No. 6836/NGT/SLMC/SCI/2023/164

GOVERNMENT OF PUDUCIHERRY
DEPARTMENT OF SCIENCE, TECHNOLOGY AND ENVIRONMENT
PUDUCHERRY POLLUTION CONTROL COMMITTEE
3rd Floor, I-Housing Board Complex, Anna Nagar, Puducherry - 5.
Telephone: (0413) 2201256; Telefax: (0413) 2203494

***

Puducherry, the 17 FEB 2023

To

Shri.D.P.Mathuria
Executive Director (Tech)
National Mission for Clean Ganga
Ministry of Jai Shakti,
P' Floor, Major Dhyan Chand National Stadium,
India Gate, New Delhi — 110 002.

Sir,

Sub: DSTE/PPCC-Submission of Progress Report on Restoration of Polluted River Stretches-Reg.

Ref: Your Letter No. Legal/OA No. 673/2018/NMCG/2019 date 08.10.2020.

With reference to the above mentioned subject, Progress Report for the month of January, 2023 is enclosed for kind perusal.

Yours sincerely,

N. Ramesh

(Dr.N.RAMESH)
Member Secretary
PPCC

Enc1: as stated above

Copy to:

1. The Member Secretary,
   Central Pollution Control Board,
   Parivesh Bhawan, C.B.D. Cum-Office Complex,
   East Arjun Nagar, Delhi — 110 032.

2. Standing Guard File

Format for submission of Monthly Progress Report in the NGT Matter OANo.673of2018 (incompliance toNGTorderdated24.09.2020)

For the State of Puducherry

I. Overall status of the State (2011)

Total Puducherry Population	:	1247953
Puducherry District Population	:	950289
Puducherry Urban Population	:	657600 (950289x69.20%)
Puducherry Rural Population	:	292689 (950289x30.80%)

II. Estimated Sewage Generation(MLD): 71 MLD (URBAN)

III. <u>Details of Sewage Treatment Plant:</u>

1.	Existing no. of STPs and Treatment Capacity (in MLD): at Puducherry (68.5MLD) Net Treatment capacity of STP's 56 – 5 = 51 MLD	3 Nos. of SBR – 51 MLD 2 Nos. of UASB – 5 MLD **(**under maintenance**)** Total -56 MLD
2.	Capacity Utilization of existing STPs: 15.52+15.41+12.13=43.06 MLD 43.06/51=84.43%	43.06 MLD (84.43%)
3.	MLD of sewage being treated through Alternate technology: (71-56=15MLD)	15 MLD (on site sanitation like septic tank and soak pit etc.,)
4.	Gap in Treatment Capacity in MLD: (71-56 =15MLD)	15 MLD Tender for setting up of 15MLD was opened on 31.01.2023.
5.	No. of Operational STPs:	3 Nos.
6.	No. of Complying STPs with respect to pH, TSS, COD & BOD	3 Nos.

Details of each existing STP in the State

Sl. No.	Location	Existing STP Capacity	Capacity being Utilized	Operational Status of STP	Compliance Status of STP
1	Puducherry	56 MLD (5 MLD UASB is under maintenance)	75.24%	3	3
2	Karaikal	-	-	-	-
3	Mahe	-	-	-	-
4	Yanam	-	-	-	-

Details of under construction STPs in the State

Sl. No.	Location	Capacity of the plant in KLD	Physical Progress in%	Status of I & D or House sewer connections	Completion TimeLine
Nil					

Details of proposed STPs in the State

Sl. No.	Location	Capacity of the STP proposed in MLD	Status of Project (at DPR Stage/under Tendering/Work to be Awarded)	Likely Date of Completion
1.	Puducherry	3 MLD	Rs. 28.15 crores has been sanctioned under AMRUT Scheme for setting up of 3MLD STP in Puducherry region.	The work will be completed by June 2023.
2.	Karaikal	11 MLD	DPR has been prepared for Installation of 2MLD STP at Arasalar River and sanctioned for Rs. 9.75 crores and Rs. 5.85 crores for O & M cost for state funds. However, a revised DPR with enhanced capacity of 11MLD including the quantity of sewage generated from Karaikal town and submitted for revised sanction under AMRUT scheme.	
3.	Mahe	Rs.25.50croreshasbeenallocatedunderSBM(U)2.0		
4.	Yanam			

Idol immersion

- Idol immersion in U.T. of Puducherry is not carried out in fresh water bodies.
- Training program to the concerned regulatory authorities for ensuring effective implementation of revised guidelines for idol immersion was conducted by PPCC on 25.08.2021.
- Revised CPCB guidelines were also communicated on 11th August 2022 to the Collector, Puducherry and Karaikal Regions, to the Sr. Superintendent of Police (L&O), to the Superintendent of Police, Karaikal and to the Secretary, Sri Vinayaga Chaturthi Vizha Peravai, Puducherry and to the Local Administration Department, Puducherry to issue necessary instruction to the concerned to follow the guidelines.
- PPCC officials inspected Vinayaga idols manufacturing units on 19.08.2022 and found the idols were manufactured with waste paper, tapioca powder and water soluble colours. Revised CPCB guidelines were also issued to the manufacturer of idols by PPCC.
- Public Notice regarding environmental friendly idol immersion was published in leading newspapers on 13.08.2022.
- A meeting was conducted by the Collector on 07.09.2022 for the strict implementation of guidelines till the end of festival.

IV. **Details of Industrial Pollution:**

1.	No. of industries in the State:	3595
2.	No. of Effluent generating industries in the State:	97
3.	Quantity of effluent generated from the industries in MLD:	4.75 MLD
4.	Quantity of Hazardous Sludge generated from the Industries in TPD:	10 TPD
5.	Number of industrial units having ETPs:	97
6.	Number of industrial units connected to CETP:	Nil
7.	Number and total capacity of ETPs (details of existing/ under construction/ proposed)	Existing–97 Capacity-4.75MLD
8.	Compliance status of the ETPs:	97
9.	Number and total capacity of CETPs (details of existing / under construction /proposed)	Nil
10.	Status of compliance and operation of the CETPs	Nil

Town	**No.of industries**	**Industrial discharge**	**Status of ETPs**	**Status of CETPs(existing, underconstruction& proposed)**
Puducherry	3271	4746.2KLD	Existing-97	Nil

V. Solid Waste Management:

1.	Total number of Urban Local Bodies and their Population.	**Annexure I**	
2.	Current Municipal Solid Waste Generation.	382.5 TPD	
3.	Number, Installed capacity and utilization of existing MSW processing facilities in TPD (bifurcated by type of processing eg., -Waste to Energy (Tonnage and Power Output), Compost Plants (Windrow, Vermi, decentralized pit composting),bio-methanation, MRF etc.	Composting	33.5TPD
		VermiComposting	1TPD
		Bio-gas	2TPD
		Material recovered/Recycled	34TPD
4.	Action plan to bridge gap between Installed Capacity and Current Utilization of processing facilities (if Gap> 20%).	Proposed to have Energy Recovery Plant. Tenders finalized by PUDA for Integrated Solid Waste Management System in Yanam and Letter of Award issued to M/s Square LLP, Hyderabad. Work commenced from 08.12.2021	
5.	No. and capacity of C&D waste processing Plants in TPD (existing, proposed and under construction).	There is no processing plant of C&D Waste.	
		At present C&D waste is being collected and stored in earmarked area. C&D waste Generation – 29.35 TPD. A DPR is completed for setting up of C & D waste processing plant at Puducherry on DBFOOT basis.	
6.	Total no. of wards, no. of wards having door to door collection service, no. of wards practicing segregation at source.	Door to Door collection is practiced in all wards. Source segregation is carried out in 14 wards.	
7.	Details of MSW treatment facilities proposed and under construction (no. capacity and technology).	2	
8.	No. and area (in acres) of uncontrolled	3Nos. of controlled Landfills	
	Garbage dumpsites and Sanitary Landfills.	Puducherry	:23.0 acre
		Karaikal	:8.32 acre
		Yanam	:0.618 acre
		Total	31.938Acres
9.	No. and area (in acres) of legacy waste within 1km buffer of both side of the rivers.	**Nil**	
10.	No. of drains falling into rivers and no. of drains having floating racks/screens installed to prevent solid waste from falling into the rivers.	No. of drains: 172 All the drains that reaches the Sankaraparani and Arasalar rivers were identified and in-situ remediation of providing Grill gratings and Bar screen are completed in all the172 drains.	

Status of ULB wise Management of Solid Waste

ULB	Total MSW generation in TPD	Total MSW being processed in TPD	Existing MSW facilities	Utilization Capacity of the existing MSW facilities	Proposed MSW Facilities & Completion Time line
5	382.5	58.02 TPD	3	15.1 %	6 months

Note:

- Action has been initiated for disposal of legacy waste from the existing Kurumbapet dumping site, through Bio-remediation & Bio-mining with complete reclamation of the dumpsite land in compliance with Solid Waste Management Rules, 2016, by M/s Zigma Global Environ Solution Pvt. Ltd., Erode. PPCC has issued authorisation for processing of Legacy waste under SWM Rules, 2016, on 07.01.2022.
- Out of 6.5 lakhs tons of legacy waste accumulated in the U.T. of Puducherry, 3.70 lakhs tons have been cleared by bio-mining so far. An amount of Rs. 48.27 Crores has been identified and earmarked exclusively for disposal of the legacy waste. The work is progressing in full swing in Puducherry and will be completed by March 2023.
- Concessionaire has been engaged in Yanam and work will be completed by April 2023.
- 77,850 MT of legacy waste is accumulated in Paravaipet, Karaikal Municipality. Tender for the legacy waste has been floated for Karaikal and will also be completed by April 2023.
- Mahe Region has already been declared as Zero Waste Region as in-house composting is being practiced. 2 TPD of non-bio waste is being sent to MRF located in Pallur. Thus no legacy waste is accumulated.

The legacy waste accumulated in the UT of Puducherry will be cleared by April 2023.

With regard to solid waste processing in UT of Puducherry, 100% processing has been achieved both in Karaikal and Mahe Municipality. With respect to Yanam Municipality, the work order has been issued. The operator has started the collection and segregation from the source itself. The land has been identified for setting up the processing plant which will be completed

shortly and the processing will start by December 2022. As far as Puducherry region is concerned, RFP already been floated for setting up of processing plant at Kurumampet for 350 TPD and the letter for award will be issued by December2022.With these measures, the management of solid waste Management on day-to-day basis will be streamlined in the UT of Puducherry. Requisite funds of Rs. 50.00 Crores have been adequately earmarked under the State budget and SBM for setting up of the processing plants.

Bio-methanation Plant of 1 TPD capacity was installed with the financial assistance of Puducherry Pollution Control Committee (PPCC) in the year 2018. Methane gas generated is used for lighting purpose in the solid waste disposal yard. Dry waste of 1 TPD is used for RDF preparation and 31.2 TPD of dry waste is recovered and recycled by the informal sector.

VI. Bio-medical Waste Management:

1	Total Bio-medical generation:	4638kg/day
2	No. of Hospital sand Health Care Facilities:	387
3	Status of Treatment Facility/CBMWTF:	One Common Bio-Medical Waste Treatment Facility functional.

VII. Hazardous Waste Management:

1	Total Hazardous Waste generation:	31101 TPA
2	No.of Industries generating Hazardous waste	139 industries obtained authorisation.
3	Treatment Capacity of all TSDFs	-
4	Avg. Quantity of Hazardous waste reaching the TSDF sand Treated.	TSDF: Land fillable Waste reached- M/s. Mother Earth Enviro Tech, Bangalore –Nil
5	Detail so for-going or proposed TSDF	The TSDF located in neighboring states is being shared.

VIII. Plastic Waste Management:

1	Total Plastic Waste generation:	25185 TPA
2	Treatment/Measures adopted for reduction or management of plastic waste:	GovernmentofPuducherryhasimposedtotalbanonsingleuseplasticswitheffectfrom02/08/2019. As per the Government of India Notification Addendum has been notified by the Government of Puducherry for imposing additional SUP items like (i) Ear buds with plastic sticks, plastic sticks for balloons, candy sticks and ice cream sticks; (ii) Polystyrene [Thermocol] for decoration; (iii) Plates, cups, glasses, cutlery such as forks, spoons, knives, trays, stirrers, wrapping or packing films around sweet boxes, invitation cards and cigarette packets (iv) Plastics or PVC banners less than 100 micron; (v) Non-woven plastic carry bags less than 60 Gram per Square Meter (GSM). Standard Operating Procedure (SOP) for making SUP free Government office has been prepared and circulated to all the Government Departments and Industries. Surprise inspections are being carried out. As per the direction of MoEF & CC, GOI, "Action Plan on Elimination of Single Use Plastic (SUP)" in the Union Territory of Puducherry has been prepared with the approval of Special Task Force (STF). As per the order of Hon'ble NGT, Bahour Commune Panchayat (BCP) has been declared as Single Use Plastic Free Commune.

		Public notice has been issued on 22.02.2022 in Local dailies for elimination of Single Use Plastics in English and vernacular language. A circular dated 24.02.2022 has been issued to all colleges to declare their campus as SUP free campus as per the direction of CPCB, Delhi. A consultation meeting on "Elimination of single use plastics' with Local Authorities like District Magistrate, Director, LAD, Supdt. of Police and Commissioners of all Local Bodies was convened on 11.04.2022. Conducted a Technical session on laying of road using waste plastics on 18.04.2022. A pilot scale road was laid on 19.04.2022 for about 200mts at Edayarpalayam, Ariyankuppam Commune Panchayat in co-ordination with Prof. Dr.Vasudevaiah, Thiagarajar College of Engineering, Madurai. Road making using waste plastics at Korkumedu, Ariyankuppam Commune Panchayat. Hon'ble Chief Minister Inaugurated the LED van on 05.06.2022 for creating awareness on PWM. 632 drives were made and 1594.4 kg of SUP items have been seized by Local bodies. Rs.101914/- was levied as fine. No. of Units closed 05 Implementation of Single Use Plastic (SUP) as per the notification of MoEF&CC, GOI is being strictly implemented by Local bodies and

		monitored by PPCC. Interaction meeting with the Local bodies of Puducherry, Karaikal, Mahe and Yanam and demo of SUP Portal and Apps of CPCB was held on 13.07.2022. Interaction meeting with the Local bodies of Puducherry, Karaikal, Mahe and Yanam and demo of SUP Portal and APPS of CPCB was held on 13.07.2022. Interaction meeting with the Local bodies of Karaikal, for demo of SUP Portal and Apps of CPCB was held on 10.08.2022. under the Chairmanship of the Collector, Karaikal. For Setting up Material Recovery Facility (MRF) for 20 TPD Recyclable Plastic waste from Pondicherry and Oulgaret Municipality, MoU is under process. 4th meeting of Special Task Force (STF) on elimination of Single use Plastic in the U.T of Puducherry under the Chairmanship of the Chief Secretary was held on 02.11.2022.

IX	Details of Alternate Treatment Technology being adopted by the State/UT	Nil
X	Identification of polluting sources including drains contributing to river pollution and action as per NGT order on in-situ treatment:	All the drains that reaches the Sankaraparani and Arasalar rivers were identified and in-situ remediation of providing grill grating sandbar screen are completed inallthe172drains.

XI	Details of Nodal Officer appointed by Chief Secretary in the State/UT:	The Development Commissioner-cum-Senior Nodal Officer, Government of Puducherry
XII	Details of meetings carried under the Chairmanship of Chief Secretary in the State/UT:	Ist Review meeting on compliance status of the Hon'ble NGT Directions in the matter of OA No.606/2018 was held on 27.10.2022 under the Chairmanship of Development Commissioner-cum-Senior Nodal Officer. 2nd Review meeting is scheduled on 12.01.2023.
XIII	Latest water quality of polluted river, distributaries, drains with flow details and ground water quality in the catchment of polluted river;	Common STP Water Quality Data and River water quality data of Chunnambar and Arasalar are given in **Annexure–II.**
XIV	Ground water regulation:	Pondicherry Ground Water Authority had closed 6Nos. of tube wells in Puducherry region and 2Nos.of tube wells in Karaikal Region during the past 5yearsdue to illegal extraction of ground water.
XV	Good irrigation practices being adopted by the State:	**Annexure- III**
XVI	Rain Water Harvesting:	The planning authorities while issuing occupancy certificate ascertain that the conditions stipulated in the building permits regarding rain water harvesting measures have been complied with. The Puducherry Ground Water Authority does not issues fresh permits/renews permits to any industries/ institutions unless Rain Water Harvesting System is installed in their respective buildings. 882 Rain Water Harvesting structure are constructed in the U.T of Puducherry by Department of Agriculture. No. of Rain Water Harvesting structure by PWD - 262.
XVII	Demarcation of Flood plain and removal of Illegal encroachments:	**Annexure – IV**

XVIII	Maintaining minimum –flow of river:	Special Task Team has been constituted under the chairmanship of Deputy Collector in each District for curtailing illegal sand mining and its transportation. 44 Cases have been booked against illegal sand miners and Rs. 9.1.lakhs were collected as fine during 2021-2022. 144 has been imposed on illegal sand mining prone area.
XIX	Plantation activities along the rivers:	For the development of green belt along Chunnambar, Forest Department has planted 4000 trees.
XX	Development of bio-diversity park:	On the Bank of Arasalar River, 11-99-30 hectares of Mangrove forest has been demarked as bio- diversity park. Letter dt. 12.09.2022 has been sent to Forest Department and dt.24.11.2022 to the District Collector, Karaikal requesting to Notify the Mangrove area to an extent of 11-99-30 hectares belonging to Government of Puducherry as Bio-diversity Park as per the relevant Forest Act. Signboard has been installed. Biodiversity Assessment in the Mangrove Forest of Karaikal is carried out for the period July 2021 to June, 2022.
XXI	Reuse of Treated Water:	**Annexure-V**
XXII	Model River being adopted by the State& Action Proposed for achieving the bathing quality standards:	Chunnambar River -Sankarabarani
XXIII	Status of Preparation of Action Plan by the13 Coastal States:	Action plan submitted to .CPCBdt.24.02.2020. Stake holder consultation meeting was conducted with officials of Government of Puducherry and NCCR on 05.07.2022. NCCR has agreed for technical support in preparing the coastal action plan by monitoring the coastal water as requested by PPCC.
XXIV	Regulation of Mining Activities in the State/UT:	Special Task Team has been constituted under the Chairmanship of Deputy Collector in each district for curtailing illegal sand mining and its transportation. 44 cases have been booked against illegal

		sand miners and Rs.9.1 lakhs were collected as fine. 144 has been imposed in illegal sand mining prone area.
XXV	Action against identified polluters, law violators and officers responsible for failure for vigorous monitoring.	-

ANNEXURE-I

Details of Solid Waste Generation in Urban Local Bodies (Municipalities)

Sl. No	Name of the Municipality	Total Population as per census2011	Total Quantity of waste generation in TPD
1.	Puducherry	2,44,700	155
2.	Oulgaret	3,00,104	155
3.	Karaikal	86,838	40
4.	Mahe	41,816	12.5
5.	Yanam	55,628	12
Total			**382.5**

Chunnambar River Water Quality Data			
S.No	**Parameters**	**Jan-23**	**Standard limit as per the Primary Water Quality Criteria for bathing water - Class of Water B**
1	**Date of sampling**	30.01.2023	
2	**Time**	4.00 PM	
3	**Temp°C**	29°C	
4	**pH**	8.42	6.5-8.5
5	**DO (mg/l)**	9.2	5 or more
6	**BOD (mg/l)**	2.5	3 or less
7	**Total Coliform MPN/100 ml**	280	
8	**Faecal Coliform MPN/100ml**	84	500 (Desirable) and 2500 (Max. Permissible)
9	**Faecal Streptococci MPN/100ml**	38	100 (Desirable) and 500 (Max. Permissible)
Arasalar River Water Quality Data			
S.No	**Parameters**	**Jan-23**	**Standard limit as per the Primary Water Quality Criteria for bathing water - Class of Water B**
1	**Date of sampling**	23.01.2023	
2	**Time**	6.30 AM	
3	**Temp°C**	26°C	
4	**pH**	7.46	6.5-8.5
5	**DO (mg/l)**	4.0	5 or more
6	**BOD (mg/l)**	BDL (DL : 1.0)	3 or less
7	**Total Coliform MPN/100 ml**	170	
8	**Faecal Coliform MPN/100ml**	<1.8	500 (Desirable) and 2500 (Max. Permissible)
9	**Faecal Streptococci MPN/100ml**	<1.8	100 (Desirable) and 500 (Max. Permissible)

BDL - Below Detectable Limit; DL - Detection Limit
MPN- Most Probable Number

GOVERNMENT OF PUDUCHERRY
OFFICE OF THE BIOCHEMIST
WATER TESTING LABORATORY
P.H.D., P.W.D., PUDUCHERRY

TC-7580

Report No. : TR/WTL/PHD/PWD/PDY/2023/W-0032 Date: 27.01.2023
ULR-TC758021000000032F

TEST REPORT

Customer Name & Address : The Assistant Engineer,
Drainage Sub Division, PHD, PWD, Puducherry.

Customer Reference : Test request dt:18.01.2023

SAMPLE DETAILS

Sample Code	: **2023/W-0032**	Sampled by	: Customer
Sample Name	: Water	Sampled on	: 18.01.2023
Sample Description	: Waste Water	Sampling Location	: Dubrayapet STP outlet
Temperature at the time of receipt	: 27.9°C		
Identification by Customer	: Sample 2	Sampling Procedure	: --
Sample Condition	: Fit for analysis	Sample Received on	: 18.01.2023
Test Started on	: 18.01.2023	Test Completed on	: 27.01.2023

TEST RESULTS

Sl. NO	Test Parameter	Test Method	Units	Results	NGT Standards for treated Sewage for discharge into surface water
1	pH @ 25°C	APHA, 23rd Edition, 2017, 4500-H+B	--	7.23	5.5 to 9
2	Total Suspended Solids @ 103 - 105°C	APHA, 23rd Edition, 2017, 2540 D	mg/L	<10	Less than 10
3	Chemical Oxygen Demand	APHA, 23rd Edition, 2017, 5220 B	mg/L	14.3	Not more than 50
4	Biochemical Oxygen Demand (3 days at 27°C)	IS 3025 Part44; (1994); RA2014	mg/L	6.9	Less than 10
5	Total Phosphate as PO_4	APHA, 23rd Edn, 2017, 4500-P B, C	mg/L	4.31	--

.....End of Report.....

Authorized Signatory

Vimala Venkatachalam
BIOCHEMIST
WATER TESTING LABORATORY
PUBLIC HEALTH DIVISION

Copy Submitted to:
The Executive Engineer,
P.H.D.,P.W.D., Puducherry.

Terms and Conditions:

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GOVERNMENT OF PUDUCHERRY
OFFICE OF THE BIOCHEMIST
WATER TESTING LABORATORY
P.H.D., P.W.D., PUDUCHERRY

port No. : TR/WTL/PHD/PWD/PDY/2022/W-0032(Annexe) Date: 27.01.2023

TEST REPORT

Customer Name & Address : The Assistant Engineer,
Drainage Sub Division, PHD, PWD, Puducherry.

Customer Reference : Test request dt:18.01.2023

SAMPLE DETAILS

Sample Code	: **2023/W-0032**	Sampled by	: Customer
Sample Name	: Water	Sampled on	: 18.01.2023
Sample Description	: Waste Water	Sampling Location	: Dubrayapet STP outlet
Temperature at the time of receipt	: 27.9°C		
Identification by Customer	: Sample 2	Sampling Procedure	: --
Sample Condition	: Fit for analysis	Sample Received on	: 18.01.2023
Test Started on	: 18.01.2023	Test Completed on	: 27.01.2023

TEST RESULTS

Sl. NO	Test Parameter	Test Method	Units	Results	NGT Standards for treated Sewage for discharge into surface water
1	Nitrate as NO_3	APHA, 23rd Edn, 2017, 4500-NO_3B	mg/L	<5	--
2	Phosphorus as P	APHA, 23rd Edn, 2017, 4500-P B, C	mg/L	1.4	Less than 2
3	Faecal Coliforms	WHO Guideliness for drinking water Quality - Vol3	MPN/100 ml	<200 MPN/100ml	<230

.....End of Report.....

Authorized Signatory

Vimala Venkatachalam
BIOCHEMIST
WATER TESTING LABORATORY
PUBLIC HEALTH DIVISION

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GOVERNMENT OF PUDUCHERRY
OFFICE OF THE BIOCHEMIST
WATER TESTING LABORATORY
P.H.D., P.W.D., PUDUCHERRY

port No. : TR/WTL/PHD/PWD/PDY/2022/W-0034(Annexe) Date: 27.01.2023

TEST REPORT

Customer Name & Address : The Assistant Engineer,
Drainage Sub Division, PHD, PWD, Puducherry.

Customer Reference : Test request dt:18.01.2023

SAMPLE DETAILS

Sample Code	: **2023/W-0034**	Sampled by	: Customer
Sample Name	: Water	Sampled on	: 18.01.2023
Sample Description	: Waste Water		
Temperature at the time of receipt	: 27.7°C	Sampling Location	: Kanagan Eri STP Outlet
Identification by Customer	: Sample 4	Sampling Procedure	: --
Sample Condition	: Fit for analysis	Sample Received on	: 18.01.2023
Test Started on	: 18.01.2023	Test Completed on	: 27.01.2023

TEST RESULTS

Sl. NO	Test Parameter	Test Method	Units	Results	NGT Standards for treated Sewage for discharge into surface water
1	Nitrate as NO_3	APHA, 23rd Edn, 2017, 4500-NO_3B	mg/L	<5	--
2	Phosphorus as P	APHA, 23rd Edn, 2017, 4500-P B, C	mg/L	1.6	Less than 2
3	Faecal Coliforms	WHO Guideliness for drinking water Quality - Vol3	MPN/100 ml	<200 MPN/100ml	<230

.....End of Report.....

Authorized Signatory

Vimala Venkatachalam
BIOCHEMIST
WATER TESTING LABORATORY
PUBLIC HEALTH DIVISION

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P.H.D., P.W.D., PUDUCHERRY

TC-7580

Report No. : TR/WTL/PHD/PWD/PDY/2023/W-0034 Date: 27.01.2023
ULR-TC758021000000034F

TEST REPORT

Customer Name & Address : The Assistant Engineer,
Drainage Sub Division, PHD, PWD, Puducherry.

Customer Reference : Test request dt:18.01.2023

SAMPLE DETAILS

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Sample Name	: Water	Sampled on	: 18.01.2023
Sample Description	: Waste Water	Sampling Location	: Kanagan Eri STP Outlet
Temperature at the time of receipt	: 27.7°C		
Identification by Customer	: Sample 4	Sampling Procedure	: --
Sample Condition	: Fit for analysis	Sample Received on	: 18.01.2023
Test Started on	: 18.01.2023	Test Completed on	: 27.01.2023

TEST RESULTS

Sl. NO	Test Parameter	Test Method	Units	Results	NGT Standards for treated Sewage for discharge into surface water
1	pH @ 25°C	APHA, 23rd Edition, 2017, 4500-H+B	--	7.40	5.5 to 9
2	Total Suspended Solids @ 103 - 105°C	APHA, 23rd Edition, 2017, 2540 D	mg/L	<10	Less than 10
3	Chemical Oxygen Demand	APHA, 23rd Edition, 2017, 5220 B	mg/L	19	Not more than 50
4	Biochemical Oxygen Demand (3 days at 27°C)	IS 3025 Part44; (1994); RA2014	mg/L	2.5	Less than 10
5	Total Phosphate as PO_4	APHA, 23rd Edn, 2017, 4500-P B, C	mg/L	4.87	--

.....End of Report.....

Authorized Signatory

Vimala Venkatachalam
BIOCHEMIST
WATER TESTING LABORATORY
PUBLIC HEALTH DIVISION

Copy Submitted to:
The Executive Engineer,
P.H.D.,P.W.D., Puducherry.

Terms and Conditions:

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2. The tested report shall not be reproduced in full or part without written approval of WTL-PHD PWD.
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GOVERNMENT OF PUDUCHERRY
OFFICE OF THE BIOCHEMIST
WATER TESTING LABORATORY
P.H.D., P.W.D., PUDUCHERRY

port No. : TR/WTL/PHD/PWD/PDY/2022/W-0036(Annexe) Date: 27.01.2023

TEST REPORT

Customer Name & Address : The Assistant Engineer,
Drainage Sub Division, PHD, PWD, Puducherry.

Customer Reference : Test request dt:18.01.2023

SAMPLE DETAILS

Sample Code	: **2023/W-0036**	Sampled by	: Customer
Sample Name	: Water	Sampled on	: 18.01.2023
Sample Description	: Waste Water		
Temperature at the time of receipt	: 28.0°C	Sampling Location	: Lawspet STP Outlet
Identification by Customer	: Sample 6	Sampling Procedure	: --
Sample Condition	: Fit for analysis	Sample Received on	: 18.01.2023
Test Started on	: 18.01.2023	Test Completed on	: 27.01.2023

TEST RESULTS

Sl. NO	Test Parameter	Test Method	Units	Results	NGT Standards for treated Sewage for discharge into surface water
1	Nitrate as NO_3	APHA, 23rd Edn, 2017, 4500-NO_3B	mg/L	<5	--
2	Phosphorus as P	APHA, 23rd Edn, 2017, 4500-P B, C	mg/L	1.6	Less than 2
3	Faecal Coliforms	WHO Guideliness for drinking water Quality - Vol3	MPN/100 ml	<200 MPN/100ml	<230

.....End of Report.....

Authorized Signatory

Vimala Venkatachalam
BIOCHEMIST
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PUBLIC HEALTH DIVISION

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GOVERNMENT OF PUDUCHERRY
OFFICE OF THE BIOCHEMIST
WATER TESTING LABORATORY
P.H.D., P.W.D., PUDUCHERRY

TC-7580

Report No. : TR/WTL/PHD/PWD/PDY/2023/W-0036
ULR-TC758021000000036F

Date: 27.01.2023

TEST REPORT

Customer Name & Address : The Assistant Engineer,
Drainage Sub Division, PHD, PWD, Puducherry.

Customer Reference : Test request dt:18.01.2023

SAMPLE DETAILS

Sample Code	: **2023/W-0036**	Sampled by	: Customer
Sample Name	: Water	Sampled on	: 18.01.2023
Sample Description	: Waste Water		
Temperature at the time of receipt	: 28.0°C	Sampling Location	: Lawspet STP Outlet
Identification by Customer	: Sample 6	Sampling Procedure	: --
Sample Condition	: Fit for analysis	Sample Received on	: 18.01.2023
Test Started on	: 18.01.2023	Test Completed on	: 27.01.2023

TEST RESULTS

Sl. NO	Test Parameter	Test Method	Units	Results	NGT Standards for treated Sewage for discharge into surface water
1	pH @ 25°C	APHA, 23rd Edition, 2017, 4500-H+B	--	7.43	5.5 to 9
2	Total Suspended Solids @ 103 - 105°C	APHA, 23rd Edition, 2017, 2540 D	mg/L	<10	Less than 10
3	Chemical Oxygen Demand	APHA, 23rd Edition, 2017, 5220 B	mg/L	18	Not more than 50
4	Biochemical Oxygen Demand (3 days at 27°C)	IS 3025 Part44; (1994); RA2014	mg/L	3.0	Less than 10
5	Total Phosphate as PO_4	APHA, 23rd Edn, 2017, 4500-P B, C	mg/L	4.99	--

.....End of Report.....

Authorized Signatory

Vimala Venkatachalam
BIOCHEMIST
WATER TESTING LABORATORY
PUBLIC HEALTH DIVISION

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ANNEXURE–III

ADOPTION OF GOODIRRIGATIONPRACTICE

1. It is proposed to cover more area under precision farming.
2. System of Rice Intensification (SRI) is popularized among the farming community as a water saving measure.
3. Sustainable Sugarcane Initiative (SSI) for reducing water consumption in sugarcane crops is also being popularized.
4. Attractive subsidy assistance is being extended to farmers for installation of Drip/Sprinkler irrigation devices.
5. Attractive subsidy assistance is being extended to farmers for laying underground pipelines for conveyance of irrigation water.

ANNEXURE-IV

PROTECTIONANDMANAGEMENTOFFLOODPLAINZONES(FPZ)

Sl. No.	Key components of proposed action plans for restoration of identified polluted river stretches in States/UTs	Proposed Achievable Target	Proposed Time Targets for Compliance	Present status and or Pendency in terms of %	Remarks
1.	Flood Plain Zone protection and its management	Proposal submitted for approval of 50.00Crore.	2020-2025	The Karaikal Region is receiving water from the Seven Cauvery distributaries from Tamilnadu. The flood / excess water due to rainfall run off will be released and regulated by Tamilnadu Irrigation Division from the upper reaches through these seven distributaries. The river banks and the inspection tracks are almost strengthened to receive the flood water from upper reaches in Tamilnadu and to dispose safely to the Ocean (Bay of Bengal). However flood protection scheme works has been included under Flood Management and Border Area Program for an amount of Rs. 50 Crore in the proposal for the period from 2020-2025 for getting approval from Government. The details are enclosed, in which for protecting the Arasalar river bank an estimate for an amount of Rs.10.00 Crore is earmarked to protect the Left Bank of Arasalar river above tail end regulator at Melaoduthurai.	After getting approval of works under Flood Management and Border Area Programme, DPR will be submitted

ANNEXURE-V

Reuse of Treated Water

Station	Purpose	Quantity
Lawspet STP	Industrial usage	0.8 MLD
	Fodder Grass raising	6.0 MLD
	Coconut Plantation	
	Silk cotton trees	
	Natural recharging through impounding reservoir	9 MLD
Dubrayapet STP	To Pondy Marina Hotel	0.3 MLD
	Total	**16.10 MLD**

An Ultrafiltration Plant of 0.50 MLD capacity for treating the STEW from Dubrayapet STP has already been installed at Dubrayapet and pumping mains for conveying the treated water at Botanical Garden and Bharathi Park has been laid at a total cost of `2.06 Crores under AMRUT scheme has been implemented as Pilot project and is to be commissioned immediately by which 0.50 MLD of Tertiary Treated Water will be reused in public parks. The system is ready and awaited for drawl of treated used water by Puducherry Municipality and Agriculture Department.