



GREATER CHENNAI CORPORATION

PUBLIC HEALTH DEPARTMENT

ZONE – IX

DATE: 21.11.2024


**SANITARY CERTIFICATE**

I hereby declare that the building and premises of **MAHATMA GANDHI VIDYALAYA SENIOR SECONDARY SCHOOL, NO. 15/22A, THANIKACHALAM ROAD, T. NAGAR, CHENNAI – 600 017**, have been inspected on **20.11.2024** and certify, that the building as properly ventilated and lighted, that it is maintained repair, that it is neat and clean that the latrine arrangements are adequate and satisfactory, that the supply of drinking water is wholesome and good and that in all other aspects the sanitation is good.

**This Certificate is valid for one year from the date of issue.**

  
SANITARY INSPECTOR-117

  
SANITARY OFFICER-26  
20/11/24

  
ZONAL HEALTH OFFICER - IX  
Zonal Health Officer  
Zone-9  
Corporation of Chennai

Telephone: 044-2999 7572.



**DEPARTMENT OF PUBLIC HEALTH AND PREVENTIVE MEDICINE**

**From**

**Tmt.L.Sujatha, M.Sc., M.A., B.Ed.,**  
**CHIEF WATER ANALYST**  
Chief Water Analysis Laboratory,  
King Institute Campus, Guindy,  
Chennai-600 032.

**To**

The Principal,  
Mahatma Gandhi Vidyalaya,  
15-22A, Thanikachalam Road,  
T.Nagar,  
Chennai- 600 017.

**R.No.2798/C/2024 Misc -422 & 423**

**Dated : 14.10.2024.**

**Madam,**

Sub : Report on examination of water samples - Regarding.

Ref : Your letter dated 26.09.2024.

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Two samples of water stated to have been collected on 03.10.2024 by Thiru.Kondaiya from the following source/point located within the premises of Mahatma Gandhi Vidyalaya, No.15-22A, Thanikachalam Road, T.Nagar, Chennai-17 were received at this laboratory on the same day from the addressee to assess their suitability for drinking purposes.

1. Water from the Sump (Source : Metro Water) (MISC 422)
2. Water from the RO Plant outlet tap (MISC 423)

The Results of analysis are furnished over leaf.

**1. Water from the Sump (Source : Metro Water) (Misc.422)**

The above sample of water is colourless and clear in physical appearance.

Chemical analysis reveals that it is moderately hard and considered to be acceptable chemical quality for drinking purposes.

However, it is of poor bacteriological quality for drinking purposes as evidenced by the presence of E-Coli Organisms of faecal origin.

Microscopical Examination also reveals the presence of few algal and zoo Planktons.

Hence the Source of water needs disinfection before distribution for consumption.

# RESULTS OF EXAMINATION OF SAMPLES OF WATER

From : The Principal, Mahatma Gandhi Vidyalaya, 15-22A, Thanikachalam Road, T.Nagar,  
Chennai – 600 017.

Collected by : Thiru.Kondaiya.

		M – 422	M – 423		
Date of Collection : 03.10.2024		Water from the Sump (Source : Metro Water)	Water from the RO Plant outlet tap		Maximum permissible limit for drinking water as per BIS 10500/2012
Date of Receipt : 03.10.2024					
Source as per label:					
Bacteriological Examination	Total colonies per ml on agar at 37°C	120	20		20
	MPN of Coliform bacteria per 100 ml.	>1100	0		0
	Nature of Coliform bacteria isolated	E Coli - II			absent
	Rapid Test for Ecoli				
Physical Examination	Colour	Colourless	Colourless		Colourless
	Turbidity (Units)	5	3		5
	Smell	None	None		None
Chemical Examination (in mg/l).	Total dissolved Solids	640	40		2000
	Carbonate hardness as CaCO <sub>3</sub>	168	4		-
	Non- Carbonate hardness as CaCO <sub>3</sub>	0	0		-
	Total hardness as CaCO <sub>3</sub>	168	4		600
	Chloride as Chlorine	52	10		1000
	Ammoniacal nitrogen	-	-		Nil
	Albuminoid nitrogen	-	-		Nil
	Oxygen absorbed (Tidy's test)	0.96	0.40		-
	Nitrate-nitrogen	1.0	0.5		10.2
	Alkalinity } as CaCO <sub>3</sub>	0	0		-
		312	10		600
	Fluoride as Fluorine	0.6	0.1		1.5
	PH.	7.6	7.0		6.5-8.5
	Iron as Fe Total	0.05	Nil		1.0
	Ferrous	Nil	Nil		--
	Manganese as Mn.	Nil	Nil		0.3
	Qualitative-				
	Nitrite nitrogen	Trace	Trace		Trace
	Sulphate	Trace	Trace		400
	Phosphate	Trace	Trace		Trace
	Toxic substances				
	Electrical conductivity (Reciprocal megohms per Cm <sup>3</sup> at 20°C)	920	60		-
Microscopical Examination		Monas & Amorphous Matter	Amorphous Matter		

## Method of Disinfection :

The disinfection is usually carried out by chlorinating the water at the storage units (Sump / OHT) by using 4 gms of BIS grade bleaching powder containing 32 to 34 % of chlorine content or 20 ml of 4 to 6 % sodium hypochlorite solution for every 1000 litres of water with half an hour contact time before Consumption.

The Storage units should be cleaned with strong Bleaching powder solution periodically atleast once in a month to ensure hygienic safety of storage units.

## 2. Water from the RO Plant outlet tap (MISC 423)

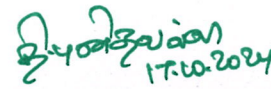
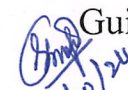
The above sample of RO water is colourless and clear in physical appearance.

Chemical analysis reveals that it is very soft and less mineralized. Even though it is of usable chemical quality for drinking, the total hardness is very low with only 4.0 mg/l. The calcium and magnesium elements are almost removed from this water, which are very essential for healthy living of human beings. Consumption of such RO water having low content of hardness would be deleterious to the health of human beings including growing children.

Hence, it is advised that the firm that installed the R.O. unit should be contacted with this analytical report and set right the RO unit in such a way that the outlet water should contain atleast a minimum content of total hardness of 30 mg/l so as to have some amount of calcium and magnesium that are very essential for a healthy life to the consumers.

It is of satisfactory biological and bacteriological quality for drinking purposes on this occasion.

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17.10.2024  
For CHIEF WATER ANALYST,  
Chief Water Analysis Laboratory,  
Guindy, Chennai – 32.  
  
17/10/24