

Water Test Method

Parameters	Test Methods
Physical Properties	
Color	Visual Comparison Method
Conductivity	Electrical Conductivity Method
pH	Electrometric Method
Turbidity	Nephelometric Method
Temperature	Electrometric Method
Chemical Properties	
Alkalinity (P)	Titration Method
Alkalinity (Total)	Titration Method
Hardness (Total)	EDTA Titrimetric Method
Hardness (Carbonate)	Calculation Method
Hardness (nonCarbonate)	Calculation Method
Chloride (Cl ⁻)	Argentometric Method
Sulphate (SO ₄ ⁻²)	Turbidimetric Method
Nitrate	Cadmium Reduction Method
Nitrite	Colorimetric Method
Fluoride (F)	Alizarin Photometric Method
Calcium (Ca) as hardness	EDTA Titrimetric Method
Magnesium (Mg) as hardness	Calculation Method
Iron (Fe)	Phenanthroline Method
Manganese (Mn)	Persulfate Method
Total Solids TS	Calculation Method
Total dissolved Solids TDS	Calculation Method
Suspended Solids SS	Total Suspended Solids Dried at 103-105c
Ammonia nitrogen	Preliminary Distillation Step and Colorimetric Method
Albuminoid nitrogen	Alkaline Digestion,Distillation and Colorimetric Method
DO.	Azide Modification Method
BOD.	5-day BOD Test
OC.	Permanganate Method
Heavy Metal Properties	
Arsenic (As)	Atomic Absorption Spectrometry (Hydride)
Mercury (Hg)	Atomic Absorption Spectrometry (Hydride)
Copper (Cu)	Atomic Absorption Spectrometry (Flame)
Zinc (Zn)	Atomic Absorption Spectrometry (Flame)
Cadmium (Cd)	Atomic Absorption Spectrometry (Furnace)
Chromium (Cr) Total	Atomic Absorption Spectrometry (Furnace)
Lead (Pb)	Atomic Absorption Spectrometry (Furnace)
Micro-biological Properties	
Heterotrophic Bacteria	Pour Plate Method
Total Coliform	Multiple Tube Fermentation Technique (MPN) 10 Tube
Fecal Coliform	Fecal Coliform Test (EC Medium)
E.coli	E.coli Test (Rapid Test)
Algae	Microscopic Method
Vibrio cholerae	Biochemical Test (API Test Kit)
Salmonella typhi	Biochemical Test (API Test Kit)
Shigella sonnei	Biochemical Test (API Test Kit)
Staphylococcus aureus	Biochemical Test
Clostridium perfringen	Biochemical Test
Cryptosporidium sp.	Immunofluorescence Method
Cryptosporidium sp.+ Giardia sp.	Immunofluorescence Method
Special Parameter	
Calcium (Ca)	EDTA Titrimetric Method
Magnesium (Mg)	Calculation Method
Free res. Chlorine	DPD Colorimetric Method
TOC	Heated Persulfate Oxidation
Trihalomethanes	Calculation Method (Sum of the ratio)
- chloroform	Gas Chromatographic Method (ECD)
- bromodichloromethane	Gas Chromatographic Method (ECD)
- dibromochloromethane	Gas Chromatographic Method (ECD)
- bromoform	Gas Chromatographic Method (ECD)