ACTION PLAN FOR RESTORATION OF POLLUTED STRETCH OF RIVER TAMSA FROM

AYODHYA TO BALLIA





UTTAR PRADESH POLLUTION CONTROL BOARD

TC – 12V, VIBHUTI KHAND, GOMTINAGAR,

LUCKNOW (UP)

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1.INTRODUCTION

Tamsa River is a tributary of river Ganga flowing through several districts of Uttar Pradesh namely- Ayodhya, Ambedkar Nagar, Azamgarh, Mau and Ballia where it joins River Ganga at Salahabad village of Ballia district. This river has mythological importance as it is described in Valmiki Ramayana as a seasonal rivulet. According to Ramayana, it originates near village Lakhnipur in tehsil Rudauli and flows through Ayodhya district to Darban Lake in Tanda tehsil in Ambedkarnagar. This river flows left to Ganga and Gomti, the two important river of Ganga basins. Further it flows through Azamgarh district, via a tributary called Majauli which flows bordering the north-eastern boundary of Sultanpur district. Toms River enters in the Azamgarh district near Ahiraula in the west and flows through the entire length, leaves the district near Chorhar in the east. Ultimately meets Ganga River at Ballia district via traversing through Mau district.



Fig: 1 Tamsa River at Azamgarh district

Total stretch of River Tamsa under consideration is approx. 577 K.M.

During this length it treverseses through Districts namely Ayodhya,
Ambedkar Nagar, Azamgarh, Mau and Ballia.

As per Water Quality Monitoring Data of River Tamsa for the year 2017-18,
water quality in the identified polluted stretch of river (i.e.Ayodhya to
Ballia) falls in the Class- D as per water quality criteria of Central Pollution

Control Board. River Water is fit for propagation of Wild Life and Fisheries.

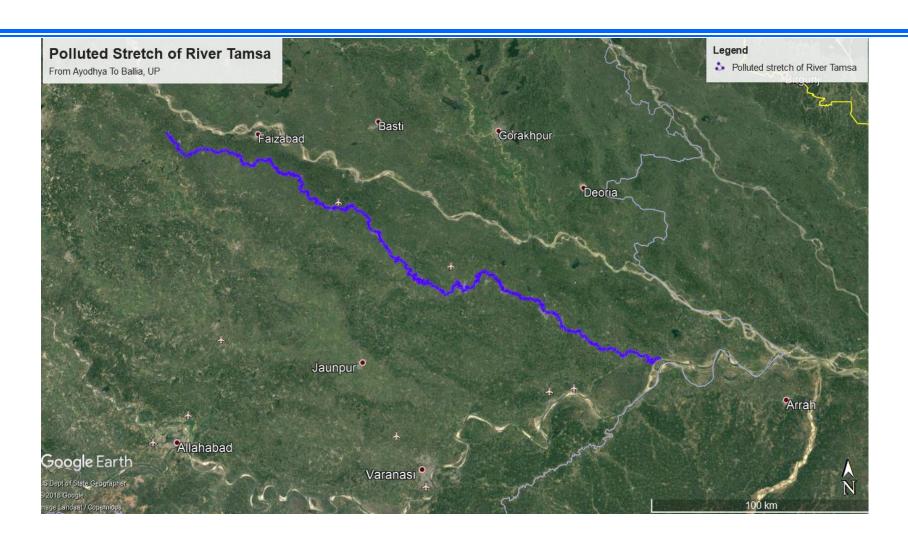


Fig 2: Google Earth image showing identified polluted stretch of River Tamsa (From Ayodhya to Ballia)

1.1 POLLUTED STRETCH OF TAMSA RIVER FROM AYODHYA TO BALLIA

Polluted Stretch of Tamsa River originates near village Lakhnipur in tehsil Rudauli and flows through Ayodhya district to Darban Lake in Tanda tehsil in Ambedkarnagar.

There are 86 (Left Bank: 36 and Right Bank: 50) villages located on the banks of this polluted stretch of river. The total population of these villages is 1, 59,886 as per the census of 2011. Taking Decadal growth into consideration, the estimated population in 2019 would be around 1,82,874 and estimated generation of sewage would reach approx. 20 MLD.

There are 07 water polluting industries located in the catchment of the concerned stretch of Tamsa River **Appendix-3**. These industries have effluent treatment plants and their treated effluent is discharged through 03 drains, of which all drains are mixed drains where treated industrial effluent is mixed with the sewage.

2. OBJECTIVE OF THE ACTION PLAN

The objective of the Action Plans is to restore the quality of polluted stretch of River Tamsa to be made fit for at least bathing purposes.

3. POLLUTION INVENTORY

3.1. DETAILS OF DRAINS POLLUTING RIVER TAMSA DETAILS OF DRAINS CONTRIBUTING THE POLLUTION

In the polluted stretch under question of river Tamsa, total discharge of 171.26 MLD is estimated in the form of sewage and industrial effluent through 26 drains directly or partially discharging into the river.

As per desk inventory, about 168.29 MLD of sewage and 2.97 MLD of industrial effluent are currently being discharged into the river Tamsa. Treated Industrial effluent coming from 07 industries which is approx. 2.97 MLD, is being discharged into river Tamsa in the polluted river stretch. The treatment of sewage is a major area of concern as total estimated sewage discharge of 168.29 MLD of sewage is untreated. The estimates of industrial effluent are based upon the consented discharge quantified from the units but actual industrial effluent may be more than the estimates owing to over discharge by consented industries and discharge from illegal units operating in non-conforming areas. A detailed drain wise data regarding sewage, industrial effluent and number of industries in the drain, status of tapping and status of fixing of bar meshes etc. is given in **Appendix-1**

Summary of Drains

S	District/ City	No. of	Type of Drains		Status of	Status of Drains			Industries		Sewage Discharge (MLD)			
No. Orai ns	Drai	Domes tic	Industri al	Mixed	Tapped	Untappe d	Partially Tapped	Number	Treated Effluent (MLD)	Treated	Untreat ed	Total	Dischar ge in the River (MLD)	
1	Ayodhya	04	02	0	02	-	04	-	3	1.4	0	6.2	6.2	7.6
2	Ambedkar Nagar	11	10	0	01	-	11	-	1	1.0	0	52.09	52.09	53.09
3	Azamgarh	10	10	0			10	-	1	0.35	0	50	50	50.35
4	Mau	1	1	0	-	-	1	-	2	0.22	0	60	60	60.22
	Total	26	23	0	03	-	26	-	7	2.97	0	168.29	168.29	171.26

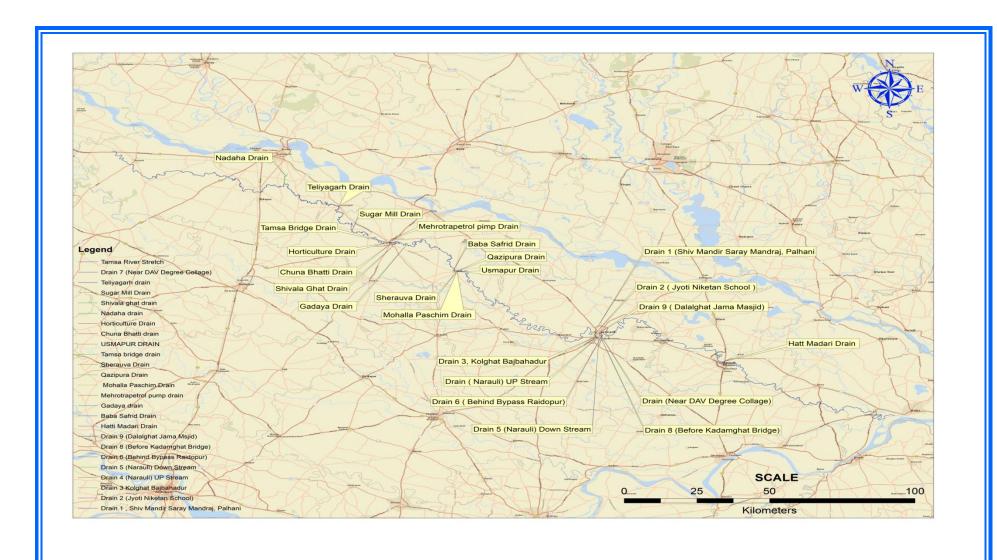


Fig: 3.1, GIS Map of Tamsa River Polluted Stretch with Draina

A. Pachlo Drain (Barabanki/Ayodhya)

a. Origin

Pachlo drain originates from Pachlo jheel Vill- Pachlo, District Barabanki, Uttar Pradesh. It joins Tamsa River at village-Bikawal, District-Ayodhya. Coordinates of its meeting point in River Tamsa are Latitude: 26°44'7"N & Longitude: 81°43'54"E.The drain carries sewage and industrial effluent of 01 Industry (M/s. Raujagaon Chini Mill, Raujagaon, Ayodhya) in the catchment of drain Pachlo The treated effluent approx. 0.8 MLD from these industries and sewage (Nagar Palika Parishad- Rudauli) approx. 4.6 MLD. is discharged in Pachlo drain.

b. Length covered

Length covered Total Distance of Pachlo drain from its origin to village- Pachlo meeting point to Tamsa is approx.: 1.11 kms.

c. Details of industries & discharge of their effluent into the drain

Details of industries & discharge of their effluent into the drain

Pachlo carries natural water, domestic waste water of Nagar Palika

Parishad-Rudauli as well as effluent of 01 Industries in the catchment

of Pachlo drain Parameters Results

Parameters	Results
рН	7.83
BOD (mg/l)	24.0
COD (mg/l)	184.0
TSS (mg/l)	103
Date of Sampling	14.11.18



B. Nadaha Drain

a. Origin

Madaha Drain originates from vill- Khanpur Masaudha and traverses to Itaura, Sukhapur to vill- Anjana it joins river Tamsa District Ayodhya, Uttar Pradesh. Nadaha drain Coordinates of itsmeeting point in river Tamsa are Latitude: 26°39'35.6.34"N & Longitude: 82°12'37.7"E. The drain carries sewage and industrial effluent of 02 Industry (M/s. K.M. Sugar Mill Ltd. (Sugar and Distillery Unit), Motinagar, Ayodhya) in the catchment of drain Nadaha The treated effluent approx. 0.64 MLD from these industries and sewage is discharged in Nadaha drain.

b. Length covered

Covered Distance of Nadaha Drain from khanpur Masaudha to meeting point to river Tamsa (Vill-Anjana) is approx. 15.0 km.

c. Details of industries & discharge of their effluent into the drain

Parameters	Results
рН	7.98
BOD (mg/l)	60.0
COD (mg/l)	196.0
TSS (mg/l)	108.0
Date of Sampling	16.10.2018



C. Teliyagarh Drain

a. Origin

Teliyagarh Drain originates from Nagar Panchayat Goshaiganj District Ayodhya Mohalla Teliyagarh. Coordinates of point of Teliyagarh Drain are Latitude: 26.57000N & Longitude:82.377248 E. Teliyagarh Drain meets Tamsa River near Bhiti Chauraha, Goshaiganj, Ayodhya. The drain carries sewage effluent of Nagar Panchayat Goshaiganj in the catchment of Teliyagarh drain. The untreated sewage effluent approx. 1.4 MLD is discharged in Teliyagarh drain.

b. Lengthcovered

Distance covered by Teliyagarh drain is approx.: 1.13 km.

c. Details of effluent discharge & water quality of Teliyagarh Drain

Parameters	Results
рН	7.12
BOD (mg/l)	168.0
COD (mg/l)	464.0
TSS (mg/l)	468.0
Date of Sampling	03.03.2017



D. Akbarpur Sugar Mill Drain

a. Origin

Akbarpur Chini Mill Drain originates in vill- Chack Kodar to M/s. Akbarpur Chini Mills Ltd. Mijhauda, Ambedkar nagar and adjoint river Tamsa. Coordinate of the end point of the its Drain are Latitude: 26°28'30"N & Longitude: 82°24'49"E. The drain carries sewage and industrial effluent of 01 Industry (M/s. Akabarpur Chini Mill Ltd., Mijhauda, Ambedkarnagar) in the catchment of drain. The treated effluent approx. 2.0 MLD from this industries and sewage is discharged in drain.

b. Length covered

Distance covered by Drain is approx. 0.54 Km.

c. Details of effluent discharge & water quality of Drain

Parameters	Results
рН	7.67
BOD (mg/l)	14
COD (mg/l)	68
TSS (mg/l)	146
Date of Sampling	7.8.18



E. Drain of Nagar Palika Parishad Akabarpur

a. Origin

There are 06 Drains which are originating from city Akabarpur having total sewage discharge of approx. 30 MLD. The drain carries domestic effluent. The untreated sewage is directly discharged in river Tamsa at Akabarpur.

b. Details of effluent discharge & water quality of Nagar PailakaParishad Akabarpur Drain

There are no industries near the catchment of river Tamsa or any major drain of Akabarpur carrying any industrial effluent to the river.

All the effluents which is unloaded into river Tamsa is domestic waste.

F. Drain of Nagar Palika Parishad Jalalpur

a. Origin

There are 05 Drains which are originating from city Jalalpur having total sewage discharge of approx. 20 MLD. They all are the drains are carrying domestic effluent. The untreated sewage is directly discharged in river Tamsa at Jalalpur.

b. Details of effluent discharge & water quality of Nagar PailakaParishad Jalalpur Drain

There are no industries near the catchment of river Tamsa or any major drain of Jalalpur carrying any industrial effluent to the river. All the effluents which is unloaded into river Tamsa is domestic waste.

3.2 DETAILS OF SEWAGE POLLUTION SOURCES

As mentioned above, total sewage discharged in the identified polluted stretch of River Tamsa is 168.29 MLD. Total 26 drains are discharging into River Tamsa within identified polluted stretch. Local bodies Rudauli, Gosainganj, Jalalpur, Azamgarh, Mohammadabad, Maunath bhanjan, Kurthi Jafarpur and Chitbargaon has not installed STP for the treatment of sewage generated from local bodies and village Panchyat. 168.29 MLD untreated sewage is being discharged into River within identified polluted stretch. Rudauli, Gosainganj, Jalalpur, Azamgarh, Mohammadabad, Maunath bhanjan, Kurthi Jafarpur and Chitbargaon has not been submitted any DPR regarding installation of sewage treatment plant.

Analysis of gap generated in Sewage Treatment based on projection of Population for Year 2030 in the catchment of River Tamsa Ayodhya to Ballia

SR. NO.	DISTRICT	CITY / TOWN	POPULATION (AS PER CENSUS 2011)	DECADAL GROWTH RATE	ESTIMATED POPULATION 2030	WATER CONSUMPTION (MLD) (@135 LPCD)	SEWAGE GENERATION (MLD)	INSTALLED CAPACITY OF EXISTING STP (MLD)	PROPOSED STP CAPACITY (MLD)	GAP IN STP CAPACITY UTILIZATIO N (MLD)
1	AYODHYA	RUDAULI	4,64,250	18.29	625582	84.45	67.56	NIL	NIL	67.56
2	SULTANPUR	GOSAINGAN J	12,931	18.11	17380	2.35	1.88	NIL	NIL	1.88
3	AMBEDKAR NAGAR	AKBARPUR	1,11,447	18.3	150197	20.28	16.22	NIL	NIL	16.22

	4	AMBEDKAR NAGAR	JALALPUR	31,972	18.3	43089	5.82	4.65	NIL	NIL	4.65
	5	AZAMGARH	AZAMGARH	1,10,983	17.11	147062	19.85	15.88	NIL	NIL	15.88
	6	MAU	MOHAMMA DABAD	38,328	18.98	52150	7.04	5.63	NIL	NIL	5.63
-	7	IMAU	MAUNATH BHANJAN	2,78,745	18.98	379266	51.20	40.96	NIL	NIL	40.96
	8	MAU	KURTHI JAFARPUR	14,157	18.98	19262	2.60	2.08	NIL	NIL	2.08
	Total		10,62,813		1433988	193.59	154.86			154.86	

Source: Desk Inventory of UPPCB

3.3 DETAILS OF WASTE MANAGEMENT

3.3 (a) Municipal Solid Waste

In 04 Towns located in the catchment area of River Tamsa from Ayodhya to to Ambedkar Nagar, Total 25 TPD Solid Waste in Ayodhya (19 TPD Nagar Palika Parishad Rudauli & 6 TPD Nagar Panchayat Goshaiganj) and 64 TPD in Ambedkarnagar (50 TPD Nagar Palika Parishad Akabarpur & 14 TPD Nagar Palika Parishad Jalalpur) generated. Although the ULBs has been practicing door to door collection of MSW, however, there has been lack of processing facility and it is required that ULBs establish Municipal Solid Waste Treatment & Disposal Facility is as early as possible for maintaining the water quality of the river stretch under consideration. The details of city wise municipal solid waste generation are given below:

S.No.	District	Waste generated (TPD)	Waste Collected (TPD)	Door to Door Collection)	Remarks
1	Ayodhya	25	100%	Yes	As of now the MSW processing facility is not established /functional in the ULBs.
2	Ambedkar Nagar	64	100%	-	
3	Azamgarh	5.69	100%	-	
4	Mau	6.7	100%	-	
	Total	101.4			

Source: Nagar Palika Parishad and Nagar Nigam

Details of Dumping Site 500 Meters from the edge of the River

There is no legacy waste dumping site within 500 meter of Tamsa river in Ayodhya, Ambedkar Nagar, Azamgarh and Mau.

There are two cities/town in the polluted stretch of River Tamsa. Estimated Municipal Solid Waste generation up to year 2030 will be 512.07 Tons/day. At present no Municipal Solid Waste processing facilities is available in these towns. Urban Development Department U.P. has given a bar chart/timeline for establishing the processing facilities in these towns which is given in **appendix-8**

Gap Analysis of Municipal Solid Waste Treatment based on Year 2030 Population in the catchment of River Tamsa

SR.	CITY / TOWN	DISTRICT	POPULATIO	DECADAL	ESTIMATED	MSW	AVAILABLE	GAP	PRAPOSED
NO			N (AS PER	GROWTH	POPULATION	GENERATION	PROCESSING	(TPD)	PROCESSIN
			CENSUS	RATE	2030	ESTIMATED	FACILITY		G FACILITY
			2011)			(@350 TPD)	(TPD)		& TIMELINE
1	RUDAULI	AYODHYA	4,64,250	18.29	625582	218.95	NIL	218.95	1 YEAR AS
2	GOSAINGANJ	SULTANPUR	12,931	18.11	17380	6.08	NIL	6.08	PER APENDIX-8
3	AKBARPUR	AMBEDKAR	1,11,447	18.3	150197	52.57	NIL	52.57	AI LINDIA 6
		NAGAR							
4	JALALPUR	AMBEDKAR	31,972	18.3	43089	15.08	NIL	15.08	
		NAGAR							
5	AZAMGARH	AZAMGARH	1,10,983	17.11	147062	51.47	NIL	51.47	
6	MOHAMMADAB	MAU	38,328	18.98	52150	18.25	NIL	18.25	
	AD								
7	MAUNATH	MAU	2,78,745	18.98	379266	132.74	NIL	132.74	
	BHANJAN								
8	KURTHI	MAU	14,157	18.98	19262	6.74	NIL	6.74	
	JAFARPUR								
	Total		10,62,813		1433988	501.88		501.88	

There are 8 Cities/Towns situated at the catchment of Polluted Stretch of River Tamsa. Estimated MSW Generation on the basis of Census 2030 is 502 TPD. There are no processing facilities available; gap of 502 TPD exists in the catchment area of polluted River Stretch.

3.3(b) Bio-Medical Waste

In Ayodhy, Ambedkarnagar, Azamagarh & Mau located in the catchment of the stretch of river Tamsa there are total 329 Health Care Facilities which generate approx 912 Kg/Day of Bio-Medical Waste. All the Health Care Facilities have valid agreements with Common Bio-Medical Waste Treatment Facility situated in Lucknow & Ghazipur for collection, transportation and disposal of Bio-Medical Waste. The segregation of Bio-Medical Waste and disposal in the CBWTFs as per the provisions of Bio-Medical Waste Management Rules, 2016 is a major area of concern. The mixing of Bio-Medical Waste with Municipal Solid Waste is also observed which also needs to be addressed. The details of Bio-Medical Waste generated in the Cities/Towns and details of Common Bio-Medical Waste Treatment Facilities are given below:

S.No.	District	Total No. Of H.C.Fs	Bio Medical Waste generate d (Kg/Day	Bio Medical Waste Treated (Kg/Day)	No. Of H.C.Fs attac hed with CBW TF	No. Of H.C.Fs having captive treatme nt facility	Gap between waste generated & treatment capacity available (Kg/Day)	Remarks
1	Ayodhya	185	689	689	185	NIL	NIL	All the HCFs are Members of CBWTF
2	Ambedkarna gar	94	200	200	94	NIL	NIL	All the HCFs are Members of CBWTF
3	Azamgarh	35	15	15	35	NIL	NIL	All the HCFs are Members of CBWTF
4	Mau	15	8	8	15	NIL	NIL	All the HCFs are Members of CBWTF
	Total	329	912	912	329	NIL	NIL	

Source: Desk Inventory of UPPCB

Details of Bio-Medical Waste Treatment Facilities

S.N.	Name of the CBWTF operator connect No.	Total No. Of HCFs Being Covered	Covered District	Treatme	nt facility av	ailable	BMW Treatment capacity Kg/day	Number of Vehicles	Status of On Line Continuous Emission Monitoring System & Connectivity	Validity of issued Authorization
	& Address			Incinerator	Auto Clave	Shredder				
1	2	3	4	5	6	7	8	9	10	11
1	M/s Spectrum Waste Solutions Pvt. Ltd. Khasra No-597, Jawahar Nagar Mastemau, Sultanpur Road, Mohanlalganj Lucknow	788	Lucknow, Sultanpur, Gonda, Bahraich, Balrampur, Amethi, Ayodhya, Lakhimpur	250 kg/hr	200 kg/Shift	50 kg/hr	3400	10 With GPS	Installed & Connected	20.02.2020
2	M/S SiliconWelfare Society vil. Banka , Distt.Ghazipur	130	Baliya. Ghazipur, Deoria, Azamgarh, Ambedkar Nagar, Varanasi, Mau, Chandauli	100 kg/hr	200 litre/shift	150 kg/hr	1600	7 with GPS	Installed & Connected	31.12.2019

Source: Desk Inventory of UPPCB

3.3(c) Hazardous Waste

The total hazardous waste generation in the catchment area of the stretch from 08 industrial units (05 industry in Ayodhya & 03 industry in Ambedkarnagar) is 778.28 Ton/Annum which is collected, treated and disposed by 02 Common Facilities located near Kanpur Dehat. The details of Hazardous Waste generated and the treatment facilities are given below:

S.No.	District	Total No.	Haza	rdous Waste G	enerated (TP.	A)	Facility for Treatment & Disposal of	Gap between	Remarks
		Hazardous Waste Generating Units	Incinerable	Landfillable	Recyclable	Total	Hazardous Waste	waste generated & treatment capacity available (TPA)	
1	Ayodhya	05	9.2	41.5	680.07	730.77	The	There is no	
2	Ambedkarnagar	03	3.0	-	44.51	47.51	Incinerable&Landfillable Hazardous waste is	Gap between	
	Total	8	12.2	41.5	724.584	778.28	disposed to authorized TSDFs 1- U.P. Waste Management Project, Kanpur Dehat. 2- Bharat Oil & Waste Management, Kanpur Dehat	generation & disposal of Hazardous Waste	

Source :Desk Inventory of UPPCB

3.3(d) E-Waste

In the State, total 43 Common E- Waste Disposal Facilities are operational. Out of these, 10 units are collection centre, 16 have the facility of collection & dismantling whereas remaining 17 are collection, dismantling and centres. The cumulative capacity of these plantsrecycling 2,48,000/annum. The quantum of E-Waste generated in the State is approximately 86,000 TPA. Hence, there is no gap in the generation and treatment infrastructure for safe E-Waste handling as per the provisions of E-Waste Rules; 2016. The status report of E-Waste disposal facilities in the State is enclosed at **Appendix-6**.

4 DETAILS OF INDUSTRIAL POLLUTION SOURCES

There are 07 water polluting industries located in the catchment area of the polluted stretch of Tamsa River **Appendix-3**. These industries have effluent treatment plants and their treated effluent is discharged through 03 drains, of which all the drains are mixed drains where treated industrial effluent is mixed with the sewage. The industries are grossly polluting in nature which belong to Sugar, Distillery and other miscellaneous industries. The drain wise and sector wise distribution of industries and their GIS Mapping details are given in the Figures from 4.1.

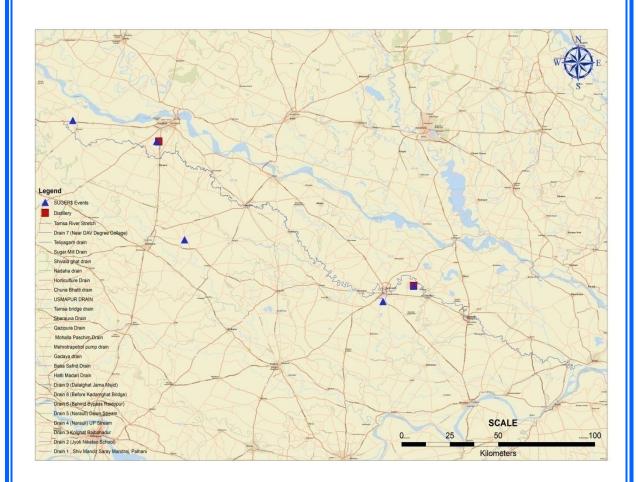


Fig:4.1: GIS map showing Industries along with drains

4.1 DETAILS OF INDUSTRIAL UNITS

The drain wise and sector wise distribution of industries and their discharge & the details given in the tables below for Tamsa river:

Summary of Industrial Units

S N	District	Drain			Туре	of Indus	try			Total Effluent		
			* The Ty	* The Type of Industry may be changed as per local conditions								
			Sugar	Pulp & Paper	Distillery	Textile	Slaughter House	Others	Total	(MLD)		
1	Ayodhya	03	2	0	1	0	0	0	3	1.4		
2	Ambedkar nagar	01	1	0	0	0	0	0	1	2.0		
3	Azamgarh	01	1	0	0	0	0	0	1	0.35		
4	Mau	02	1	0	1	0	0	0	2	0.22		
	Total	07	5	0	1	0	0	0	07	3.97		

Source: Desk Inventory of UPPCB

4.2 GAP ANALYSIS OF INDUSTRIES SITUATED IN THE CATCHMENT OF RIVER TAMSA

Presently polluted stretch of River Tamsa receives approximately 3.97 MLD treated industrial effluent. The industries situated in the catchment of the polluted river stretch utilize ground water needed for their processes. Total estimated water extraction by the industries is approximately 3.5 MLD against the discharge of 2.4 MLD by the industries. This indicates that about 20 percent of the treated effluent is recycled in the processes and rest accounts for the evaporation losses and consumption in the products.

Sector wise Gap analysis is given below: -

I. **Sugar:**-There are 03 sugar Industry in the catchment of polluted river stretch which consume 3.0 MLD ground water and 2.4 MLD treated

effluent is discharged. The detail gap analysis may be referred to in **Appendix-3A**. These gaps are to be fulfilled within 06 months. This will help in reducing the water consumption, improving the quality of treated effluent and reuse of water in irrigation.

II. **Distillery**:- There is 01 distillery unit in the catchment of polluted river stretch which consume 0.5 MLD groundwater. Although the distillery is maintaining zero liquid discharge (ZLD) but improvements are required with respect to establishment of Condensate Polishing Units and safe storage of Molasses as per CPCB guidelines. Action points with time line are given in **Appendix-3B**

5. STATUS OF GROUND WATER

The polluted stretch of Tamsa River from Ayodhya to Baliya. The river flows through 05 districts i.e Ayodhya ,Ambedkarnagar, Azamgarh, Mau& Balia. The status of Groundwater in these blocks is given below:

River Tamsa Stretch from Ayodhya to Balia Ground Water Status

Sr.	Name of	Name of	Pre	Monsoor	n / Post I Me	Monsoon ters)	water le	vel	
No.	District	Block	May-14	Nov-14	Jan-15	May-15	Nov-15	Jan-16	Status of Exploitation
	Ayodhya	Gosaiganj	5.01	3.85	4.45	5.4	4.77	2.21	Safe
	Ambedkarnagar	Bhiti	6.45	5.5	5.85	7	7.25	7.55	Semi-critical
		Katehari	5.75	3.75	4.35	5.83	6.07	8.23	Safe
		Akbarpur	5.6	3.6	4.4	5.8	5.2	5.9	Safe
		Jalalpur	6.75	7.44		7.6	7.5	7.9	Safe
	Azamgarh	Ahraula	7.62	6.64	6.89	7.25	7.6	8.33	Safe
		Nizamabad	5.5	4.9	6.26	6.84	5.35	0.72	Safe
		Maunath							
	Mau	Bhanjan	6.36	5.16	6.24	7.12	6.72		Safe
	Ballia	Rasra	8.6	8.33	8.8	8.95	8.2	8.5	Safe
		Chilkhar	4.33	3.12	5.23	5.68	3.95	6.65	Safe
		Chitbargaon	3.65	1.5	2.29	3.72	1.56	2.69	Safe
		Haldi		6.02	6.35	7.8	6.82	8.1	Safe
		Garwar	3.68	1.45	2.45	4.15	2.06	3.13	Safe

Pre Monsoon Data--2014Source: http://cgwb.gov.in/District_Profile/UP.

CHEMICALS ANALYSIS DATA OF SAMPLES COLLECTED FROM GROUND WATER MONITORING WELLS IN UTTAR PRADESH 2015 -2016

River Tamsa, Stretch from Ayodhya to Ballia

			E.C.µ																
District	Block	рН	S/cm at25°C	CO 3	нсоз	CI	F	NO3	SO4	ТН	Са	Mg	Na	K	SiO2	PO4	TDS	RSC	SAR
	Masodha	8	310	NIL	159	14	0.21	0.1	20	155	40	13	6.3	2.5	24	ND	208	-0.5	0.22
	Pura																		
Ayodhya	Bazar	8	476	NIL	281	14	0.01	7.9	7.7	220	38	30	17	3.3	27	ND	319	0.2	0.51
	Sohawal	8.1	504	NIL	281	21	ND	0.28	14	230	36	34	21	4.1	28	ND	338	0	0.59
	Rudali	8.1	458	NIL	220	21	0.08	10.8	31	220	44	27	14	2.4	20	ND	307	-0.8	0.41
	Bhiti	7.9	600	NIL	354	14	0.4	0.24	12	230	32	36	44	3.9	27	ND	402	1.2	1.26
Ambedk	Katehari	7.9	610	NIL	329	21	0.23	0.29	10	270	60	29	22	2.8	24	nd	409	0	0.58
arnagar		7.6																	
arriagai	Akbarpur	9	675	NIL	329	43	0.25	0.18	33	295	40	47	32	3.5	26	nd	452	-0.5	0.81
	Jalalpur	7.8	820	NIL	37	50	0.32	10	28	315	44	50	50	5	25	nd	549	-0.1	1.22
		8.0																	
	Ahiraula	4	402	NIL	220	7	0.24	2.4	2.6	150	24	16	20	1.7	98	nd	269	1.1	0.78
Azamgar		7.9												3.9					
h	Pawai	3	521	NIL	317	14	0.58	nd	7.9	155	8	32	60	5	87	nd	349	2.2	2.12
	Dhaalaus	8.0	072		205	02	0.75	F 4	47	205		C 4	87	3.1	20		CE 1	0.7	2.25
	Phoolpur Mohamm	8.0	972		305	92	0.75	54	47	285	8	64	87	9	36	nd	651	-0.7 2.0	2.25
Mau	adabad	6.0 6	591	nil	317	14	0.63	nd	2.3	160	24	24	58	1.8	80	nd	396	2.0	2
IVIGG	adabad		331		317		0.03	na	2.5	100	27	2-7	30	4.7	- 00	110	330		
	Rasara	8.1	834	NIL	439	14	0.74	0.28	16	170	20	29	152	1	32	nd	559	3.8	5.08
Dallia.														3.7					
Ballia	Chilkahar	8	488		268	14	0.55	2.6	2.2	170	8	36	33	3	37	nd	327	0.5	0.98
		7.9																	
	Garwar	9	614	nil	293	28	0.5	35	2.2	180	24	29	58	3.8	37	nd	411	1.2	1.88

Source:http://cgwb.gov.in/District_Profile/UP.

6. MONITORING OF POLLUTION SOURCES

6.1 MONITORING OF DRAINS

All the 26 drains will be monitored on quarterly basis and the sampling points are selected near the confluence of the drains with the Tamsa River. Care has been taken that there is no backwater effect of the river at the sampling point and no source of pollution joins the drain after the sampling point. The details of drain sampling points are given below:

Drain Sampling Points

S.No	District	Name of Drain	Monitoring Point	Latitude	Longitude	Monitoring Frequency	Controlling Regional Office
1	Ayodhya	Pachlo drain	Ayodhya	26°44'7"N	81°43'54"E	Quarterly	Ayodhya
2	Ayodhya	Nadaha drain	Ayodhya	26°39'35.6. 34"N	82°12'37.7" E	Quarterly	Ayodhya
3	Ayodhya	Teliyagarh drain	Ayodhya	26°34'12.0''	82°22'38.09	Quarterly	Ayodhya
4	Ambedkar Nagar	Sugar mill drain	Ayodhya	26°28'30"N	82°24'49"E	Quarterly	Ayodhya
5	Ambedkar Nagar	Horticulture drain	Ayodhya	26°25'31"	82°31'31''	Quarterly	Ayodhya
6	Ambedkar nagar	Chuna Bhatti drain	Ayodhya	26°25'36"	82°32'0''	Quarterly	Ayodhya
7	Ambedkar nagar	Shivala ghat drain	Ayodhya	26°24'48''	82°32'44''	Quarterly	Ayodhya
8	Ambedkar nagar	Tamsa bridge drain	Ayodhya	26°25'30.08	82°31'30.73	Quarterly	Ayodhya
9	Ambedkar Nagar	Gadaya drain	Ayodhya	26°25'5.41"	82°35'3.47''	Quarterly	Ayodhya
10	Ambedkar nagar	Mehrotrapetrol pump drain	Ayodhya	26°25'43.5''	82°32'2.95''	Quarterly	Ayodhya

11	Ambedkar nagar	SHERAUVA DRAIN	Ayodhya	26°18'56.41	82°44'10.94	Quarterly	Ayodhya
12	Ambedkar nagar	BABA SAFRID DRAIN	Ayodhya	26°18'57.8"	82°44'9.01''	Quarterly	Ayodhya
13	Ambedkar nagar	MOHALLA PASCHIM DRAIN	Ayodhya	26°18'56.96	82°44'25.14	Quarterly	Ayodhya
14	Ambedkar nagar	QAZIPURA DRAIN	Ayodhya	26°18'57.78	82°44'25.01	Quarterly	Ayodhya
15	Ambedkar nagar	USMAPUR DRAIN	Ayodhya	26°18'49.82	82°44'54.92	Quarterly	Ayodhya
16	Azamgarh	Shiv Mandir Saray, Mandraj, Pallini Drain	Azamgarh	26°04'11.47	83°10'08.16	Quarterly	Azamgarh
17	Azamgarh	Jyoti Niketan School Drain	Azamgarh	26°04'11.47	83°10'22.98	Quarterly	Azamgarh
18	Azamgarh	Kolghat Drain	Azamgarh	26°03'23.96	83°10'27.55	Quarterly	Azamgarh
19	Azamgarh	Narauli U/S Drain	Azamgarh	26°02'57.64	83°10'39.40	Quarterly	Azamgarh
20	Azamgarh	Narauli D/S Drain	Azamgarh	26°02'57.64	83°10'41.37	Quarterly	Azamgarh
21	Azamgarh	Behind bypass raidarpur drain	Azamgarh	26°03'17.54	83°11'25.84	Quarterly	Azamgarh
22	Azamgarh	Near DAV Degree college Drain	Azamgarh	26°03'33.10	83°11'10.73	Quarterly	Azamgarh
23	Azamgarh	Before Kundanghat Bridge Drain	Azamgarh	26°03'58.71	83°11'20.05	Half Yearly	Azamgarh
24	Azamgarh	Dalal ghat Jama Masjid Drain	Azamgarh	26°04'08.98	83°11'18.79	Half Yearly	Azamgarh
25	Azamgarh	Dharmu Drain	Azamgarh	26°04'12.18	83°11'44.40	Half Yearly	Azamgarh
26	Mau	Madari Drain	Azamgarh	25°34'16.41	83°21'19.08	Half Yearly	Azamgarh

6.2 MONITORING OF RIVER

The polluted stretch of river Tamsa is monitored at 06 places so as to ascertain adverse effect of pollution by various sources in the river. The details of sampling points are given below:

River Sampling Points

S.No.	District	М	Monitoring Point						
		Place	Latitude	Longitude	Frequency	Regional Office			
1	Ayodhya	Near Anjana Gram	26°39'35.6.34"N	82°12'37.7"E	Monthly	Ayodhya			
2	Ayodhya	Gosai Ganj	26°34'12"N	82°22'38.09"E	Monthly	Ayodhya			
3	Ambedkar Nagar	Tamsa Bridge	26°25'30.08''N	82°31'30.73''E	Monthly	Ayodhya			
4	Azamgharh	Kol Ghat	26°03'38.9"N	83°10'05"E	Monthly	Azamgharh			
5	Azamgharh	Harbanspur	26°03'8.2"N	83°10'10.2"E	Monthly	Azamgharh			
6	Mau	Bajrang Ghat	25°56'53.5"N	83°34'32.2"E	Monthly	Azamgharh			

The monitoring data for the last three years is available at Appendix-7

6.3 MONITORING OF WATER POLLUTING INDUSTRIES

All the water polluting industries will be monitored regularly by 03 agencies namely UPPCB, District Ganga Committee/Zila Paryavaran Samiti and Third Party Institutions of repute. GPIs will be monitored quarterly and other industries will be monitored randomly by District Ganga Committee/Zila Paryavaran Samiti. Third Party Institutions shall also be entrusted with the responsibility of comprehensive monitoring by CPCB and NMCG. Besides this the

drive for identification and closure of illegal industries operating in non-conforming areas shall also be carried out by District Ganga Committees/Zila Paryavaran Samitis with appropriate Magisterial and Police support.

6.4 ESTABLISHMENT OF TAMSAPOLLUTION CONTROL ROOM

A Control Room for monitoring and centralized reporting of various pollution sources shall be established in Ayodhya with appropriate infrastructure and human resource. This control room will be under overall supervision of Commissioner, Ayodhya and will be run by UP Pollution Control Board with the help of District Ganga Committees/Zila Paryavaran Samitis. For monitoring purpose, District Ganga Committees/Zila Paryavaran Samitis will be employing JRFs/Monitoring Assistants on contractual basis with the financial support of District Ganga Committees/Zila Paryavaran Samitis. Educational/Technical Institutions and Colleges will also be identified for taking their help in monitoring and remediation of pollution sources. Capacity building for monitoring of pollution sources of the students of such identified institutions and colleges will also be done by Pollution Control Board. For monitoring exercise The Control Room with adequate infrastructure viz. LED Monitor, Desktop, Printer, Wi-Fi facility, Room rent including electricity charges etc. shall be established by UP Pollution Control Board with financial support from National Mission for Clean Ganga (NMCG). The monitoring will be done from the Control Room with the help of Web Portal on which monitoring data from field shall be uploaded. The Web Portal will be developed by UP Pollution Control Board and login ID and Password will be provided to District Ganga Committees/Zila Paryavaran Samitis for access to the portal and uploading of monitoring data of various pollution sources.

S.No	Action Point	Timeline	Implementing Department/Agency	Remark
	WAGE MANAGEMENT			
	Short Term Action Point	T	T	
1	Estimation of total sewage generation from City/Towns where sewage treatment facility does not exist and preparation of DPR for treatment of sewage.	02 Months	U.P. Jal Nigam & Concerned ULBs	
2	Measurement of flow & load of all the drains contributing pollution load in River Gomti.	02 Months	U.P. Jal Nigam & Concerned ULBs	
3	Installation of Bar-meshes in the drains & regular cleaning &disposal of Solid Waste from them.	03 Months	Concerned ULBs	The ULBs will ensure compliance i the prescribed time line as informe by Urban Development Department.
4	Untapped drains to be provided with modular treatment facilities/ In-Situ bio-remediation or Phytoid-SWAB (CSIR-NEERI) based treatment.	06 Months	U.P. Jal Nigam & Concerned ULBs	The ULBs/Urban Development Department will ensure compliance in the prescribed time line as informed by Urban Development Department.
5	Formulation of Action Plan for long term use of treated water discharged from STPs.	03 Months	U.P. Jal Nigam, Irrigation & Concerned ULBs in consultation with UPPCB/CPCB	

C No	Action Point	Time alim a	Ilawantia	Domark
S.No	Action Point	Timeline	Implementing	Remark
•			Department/Agency	
6	Formulation of Action Plan for income	03 Months	U.P. Jal Nigam & ULBs	
	generation of STPs including installation			
	of Solar Power Plants, Energy Plantation			
	& sale of sludge and treated water, bio-			
	composting etc.			
7	Preparation of DPR for channelization	Within 3	Jal Nigam / Nagar	
	including diversion of sewage generated	Months	Nigam, Concerned	
	from household / township / villages to		Districts	
	sewer lines and interception of all drains			
	(excluding drains carrying industrial			
	wastewater) for ensuring proper			
	treatment through upcoming STPs.			
8	Septage Management in the areas where	Within 6	ULBs/Jal Nigam	The ULBs will ensure compliance in
	sewerage network does not exist	Months		the prescribed time line as informed
				by Urban Development Department.
B. Lo	ng Term Action Point			
1	Laying of Sewerage Network &	24 Months	U.P. Jal Nigam &	
	Connection of households to the sewer	from	Concerned ULBs	
	line in order to utilize the installed	sanction of		
	capacity of existing STPs	DPR		
2	Establishment of Sewage Treatment	24 to 30	U.P. Jal Nigam &	Detailed plan along with details of
	Plants of adequate capacity	Months	Concerned ULBs	status of DPR, source of funding etc. Is
		from		given in para-3.2 as informed by
		sanction of		Urban Development Department, U.P.
		DPR		

S.No	Action Point	Timeline	Implementing	Remark
3.140	Action I onit	Timeline	Department/Agency	Kemark
3	Tapping & diversion of the drains having high sewage load to STPs to be	24 to 30 Months	U.P. Jal Nigam & Concerned ULBs	Detailed plan along with details of status of DPR, source of funding etc. Is
	constructed on I&D model	from sanction of DPR	doncerned obbs	given in para-3.2 as informed by Urban Development Department, U.P.
4	Infrastructure Development in Irrigation/Horticulture/ Sprinkling/Industrial use etc. And ensuring use of treated water	24 to 30 Months from sanction of DPR	U.P. Jal Nigam & Concerned ULBs	Detailed plan along with details of status of DPR, source of funding etc. Is given in para-3.2 as informed by Urban Development Department, U.P.
5	Installation of Solar Power Plant & Energy Plantations in the vacant land of STPs	12 Months from sanction of DPR	U.P. Jal Nigam/ Operating Govt. Agencies	
6	Treatment of waste water in Rural areas flowing into the river by Bioremediation/Phytoremediation/Oxidation Pond etc.	12 Months	Gram Panchayat, Panchayati Raj, Rural Development Departments, Rashtriya Swachta Mission-Gramin	The financial resources may be arranged from MNREGA/Swachh Bharat Mission – Gramin
7	Ensuring ODF in all the villages situated along the river	12 Months	Gram Panchayat, Panchayati Raj, Rural Development Departments, Rashtriya Swachta Mission-Gramin	

CN	And an Date of	m'l'	Y	D 1
S.No	Action Point	Timeline	Implementing	Remark
			Department/Agency	
C.	INDUSTRIAL WASTE MANAGEMENT			
	(a)Short Term Action Point			
1	Re-inventorisation of Water Polluting	03 Months	UPPCB, UPSIDC, ULBs	
	Industries in the catchment area of the		& Department of	
	drains and their status with respect to		Industries	
	consent, installation of ETP, adequacy of			
	ETP and final discharge point			
2	Monitoring of water polluting industries	Quarterly	UPPCB & CPCB	
	and ensuring closure of industries which			
	are operating without consent or non-			
	compliant			
3	Installation of OCEEMS, Flow Meter &	03 Months	UPPCB	
	Web Cams in large and medium category			
	of GPIs with connectivity to the server of			
	CPCB and UPPCB			
4	Closure and legal action against the	Regular	District Level Inter-	
	illegal water polluting industries	activity	Departmental	
	operating in non-confirming /residential	-	Enforcement	
	areas		Committee having	
			representatives of	
			Administration,	
			Police, UPPCB, ULBs,	
			Development	
			Authority, Power	
			Corporation, Dept. of	
			Industries etc.	

	1	<u> </u>	
Action Point	Timeline	Implementing	Remark
		Department/Agency	
In Sugar industries for reducing the	06 months	UPPCB/CPCB/	
water consumption, improving the		Industry department	
quality of treated effluent and reuse of			
	T	T	
	24 Months	· ·	
		-	
		Industries	
	24 Manadha	Danautusanta af	
	24 Months	1 -	
Pulp & Paper, and Slaughter House.		· ·	
		· ·	
		&UPPCB	
Reducing abstraction of ground water by	12 Months	CGWA, CPCB,	
reuse/recycle of treated effluent by		Department of	
installation of additional treatment		Industries & UPPCB	
facilities & process improvement			
Use of treated effluent from CETPs for	12 Months	Department of	
industrial and irrigation purposes		Industries, SPVs,	
		UPPCB & CPCB	
Actions related to improvement of ETPs	6 to 24	Department of	
and reduction of use of ground water by	Months	Industries, UPPCB &	
	water consumption, improving the quality of treated effluent and reuse of water in irrigation (b) Long Term Action Point Adoption of cleaner technologies by water polluting industrial sectors having major impact on water quality of the river. For eg. – Sugra and Distillery industries etc. Imposing stringent norms in Distillery, Pulp & Paper, and Slaughter House. Reducing abstraction of ground water by reuse/recycle of treated effluent by installation of additional treatment facilities & process improvement Use of treated effluent from CETPs for industrial and irrigation purposes Actions related to improvement of ETPs	In Sugar industries for reducing the water consumption, improving the quality of treated effluent and reuse of water in irrigation (b) Long Term Action Point Adoption of cleaner technologies by water polluting industrial sectors having major impact on water quality of the river. For eg. – Sugra and Distillery industries etc. Imposing stringent norms in Distillery, Pulp & Paper, and Slaughter House. Reducing abstraction of ground water by reuse/recycle of treated effluent by installation of additional treatment facilities & process improvement Use of treated effluent from CETPs for industrial and irrigation purposes Actions related to improvement of ETPs 6 to 24	In Sugar industries for reducing the water consumption, improving the quality of treated effluent and reuse of water in irrigation (b) Long Term Action Point Adoption of cleaner technologies by water polluting industrial sectors having major impact on water quality of the river. For eg. – Sugra and Distillery industries eet. Imposing stringent norms in Distillery, Pulp & Paper, and Slaughter House. Reducing abstraction of ground water by reuse/recycle of treated effluent by installation of additional treatment facilities & process improvement Use of treated effluent from CETPs for industrial and irrigation purposes Actions related to improvement of ETPs O6 months UPPCB/Industry department UPPCB & DEPARTMENT OF INDUSTRY

S.No	Action Point	Timeline	Implementing	Remark						
			Department/Agency							
	the industries as per the prescriptions		CPCB							
	given in Appendices 3A, 3B, 3C, 3D & 3E.									
D. S0	D. SOLID WASTE & FLOOD PRONE ZONE MANAGEMENT									
(a)	(a)Short Term Action Point									
1	Strictly ensuring prohibition of dumping	Immediate	ULBs, Gram							
	of solid & other waste within 500 Meters		Panchayat							
	of the banks of the river		Development							
			Authorities & Urban							
			Development							
			Department							
2	Collection & Segregation of Solid Waste	Immediate	ULBs, Gram	The ULBs will ensure compliance as						
	as per the provision of SWM Rules, 2016		Panchayat	per timeline given according to the						
			Development	Action Plan (Appendix-8) as						
			Authorities & Urban	informed by Urban Development						
			Development	Department, UP.						
			Department	Panchayati Raj Department, UP will						
3	Disposal of Recyclable waste through	Immediate	ULBs, Gram	ensure compliance in Rural Areas. The ULBs will ensure compliance as						
3	registered recyclers	iiiiiieuiate	Panchayat,	per timeline given according to the						
	registered recyclers		Development	Action Plan (Appendix-8) as						
			Authorities & Urban	informed by Urban Development						
				Department, UP.						
			Development	Panchayati Raj Department, UP will						
			Department	ensure compliance in Rural Areas.						
4	Compliance of SWM Rules, 2016 by bulk	02 Months	ULBs, Development	The ULBs will ensure compliance as						
	generators (onsite bio-composting,		Authorities, Railways,	per timeline given according to the						

S.No	Action Point	Timeline	Implementing	Remark
			Department/Agency	
	disposal of recyclable waste through		Transport	Action Plan (Appendix-8) as
	registered recyclers)		Corporation, Mandi	informed by Urban Development
			Parishad,	Department, UP.
			Cantonment Board,	Panchayati Raj Department, UP will
			Educational	ensure compliance in Rural Areas.
			Institution, RWAs &	
			Urban Development	
			Department etc.	
5	Compliance of C&D Waste Management	Immediate	ULBs, Development	
	Rules, 2016 & prohibition of illegal		Authorities & Urban	
	dumping of C&D waste		Development	
			Department	
6	Installation of Web Cams in Solid Waste	03 Month	ULBs, Development	
	& C&D Waste Treatment & Disposal	of	Authorities & Urban	
	Facilities with open access to UPPCB &	functioning	Development	
	CPCB server connectivity	of the	Department	
	_	processing	•	
		plants		
7	Formulation of Action Plan for income	02 Months	ULBs, Development	The ULBs will ensure compliance as
	generation of Solid Waste & C&D Waste		Authorities & Urban	-
	Treatment & Disposal Facilities		Development	Action Plan (Appendix-8) as
	including installation of Solar Power		Department	informed by Urban Development
	Plants, Energy Plantation & sale of RDF,		1	Department, UP.
	compost etc.			Development Authorities will also
	compose etc.			ensure compliance in concerned
				areas.

S.No	Action Point	Timeline	Implementing	Remark
			Department/Agency	
8	Obtaining Consent to Operate/Establish	02 Months	ULBs, Development	
	and Authorization from UPPCB		Authorities, Urban	
			Development	
			Department & UPPCB	
			& CPCB	
9	Banning of use of POP & metal based	Immediate	ULB, Transport,	
	paints in manufacturing of idols &		District	
	transportation to Delhi		Administration,	
			Department of	
			Industries	
10	Sensitisation of Murtikars	Immediate	ULB, Department of	
			Industries, District	
			Magistrate & UPPCB	
11	Ensuring idol immersion in	Immediate	ULBs, Development	
	environmental friendly manner by		Authorities &District	
	creation of artificial ponds with proper		Administration	
	lining & proper disposal of sludge &			
	effluent			
12	Ensure strict prohibition of	06 Months	Development	
	encroachments & illegal constructions in		Authorities, District	
	FPZ		Administration	
			&Police and	
			Irrigation	
			Department	

S.No	Action Point	Timeline	Implementing	Remark
			Department/Agency	
13	Removal of solid waste & algal growth disposed in the river by use of low cost innovative techniques with involvement of local community.	06 Months	ULBs, Gram Panchayat, Development Authorities &Irrigation Department	
(b)	Long Term Action Point		Bepartment	
1	Establishment of new solid waste & C&D treatment & disposal facilities against the gap with respect to generation of solid waste	24 Months after sanction of DPR	ULBs, Development Authorities & Urban Development Department	The ULBs will ensure compliance as per timeline given according to the Action Plan (Appendix-8) as informed by Urban Development Department, UP. Development Authorities will also ensure compliance in concerned areas.
2	Treatment & disposal of legacy waste dumped within 500 meters of the bank of the River	24 Months after sanction of DPR	ULBs, Development Authorities & Urban Development Department	The ULBs will ensure compliance as per timeline given according to the Action Plan (Appendix-8) as informed by Urban Development Department, UP. Development Authorities will also ensure compliance in concerned areas.
3	Construction of electric/fuel efficient crematorium to stop disposal of unburnt/ semi burnt corpses in the river	24 Months	ULBs, Development Authorities & Urban Development	The ULBs will ensure compliance as per timeline given as informed by Urban Development Department, UP. Development Authorities will also

S.No	Action Point	Timeline	Implementing Department/Agency	Remark
-			Department Department	ensure compliance in concerned
			Department	ensure compliance in concerned areas.
4	Demarcation & notification of FPZ by	24 Months	Irrigation	Only after sanctioning of DPR & its
	introducing Pillars at suitable locations		Department	other formalities including
	in river flood plain and preventing		•	sanctioning of budget under NMCG.
	encroachment in river bed.			
5	Removal of illegal encroachments &	24 Months	District Level	
	constructions from FPZ		Committee headed by	
			D.M, with	
			representative from	
			concerned	
			Departments.	
D. ECC	OLOGICAL FLOW & GROUND WATER MA	NAGEMENT		
(a)	Short Term Action Point			
1	Identification, inventorization & geo	03 Months	State Wetland	
	referencing of wetlands/water bodies		Authority, Forest &	
	including their zone of influence &		Wildlife, Panchayati	
	catchment areas within 2 Km of the river		Raj, Revenue	
			Department, ULBs &	
			Gram Panchayats	
2	Identification & geo referencing of	03 Months	Forest & Wildlife,	
	vacant lands in the vicinity of the river		Panchayati Raj,	
	for development of bio-diversity parks &		Revenue Dept., ULBs	
	forest areas		& Gram Panchayat	

S.No	Action Point	Timeline	Implementing	Remark
•			Department/Agency	
3	Identification of external water sources	03 Months	Irrigation	Only surplus water after fulfilling
	like canal escapes etc. for addition of		Department	irrigation demands will be provided
	water in the river for dilution purposes			to nearby rivers through canal
				escapes.
4	Prohibition of illegal mining & diversion	Regular	District	Only diversion of river stream would
	of river stream	Activity	Administration,	be reported to District authorities in
			Mining Department &	non monsoon period by concerned
			Irrigation	district irrigation officers.
			Department	
5	Ensuring rain water	Regular	Mining, Rural	Possible funding may be arranged
	harvesting/recharging	Activity	Development &	through MNREGA and Central
	structures/Rainer wells on river banks		Minor Irrigation	assistance by NMCG.
	& construction of water harvesting		Department	
	structures			
(b)	Long Term Action Point			
1	Notification of E-flow of the River	12 Months	Irrigation	Notification of E-flow of the River will
			Department, MoWR (be done by MOWR (CWC).
			CWC)	
2	Ecological restoration of the wetlands	24 Months	State Wetland	Possible source of funding may be
	including plantation in the catchment	from	Authority, Forest &	from Centrally Sponsored Scheme for
	area & development of community	sanction of	Wildlife Department	Development of Wetlands and from
	based eco-tourism in the wetland	DPR	Tourism Department	-
			& National Mission	
			for Clean Ganga	
	I .	I	<u>I</u>	

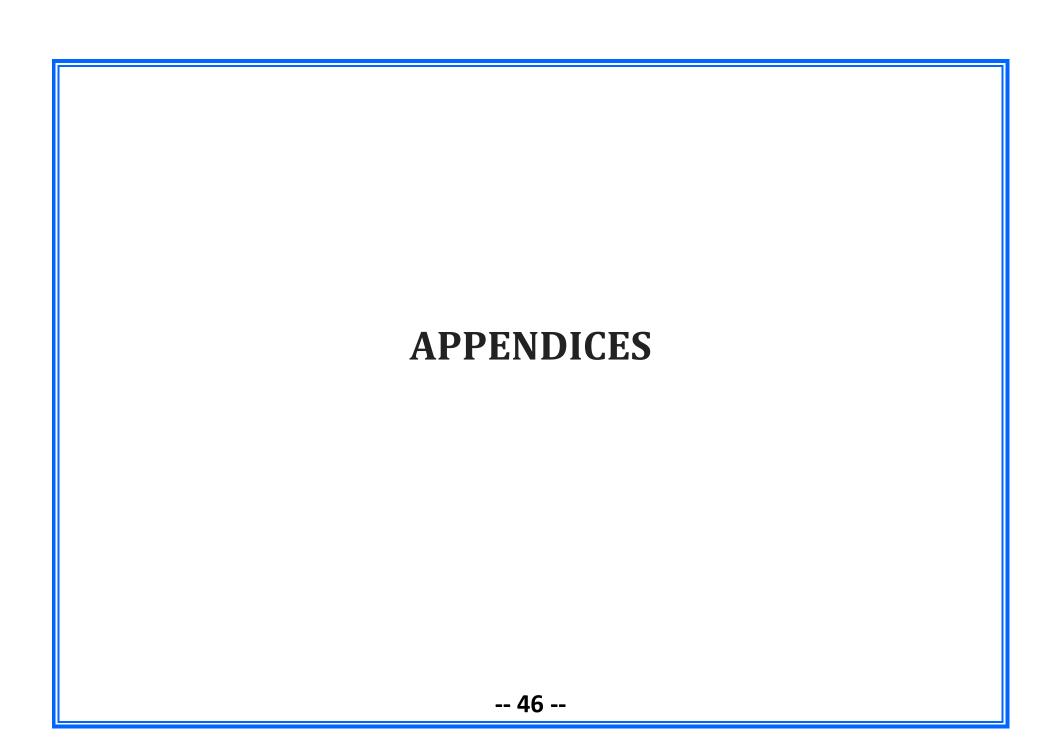
S.No	Action Point	Timeline	Implementing	Remark
			Department/Agency	
3	Development of Bio-diversity Parks and	24 Months	State Wetland	Funds may be arranged from NMCG.
	Riverine Forests by plantation & re-	from	Authority, Forest &	
	generation of native species of trees,	sanction of	Wildlife Department	
	grasses & herbs and establishment of	DPR	& National Mission	
	new nurseries		for Clean Ganga	
4	Adoption of good irrigation/Agriculture	12 Months	Agriculture	
	practices, suitable crop selection, use of		Department, Rural	
	sprinkler/drip irrigation to minimize the		Development, Minor	
	water consumption through awareness &		Irrigation	
	support to the farmers		Department	
5	Removal of encroachment from	24 Months	Revenue,	
	wetlands, ponds & their restoration		Administration,	
			Panchayati Raj	
			Department, ULBs &	
			Gram Panchayats	
6	Allowing flow of fresh surplus water	18 Months	Irrigation	Only surplus water after fulfilling
	source like canal for restoration of E-		Department	irrigation demands will be provided
	flow			to nearby rivers through canal
				escapes.
7	Recharge of dry Wells and Ponds	24 Months	Panchayati Raj	
			Department, ULBs &	
			Gram Panchayats	

E. MONITORING & EVALUATION

(a)Short Term Action Point

S.No	Action Point	Timeline	Implementing	Remark
	11001011 1 01110	1111011110	Department/Agency	Acomur is
1	Monthy Monitoring of river water quality	Regular	UPPCB, District	
	at the upstream & downstream of cities &	Activity	Ganga Committee/	
	meeting points of the major drains	_	District Environment	
	,		Committee	
2	Quarterly monitoring of drains, STPs &	Regular	UPPCB, District	
	CETPs	Activity	Ganga Committee/	
			District Environment	
			Committee	
3	Monitoring of water polluting industries	Quarterly	UPPCB, District	
			Ganga Committee/ District Environment	
			Committee	
4	Monitoring of ground water quality	Quarterly	UPPCB, CGWA, CPCB	
1	within 500 meters of the rivers & drains	Quarterly	& District Ganga	
	within 500 meters of the rivers & drains		Committee/ District	
			Environment	
			Committee	
5	Pre-monsoon & post-monsoon	Regular	CGWA & Directorate	
3	monitoring of ground water level	Activity	of Ground Water	
	monitoring of ground water level	Hecivity	or dround water	
6	Measurement of River flow as per the	Regular	Irrigation	Annual flow discharge data of river.
	protocol		Department &	
			District Ganga	
			Committee/ District	
			Environment	
			Committee	

S.No	Action Point	Timeline	Implementing	Remark
			Department/Agency	
7	Project formulation & funding including	02	UPPCB, District	
	recurring expenses for employment of	Months	Ganga Committee/	
	JRFs/Monitoring Assistants/Field		District Environment	
	Assistants, purchase of kits &		Committee, SMCG	
	equipments, vehicle on rental basis,		&NMCG	
	development of Web Portal &			
	establishment of Control Room, purchase			
	of desktop computers, printers/ LED			
	Monitor etc.			
8	Development of Web Portal for reporting	Regular	UPPCB, NMCG &	
	& centralized monitoring of water quality		СРСВ	
	of the river & drains and action points			
	with access to all concern stakeholders			
	departments/agencies responsible for			
	implementation of the action plan			
9	Establishment of Regional Control Rooms	04	UPPCB, District	
	at District/ Division Level for monitoring	Months	Ganga Committee/	
	& uploading of data related to monitoring		District Environment	
	of water quality & compliance of action		Committee	
	points with its integration to the State			
	Level Control Room			



APPENDIX-1

Pollution Source Mapping of River Tamsa from Ayodhya to Ballia

S.NO	District	Name of Drain	Meeting Point of Drain		Domestic/I ndustrial/ Mixed	Tapped/ Industries Untapped /Partially Tapped		Sewage T Discharg e (MLD)		Total	Status of Bar mesh	
			Latitude	Longitude			Number	Treated Effluent (MLD)	Treated	Untreated		
1	Ayodhya	Pachlo drain	26°44'7"N	81°43'54"E	Mixed	Untapped	1	0.8	0	4.6	5.4	No
2	Ayodhya	Nadaha drain	26°39'35.6.3 4"N	82°12'37.7"E	Mixed	Untapped	1	0.6	0	0.2	0.8	No
3	Ayodhya	Teliyagarh drain	26°34'12.0''	82°22'38.09"	Domestic	Untapped	0	0	0	1.4	1.4	No
4	Ambedkar Nagar	Sugar mill drain	26°28'30"N	82°24'49"E	Mixed	Untapped	1	1.5	0	0.5	2.0	No
5	Ambedkar Nagar	Horticulture drain	26°25'31''	82°31'31"	Domestic	Untapped	0	0	0	2.76	2.76	No
6	Ambedkar nagar	Chuna Bhatti drain	26°25'36''	82°32'0''	Domestic	Untapped	0	0	0	11.05	11.05	No
7	Ambedkar nagar	Shivala ghat drain	26°24'48''	82°32'44''	Domestic	Untapped	0	0	0	17.28	17.28	NO
8	Ambedkar nagar	Tamsa bridge drain	26°25'30.08"	82°31'30.73"	Domestic	Untapped						No
9	Ambedkar Nagar	Gadaya drain	26°25'5.41''	82°35'3.47''	Domestic	Untapped						No
10	Ambedkar nagar	Mehrotrapetro l pump drain	26°25'43.5''	82°32'2.95"	Domestic	Untapped			20			No
11	Ambedkar nagar	Sherauva Drain	26°18'56.41"	82°44'10.94"	Domestic	Untapped						No
12	Ambedkar nagar	Baba safrid drain	26°18'57.8''	82°44'9.01"	Domestic	Untapped						No

13	Ambedkar nagar	mohalla paschim drain	26°18'56.96"	82°44'25.14"	Domestic	Untapped		No
14	Ambedkar nagar	qazipura drain	26°18'57.78"	82°44'25.01"	Domestic	Untapped		No
15	Ambedkar nagar	usmapur drain	26°18'49.82"	82°44'54.92"	Domestic	Untapped		No
16	Azamgarh	Shiv Mandir Saray, Mandraj, Pallini Drain	26°04'11.47"	83°10'08.16"	Domestic	Untapped		No
17	Azamgarh	Jyoti Niketan School Drain	26°04'11.47"	83°10'22.98"	Mixed	Untapped	50.35	No
18	Azamgarh	Kolghat Drain	26°03'23.96"	83°10'27.55"	Domestic	Untapped		No
19	Azamgarh	Narauli U/S Drain	26°02'57.64"	83°10'39.40"	Domestic	Untapped		No
20	Azamgarh	Narauli D/S Drain	26°02'57.64"	83°10'41.37"	Domestic	Untapped		No
21	Azamgarh	Behind bypass raidarpur drain	26°03'17.54"	83°11'25.84"	Domestic	Untapped		No
22	Azamgarh	Near DAV Degree college Drain	26°03'33.10"	83°11'10.73"	Domestic	Untapped		No
23	Azamgarh	Before Kundanghat Bridge Drain	26°03'58.71"	83°11'20.05"	Domestic	Untapped		No
24	Azamgarh	Dalal ghat Jama Masjid Drain	26°04'08.98"	83°11'18.79"	Domestic	Untapped		No
25	Azamgarh	Dharmu Drain	26°04'12.18"	83°11'44.40"	Domestic	Untapped		No
26	Mau	Madari Drain	25°34'16.41"	83°21'19.08"	Domestic	Untapped	60.22	No
	<u> </u>	<u>I</u>	Total	<u>I</u>	1	1	171.26	

Details of Cities & Towns

SR. NO.	DISTRICT	CITY / TOWN	TYPE OF ULB	POPULATION (AS PER CENSUS 2011)	DECADAL GROWTH RATE	ESTIMATED POPULATION 2019
1	AYODHYA	RUDAULI	NAGAR PALIKA PARISHAD	4,64,250	18.29	532179
2	SULTANPUR	GOSAINGANJ	NAGAR PANCHAYAT	12,931	18.11	14804
3	AMBEDKAR NAGAR	AKBARPUR	NAGAR PALIKA PARISHAD	1,11,447	18.3	127763
4	AMBEDKAR NAGAR	JALALPUR	NAGAR PALIKA PARISHAD	31,972	18.3	36653
5	AZAMGARH	AZAMGARH	NAGAR PALIKA PARISHAD	1,10,983	17.11	126174
6	MAU	MOHAMMADABAD	NAGAR PALIKA PARISHAD	38,328	18.98	44148
7	MAU	MAUNATH BHANJAN	NAGAR PALIKA PARISHAD	2,78,745	18.98	321070
8	MAU	KURTHI JAFARPUR	NAGAR PALIKA PARISHAD	14,157	18.98	16307
9	BALLIA	CHITBARGAON	NAGAR PANCHAYAT	21,879	17.31	24909

Details of Industries

S. No.	District	Name and Address	Location		Туре	Treatment Mechanism(ETP/CETP)	Effluent Discharge (KLD)	Effluent Discharge Drain	Compliance Status (yes/No)
			Latitude (N)	Longitude(E)					
1	Ayodhya	KM Sugar Mills Ltd Distillery Div Motinagar ,Ayodhya	26°42'20.616''	82°07'46.203''	Distillery	ETP	ZLD	Nadaha/Tam sa	Yes
2	Ayodhya	KM Sugar Mills, Motinagar, Ayodhya	26°42'20.616''	82°07'46.203''	Sugar	ETP	640	Nadaha/Tam sa	Yes
3	Ayodhya	Rozagaon Sugar Mill, Rozagaon, Ayodhya	26°47'19.492''	81°41'22.785''	Sugar	ETP	800	Pachlo/Tams a	Yes
4	Ambedkar nagar	Akbarpur Chini Mills Ltd Ambedkar Nagar	26°44'41.299''	82°08'31.236''	Sugar	ETP	1000	Drain/Tamsa	Yes
5	Azamgarh	Kisan Sahakari chini mills Ltd.	26.01572	83.1733	Sugar	ETP	350	Tamsa	Yes
6	Mau	Kisan Sahakari chini mills Ltd. Ghosi	26.08299	83.31578	Sugar	ETP	220	Tamsa	Yes
7	Mau	Kisan Sahakari chini mills Ltd. Ghosi	26.08299	83.31578	Distillery	Self Closed	Self Closed	Self Closed	Self Closed

Appendix 3 A

GAP Analysis of Industries Situated in the Polluted Stretch of River Tamsa

Sl. No.	District	Name of Industry	Sector	Water Consumption (KLD)	Effluent Discharge (KLD)	Details of ETP	Gap Analysis	Remark
1	2	3	4	5	6	7	8	9
1	Ayodhya	KM Sugar Mills Ltd Distillery Div Motinagar ,Ayodhya	Distillery	500	ZLD	Storage Lagoon/MEE/Incineration Boiler	Phase wise Reduction of Fresh Water Consumptio n & other action points as Appendix - 3 B	
2	Ayodhya	KM Sugar Mills, Motinagar, Ayodhya	Sugar	800	640	Bar Screen, Oil & Grease Trap, Aeration Tank, Primary Clarifier, Secondary Clarifier, Carbon & Sand Filter, Sludge Drying Beds.	No Gap	Rs. 22.50 Lakh penalty for environmental compensation and Showcause issued dated- 07.02.2019
3	Ayodhya	Rozagaon Sugar Mill, Rozagaon, Ayodhya	Sugar	1000	800	Oil & Grease Trap, Equalization Tank, Aeration Tank, Primary Clarifier, Secondary Clarifier, Carbon & Sand Filter, Sludge Dring Beds.	No Gap	

4	Ambedkarn agar	Akbarpur Chini Mills Ltd Ambedkar Nagar	Sugar	1200	1000	Oil & Grease Trap, Equalization Tank, Aeration tank, Primary Clarifier, Secondary Clarifier, Parllel plate type settler, Chemical Dosing Tank, Reaction Tank, Corben & Sand Filter, Sludge Dring Beds.	No Gap	
5.	Azamgarh	Kisan Sahakari chini mills Ltd.	Sugar	900	450	Bar Screen,Oil & Grease Trap, Chemical Dosing Tank, Equalization Tank, Primery Clarifier, Aeration Tank, Nutrient Dosing Tank, Secondary Clarifier, Chlorination Tank, Dual Media Filter, Sludge Drying Beds	No Gap	
6.	Mau	Kisan Sahakari chini mills Ltd. Ghosi	Sugar	750	420	Oil & Grease Skimmer, Equalization Tank, Primery Clarifier, Aeration Tank, secondary Clarifier, Chlorination Tank, Multi Grade Filter, activated Carbon Filter, Sludge Drying Beds, Treated Effluent Tank	No Gap	
7.	Mau	Kisan Sahakari chini mills Ltd. Ghosi	Distillery	100	ZLD	Storage Lagoon/Bio- Composting	Self Closed	

Appendix 3B

Action Plan for Distillery & Fermentation Sector for Mitigation of Pollution to ensure ZLD

Sr.no.	GAP	Action Point	Time Line
1.	MEE condensate management	MEE condensate management through CPU	12 Months
2.	Mass flow meter at inlet & outlet	Installation of online mass flow meter at inlet & outlet of MEE & its connectivity to CPCB/UPPCB server	03 Months
3.	Restriction on spentwash storage capacity	Restriction on Spentwash storage capacity I. 01 Month in case of Biocompost II. 01 Week in case of incineration	03 Months
4.	Installation of web cam	Installation of PTZ cameras and connectivity	01 Month
5.	Ground water monitoring	Setting up of adequate no. of bore well and peizometers around the bio compost area for Ground water monitoring.	03 Months
6.	OCEMS on boilers.	Installation of OCEMS on boilers.	06 Months
7.	Implementation of notification regarding compost	Registration from Agriculture Department as per notification of compost & sale of bio- compost in bag packing	Immediate
8.	Safe storage of Molasses	Safe storage of Molasses as per CPCB guidelines.	Immediate

Details of Gram Panchayats & Revenue Villages on the banks of River

	VILLAGE SITUATED ALONG THE RIVER TAMSA LEFT BANK											
s.no.	DISTRICT	NAME OF VILLAGE	LAT	LONG	DISTAN CE	DECANDAL POPULATIO N (2011)	GROWT H RATE	ESTIMATE D POPULATI ON (2019)	SEWAGE GENERATI ON (MLD)	ESTIMAT ED SOLID WASTE(K G /DAY)		
1	AYODHYA	MAJNAWA	26°42'15.03"N	81°59'10.39 "E	0.18	4,419	18.3	5066	0.55	1266.49		
2	AYODHYA	BASAWAN	26°39'43.86"N	82° 4'37.77"E	0.2	239	18.3	274	0.03	68.50		
3	AYODHYA	MAHDAUNA KHAS	26°39'32.46"N	82° 4'15.10"E	0.06	6,666	18.3	7642	0.83	1910.48		
4	AYODHYA	BAHERPUR	26°35'41.90"N	82°16'43.94 "E	0.18	625	18.3	717	0.08	179.13		
5	AMBEDKAR NAGAR	MEDAVA	26°30'19.62"N	82°24'53.72 "E	0.2	650	18.3	745	0.08	186.29		
6	AMBEDKAR NAGAR	PRATAPPUR CHMURKHA	26°28'16.39"N	82°26'48.54 "E	0.28	2,150	18.3	2465	0.27	616.19		
7	AMBEDKAR NAGAR	KATVI	26°25'57.69"N	82°36'53.36 "E	0.11	4,157	18.3	4766	0.51	1191.40		
8	AMBEDKAR NAGAR	BANDIPUR	26°14'9.99"N	82°49'28.69 "E	0.12	4,597	18.3	5270	0.57	1317.50		

	9	AMBEDKAR NAGAR	FATTEPUR MO. PAKHANPUR	26°10'40.79"N	82°53'55.57 "E	0.02	1,594	18.3	1827	0.20	456.84
1	.0	AMBEDKAR NAGAR	PACHHIM PATTI	26° 8'15.42"N	82°55'44.60 "E	0.03	1,453	18.3	1666	0.18	416.43
1	.1	AMBEDKAR NAGAR	MUSLIM PATTI	26° 5'19.22"N	82°59'38.82 "E	0.13	549	18.3	629	0.07	157.34
1	.2	AMBEDKAR NAGAR	CHANDPUR KHALSA	26° 5'4.51"N	83° 0'36.13"E	0.19	1,231	18.3	1411	0.15	352.80
1	.3	AZAMGARH	GAUSPUR	26° 4'33.04"N	83° 1'54.72"E	0.2	1,012	17.1	1150	0.12	287.61
1	.4	AZAMGARH	CHUNHATA	26° 2'55.45"N	83° 7'21.62"E	0.1	718	17.1	816	0.09	204.06
1	.5	AZAMGARH	CHHATTERPUR	26° 4'53.59"N	83° 9'26.14"E	0.15	513	17.1	583	0.06	145.79
1	.6	AZAMGARH	BADDOPUR	26° 3'44.73"N	83°12'40.12 "E	0.17	3,724	17.1	4233	0.46	1058.36
1	.7	AZAMGARH	BALIYA KALYANPUR	26° 6'44.37"N	83°15'19.47 "E	0.19	2,206	17.1	2508	0.27	626.95
1	.8	AZAMGARH	BERMA	26° 7'13.63"N	83°18'35.13 "E	0.14	3,973	17.1	4517	0.49	1129.13
1	.9	AZAMGARH	USARI MAFI	26° 4'20.96"N	83°21'27.34 "E	0.11	111	17.1	126	0.01	31.55
2	20	MAU	MANDAHA	26° 3'19.41"N	83°22'24.97 "E	0.13	2,467	18.9	2840	0.31	710.00
	1	MAU	CHMARAHI	26° 2'14.16"N	83°24'39.40	0.24	183	18.9	211	0.02	52.67

			<u> </u>	"E	<u> </u>	<u> </u>	<u> </u>	<u> </u>		
22	MAU	AKAUNA	26° 0'36.22"N	83°29'18.95 "E	0.16	2,263	18.9	2605	0.28	651.29
23	MAU	KOTWA KORPA	26° 0'37.96"N	83°29'57.87 "E	0.14	1,391	18.9	1601	0.17	400.33
24	MAU	KURTHI JAFARPUR	26° 0'45.36"N	83°30'17.65 "E	0.07	14,157	18.9	16298	1.76	4074.38
25	MAU	BHARKUNDL	25°57'25.30"N	83°34'29.91 "E	0.14	32	18.9	37	0.00	9.21
26	GHAZIPUR	SIURA	25°53'5.24"N	83°38'52.12 "E	0.27	3,149	19.2	3633	0.39	908.17
27	GHAZIPUR	CHAK KHODAI	25°52'40.98"N	83°39'41.70 "E	0.2	480	19.2	554	0.06	138.43
28	BALLIA	ATARSUWAKA LA	25°51'7.87"N	83°45'9.01" E	0.2	995	16.73	1128	0.12	282.04
29	BALLIA	CHANDPUR	25°49'20.60"N	83°46'19.31 "E	0.15	922	16.73	1045	0.11	261.35
30	BALLIA	AMGHAT	25°47'39.06"N	83°48'53.60 "E	0.12	1,337	16.73	1516	0.16	378.99
31	BALLIA	KOTHWA	25°47'34.24"N	83°50'35.59 "E	0.15	134	16.73	152	0.02	37.98
32	BALLIA	TIKA DEWARI	25°47'2.07"N	83°53'26.14 "E	0.22	5,165	16.73	5856	0.63	1464.07

33	BALLIA	NAGPURA	25°46'41.27"N	83°54'2.06" E	0.15	5,797	16.73	6573	0.71	1643.22
34	BALLIA	KODRA	25°45'46.85"N	83°55'3.59" E	0.13	2,235	16.73	2534	0.27	633.53
35	BALLIA	CHERUIA	25°44'41.71"N	84° 3'25.16"E	0.07	2,530	16.73	2869	0.31	717.15
36	BALLIA	GANGAHARA	25°44'45.73"N	84° 4'15.21"E	0.22	1,609	16.73	1824	0.20	456.09
TOTAL						85,433		97687	10.55	24421.73

	VILLAGE SITUATED ALONG THE RIVER TAMSA RIGHT BANK												
S.NO.	DISTRICT	NAME OF VILLAGE	LAT	LONG	DECANDAL POPULATION (2011)	Growth rate	Population (2019)	Sewage Generation (MLD)	Estimated Solid Waste(kg/day)				
1	Ayodhya	Purain	26°45'24.73"N	81°42'13.52"E	4396	18.3	5040	0.54	1259.89				
2	Ayodhya	Madarpur	26°45'3.74"N	81°42'37.27"E	569	18.3	652	0.07	163.08				
3	Ayodhya	Bhadawal	26°44'46.05"N	81°43'7.26"E	857	18.3	982	0.11	245.62				
4	Ayodhya	Firozpur Makhdoomi	26°42'24.83"N	81°45'13.43"E	5137	18.3	5889	0.64	1472.26				
5	Ayodhya	Mangi	26°41'55.45"N	81°50'33.90"E	3280	18.3	3760	0.41	940.05				
6	Ayodhya	Ibrahimpur	26°42'17.22"N	81°54'51.97"E	1414	18.3	1621	0.18	405.25				
7	Ayodhya	Bodepur	26°41'41.68"N	81°56'3.28"E	1321	18.3	1514	0.16	378.60				
8	Ayodhya	Agethua	26°41'56.84"N	81°58'7.71"E	1227	18.3	1407	0.15	351.66				

9	Ayodhya	Gothwara	26°42'1.29"N	81°59'27.10"E	3154	18.3	3616	0.39	903.94
10	Ayodhya	Mahdauna Khas	26°40'20.48"N	82° 3'21.54"E	6666	18.3	7642	0.83	1910.48
11	Ayodhya	Rampurwa	26°38'9.60"N	82° 4'34.44"E	869	18.3	996	0.11	249.06
12	Ayodhya	Chandipur Nagarha	26°37'47.08"N	82° 4'51.27"E	597	18.3	684	0.07	171.10
13	Ayodhya	Bargoda	26°38'8.10"N	82° 6'7.89"E	526	18.3	603	0.07	150.75
14	Ayodhya	Sarai Sura	26°37'30.92"N	82° 8'10.44"E	468	18.3	537	0.06	134.13
15	Ayodhya	Pipri	26°38'14.22"N	82° 8'43.17"E	2010	18.3	2304	0.25	576.07
16	Ayodhya	Bibipur	26°38'43.25"N	82° 9'23.14"E	1226	18.3	1405	0.15	351.37
17	Ayodhya	Islampur	26°37'36.55"N	82°13'53.55"E	399	18.3	457	0.05	114.35
18	Ayodhya	Parmanandpur	26°35'50.56"N	82°15'22.13"E	195	18.3	224	0.02	55.89
19	Ayodhya	Devriranjitsingh	26°34'44.91"N	82°20'1.92"E	339	18.3	389	0.04	97.16
20	Ambedkar Nagar	Rajpal Dharuva	26°34'22.30"N	82°21'51.38"E	89	18.3	102	0.01	25.51
21	Ambedkar Nagar	Jajora	26°30'3.99"N	82°23'11.12"E	80	18.3	92	0.01	22.93
22	Ambedkar Nagar	Kajepur	26°30'6.96"N	82°24'10.91"E	151	18.3	173	0.02	43.28
23	Ambedkar Nagar	Mizoda	26°29'28.69"N	82°24'52.52"E	3626	18.3	4157	0.45	1039.21
24	Ambedkar Nagar	Vahorik Pur	26°27'52.94"N	82°25'22.72"E	765	18.3	877	0.09	219.25
25	Ambedkar Nagar	Baijpur	26°26'49.28"N	82°27'34.51"E	1642	18.3	1882	0.20	470.60
26	Ambedkar Nagar	Kizir Pur	26°26'34.68"N	82°29'12.74"E	462	18.3	530	0.06	132.41

27	Ambedkar Nagar	Kasaruwa	26°25'37.11"N	82°30'3.14"E	2547	18.3	2920	0.32	729.97
28	Ambedkar Nagar	Mirjapur	26°25'29.05"N	82°31'1.33"E	278	18.3	319	0.03	79.67
29	Ambedkar Nagar	Daudpur	26°24'25.33"N	82°40'12.76"E	838	18.3	961	0.10	240.17
30	Ambedkar Nagar	Meerapur	26°20'23.25"N	82°43'4.41"E	1021	18.3	1170	0.13	292.62
31	Ambedkar Nagar	Jalalpur Dehat	26°18'37.99"N	82°46'19.19"E		18.3	0	0.00	0.00
32	Ambedkar Nagar	Nasopur	26°17'21.01"N	82°46'26.00"E	835	18.3	957	0.10	239.31
33	Ambedkar Nagar	Kotwa	26°16'25.44"N	82°46'18.87"E	542	18.3	621	0.07	155.34
34	Ambedkar Nagar	Budroddinpur	26°16'27.33"N	82°47'4.67"E	651	18.3	746	0.08	186.58
35	Ambedkar Nagar	Tikri	26°13'52.12"N	82°49'4.65"E	1632	18.3	1871	0.20	467.73
36	Ambedkar Nagar	Rundooli	26°12'14.04"N	82°49'46.97"E	916	18.3	1050	0.11	262.53
37	Ambedkar Nagar	Bichhila	26°11'54.39"N	82°50'19.13"E	665	18.3	762	0.08	190.59
38	Ambedkar Nagar	Kharo Shesh Patti	26°10'57.41"N	82°51'35.36"E	162	18.3	186	0.02	46.43
39	Azamgarh	Hansapur	26° 4'30.31"N	83° 8'30.64"E	1336	17.1	1519	0.16	379.69
40	Azamgarh	Ikrampur	26° 3'45.45"N	83° 9'42.81"E	1622	17.1	1844	0.20	460.97
41	Azamgarh	Diliya	26° 6'49.91"N	83°18'44.01"E	2267	17.1	2577	0.28	644.28
42	Azamgarh	Oghauli	26° 5'28.75"N	83°20'21.70"E	5439	17.1	6183	0.67	1545.76

43	Mau	Sonjan	26° 0'27.57"N	83°28'6.67"E	324	18.9	373	0.04	93.25
44	Mau	Baijapur	25°59'46.98"N	83°31'19.03"E	2610	18.9	3005	0.32	751.16
45	Mau	Chakiya	25°56'18.44"N	83°36'19.07"E	180	18.9	207	0.02	51.80
46	Mau	Sarwan	25°55'20.66"N	83°37'21.47"E	774	18.9	891	0.10	222.76
47	Mau	Nasiratpur	25°52'8.89"N	83°40'15.04"E		18.9	0	0.00	0.00
48	Ghazipur	Kusum	25°50'3.59"N	83°44'49.36"E	97	19.2	112	0.01	27.97
49	Ghazipur	Bhikampur Amhat	25°47'6.13"N	83°49'22.27"E	1039	19.2	1199	0.13	299.65
50	Ballia	Rampur Chit	25°43'39.92"N	84° 2'36.34"E	7213	16.73	8178	0.88	2044.60
	Total				74453		85187	9.20	21296.70

WET LANDS / WATER BODIES ALONG THE RIVER TAMSA

S.	NAME OF	NAME OF NEARBY VILLAGE	LATITUDE	LONGITUDE	DISTANCE FROM	LOCATION OF WETLAND	
No.	DISTRICT		2.1111022	2011011022	RIVER (KM)	LEFT BANK	RIGHT BANK
1.	AYODHYA	JARAYAL KHURD W	26°46'47.99"N	81°41'50.64"E	0.74	Y	
2	AYODHYA	MATALI W	26°46'42.76"N	81°42'19.97"E	0.39	Y	
3	AYODHYA	PURAIN W	26°46'14.28"N	81°42'9.38"E	0.44		Y
4	AYODHYA	SARETHA W	26°46'4.08"N	81°42'47.76"E	0.66	Y	
5	AYODHYA	NEWAJPUR W	26°44'41.88"N	81°44'30.91"E	0.82	Y	
6	AYODHYA	NEWAJPUR W1	26°45'7.82"N	81°44'24.44"E	1.63	Y	
7	AYODHYA	SULEMPUR W	26°44'40.73"N	81°45'22.46"E	1.68	Y	
8	AYODHYA	MOHAMMAD PUR W	26°44'18.37"N	81°45'36.65"E	1.80	Y	
9	AYODHYA	PAKRIYA GAON W	26°43'16.14"N	81°43'19.27"E	1.97		Y
10	AYODHYA	AMATHA W	26°41'56.10"N	81°46'31.93"E	0.94	Y	

S.	NAME OF	NAME OF NEARBY VILLAGE	LATITUDE LONGITUDE FROM			CATION OF VETLAND	
No.	DISTRICT				RIVER (KM)	LEFT BANK	RIGHT BANK
11	AYODHYA	BARAWA W	26°41'10.64"N	81°45'43.29"E	1.16		Y
12	AYODHYA	TANDWA W	26°40'32.23"N	81°47'40.36"E	0.38		Y
13	AYODHYA	ORWA W	26°40'46.59"N	81°48′52.10″E	0.29		Y
14	AYODHYA	PIRKHAULI W	26°42'51.83"N	81°51'29.46"E	0.51	Y	
15	AYODHYA	MANGI W	26°42'2.58"N	81°52'4.89"E	1.11		Y
16	AYODHYA	RAMSARANDASPUR W	26°43'50.45"N	81°52'4.77"E	2.19	Y	
17	AYODHYA	KANDAI KALA W	26°41'54.36"N	81°53'52.87"E	0.77		Y
18	AYODHYA	DAKHIN PARA W	26°43'12.56"N	81°54'27.50"E	1.24	Y	
19	AYODHYA	SHIVDASPUR GRANT W	26°41'30.30"N	81°55'47.75"E	0.41	Y	
20	AYODHYA	BHARAT KHURD W	26°38'53.96"N	82° 8'6.65"E	1.31	Y	
21	AYODHYA	RAJAURA W	26°35'14.81"N	82°19'0.17"E	0.56		Y
22	AYODHYA	YADAVPUR W	26°33'50.72"N	82°23'10.13"E	0.99	Y	
23	AMBEDKAR NAGAR	KATVI W	26°25'32.63"N	82°38'23.12"E	0.61		Y
24	AMBEDKAR NAGAR	JALALPUR W	26°18'42.31"N	82°44'29.13"E	0.61		Y
25	AMBEDKAR	NAGPUR TALAB W	26°18'1.10"N	82°45'36.79"E	0.88		Y

S.	S. NAME OF VILLAGE LATITUDE LONGITUDE	_	LATITUDE	LONGITUDE	DISTANCE FROM	LOCATION OF WETLAND	
NO.			RIVER (KM)	LEFT BANK	RIGHT BANK		
	NAGAR						
26	MAU	SALAHABAD W	26° 2'18.86"N	83°22'13.36"E	0.86		Y
27	GHAZIPUR	TANDWA W	25°50'44.49"N	83°41'57.74"E	1.88	Y	
28	BALIA	MARIHI W	25°47'15.54"N	83°56'44.93"E	0.87	Y	
29	BALIA	SAHDESH W	25°47'37.85"N	83°57'31.19"E	1.67		Y
30	BALIA	KOPWA W	25°46'46.59"N	83°59'30.96"E	1.20	Y	

Status of E-Waste Management

Status of E-waste Recycling / Collection /Dismantling Units in the State of U.P.

S. No.	Name & Address of Unit	Regional Office	Status of Authorisation	Status of Registration & Validity	Туре	Capacity (T/Annum)
1	M/s Auctus -E Recycling Solutions Pvt. Ltd., F-637, M.G. Road, Industrial Area, Ghaziabad.	Ghaziabad	Grant	Registered 30.08.2019	Collection, Dismantle	1800
2	M/s Mahaluxmi Metal Alloys (India) Pvt. Ltd., Modinagar, Ghaziabad.	Ghaziabad	Grant	Registered 22.05.2023	Collection, Dismantle, Recyclers	30000
3	M/s N.K. Products, 58-59, M.G. Road, Ghaziabad.	Ghaziabad	Refused	Registered 22.06.2016	Collection, Dismantle	9000
4	M/s Bharat Oil Co., E-18, Site-IV, Sahibabad, Industrial Area, Ghaziabad.	Ghaziabad	Grant	Registered 16-05- 18	Collection, Dismantle	4000
5	M/s Planet Green Recycling Pvt. Ltd., G-129, Phase -1, M.G. Road, Ghaziabad.	Ghaziabad	Grant	Registered 23.08.2018	Collection, Dismantle, Recyclers	1500
6	M/s Rocket Sales, Plot No. 1-12, I/A, M.G. Raod, Hapur.	Ghaziabad	Grant	Registered 27.08.2019	Collection,, Dismantle	300
7	M/s Arsh Recycling Pvt. Ltd., Plot No. 203, UPSDIC, I/A, M.G. Road, Ghaziabad.	Ghaziabad	Grant	Registered 20.06.2023	Collection, Dismantle, Recycling,	15000
8	M/s Auctus Recycling Solutions Pvt. Ltd.Habibpur, Greater Noida.	Greater Noida	Grant	Registered 06.12.2021	Dismantle, Collection	19500
9	M/s Khan Traders, B-5, site4, Panki Industrial Area, Kanpur.	Kanpur	Grant	Registered 15-11- 2020	Collection, Dismantle	7190
10	M/s Green Tech Recycling, Khasra No645, Acchraunds, Bahadurpur Road, Partapur, Meerut .	Meerut	Grant	Registered 12.01.2022	Collection, Dismantle	1800
11	M/s Narora Atomic Power Station, Narora, Bulandshahar.	Bulandshahar	Not Applied	-	Collection' Dismantling & Recycling	10

12	M/s Metal Alloys, E-46, Industrial Area, Ramnagar, Varanasi	Varanasi	Grant	Registered 31-05- 2019	Collection	1825
13	M/s Comwen Information Technologies Pvt.Ltd., 127/35B, ChakRagunath, Naini, Allahabad.	Allahabad	Grant	Registered 11-08- 2017	Collection	300
14	M/s Dasia ECo E-Waste Recyclers E-160 Industrial areas, Khalilabad, SantKabairnagar.	Basti	Grant	Registered 31-12- 2017	Collection, Dismantling	720
15	M/s Sims Recycling Solutions Plot no.1 Udyog KendraII Ecotech-III Greater Noida.	Greater Noida	Grant	Registered 31.12.2019	Collection, Dismantle, Recycling	1250
16	M/s J.A.O. E-Waste Recycling Co, Vill- Jaitpur,Distt-Moradabad.	Moradabad	Grant	Registered 23.11.2020	Collection	3001
17	M/s HIN Green E-waste Recycling (P) Ltd, B-19/1, Summer Garden Colony, Meerut.	Meerut	Grant	Registered 12.04.2018	Collection, Dismantle,	750
18	M/s S.R. Metcast India (P) Ltd 11.8 Km.Agra Mathura Road, Agra.	Agra	Grant	Registered 02.08.2022	Collection	600
19	M/s K.M. Metals Suppliers 9/270,271,Mathura Agra.	Agra	Not Applied	-	Collection	5000
20	M/s Prakash Metal House 39/223, Karwan Lohamandi,Agra.	Agra	Grant	Registered 02.05.2023	Collection	1500
21	M/s Shree MahaveerJi Trading Company, 30/127, Chippitala, Agra.	Agra	Not Applied	Reject	Collection	4500
22	M/s E-Waste Recyclers India E-50, UPSIDC Industrial area, NH-2 Kosikalan, Mahura.	Mathura	Grant	Registered 01.03.2022	Collection, Dismantle	6000
23	M/s Supar Trading Company, Plot No3 Govt. Industrial Estate, Talkatora Road, Lucknow.	Lucknow	Not Applied	Registered 03.04.2016	Collection	365
24	M/s V.R. Techno Enviro Services pvt. Ltd. khasra No. 440, indira Priyedarshni ward, jarhra Indira Nagar, Lucknow.	Lucknow	Not Applied	Registered 09.04.2016	Collection, Dismantle	365
25	M/s Sachin enterprises,84/1,Plot no.34-35 Fazalganj, Kanpur.	Kanpur	Grant	Registered One Time	Collection	5000 Pieces Per Annum

26	M/ C II: m 1 04/402	17	<u> </u>	D 1	0.11	F000 P:
26	M/s Gandhi Traders, 91/103, Dalelpurwa, Kanpur.	Kanpur	Grant	Registered 04.06.2018	Collection	5000 Pieces Per
	Daleipui wa, Kalipui.			04.00.2010		Annum
27	M/s Greezon Recycling Pvt. Ltd., R 30, UPSIDC,	Bulandshaha	Grant	Registered	Collection	16.5
	Industrial Area, Sikandrabad, Bulandshahar.	Balanashana	Grant	27.08.2022	Dismantle,	10.5
					Recycling	
28	M/s Sachin Enterprises, 123/751, block-T 74	Kanpur	Grant	Registered	Collection,	2500
	pratapganj Gadariyan Purwa, Fazalgang,	•		16.11.2022	Dismantling,	
	Kanpur.				Refurbishing	
29	M/s Greeniva Recycler Pvt. Ltd., Plot No. G-	Hapur	Grant	Registered	Collection,	1500
	284, M.G. Road,			18.06.2019	Dismantling,	
	Industrial Area, Hapur.				Recycling.	
30	M/s S. Malik Traders, Plot No93, 94 Vill-	Meerut	Grant	Registered	Collection,	365
	Budhera Jahidpur, Meerut.			12.01.2022	Dismantling	
31	M/s Royal Faiz Recycling (p) Ltd.	Ghaziabad	Grant	Registered	Collection,	12000
	, I-22, I.A. M.G. Road, Hapur.			29.01.2023	Dismantle,	
					Recycling	
32	M/s 3 C Recycler, F-326, I/A, M.G. Road, Hapur.	Ghaziabad	Grant	Registered	Collection,	9000
				31.12.2022	Dismantle,	
					Recycling	
33	M/s Life E- Recycling (P) Ltd., F- 435, UPSIDC	Ghaziabad	Grant	Registered	Collection,	9000
	I/A, M.G. Road,			05.06.2023	Dismantle,	
	Hapur.					
34	M/s Hind Recycling (P) Ltd., Plot No. F-203,	Ghaziabad	Grant	Registered	Collection,	9000
	M.G. Road, Hapur.			01.03.2022	Dismantle,	
35	M/s Hayat Recycler, F-53, 54, I/A,	Ghaziabad	Grant	Registered	Collection,	15000
	M.G. Road, Hapur.			21.06.2023	Dismantle,	
2.6	M/ PPP/ 6 - 1 P/	**	2	D 1 . 1	Recycling	2222
36	M/s B.R.P. Infotech Private Limited, F-394,	Hapur	Grant	Registered	Recycling,	9000
	Phase-I, M.G.Road, Industrial Area, Hapur			28.06.2023	Dismantling,	MT/Year
					Segregation, Collection	
					Collection	
37	M/s Sky Green Waste Recycling	Meerut	Grant	Registered	Dismantling,	5475
	Management , Khasra No 174, Alipur Jijmana,			20.12.2023	Recycling	MT/Y
	Meerut, U.P.					4500 MT/A

38	M/s Swachh Bharat Recycling Company, Gali- N0-4, 2083, Saipuram Industrial Area, Delhi Road, Meerut, U.P.	Meerut	Grant	Registered 08.05.2023	Recycling	4800 MT/A
39	M/s Rudra Enterprises, Plot No. A- 96, Sector-A-4, Tronica City, Loni, Ghaziabad	Ghaziabad	Grant	Registered 03.05.2023	Disposal & Dismantling	500 MT/Month
40	M/s Avgree Recycling Pvt. Ltd. KH No. 549, VillTiyala, Meerut- Bulandshahar Road, Hapur Bypass, Hapur	Ghaziabad	Grant	Registered 10.09.2023	Dismantling & Segregation	11000 MT/A
41	M/s Faiz Recycling, G-235, MG Road, Industrial Area, Hapur	Ghaziabad	Grant	Registered 13.02.2024	Dismantling & Segregation	36.67 MT/Day
42	M/s Horizon Recycling Pvt. Ltd., Khasra no35, Kumarhera, 7th km Dehradun Road, Saharanpur, U.P.	Saharanpur	Grant	Registered 02.08.2022	Recycling, Dismantling, Segregation, Collection	12000 MT/A
43	M/s Golden Ewaste Recyclers Pvt. Ltd., Plot No 12A, Gagol Road, Behind Sophia School Udyog Puram, Partapur, Meerut	Meerut	Grant	Registered 01.04.2024	Transportation, Refurbishing, Dismantling, Segregation, Storage, Disposal	9600 MT/A

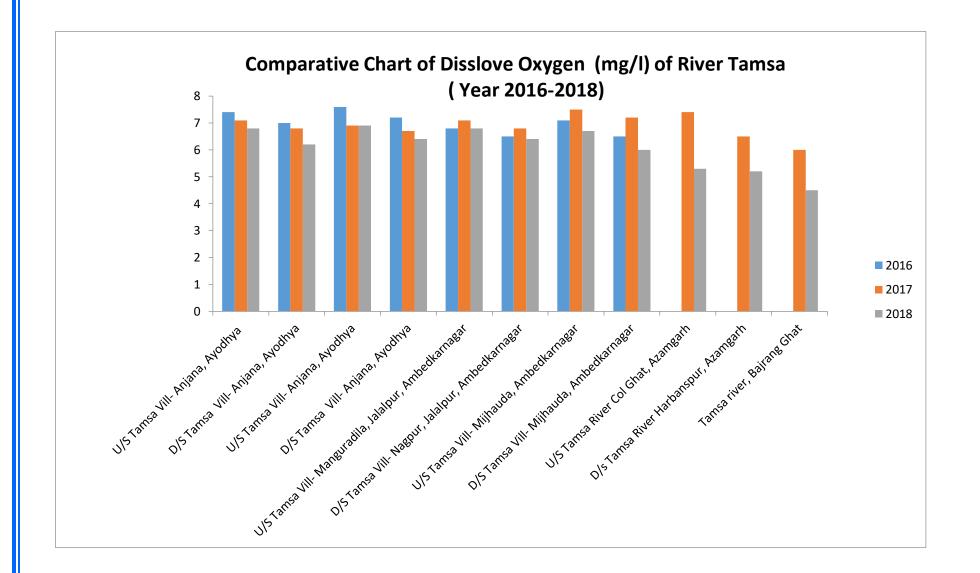
River Water Quality Data Water Quality of River Tamsa in UP

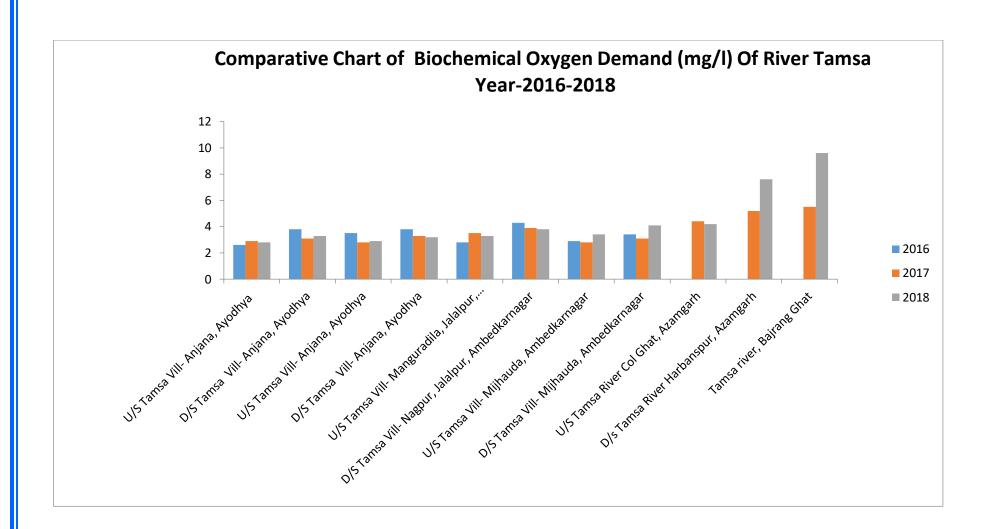
Year 2016-2018

		2	016	2010 2	2017	20	18
S No	Sample Collection Point	D0 (mg/l)	B0D(mg/l)	D0 (mg/l)	BOD(mg/l)	D0 (mg/l)	BOD(mg/l)
1	U/S Tamsa Vill- Anjana, Ayodhya	7.4	2.6	7.1	2.9	6.8	2.8
2	D/S Tamsa Vill- Anjana, Ayodhya	7.0	3.8	6.8	3.1	6.2	3.3
3	U/S Tamsa Vill- Anjana, Ayodhya	7.6	3.5	6.9	2.8	6.9	2.9
4	D/S Tamsa Vill- Anjana, Ayodhya	7.2	3.8	6.7	3.3	6.4	3.2
5	U/S Tamsa Vill- Manguradila, Jalalpur, Ambedkarnagar	6.8	2.8	7.1	3.5	6.8	3.3
6	D/S Tamsa Vill- Nagpur, Jalalpur,	6.5	4.3	6.8	3.9	6.4	3.8

			016		2017	20	18
S No	Sample Collection Point	D0 (mg/l)	BOD(mg/l)	DO (mg/l)	BOD(mg/l)	D0 (mg/l)	BOD(mg/l)
	Ambedkarnagar						
7	U/S Tamsa Vill- Mijhauda, Ambedkarnagar	7.1	2.9	7.5	2.8	6.7	3.4
8	D/S Tamsa Vill- Mijhauda, Ambedkarnagar	6.5	3.4	7.2	3.1	6.0	4.1
9	U/S Tamsa River Col Ghat, Azamgarh	-	-	7.4	4.4	5.3	4.2
10	D/s Tamsa River Harbanspur, Azamgarh	-	-	6.5	5.2	5.2	7.6
11	Tamsa river, Bajrang Ghat	-	-	6.0	5.5	4.5	9.6

As per Water Quality Monitoring Data of River Tamsa for the year 2017-18, water quality in the identified polluted stretch of river (i.e.Ayodhya to Ballia) falls in the Class- D as per water quality criteria of Central Pollution Control Board. River Water is fit for propagation of Wild Life and Fisheries.





Classification	TYPE OF USE
ClassA	Drinking water source without conventional treatment but after disinfection
Class B	Outdoor bathing
Class C	Drinking water source with conventional treatment followed by disinfection.
Class D	Fish culture and wild life propagation
Class E	Irrigation, industrial cooling or controlled waste disposal

TOLERANCE LIMITS

TABLE-1: TOLERANCE LIMITS FOR INLAND SURFACE WATERS, CLASS - A

S. No.	Characteristic	Tolerance
(1)	(2)	(3)
(i)	pH	6.5 to 8.5
(ii)	Dissolved Oxygen, mg/l,	6.0
(iii)	Bio-chemical Oxygen Demand	2.0
(iv)	Total Coliform Organisms, MPN/100 ml, Max	50
(v)	Colour, Hazen units, Max	10
(vi)	Odour	unobjectionable
(vii)	Taste	Agreeable taste
(Viii)	Total Dissolved Solids, mg/l, Max	500
(ix)	Total Hardness (as CaCO ₃), mg/l ,Max	300
(X)	Calcium Hardness (as CaCO ₃), mg/l, Max	200
(xi)	Magnesium (as CaCO ₃), mg/1,Max	100
(Xii)	Copper (as Cu), mg/l, Max	1.5
(Xiii)	Iron (as Fe), mg/l,Max	0.3
(xiv)	Manganese (as Mn), mg/1,Max	0.5
(XV)	Chlorides (as CI), mg/l,Max	250
(xvi)	Sulphate (as SO ₄), mg/l ,Max	400
(XVII)	Nitrates (as NO ₂), mg/1,Max	20
(XVIII)	Fluorides (as F,) mg/l,Max	1.5
(XiX)	Phenolic compounds(as C ₆ H ₅ OH), mg/l,Max	0.002
(XX)	Mercury (as Hg), mg/l ,Max	0.001
(XXI)	Cadmium (as Cd), mg/1,Max	0.01
(XXII)	Selenium (as Se), mg/l ,Max	0.01
(XXIII)	Arsenic (as As), mg/1,Max	0.05
(xxiv)	Cyanides (as CN), mg/l, Max	0.05
(XXV)	Lead (as Pb), mg/l, Max	0.1
(xxvi)	Zinc (as Zn), mg/l, Max	15
(XXVII)	Chromium (asCr ⁸⁺), mg/l,Max	0.05
(XXVIII)	Anionic detergents, (as MBAS), mg/l ,Max .	0.2
(XXIX)	Poly-nuclear aromatic hydrocarbons (PAH),	0.2
(XXX)	Mineral oil, mg/l ,Max	0.01
(XXXI)	Barium (as Ba), mg/l ,Max	1.0
(XXXII)	Silver (as Ag), mg/l Max	0.05
(XXXIII)	Pesticides	Absent
(XXXIV)	Alpha emitters, µc/ml, Max	10 ⁻⁹
(XXXV)	Beta emitters, µc/ml, Max	10 ⁻⁸

TABLE- 2: TOLERANCE LIMITS FOR INLAND SURFACE WATERS, CLASS – B

S.	Characteristic	Tolerance Limit
(1)	(2)	(3)
(i)	pH Value	6.5 to 8.5
(ii)	Dissolved Oxygen, mg/1,Max	5.0
(iii)	Biochemical Oxygen Demand (5 days at 20 °C),	3.0
(iv)	Total Coliform Organisms, MPN/100 ml, Max	500
(v)	Fluorides (as F) <mg l,="" max<="" td=""><td>1.5</td></mg>	1.5
(vi)	Colour, Hazen units, Max	300
(vii)	Cyanides (as CN), mg/l, Max	0.05
(viii)	Arsenic (as As), mg/l, Max	0.2
(ix)	Phenolic Compounds (as C ₆ H ₅ OH) mg/l, Max	0.005
(x)	Chromium (as Cr ⁶⁺), mg/l, Max	1.0
(xi)	Anionic detergents (as MBAS), mg/l, Max	1.0
(xii)	Alpha emitters, µc/ml, Max	10 ⁻⁸

TABLE - 3: TOLERANCE LIMITS FOR INLAND SURFACE WATERS, CLASS - C

S.No.	Characteristic	Tolerance Limit
(1)	(2)	(3)
(i)	pH √alue	6.5 to 8.5
(ii)	Dissolved Oxygen, mg/l Minimum	4.0
(iii)	Biochemical Oxygen Demand	3.0
(iv)	Total coliform organisms, MPN/100 ml, Max	5000
(v)	Colour, Hazen units, Max	300
(vi)	Fluorides (as F), mg/l ,Max	1.5
(vii)	Cadmium (as Cd), mg/l, Max	0.01
(viii)	Chlorides (as CI), mg/l, Max	600
(ix)	Chromium (as Cr ⁶⁺), mg/l, Max	0.05
(x)	Cyanides (as CN), mg/l, Max	0.05
(xi)	Total Dissolved Solids, mg/l, Max	1500
(xii)	Selenium (as Se), mg/l, Max	0.05
(xiii)	Sulphates (as SO ₄), mg/l, Max	400
(xiv)	Lead (as Pb), mg/l, Max	0.1
(XV)	Copper (as Cu),mg/l,Max	1.5
(xvi)	Arsenic (as As), mg/l, Max	0.2
(xvii)	Iron (as Fe), mg/l, Max	50
(xviii)	Phenolic compounds (as C ₆ H ₅ OH), mg/l,	0.005
(xix)	Zinc (as Zn), mg/l, Max	15
(xx)	Insecticides, mg/l, Max	Absent
(xxi)	Anionic detergents (as MBAS), mg/l, Max	1.0
(xxii)	Oils and grease, mg/l, Max	0.1
(xxiii)	Nitrates (as NO ₃), mg/1,Max	50
(xxiv)	Alpha emititers, μc/mg, Max	10 ⁻⁹
(xxv)	Beta emitters, µc/ml, Max	10-8

TABLE- 4: TEOLERANCE LIMITS FOR INLAND SURFACE WATERS, CALSS - D

S.No.	Characteristic	Tolerance Limit
(1)	(2)	(3)
(i)	pH value	6.5 to 8.5
(ii)	Dissolved Oxygen, mg/l, Min.	4.0
(iii)	Free Ammonia (as N), mg/l, Max.	1.2
(iv)	Electrical Conductance at 25 °C, μS, Max	1000
(v)	Free Carbon Dioxide (as CO ₂),mg/1, Max	6.0
(vi)	Oils and Grease, mg/l, Max	0.1
(vii)	Alpha emitters, μc/ml, Max	10 ⁻⁹
(viii)	Beta emitters, μc/ml, Max	10 ⁻⁸

TABLE- 5: TOLERANCE LIMITS FOR INLAND SURFACE WATERS, CLASS – E

S.No.	Characteristic	Tolerance Limit
(1)	(2)	(3)
(i)	pH value	6.0 to 8.5
(ii)	Electrical Conductance at 25°C, µS, Max	2250
(iii)	Sodium Adsorption Ratio, Max	26
(iv)	Boron (as B), mg/l, Max	2.0
(v)	Total Dissolved Solids, (inorganic), mg/l, Max	2100
(vi)	Sulphates (as SO ₄), mg/l, Max	1000
(vii)	Chlorides (as CI), Mg/I, Max	600
(viii)	Sodium Percentage, Max	60
(ix)	Alpha emitters, μc/ml, Max	10 ⁻⁹
(x)	Beta emitters, μc/ml, Max	10 ⁻⁸

Appendix-8

MSW improvement action plan time-line for the ULBs of Department of Urban Development, UP

S.N.	Key Activities	Timeline (In Months)								
		1	2	3	4	5	6	7	8	9
1	Policy Framework adoption									
	(During the period the ULBs are required to adopt various rules /regulation in terms of bylaws for effective implementation of SWM rules)									
2	With adoption action plan the ULBs along the river will formulate IEC campaign (Specifically designing of promotional materials related to not only just for better waste management in the area but also making common people/institutions aware and sensitise about river pollution and its control measure for making an effective behaviour change. The first 2 months will be needed for preparing the material and widely spreading the									

	continuous effort for a sustained drive to make perceptible change among stakeholders.)					
3	Detail Gap Analysis of existing resources in terms of human resource/equipment/vehicles that are presently deployed and further required for full compliance of SWM rules. During the period each ULB shall prepare a detail micro plan (ward -wise) in sync with the action plan for effective implementation.					
4	Procurement of Required Material / Services after Gap Analysis					
5	Capacity Building. All the key stakeholders from senior officials to the level of safaikarmi is required to be sensitize and trained for the effective compliance of SWM rules and during the period intensive capacity building programmes shall be conducted.					
6	Identification of Land/ Building for waste processing shall be completed for all ULBs within 2 months (decentralised					

	composting/MRF).					
7	Construction /Setting up of decentralised processing facility (composting for wet waste and MRF for dry waste) in all ULBs.					
8	Bulk waste Generators Identification and consultation/capacity building for onsiteWaste Management.					
9	Identification and integration of Informal Rag Pickers					
10	Segregation/ collection / transport / processing (10 percent) (by 4th month of Action Plan adoption)					
11	Segregation/ collection / transport / processing (20 percent)					
12	Segregation/ collection / transport / processing (35 percent)					
15	Segregation/ collection / transport / processing (50 percent)					
16	Segregation/ collection / transport / processing (65 percent)					

17	Segregation/ collection / transport / processing (80) percent)					
18	Segregation/ collection / transport / processing (100) percent) Within 12 months.					

Other Relevant Information

- 1. Address of Environment Monitoring Portal- http://upecp.in/
- 2. Link for Resource Persons, Weblink for Central Ground Water Board (CGWB) & Miyawaki Forestry.

		T	T
S.No.	Institution	Address	Website Link
1	Akhil Bhartiya Sewa Sasthan, Chitrakoot- Gopal Bhai	Akhil Bhartiya Samaj Sewa Sansthan Bharat Janani Parisar Village: Ranipur Bhatt Post: Sitapur District: Chitrakoot Uttar Pradesh India PIN: 210 204	http://absss.in/
2	Muskan jyoti samiti – Mewa Lalji	Chaudhary Purwa, Old Kechwa Farm,Madiyawa Village, Kursi Road, Lucknow-226021Madiyawa Village, Kursi Road, Lucknow-226021	http://www.muskanjyoti.org/
3	Nirmal Kuteya Seechewal- Sant Balveer Singh Ji Seechewal	Post Office Chak Chella, Tehsil Shahkot, Distt Jalandhar, Punjab 144701, INDIA	http://www.nirmalkuteya.com/portal/
4	Central Ground Water Authority	Central Ground Water Board, Northern Region, Bhujal Bhavan, Sector-B. Sitapur Road Yojna, Ram Ram Bank Chauraha, Lucknow - 226021.	http://cgwb.gov.in/aboutcgwb.html
5	Miyawaki, saytrees		https://saytrees.org/miyawaki.html

3. Re-constitution of District Environment Committee by Chief Secretary, Govt. of Uttar Pradesh vide Office Order No- 13/2019/NGT-257/55-Parya-2-2019-44(Writ)/2016 dated 14 June, 2019 is as follows.

1	District Magistrate	Chairman
2	C.D.O.	Member
3	S.S.P.	Member
4	Nominee of CEO, Industrial Development Authority	Member
5	ADM/Incharge, Local Bodies	Member
6	V.C., Development Authority	Member
7	Municipal Commissioner	Member
8	All Executive Officer, Nagar Palika/Panchayat	Member
9	District Supply Officer	Member
10	C.M.O.	Member
11	Ex. En., Irrigation Department,	Member
12	Ex. En., PWD	Member
13	Ex. En., UPPCL	Member
14	R.T.O.	Member
15	G.M., DIC	Member
16	R.M., UPSIDC	Member
17	D.P.R.O.	Member
18	District Agriculture Officer	Member

19	District Horticulture Officer	Member
20	D.E.S.T.O	Member
21	District Information Science Officer	Member
22	Representatives of all Oil & Gas Companies	Member
23	All City Gas Network Companies	Member
24	Regional Officer, U.P. Pollution Control Board.	Member
25	02 NGOs (Environment), nominated by District Magistrate	Member
26	Other Officers/Representatives of Cantonment Board, Jila Panchayat, Jal Nigam, Railways, Ground Water, Industrial Association, Common Bio-Medical Waste Facility, Educational institutions, Specialist etc. nominated by District Magistrate	Member
27	District Forest Officer	Member Convenor