

Metrohm Columns and their Application



Determination of disinfection by-products

Purification of drinking water is a challenge

Professional production of drinking water requires sophisticated purification. Chlorite, chlorate, and the carcinogenic bromate are by-products that are formed during the disinfection process. Their determination in the presence of the standard anions is regulated by various standards and norms, among them US-EPA 300.1 A and B, ASTM D6581-12, and DIN EN ISO 10304-4-1999.

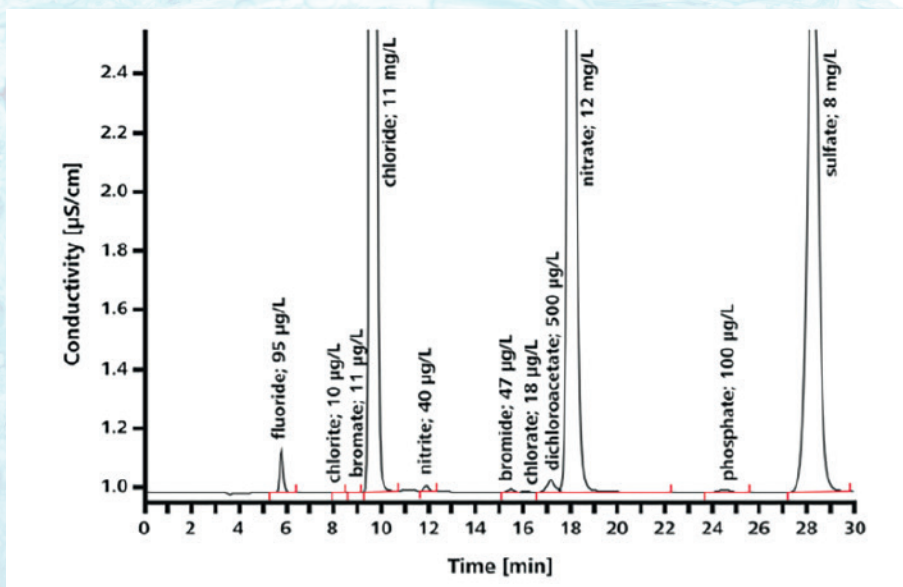
These standards and norms all describe **ion chromatography** as the analytical method of choice.



Metrosep A Supp 7

Metrosep A Supp 7 – the preferred column for drinking water purification

Metrohm offers the Metrosep A Supp 7 – 250/4.0 as the preferred column for this application. This column excels by its **outstanding separation of the oxohalides in very low concentrations from the standard anions**, which may be present in the mg/L range.



Metrosep A Supp 7 - 250 / 4.0: 3.6 mmol/L sodium carbonates, column temperature 45 °C, Sample volume 50 µL, flow 0.7 mL/min, inline ultrafiltration, sequential suppression, conductivity detector

Accuracy of results produced with the Metrosep A Supp 7

Analyte	Concentration [µg/L]	Recovering rates (%)
Chlorite	5.0	96.7
Bromate	5.0	106.1
Chlorate	5.0	99.2

Besides the oxohalides, the Metrosep A Supp 7 also enables ...

- the determination of organic acids such as glycolate, acetate, formiate, malonate, succinate, and oxalate.
- gradients to optimize applications.
- fast determination of thiosulfate, thiocyanate, and perchlorate.

Did you know that all Metrohm columns ...

- can be used with instruments from third party manufacturers as well.
- offer a wide choice of different lengths and capacities, depending on your application.
- record the number of injections and working hours of each column.
- can be used with organic modifiers such as acetone, acetonitrile, and methanol.
- offer robust Swiss Quality for a long column life.

Ordering information

- 6.1006.620** Metrosep A Supp 7 - 150/4.0
- 6.1006.630** Metrosep A Supp 7 - 250/4.0
- 6.1006.640** Metrosep A Supp 7 - 150/2.0
- 6.1006.650** Metrosep A Supp 7 - 250/2.0

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