	1936	1913	5882
12	Kollam	249100	249100	351	100	451	257	3	1718	571	3000
13	Thiruvantrum	219200	218900	2842	231	3073	388	2	816	423	4702
	Sub Total	**3886300**	**3603500**	**102368**	**3789**	**106157**	**41900**	**12123**	**114394**	**106271**	**380845**
	MAHARASHTRA										
1	Bombay	60300	60300	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	Thane	955800	955800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	Raigarh	715200	715200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	Sindhudurg	1341500	1329800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	Nasik	1553000	420600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	Dhule	1315000	7500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	Kolhapur	768500	9900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**6709300**	**3499100**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
	TAMIL NADU										
1	Nilgiri	254900	45000	3	-	3	-	-	521	169	693
2	Coimbatore	746900	244000	50734	560	51294	511	22719	100908	-	175432
	Sub Total	**1001800**	**289000**	**50737**	**560**	**51297**	**511**	**22719**	**101429**	**169**	**176125**

Contd./…

Table 16 : Net area Irrigated by sources by river basin and State for 2006-2007

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
	PONDICHERY										
1	Yanam	3000	3000	316	-	316	-	-	-	-	316
2	Mahe	900	900	-	-	-	-	-	-	41	41
	Sub Total	**3900**	**3900**	**316**	**N.A.**	**316**	**N.A.**	**N.A.**	**N.A.**	**41**	**357**
	Grand Total	**20953800**	**10591300**	**546788**	**4349**	**551137**	**141449**	**228561**	**528525**	**309947**	**1759619**
X	**Basin : Tapi, Year 2006-2007**										
	<---------- Not Available Data ---------->										
XI	**Basin : Narmada, Year 2006-2007**										
i)	GUJARAT										
1	Vadodara	779400	396000	31600	-	31600	4700	114500	75300	11700	237800
2	Bharuch	903800	468000	54400	-	54400	1600	8400	54200	400	119000
3	Surat	765700	18000	162500	-	162500	-	-	98600	200	261300
	Sub Total	**2448900**	**882000**	**248500**	**-**	**248500**	**6300**	**122900**	**228100**	**12300**	**618100**
ii)	MADHYA PRADESH										
1	Sagar	1025200	171600	8166	-	8166	2645	36962	116988	76295	241056
2	Damoh	730600	65100	11604	-	11604	783	29798	28296	45300	115781
3	Dewas	702000	394400	5311	-	5311	2372	87539	66912	11307	173441
4	Jhabua	678200	335700	9773	-	9773	10682	1721	22132	23449	67757
5	Dhar	815300	471400	13274	-	13274	11961	122671	82158	51854	281918
6	Indore	389800	97400	17735	-	17735	5093	117612	18264	17993	176697
7	West Nimar (Khangaon)	1345000	1171000	24188	-	24188	444	28914	87690	49081	190317
8	East Nimar (Khandwa)	1077900	725900	6305	-	6305	545	18261	82323	15401	122835

Contd.

9	Vidisha	737100	46100	39894	-	39894	4854	106261	42634	61897	255540
10	Sehore	657800	225600	41217	-	41217	6264	53880	83431	44856	229648
11	Raisen	846600	467800	64225	-	64225	2002	81122	27991	34728	210068
12	Betul	1004300	370000	18888	-	18888	212	12623	71634	12580	115937
13	Hoshangabad	1003700	1003700	147080	-	147080	1069	52317	53491	16290	270247
14	Jabalpur	1016000	648300	9445	-	9445	99	66680	25404	15761	117389
15	Narsimhapur	513300	513300	1095	-	1095	8	76538	92766	7350	177757
16	Mandla	1326900	1139500	15854	-	15854	12	-	2924	1650	20440
17	Chhindwara	1181500	285400	10749	-	10749	4234	29867	76113	5842	126805
18	Seoni	875800	221800	56693	59	56752	8890	2983	31822	13235	113682

Contd.

Table 16 : Net area Irrigated by sources by river basin and State for 2006-2007

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
19	Balaghat	922900	221500	73640	-	73640	25470	99	20590	4919	124718
20	Shahdol	1402800	77800	4364	-	4364	2385	1317	3835	8897	20798
	Sub Total	**18252700**	**8653300**	**579500**	**59**	**579559**	**90024**	**927165**	**1037398**	**518685**	**3152831**
iii)	CHHATISGARH										
1	Rajnandgaon	1112700	97200	52669	75	52744	3594	8927	2945	2622	70832
	Sub Total	**1112700**	**97200**	**52669**	**75**	**52744**	**3594**	**8927**	**2945**	**2622**	**70832**
iv)	MAHARASHTRA										
	Dhule	1315000	396000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**1315000**	**396000**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
	Grand Total	**23129300**	**10028500**	**301169**	**75**	**301244**	**9894**	**131827**	**231045**	**14922**	**688932**

Contd.

XII	**Basin : Mahai and Sabarmati, Year 2006-2007**										
a)	Basin : Mahi										
i)	GUJARAT										
1	Kheda	719400	105000	67500	-	67500	5600	61200	74200	4100	212600
2	Panchmahals	886600	885600	15200	-	15200	2500	2500	30600	2100	52900
3	Vadodara	779400	383400	31600	-	31600	4700	114500	75300	11700	237800
4	Bharuch	903800	294800	54400	-	54400	1600	8400	54200	400	119000
	Sub Total	**3289200**	**1668800**	**168700**	**-**	**168700**	**14400**	**186600**	**234300**	**18300**	**622300**
ii)	MADHYA PRADESH										
1	Ratlam	486100	180700	2345	-	2345	3278	79479	48380	10800	144282
2	Jhabua	678200	342500	9773	-	9773	10682	1721	22132	23449	67757
3	Dhar	815300	150000	13274	-	13274	11961	122671	82158	51854	281918
4	Mandsaur	979100	3300	1012	-	1012	2696	18301	151899	14350	188258
	Sub Total	2958700	676500	26404	-	26404	28617	222172	304569	100453	682215
iii)	RAJASTHAN										
1	Udaipur	1727900	637500	17709	-	17709	16231	6528	77782	1146	**119396**
2	Chittorgarh	1085600	289700	19584	-	19584	7102	103051	146271	197	276205
3	Dungarpur	377000	327000	6552	-	6552	3286	1757	24078	2541	38214
4	Bansewara	503700	503700	50301	-	50301	6718	2848	16951	18336	95154
	Sub Total	**3694200**	**1757900**	**94146**	**-**	**94146**	**33337**	**114184**	**265082**	**22220**	**528969**
b)	**Basin: Sabarmati, Year 2006-2007**										
i)	GUJARAT										
1	Surendranagar	1048900	365000	9600	-	9600	900	141800	54000	400	206700
2	Banaskantha	1270300	52500	13000	-	13000	1900	251600	151700	600	418800
3	Sabarkantha	739000	739000	25600	-	25600	700	49900	133900	2100	212200
4	Mahesana	902700	102000	20600	-	20600	1800	174700	20600	900	218600

Contd./…

Table 16 : Net area Irrigated by sources by river basin and State for 2006-2007

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
5	Gandhinagar	64900	64900	2500	-	2500	600	88800	16900	600	109400
6	Ahmedabad	870700	460000	61000	-	61000	4500	73000	69400	1600	209500
7	Kheda	719400	614400	67500	-	67500	5600	61200	74200	4100	212600
	Sub Total	**5615900**	**2397800**	**131000**	**-**	**131000**	**10700**	**223000**	**160500**	**6300**	**531500**
ii)	RAJASTHAN										
1	Sirohi	513600	10000	11371	-	11371	4787	1377	78280	24	95839
2	Udaipur	1727900	258900	17709	-	17709	16231	6528	77282	1146	118896
3	Dungarpur	377000	50000	6552	-	6552	3286	1757	24078	2541	38214
	Sub Total	**2618500**	**318900**	**35632**	**-**	**35632**	**24304**	**9662**	**179640**	**3711**	**252949**
c)	**Basin : Luni & Others , Year 2006-2007**										
i)	GUJARAT										
1	Jamnagar	1412500	1412500	14200	-	14200	1100	10900	164300	800	191300
2	Rajkot	1120300	1120300	34700	-	34700	1500	11000	251300	4400	302900
3	Surendranagar	1048900	683900	9600	-	9600	900	141800	54000	400	206700
4	Bhavnagar	1115500	1115500	28500	-	28500	2000	500	201300	5900	238200
5	Amreli	676000	676000	7700	-	7700	500	2300	165600	1800	177900
6	Junagadh	1060700	1060700	16200	-	16200	500	500	268000	4200	289400
7	Kachch	4565200	4565200	21300	-	21300	300	6300	135900	400	164200
8	Banaskantha	1270300	1217800	13000	-	13000	1900	251600	151700	600	418800
9	Mahesana	902700	800700	20600	-	20600	1800	174700	20600	900	218600
10	Ahemdabad	870700	410700	61000	-	61000	4500	73000	69400	1600	209500
	Sub Total	**14042800**	**13063300**	**226800**	**-**	**226800**	**15000**	**672600**	**1482100**	**21000**	**2417500**
											Contd.

ii)	RAJASTHAN										
1	Ajmer	848100	84900	1716	-	1716	3642	1341	61138	608	68445
2	Jodhpur	2285000	685500	-	-	-	-	179712	2514	1834	184060
3	Nagaur	1771800	708900	-	-	-	-	170279	104147	-	274426
4	Pali	1238700	1238700	-	-	-	43189	13766	93638	632	151225
5	Jalore	1064000	1064000	14886	-	14886	306	49141	186844	-	251177
6	Sirohi	513600	503600	11371	-	11371	4787	1377	78280	24	95839
	Sub Total	7721200	4285600	26257	-	26257	48282	234563	462909	656	772667
iii)	Daman& Diu										
	Diu	11200	4000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**11200**	**4000**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
	Grant Total	**39951700**	**24172800**	**708939**	**N.A.**	**708939**	**174640**	**1662781**	**3089100**	**172640**	**5808100**

Sources: Directorate of Economics & Statistics , Ministry of Agriculture.

Table 16 : Net area Irrigated by sources by river basin and State for 2007-2008

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
I	**Basin : Mahanadi , Year 2007-2008**										
i)	**JHARKHAND**										
	Gumla	907700	63500	381	-	381	365	-	1562	1480	3788
	Sub Total	**907700**	**63500**	**381**	**-**	**381**	**365**	**-**	**1562**	**1480**	**3788**
ii)	**ORISSA**										
1	**Sambalpur**	1751600	1390400	46350	-	46350	-	3510	5030	6740	61630
2	**Sundergarh**	**971200**	410000	28820	-	28820	-	10480	10720	18460	68480
3	**Cuttak**	1114200	752800	81580	-	81580	-	19140	2600	14900	118220
4	**Dhenkanal**	1082700	311000	30220	-	30220	-	2570	6050	9840	48680
5	**Phulbani**	1111900	907500	N.A.	-	N.A.	-	N.A.	N.A.	N.A.	N.A.
6	**Balangir**	891300	891300	23570	-	23570	-	13650	14950	9630	61800
7	**Kalahandi**	1177200	981900	108350	-	108350	-	8980	5340	13620	136290
8	**Koraput**	2696100	197700	48770	-	48770	-	9620	-	22480	80870
9	**Puri**	1018200	606100	77010	-	77010	-	9360	560	10950	97880
	Sub Total	**11814400**	**6448700**	**444670**	**-**	**444670**	**-**	**77310**	**45250**	**106620**	**673850**
iii)	**MADHYA PRADESH**										
1	**Shahdol**	1402800	8400	4650	-	4650	2048	1358	3966	8027	20049
	Sub Total	**1402800**	**8400**	**4650**	**-**	**4650**	**2048**	**1358**	**3966**	**8027**	**20049**
	CHATTISGARH										
1	**Surguja**	2233700	496200	7743	243	7986	2088	1107	6716	21203	39100
2	**Bilaspur**	1989700	1895700	116030	-	116030	4802	20851	4435	2698	148816

Contd.

3	**Raigarh**	1292400	1090600	19458	40	19498	4476	30948	903	5671	61496
4	**Rajnandgaon**	1112700	756500	52873	76	52949	5376	10336	2529	3467	74657
5	**Durg**	853700	853700	138864	-	138864	4708	75735	2068	17446	238821
6	**Raipur**	2125800	2115200	240779	-	240779	7517	32732	3936	11923	296887
7	**Bastar**	3911400	222100	200	-	200	1143	2487	741	3221	7792
	Sub Total	**13519400**	**7430000**	**575947**	**359**	**576306**	**30110**	**174196**	**21328**	**65629**	**867569**
iv)	**MAHARASHTRA**										
1	**Chandrapur+**	2585500	28600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Gadchiroli**	1441200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**4026700**	**28600**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Grand Total	**31671000**	**13979200**	**1025648**	**359**	**1026007**	**32523**	**252864**	**72106**	**181756**	**1565256**

Table 16 : Net area irrigated by sources by river basin and State for 2007-2008

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
II	**Subernarekha, Burhabalang and Baitarni, Year 2007-2008**										
i)	**JHARKHAND**										
1	**Ranchi**	769800	488000	-	-	-	690	-	8094	1172	9956
2	**Singhbhum**	1344000	902100	383	-	383	386	-	106	77	952
	Sub Total	**2113800**	**1390100**	**383**	**-**	**383**	**1076**	**-**	**8200**	**1249**	**10908**
ii)	**ORISSA**										
1	**Mayurbhanj**	1041800	751800	65810	-	65810	-	24400	1950	24650	116810
2	**Balasore**	631100	472100	28450	-	28450	-	56580	-	13260	98290
	Sub Total	**1672900**	**1223900**	**94260**	-	**94260**	-	**80980**	**1950**	**37910**	**215100**
iii)	**WEST BENGAL**										
1	**Medinipur**	1408100	311600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Purulia**	625900	101800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**2034000**	**413400**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Grand Total	**5820700**	**3027400**	**94643**	N.A.	**94643**	**1076**	**80980**	**10150**	**39159**	**226008**
											Contd.

III	**Basin : Brahamani , Year 2007-2008**										
i)	**JHARKHAND**										
1	**Lohardaga**	149100	89100	301	-	301	1243	-	1957	2230	5731
2	**Gumla**	907700	794200	381	-	381	365	-	1562	1480	3788
3	**Ranchi**	769800	230000	-	-	-	690	-	8094	1172	9956
4	**Pa. Singhbhum**	1344000	412000	383	-	383	386	-	106	77	952
	Sub Total	**3170600**	**1525300**	**1065**	**-**	**1065**	**2684**	**-**	**11719**	**4959**	**20427**
ii)	**MADHYA PRADESH**										
	Rajgarh	715300	126800	5775	-	5775	3986	36236	138339	13881	198217
	Sub Total	**715300**	**126800**	**5775**	**-**	**5775**	**3986**	**36236**	**138339**	**13881**	**198217**
	ORISSA										
1	**Sambalpur**	1751600	361200	46350	-	46350	-	3510	5030	6740	61630
2	**Sundergarh**	971200	561200	28820	-	28820	-	10480	10720	18460	68480
3	**Keonjhar**	830300	830300	48990	-	48990	-	5480	6300	13650	74420
4	**Mayurbhanj**	1041800	290000	65810	-	65810	-	24400	1950	24650	116810
5	**Balasore**	631100	159000	28450	-	28450	-	56580	-	13260	98290
6	**Cuttack**	1114200	361400	81580	-	81580	-	19140	2600	14900	118220
7	**Dhenkanal**	1082700	771700	30220	-	30220	-	2570	6050	9840	48680
	Sub Total	**7422900**	**3334800**	**330220**	**-**	**330220**	**-**	**122160**	**32650**	**101500**	**586530**
	Grand Total	**11308800**	**4986900**	**337060**	**-**	**337060**	**6670**	**158396**	**182708**	**120340**	**805174**
IV	**Rushikulya, Vamsadhra, Sarada and Nagavali , Year 2007-2008**										
	<---------- Not Available Data ---------->										

Contd./…

Table 16 : Net area irrigated by sources by river basin and State for 2007-2008

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
V	**Basin Godavari , Year 2007-2008**										
i)	**ANDHRA PRADESH**										
1	**Visakhapatnam**	1116100	370400	43106	-	43106	28578	13600	-	19713	104997
2	**East Godavari**	1080700	154900	180880	-	180880	36113	64459	-	12029	293481
3	**West Godavari**	774200	151000	188497	-	188497	22744	155895	-	8399	375535
4	**Rangareddy**	749300	34200	640	-	640	1707	50164	-	1662	54173
5	**Medak**	969900	835500	1857	-	1857	3299	147612	-	1345	154113
6	**Nizamabad**	795600	795600	15532	-	15532	6163	142788	-	5503	169986
7	**Adilabad**	1610500	1610500	4720	-	4720	8891	49655	-	1078	64344
8	**Karimnagar**	1182300	1178700	15720	-	15720	24152	299979	-	322	340173
9	**Warangal**	1284600	724200	1949	-	1949	52207	241133	-	3200	298489
10	**Khammam**	1602900	1616200	69820	-	69820	42199	72162	-	19213	203394
	Sub Total	**11166100**	**7471200**	**522721**	-	**522721**	**226053**	**1237447**	-	**72464**	**2058685**
ii)	**KARNATAKA**										
	Bidar	544800	448700	1168	-	1168	973	18363	24894	1022	46420
	Sub Total	**544800**	**448700**	**1168**	-	**1168**	**973**	**18363**	**24894**	**1022**	**46420**
iii)	**MADHYA PRADESH**										
1	**Betul**	1004300	224300	19085	-	19085	197	14765	72617	14658	121322
2	**Mandla**	1326900	82400	15987	-	15987	15	-	2954	1585	20541
3	**Chhindwara**	1181500	896100	11461	-	11461	4487	32732	78444	6353	133477
4	**Seoni**	875800	654000	64672	59	64731	9145	3721	33402	14037	125036
5	**Balaghat**	922900	701400	73749	-	73749	25339	257	20445	4229	124019
	Sub Total	**5311400**	**2558200**	**184954**	**59**	**185013**	**39183**	**51475**	**207862**	**40862**	**524395**
											Contd.

	CHHATISGARH										
1	**Rajnandgaon**	1112700	259000	52873	76	52949	5376	10336	2529	3467	74657
2	**Raipur**	2125800	10600	280779	-	240779	7517	32732	3936	11923	296887
3	**Bastar**	3911400	3689300	200	-	200	1143	2487	741	3221	7792
	Sub Total	**7149900**	**3958900**	**333852**	**76**	**293928**	**14036**	**45555**	**7206**	**18611**	**379336**

Contd.

Table 16 : Net area irrigated by sources by river basin and State for 2007-2008

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
iv)	**MAHARASHTRA**										
1	**Nashik**	1553000	736100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Jalgaon**	1176500	6000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Ahmadnagar**	1704800	1089100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Pune**	1564300	14000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Solapur**	1489500	11900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Aurangabad**	1010700	899100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	**Jalana**	771800	771800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
8	**Parbhani**	1104100	1104100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
9	**Bid**	1069300	946900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
10	**Nanded**	1052800	1052800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
11	**Osmanabad**	756900	226400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
12	**Latur**	715700	715700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
13	**Buldghana**	966100	384600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
14	**Akola**	1057400	374500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
15	**Amravati**	1221000	419600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.

Contd.

16	**Yavatmal**	1358200	1358200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
17	**Wardha**	630900	630900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
18	**Nagpur**	989200	989200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
19	**Bhandara**	932100	932100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
20	**Chandrapur**	1144300	1115700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
21	**Gadchiroli**	1441200	1441200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**23709800**	**15219900**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
v)	**ORISSA**										
1	**Kalahandi**	1177200	145300	108350	-	108350	-	8980	5340	13620	136290
2	**Koraput**	2696100	1629900	48770	-	48770	-	9620	-	22480	80870
	Sub Total	**3873300**	**1775200**	**157120**	-	**157120**	-	**18600**	**5340**	**36100**	**217160**
	Grand Total	**46443900**	**28873900**	**1014861**	**76**	**974937**	**241062**	**1319965**	**37440**	**128197**	**2701601**

Contd.

Table 16 : Net area irrigated by sources by river basin and State for, 2007-2008

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
VI	**Basin : Krishna , Year 2007-2008**										
i)	**ANDHRA PRADESH**										
1	**Krishna**	872700	385400	228562	-	228562	22299	54146	-	13749	318756
2	**Anantapur**	1913000	451400	22382	-	22382	4329	90987	-	1558	119256
3	**Guntoor**	5975100	1567700	305702	-	305702	4116	62210	-	14184	386212
4	**Prakasam**	1762600	N.A.	66690	-	66690	27814	84400	-	15706	194610
5	**Nellore**	1307600	N.A.	87727	-	87727	73840	73828	-	9191	244586
6	**Kurnool**	1765800	N.A.	87449	-	87449	14215	96442	-	9080	207186
7	**Mehbubnagar**	1843200	1843200	34934	-	34934	7984	161422	-	8188	212528

Contd.

8	**Rangareddy**	749300	715100	640	-	640	1707	50164	-	1662	54173
9	**Hyderabad**	21700	21700	-	-	-	-	-	-	-	-
10	**Medak**	969900	134400	1857	-	1857	3299	147612	-	1345	154113
11	**Karimnagar**	1182300	3600	15720	-	15720	24152	299979	-	322	340173
12	**Warangal**	1284600	560400	1949	-	1949	52207	241133	-	3200	298489
13	**East Godavari**	1080700	N.A.	180880	-	180880	36113	64459	-	12029	293481
14	**Khammam**	2683600	518300	69820	-	69820	42199	72162	-	19213	203394
15	**Nalgonda**	1424000	1424000	76851	-	76851	14985	149328	-	10703	251867
	Sub Total	**24836100**	**7625200**	**1181163**	**-**	**1181163**	**329259**	**1648272**	**-**	**120130**	**3278824**
ii)	**KARNATAKA**										
1	**Belgaum**	1341500	1244900	91039	-	91039	2362	108061	114358	123989	439809
2	**Bellary**	988500	988500	78152	-	78152	2928	63251	5482	36261	186074
3	**Bidar**	544800	96100	1168	-	1168	973	18363	24894	1022	46420
4	**Bijapur**	1706900	1706900	72633	-	72633	4074	75155	107147	19213	278222
5	**Chikmaglur**	720100	620800	2765	-	2765	10705	12134	733	8139	34476
6	**Chitradurga**	1085200	1085200	4940	-	4940	806	77227	-	-	82973
7	**Dharwad**	1373800	1188000	24957	-	24957	60	14185	-	283	39485
8	**Gulbarga**	1622400	1622400	129689	-	129689	3248	16220	37515	6095	192767
9	**Hassan**	681400	131800	34595	-	34595	28956	22753	1072	1217	88593
10	**Raichur**	1401700	1401700	133856	-	133856	2763	19343	17999	11491	185452
11	**Shimoga**	1055300	783500	42176	-	42176	57626	20804	5521	10845	136972
12	**Tumkur**	1059800	393700	1661	-	1661	24713	120790	969	32	148165
13	**Uttar Kannada**	1029100	63700	-	-	-	4973	2176	8015	11746	26910
	Sub Total	**14610500**	**11327200**	**617631**	**-**	**617631**	**144187**	**570462**	**323705**	**230333**	**1886318**

Contd./…

Table 16 : Net area irrigated by sources by river basin and State, for 2007-2008

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
iii)	**MAHARASHTRA**										
1	**Ratnagiri**	820800	11700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Ahmadnagar**	1704800	618000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Pune**	1564300	1548300	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Satara**	1048000	1048000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Sangli**	857200	857200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Solapur**	1489500	1488400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	**Kolhapur**	768500	758600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
8	**Bid**	1069300	156700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
9	**Osmanabad+**	1472600	455600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
10	**Latur**	737200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**11532200**	**6942500**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Grand Total	**50978800**	**25894900**	**1798794**	**N.A.**	**1798794**	**473446**	**2218734**	**323705**	**350463**	**5165142**

Source : Directorate of Economics and Statistics, Ministry of Agriculture (Through NET)
Note : 1. Totals may not tally due to rounding off.
2. N.A. = Not Available

VII	**Basin : Cauvery , Year 2007-2008**										
i)	**KARNATAKA**										
1	**Bangalore Rural**	219000	171500	-	-	-	128	26422	65	43	26658
2	**Bangalore Urban**	581500	395500	-	-	-	465	10300	217	-	10982
3	**Chikmagalur**	722075	84800	2765	-	2765	10705	12134	733	8139	34476
4	**Hassan**	681400	489600	34595	-	34595	28956	22753	1072	1217	88593
5	**Kodagu (Coorg)**	410200	217200	2100	-	2100	394	1013	54	432	3993
6	**Mandya**	496100	496100	96873	-	96873	18989	4512	7157	3443	130974
7	**Mysore**	1195400	1195400	108790	-	108790	20710	9385	19900	358	159143
8	**Tumkur**	1059800	445300	1661	-	1661	24713	120790	969	32	148165
	Sub Total	**5365475**	**3495400**	**246784**	**-**	**246784**	**105060**	**207309**	**30167**	**13664**	**602984**
ii)	**KERALA**										
1	**Kannur**	297112	65000	1066	644	1710	1912	76	15056	4558	23312
2	**Wynad**	213100	-	74	370	444	209	2	331	11244	12230
3	**Kozhikode**	447500	120000	1261	153	1414	448	138	4147	1111	7258
4	**Palakkad**	448000	57500	45115	830	45945	5195	5890	19303	12345	88678
5	**Idukki**	501900	40000	3103	322	3425	6553	240	1598	4623	16439
	Sub Total	**1907612**	**282500**	**50619**	**2319**	**52938**	**14317**	**6346**	**40435**	**33881**	**147917**

Contd./…

Table 16 : Net area irrigated by sources by river basin and State for 2007-2008

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
iii)	**TAMIL NADU**										
1	**Dharmapuri+**	1827100	1042100	972	-	972	3290	773	60780	-	65815
2	**Salem**	520530	N.A.	4013	-	4013	1372	9278	84363	1	99027
3	**South Arcot**	1089500	62500	-	-	-	-	-	-	-	-
4	**Coimbatore+Periyar**	1567800	1323800	47168	664	47832	1384	26459	101711	1439	178825
5	**Nilgiri**	254900	209900	15	-	15	-	-	534	140	689
6	**Madurai+**	1262300	445300	26854	-	26854	25226	584	31012	5	83681
7	**Dindugul**	626664	N.A.	5610	-	5610	6540	3686	85842	960	102638
8	**Pudukottai+**	1574700	1117200	8658	-	8658	65714	22812	7699	-	104883
9	**Tiruchirapalli**	511400	N.A.	38622	-	38622	4696	7554	51392	-	102264
10	**Thanjavur**	828000	543000	129791	-	129791	306	36602	1041	-	167740
	Sub Total	**10062894**	**4743800**	**261703**	**664**	**262367**	**108528**	**107748**	**424374**	**2545**	**905562**
iv)	**PONDICHERY**										
	Karaikal	49200	16000	5893	-	5893	-	16	-	15	5924
	Sub Total	**49200**	**16000**	**5893**	**-**	**5893**	**-**	**16**	**-**	**15**	**5924**
	Grand Total	**17385181**	**8537700**	**564999**	**2983**	**567982**	**227905**	**321419**	**494976**	**50105**	**1662387**
VIII	**Basin : East Folowing Rivers from Mahanadi to Kanyakumari , Year 2007-2008**										
i)	**ANDHRA PRADESH**										
1	**Srikakulam**	2353700	1983300	105843	-	105843	70609	20970	-	2206	199628
2	**Vizianagaram**	653900	N.A	46572	-	46572	80809	19130	-	4898	151409
3	**Vishakhapatnam**	1116100	N.A	43106	-	43106	28578	13600	-	19713	104997
4	**East Godavari**	1854900	619300	180880	-	180880	36113	64459	-	12029	293481

Contd.

5	**West Godavari**	778000	N.A	188497	-	188497	22744	155895	-	8399	375535
6	**Krishna**	872700	487300	228562	-	228562	22299	54146	-	13749	318756
7	**Guntur+**	5975100	2997800	305702	-	305702	4116	62210	-	14184	386212
8	**Prakasam+**	1762600	N.A.	66690	-	66690	27814	84400	-	15706	194610
9	**Nellore+**	1307600	N.A	87727	-	87727	73840	73828	-	9191	244586
10	**Khammam**	1602900	549100	N.A	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
11	**kurnool**	1765800	N.A	69820	-	69820	42199	72162	-	19213	203394
12	**Chittoor**	1515200	1030000	87449	-	87449	14215	96442	-	9080	207186
	Sub Total	**21558500**	**7666800**	**1410848**	**-**	**1410848**	**423336**	**717242**	**-**	**128368**	**2679794**

Contd.

Table 16 : Net area irrigated by sources by river basin and State , for2007-2008

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
ii)	**KARNATAKA**										
1	**Bangalore**	219000	47500	**-**	**-**	**-**	**465**	**10300**	**217**	**-**	**10982**
2	**Bangalore R.**	581500	142500	**-**	**-**	**-**	**128**	**26422**	**65**	**43**	**26658**
3	**Kolar**	822300	465700	**-**	**-**	**-**	**-**	**31090**	**-**	**-**	**31090**
	Sub Total	**1622800**	**655700**	**-**	**-**	**-**	**593**	**67812**	**282**	**43**	**68730**
iii)	**KERALA**										
	Thiruvanatrum	219200	300	4242	83	4325	415	9	2765	544	8058
	Sub Total	**219200**	**300**	**4242**	**83**	**4325**	**415**	**9**	**2765**	**544**	**8058**
iv)	**ORISSA**										
1	**Phulbani**	1111900	204400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Kalahandi**	1177200	50000	108350	-	108350	-	8980	5340	13620	136290
3	**Koraput**	2696100	868500	48770	-	48770	-	9620	-	22480	80870
4	**Ganjam**	1253100	1253100	201340	-	201340	-	9950	15150	12530	238970

Contd.

5	**Puri**	1018200	412100	77010	-	77010	-	9360	560	10950	97880
	Sub Total	**7256500**	**2788100**	**435470**	**-**	**435470**	**-**	**37910**	**21050**	**59580**	**554010**
v)	**TAMIL NADU**										
1	**Madras**	17400	17400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Chengai-Anna**	785700	785700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**North Arcot**	607700	607700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Dharmapuri+**	1827100	785000	972	-	972	3290	773	60780	-	65815
5	**Salem**	520530	N.A	4013	-	4013	1372	9278	84363	1	99027
6	**Tiruvannmalai**	619100	619100	1423	-	1423	33324	1085	113950	-	149782
7	**South Arcot**	1089500	1027000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
8	**Dindigul +**	1262300	817000	5610	-	5610	6540	3686	85842	960	102638
9	**Madurai**	374173	N.A	26854	-	26854	25226	584	31012	5	83681
10	**Thanjavur**	828000	285000	129791	-	129791	306	36602	1041	-	167740
11	**Pudukottai**	465100	465100	8658	-	8658	65714	22812	7699	-	104883
12	**PMT**	1260100	1260100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
13	**Kamarajar**	344573	N.A								
14	**Ramanathapuram**	417500	N.A	-	-	-	53110	2922	17213	-	73245
15	**Chidambaranar+**	1143100	1143100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
16	**Tirunelveli**	682300	N.A	20201	-	20201	47755	878	48274	185	117293
17	**Kanyakumari**	168400	168400	10148	-	10148	15906	157	375	151	26737
	Sub Total	**12412576**	**7980600**	**207670**	**N.A.**	**207670**	**252543**	**78777**	**450549**	**1302**	**990841**
vi)	**PONDICHERY**										
	Pondicherry	49200	29300	-	-	-	-	10880	-	-	10880
	Sub Total	**49200**	**29300**	-	-	-	-	**10880**	-	-	**10880**

Contd./…

Table 16 : Net area irrigated by sources by river basin and State , for2007-2008

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
	Basin : Penner , Year 2007-2008										
i)	**ANDHRA PRADESH**										
1	**Kurnool**	1765800	1409600	87449	-	87449	14215	96442	-	9080	207186
2	**Cuddapah**	1535900	1535900	23716	-	23716	15025	108081	-	615	147437
3	**Anantapur**	1913000	1461600	22382	-	22382	4329	90987	-	1558	119256
4	**Prakasam+**	1762600	N.A.	66690	-	66690	27814	84400	-	15706	194610
5	**Guntur+**	5975100	1567700	305702	-	305702	4116	62210	-	14184	386212
6	**Nellor+**	1307600	N.A.	87727	-	87727	73840	73828	-	9191	244586
7	**Chittoor**	1535900	N.A.	269	-	269	22887	128793	-	41	151990
	Sub Total	**15795900**	**5974800**	**593935**	**-**	**593935**	**162226**	**644741**	**-**	**50375**	**1451277**
ii)	**KARNATAKA**										
1	**Bangalore R.**	581500	43500	-	-	-	128	26422	65	43	26658
2	**Kolar**	822300	356600	-	-	-	-	31090	-	-	31090
3	**Tumkur**	1059800	220800	1661	-	1661	24713	120790	969	32	148165
	Sub Total	**2463600**	**620900**	**1661**	**-**	**1661**	**24841**	**178302**	**1034**	**75**	**205913**
	Grand Total	**61378276**	**25716500**	**2653826**	**83**	**2653909**	**863954**	**1735673**	**475680**	**240287**	**5969503**
IX	**Basin : West Flowing Rivers from Kanyakumari to Tapi , 2007-2008**										
	DADRA & NAGAR HAVELI										
1	**Daman & Diu**	11200	7200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Dadra & Nagar Haveli**	49100	49100	N.A.	-	N.A.	-	N.A.	N.A.	N.A.	N.A.
	Sub Total	**60300**	**56300**	N.A.	-	N.A.	-	N.A.	N.A.	N.A.	N.A.
	Goa	370200	370200	7914	-	7914	-	-	27396	-	35310
	Sub Total	**370200**	**370200**	**7914**	**-**	**7914**	**-**	**-**	**27396**	**-**	**35310**
											Contd.

	GUJARAT										
1	**Surat**	765700	282700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Valsad**	524400	524400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Dangs**	176400	176400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**1466500**	**983500**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
	KARNATAKA										
1	**Belgaum**	1341500	96600	91039	-	91039	2362	108061	114358	123989	439809
2	**Dharwad**	1373800	185800	24957	-	24957	60	14185	-	283	39485
3	**Chikmaglur**	720100	14500	2765	-	2765	10705	12134	733	8139	34476
4	**Dak. Kannada**	844100	844100	-	-	-	-	9686	40330	20632	70648
5	**Hassan**	681400	60000	34595	-	34595	28956	22753	1072	1217	88593
6	**Kodagu**	410200	193000	2100	-	2100	394	1013	54	432	3993
7	**Shimoga**	1055300	271800	42176	-	42176	57626	20804	5521	10845	136972
8	**Utt. Kannada**	1029100	120000	-	-	-	4973	2176	8015	11746	26910
	Sub Total	**7455500**	**1785800**	**197632**	**0**	**197632**	**105076**	**190812**	**170083**	**177283**	**840886**

Contd.

Table 16 : Net area irrigated by sources by river basin and State , for 2007-2008

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
	Basin : Penner, Year 2007-2008										
	Kerala										
1	**Kasargod**	199200	199200	773	684	1457	12001	4625	25425	5995	49503
2	**Kannur**	296600	231600	1066	644	1710	1912	76	15056	4558	23312
3	**Kozhikode**	447500	327500	1261	153	1414	448	138	4147	1111	7258
4	**Mallapuram**	355000	355000	2282	756	3038	4840	606	10594	5585	24663

Contd.

5	**Palakkad**	448000	390500	45115	830	45945	5195	5890	19303	12345	88678
6	**Thrissur**	303200	303200	14758	207	14965	4842	682	37185	10876	68550
7	**Ernakulam**	240700	240700	11577	19	11596	1912	426	7121	7001	28056
8	**Idukki**	501900	461900	3103	322	3425	6553	240	1598	4623	16439
9	**Kottayam**	220300	220300	-	-	-	187	3	1958	13939	16087
10	**Alappuzha**	141400	141400	1074	-	1074	2631	5086	1424	24494	34709
11	**Pathaamthitta**	264200	264200	2019	1	2020	56	1	2108	1340	5525
12	**Kollam**	249100	249100	974	255	1229	379	4	1987	878	4477
13	**Thiruvantrum**	219200	218900	4242	83	4325	415	9	2765	544	8058
	Sub Total	**3886300**	**3603500**	**88244**	**3954**	**92198**	**41371**	**17786**	**130671**	**93289**	**375315**
	MAHARASHTRA										
1	**Bombay**	60300	60300	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Thane**	955800	955800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Raigarh**	715200	715200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Sindhudurg**	1341500	1329800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Nasik**	1553000	420600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Dhule**	1315000	7500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	**Kolhapur**	768500	9900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**6709300**	**3499100**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
	TAMIL NADU										
1	**Nilgiri**	254900	45000	15	-	15	-	-	534	140	689
2	**Coimbatore**	746900	244000	47168	664	47832	1384	26459	101711	1439	178825
	Sub Total	**1001800**	**289000**	**47183**	**664**	**47847**	**1384**	**26459**	**102245**	**1579**	**179514**

Contd./…

Table 16 : Net area irrigated by sources by river basin and State , for 2007-2008

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
	PONDICHERY										
1	**Yanam**	3000	3000	277	-	277	-	-	-	-	277
2	**Mahe**	900	900	-	-	-	-	-	-	30	30
	Sub Total	**3900**	**3900**	**277**	**-**	**277**	**-**	**-**	**-**	**30**	**307**
	Grand Total	**20953800**	**10591300**	**341250**	**4618**	**345868**	**147831**	**235057**	**430395**	**272181**	**1431332**
X	**Basin : Tapi , Year 2007-2008**										
	<---------- Not Available Data ---------->										
XI	**Basin : Narmada , Year 2007-2008**										
i)	**GUJARAT**										
1	**Vadodara**	779400	396000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Bharuch**	903800	468000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Surat**	765700	18000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**2448900**	**882000**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
ii)	**MADHYA PRADESH**										
1	**Sagar**	1025200	171600	4037	-	4037	2201	40322	108218	75916	230694
2	**Damoh**	730600	65100	11173	-	11173	790	29948	26360	42375	110646
3	**Dewas**	702000	394400	6760	-	6760	4769	93100	65910	23160	193699
4	**Jhabua**	678200	335700	11028	-	11028	11186	2034	24432	26447	75127
5	**Dhar**	815300	471400	25936	-	25936	13065	127002	89305	71200	326508
6	**Indore**	389800	97400	3990	96	4086	1808	133196	23958	7922	170970
7	**West Nimar (Khargaon)**	1345000	1171000	26555	-	26555	869	30926	93662	53507	205519
8	**East Nimar (Khandwa)**	1077900	725900	6915	-	6915	987	20457	88504	12536	129399

Contd.

9	**Vidisha**	737100	46100	41881	-	41881	4959	124858	37431	74516	283645
10	**Sehore**	657800	225600	37741	-	37741	7511	74355	84565	52073	256245
11	**Raisen**	846600	467800	26158	-	26158	2258	132159	26359	33833	220767
12	**Betul**	1004300	370000	19085	-	19085	197	14765	72617	14658	121322
13	**Hoshangabad**	1003700	1003700	143146	-	143146	1183	56240	57837	17329	275735
14	**Jabalpur**	1016000	648300	11420	-	11420	325	65305	27843	15917	120810
15	**Narsimhapur**	513300	513300	1113	-	1113	6	83164	88836	6173	179292
16	**Mandla**	1326900	1139500	15987	-	15987	15		2954	1585	20541
17	**Chhindwara**	1181500	285400	11461	-	11461	4487	32732	78444	6353	133477
18	**Seoni**	875800	221800	64672	59	64731	9145	3721	33402	14037	125036
19	**Balaghat**	922900	221500	73749	-	73749	25339	257	20445	4229	124019
	Sub Total	**16849900**	**8575500**	**542807**	**155**	**542962**	**91100**	**1064541**	**1051082**	**553766**	**3303451**
	MADHYA PRADESH										
1	**Shahdol**	1402800	77800	4650	-	4650	2048	1358	3966	8027	20049
	Sub Total	**1402800**	**77800**	**4650**	**-**	**4650**	**2048**	**1358**	**3966**	**8027**	**20049**

Contd.

Table 16 : Net area irrigated by sources by river basin and State ,for 2007-2008

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
	CHATTISGARH										
1	**Rajnandgaon**	1112700	97200	52873	76	52949	5376	10336	2529	3467	74657
	Sub Total	**1112700**	**97200**	**52873**	**76**	**52949**	**5376**	**10336**	**2529**	**3467**	**74657**
	MAHARASHTRA										
	Dhule	1315000	396000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**1315000**	**396000**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
	Grand Total	**23129300**	**10028500**	**600330**	**231**	**600561**	**98524**	**1076235**	**1057577**	**565260**	**3398157**

Contd.

XII	**Basin : Mahai and Sabarmati , Year 2007-2008**										
a)	**Basin : Mahi , Year 2007-2008**										
i)	**GUJARAT**										
1	**Kheda**	719400	105000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Panchmahals**	886600	885600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Vadodara**	779400	383400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Bharuch**	903800	294800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**3289200**	**1668800**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
ii)	**MADHYA PRADESH**										
1	**Ratlam**	486100	180700	1155	975	2130	2323	66400	62042	10348	143243
2	**Jhabua**	678200	342500	11028	-	11028	11186	2034	24432	26447	75127
3	**Dhar**	815300	150000	25936	-	25936	13065	127002	89305	71200	326508
4	**Mandsaur**	979100	3300	1394	-	1394	2531	10955	137962	11053	163895
	Sub Total	**2958700**	**676500**	**39513**	**975**	**40488**	**29105**	**206391**	**313741**	**119048**	**708773**
iii)	**RAJASTHAN**										
1	**Udaipur**	1727900	637500	18893	-	18893	8267	6366	74309	499	108334
2	**Chittorgarh**	1085600	289700	10380	-	10380	1903	97671	141257	2785	253996
3	**Dungarpur**	377000	327000	5852	-	5852	3417	1635	26394	2633	39931
4	**Banswara**	503700	503700	55330	-	55330	6785	3587	15881	20539	102122
	Sub Total	**3694200**	**1757900**	**90455**	**-**	**90455**	**20372**	**109259**	**257841**	**26456**	**504383**
b)	**Basin: Sabarmati , Year 2007-2008**										
i)	**GUJARAT**										
1	**Surendranagar**	1048900	365000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Banaskantha**	1270300	52500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Sabarkantha**	739000	739000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Mahesana**	902700	102000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.

Contd./…

Table 16 : Net area irrigated by sources by river basin and State , for 2007-2008

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
5	**Gandhinagar**	64900	64900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Ahmedabad**	870700	460000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	**Kheda**	719400	614400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**5615900**	**2397800**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
ii)	**RAJASTHAN**										
1	**Sirohi**	513600	10000	8916	-	8916	4520	1532	81534	74	96576
2	**Udaipur**	1727900	258900	18893	-	18893	8267	6366	74309	499	108334
3	**Dungarpur**	377000	50000	5852	-	5852	3417	1635	26394	2633	39931
	Sub Total	**2618500**	**318900**	**33661**	**-**	**33661**	**16204**	**9533**	**182237**	**3206**	**244841**
c)	**Basin : Luni & Others**										
i)	**GUJARAT**										
1	**Jamnagar**	1412500	1412500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Rajkot**	1120300	1120300	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Surendranagar**	1048900	683900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Bhavnagar**	1115500	1115500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Amreli**	676000	676000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Junagadh**	1060700	1060700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	**Kachch**	4565200	4565200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
8	**Banaskantha**	1270300	1217800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
9	**Mahesana**	902700	800700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
10	**Ahemdabad**	870700	410700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**14042800**	**13063300**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
											Contd.

ii)	**RAJASTHAN**										
1	**Ajmer**	848100	84900	550	-	550	1270	1238	52182	1572	56812
2	**Jodhpur**	2285000	685500	-	-	-	-	199814	5066	1532	206412
3	**Nagaur**	1771800	708900	-	-	-	-	162303	104297	20	266620
4	**Pali**	1238700	1238700	-	-	-	51495	15079	95356	304	162234
5	**Jalore**	1064000	1064000	12666	-	12666	110	57726	188521	117	259140
6	**Sirohi**	513600	503600	8916	-	8916	4520	1532	81534	74	96576
	Sub Total	**7721200**	**4285600**	**22132**	**-**	**22132**	**57395**	**437692**	**526956**	**3619**	**1047794**
iii)	**Daman& Diu**										
	Diu	11200	4000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**11200**	**4000**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
	Grant Total	**39951700**	**24172800**	**185761**	**975**	**186736**	**123076**	**762875**	**1280775**	**152329**	**2505791**

Sources: Directorate of Economics & Statistics, Ministry of Agriculture.

Table 16 : Net area Irrigated by sources by river basin and State for 2008-2009

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
I	**Basin : Mahanadi, Year 2008-2009**										
i)	**JHARKHAND**										
	Gumla	907700	63500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**907700**	**63500**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
ii)	**ORISSA**										
1	**Sambalpur**	1751600	1390400	46350	-	46350	-	3630	5030	6490	61500
2	**Sundergarh**	971200	410000	30310	-	30310	-	12910	11080	19340	73640
3	**Cuttak**	1114200	752800	76130	-	76130	-	25420	2600	15050	119200

Contd.

4	**Dhenkanal**	1082700	311000	36380	-	36380	-	2300	6250	12670	57600
5	**Phulbani**	1111900	907500	9840	-	9840	-	2340	1600	6960	20740
6	**Balangir**	891300	891300	23580	-	23580	-	11110	17160	9630	61480
7	**Kalahandi**	1177200	981900	107130	-	107130	-	11580	5370	24480	148560
8	**Koraput**	2696100	197700	45500	-	45500	-	5150	820	24130	75600
9	**Puri**	1018200	606100	68210	-	68210	-	11510	-	15720	95440
	Sub Total	**11814400**	**6448700**	**443430**	**0**	**443430**	**0**	**85950**	**49910**	**134470**	**713760**
iii)	**MADHYA PRADESH**										
1	**Shahdol**	1402800	8400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**1402800**	**8400**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
iv)	**CHATTISGARH**										
1	**Surguja**	2233700	496200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Bilaspur**	1989700	1895700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Raigarh**	1292400	1090600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Rajnandgaon**	1112700	756500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Durg**	853700	853700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Raipur**	2125800	2115200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	**Bastar**	3911400	222100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**16325000**	**7446800**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
iv)	**MAHARASHTRA**										
1	**Chandrapur+**	2585500	28600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Gadchiroli**	1441200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**4026700**	**28600**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
	Grand Total	**34476600**	**13996000**	**443430**	**0**	**443430**	**0**	**85950**	**49910**	**134470**	**713760**

Contd./…

Table 16 : Net area iIrrigated by sources by river basin and State for 2008-2009

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
II	**Subernarekha, Burhabalang and Baitarni, Year 2008-2009**										
i)	**JHARKHAND**										
1	**Ranchi**	769800	488000	66800	-	66800	-	26760	1950	16130	111640
2	**Singhbhum**	1344000	902100	28320	-	28320	-	74920	-	10440	113680
	Sub Total	**2113800**	**1390100**	**95120**	**-**	**95120**	**-**	**101680**	**1950**	**26570**	**225320**
ii)	**ORISSA**										
1	**Mayurbhanj**	1041800	751800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Balasore**	631100	472100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**1672900**	**1223900**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
iii)	**WEST BENGAL**										
1	**Medinipur**	1408100	311600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Purulia**	625900	101800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**2034000**	**413400**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
	Grand Total	**5820700**	**3027400**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
III	**Basin : Brahamani**										
i)	**JHARKHAND**										
1	**Lohardaga**	149100	89100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Gumla**	907700	794200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Ranchi**	769800	230000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Pa. Singhbhum**	1344000	412000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**3170600**	**1525300**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**

Contd.

ii)	**CHATTISGARH**										
	Raigarh	1292400	126800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**1292400**	**126800**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
	ORISSA										
1	**Sambalpur**	1751600	361200	46350	-	46350	-	3630	5030	6490	61500
2	**Sundergarh**	971200	561200	30310	-	30310	-	12910	11080	19340	73640
3	**Keonjhar**	830300	830300	46690	-	46690	-	5500	6670	14390	73250
4	**Mayurbhanj**	1041800	290000	66800	-	66800	-	26760	1950	16130	111640
5	**Balasore**	631100	159000	28320	-	28320	-	74920	-	10440	113680
6	**Cuttack**	1114200	361400	76130	-	76130	-	25420	2600	15050	119200
7	**Dhenkanal**	1082700	771700	36380	-	36380	-	2300	6250	12670	57600
	Sub Total	**7422900**	**3334800**	**330980**	**-**	**330980**	**-**	**151440**	**33580**	**94510**	**610510**
	Grand Total	**11885900**	**4986900**	**330980**	**-**	**330980**	**-**	**151440**	**33580**	**94510**	**610510**
IV	**Rushikulya, Vamsadhra, Sarada and Nagavali, Year 2008-2009**										
	<---------- Not Available Data ---------->										

Table 16 : Net area iIrrigated by sources by river basin and State for 2008-2009

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
V	**Godavari, Year 2008-2009**										
i)	**ANDHRA PRADESH**										
1	**Visakhapatnam**	1116100	370400	42285	-	42285	27498	10243	6108	21290	107424
2	**East Godavari**	1080700	154900	179291	-	179291	32368	64773	138	11530	288100
3	**West Godavari**	774200	151000	190221	-	190221	22643	146343	6347	8528	374082

Contd.

4	**Rangareddy**	749300	34200	646	-	646	1737	44479	7548	1908	56318
5	**Medak**	969900	835500	2084	-	2084	14242	110146	13423	3839	143734
6	**Nizamabad**	795600	795600	30634	-	30634	12739	135754	5006	5312	189445
7	**Adilabad**	1610500	1610500	8425	-	8425	38622	8010	24594	197	79848
8	**Karimnagar**	1182300	1178700	58952	-	58952	27952	38444	266680	1999	394027
9	**Warangal**	1284600	724200	3354	-	3354	72671	63964	166270	5930	312189
10	**Khammam**	1602900	1616200	63772	-	63772	49102	38419	44857	22241	218391
	Sub Total	**11166100**	**7471200**	**579664**	-	**579664**	**299574**	**660575**	**540971**	**82774**	**2163558**
ii)	**KARNATAKA**										
	Bidar	544800	448700	1973	-	1973	923	18165	25898	1062	48021
	Sub Total	**544800**	**448700**	**1973**	**-**	**1973**	**923**	**18165**	**25898**	**1062**	**48021**
iii)	**MADHYA PRADESH**										
1	**Betul**	1004300	224300	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Mandla**	1326900	82400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Chhindwara**	1181500	896100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Seoni**	875800	654000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Balaghat**	922900	701400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**5311400**	**2558200**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	CHATISGARH										
1	**Rajnandgaon**	1112700	259000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Raipur**	2125800	10600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Bastar**	3911400	3689300	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**7149900**	**3958900**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**

Contd./…

Table 16 : Net area iIrrigated by sources by river basin and State for 2008-2009

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
iv)	**MAHARASHTRA**										
1	**Nashik**	1553000	736100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Jalgaon**	1176500	6000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Ahmadnagar**	1704800	1089100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Pune**	1564300	14000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Solapur**	1489500	11900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Aurangabad**	1010700	899100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	**Jalana**	771800	771800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
8	**Parbhani**	1104100	1104100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
9	**Bid**	1069300	946900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
10	**Nanded**	1052800	1052800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
11	**Osmanabad**	756900	226400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
12	**Latur**	715700	715700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
13	**Buldghana**	966100	384600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
14	**Akola**	1057400	374500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
15	**Amravati**	1221000	419600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
16	**Yavatmal**	1358200	1358200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
17	**Wardha**	630900	630900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
18	**Nagpur**	989200	989200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
19	**Bhandara**	932100	932100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
20	**Chandrapur**	1144300	1115700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
21	**Gadchiroli**	1441200	1441200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**23709800**	**15219900**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**

Contd.

v)	**ORISSA**										
1	**Kalahandi**	1177200	145300	107130	-	107130	-	11580	5370	24480	148560
2	**Koraput**	2696100	1629900	45500	-	45500	-	5150	820	24130	75600
	Sub Total	**3873300**	**1775200**	**152630**	**-**	**152630**	**-**	**16730**	**6190**	**48610**	**224160**
	Grand Total	**46443900**	**28873900**	**734267**	**-**	**734267**	**300497**	**695470**	**573059**	**132446**	**2435739**

Table 16 : Net area iIrrigated by sources by river basin and State for 2008-2009

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
VI	**Basin : Krishna**										
i)	**ANDHRA PRADESH**										
1	**Krishna**	872700	385400	227186	-	227186	25993	53628	7692	13528	328027
2	**Anantapur**	1913000	451400	20965	-	20965	7391	80093	8056	1658	118163
3	**Guntoor**	5975100	1567700	306223	-	306223	4909	59656	6012	18470	395270
4	**Prakasam**	1762600	N.A.	73944	-	73944	20764	96267	7609	18007	216591
5	**Nellore**	1307600	N.A.	93253	-	93253	77109	61558	14113	9351	255384
6	**Kurnool**	1765800	N.A.	91587	-	91587	8878	69043	28201	10079	207788
7	**Mehbubnagar**	1843200	1843200	28964	-	28964	3350	159468	12645	7571	211998
8	**Rangareddy**	749300	715100	646	-	646	1737	44479	7548	1908	56318
9	**Hyderabad**	21700	21700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
10	**Medak**	969900	134400	2084	-	2084	14242	110146	13423	3839	143734
11	**Karimnagar**	1182300	3600	58952	-	58952	27952	38444	266680	1999	394027
12	**Warangal**	1284600	560400	3354	-	3354	72671	63964	166270	5930	312189
13	**East Godavari**	1080700	N.A.	179291	-	179291	32368	64773	138	11530	288100
14	**Khammam**	2683600	518300	63772	-	63772	49102	38419	44857	22241	218391
15	**Nalgonda**	1424000	1424000	76748	-	76748	17604	131753	38814	11521	276440
	Sub Total	**24836100**	**7625200**	**1226969**	**-**	**1226969**	**364070**	**1071691**	**622058**	**137632**	**3422420**
											Contd.

ii)	**KARNATAKA**										
1	**Belgaum**	1341500	1244900	98364	-	98364	2095	128173	118860	122292	469784
2	**Bellary**	988500	988500	83692	-	83692	2343	64734	5099	35845	191713
3	**Bidar**	544800	96100	1973	-	1973	923	18165	25898	1062	48021
4	**Bijapur**	1706900	1706900	69978	-	69978	2020	78734	88447	22754	261933
5	**Chikmaglur**	720100	620800	4194	-	4194	9972	9697	577	8635	33075
6	**Chitradurga**	1085200	1085200	4708	-	4708	596	76937	-	-	82241
7	**Dharwad**	1373800	1188000	35362	-	35362	383	15237	-	13	50995
8	**Gulbarga**	1622400	1622400	140510	-	140510	3209	20050	28279	9632	201680
9	**Hassan**	681400	131800	35725	-	35725	32501	22341	1010	1198	92775
10	**Raichur**	1401700	1401700	142073	-	142073	2324	22885	14655	11231	193168
11	**Shimoga**	1055300	783500	33733	-	33733	59955	22836	4452	11064	132040
12	**Tumkur**	1059800	393700	2648	-	2648	25578	132122	1056	-	161404
13	**Uttar Kannada**	1029100	63700	-	-	-	4960	2659	9483	10502	27604
	Sub Total	**14610500**	**11327200**	**652960**	**-**	**652960**	**146859**	**614570**	**297816**	**234228**	**1946433**

Contd./…

Table 16 : Net area iIrrigated by sources by river basin and State for 2008-2009

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
iii)	**MAHARASHTRA**										
1	**Ratnagiri**	820800	11700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Ahmadnagar**	1704800	618000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Pune**	1564300	1548300	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Satara**	1048000	1048000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Sangli**	857200	857200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Solapur**	1489500	1488400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	**Kolhapur**	768500	758600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
8	**Bid**	1069300	156700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
9	**Osmanabad+**	1472600	455600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
10	**Latur**	737200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**11532200**	**6942500**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
	Grand Total	**50978800**	**25894900**	**1879929**	**N.A.**	**1879929**	**510929**	**1686261**	**919874**	**371860**	**5368853**

Source : Directorate of Economics and Statistics, Ministry of Agriculture (Through NET)

Note : 1. Totals may not tally due to rounding off.

2. N.A. = Not Available

VII	**Basin : Cauvery**										
i)	**KARNATAKA**										
1	**Bangalore Rural**	219000	171500	-	-	-	128	24571	55	43	24797
2	**Bangalore Urban**	581500	395500	-	-	-	348	10118	-	-	10466
3	**Chikmagalur**	722075	84800	4194	-	4194	9972	9697	577	8635	33075
4	**Hassan**	681400	489600	35725	-	35725	32501	22341	1010	1198	92775

Contd.

5	**Kodagu (Coorg)**	410200	217200	2481	-	2481	352	872	116	879	4700
6	**Mandya**	496100	496100	102806	-	102806	20799	5802	7157	3592	140156
7	**Mysore**	1195400	1195400	108702	-	108702	20780	10223	19167	358	159230
8	**Tumkur**	1059800	445300	2648	-	2648	25578	132122	1056	-	161404
	Sub Total	**5365475**	**3495400**	**256556**	-	**256556**	**110458**	**215746**	**29138**	**14705**	**626603**
ii)	**KERALA**										
1	**Kannur**	297112	65000	1938	1374	3312	1679	23	15449	3825	24288
2	**Wynad**	213100	-	221	767	988	230	1	160	10123	11502
3	**Kozhikode**	447500	120000	1553	258	1811	300	94	3058	693	5956
4	**Palakkad**	448000	57500	47256	1187	48443	5316	6632	18621	13225	92237
5	**Idukki**	501900	40000	3621	496	4117	6462	190	1849	5296	17914
	Sub Total	**1907612**	**282500**	**54589**	**4082**	**58671**	**13987**	**6940**	**39137**	**33162**	**151897**

Contd.

Table 16 : Net area iIrrigated by sources by river basin and State for 2008-2009

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
iii)	**TAMIL NADU**										
1	**Dharmapuri+**	1827100	1042100	634	-	634	4022	765	59319	-	64740
2	**Salem**	520530	N.A.	3090	-	3090	392	8989	92496	29	104996
3	**South Arcot**	1089500	62500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Coimbatore+Periyar**	1567800	1323800	22301	-	22301	43	18903	69573	1170	111990
5	**Nilgiri**	254900	209900	-	-	-	-	-	273	26	299
6	**Madurai+**	1262300	445300	26317	-	26317	26430	932	31470	5	85154
7	**Dindugul**	626664	N.A.	5073	-	5073	7524	5186	91441	1098	110322
8	**Pudukottai+**	1574700	1117200	5484	-	5484	75836	22566	7815	-	111701
9	**Tiruchirapalli**	511400	N.A.	41510	-	41510	4850	7061	53552	-	106973

Contd.

10	**Thanjavur**	828000	543000	148913	-	148913	-	-	-	-	148913
	Sub Total	**10062894**	**4743800**	**253322**	-	**253322**	**119097**	**64402**	**405939**	**2328**	**845088**
iv)	**PONDICHERY**										
	Karaikal	49200	16000	5429	-	5429	-	36	-	22	5487
	Sub Total	**49200**	**16000**	**5429**	**-**	**5429**	**-**	**36**	**0**	**22**	**5487**
	Grand Total	**17385181**	**8537700**	**569896**	**4082**	**573978**	**243542**	**287124**	**474214**	**50217**	**1629075**
VIII	**Basin : East Folowing Rivers from Mahanadi to Kanyakumari**										
i)	**ANDHRA PRADESH**										
1	**Srikakulam**	2353700	1983300	106120	-	106120	68736	7997	12427	1953	197233
2	**Vizianagaram**	653900	N.A	37467	-	37467	84279	12169	4842	4251	143008
3	**Vishakhapatnam**	1116100	N.A	42285	-	42285	27498	10243	6108	21290	107424
4	**East Godavari**	1854900	619300	179291	-	179291	32368	64773	138	11530	288100
5	**West Godavari**	778000	N.A	190221	-	190221	22643	146343	6347	8528	374082
6	**Krishna**	872700	487300	227186	-	227186	25993	53628	7692	13528	328027
7	**Guntur+**	5975100	2997800	306223	-	306223	4909	59656	6012	18470	395270
8	**Prakasam+**	1762600	N.A.	73944	-	73944	20764	96267	7609	18007	216591
9	**Nellore+**	1307600	N.A	93253	-	93253	77109	61558	14113	9351	255384
10	**Khammam**	1602900	549100	63772	-	63772	49102	38419	44857	22241	218391
11	**kurnool**	1765800	N.A	91587	-	91587	8878	69043	28201	10079	207788
12	**Chittoor**	1515200	1030000	284	-	284	21999	97936	26871	22	147112
	Sub Total	**21558500**	**7666800**	**1411633**	**-**	**1411633**	**444278**	**718032**	**165217**	**139250**	**2878410**

Contd./…

Table 16 : Net area iIrrigated by sources by river basin and State for 2008-2009

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
ii)	**KARNATAKA**										
1	**Bangalore**	**219000**	47500	-	-	-	**348**	**10118**	-	-	**10466**
2	**Bangalore R.**	**581500**	142500	-	-	-	**128**	**24571**	**55**	**43**	**24797**
3	**Kolar**	822300	465700	N.A.	N.A.	N.A.	N.A.	29706	N.A.	N.A.	N.A.
	Sub Total	**1622800**	**655700**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**29706**	**N.A.**	**N.A.**	**29706**
iii)	**KERALA**										
	Thiruvanatrum	219200	300	4380	272	4652	383	19	2933	214	8201
	Sub Total	**219200**	**300**	**4380**	**272**	**4652**	**383**	**19**	**2933**	**214**	**8201**
iv)	**ORISSA**										
1	**Phulbani**	1111900	204400	9840	-	9840	-	2340	1600	6960	20740
2	**Kalahandi**	1177200	50000	107130	-	107130	-	11580	5370	24480	148560
3	**Koraput**	2696100	868500	45500	-	45500	-	5150	820	24130	75600
4	**Ganjam**	1253100	1253100	205700	-	205700	-	8230	15220	19690	248840
5	**Puri**	1018200	412100	68210	-	68210	-	11510	-	15720	95440
	Sub Total	**7256500**	**2788100**	**436380**	**0**	**436380**	**0**	**38810**	**23010**	**90980**	**589180**
v)	**TAMIL NADU**										
1	**Madras**	17400	17400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Chengai-Anna**	785700	785700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**North Arcot**	607700	607700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Dharmapuri+**	1827100	785000	634	-	634	4022	765	59319	-	64740
5	**Salem**	520530	N.A	3090	-	3090	392	8989	92496	29	104996
6	**Tiruvannamalaai**	619100	619100	823	-	823	37080	960	113611	-	152474
7	**South Arcot**	1089500	1027000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
8	**Dindugul +**	1262300	817000	5073	-	5073	7524	5186	91441	1098	110322

Contd.

9	**Madurai**	374173	N.A	26317	-	26317	26430	932	31470	5	85154
10	**Thanjavur**	828000	285000	133168	-	133168	313	37077	967	-	171525
11	**Pudukottai**	465100	465100	5484	-	5484	75836	22566	7815	-	111701
12	**PMT**	1260100	1260100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
13	**Kamarajar+**	344573	N.A	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
14	**Ramanathapuram+**	417500	N.A	N.A.	N.A.	N.A.	53017	2102	14545	-	69664
15	**Chidambaranar+**	1143100	1143100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
16	**Tirunelveli**	682300	N.A	19928	N.A.	19928	50003	984	50961	-	121876
17	**Kanyakumari**	168400	168400	10683	N.A.	10683	16340	158	389	151	27721
	Sub Total	**12412576**	**7980600**	**205200**	-	**205200**	**270957**	**79719**	**463014**	**1283**	**1020173**
vi)	**PONDICHERY**										
	Pondicherry	49200	29300	-	-	-	-	10407	-	-	10407
	Sub Total	**49200**	**29300**	-	-	-	-	**10407**	-	-	**10407**

Contd.

Table 16 : Net area iIrrigated by sources by river basin and State for 2008-2009

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
	Basin : Penner										
i)	**ANDHRA PRADESH**										
1	**Kurnool**	1765800	1409600	91587	-	91587	8878	69043	28201	10079	207788
2	**Cuddapah**	1535900	1535900	27042	-	27042	7223	119910	4862	642	159679
3	**Anantapur**	1913000	1461600	20965	-	20965	7391	80093	8056	1658	118163
4	**Prakasam+**	1762600	N.A.	73944	-	73944	20764	96267	7609	18007	216591
5	**Guntur+**	5975100	1567700	306223	-	306223	4909	59656	6012	18470	395270
6	**Nellor+**	1307600	N.A.	93253	-	93253	77109	61558	14113	9351	255384

Contd.

7	**Chittor**	1535900	N.A.	284	-	284	21999	97936	26871	22	147112
	Sub Total	**15795900**	**5974800**	**613014**	**-**	**613014**	**126274**	**486527**	**68853**	**58207**	**1352875**
ii)	**KARNATAKA**										
1	**Bangalore R.**	581500	43500	-	-	-	128	24571	55	43	24797
2	**Kolar**	822300	356600	-	-	-	-	29706	-	-	29706
3	**Tumkur**	1059800	220800	2648	-	2648	25578	132122	1056	-	161404
	Sub Total	**2463600**	**620900**	**2648**	**-**	**2648**	**25706**	**186399**	**1111**	**43**	**215907**
	Grand Total	**61378276**	**25716500**	**615662**	**-**	**615662**	**151980**	**672926**	**69964**	**58250**	**1568782**
IX	**Basin : West Flowing Rivers from Kanyakumari to Tapi**										
	DADRA & NAGAR HAVELI										
1	**Daman & Diu**	11200	7200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Dadra & Nagar Haveli**	49100	49100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**60300**	**56300**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	
	Goa	370200	370200	7914	-	7914	774	158	19775	6689	35310
	Sub Total	**370200**	**370200**	**7914**	**0**	**7914**	**774**	**158**	**19775**	**6689**	**35310**
	GUJARAT										
1	**Surat**	765700	282700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Valsad**	524400	524400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Dangs**	176400	176400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**1466500**	**983500**	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	KARNATAKA										
1	**Belgaum**	1341500	96600	98364	-	98364	2095	128173	118860	122292	469784
2	**Dharwad**	1373800	185800	35362	-	35362	383	15237	-	13	50995
3	**Chikmaglur**	720100	14500	4194	-	4194	9972	9697	577	8635	33075

Contd./…

Table 16 : Net area iIrrigated by sources by river basin and State for 2008-2009

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
5	**Dak. Kannada**	844100	844100	-	-	-	-	9715	40578	20074	70367
6	**Hassan**	681400	60000	35725	-	35725	32501	22341	1010	1198	92775
7	**Kodagu**	410200	193000	2481	-	2481	352	872	116	879	4700
8	**Shimoga**	1055300	271800	33733	-	33733	59955	22836	4452	11064	132040
9	**Utt. Kannada**	1029100	120000	-	-	-	4960	2659	9483	10502	27604
	Sub Total	**7455500**	**1785800**	**209859**	**-**	**209859**	**110218**	**211530**	**175076**	**174657**	**881340**
	KERALA										
1	**Kasargod**	199200	199200	775	670	1445	10208	3509	28532	5083	48777
2	**Kannur**	296600	231600	1938	1374	3312	1679	23	15449	3825	24288
3	**Kozhikode**	447500	327500	1553	258	1811	300	94	3058	693	5956
4	**Mallapuram**	355000	355000	1927	806	2733	4760	312	12020	5873	25698
5	**Palakkad**	448000	390500	47256	1187	48443	5316	6632	18621	13225	92237
6	**Thrissur**	303200	303200	16213	1	16214	5518	719	35239	9882	67572
7	**Ernakulam**	240700	240700	12821	163	12984	1982	1098	8014	2714	26792
8	**Idukki**	501900	461900	3621	496	4117	6462	190	1849	5296	17914
9	**Kottayam**	220300	220300	-	3	3	133	9	1212	11858	13215
10	**Alappuzha**	141400	141400	1837	12	1849	2419	5753	1184	25620	36825
11	**Pathaamthitta**	264200	264200	1743	4	1747	55	-	2931	1502	6235
12	**Kollam**	249100	249100	1671	305	1976	307	-	2110	485	4878
13	**Thiruvantrum**	219200	218900	4380	272	4652	383	19	2933	214	8201
	Sub Total	**3886300**	**3603500**	**95735**	**5551**	**101286**	**39522**	**18358**	**133152**	**86270**	**378588**
											Contd.

	MAHARASHTRA										
1	**Bombay**	60300	60300	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Thane**	955800	955800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Raigarh**	715200	715200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Sindhudurg**	1341500	1329800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Nasik**	1553000	420600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Dhule**	1315000	7500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	**Kolhapur**	768500	9900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**6709300**	**3499100**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
	TAMIL NADU										
1	**Nilgiri**	254900	45000	-	-	-	-	-	273	26	229
2	**Coimbatore**	746900	244000	22301	-	22301	43	18903	69573	1100	111990
	Sub Total	**1001800**	**289000**	**22301**	**-**	**22301**	**43**	**18903**	**69846**	**1126**	**112219**

Contd.

Table 16 : Net area iIrrigated by sources by river basin and State for 2008-2009

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
	PONDICHERY										
1	**Yanam**	3000	3000	278	-	278	-	-	-	-	278
2	**Mahe**	900	900	-	-	-	-	-	-	30	30
	Sub Total	**3900**	**3900**	**278**	**N.A.**	**278**	**N.A.**	**N.A.**	**N.A.**	**30**	**308**
	Grand Total	**20953800**	**10591300**	**336087**	**5551**	**341638**	**150557**	**248949**	**397849**	**268772**	**1407765**
X	**Basin : Tapi**										
	<---------- Not Available Data ---------->										

Contd.

XI	**Basin : Narmada**										
i)	**GUJARAT**										
1	**Vadodara**	779400	396000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Bharuch**	903800	468000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Surat**	765700	18000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**2448900**	**882000**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
ii)	**MADHYA PRADESH**										
1	**Sagar**	1025200	171600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Damoh**	730600	65100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Dewas**	702000	394400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Jhabua**	678200	335700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Dhar**	815300	471400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Indore**	389800	97400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	**West Nimar (Khargaon)**	1345000	1171000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
8	**East Nimar (Khandwa)**	1077900	725900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
9	**Vidisha**	737100	46100	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
10	**Sehore**	657800	225600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
11	**Raisen**	846600	467800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
12	**Betul**	1004300	370000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
13	**Hoshangabad**	1003700	1003700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
14	**Jabalpur**	1016000	648300	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
15	**Narsimhapur**	513300	513300	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
16	**Mandla**	1326900	1139500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
17	**Chhindwara**	1181500	285400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
18	**Seoni**	875800	221800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.

Contd./…

Table 16 : Net area iIrrigated by sources by river basin and State for 2008-2009

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
19	**Balaghat**	922900	221500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
20	**Shahdol**	1402800	77800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**18252700**	**8653300**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
iii)	**CHHATISGARH**		`								
1	**Rajnandgaon**	1112700	97200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**1112700**	**97200**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
iv)	**MAHARASHTRA**										
1	**Dhule**	1315000	396000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**1315000**	**396000**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
	Grand Total	**23129300**	**10028500**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
XII	**Basin : Mahai and Sabarmati**										
a)	**Basin : Mahi**										
i)	**GUJARAT**										
1	**Kheda**	719400	105000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Panchmahals**	886600	885600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Vadodara**	779400	383400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Bharuch**	903800	294800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**3289200**	**1668800**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
ii)	**MADHYA PRADESH**										
1	**Ratlam**	486100	180700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Jhabua**	678200	342500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Dhar**	815300	150000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.

Contd.

4	**Mandsaur**	979100	3300	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**2958700**	**676500**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
iii)	**RAJASTHAN**										
1	**Udaipur**	1727900	637500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Chittorgarh**	1085600	289700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Dungarpur**	377000	327000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Bansewara**	503700	503700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**3694200**	**1757900**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
b)	**Basin: Sabarmati**										
i)	**GUJARAT**										
1	**Surendranagar**	1048900	365000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Banaskantha**	1270300	52500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Sabarkantha**	739000	739000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Mahesana**	902700	102000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.

Contd.

Table 16 : Net area iIrrigated by sources by river basin and State for 2008-2009

(Area in hectares)

Sl. No.	State/District	District Area	Basin Area	Canals		Total Canals	Tanks	Wells		Other Sources	Grand Total
				Government	Private			Tubewells	Other Wells		
1	2	3	4	5	6	7	8	9	10	11	12
5	**Gandhinagar**	64900	64900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Ahmedabad**	870700	460000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	**Kheda**	719400	614400	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**5615900**	**2397800**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
ii)	**RAJASTHAN**										
1	**Sirohi**	513600	10000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Udaipur**	1727900	258900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Dungarpur**	377000	50000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**2618500**	**318900**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**

Contd.

c)	**Basin : Luni & Others**										
i)	**GUJARAT**										
1	**Jamnagar**	1412500	1412500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Rajkot**	1120300	1120300	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Surendranagar**	1048900	683900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Bhavnagar**	1115500	1115500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Amreli**	676000	676000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Junagadh**	1060700	1060700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
7	**Kachch**	4565200	4565200	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
8	**Banaskantha**	1270300	1217800	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
9	**Mahesana**	902700	800700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
10	**Ahemdabad**	870700	410700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**14042800**	**13063300**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
ii)	**RAJASTHAN**										
1	**Ajmer**	848100	84900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
2	**Jodhpur**	2285000	685500	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
3	**Nagaur**	1771800	708900	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
4	**Pali**	1238700	1238700	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
5	**Jalor**	1064000	1064000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
6	**Sirohi**	513600	503600	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**7721200**	**4285600**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
iii)	**Daman& Diu**										
	Diu	11200	4000	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
	Sub Total	**11200**	**4000**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**
	Grant Total	**39951700**	**24172800**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**	**N.A.**

Sources: Directorate of Economics & Statistics, Ministry of Agriculture.

Appendix B

Glossary of Terms

Glossary of Terms

Active (usable) storage capacity	The total amount of reservoir capacity normally available for release from a reservoir below the maximum storage level. It is total or reservoir capacity minus inactive storage capacity. More specifically, it is the volume of water between the outlet works and the spillway crest.
Alluvium	Sediments deposited by erosion processes, usually by streams.
Area Sown more than once	This represents the areas on which crops are cultivated more than once during the agricultural year. This is obtained by deducting `Net Area Sown' from `Total Cropped Area'.
Area under Non-agricultural Uses	This includes all lands occupied by buildings, roads and railways or under water, e.g. rivers and canals and other lands put to uses for other than agricultural purposes.
Barren and Un-culturable Land:	This includes all barren and unculturable land like mountains, deserts, etc. land whether such land is in isolated blocks or within cultivated holdings which cannot be brought under cultivation, except at an exorbitant cost, is classified as unculturable land
Basin boundary	The topographic dividing line around the perimeter of a basin, beyond which overland flow (i.e., runoff) drains away into another basin.
Bed load	Sand, silt, gravel, or soil and rock detritus carried by a stream on or immediately above its bed. The particles of this material have a density or grain size such as to preclude movement far above or for a long distance out of contact with the stream bed under natural conditions of flow.
Bed material	The sediment mixture of which a streambed, lake, pond, reservoir, or estuary bottom is composed.
Biochemical Oxygen Demand (B.O.D.)	The measure of oxygen required for natural oxidation of organic matter with the aid of bacteria. The test is made by taking duplicate samples of water in two completely filled bottles, one of which is sealed and kept stored for 5 days. The dissolved oxygen content of the first sample gives the biochemical oxygen demand, or shortly B.O.D. value. The B.O.D. value of surface waters may be 1 to 10 p.p.m., and for deep well water it would be much less.

Coliform Group	All waters contain bacteria, vast majority of which are perfectly harmless. One organism, bacillus Coli, found in the intestines of men and warm-blooded animals, which in itself is usually quite and may therefore be regarded as danger signal. The group of bacteria of intestinal origin is known as coliform group. The bacilli of this group ferment lactose with gas formation. Since organisms of the coliform group normally live longer in water than other bacteria, absence of such organisms indicates that the water is safe. Also this group is more resistant to treatment than pathogens, their existence or otherwise gives a useful indication of the efficiency of water treatment methods.
Coliform Index	The probable number of coliform organisms present in 100 ml. is known as coliform index. If out of 5 portions be isolated from one sample only, the number of coliforms would be considered to be 1 in 50 ml. or 2 in 100 ml., which would be the coliform index, assuming that the gas formation was due to one coliform only.
Culturable Waste Land	This includes land available for cultivation, whether not taken up for cultivation or taken up for cultivation once but not cultivated during the last five years or more in succession including the current year for one reason or the other. Such lands may be either fallow or covered with shrubs and jungles which are not put to any use. They may be assessed or unassessed and may lie in isolated blocks or within cultivated holdings.
Current Fallows	This represents cropped area, which are kept fallow during the current year. For example, if any seeding area is not cropped against the same year it may be treated as current fallow.
dam	Any artificial barrier which impounds or diverts water. A dam is generally considered hydrologically significant if it is (i) One and one quarter feet (0.4 meters) or more in height from the natural bed of the stream and has a storage of at least 15 acre-feet, or (ii) has an impounding capacity of 50 acre-feet or more and is at least six feet (2 meters) above the natural bed of the stream.
Discharge	The quantity of water flowing across a section of a channel in a unit time is called the discharge. It is measured in cubic feet or meters per second, briefly called cusecs and cumecs respectively and is equal to the area of section X average velocity. Common units are cubic feet per second (cfs), second-day feet (sdf), and cubic meter per second (cumecs). Two types of discharges are often measured and recorded: (i) instantaneous discharge: the discharge at a particular instant of time. (ii) mean discharge: the arithmetic mean of individual discharges during a period of time. Discharges given are daily observed discharges commencing at 08.00 hrs.
Drainage area	An area around a river and rainfall of which flows into the river. Also known as watershed, catchment area and drainage basin.

Drainage basin	A part of the earth's surface which is occupied by a drainage system which consists of a surface stream with all its tributaries and impounded bodies of water. Also known as watershed, catchment area, and drainage area.
Fallow Land	This includes fallow land other than current fallows and current fallow land of land use classification which are explained below.
Fallow Lands other than Current Fallows	This includes all lands, which were taken up for cultivation but are temporarily out of cultivation for a period of not less than one year and not more than five years.
Forest	This includes all lands classified as forest under any legal enactment dealing with forests or administered as forests, whether state-owned or private, and whether wooded or maintained as potential forest land. The area of crops rose in the forest and grazing lands or areas open for grazing within the forests remains included under the forest area.
Gross capacity	The maximum volume of water that can be stored in a reservoir.
Gross reservoir capacity	The total amount of storage capacity available in a reservoir for all purposes from the streambed to the normal water or normal water or normal pool surface level. It does not include surcharge, but does include dead storage.
Ground water	Water within the earth that supplies wells and springs; water in the zone of saturation where all openings in rocks and soil are filled, the upper surface of which forms the water table. Also termed Phreatic water.
Ground water runoff	That part of the runoff which has passed into the ground, has become ground water, and has been discharged into a stream channel as spring, or seepage water.
Hardness	Hardness of water is generally caused by the presence of salts of calcium and magnesium. Hardness due to the presence of bicarbonates of calcium and magnesium is called temporary hardness. Permanent hardness is caused by the presence of sulphates and chlorides of these metals, and is not removable by boiling. The sum of these two hardness is called total hardness. It is expressed in terms of calcium carbonate. Since one gallon of water weighs 70,000 grains, degrees of hardness can be converted in p.p.m. by multiplying by 14.3. A water having 50 to 100 p.p.m. hardness is called soft water, one with 100 to 200 p.p.m. Moderately hard, and that with 200 to 300 p.p.m. hard. Hardness of 80 to 90 p.p.m. is considered to be the best.
Headwater basin	A basin at the headwaters of a river. All discharge of the river at this point is developed within the basin.

Hydrogen-ion Concentration (pH)	Acidity and Alkalinity determinations is the measures of acid and alkali present, while the H-ion concentration determines the strength of the acid and alkali in water. An ion is an atom or a group of atoms that carries an electric charge. The H-ion concentration is expressed in terms of logarithm of the reciprocal of the H-ion concentration. This term is called the pH value (potential of Hydrogen). Log 1/10-7 = 7, so that pH value 7 denotes neutrality while values above 7, signify alkalinity and those below 7, acidity. The determination of pH value provides information concerning the corrosive character of water. Waters with pH between 7.4 and 8.4 are practically inactive. Waters with pH above 8.6 or 8.8 are likely to cause precipitation of calcium carbonate in the distribution system, while waters over-carbonate with CO2 may dissolve the slight carbonate film on the inside of mains and start active corrosion, depending upon the pH value. When the pH of natural waters is below 7 it may be found necessary to add a small amount of soda ash or lime to the water before admittance to the mains, as otherwise corrosion may be caused.
Hydrologic Cycle	Water is lost to the atmosphere as vapour from the earth, which is then precipitated back in the form of rain, snow, hail, dew, frost, etc. The process of evaporation and precipitation which combines forever and thereby maintaining a balance between the two is called Hydrologic Cycle.
Hydrologic unit	A geographical area representing part or all of a surface drainage basin or distinct hydrologic feature such as a reservoir, lake, etc.
Inactive storage Capacity	The portion of capacity below which the reservoir is not normally drawn, and which is provided for sedimentation, recreation, fish and wildlife, aesthetic reasons, or for the creation of a minimum controlled operational or power head in compliance with operating agreements or restrictions.
Inches of runoff	the volume of water from runoff of a given depth over the entire drainage.
Irrigated area	The gross farm area upon which water is artificially applied for the production of crops, with no reduction for access roads, canals, or farm buildings.
Irrigation efficiency	The percentage of water applied that can be accounted for in soil moisture increase for conjumtive use.
Irrigation requirement	The quantity of water, exclusive of precipitation, that is required for crop production. It includes surface evaporation and other economically unavoidable wastes.

Land under Miscellaneous Tree Crops, etc	This includes all cultivable land which is not included in `Net area sown' but is put to some agricultural use. Lands under Casuarinas trees, thatching grasses, bamboo bushes and other groves for fuel, etc. which are not included under `Orchards' are classified under this category.
Live capacity	The minimum volume of water required for maintaining flow of water from the Reservoir. It is the total amount of storage capacity available in a reservoir for all purposes, from the dead storage level to the normal water or normal pool level surface level. Does not include surcharge, or dead storage, but does include inactive storage, active conservation storage and exclusive flood control storage.
Long term storage dams	Reservoirs used for recreational use or storage of irrigation, municipal or industrial water. Because water is impounded on a "permanent" basis, the design of these dams is more complex than for tailings or flood control detention dams. A long term storage dam may include an impermeable core surrounded by shell material; have many types of drains and filters, outlet works, with gates and valves, seepage collection boxes, and possibly several spillways. The capacity of the spillway is dependent upon the downstream hazard potential.
Mean annual rainfall	Mean annual rainfall is usually worked out as a simple average of the total rainfall of various years.
Mean depth	The average depth of water in a stream channel or conduit. It is equal to the cross-sectional area divided by the surface width.
Moisture equivalent	The ratio of (1) the weight of water which the soil, after saturation, will retain against a centrifugal force 1,000 times the force of gravity, to (2) the weight of the soil when dry. The ratio is stated as a percentage.
Net Area Sown	This represents the total area sown with crops and orchards but area sown more than once in the same year is counted only once.
Net rainfall	The portion of rainfall which reaches a stream channel or the concentration point as direct surface flow.
Normal year	The year during which the precipitation or stream flow approximates the average for a long period of record.
Not available for cultivation	This includes area under non-agricultural uses and barren & unculturable land which are briefly described below.
Other Cultivated land excluding fellow land	This includes (i) permanent pastures and other grazing land (ii) land under miscellaneous trees, crops and groves not included in net area and (iii) culturable waste land which are briefly described below.
Peak discharge	Rate of discharge of a volume of water passing a given location. (Usually in cubic feet per second.)

Permanent Pastures and other Grazing Lands	This includes all grazing lands whether they are permanent pastures and meadows or not. Village common grazing land is included under this head.
Point discharge	Instantaneous rate of discharge, in contrast to the mean rate for an interval of time.
Point precipitation	Precipitation at a particular site, in contrast to the mean precipitation over an area.
Reporting Area for Land Utilisation Statistics	The Reporting area stands for the area for which data on land use classification of area are available. In areas where land utilization figures are based on land records, reporting area is the area according to village papers, i.e. the papers prepared by the village accountants. In some cases, the village papers may not be maintained in respect of the entire area of the State. For example, village papers are not prepared for forest areas for which no village paper exists for which ad-hoc estimates of classification of area etc. framed to complete the coverage.
River Basin	Drainage area of a river and its tributaries.
River gauge datum	The arbitrary zero datum elevation which all stage measurements are made from.
Runoff	Water which is not absorbed by the soil and flows to lower ground, eventually draining into a stream, river, or other body of water. It is that part of precipitation that flows toward the streams on the surface of the ground or within the ground. Runoff is composed of base flow and surface runoff.
Runoff/ potential	Runoff/ potential of a river for a specified period at a site is the total volume of water flow/passed from/through the site during the specified period. It is the notional depth of water in mm over the catchment, equivalent to annual runoff (in M.Cum.)/Catchment Area (km2)* 1000 and calculated at the discharge measurement station.
Second-day feet	The volume of water represented by a flow of one cubic foot per second for 24 hours; equal to 84,000 cubic feet. This is used extensively as a unit of runoff volume. Often abbreviated as SDF.
Sediment storage capacity	The volume of a reservoir planned for the deposition of sediment.
Soil moisture	Water contained in the upper regions near the earth's surface.
Stage	The level of the water surface above an established "zero" plane or datum at a given location.
Surface runoff	The runoff that travels overland to the stream channel. Rain that falls on the stream channel is often lumped with this quantity.

Surface water	Water that flows in streams and rivers and in natural lakes, in wetlands, and in reservoirs constructed by humans.
Temperature	The in-situ temperature in degree centigrade by thermometer is recorded in terms of water intended use, the treatment to remove impurities and its transport.
Total Cropped Area	This represents the total area covered with crops, i.e. the sum total of areas covered by all the individual crops; areas sown with crops more than once during the year being counted as separate areas for each crop. It is also known as Gross Cropped Area.
Tributary	A stream or river whose water flows into a larger stream or river.
Watershed	The sum total of all the land and smaller bodies of water which drains into a particular stream or river.
Zero R.L. of gauge	The Zero R.L. of a gauge is the datum level fixed for a given site, which is kept 1 or 2 m lower than the lowest water level recorded in a perennial stream. In a no perennial stream, it is kept 1 or 2 m lower than the lowest bed level of the stream.

******