



PHOSPHONATE KIT

DROP COUNT

CODE 7530-WT-01

QUANTITY	CONTENTS	CODE
15 mL	*Hydrochloric Acid, 1.0N	*6130-E
15 mL	*Fluoride Inhibitor	*3929-E
15 mL	Sodium Thiosulfate, 0.1N	6155-E
10 g	Xylenol Orange Powder	6165-D
60 mL	Thorium Nitrate Solution	6158WT-H
1	Test Tube, 8.3 mL, plastic, w/cap	0711
1	Spoon, 0.1 g, plastic	0699
1	pH paper 1.3-4.4	2958

*WARNING: Reagents marked with an * are considered to be potential health hazards. To view or print a Safety Data Sheet (SDS) for these reagents go to www.lamotte.com. Search for the four digit reagent code number listed on the reagent label, in the contents list or in the test procedures. Omit any letter that follows or precedes the four digit code number. For example, if the code is 4450WT-H, search 4450. To obtain a printed copy, contact LaMotte by email, phone or fax.

Emergency information for all LaMotte reagents is available from Chem-Tel:
(US, 1-800-255-3924) (International, call collect, 813-248-0585).

To order individual reagents or test kit components, use the specified code number.

SHORT FORM INSTRUCTIONS

PHOSPHONATE	NaMP	AMP[NTP]	HEDP[A]	Belcor	
Sample Size	8.3 mL	8.3mL	8.3 mL	8.3 mL	
Add	+	+	+	+	
Sodium Thiosulfate (6155)	1 Drop	1 Drop	1 Drop	1 Drop	
*Flouride Inhibitor (3929)	5 Drops	5 Drops	5 Drops	5 Drops	
Xylenol Orange Reagent Powder (6165)	1 Spoon	1 Spoon	1 Spoon	1 Spoon	
*Hydrochloric Acid (6130)	Add until pH Measures 2.85				Sample will turn yellow
Thorium Nitrate (6158WT)	Add until yellow color turns pink				
Multiply By	1	0.8	0.6	0.5	Record as ppm Phosphate

PROCEDURE

1. Fill test tube (0711) to 8.3 mL line with sample water.
2. Add 1 drop of Sodium Thiosulfate, 0.1N (6155) and 5 drops of *Fluoride Inhibitor (3929). Swirl to mix.
3. Use 0.1g spoon (0699) to add one level measure of Xylenol Orange Powder (6165). Swirl until dissolved.
4. Best results are obtained in the pH range 2.5-3.0. This adjustment is made by adding *Hydrochloric Acid (6130) one drop at a time to the sample and using the pH paper (2958) to test the solution. After each addition of *Hydrochloric Acid (6130) dip a small strip of pH paper, torn from the roll, into the test solution for 5 seconds. Compare the resulting color with the color standards on the side of the pH paper container. Add *Hydrochloric Acid (6130) until the color of the pH paper matches the pH 2.8 color standard. The sample will be yellow.
5. While swirling tube, add Thorium Nitrate Solution (6158WT) one drop at a time, until yellow color changes to pink. Count the number of drops added. Hold bottle vertically.
6. Multiply the number of drops by the conversion factor from the chart below. Record as ppm Phosphonate.
7. For most accurate results, a blank should be run on a sample of the water containing no phosphonate. Any result from this blank test should be subtracted from the result recorded in Step 6.
8. This test has been calibrated for Dequest 2006. When a different compound is to be tested the amount of Thorium Nitrate Solution added should be multiplied by a conversion factor to determine ppm Phosphonate.

Phosphonates	Compound Name	Factor
Dequest 2000	AMP(NTP)	0.8
Dequest 2006	NaAMP	1.0
Dequest 2010	HEDP(A)	0.6
Belcor 575		0.5

NOTE: If any other phosphonate compound is used, the factor must be determined experimentally using standard solutions of that compound.

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