

Method Z610F – Sulphate SO₄ fresh water

Specification

Description: Test for determining the content of sulphate in fresh water
 Range: 8 - 200 mg/l
 Resolution: 2 mg/l
 Wavelength: 470 nm

Reagent set

Product Code	Description	List of components
8610	Set of reagents for method Z610F, Sulphate SO ₄ fresh water (reagents for approx. 70 tests)	<ul style="list-style-type: none"> ✓ Reagent SO₄-1 ✓ powder Reagent SO₄-2 ✓ spatula

Performing the measurement

- Select the **Z610F Sulphate SO₄ fresh water** method (Methods → Select method → Z610F Sulphate SO₄ Fresh). How to select the method, see [8.1 Choosing method](#).

NOTE:

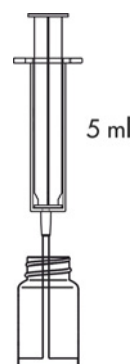
It is recommended to use the **GUIDE** system by pressing the context button **GUIDE** on the photometer. It will provide you with step-by step basic instruction how to perform measurement and a timer with beeper to count down reaction time. To enable this function press the button **GUIDE**.

- Rinse the vial and the syringe three times with the tested water.

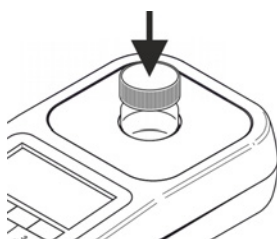
Take exactly 5 ml of the tested water with the syringe and pour into the vial.

NOTE:

Make sure no air bubbles are present in the syringe. Trapped air bubbles can affect accuracy of the measurement.



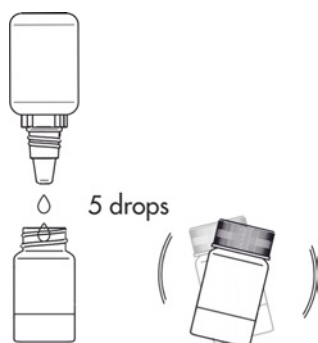
- Insert the vial into the round vial holder and press the **ZERO** key. The display will show **"-0.0-"**, which means the device is ready for measurement.



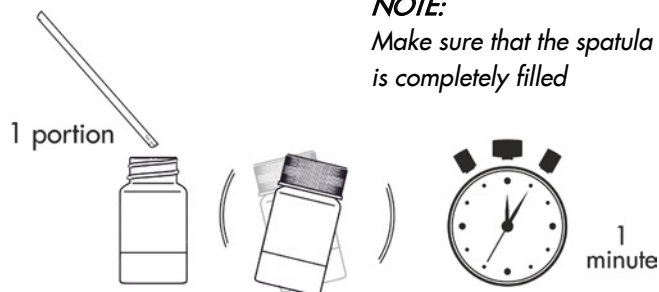
26 08 20		12:35
SO ₄	Z610F Sulphate SO ₄	tag 1
Measuring ...		
ZERO	MEAS	GUIDE

26 08 20		12:35
SO ₄	Z610F Sulphate SO ₄	tag 1
-0.0- mg/l		
ZERO	MEAS	GUIDE

4. Add 5 drops of **Reagent SO₄-1** and shake to mix.

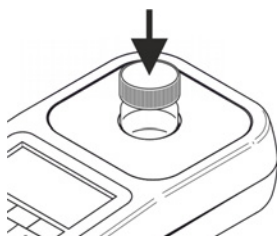


5. Add 1 portion of **powder Reagent SO₄-2** with the spatula into the vial and mix thoroughly. Before making a measurement wait exactly **1 minute**.



NOTE:
Make sure that the spatula is completely filled

6. After exactly 1 min insert the vial into the round vial holder and press the **MEAS** key to take a measurement. The result - **the concentration of sulphate** - is displayed in **mg/l (ppm)**.



26 08 20		12:36	
SO ₄	Z610F Sulphate SO4	tag 1	
Measuring ...			
ZERO	MEAS	GUIDE	

26 08 20		12:36	
SO ₄	Z610F Sulphate SO4	tag 1	
50.0 mg/l			
ZERO	MEAS	GUIDE	REC

Potential interferences

the high content of organic matter

may reduce precipitation

the high content of:

calcium (Ca) above 20 000 ppm
 manganese (Mg) above 10 000 ppm
 chloride above 40 000 ppm
 silica above 500 ppm

may interfere with the measurement