

**Laboratory**                                 **Hyderabad Waste Management Project Laboratory, TSDF AT 684/1,  
Dundigal Village, Dundigal Gandimaisamma Mandal, Medchal  
District, Telangana**

**Accreditation Standard**   **ISO/IEC 17025: 2017**

**Certificate Number**                 **TC-5067**

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**Validity**                                   **27.02.2019 to 26.02.2021**

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Sl.	Product / Material of Test	Specific Test Performed	Test Method Specification against which tests are performed	Range of Testing / Limits of Detection
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**BIOLOGICAL TESTING**

<b>I.</b>	<b>WATER</b>			
<b>1.</b>	<b>Potable Water, Domestic Water, Treated Water</b>	Total Coliforms by Multiple	APHA 23 <sup>rd</sup> Edition, 9221 A&B:2017	1.8 MPN Index/100ml to1600 MPN Index/100ml
		Fecal Coliforms	APHA 23 <sup>rd</sup> Edition,9221 E:2017	1.8 MPN Index/100ml to1600 MPN Index/100ml
		Escherichia Coli (EC mug media)	APHA 23 <sup>rd</sup> Edition, 9221 F:2017	Qualitative
		Faecal Streptococcal bacteria by multiple tube technique	APHA 23 <sup>rd</sup> Edition, 9230 B:2017	1.8 MPN Index/100ml to1600 MPN Index/100ml
		Salmonella	APHA 23 <sup>rd</sup> Edition, 9260 B : 2017	Qualitative
<b>II.</b>	<b>POLLUTION AND ENVIRONMENT</b>			
<b>1.</b>	<b>Waste Water</b>	Total Coliforms by Multiple	APHA 23 <sup>rd</sup> Edition, 9221 A&B:2017	1.8 MPN Index/100ml to1600 MPN Index/100ml
		Fecal Coliforms	APHA 23 <sup>rd</sup> Edition,9221 E:2017	1.8 MPN Index/100ml to1600 MPN Index/100ml
		Escherichia Coli (EC mug media)	APHA 23 <sup>rd</sup> Edition, 9221 F:2017	Qualitative
		Faecal Streptococcal bacteria by multiple tube technique	APHA 23 <sup>rd</sup> Edition, 9230 B:2017	1.8 MPN Index/100ml to1600 MPN Index/100ml

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		Salmonella	APHA 23 <sup>rd</sup> Edition, 9260 B : 2017	Qualitative

**CHEMICAL TESTING**

<b>I. POLLUTION AND ENVIRONMENT</b>				
<b>1.</b>	<b>Waste Water</b>	pH	APHA 23 <sup>rd</sup> Edition, 4500 H <sup>+</sup> B : 2017	1 to 13
		Color	APHA 23 <sup>rd</sup> Edition, 2120 C : 2017	10 Pt-Co Units to 500 Pt-Co Units
		Conductivity	APHA 23 <sup>rd</sup> Edition, 2510 B:2017	2 μMho/cm to 100000 μMho/cm
		Acidity	APHA 23 <sup>rd</sup> Edition, 2310 B:2017	10 mg/L to 1000 mg/L
		Alkalinity as CaCO <sub>3</sub>	APHA 23 <sup>rd</sup> Edition, 2320 B : 2017	10 mg/L to 5000 mg/L
		Total Solids	APHA 23 <sup>rd</sup> Edition , 2540 B:2017	10 mg/L to 10000 mg/L
		Total Dissolved Solids as TDS	APHA 23 <sup>rd</sup> Edition, 2540 C:2017	10 mg/L to 10000 mg/L
		Total Suspended Solids as TSS	APHA 23 <sup>rd</sup> Edition, 2540 D:2017	10 mg/L to 1000 mg/L
		Fixed Solids	APHA 23 <sup>rd</sup> Edition, 2540 E:2017	10 mg/L to 10000 mg/L
		Volatile Solids	APHA 23 <sup>rd</sup> Edition, 2540 E:2017	10 mg/L to 10000 mg/L
		Sulphates as SO <sub>4</sub> <sup>-2</sup>	APHA 23 <sup>rd</sup> Edition 4500 SO <sub>4</sub> <sup>-2</sup> D: 2017	10 mg/L to 10000 mg/L
		Sulphite as SO <sub>3</sub> <sup>-2</sup>	APHA 23 <sup>rd</sup> Edition, 4500 SO <sub>3</sub> <sup>-2</sup> , B:2017	10 mg/L to 1000 mg/L

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		Sodium as Na	APHA 23 <sup>rd</sup> Edition, 3500 Na : 2017	5 mg/L to 1000 mg/L
		Sulphide as S <sup>-2</sup>	APHA 23 <sup>rd</sup> Edition, 4500 S <sup>-2</sup> F: 2017	1 mg/L to 10000 mg/L
		Total Chromium as Cr	APHA 23 <sup>rd</sup> Edition, ; 3120B (ICP OES Method) :2017	0.05 to 100 mg/L
		Chlorides as Cl <sup>-</sup>	APHA 23 <sup>rd</sup> Edition, 4500 Cl- C: 2017	10 mg/L to 10000 mg/L
		Nitrate Nitrogen as NO <sub>3</sub>	APHA 23 <sup>rd</sup> Edition , 4500 NO <sub>3</sub> -B (Colorimetric Method): 2017	1 mg/L to 10000 mg/L
		Nitrite Nitrogen as N	APHA 23 <sup>rd</sup> Edition , 4500 NO <sub>2</sub> – B (Colorimetric Method):2017	1 mg/L to 1000 mg/L
		Nitrogen (Ammonia) as N	APHA 23 <sup>rd</sup> Edition , 4500 NH <sub>3</sub> B, C:2017	1 mg/L to 10000 mg/L
		Nitrogen (Organic) as N	APHA 23 <sup>rd</sup> Edition , 4500 N (org) B :2017	1 mg/L to 1000 mg/L
		Fluorides as F <sup>-</sup>	APHA 23 <sup>rd</sup> Edition, 4500 F <sup>-</sup> D:2017	1 mg/L to 100 mg/L
		Residual Free Chlorine as Cl	APHA 23 <sup>rd</sup> Edition , 4500 Cl B:2017	0.2 mg/L to 100 mg/L
		Cyanides Total as CN <sup>-</sup>	APHA 23 <sup>rd</sup> Edition, 4500 CN <sup>-</sup> C, E :2017	0.1 mg/L to 1000 mg/L
		Total Hardness as CaCO <sub>3</sub>	APHA 23 <sup>rd</sup> Edition, 2340 C:2017	10 mg/L to 10000 mg/L
		Phosphorus as P	APHA 23 <sup>rd</sup> Edition, 4500P C:2017	1 mg/L to 1000 mg/L
		Dissolved Oxygen as DO	APHA 23 <sup>rd</sup> Edition, 4500 O C:2017	1 mg/L to 8 mg/L
		Oil & Grease	APHA 23 <sup>rd</sup> Edition, 5520 B:2017	1 mg/L to 1000 mg/L
		Chemical Oxygen Demand	APHA 23 <sup>rd</sup> Edition, 5220 B:2017	50 mg/L to 100000 mg/L

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		Biochemical Oxygen Demand as BOD (5 days at 20 °C) (3 days at 27 °C)	APHA 23 <sup>rd</sup> Edition, 5210B, 4500 -OC IS 3025 (Part 44): 1999 (RA 2003) and 1:2017	4 mg/L to 100000 mg/L
		Phenolic Compounds as Phenols	APHA 23 <sup>rd</sup> Edition, 5530 D (Direct Photometric Method):2017	0.001 mg/L to 1000 mg/L
		Calcium as Ca	APHA 23 <sup>rd</sup> Edition, 3500 Ca B:2017	10 mg/L to 10000 mg/L
		Magnesium as Mg	APHA 23 <sup>rd</sup> Edition, 3500-Mg B:2017	10 mg/L to 10000 mg/L
		Potassium as K	APHA 23 <sup>rd</sup> Edition, 3500 K B:2017	5 mg/L to 1000 mg/L
		Arsenic as As	APHA 23 <sup>rd</sup> Edition, 3120B (ICP OES Method):2017	0.05 mg/L to 100 mg/L
		Boron as B	APHA 23 <sup>rd</sup> Edition, 3120B:2017	0.1 mg/L to 100 mg/L
		Cadmium Cd	APHA 23 <sup>rd</sup> Edition, 3120B (ICP OES Method):2017	0.003 mg/L to 100 mg/L
		Hexavalent Chromium as Cr <sup>+6</sup>	APHA 23 <sup>rd</sup> Edition, 3500 Cr B:2017	0.05 mg/L to 100 mg/L
		Iron as Fe	APHA 23 <sup>rd</sup> Edition, 3500 Fe B:2017	0.2 mg/L to 1000 mg/L
		Copper as Cu	APHA 23 <sup>rd</sup> Edition, 3120B (ICP OES Method) :2017	0.05 mg/L to 100 mg/L
		Lead as Pb	APHA 23 <sup>rd</sup> Edition, 3120B (ICP OES Method) :2017	0.01 mg/L to 1000 mg/L
		Manganese as Mn	APHA 23 <sup>rd</sup> Edition, 3120B (ICP OES Method) :2017	0.1 mg/L to 1000 mg/L
		Nickel as Ni	APHA 23 <sup>rd</sup> Edition, 3120B (ICP OES Method) :2017	0.02 mg/L to 1000 mg/L
		Silica as SiO <sub>2</sub>	APHA 23 <sup>rd</sup> Edition, 4500 SiO <sub>2</sub> C :2017	0.5 mg/L to 100 mg/L

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		Zinc as Zn	APHA 23 <sup>rd</sup> Edition, 3120B (ICP OES Method):2017	0.5 mg/L to 1000 mg/L
		Mercury as Hg	APHA 23 <sup>rd</sup> Edition ,3120 B (ICP OES Method):2017	0.1 mg/L to 100 mg/L
		Selenium as Se	APHA 23 <sup>rd</sup> Edition ,3120 B (ICP OES Method:2017	0.1 mg/L to 100 mg/L
		Aluminum as Al	APHA 23 <sup>rd</sup> Edition ,3120 B (ICP OES Method):2017	0.1 mg/L to 100 mg/L
		Barium as Ba	APHA 23 <sup>rd</sup> Edition ,3120 B (ICP OES Method):2017	0.1 mg/L to 100 mg/L
<b>II.</b>	<b>HAZARDOUS AND RESTRICTED CHEMICALS</b>			
<b>1.</b>	<b>Hazardous Waste (Solid &amp; Liquids)</b>	pH	USEPA 1995 SW-846; 9045 C:1998	1 to 14
		Bulk Density	ASTM D 5057-90:1998	0.2 g/cc to 3 g/cc
		Calorific Value	IS 1350: 1970 (reaffirmed 2000)	200 cal/g to 8000 cal/g
		Flash Point	USEPA 1998, SW-846; 1020 A:1998	25 °C to 300 °C
		Moisture content	HWMP/SOP/LAB/278 Date 11.9.2018: 2018	0.1 % to 80 %
		Loss on drying at 105°C	HWMP/SOP/Lab/ 229 Date 11.9.2018: 2018	1 % to 80 %
		Loss on ignition at 550°C	HWMP/SOP/ Lab/ 229 Date 11.9.2018: 2017	1 % to 100 %
		Paint Filter Liquid Test	USEPA , SW-846; 9095 A: 1998	Pass/ Fail
		Reactive Cyanide as CN	USEPA 1998, SW-846; 9014 : 1998	1 mg/kg to 1000 mg/kg

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		Total Cyanide as CN <sup>-</sup>	USEPA 1998, SW-846; 9014 APHA 23 <sup>rd</sup> Edition, 4500 CN <sup>-</sup> K : 2017	1 mg/kg to 1000 mg/kg
		Total Sulfide as S <sup>-2</sup>	USEPA 1998, SW-846; 9215:1998	10 mg/kg to 1000 mg/kg
		Extractable organics	USEPA 1998, SW-846; 3540 C:1998	1 % to 90 %
		Water soluble inorganic	APHA 23rd Edition, 2540 E : 2017	0.1 % to 99 %
		Water soluble organics	APHA 23rd Edition,2540 E:2017	0.1 % to 99 %
		Arsenic as As	USEPA 1998, SW-846; 6010B : 1998	0.2 mg/kg to 1000 mg/kg
		Cadmium as Cd	USEPA 1998, SW-846; 6010B:1998	0.1 mg/kg to 1000 mg/kg
		Total Chromium as Cr	USEPA 1998, SW-846; 6010B:1998	0.1 mg/kg to 5000 mg/kg
		Mercury as Hg	USEPA 1998, SW-846,6010 B:1998	0.2 mg/kg to 1000 mg/kg
		Hexavalent Chromium as Cr <sup>+6</sup>	USEPA 1998, SW-846; 7196A:1998	5 mg/kg to 10000 mg/kg
		Iron as Fe	APHA 23rd Edition,3500 Fe B:2017	5 mg/kg to 10000 mg/kg
		Lead as Pb	USEPA 1998, SW-846; 6010B:1998	5 mg/kg to 10000 mg/kg
		Manganese as Mn	USEPA 1998, SW-846; 6010B:1998	2 mg/kg to 10000 mg/kg
		Nickel as Ni	USEPA 1998, SW-846; 6010B:1998	2 mg/kg to 10000 mg/kg
		Zinc as Zn	USEPA 1998, SW-846; 6010B:1998	2 mg/kg to 10000 mg/kg

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		Copper as Cu	USEPA 1998, SW-846; 6010B:1998	2 mg/kg to 10000 mg/kg
		Barium as Ba	USEPA 1998, SW-846; 6010B:1998	2 mg/kg to 10000 mg/kg
2.	<b>Hazardous Waste (Solid &amp; Liquids) (Toxicity Characteristic Leaching Procedure )</b>	Arsenic as As	USEPA 1998, SW-846; 6010B:1998	0.2 mg/L to 1000 mg/L
		Cadmium as Cd	USEPA 1998, SW-846; 6010B:1998	0.1 mg/L to 1000 mg/L
		Total Chromium as Cr	USEPA 1998, SW-846; 6010B:1998	0.1 mg/L to 5000 mg/L
		Hexavalent Chromium as Cr <sup>+6</sup>	APHA 23 <sup>rd</sup> Edition, 3500 Cr B : 2017	0.1 mg/L to 1000 mg/L
		Barium as Ba	USEPA 1998, SW-846; 6010B:1998	0.1 mg/L to 100 mg/L
		Iron as Fe	APHA 23 <sup>rd</sup> Edition, 3500 Fe B	0.1 mg/L to 1000 mg/L
		Lead as Pb	USEPA 1998, SW-846; 6010B:1998	0.1 mg/L to 1000 mg/L
		Manganese as Mn	USEPA 1998, SW-846; 6010B:1998	0.2 mg/L to 1000 mg/L
		Nickel as Ni	USEPA 1998, SW-846; 6010B:1998	0.2 mg/L to 1000 mg/L
		Mercury as Hg	APHA 23 <sup>rd</sup> Edition, 3120 B:2017	0.01 mg/L to 100 mg/L
		Zinc as Zn	USEPA 1998, SW-846; 6010B:1998	0.5 mg/L to 1000 mg/L
		Copper as Cu	USEPA 1998, SW-846; 6010B:1998	0.1 mg/L to 1000 mg/L
III.		<b>WATER</b>		
1.	<b>Drinking Water, Surface Water,</b>	pH	APHA 23 <sup>rd</sup> Edition, 4500 H <sup>+</sup> B:2017	1 to 13

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	<b>Ground Water</b>	Color	APHA 23rd Edition, 2120 C : 2017	10 Pt-Co Units to 500 Pt-Co Units
		Conductivity	APHA 23 <sup>rd</sup> Edition ; 2510 B : 2017	2 µMho/cm to 100000 µMho/cm
		Acidity	APHA 23rd Edition ; 2310 B : 2017	10 mg/L to 1000 mg/L
		Alkalinity as CaCO <sub>3</sub>	APHA 23rd Edition, 2320 B : 2017	10 mg/L to 5000 mg/L
		Total Solids	APHA 23rd Edition, 2540 B : 2017	10 mg/L to 10000 mg/L
		Total Dissolved Solids	APHA 23rd Edition, 2540 C : 2017	10 mg/L to 10000 mg/L
		Total Suspended Solids	APHA 23rd Edition, 2540 D : 2017	10 mg/L to 1000 mg/L
		Fixed Solids	APHA 23rd Edition, 2540 E : 2017	10 mg/L to 10000 mg/L
		Volatile Solids	APHA 23rd Edition 2540 E : 2017	10 mg/L to 10000 mg/L
		Chlorides as Cl <sup>-</sup>	APHA 23rd Edition 4500 Cl <sup>-</sup> B:2017	10 mg/L to 10000 mg/L
		Sulphates as SO <sub>4</sub> <sup>-2</sup>	APHA 23rd Edition 4500 SO <sub>4</sub> <sup>-2</sup> D:2017	10 mg/L to 10000 mg/L
		Sulphide as S <sup>-2</sup>	APHA 23 <sup>rd</sup> Edition 4500 S <sup>2</sup> F:2017 :2017	1 mg/L to 10000 mg/L
		Sulphite as SO <sub>3</sub> <sup>-2</sup>	APHA 23 <sup>rd</sup> Edition 4500 SO <sub>3</sub> <sup>-2</sup> , B:2017 :2017	10 mg/L to 1000 mg/L
		Nitrate Nitrogen as NO <sub>3</sub>	APHA 23 <sup>rd</sup> Edition , 4500 NO <sub>3</sub> <sup>-</sup> B Colorimetric method :2017	1 mg/L to 10000 mg/L
		Nitrite Nitrogen as N	APHA 23 <sup>rd</sup> Edition,4500 NO <sub>2</sub> - B Colorimetric method :2017	1 mg/L to 1000 mg/L



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		Nitrogen (Ammonia) as N	APHA 23 <sup>rd</sup> Edition,4500 NH <sub>3</sub> B, C :2017	1 mg/L to 10000 mg/L
		Nitrogen (Organic) as N	APHA 23 <sup>rd</sup> Edition 4500 N (org) B :2017	1 mg/L to 1000 mg/L
		Fluorides as F <sup>-</sup>	APHA 23 <sup>rd</sup> Edition,4500 F <sup>-</sup> D : 2017	1 mg/L to 100 mg/L
		Residual Free Chlorine as Cl	APHA 23 <sup>rd</sup> Edition, 4500 Cl B : 2017	0.2 mg/L to 100 mg/L
		Cyanides Total as CN <sup>-</sup>	APHA 23 <sup>rd</sup> Edition,4500 CN <sup>-</sup> C, E :2017	0.1 mg/L to 1000 mg/L
		Total Hardness as CaCO <sub>3</sub>	APHA 23 <sup>rd</sup> Edition, 2340 C : 2017	10 mg/L to 10000 mg/L
		Phosphorus as P	APHA 23 <sup>rd</sup> Edition, 4500 P C : 2017	1 mg/L to 1000 mg/L
		Dissolved Oxygen as DO	APHA 23 <sup>rd</sup> Edition 4500 O C : 2017	1 mg/L to 8 mg/L
		Oil & Grease	APHA 23 <sup>rd</sup> Edition, 5520 B : 2017	1 mg/L to 1000 mg/L
		Chemical Oxygen Demand	APHA 23 <sup>rd</sup> Edition, 5220 B : 2017	50 mg/L to 100000 mg/L
		Biochemical Oxygen Demand 5 days at 20°C 3 days at 27°C	APHA 23 <sup>rd</sup> Edition, 5210 B,4500-OC IS-3025(P-44)1999:RA2003 and 1 :2017	4 mg/L to 100000 mg/L
		Phenolic Compounds as Phenols	APHA 23 <sup>rd</sup> Edition, 5530 D (Direct Photometric Method) : 2017	0.001 mg/L to 1000 mg/L
		Calcium as Ca	APHA 23 <sup>rd</sup> Edition, 3500 Ca B : 2017	10 mg/L to 10000 mg/L
		Magnesium as Mg	APHA23 <sup>rd</sup> Edition, 3500-Mg B : 2017	10 mg/L to 10000 mg/L

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		Sodium as Na	APHA 23 <sup>rd</sup> Edition, 3500 Na : 2017	5 mg/L to 1000 mg/L
		Potassium as K	APHA 23 <sup>rd</sup> Edition, 3500 K B : 2017	5 mg/L to 1000 mg/L
		Arsenic as As	APHA 23 <sup>rd</sup> Edition 3120B (ICP OES Method) :2017	0.05 mg/L to 100 mg/L
		Boron as B	APHA 23 <sup>rd</sup> Edition 3120B (ICP OES Method) :2017	0.1 mg/L to 100 mg/L
		Cadmium Cd	APHA 23 <sup>rd</sup> Edition 3120B (ICP OES Method) :2017	0.003 mg/L to 100 mg/L
		Total Chromium as Cr	APHA 23 <sup>rd</sup> Edition, ; 3120B (ICP OES Method) :2017	0.05 mg/L to 100 mg/L
		Hexavalent Chromium as Cr <sup>+6</sup>	APHA 23 <sup>rd</sup> Edition, 3500 Cr B : 2017	0.05 mg/L to 100 mg/L
		Iron as Fe	APHA 23 <sup>rd</sup> Edition, 3500 Fe B : 2017	0.2 mg/L to 1000 mg/L
		Lead as Pb	APHA 23 <sup>rd</sup> Edition, 3120B (ICP OES Method) :2017	0.01 mg/L to 1000 mg/L
		Manganese as Mn	APHA 23 <sup>rd</sup> Edition, 3120B (ICP OES Method) :2017	0.1 mg/L to 1000 mg/L
		Nickel as Ni	APHA 23 <sup>rd</sup> Edition, 3120B (ICP OES Method) :2017	0.02 mg/L to 1000 mg/L
		Silica as SiO <sub>2</sub>	APHA 23 <sup>rd</sup> Edition, 4500 SiO <sub>2</sub> C :2017	0.5 mg/L to 100 mg/L
		Zinc as Zn	APHA 23 <sup>rd</sup> Edition, 3120B (ICP OES Method) :2017	0.5 mg/L to 1000 mg/L
		Copper as Cu	APHA 23 <sup>rd</sup> Edition, 3120B (ICP OES Method) :2017	0.05 mg/L to 100 mg/L
		Selenium as Se	APHA 23 <sup>rd</sup> Edition, 3120B (ICP OES Method) :2017	0.1 mg/L to 100 mg/L

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		Barium as Ba	APHA 23 <sup>rd</sup> Edition, 3120B (ICP OES Method) :2017	0.1 mg/L to 100 mg/L
		Mercury as Hg	APHA 23 <sup>rd</sup> Edition, 3120 B:2017	0.1 mg/L to 100 mg/L
<b>IV.</b>	<b>ATMOSPHERIC POLLUTION</b>			
<b>1.</b>	<b>Ambient Air</b>	Sulphur Dioxide	IS 5182 (Part 2) : 2001	6 µg/m <sup>3</sup> to 750 µg/m <sup>3</sup>
		Oxides of Nitrogen	IS 5182 (Part 6) : 2006	6 µg/m <sup>3</sup> to 750 µg/m <sup>3</sup>
		Repairable suspended Particulate Matter PM10	IS 5182 (Part 23) : 2006	5 µg/m <sup>3</sup> to 500 µg/m <sup>3</sup>
		Particulate Matter PM2.5	SOP based on CPCB Guideline(2012-13) HWMP/SOP/LAB-339:2018	5 µg/m <sup>3</sup> to 500 µg/m <sup>3</sup>
		Arsenic as As	SOP based on CPCB Guideline(2012-13) HWMP/SOP/LAB-343:2018	1 ng/m <sup>3</sup> to 6 ng/m <sup>3</sup>
		Nickel as Ni	SOP based on CPCB Guideline(2012-13) HWMP/SOP/LAB-343:2006	0.5 µg/m <sup>3</sup> to 50 µg/m <sup>3</sup>
		Lead as Pb	SOP based on CPCB Guideline(2012-13) HWMP/SOP/LAB-343:2006	1 µg/m <sup>3</sup> to 50 µg/m <sup>3</sup>
		Cadmium as Cd	SOP based on CPCB Guideline(2012-13) HWMP/SOP/LAB-343:2018	0.5 µg/m <sup>3</sup> to 50 µg/m <sup>3</sup>
		Zinc as Zn	SOP based on CPCB Guideline(2012-13) HWMP/SOP/LAB-343:2018	0.5 µg/m <sup>3</sup> to 50 µg/m <sup>3</sup>

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Sl.	Product / Material of Test	Specific Test Performed	Test Method Specification against which tests are performed	Range of Testing / Limits of Detection
		Chromium as Cr	SOP based on CPCB Guideline(2012-13) HWMP/SOP/LAB-343:2006	0.5 µg/m <sup>3</sup> to 50 µg/m <sup>3</sup>
<b>V.</b>	<b>SOIL AND ROCK</b>			
<b>1.</b>	<b>Clays &amp; Soils</b>	pH	IS 2720 (Part 26): 1987	2 to 13
		Conductivity	IS 14767:2000	20 µMho/cm to 10000 µMho/cm
		Moisture Content	IS 15106:2002, ISO 11465:1993	1 % to 90 %
		Cation Exchange Capacity	IS 2720 (Part XXIV) 1976	0.5 to 50 Meq/100g
		Determination of Total Kjeldhals Nitrogen	IS 14684:1999	10 mg/kg to 1000 mg/kg
		Determination of Ammonical, Nitrite and Nitrate Nitrogen	IS 14684:1999	10 mg/kg to 1000 mg/kg
		Available Nitrogen	Department of Agriculture and Cooperation Ministry of Agriculture Govt. of India:2007	10 mg/kg to 1000 mg/kg
		Determination of Soluble Sulphates (gravimetric)	IS 2720 (Part XXVII): 1977 RA1995	10 mg/kg to 5000 mg/kg
		Determination of Soluble Sulphates (Turbidometry)	IS 2720 (Part XXVII): 1977 RA1995	1 mg/kg to 50 mg/kg
		Determination of total Dissolved Solids	IS 2720 (Part XXI): 1977	10 mg/kg to 1000 mg/kg
		Available Phosphorous	Department of Agriculture and Cooperation Ministry of Agriculture Govt. of India:2007	5 mg/kg to 1000 mg/kg

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		Soluble Chlorides as Cl <sup>-</sup>	Standard methods for the examination of Water and waste water 23rd edition 4500 Cl <sup>-</sup> B:2017	10 mg/kg to 1000 mg/kg
		Available Calcium as Ca	Department of Agriculture and Cooperation Ministry of Agriculture Govt. of India:2007	10 mg/kg to 500 mg/kg
		Available Magnesium as Mg	Department of Agriculture and Cooperation Ministry of Agriculture Govt. of India:2007	10 mg/kg to 500 mg/kg
		Available Sodium as Na	Department of Agriculture and Cooperation Ministry of Agriculture Govt. of India:2007	5 mg/kg to 500 mg/kg
		Available Potassium as K	Department of Agriculture and Cooperation Ministry of Agriculture Govt. of India:2007	5 mg/kg to 500 mg/kg
		Boron as B	US department of Agriculture, Natural resource Conservation Service, National Soil Survey center:2007	2 mg/kg to 1000 mg/kg
		Iron as Fe		5 mg/kg to 1000 mg/kg
		Lead as Pb		5 mg/kg to 1000 mg/kg
		Cadmium as Cd		0.5 mg/kg to 1000 mg/kg
		Chromium as Cr		1 mg/kg to 1000 mg/kg
		Nickel as Ni		2 mg/kg to 1000 mg/kg
		Zinc as Zn		2 mg/kg to 1000 mg/kg
		Copper as Cu		2 mg/kg to 1000 mg/kg
		Manganese as Mn		2 mg/kg to 1000 mg/kg
		Selenium as Se		2 mg/kg to 1000 mg/kg
		Arsenic as As		5 mg/kg to 1000 mg/kg
		Mercury as Hg		2 mg/kg to 1000 mg/kg