RAKIRO BIOTECH SYSTEMS PVT LTD
R-466, TTC Industrial Area, MIDC
Rabale, Navi Mumbai - 400701
Tel No. +91-022-47804040
Email :- sales@rakiro.net

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Type :	AQUASOL
Product Code:	AE406

PRODUCT DATA SHEET

1 INFORMATION

CODE: AE406 PARAMETER: IODINE RANGE: - 0.1 - 2.0 ppm as I2

2 METHOD

N, N-diethyl-p-phenylenediamine is used as an indicator in the titrimetric procedure with ferrous ammonium sulfate. The procedure is simplified to give only Iodine,in the absence of Chlorine and bromine . Iodine reacts with DPD indicator to produce a red colour. Results are expressed as ppm (mg/L) I2.

3 APPLICATION

Drinking Water, Mineral Water, Well Water, Swimming Pool Water, Surface and Ground Water, Aquaculture, Boiler Water, Process Water, Industrial Wastewater, Effluent Water, Cooling System Water, Chiller Water etc

4 INTERFERENCE

Many strong oxidizing agents interfere in the measurement of Bromine in DPD method. Such interference include Chlorine, chlorine dioxide, Bromine, permanganate, hydrogen peroxide, and ozone. However, the reduced form of these compounds like chloride, , manganous ion, and oxygen, in the absence of other oxidant, do not interfere. Permanganate, Mn+7, interferes positively. Nitrogen trichloride, if present may react partially as Iodine in the amperometric, DPD method. Cupric copper may interfere positively. Chromate in excess of 2 mg/l interferes with end point determination. Nitrite at concentrations up to at least 5 ppm does not interfere. Ferric iron and hydrogen peroxide at concentrations comparable to the test range do not interfere with this chemistry. Chloramines present at concentrations within the test range do not interfere significantly during Bromine analysis. Samples with extreme pHs or that are highly buffered should be adjusted to pHs of approximately 6 - 7 prior to analysis.

5 REAGENTS AND ACCESSORIES

Reagents: FC1 (1No), , ID2 (1 No.)
Accessories: 25 ml Test jar , Plastic Spoon,Procedure Label(1Nos).

6 STORAGE

The test reagents are stable up to the date stated on the pack when stored closed at ambient temperature.

7 REFERENCE

APHA Standard Methods, 22nd ed., Method 4500-Cl F – Standard Methods for Chemical Analysis of Water and Waste water.

8 DIRECTION FOR USE

1.Take 10 ml. of water sample to be tested in the test jar.
2.Add one spoonful (provided herewith) of FC 1.
3.Mix contents well to dissolve.
4.If a pink colour does not develop, iodine is not present.
5.If a pink colour appears, iodine is present.
6.Now drop wise* add ID 2 counting the number of drops while mixing, until the pink colour disappears.
Calculations:
IODINE ppm as iodine = 0.1 X (No. of drops of ID 2)
Note:
a)Once the end point (colourless) has reached, kindly ignore if the pink colour reappears after sometime.
b)Reagent FC 1 is highly sensitive to moisture,kindly close the lid of the bottle immediately after the use.
c)Ensure that only dry spoon is used to handle the FC 1 Reagent.

This Test is valid in the absence of Chlorine and Bromine in the water.