**Chloride L (A)****92****0.5 - 20 mg/l Cl⁻****CL-****Mercury Thiocyanate / Iron Nitrate**

Instrument specific information

The test can be performed on the following devices. In addition, the required cuvette and the absorption range of the photometer are indicated.

Instrument Type	Cuvette	λ	Measuring Range
MD 100, MD 110, MD 600, MD 610, MD 640, XD 7000, XD 7500	ø 24 mm	430 nm	0.5 - 20 mg/l Cl ⁻

Material

Required material (partly optional):

Reagents	Packaging Unit	Part Number
Chlorid Reagent Set	1 Set	56R018490

Application List

- Waste Water Treatment
- Cooling Water
- Drinking Water Treatment
- Raw Water Treatment
- Galvanization

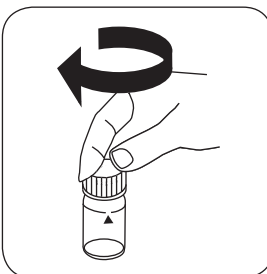
Implementation of the provision Chloride with liquid reagent

Select the method on the device

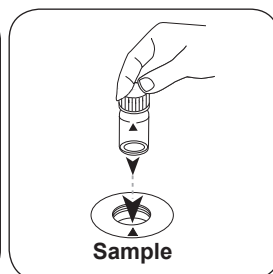
For this method, no ZERO measurements are to be carried out with the following devices: XD 7000, XD 7500



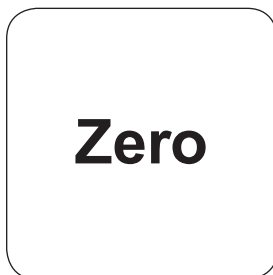
Fill 24 mm vial with **10 ml sample**.



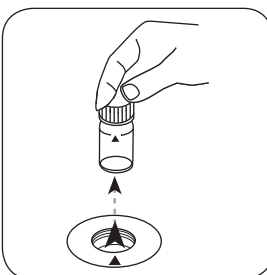
Close vial(s).



Place **sample vial** in the sample chamber. • Pay attention to the positioning.

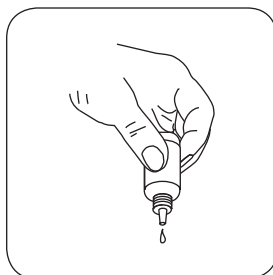


Press the **ZERO** button.

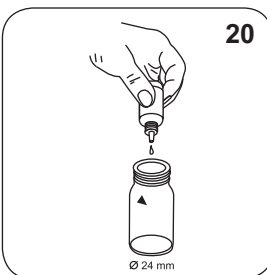


Remove the vial from the sample chamber.

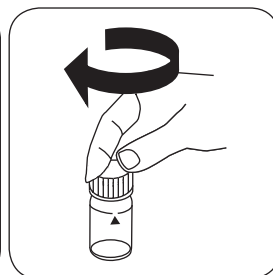
For devices that require **no ZERO measurement**, start here.



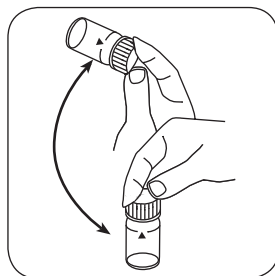
Hold cuvettes vertically and add equal drops by pressing slowly.



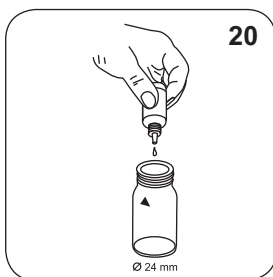
Add **20 drops KS251 (Chloride Reagent A)**.



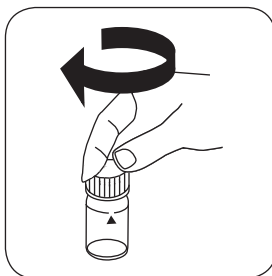
Close vial(s).



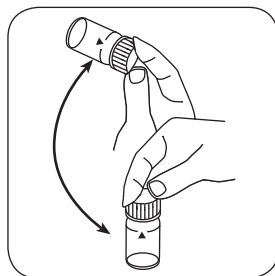
Invert several times to mix the contents.



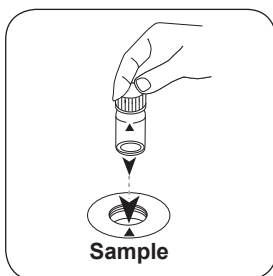
Add **20 drops KS253 (Chloride Reagent B)**.



Close vial(s).



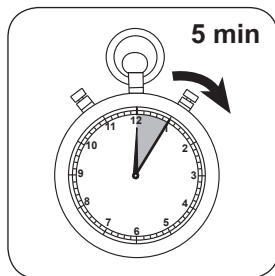
Invert several times to mix the contents.



Place **sample vial** in the sample chamber. • Pay attention to the positioning.



Press the **TEST (XD: START)** button.



Wait for **5 minute(s) reaction time**.

Once the reaction period is finished, the measurement takes place automatically.

The result in mg/l Chloride appears on the display.

Analyses

The following table identifies the output values can be converted into other citation forms.

Unit	Cite form	Scale Factor
mg/l	Cl-	1
mg/l	NaCl	1.65

Chemical Method

Mercury Thiocyanate / Iron Nitrate

Appendix

Interferences

Persistent Interferences

- 1. Individual particles are not attributable to the presence of chloride. Chloride causes an extremely fine distributed turbidity with a milky appearance. **Disturbance through heavy shaking leads to bigger sized particles, which can cause lower readings.**

Derived from

DIN 15682-D31
DIN ISO 15923-1 D49

^{a)} determination of free, combined and total | ^{b)} Reactor is necessary for COD (150 °C), TOC (120 °C) and total -chromium, - phosphate, -nitrogen, (100 °C) | ^{c)} MultiDirect: Adapter is necessary for Vacu-vials® (Order code 19 20 75) | ^{d)} Spectroquant® is a Merck KGaA Trademark | ^{e)} alternative reagent, used instead of DPD No.1/No.3 in case of turbidity in the water sample caused by high concentration of calcium and/or high conductivity | ^{f)} additionally required for determination of bromine, chlorine dioxide and ozone in the presence of chlorine | ^{g)} Reagent recovers most insoluble iron oxides without digestion | ^{h)} additionally required for samples with hardness values above 300 mg/l CaCO₃ | ⁱ⁾ high range by dilution | ^{j)} including stirring rod, 10 cm