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Test strips and test papers

pH-Fix test strips

Unmatched pH testing enjoyment

Fast results

pH-Fix test strips allow fast pH testing directly at the point of interest. The easy dip&read procedure provides a reliable result within 10 seconds. Provided with a complete high quality colour chart, pH-Fix does not need calibration and is immediately ready for use.

Patented colour fixed indicator

The patented pH-Fix technology ensures optimal usability of the test strips. During production, the indicator is fixed to the test paper. The dye does not wash out so clothes stay clean and samples remain pure.

Easy and safe

For careful testing of dangerous, poisonous or aggressive liquids, pH-Fix test strips have the optimal design. The long plastic handle effectively protects the user from contact with the sample.



PEHANON®

Ideal pH-test for coloured samples

Accurate pH-values

PEHANON® is a special pH-test strip that unifies the pH indicator and the colour chart on one strip. Any sample colour has the same effect on both, the reference colours and the reactive pad. This ensures unadulterated and accurate readings in coloured solutions.

Safe use

An invisible hydrophobic barrier just above the top colour field prevents capillary action of the test solution beyond. The handle remains dry and clean. The user is safely protected from the sample.

Economic test

PEHANON® allows the pH determination without a separate colour chart. Workers and machinists can use single strips instead of complete packs, which makes this test ideal for occasions, where many people have to perform the test in different locations.



pH Indicator papers

Standard pH-testing

pH indicator paper reels • general purpose pH-determination

pH indicator papers have been on the market for decades and are the appreciated standard for many applications. For each pH value these papers show a single colour which can be matched with the colour scale at intervals of 0.2 – 1 pH unit.

DUOTEST improved accuracy

These indicator papers show two different colours for each pH-value at intervals of 0.3 – 1 pH-unit. This allows more accurate reading and good estimation of intermediate values.

TRITEST most precise pH determination

For most precise reading, these papers show three different colours for each full pH unit. This ensures optimal colour differences and allows good estimation of intermediate values.



Test strips and test papers

QUANTOFIX® test strips

Dip & Read tests for many substances

Fast results

QUANTOFIX® tests can be used for a large variety of different substances. In most cases, an easy dip&read procedure provides reliable results in 10-120 seconds.

Easy to use

All QUANTOFIX® tests are ready to use kits. They are calibrated and contain all necessary equipment and reagents. As "lab in the pocket" they are easy to use for professional analysts as well as chemical laymen.

Precise readings

The colour charts are adjusted and checked using certified standard solutions. The user can be sure to receive accurate readings whenever he tests.

OEM-presentation

High quality products customized to your needs

Good quality – good image

Our partners highly appreciate private label products that boost the awareness for their business. The high quality of our products combined with the brand name of our partner build an invincible basis for success.

Easy creation of branded artwork

Our professional in-house design group creates private label artwork that meets and often exceeds the highest expectations. This ensures the consistent high quality of the finished goods and makes creating your own brand as easy as 1-2-3.

Successful none-compete products

We produce OEM tests for many different markets. Based on a close cooperation with our partners we convert their ideas with our underlying technology into optimum solutions. Together, we develop unique, innovative products that are highly profitable.



Test Papers

visocolor®

NANOCOLOR®

Microbiology

Medi-Test

pH indicator papers

pH-Fix

pH-Fix – Unmatched pH test strips

pH-Fix test strips are used for fast pH testing directly at the point of interest. They are **always ready for use**. Coming with a complete colour chart, they are readily calibrated.

The long plastic handle effectively protects the user from contact with the sample. This makes pH testing **easy and safe**.

For most precise pH readings, pH-Fix test strips use up to 4 different indicator dyes. The colour chart on the tube exactly matches both colour and position of the pads on the strips. This enables **highly precise** pH-determination and makes the application rapid and reliable.

The patented pH-Fix technology ensures **optimal usability** of the test strips. The indicator is firmly fixed to the test paper and does not wash out so clothes stay clean and samples remain pure.

Additional benefits of pH-Fix:

- pH-Fix enables pH-measurements even in weakly buffered solutions. The test stick is left in the sample until the colour changes no more and the final reaction colour is obtained.
- pH-Fix enables highly precise pH readings because the different colours do not mix on the strip.
- pH-Fix test strips are very sensitive. Small pH-changes down to 0.2 pH units (depending on the reference) result in a clearly visible colour change.



pH-Fix 0 – 14 PT – convenient PlopTop tubes

pH-Fix 0 – 14 PT is a new packing for pH-Fix test strips, especially developed for convenience and safety in rough everyday lab work. The PlopTop tubes are **easy to open and close**. With one push of the thumb, the cap gently opens. For optimal user convenience the tubes have a wide opening ensuring that the strips can be easily taken out. To make use easier, the tube is longer than the strips inside. This assures that the strips do not stick out or get caught between cap and tube. Closing the tubes is easy with just one push of the thumb. To ensure optimal stability in rough environments pH-Fix 0 – 14 PT comes in **virtually unbreakable** heavy-duty HDPP tubes. They guarantee a safe packing for the strips in all laboratory circumstances.

The **robust joint** that connects the cap to the tube is designed to guarantee hundreds of safe openings and closings. The PlopTop of pH-Fix 0 – 14 PT will safely remain on the tube ensuring a **safe packing** of the pH test strips.



Ordering information

Test	Gradation	REF
Classic flat box with 100 test strips 6 x 85 mm		
pH-Fix 0 – 14	0 · 1 · 2 · 3 · 4 · 5 · 6 · 7 · 8 · 9 · 10 · 11 · 12 · 13 · 14	921 10
pH-Fix 0.0 – 6.0	0 · 0.5 · 1.0 · 1.5 · 2.0 · 2.5 · 3.0 · 3.5 · 4.0 · 4.5 · 5.0 · 5.5 · 6.0	921 15
pH-Fix 2.0 – 9.0	2.0 · 2.5 · 3.0 · 3.5 · 4.0 · 4.5 · 5.0 · 5.5 · 6.0 · 6.5 · 7.0 · 7.5 · 8.0 · 8.5 · 9.0	921 18
pH-Fix 4.5 – 10.0 CE ¹⁾	4.5 · 5.0 · 5.5 · 6.0 · 6.5 · 7.0 · 7.5 · 8.0 · 8.5 · 9.0 · 9.5 · 10.0	921 20
pH-Fix 6.0 – 10.0	6.0 · 6.4 · 6.7 · 7.0 · 7.3 · 7.6 · 7.9 · 8.2 · 8.4 · 8.6 · 8.8 · 9.1 · 9.5 · 10.0	921 22
pH-Fix 7.0 – 14.0	7.0 · 7.5 · 8.0 · 8.5 · 9.0 · 9.5 · 10.0 · 10.5 · 11.0 · 11.5 · 12.0 · 12.5 · 13.0 · 13.5 · 14.0	921 25
pH-Fix 0.3 – 2.3	0.3 · 0.7 · 1.0 · 1.3 · 1.6 · 1.9 · 2.3	921 80
pH-Fix 1.7 – 3.8	1.7 · 2.0 · 2.3 · 2.6 · 2.9 · 3.2 · 3.5 · 3.8	921 90
pH-Fix 3.1 – 8.3 CE ¹⁾	3.1 · 3.5 · 3.9 · 4.3 · 4.7 · 5.1 · 5.5 · 5.9 · 6.3 · 6.7 · 7.1 · 7.5 · 7.9 · 8.3	921 35
pH-Fix 3.6 – 6.1 CE ¹⁾²⁾	3.6 · 4.1 · 4.4 · 4.7 · 5.0 · 5.3 · 5.6 · 6.1	921 30
pH-Fix 5.1 – 7.2	5.1 · 5.4 · 5.7 · 6.0 · 6.3 · 6.6 · 6.9 · 7.2	921 40
pH-Fix 6.0 – 7.7	6.0 · 6.4 · 6.7 · 7.0 · 7.3 · 7.7	921 50
pH-Fix 7.5 – 9.5	7.5 · 7.9 · 8.2 · 8.4 · 8.6 · 8.8 · 9.1 · 9.5	921 60
pH-Fix 7.9 – 9.8	7.9 · 8.3 · 8.6 · 8.9 · 9.1 · 9.4 · 9.8	921 70
PlopTop tube with 100 test strips 6 x 85 mm		
pH-Fix 0 – 14 PT	0 · 1 · 2 · 3 · 4 · 5 · 6 · 7 · 8 · 9 · 10 · 11 · 12 · 13 · 14	921 11
pH-Fix 3.6 – 6.1 PT CE ¹⁾²⁾	3.6 · 4.1 · 4.4 · 4.7 · 5.0 · 5.3 · 5.6 · 6.1	921 31

CE: CE-marked according to ¹⁾ the IVD-directive 98/79/EG ²⁾ the directive for medical products 93/42/EWG

PEHANON® – pH measurement in coloured samples

PEHANON® is a special pH-test strip that unifies the pH-indicator and the reference colours on one strip and has the following **benefits**:

Any sample colour has the same effect on both the reference colours and the reactive pad. This ensures unadulterated readings in coloured solutions. The user can be sure to get **accurate** pH-values.

An invisible hydrophobic barrier just above the top colour field prevents capillary action of the test solution beyond. The handle will remain dry and clean whatever the sample is. This makes using the strip very **safe**.

pH-values can be determined without a separate colour chart. Workers and machinists can use single strips instead of complete packs with colour chart, which makes PEHANON® **eco-nomic**.



Ordering information

Test	Gradation	Presentation	REF
PEHANON® 1 – 12	1 · 2 · 3 · 4 · 5 · 6 · 7 · 8 · 9 · 10 · 11 · 12	200 strips 11 x 100 mm	904 01
PEHANON® 0 – 1.8	0 · 0.3 · 0.6 · 0.8 · 1.0 · 1.2 · 1.5 · 1.8	200 strips 11 x 100 mm	904 11
PEHANON® 1.0 – 2.8	1.0 · 1.3 · 1.6 · 1.8 · 2.0 · 2.2 · 2.5 · 2.8	200 strips 11 x 100 mm	904 12
PEHANON® 1.8 – 3.8	1.8 · 2.1 · 2.4 · 2.7 · 3.0 · 3.2 · 3.5 · 3.8	200 strips 11 x 100 mm	904 13
PEHANON® 2.8 – 4.6	2.8 · 3.1 · 3.4 · 3.6 · 3.8 · 4.0 · 4.3 · 4.6	200 strips 11 x 100 mm	904 14
PEHANON® 3.8 – 5.5	3.8 · 4.0 · 4.2 · 4.4 · 4.6 · 4.9 · 5.2 · 5.5	200 strips 11 x 100 mm	904 15
PEHANON® 4.0 – 9.0	4.0 · 4.5 · 5.0 · 5.5 · 6.0 · 6.5 · 7.0 · 7.5 · 8.0 · 8.5 · 9.0	200 strips 11 x 100 mm	904 24
PEHANON® 5.2 – 6.8	5.2 · 5.5 · 5.7 · 5.9 · 6.1 · 6.3 · 6.5 · 6.8	200 strips 11 x 100 mm	904 16
PEHANON® 6.0 – 8.1	6.0 · 6.3 · 6.6 · 6.9 · 7.2 · 7.5 · 7.8 · 8.1	200 strips 11 x 100 mm	904 17
PEHANON® 7.2 – 8.8	7.2 · 7.4 · 7.6 · 7.8 · 8.0 · 8.2 · 8.5 · 8.8	200 strips 11 x 100 mm	904 19
PEHANON® 8.0 – 9.7	8.0 · 8.2 · 8.4 · 8.6 · 8.8 · 9.1 · 9.4 · 9.7	200 strips 11 x 100 mm	904 20
PEHANON® 9.5 – 12.0	9.5 · 10.0 · 10.5 · 11.0 · 11.5 · 12.0	200 strips 11 x 100 mm	904 21
PEHANON® 10.5 – 13.0	10.5 · 11.0 · 11.5 · 12.0 · 12.5 · 13.0	200 strips 11 x 100 mm	904 22
PEHANON® 12.0 – 14.0	12.0 · 12.5 · 13.0 · 13.5 · 14.0	200 strips 11 x 100 mm	904 23

pH indicator papers

Universal and special indicator papers

pH indicator papers – Standard for many applications

pH indicator papers have been on the market for decades and are the standard for many applications. For each pH-value these papers show a single colour which can be matched with the colour scale at intervals of 0.2 – 1 pH.

The characteristic features of pH indicator papers are:

- pH indicators are supplied in plastic reels that ensure long-term stability and protection against many external influences. The indicator paper will **always** be **ready-to-use** when needed.
- pH indicators are manufactured from high quality filter papers from MACHEREY-NAGEL. Combined with our ISO 9001 quality control scheme this ensures optimal quality. The user will always get **reliable readings**.
- The colours of the colour scales are specially mixed to perfectly match the reaction colour of the indicator papers. This makes the reading of results **easy and accurate**.



Ordering information

Test	Gradation	Presentation	REF
Universal indicator paper 1 – 11	1 · 2 · 3 · 4 · 5 · 6 · 7 · 8 · 9 · 10 · 11	reel of 5 m x 7 mm	902 01
Universal indicator paper 1 – 11	1 · 2 · 3 · 4 · 5 · 6 · 7 · 8 · 9 · 10 · 11	refill pack of 3 reels	902 02
Universal indicator paper 1 – 11	1 · 2 · 3 · 4 · 5 · 6 · 7 · 8 · 9 · 10 · 11	booklet of 100 strips 10 x 70 mm	902 03
Universal indicator paper 1 – 14	1 · 2 · 3 · 5 · 6 · 7 · 8 · 9 · 10 · 12 · 14	reel of 5 m x 7 mm	902 04
Universal indicator paper 1 – 14	1 · 2 · 3 · 5 · 6 · 7 · 8 · 9 · 10 · 12 · 14	refill pack of 3 reels	902 24
Special indicator paper 0.5 – 5.5	0.5 · 1.0 · 1.5 · 2.0 · 2.5 · 3.0 · 3.5 · 4.0 · 4.5 · 5.0 · 5.5	reel of 5 m x 7 mm	902 05
Special indicator paper 0.5 – 5.5	0.5 · 1.0 · 1.5 · 2.0 · 2.5 · 3.0 · 3.5 · 4.0 · 4.5 · 5.0 · 5.5	refill pack of 3 reels	902 25
Special indicator paper 3.8 – 5.8	< 3.8 · 3.8 · 4.1 · 4.3 · 4.5 · 4.7 · 4.9 · 5.2 · 5.5 · 5.8 · > 5.8	reel of 5 m x 7 mm	902 06
Special indicator paper 3.8 – 5.8	< 3.8 · 3.8 · 4.1 · 4.3 · 4.5 · 4.7 · 4.9 · 5.2 · 5.5 · 5.8 · > 5.8	refill pack of 3 reels	902 26
Special indicator paper 4.0 – 7.0	4.0 · 4.3 · 4.6 · 4.9 · 5.2 · 5.5 · 5.8 · 6.1 · 6.4 · 6.7 · 7.0	reel of 5 m x 7 mm	902 07
Special indicator paper 4.0 – 7.0	4.0 · 4.3 · 4.6 · 4.9 · 5.2 · 5.5 · 5.8 · 6.1 · 6.4 · 6.7 · 7.0	refill pack of 3 reels	902 27
Special indicator paper 5.4 – 7.0	< 5.4 · 5.4 · 5.7 · 6.0 · 6.2 · 6.4 · 6.7 · 7.0 · > 7.0	reel of 5 m x 7 mm	902 08
Special indicator paper 5.4 – 7.0	< 5.4 · 5.4 · 5.7 · 6.0 · 6.2 · 6.4 · 6.7 · 7.0 · > 7.0	refill pack of 3 reels	902 28
Special indicator paper 5.5 – 9.0	5.5 · 6.0 · 6.5 · 7.0 · 7.5 · 8.0 · 8.5 · 9.0	reel of 5 m x 7 mm	902 09
Special indicator paper 5.5 – 9.0	5.5 · 6.0 · 6.5 · 7.0 · 7.5 · 8.0 · 8.5 · 9.0	refill pack of 3 reels	902 29
Special indicator paper 6.4 – 8.0	< 6.4 · 6.4 · 6.6 · 6.8 · 7.0 · 7.2 · 7.4 · 7.6 · 7.8 · 8.0 · > 8.0	reel of 5 m x 7 mm	902 10
Special indicator paper 6.4 – 8.0	< 6.4 · 6.4 · 6.6 · 6.8 · 7.0 · 7.2 · 7.4 · 7.6 · 7.8 · 8.0 · > 8.0	refill pack of 3 reels	902 30
Special indicator paper 7.2 – 9.7	< 7.2 · 7.2 · 7.5 · 7.8 · 8.1 · 8.4 · 8.7 · 9.0 · 9.3 · 9.7 · > 9.7	reel of 5 m x 7 mm	902 11
Special indicator paper 7.2 – 9.7	< 7.2 · 7.2 · 7.5 · 7.8 · 8.1 · 8.4 · 8.7 · 9.0 · 9.3 · 9.7 · > 9.7	refill pack of 3 reels	902 31
Special indicator paper 8.0 – 10.0	8.0 · 8.2 · 8.4 · 8.7 · 9.0 · 9.2 · 9.6 · 10.0	reel of 5 m x 7 mm	902 12
Special indicator paper 8.0 – 10.0	8.0 · 8.2 · 8.4 · 8.7 · 9.0 · 9.2 · 9.6 · 10.0	refill pack of 3 reels	902 32
Special indicator paper 9.0 – 13.0	9.0 · 9.5 · 10.0 · 10.5 · 11.0 · 11.5 · 12.0 · 12.5 · 13.0	reel of 5 m x 7 mm	902 13
Special indicator paper 9.0 – 13.0	9.0 · 9.5 · 10.0 · 10.5 · 11.0 · 11.5 · 12.0 · 12.5 · 13.0	refill pack of 3 reels	902 33
Special indicator paper 12.0 – 14.0	12.0 · 12.5 · 13.0 · 13.5 · 14.0	reel of 5 m x 7 mm	902 14
Special indicator paper 12.0 – 14.0	12.0 · 12.5 · 13.0 · 13.5 · 14.0	refill pack of 3 reels	902 34
pH-Set U-10	box with 10 different reels of pH indicator paper (2 reels of universal indicator paper and 8 reels of different special indicator papers)		902 19
TRI-BOX	plastic dispenser with 3 reels of special indicator paper each (1 reel each of pH 0.5 – 5.5; pH 5.5 – 9.0; pH 9.0 – 13.0) and 3 colour scales		902 18

pH indicator papers DUOTEST and TRITEST

DUOTEST – double zone pH-papers

These indicator papers show two different colours for each pH-value at intervals of 0.3 – 1 pH-unit. This allows **more accurate reading** and good estimation of intermediate values.



TRITEST – triple zone pH-papers

For **most precise pH determination**, these papers show three different colours for each full pH unit. TRITEST L is specially equipped with a hydrophobic barrier between the different indicators. As the different colours will not mix, this ensures optimal usability.



Ordering information

Test	Gradation	Presentation	REF
DUOTEST 1 – 12	1 · 2 · 3 · 4 · 5 · 6 · 7 · 8 · 9 · 10 · 11 · 12	reel of 5 m x 10 mm	903 01
DUOTEST 1 – 12	1 · 2 · 3 · 4 · 5 · 6 · 7 · 8 · 9 · 10 · 11 · 12	refill pack of 3 reels	903 11
DUOTEST 1.0 – 4.3	1.0 · 1.3 · 1.6 · 1.9 · 2.2 · 2.5 · 2.8 · 3.1 · 3.4 · 3.7 · 4.0 · 4.3	reel of 5 m x 10 mm	903 02
DUOTEST 1.0 – 4.3	1.0 · 1.3 · 1.6 · 1.9 · 2.2 · 2.5 · 2.8 · 3.1 · 3.4 · 3.7 · 4.0 · 4.3	refill pack of 3 reels	903 12
DUOTEST 3.5 – 6.8	3.5 · 3.8 · 4.1 · 4.4 · 4.7 · 5.0 · 5.3 · 5.6 · 5.9 · 6.2 · 6.5 · 6.8	reel of 5 m x 10 mm	903 03
DUOTEST 3.5 – 6.8	3.5 · 3.8 · 4.1 · 4.4 · 4.7 · 5.0 · 5.3 · 5.6 · 5.9 · 6.2 · 6.5 · 6.8	refill pack of 3 reels	903 13
DUOTEST 5.0 – 8.0	5.0 · 5.3 · 5.6 · 5.9 · 6.2 · 6.5 · 6.8 · 7.1 · 7.4 · 7.7 · 8.0	reel of 5 m x 10 mm	903 04
DUOTEST 5.0 – 8.0	5.0 · 5.3 · 5.6 · 5.9 · 6.2 · 6.5 · 6.8 · 7.1 · 7.4 · 7.7 · 8.0	refill pack of 3 reels	903 14
DUOTEST 7.0 – 10.0	7.0 · 7.3 · 7.6 · 7.9 · 8.2 · 8.5 · 8.8 · 9.1 · 9.4 · 9.7 · 10.0	reel of 5 m x 10 mm	903 05
DUOTEST 7.0 – 10.0	7.0 · 7.3 · 7.6 · 7.9 · 8.2 · 8.5 · 8.8 · 9.1 · 9.4 · 9.7 · 10.0	refill pack of 3 reels	903 15
DUOTEST 9.5 – 14.0	9.5 · 10.0 · 10.5 · 11.0 · 11.5 · 12.0 · 12.5 · 13.0 · 13.5 · 14.0	reel of 5 m x 10 mm	903 06
DUOTEST 9.5 – 14.0	9.5 · 10.0 · 10.5 · 11.0 · 11.5 · 12.0 · 12.5 · 13.0 · 13.5 · 14.0	refill pack of 3 reels	903 16
pH-Set D 10	Collection of DUOTEST indicator papers (2 reels of 1 – 12; 3.5 – 6.8; 5.0 – 8.0; 7.0 – 10.0; 1 reel of 1.0 – 4.3 and 9.5 – 14.0)		903 19
TRITEST pH 1 – 11	1 · 2 · 3 · 4 · 5 · 6 · 7 · 8 · 9 · 10 · 11	reel of 5 m x 10 mm	905 01
TRITEST pH 1 – 11	1 · 2 · 3 · 4 · 5 · 6 · 7 · 8 · 9 · 10 · 11	refill pack of 3 reels	905 02
TRITEST L pH 1 – 11	1 · 2 · 3 · 4 · 5 · 6 · 7 · 8 · 9 · 10 · 11	reel of 6 m x 14 mm	905 10
TRITEST L pH 1 – 11	1 · 2 · 3 · 4 · 5 · 6 · 7 · 8 · 9 · 10 · 11	refill pack of 3 reels	905 11

pH indicator papers

Other pH indicators

UNISOL liquid indicators

UNISOL are indicator solutions that are directly applied to the sample. The resulting colour of the sample is compared to a colour chart that is included in the kit. UNISOL indicator solutions are especially **suitable for** pH measurement in **non-buffered samples** like pure water or surface water. In these samples, other indicator papers find their limit of applicability.



Ordering information

Type	Range	Gradation	Presentation	REF
UNISOL indicator solutions				
UNISOL 410	pH 4.0 – 10.0	0.5	100 ml in drop bottle, colour scale, 1 plastic cuvette MN 13/72	910 02
UNISOL 113	pH 1.0 – 13.0	1.0	100 ml in drop bottle, colour scale, 1 plastic cuvette MN 13/72	910 31
UNISOL accessories				
Plastic cuvettes MN 13/72			pack of 5	910 39

Indicator papers without colour scale

These products are simple, completely impregnated indicator papers. They indicate if the pH of solution is above or below the point of colour change. They are **useful to distinguish between acids and bases**.



Ordering information

Test	Measuring range	Colour change	Presentation	REF
Brilliant yellow paper	6.7 – 7.9	yellow → red	box of 200 strips 20 x 70 mm	907 01
Congo paper MN 816 N	5.0 – 3.0	red → blue	reel of 5 m x 7 mm	907 02
Congo paper MN 816 N	5.0 – 3.0	red → blue	refill pack of 3 reels	907 03
Congo paper MN 616 T	5.0 – 3.0	red → blue	box of 200 strips 20 x 70 mm	907 04
Congo paper MN 260 HE	5.0 – 3.0	red → blue	box of 200 strips 20 x 70 mm	907 05
Litmus paper blue	8.0 – 5.0	blue → red	reel of 5 m x 7 mm	911 06
Litmus paper blue	8.0 – 5.0	blue → red	refill pack of 3 reels	911 16
Litmus paper blue	8.0 – 5.0	blue → red	booklet of 100 strips 10 x 70 mm	911 26
Litmus paper neutral	5.0 – 8.0	red ← violet → blue	reel of 5 m x 7 mm	911 07
Litmus paper neutral	5.0 – 8.0	red ← violet → blue	refill pack of 3 reels	911 17
Litmus paper neutral	5.0 – 8.0	red ← violet → blue	booklet of 100 strips 10 x 70 mm	911 27
Litmus paper red	5.0 – 8.0	red → blue	reel of 5 m x 7 mm	911 08
Litmus paper red	5.0 – 8.0	red → blue	refill pack of 3 reels	911 18
Litmus paper red	5.0 – 8.0	red → blue	booklet with 100 strips 10 x 70 mm	911 28
Nitrazine yellow paper	6.0 – 7.0	yellow → violet-blue	box of 200 strips 20 x 70 mm	907 11
Phenolphthalein paper	8.3 – 10.0	white → red	roll of 5 m x 7 mm	907 12
Phenolphthalein paper	8.3 – 10.0	white → red	refill pack of 3 reels	907 13

Test strips for semi-quantitative determinations

Description of individual parameters and tests

QUANTOFIX® · Dip & Read Tests for many substances

- **quick** Dip & Read procedure provides results in a few seconds.
- **easy** QUANTOFIX® test kits come with all necessary equipment and reagents. They are easy to use for professional analysts as well as chemical laymen.
- **reliable** All colour charts are adjusted and checked using certified standard solutions. This ensures accurate results for every measurement.



QUANTOFIX® test strips · Ordering information

Test	Gradation	REF
QUANTOFIX® Aluminium ¹⁾	0 · 5 · 20 · 50 · 200 · 500 mg/l Al ³⁺	913 07
QUANTOFIX® Ammonium ¹⁾	0 · 10 · 25 · 50 · 100 · 200 · 400 mg/l NH ₄ ⁺	913 15
QUANTOFIX® Arsenic 10 ¹⁾	0 · 0.01 · 0.025 · 0.05 · 0.1 · 0.5 mg/l As ^{3+/5+}	913 34
QUANTOFIX® Arsenic 50 ¹⁾	0 · 0.05 · 0.1 · 0.5 · 1.0 · 1.7 · 3.0 mg/l As ^{3+/5+}	913 32
QUANTOFIX® Ascorbic acid	0 · 50 · 100 · 200 · 300 · 500 · 1000 · 2000 mg/l vitamin C	913 14
QUANTOFIX® Calcium ¹⁾	0 · 10 · 25 · 50 · 100 mg/l Ca ²⁺	913 24 ²⁾
QUANTOFIX® Carbonate hardness	0 · 3 · 6 · 10 · 15 · 20 °d	913 23
QUANTOFIX® Chloride	0 · 500 · 1000 · 1500 · 2000 · ≥ 3000 mg/l Cl ⁻	913 21
QUANTOFIX® Chlorine ¹⁾	0 · 1 · 3 · 10 · 30 · 100 mg/l Cl ₂	913 17
QUANTOFIX® Chlorine Sensitive CE	0 · 0.1 · 0.5 · 1 · 3 · 10 mg/l Cl ₂	NEW! 913 39
QUANTOFIX® Chromate ¹⁾	0 · 3 · 10 · 30 · 100 mg/l CrO ₄ ²⁻	913 01
QUANTOFIX® Cobalt	0 · 10 · 25 · 50 · 100 · 250 · 500 · 1000 mg/l Co ²⁺	913 03
QUANTOFIX® Copper	0 · 10 · 30 · 100 · 300 mg/l Cu ⁺²⁺	913 04
QUANTOFIX® Cyanide ¹⁾	0 · 1 · 3 · 10 · 30 mg/l CN ⁻	913 18
QUANTOFIX® EDTA	0 · 100 · 200 · 300 · 400 mg/l EDTA	913 35
QUANTOFIX® Formaldehyde ¹⁾	0 · 10 · 20 · 40 · 60 · 100 · 200 mg/l HCHO	913 28
QUANTOFIX® Glutaraldehyde CE	0 · 0.5 · 1 · 1.5 · 2 · 2.5 % Glutaraldehyde	NEW! 913 43
QUANTOFIX® Iron 100 ¹⁾	0 · 2 · 5 · 10 · 25 · 50 · 100 mg/l Fe ^{2+/3+}	913 08
QUANTOFIX® Iron 1000 ¹⁾	0 · 5 · 20 · 50 · 100 · 250 · 500 · 1000 mg/l Fe ^{2+/3+}	913 02
QUANTOFIX® Lubricheck	0 · 15 · 50 · 75 · 130 · 200 mmol/l KOH	913 36
QUANTOFIX® Molybdenum ¹⁾	0 · 5 · 20 · 50 · 100 · 250 mg/l Mo ⁶⁺	913 25
QUANTOFIX® Nickel	0 · 10 · 25 · 50 · 100 · 250 · 500 · 1000 mg/l Ni ²⁺	913 05
QUANTOFIX® Nitrate/Nitrite	0 · 10 · 25 · 50 · 100 · 250 · 500 mg/l NO ₃ ⁻ 0 · 1 · 5 · 10 · 20 · 40 · 80 mg/l NO ₂ ⁻	913 13
QUANTOFIX® Nitrite	0 · 1 · 5 · 10 · 20 · 40 · 80 mg/l NO ₂ ⁻	913 11
QUANTOFIX® Nitrite 3000	0 · 0.1 · 0.3 · 0.6 · 1 · 2 · 3 g/l NO ₂ ⁻	913 22
QUANTOFIX® Nitrite/pH	0 · 1 · 5 · 10 · 20 · 40 · 80 mg/l NO ₂ ⁻ pH 6.0 · 6.4 · 6.7 · 7.0 · 7.3 · 7.6 · 7.9 · 8.2 · 8.4 · 8.6 · 8.8 · 9.0 · 9.3 · 9.6	913 38
QUANTOFIX® Peracetic acid 50 CE	0 · 5 · 10 · 20 · 30 · 50 mg/l Peracetic acid	NEW! 913 40
QUANTOFIX® Peracetic acid 500 CE	0 · 50 · 100 · 200 · 300 · 400 · 500 mg/l Peracetic acid	NEW! 913 41
QUANTOFIX® Peracetic acid 2000 CE	0 · 500 · 1000 · 1500 · 2000 mg/l Peracetic acid	NEW! 913 42
QUANTOFIX® Peroxide 25	0 · 0.5 · 2 · 5 · 10 · 25 mg/l H ₂ O ₂	913 19
QUANTOFIX® Peroxide 100 CE	0 · 1 · 3 · 10 · 30 · 100 mg/l H ₂ O ₂	913 12
QUANTOFIX® Peroxide 1000	0 · 50 · 150 · 300 · 500 · 800 · 1000 mg/l H ₂ O ₂	913 33
QUANTOFIX® Phosphate ¹⁾	0 · 3 · 10 · 25 · 50 · 100 mg/l PO ₄ ³⁻	913 20
QUANTOFIX® Potassium ¹⁾	0 · 200 · 400 · 700 · 1000 · 1500 mg/l K ⁺	913 16
QUANTOFIX® QUAT	0 · 10 · 25 · 50 · 100 · 250 · 500 · 1000 mg/l Benzalkonium-chloride	913 37
QUANTOFIX® Suphate	< 200 · > 400 · > 800 · > 1200 · > 1600 mg/l SO ₄ ²⁻	913 29
QUANTOFIX® Sulphite	0 · 10 · 25 · 50 · 100 · 250 · 500 · 1000 mg/l SO ₃ ²⁻	913 06
QUANTOFIX® Tin	0 · 10 · 25 · 50 · 100 · 250 · 500 mg/l Sn ²⁺	913 09
QUANTOFIX® Zinc ¹⁾	0 · 2 · 5 · 10 · 25 · 50 · 100 mg/l Zn ²⁺	913 10
QUANTOFIX® for aquarium owners	0 · 5 · 10 · 15 · 20 · 25 °d total hardness 0 · 3 · 6 · 10 · 15 · 20 °d carbonate hardness pH 6.4 · 6.8 · 7.2 · 7.6 · 8.0 · 8.4	913 26 913 27 ³⁾

Presentation: Container with 100 test strips 6 x 95 mm

¹⁾ The tests are supplied complete with all reagents required for the determination

²⁾ Presentation: Container with 60 test strips

³⁾ Presentation: Container with 25 test strips

CE: CE-marked according to the directive for medical products 93/42/EWG

Test strips for semi-quantitative determinations

Description of individual parameters and tests

QUANTOFIX® Aluminium

REF 913 07

This test allows the quick and easy determination of aluminium in solutions. It comes with all necessary reagents so that the measurement can be started immediately. A reliable result is obtained within 2 minutes.

Aluminium is the third most abundant element in the Earth's crust. In nature, aluminium only occurs in chemical compounds. In early stages of water treatment, aluminium compounds called alums are used as coagulation aids.

QUANTOFIX® Aluminium is used to check the integrity of the filtering system.

Type:	test strips and reagents
Range:	0 · 5 · 20 · 50 · 200 · 500 mg/l Al ³⁺
Sufficient for:	100 tests
Shelf life:	at least 2.5 years after production
Colour change:	pink → red

QUANTOFIX® Ammonium

REF 913 15

This test allows the quick and easy determination of ammonium in solutions. It comes with all necessary reagents so that the measurement can be started immediately. A reliable result is obtained within 10 seconds.

In nature, ammonia results from the biological decay of plant and animal matter. High concentrations can be found in rural, farming areas where fertilizers are regularly used. Also, industrial effluents may contain ammonia in higher levels. Ammonia itself is relatively harmless. Depending on the pH, however, part of the ammonium is transformed to the aggressive NH₃-gas, which is poisonous to aquatic life. Ammonium levels > 1 mg/l are not suitable for fish.

As an indicator for decomposition of animal or vegetable substances, control of ammonium is also important for the water supply.

Type:	test strips and reagents
Range:	0 · 10 · 25 · 50 · 100 · 200 · 400 mg/l NH ₄ ⁺
Sufficient for:	100 tests
Shelf life:	at least 2.5 years after production
Colour change:	bright yellow → orange

QUANTOFIX® Arsenic 10

REF 913 34

This test allows the quick and easy determination of arsenic in solutions. It comes with all necessary reagents so that the measurement can be started immediately. A reliable result is obtained within 30 minutes.

As a naturally occurring element, arsenic is widely distributed in the Earth's crust. In the natural environment it is most frequently present as inorganic arsenic compound in combination with sulphur or oxygen. Organic arsenic compounds can be used as pesticides.

Arsenic is toxic and causes skin diseases, keratosis and melanoma. Therefore, arsenic levels in drinking water have to be monitored thoroughly.

The WHO recommends a threshold value for drinking water of 0.01 mg/l. This concentration can reliably be monitored with QUANTOFIX® Arsenic 10.

Type:	test strips and reagents
Range:	0.01 · 0.025 · 0.05 · 0.1 · 0.5 mg/l As ^{3+/5+}
Sufficient for:	100 tests
Shelf life:	at least 2.5 years after production
Colour change:	white → yellow-brown

QUANTOFIX® Arsenic 50

REF 913 32

Similar to QUANTOFIX® Arsenic 10 but different range.

Type:	test strips and reagents
Range:	0 · 0.05 · 0.1 · 0.5 · 1.0 · 1.7 · 3.0 mg/l As ^{3+/5+}
Sufficient for:	100 tests
Shelf life:	at least 2.5 years after production
Colour change:	white → yellow-brown



QUANTOFIX® Ascorbic acid

REF 913 14

This test strip is for the rapid and reliable determination of ascorbic acid in food. The easy dip-and-read-procedure provides a reliable result within 30 seconds.

Ascorbic acid or vitamin C is naturally found in many foods and vegetables. It is also added to juices or fruits as stabilizing and reducing agent. QUANTOFIX® Ascorbic acid allows the quick and easy determination of vitamin C in fruit juices as well as on fresh cut surfaces of fruits and vegetables.

Type:	test strips
Range:	0 · 50 · 100 · 200 · 300 · 500 · 1000 · 2000 mg/l vitamin C
Sufficient for:	100 tests
Shelf life:	at least 2.5 years after production
Colour change:	yellow → green-blue

QUANTOFIX® Calcium

REF 913 24

This test allows the quick and easy determination of calcium in solutions. The kit contains with all necessary reagents so that the measurement can be started immediately. A reliable result is obtained within 1 minute.

Calcium is an important element in nutrition and is therefore tested in foodstuff. It is essential for the building of human bones. Lack of calcium in the daily diet may lead to osteoporosis. The recommended consumption is about 1000 mg/day

In combination with magnesium, calcium is responsible for water hardness (details see under total hardness).

Type:	test strips and reagents
Range:	0 · 10 · 25 · 50 · 100 mg/l Ca ²⁺
Sufficient for:	60 tests
Shelf life:	at least 2.5 years after production
Colour change:	yellow → red

Test strips for semi-quantitative determinations

Description of individual parameters and tests

QUANTOFIX® Carbonate Hardness

REF 913 23

This test strip is for the fast and reliable determination of alkalinity or carbonate hardness in water. The easy dip-and-read-procedure provides a reliable result within 30 seconds.

Carbonate hardness or alkalinity is a measure for the water's pH-buffer capacity. If the carbonate hardness is higher, addition of acids or bases will have a lower influence on the resulting pH. Sudden and rapid pH-changes of the water are avoided.

QUANTOFIX® Carbonate hardness is used for the quick and easy control of water in swimming pools and aquariums.

Type:	test strips
Range:	0 · 3 · 6 · 10 · 15 · 20 °d
Sufficient for:	100 tests
Shelf life:	at least 2.5 years after production
Colour change:	bright green → blue



QUANTOFIX® Chloride

REF 913 21

This test strip is for the fast and reliable determination of chloride in solutions. The easy dip-and-read-procedure provides a reliable result within 1 minute.

Chloride ions occur in all natural waters. Their concentration depends on the geological and local situation. In waste waters and polluted rivers the chloride concentration can reach high values. In combination with sodium, chloride forms NaCl or table salt.

Type:	test strips
Range:	0 · 500 · 1000 · 1500 · 2000 · ≥ 3000 mg/l Cl ⁻
Sufficient for:	100 tests
Shelf life:	at least 2.5 years after production at 2 – 8 °C
Colour change:	brown → yellow

QUANTOFIX® Chlorine

REF 913 17

This test allows the quick and easy determination of chlorine in solutions. It comes with all necessary reagents so that the measurement can be started immediately. A reliable result is obtained within 1 minute.

Chlorine is widely used for disinfection of swimming pools, water mains and water reservoirs. Dosed correctly, harmful microorganisms are safely destroyed, many impurities removed and the growth of algae is prevented. Electroplaters use chlorine for the detoxification of cyanide-containing waste.

Regular checking of the chlorine concentration is essential to keep it at the desired level. Excessive chlorine not only impairs the smell and taste of water but can also be hazardous.

In water chlorine occurs either free or bound for example as chloramines. Total chlorine is the sum of both levels.

For the sensitive determination of chlorine in swimming pool we recommend our swimming pool tests (s. page 34)

Type:	test strips and reagents
Range:	0 · 1 · 3 · 10 · 30 · 100 mg/l Cl ₂
Sufficient for:	100 tests
Shelf life:	at least 2.5 years after production
Colour change:	white → red-violet

QUANTOFIX® Chlorine Sensitive

REF 913 39

This test allows the quick and easy detection of low levels of total Chlorine (total chloramines). The easy dip-and-read procedure provides reliable results within 30 sec.

In dialysis centres QUANTOFIX® Chlorine Sensitive is used to check feed water. Low levels of total chlorine (total chloramines) are necessary to ensure optimal function of further water purification such as reversed osmosis. It also provides a fast and convenient means to test for residual chlorine in rinse water after disinfection.

Type:	test strips
Range:	0 · 0.1 · 0.5 · 1 · 3 · 10 mg/l Cl ₂
Sufficient for:	100 tests
Shelf life:	at least 2.5 years after production
Colour change:	yellow → violett

NEW!

QUANTOFIX® Chromate

REF 913 01

This test allows the quick and easy determination of chromate in solutions. It includes all necessary reagents so that the measurement can be started immediately. A reliable result is obtained within 30 seconds.

Many chromate compounds are poisonous and carcinogenic. They are used for example in chrome plating and tanning. QUANTOFIX® Chromate is used for the easy monitoring of water discharged from such plants.

Type:	test strips and reagents
Range:	0 · 3 · 10 · 30 · 100 mg/l CrO ₄ ²⁻
Sufficient for:	100 tests
Shelf life:	at least 2 years after production
Colour change:	white → violet

Test strips for semi-quantitative determinations

Description of individual parameters and tests

QUANTOFIX® Cobalt

REF 913 03

This test strip is for the fast and reliable determination of cobalt in solutions. The easy dip-and-read-procedure provides a reliable result within 20 seconds.

Cobalt is also used for metal alloys and can in other compounds be part of catalysts. QUANTOFIX® Cobalt is used to monitor waste water and for non-destructive testing of materials.

Type: test strips
Range: 0 · 10 · 25 · 50 · 100 · 250 · 500 · 1000 mg/l Co^{2+}
Sufficient for: 100 tests
Shelf life: at least 2.5 years after production
Colour change: white → green-blue

QUANTOFIX® Copper

REF 913 04

This test strip is for the fast and reliable determination of copper in solutions. The easy dip-and-read-procedure provides a reliable result within 20 seconds.

Copper or copper-compounds are used for electroplating processes, the production of water pipes etc. QUANTOFIX® Copper is used for the quick and easy monitoring of electroplating solutions, waste water, tap water and in many other applications.

Type: test strips
Range: 0 · 10 · 30 · 100 · 300 mg/l Cu^{+2+}
Sufficient for: 100 tests
Shelf life: at least 2.5 years after production
Colour change: white → red-violet

QUANTOFIX® Cyanide

REF 913 18

This test allows the quick and easy determination of cyanide in solutions. It includes all necessary reagents so that the measurement can be started immediately. A reliable result is obtained within 3 minutes.

Cyanide is extremely poisonous. The lethal dose is 1 mg/kg weight. Careful control of the cyanide concentration is therefore essential, whenever cyanides are used for industrial processes like for example electroplating or gold-mining. Cyanide control is also important during the production of fruit-brandies made from stone fruits.

Type: test strips and reagents
Range: 0 · 1 · 3 · 10 · 30 mg/l CN^-
Sufficient for: 100 tests
Shelf life: at least 2.5 years after production
Colour change: white → violet

QUANTOFIX® EDTA

REF 913 35

This test strip is for the fast and reliable determination of EDTA, NTA and other complexing agents in solutions. The easy dip-and-read-procedure provides a reliable result within 15 seconds.

Complexing agents like EDTA (Ethylenediaminetetraacetate) or NTA (Nitrilotriacetic acid) have replaced phosphates as additives in washing and cleaning solutions. QUANTOFIX® EDTA is therefore ideal to check the concentration of washing and cleaning solutions.

In proteomics labs EDTA is also used to regenerate Ni- and Co-precharged chromatography columns (FPLC columns) which are used to purify recombinant proteins. Prior to the successive analysis, QUANTOFIX® EDTA is used to control if EDTA has completely rinsed out. This may dramatically reduce the rinse time and therefore increase the throughput and the capacity.

The following complexing agents can also be determined: nitrilotriacetic acid (NTA), cyclohexanedinitrilo-(1,2)-tetraacetic acid, diethyltrinitrilo-pentaacetic acid, bis(aminoethyl) glykol-ether-N,N,N',N'-tetraacetic acid.

Conversion factor: 1 mg/l EDTA = 0.7 mg/l NTA

Type: test strips
Range: 0 · 100 · 200 · 300 · 400 mg/l EDTA
Sufficient for: 100 tests
Shelf life: at least 2.5 years after production
Colour change: red → yellow

QUANTOFIX® Formaldehyde

REF 913 28

This test allows the quick and easy determination of formaldehyde. It comes with all necessary reagents so that the measurement can be started immediately. A reliable result is obtained within 1 minute.

Formaldehyde is used for a large variety of products, ranging from shampoo to clothes. In large quantities it is used as raw material in the chemical industry. Formaldehyde is poisonous and can cause allergic reactions as well as irritations of skin, eyes and air passages. If such reactions are observed after contact with suspicious substances it may be useful to control the formaldehyde concentration.

In closed cooling or heating circuits formaldehyde is used as biocide. Here, QUANTOFIX® Formaldehyde serves to easily monitor the system

Type: test strips and reagents
Range: 0 · 10 · 20 · 40 · 60 · 100 · 200 mg/l HCHO
Sufficient for: 100 tests
Shelf life: at least 2.5 years after production
Colour change: beige → blue-violet



Test strips for semi-quantitative determinations

Description of individual parameters and tests

QUANTOFIX® Glutaraldehyde

REF 913 43

This test strip is for the fast and reliable determination of glutaraldehyde in solutions. The easy dip-and-read procedure provides reliable results in 20 seconds.

Glutaraldehyde is a strong disinfectant. It is, for example, often used in healthcare and medical engineering to disinfect surgical instruments and equipment. QUANTOFIX® Glutaraldehyde allows to check whether the Glutaraldehyde concentration is sufficient for proper disinfection. Thus, a safe disinfection is ensured.

Type: test strips
Range: 0 · 0.5 · 1 · 1.5 · 2 · 2.5 %
Glutaraldehyde
Sufficient for: 100 determinations
Shelf life: at least 2.5 years after production
Colour change: bright orange → magenta

NEW!

QUANTOFIX® Iron 1000

REF 913 02

This test allows the quick and easy determination of Iron in solutions. It includes all necessary reagents so that the measurement can be started immediately. A reliable result is obtained within 1 minute.

Iron is frequently used for water pipes and vessels in industrial applications. Therefore, dissolved iron in process water is an important indicator of the level of corrosion. In drinking water, dissolved iron is not desirable as it leads to a brown colour and a foul taste.

Type: test strips and reagents
Range: 0 · 5 · 20 · 50 · 100 · 250 · 500 · 1000 mg/l $\text{Fe}^{2+}/\text{Fe}^{3+}$
Sufficient for: 100 tests
Shelf life: at least 2.5 years after production
Colour change: white → dark red

QUANTOFIX® Iron 100

REF 913 08

Similar to QUANTOFIX® Iron 1000 but different range.

Type: test strips and reagents
Range: 0 · 2 · 5 · 10 · 25 · 50 · 100 mg/l $\text{Fe}^{2+}/\text{Fe}^{3+}$
Sufficient for: 100 tests
Shelf life: at least 2.5 years after production
Colour change: white → blue-violet

QUANTOFIX® LubriCheck

REF 913 36

Using this test strip the concentration of cooling lubricants can quickly be determined. The easy dip-and-read-procedure provides a reliable result within 1 minute.

Cooling lubricants are used when metal parts are being machined (drilling, cutting...). Using QUANTOFIX® LubriCheck the concentration of the cooling lubricant can easily be checked on the spot. This ensures optimal cooling and lubrication and at the same time optimal quality of the work piece. The measurement with QUANTOFIX® LubriCheck is rapid and reliable and can easily be performed by chemically untrained persons. Other methods used so far either require sensitive instruments (measurement of the refraction index) or have to be performed in the laboratory (determination after digestion).

The concentration is detected and given as mmol KOH/l. Using a factor the result can easily be transferred to the concentration of the cooling lubricant.

Type: test strips
Range: 0 · 15 · 50 · 75 · 130 · 200 mmol/l KOH
Sufficient for: 100 tests
Shelf life: at least 2.5 years after production
Colour change: yellow → blue



QUANTOFIX® Molybdenum

REF 913 25

This test allows the quick and easy determination of molybdenum in solutions. It includes all necessary reagents so that the measurement can be started immediately. A reliable result is obtained within 1 minute.

Molybdenum tests are mainly used for coolant water and boiler feed water. Here, molybdenum salts act as corrosion inhibitors, either directly or as part of an anticorrosive additive. The careful control of the molybdenum level is important to ensure optimal corrosion prevention. Also, the level of the anticorrosive additive can be easily controlled.

Type: test strips and reagents
Range: 0 · 5 · 20 · 50 · 100 · 250 mg/l Mo^{6+}
Sufficient for: 100 tests
Shelf life: at least 2.5 years after production
Colour change: white → green

Test strips for semi-quantitative determinations

Description of individual parameters and tests

QUANTOFIX® Nickel

REF 913 05

This test strip is for the fast and reliable determination of nickel in solutions. The easy dip-and-read-procedure provides a reliable result within 30 seconds.

Nickel is used in metal plating processes and for metal alloys. Metal parts that come into contact with skin are tested with QUANTOFIX® Nickel to prevent allergic reactions. The test is also used for the easy monitoring of electroplating solutions and industrial waste water.

Type: test strips
Range: 0 · 10 · 25 · 50 · 100 · 250 · 500 · 1000 mg/l Ni²⁺
Sufficient for: 100 tests
Shelf life: at least 2.5 years after production
Colour change: white → bright red

QUANTOFIX® Nitrate/Nitrite

REF 913 13

This test strip is for the fast and reliable determination of nitrate and nitrite in solutions. The easy dip-and-read-procedure provides a reliable result within 1 minute.

Nitrite is an undesired byproduct in cooling lubricants. It allows the formation of carcinogenic compounds. Cooling lubricants are therefore regularly tested for nitrite.

In natural and drinking water nitrite can lead to infant mortality and kill aquatic life. The EPA primary drinking water standard is 1 mg/l.

Nitrate is a byproduct of biological decay from plant and animal matter. High concentrations can be found in rural, farming areas where fertilizers are regularly used. Also, industrial effluents may contain nitrate in higher levels. The EU threshold value is 50 mg/l and can safely controlled with QUANTOFIX® Nitrate/Nitrite. Farmers use this test to control the nitrogen content in soil to estimate the amount of fertilizer needed. In ponds and aquariums nitrate is often tested instead of ammonium to control the water quality.

Type: test strips
Range: 0 · 10 · 25 · 50 · 100 · 250 · 500 mg/l NO₃⁻
0 · 1 · 5 · 10 · 20 · 40 · 80 mg/l NO₂⁻
Sufficient for: 100 tests
Shelf life: at least 2.5 years after production
Colour change: white → red-violet

QUANTOFIX® Nitrite

REF 913 11

Similar to QUANTOFIX® Nitrate/Nitrite but only the nitrite test.

Type: test strips
Range: 0 · 1 · 5 · 10 · 20 · 40 · 80 mg/l NO₂⁻
Sufficient for: 100 tests
Shelf life: at least 2.5 years production
Colour change: white → red-violet

QUANTOFIX® Nitrite 3000

REF 913 22

Similar to QUANTOFIX® Nitrate/Nitrite but only the nitrite test and different range.

Type: test strips
Range: 0 · 0.1 · 0.3 · 0.6 · 1 · 2 · 3 g/l NO₂⁻
Sufficient for: 100 tests
Shelf life: at least 2.5 years after production
Colour change: yellow → red

QUANTOFIX® Nitrite / pH

REF 913 38

This test allows the quick and easy determination of nitrite and pH in cooling lubricants. The easy dip-and-read-procedure provides a reliable result within 1 minute.

When metal parts are machined (drilling, cutting...) cooling lubricants or coolants are indispensable to guarantee the quality of the work piece as well as the lifetime of the machines.

QUANTOFIX® Nitrite / pH is for the rapid and reliable control of two important parameters in cooling lubricants.

The Nitrite test is an indicator for bacterial growth in the cooling lubricant cycle. It allows early counteractive measures and therefore increases the lifetime of the cooling lubricant. Thus, significant cost savings are possible.

A weekly determination of the nitrite concentration is also recommended to protect workers from carcinogenic nitrosamine. High levels of nitrite in the cooling lubricant foster the formation of this carcinogenic compound.

The pH-test is specially optimized for the demands of cooling lubricant analysis. Short testing cycles allow an early detection of pH changes. Counteractive measures can be performed to keep the pH at the optimal level. This ensures optimal protection against corrosion, inhibits bacterial growth and therefore reduces maintenance costs.

Type: test strips
Range: 0 · 1 · 5 · 10 · 20 · 40 · 80 mg/l NO₂⁻
pH 6.0 · 6.4 · 6.7 · 7.0 · 7.3 · 7.6 · 7.9 · 8.2 · 8.4 · 8.6 · 8.8 · 9.0 · 9.3 · 9.6
Sufficient for: 100 tests
Shelf life: at least 2.5 years after production
Colour change: white → red-violet (NO₂⁻)
yellow/orange → violet/red (pH)



Test strips for semi-quantitative determinations

Description of individual parameters and tests

QUANTOFIX® Peracetic acid 50

REF 913 40

This test strip is for the fast and reliable determination of Peracetic acid in solutions. The easy dip-and-read procedure provides safe results within 30 seconds.

Peracetic acid is a popular and widely used disinfectant. It is, for example, frequently used to disinfect packages in the beverage industry. After disinfection, packages are rinsed to wash out any remaining disinfectant. QUANTOFIX® Peracetic acid can check quickly and easily, if the disinfectant has been removed completely.

QUANTOFIX® Peracetic acid is specific to Peracetic acid and does not, when adhering to the testing procedures, yield results for hydrogen peroxide.

Type: test strips
Range: 5 · 10 · 20 · 30 · 50 mg/l peracetic acid
Sufficient for: 100 tests
Shelf life: at least 2.5 years after production
Colour change: white → blue

NEW!



QUANTOFIX® Peracetic acid 500

REF 913 41

Similar to QUANTOFIX® Peracetic acid 50 but different range.

Type: test strips
Range: 0 · 50 · 100 · 200 · 300 · 400 · 500 mg/l peracetic acid
Sufficient for: 100 tests
Shelf life: at least 2.5 years after production
Colour change: yellow → green

NEW!

QUANTOFIX® Peracetic acid 2000

REF 913 42

Similar to QUANTOFIX® Peracetic acid 50 but different range.

Type: test strips
Range: 0 · 500 · 1000 · 1500 · 2000 mg/l peracetic acid
Sufficient for: 100 tests
Shelf life: at least 2.5 years after production
Colour change: bright yellow → red

NEW!

QUANTOFIX® Peroxide 25

REF 913 19

This test strip is for the fast and reliable determination of Peroxide in solutions. The easy dip-and-read-procedure provides a reliable result within 15 seconds.

Hydrogen Peroxide (H₂O₂) is one of the most powerful oxidizers known. Its disinfectant capabilities are higher than for Chlorine (Cl₂) or Chlorine dioxide (ClO₂). It is extensively used in the food and dairy industries. Here, peroxide tests are used to ensure that residual peroxide sanitizer has been fully purged from packages prior to the filling. This guarantees that the product has the optimal quality and is free from peroxide.

In chemical laboratories QUANTOFIX® Peroxide 100 is used to check organic solvents, because peroxide containing solvents may explode when heated. Moisten the test pad with the solvent and allow it to dry. After drying, add a drop of distilled water to the test pad. If the test pad remains white the solvent is free of peroxides and can safely be used.

Type: test strips
Range: 0 · 0.5 · 2 · 5 · 10 · 25 mg/l H₂O₂
Sufficient for: 100 tests
Shelf life: at least 2.5 years after production
Colour change: white → blue

QUANTOFIX® Peroxide 100

REF 913 12

Similar to QUANTOFIX® Peroxide 25 but different range.

Type: test strips
Range: 0 · 1 · 3 · 10 · 30 · 100 mg/l H₂O₂
Sufficient for: 100 tests
Shelf life: at least 2.5 years after production
Colour change: white → blue



Test strips for semi-quantitative determinations

Description of individual parameters and tests

QUANTOFIX® Peroxide 1000

REF 913 33

Similar to QUANTOFIX® Peroxide 25 but different range.

Type: test strips
Range: 0 · 50 · 150 · 300 · 500 · 800 · 1000 mg/l H₂O₂
Sufficient for: 100 tests
Shelf life: at least 2.5 years after production
Colour change: white → brown

QUANTOFIX® Phosphate

REF 913 20

This test allows the quick and easy determination of phosphate in solutions. It includes all necessary reagents so that the measurement can be started immediately. A reliable result is obtained within 2 minutes.

In surface water, the presence of high phosphate concentrations may indicate domestic waste discharge, fertilizer run-off or the presence of industrial effluents or detergents. The phosphate content of surface water has direct consequences for its ability to support growth of certain organisms. Very high phosphate intake may lead to an eutrophication of rivers and lakes leading finally to the death of aquatic life.

In the maintaining of cooling or heating systems QUANTOFIX® Phosphate is used for the rapid and reliable control of corrosion inhibitors

Type: test strips and reagents
Range: 0 · 3 · 10 · 25 · 50 · 100 mg/l PO₄³⁻ (only *ortho*-phosphate)
Sufficient for: 100 tests
Shelf life: at least 2.5 years after production
Colour change: white → blue-green

QUANTOFIX® Potassium

REF 913 16

This test allows the quick and easy determination of potassium in solutions. It includes all necessary reagents so that the measurement can be started immediately. A reliable result is obtained within 1 minute.

The natural potassium content in ground water is generally about 1–2 mg/l K. Higher values may indicate fecal contaminations, but can also originate from potassium fertilizers. For the growth of plants and animals potassium is an essential factor. Especially in agriculture the determination of potassium therefore gains increasing importance.

Type: test strips and reagents
Range: 0 · 200 · 400 · 700 · 1000 · 1500 mg/l K⁺
Sufficient for: 100 tests
Shelf life: at least 2.5 years after production
Colour change: yellow → orange

QUANTOFIX® QUAT

REF 913 37

This test strip is for the fast and reliable determination of quaternary ammonium compounds (QUAT) in solutions. The easy dip-and-read-procedure provides a reliable result within 15 seconds.

„Quaternary ammonium compounds“ (QUAT) are frequently used for the disinfection of medical devices, surfaces and closed cooling cycles. Using QUANTOFIX® QUAT, it can easily be controlled if the concentration of the disinfectant is sufficient. This ensures an optimal disinfection.

The test is calibrated for Benzalkonium chloride. The packing insert contains conversion factors for many other quaternary ammonium compounds.

Test papers for quaternary ammonium compounds: see also Indiquat (see page 32)

Type: test strips
Range: 0 · 10 · 25 · 50 · 100 · 250 · 500 · 1000 mg/l benzalkonium chloride
Sufficient for: 100 tests
Shelf life: at least 2.5 years after production
Colour change: yellow → blue-green



QUANTOFIX® Sulphate

REF 913 29

This test strip is for the fast and reliable determination of sulphate in solutions. The easy dip-and-read-procedure provides a reliable result within 2 minutes.

Sulphate is regularly found in natural waters. In cooling water and ion exchange systems sulphate must be monitored to prevent the formation of calcium sulphate (gypsum). The sulphate determination is also of importance to evaluate the aggressiveness of water towards concrete. In the beverage industry it is tested because of its effect on odor and taste.

Type: test strips
Range: < 200 · > 400 · > 800 · > 1200 · > 1600 mg/l SO₄²⁻
Sufficient for: 100 tests
Shelf life: at least 2.5 years after production
Colour change: red → yellow

– Test strips and papers for semi-quantitative determinations

Description of individual parameters and tests

QUANTOFIX® Sulphite

REF 913 06

This test strip is for the fast and reliable determination of sulphite in solutions. The easy dip-and-read-procedure provides a reliable result within 20 seconds.

In process and boiler water, sulphite is used as an oxygen scavenger. To avoid overdosage, the concentration needs to be controlled regularly. These tests are also used to control the sulphite concentration in foodstuff treated with sulphur compounds (SO_2 , HSO_3^- , SO_3^{2-}) for longer shelf-life. In the process of wine making the control of sulphite is important to monitor production and quality of the wine.

Type: test strips
Range: 0 · 10 · 25 · 50 · 100 · 250 · 500 · 1000 mg/l SO_3^{2-}
Sufficient for: 100 tests
Shelf life: at least 2.5 years after production
Colour change: white → salmon

QUANTOFIX® Tin

REF 913 09

This test strip is for the fast and reliable determination of tin in solutions. The easy dip-and-read-procedure provides a reliable result within 5 seconds.

In the beverage industry QUANTOFIX® Tin is used to control canned juices or food. Depending on the storage conditions and the quality of the tin plating, significant quantities of tin may get into the product, causing a negative aftertaste. The control of tin ensures the optimal quality of the food.

Type: test strips
Range: 0 · 10 · 25 · 50 · 100 · 250 · 500 mg/l Sn^{2+}
Sufficient for: 100 tests
Shelf life: at least 2.5 years after production
Colour change: white → dark blue

QUANTOFIX® Zinc

REF 913 10

This test allows the quick and easy determination of zinc in solutions. It includes all necessary reagents so that the measurement can be started immediately. A reliable result is obtained within 2 minutes.

Zinc provides an effective protective coating for steel (galvanized coatings) and is useful as an alloying agent. Zinc tests are used to regularly check the plating baths in metal plating industry. Zinc salts are useful as corrosion inhibitors in cooling water treatment formulations. Here, the zinc concentration is monitored to ensure an optimal process.

Type: test strips and reagents
Range: 0 · 2 · 5 · 10 · 25 · 50 · 100 mg/l Zn^{2+}
Sufficient for: 100 tests
Shelf life: at least 2.5 years after production
Colour change: orange → red

QUANTOFIX® Multisticks für aquarium owners

REF 913 26 / 913 27

This test strip is for the fast and reliable determination of the water quality in aquariums. Within 60 seconds the easy dip-and-read-procedure provides important information on the total alkalinity (carbonate hardness), total hardness and pH. The water quality can be improved at an early stage ensuring a good health of fish.

Type: test strips
Range: 0 · 5 · 10 · 15 · 20 · 25 °d (Total hardness)
0 · 3 · 6 · 10 · 15 · 20 °d (Carbonate hardness)
pH 6.4 · 6.8 · 7.2 · 7.6 · 8.0 · 8.4
Sufficient for: 100 (REF 913 26) or 25 tests (REF 913 27)
Shelf life: at least 2.5 years after production
Colour change: green → red (Total hardness)
bright green → blue (Carbonate hardness)
yellow → red (pH)



Test strips and papers for semi-quantitative determinations – Description of individual parameters and tests

Other test strips and test papers for semi-quantitative determinations

Table of applications

Determination of	Test paper / test strips	Gradation	REF
Ammonium/Ammoniak	Ammonia Test NEW!	0 · 0,5 · 1 · 3 · 6 mg/l NH_4^+	907 14
Chlorine	Chlorine test	10 · 50 · 100 · 200 mg/l Cl_2	907 09
Fluoride ions	Fluoride test	0 · 2 · 5 · 10 · 20 · 50 · 100 mg/l F^-	907 34
Halide ions	Saltesmo	0 · 0,25 · 0,5 · 1 · 2 · 3 · 4 · 5 g/l NaCl	906 08
Humidity in air (relative)	Moisture indicator	20 · 30 · 40 · 50 · 60 · 70 · 80 %	908 01
	Moisture indicator	8 %	908 901
	Moisture indicator without cobalt chloride	8 %	908 903
Ozone content in air	Ozone test strips	< 90 · 90 – 150 · 150 – 210 · > 210 $\mu\text{g}/\text{m}^3 \text{O}_3$	907 36
QUATS	INDIQUAT	on request	90900-2
Silver	Ag-Fix (test paper)	0 · 1 · 2 · 3 · 5 · 7 · 10 g/l Ag^+	907 40
	Ag-Fix (test strips)	0 · 0,5 · 1 · 2 · 3 · 5 · 7 · 10 g/l Ag^+ pH 4 · 5 · 6 · 7 · 8	907 41
Swimming pool parameters	Cyanuric acid NEW!	see page 34	907 10
	Swimming Pool Test 3 in 1	see page 34	907 52
	Swimming Pool Test 5 in 1	see page 34	907 59
Water hardness	AQUADUR®		see page 31

Ammonia Test

REF 907 14

This test strip is for the fast and reliable determination of ammonium, respectively ammonia, in solutions. The easy dip-and-read procedure provides safe results within 40 seconds.

Ammonium/ammonia is harmful to fish and other aquatic life in aquariums. This test shows the amount of ammonium quickly and easily. Thus, the aquarium can be kept in good condition and fish stay healthy.

Type: test strips
Range: 0 · 0,5 · 1 · 3 · 6 mg/l NH_4^+
Sufficient for: 25 tests
Shelf life: at least 2,5 years after production
Colour change: bright yellow – blue

NEW!



Ag-Fix test strips

REF 907 41

This test strip is for the fast and reliable determination of silver in fixing baths. The easy dip-and-read-procedure provides a reliable result within 30 seconds.

Fixing is the final step in the development of photos and films. Excess silver halides are washed from the photographic layer. To ensure proper operation of the bath, the silver content as well as the pH have to be checked regularly.

Type: test strips
Range: 0 · 0,5 · 1 · 2 · 3 · 5 · 7 · 10 g/l Ag^+
pH: 4 · 5 · 6 · 7 · 8
Sufficient for: 100 tests
Shelf life: at least 2,5 years after production
Colour change: yellow → brown (silver)
yellow → blue (pH)

Ag-Fix Test paper

REF 907 40

Similar to Ag-Fix test strips but without test pad for pH

Type: test paper
Range: 0 · 1 · 2 · 3 · 5 · 7 · 10 g/l Ag^+
Presentation: Reel of 5 m length
Shelf life: at least 2 years after production
Colour change: yellow → brown



– Test strips and papers for semi-quantitative determinations

Description of individual parameters and tests

AQUADUR®

AQUADUR® are test strips for the determination of water hardness. Clear colour changes from green to red ensure an accurate readout. Individually sealed AQUADUR® test strips can perfectly be combined with promotion activities to inform customers about the necessity of water softeners. Instructions for use are printed on the seal. Due to the clear design with green/red indication, the result can be read without colour chart.

The hardness of water depends on its content of calcium and magnesium salts. The total sum of these salts determines the hardness of water. In the USA, it is expressed in terms of ppm (mg/l) CaCO_3 .

Water is often simply classified as "soft water", or "hard water" etc. The following values generally apply to these terms:

below 50 ppm CaCO_3 – very soft water

50 – 120 ppm CaCO_3 – soft water

120 – 240 ppm CaCO_3 – medium hard water

240 – 360 ppm CaCO_3 – hard water

above 360 ppm CaCO_3 – very hard water

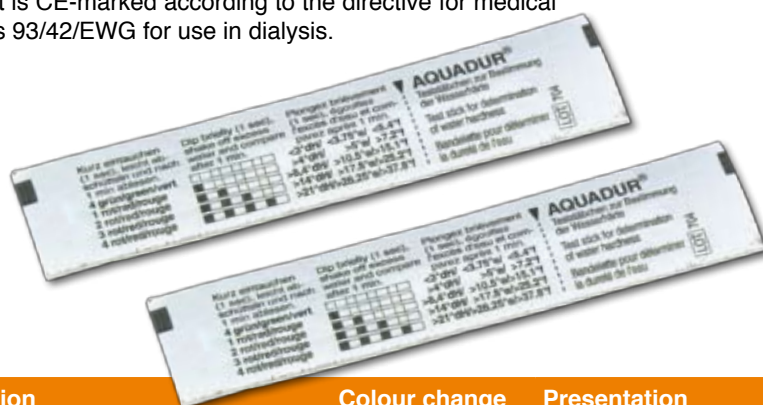
AQUADUR® Sensitive

REF 912 10

This test allows the rapid and reliable detection of very low water hardness. The easy dip-and-read procedure provides a reliable result within 20 seconds.

In dialysis centres AQUADUR® Sensitive is used to check feed water. Low levels of water hardness are necessary to ensure optimal function of further water purification such as reversed osmosis.

This test is CE-marked according to the directive for medical products 93/42/EWG for use in dialysis.



Gradation	Colour change	Presentation	REF
< 3 · > 5 · > 10 · > 15 · > 20 · > 25 °d	green → red	Box of 100 test strips 6 x 95 mm	912 01
< 3 · > 4 · > 7 · > 14 · > 21 °d	green → red	Box of 100 test strips 6 x 95 mm	912 20
< 3 · > 4 · > 8.4 · > 14 °d	green → red	Box of 100 test strips 6 x 95 mm	912 39
< 3 · > 5 · > 10 · > 15 · > 20 · > 25 °d	green → red	1000 individually sealed test sticks, outer dimensions 22 x 95 mm	912 23
< 3 · > 4 · > 7 · > 14 · > 21 °d	green → red	1000 individually sealed test sticks, outer dimensions 22 x 95 mm	912 24
< 3 · > 4 · > 8.4 · > 14 · > 21 °d	green → red	1000 individually sealed test sticks, outer dimensions 22 x 95 mm	912 40
< 3 · > 5 · > 10 · > 15 · > 20 · > 25 °d	green → red	5000 test strips, without scale	912 21
< 3 · > 4 · > 7 · > 14 · > 21 °d	green → red	5000 test strips, without scale	912 22
< 3 · > 5 · > 10 · > 15 · > 20 · > 25 °d	green → red	Set of 3 individually sealed test sticks, pack of 50 sets	912 902
AQUADUR® Sensitive NEW!			
0 · 0.3 · 0.6 · 1.1 °d	light beige → blue	Box of 100 test strips 6 x 95 mm	912 10

CE: CE-marked according to the directive for medical products 93/42/EWG

Test strips and papers for semi-quantitative determinations –

Description of individual parameters and tests

Chlorine Test

REF 907 09

This test paper allows the quick and easy determination of Chlorine in solutions. The easy dip-and-read-procedure provides a reliable result within a few seconds.

Chlorine is widely used for disinfection. Dosed correctly, harmful microorganisms are safely destroyed, many impurities removed and the growth of algae is prevented. Chlorine Test is used to monitor the concentration of disinfection baths.

Type: test paper
Range: 10 · 50 · 100 · 200 mg/l Cl₂
Presentation: reel of 5 m length
Shelf life: at least 2 years after production
Colour change: white → dark blue

Fluoride Test

REF 907 34

This test paper is for the quick and easy determination of Fluoride in solutions. It includes all necessary reagents so that the measurement can be started immediately. A reliable result is obtained within 2 minutes.

The test can also be used for the detection of dangerous hydrofluoric acid that is used in the production of computer chips.

Type: test paper with reagents
Range: 0 · 2 · 5 · 10 · 20 · 50 · 100 mg/l F⁻
Sufficient for: 30 tests
Shelf life: at least 2 years after production
Colour change: red → white

INDIQUAT

REF 909 000 – 909 002

This test paper allows the quick and easy determination of QUAT-based disinfectants in solutions. The easy dip-and-read-procedure provides a reliable result within 10 seconds.

Quaternary ammonium compounds (QUAT) identifies a group of chemicals that are used for the disinfection of medical devices and surfaces. They are usually supplied as concentrates that have to be diluted prior to use. The concentration of these dilutions can easily be controlled with INDIQUAT.

INDIQUAT is only manufactured in customer presentation and on request. Alternatively, QUANTOFIX® QUAT (see page 28) can be used for the rapid and reliable detection of quaternary ammonium compounds.

Type: test paper
Range: on request
Presentation: reel of 5 m length
Shelf life: at least 2 years after production

Moisture Indicator

REF 908 01

This test is used for the quick and easy determination of the relative atmospheric humidity. The paper is simply exposed to the atmosphere in question. When the colour of the pad does not change anymore, the humidity can be read off.

Moisture sensitive goods e.g. electronics and optical systems have to be stored at low atmospheric humidity. They are usually packed in sealed plastic bags together with a desiccant.

Moisture indicators are used to control if the desiccants is active and if moisture is effectively kept away from the goods.

Type: self-adhesive label
Range: 20 · 30 · 40 · 50 · 60 · 70 · 80% r.H.
Presentation: Box of 12 adhesive labels
Colour change: pink ↔ blue

Moisture indicator

REF 908 901

Similar to 90801 but only for 8% r.H.

Type: test paper
Sensitivity: 8% r.H.
Presentation: Pack of 1000 indicators, 60x35 mm
Colour change: pink ↔ blue



Non-toxic moisture indicator without cobalt chloride

REF 908 903

This test is similar to 908901 with one important difference:

The patented moisture indicator is free from carcinogenic and toxic material. The clear colour change from red to yellow ensures precise readings.

Established humidity indicators are based on cobalt chloride (CoCl₂), which has been found to be carcinogenic and toxic. Contact to these types of indicators represents a health and safety risk to staff involved in handling and packing.

The patented non-toxic moisture indicator eliminates these risks and increase safety.

Type: test paper
Sensitivity: 8% r.H.
Presentation: Pack of 1000 indicators, 60x35 mm
Colour change: yellow ↔ red



– Test strips and papers for semi-quantitative determinations

Description of individual parameters and tests

Ozone test strips

REF 907 36

This test is used for the quick and easy determination of ozone in air. The test strip is placed in the open air at a wind-shielded location. A reliable result is obtained within 10 minutes.

Ozone is a toxic gas that is formed on sunny days from oxygen and nitrogen oxides. It causes headache, cough and other irritations of the respiratory tract. It is often recommended, that sensitive persons stop physical activities (i.e. jogging) at concentrations $>180 \text{ mg/m}^3$.

The ozone concentration varies locally. Using ozone test strips the concentration can be measured directly at the point of interest.

Type:	test strips
Range:	$< 90 \cdot 90 - 150 \cdot 150 - 210 \cdot > 210$ $\mu\text{g/m}^3$ Ozone
Sufficient for:	12 tests
Shelf life:	at least 1.5 years after production
Colour change:	white \rightarrow brown



Saltesmo

REF 906 08

This test paper allows the quick and easy determination of chloride, bromide and iodide in solutions. The test disc is simply punched with an enclosed needle and put into the sample. A reliable result is obtained within 2 minutes.

Sodium chloride is common table salt (NaCl). Saltesmo is used for the detection of salt water in ships and for salt determination in foodstuffs.

Type:	test disks
Range:	$0 \cdot 0.25 \cdot 0.5 \cdot 1 \cdot 2 \cdot 3 \cdot 4 \cdot 5 \text{ g/l NaCl}$
Sufficient for:	30 tests
Shelf life:	at least 1.5 years after production
Colour change:	red \rightarrow yellow



Test strips and papers for semi-quantitative determinations – Description of individual parameters and tests

Swimming Pool Test 5 in 1

REF 907 59

This test allows the quick and easy determination of the water quality in swimming pools. The test strip is dipped into the pool and moved back and forth 5 times. A reliable result is obtained within 30 seconds.

The test provides valuable results about the water hardness, the total alkalinity, free and total chlorine and pH. Monitoring of the water quality allows adjusting the dosage of water conditioners in good time. The pool remains nice and clean.

Type:	test strips
Range:	0 · 100 · 250 · 500 · 1000 mg/l CaCO ₃ (total hardness) 0 · 0.5 · 1 · 3 · 5 · 10 mg/l Cl ₂ (free chlorine) 0 · 1 · 3 · 5 · 10 mg/l Cl ₂ (total chlorine) 0 · 80 · 120 · 180 · 240 mg/l CaCO ₃ (alkalinity) pH 6.4 · 6.8 · 7.2 · 7.6 · 8.4
Sufficient for:	50 tests
Shelf life:	at least 2 years after production
Colour change:	blue → red (total hardness) yellow → violet (total chlorine) yellow → violet (free chlorine) light green → dark green (alkalinity) yellow → red (pH value)



Cyanuric acid test

REF 907 10

This test strip is for the fast and reliable determination of Cyanuric acid in swimming pools. The test strip is simply dipped into the water and moved back and forth five times. After 30 seconds safe results can be read by simply comparing the strip with the colour chart.

Strong sun shine (UV radiation) on swimming pool water decomposes chlorine very quickly. Cyanuric acid stabilizes chlorine in swimming pool water, inhibits decomposition and thus ensures the water's safe and proper disinfection.

Type:	test strips
Range:	0 · 50 · 100 · 150 · 300 mg/l cyanuric acid
Sufficient for:	25 tests
Shelf life:	at least 2.5 years after production
Colour change:	orange → red

NEW!



Swimming Pool Test 3 in 1

REF 907 52

Similar to Swimming Pool test 5 in 1 but only with test pads for alkalinity, free chlorine and pH.

Test papers for qualitative determinations

Description of individual parameters and tests

Test papers allow the qualitative determination of ions and chemical compounds. They are used to detect if compounds tested for are present above the specific detection limit. Some of the papers have specific applications.



Application of test papers for qualitative determinations · Ordering information

Determination of	Test paper / Test strips	Presentation	REF
Alkaline phosphatase in milk	Phosphatesmo MI	box of 50 test strips 10 x 95 mm	906 12
Aluminium ions (Al^{3+})	Aluminium test paper	box of 100 strips 20 x 70 mm	907 21
Ammonia, ammonium ions (NH_3 , NH_4^+)	Ammonium test paper	box of 200 strips 20 x 70 mm	907 22
Antimony ions (Sb^{3+})	Antimony test paper	box of 200 strips 20 x 70 mm	907 23
Arsenic, arsine (As , AsH_3)	Arsenic test paper = mercury bromide paper	box of 200 strips 20 x 70 mm	907 62
Bismuth ions (Bi^{3+})	Bismuth test paper	box of 200 strips 20 x 70 mm	907 33
Blood traces (Peroxidase)	Peroxtesmo KM	box of 25 sheets 15 x 30 mm	906 05
Boric acid, borates (H_3BO_3 , BO_3^{3-})	Tumeric paper	box of 200 strips 20 x 70 mm	907 47
Chlorine, free halogens	Chlortesmo Potassium iodide starch paper (see below)	box of 200 strips 20 x 70 mm	906 03
Chromium, chromate (Cr(VI) , CrO_4^{2-})	Chromium test paper	box of 200 strips 20 x 70 mm	907 24
Cobalt ions (Co^{2+})	Cobalt test paper	box of 100 strips 20 x 70 mm	907 28
Copper, copper ions (Cu , Cu^+ , Cu^{2+})	Cuprotesmo	box of 40 sheets 40 x 25 mm	906 01
Copper(II) ions (Cu^{2+})	Copper test paper	box of 200 strips 20 x 70 mm	907 29
Cyanide, hydrocyanic acid (CN^- , HCN)	Cyantesmo	reel of 5 m length	906 04
Fluorides, hydrogen fluorides (F^- , H_2F_2)	Fluoride test paper	box of 200 strips 20 x 70 mm	907 50
Halogens, especially free chlorine	Chlortesmo	box of 200 strips 20 x 70 mm	906 03
Hydrogen sulphide (H_2S), sulphide ions (S^{2-})	Lead acetate paper	roll of 5 m length	907 44
		refill pack of 3 rolls	907 45
		booklet with 100 strips 10 x 75 mm	907 46
	Sulphide test paper	roll of 5 m length	907 61
Iron(II) ions (Fe^{2+})	Dipyridyl paper	box of 200 strips 20 x 70 mm	907 25
Iron ions (Fe^{2+} , Fe^{3+})	Iron test paper	box of 100 strips 20 x 70 mm	907 26
Lactoperoxidase in milk	Peroxtesmo MI	box of 100 strips 15 x 15 mm	906 27
Lead, lead ions (Pb , Pb^{2+})	Plumbtesmo	box of 40 sheets 40 x 25 mm	906 02
Mastitis	Udder test paper	PE bag with 20 sheets	907 48
Nickel(II) ions (Ni^{2+})	Nickel test paper	box of 200 strips 20 x 70 mm	907 30
Nitrate and nitrite (NO_3^- , NO_2^-)	Nitratesmo	reel of 5 m length	906 11
Nitrite ions (NO_2^-), nitrous acid (HNO_2), ozone (O_3)	Potassium iodide starch paper MN 816 N (normal sensitivity)	reel of 5 m length	907 54
		refill pack of 3 rolls	907 55
		booklet of 100 strips 10 x 75 mm	907 56
	Potassium iodide starch paper MN 616 T (for spot tests)	box of 200 strips 20 x 70 mm	907 58
Oil in water and soil	Oil test paper	box of 100 strips 20 x 70 mm	907 60
Peroxidase in foodstuffs	Peroxtesmo KO	box of 100 sheets 15 x 15 mm	906 06
Peroxidase in milk	Peroxtesmo MI	box of 100 sheets 15 x 15 mm	906 27
Potassium ions (K^+)	Potassium test paper	box of 200 sheets 20 x 70 mm	907 27
Protein residues	INDIPRO	box of 60 test sticks 10 x 95 mm and reagents	907 65
Reducing agents, SO_2 , sulphite ions	Potassium iodate starch paper	reel of 5 m length	907 53
Silver ions (Ag^+)	Silver test paper	box of 200 strips 20 x 70 mm	907 32
Sulphur dioxide (SO_2), sulphite ions	Sulphite test paper	box of 100 strips 20 x 70 mm	907 63
Sperm, acid phosphatase	Phosphatesmo KM	box of 25 sheets 15 x 30 mm	906 07
Vat dyes, end-point of conversion	Indanthrene yellow paper	box of 200 strips 20 x 70 mm	907 51
Water on the bottom of fuel tanks	AQUATEC test sticks	box of 100 strips 10 x 200 mm	907 42
Water in org. solutions	Watesmo	reel of 5 m length	906 09
Water distribution in butter	Water	box of 50 sheets 78 x 40 mm	906 10
Zirconium ions (Zr^{4+})	Zirconium test paper	box of 100 strips 20 x 70 mm	907 21

Test papers for qualitative determinations

Description of individual parameters and tests

Aluminum test paper

REF 907 21

The test paper allows the quick and easy detection of aluminum. In the presence of aluminum (Al^{3+}) it shows bright red spots on a yellow background.

Using a different procedure, the test paper can be used for the determination of zirconium.

Type: test paper
Limit of sensitivity: 10 mg/l Al^{3+}
Sufficient for: 100 tests
Colour change: yellow → bright-red



AQUATEC test strips

REF 907 42

This test allows the quick and easy measurement of the water amount at the bottom of petrol and fuel oil tanks.

In petrol and fuel oil tanks water accumulates over time forming a layer at the bottom. To measure this layer the PE strip is fixed onto a flat steel sheet so that the lower ends coincide. It is then lowered into the tank with a tin cord until it reaches the bottom. Any water present beneath the fuel will dissolve the blue layer (testing time about 15 – 20 seconds). The thickness of the water layer corresponds to the colourless part of the strip.

Type: test strips
Limit of sensitivity: depending on the geometry of the tank, about 1 – 2 mm water layer
Sufficient for: 100 tests
Colour change: blue → colourless



Ammonium test paper

REF 907 22

The test paper can be used for the rapid detection of ammonium ions as well as for gaseous ammonia. The white paper turns brownish-yellow in the presence of ammonium ions or NH_3 . This test paper is specific for the determination of NH_4^+ .

Type: test paper
Limit of sensitivity: 10 mg/l NH_4^+
Sufficient for: 200 tests
Colour change: white → brown-yellow

Antimony test paper

REF 907 23

The test paper allows the quick and easy detection of antimony [Sb(III)]. In the presence of antimony [Sb(III)] it shows orange-red spots on a yellow background. Pentavalent antimony, i.e. Sb(V) , has to be reduced to Sb(III) with metallic magnesium.

This test paper is specific for antimony.

Type: test paper
Limit of sensitivity: 5 mg/l Sb^{3+}
Sufficient for: 200 tests
Colour change: yellow → orange-red

Arsenic test paper (mercury bromide paper)

REF 907 62

This test paper allows the easy detection of arsine (AsH_3) in the gas phase. Arsenic in solutions has to be converted into AsH_3 with Zn/acid and purged from the solution. The arsine is detected directly at the boundary layer between water and air.

Arsenic test paper is used for the easy determination of arsenic in grape must and wine. For the determination of arsine in compartment air the test paper is moistened with acetic anhydride.

Type: test paper
Limit of sensitivity: 0.5 $\mu\text{g As}$
Sufficient for: 200 tests
Colour change: white → brown-black

Bismuth test paper

REF 907 33

This test paper allows the quick detection of bismuth. In the presence of bismuth ions (Bi^{3+}) it shows an orange-red discoloration on a pale-yellow background.

Type: test paper
Limit of sensitivity: 60 mg/l Bi^{3+} (Nitric acid > 3% leads to reduced sensitivity)
Sufficient for: 200 tests
Colour change: pale-yellow → orange-red

Test papers for qualitative determinations

Description of individual parameters and tests

Chlortesmo

REF 906 03

This test paper allows the quick and easy detection of free halogens (chlorine, bromine, iodine). Free nitrous acid HNO_2 (not nitrite ions) interferes, but can be destroyed by addition of amidosulphuric acid.

Type: test paper
Limit of sensitivity: 1 mg/l Cl_2
Sufficient for: 200 tests
Colour change: pale-yellow → blue

Chromium test paper

REF 907 24

This test paper allows the quick and easy detection of chromate (CrO_4^{3-}). Cr(III) ions must be converted to chromate prior to the detection.

For non-destructive testing of materials apply a drop of acid solution (1 part hydrochloric acid 37 % + 4 parts hydrogen peroxide 3 %) to the degreased surface. After 10 – 30 seconds add a drop sodiumhydroxyde (NaOH). Press the test paper onto the precipitate then put it into diluted sulfuric acid. In the presence of chromium, a violet spot appears. With this procedure Chromium contents > 0.1% are safely detected.

Type: test paper
Limit of sensitivity: 2 mg/l Cr^{3+} or 5 mg/l CrO_4^{2-}
Sufficient for: 200 tests
Colour change: white → violet

Cobalt test paper

REF 907 28

This test paper allows the quick and easy detection of cobalt (Co^{2+}).

For non-destructive testing of materials apply a drop of acid solution (50 ml hydrogen peroxide 3 % + 7.5 ml o-phosphoric acid 85 % + 5 ml hydrochloric acid 37 %) to the degreased surface. After 30 – 60 seconds absorb the liquid with the test paper. In the presence of cobalt a blue colour appears. The intensity of the colour varies according to the concentration. With this procedure cobalt contents > 0.5% are safely detected.

Type: test paper
Limit of sensitivity: 25 mg/l Co^{2+}
Sufficient for: 100 tests
Colour change: white → blue

Copper test paper

REF 907 29

This test paper allows the quick and easy detection of copper (Cu^{+2+}). It is specific for Cu.

Note: For the determination of copper on surfaces and in alloys, checking for pores in metallic coatings on copper, for criminal trace investigations (projectiles), and for the detection of copper-containing pesticides on plants, fruit or vegetables we recommend the specific and highly sensitive Cuprotesmo paper (REF 90601) with a sensitivity of 0.05 µg.

Type: test paper
Limit of sensitivity: 20 mg/l Cu^{2+}
Sufficient for: 200 tests
Colour change: white → green

Cuprotesmo

REF 906 01

This test paper allows the quick and easy detection of copper(I) and copper(II) ions. It is used for the detection of copper and copper salts on surfaces and in ash, for the detection of pores in metallic coatings on copper containing materials, in criminal trace investigations (bullets), and for the detection of copper-containing pesticides on fruit and vegetables. The test paper is specific for copper.

Type: test paper
Limit of sensitivity: 0.05 µg on surfaces,
3 – 5 mg/l Cu in solutions
Sufficient for: 40 tests
Colour change: yellow-white → pink-purple



Cyantesmo

REF 906 04

This test paper allows the quick and easy detection of hydrocyanic acid and cyanides in aqueous solutions and extracts. They are for example formed in the manufacture of fruit brandies and are toxic even in low concentrations. To detect cyanides in solution, a drop of concentrated sulfuric acid is added to 10 ml sample. Hydrocyanic acid gas is formed and can be detected at the boundary layer between water and air.

Type: test paper
Limit of sensitivity: 0.2 mg/l hydrocyanic acid (HCN)
Presentation: reel of 5 m length
Colour change: pale-green → blue



Test papers for qualitative determinations

Description of individual parameters and tests

Dipyridyl paper

REF 907 25

The test paper allows the sensitive and specific detection of Fe(II) ions. Even small amounts of Fe(II) can safely be detected in the presence of large amounts of Fe(III).

Type: test paper
Limit of sensitivity: 2 mg/l Fe²⁺
Sufficient for: 200 tests
Colour change: white → red

Fluoride test paper

REF 907 50

The test paper allows the fast detection of fluoride ions in solutions containing hydrochloric acid. It is suitable for the safe and easy detection of dangerous hydrofluoric acid, which is used for example in computer chip production.

Type: test paper
Limit of sensitivity: 20 mg/l F⁻
Sufficient for: 200 tests
Colour change: pink → yellow-white

Indanthrene yellow paper

REF 907 51

The test paper allows the easy determination of hydrosulphite (sodium dithionite) in alkaline solution. It is used to determine the endpoint in the conversion of vat dyes to the leuco form. Because of the special purpose, indanthrene yellow paper is also called Hydrosulphite paper.

Type: test paper
Sufficient for: 200 tests
Colour change: yellow ↔ blue

INDIPRO

REF 907 65

The test paper allows the detection of protein contamination on surfaces and tools coming in contact with food. The test kit consists of 60 test strips with reagents.

Type: test strips and reagents
Limit of sensitivity: 50 µg BSA (bovine serum albumin)
Sufficient for: 60 tests
Colour change: yellow → green



Iron test paper

REF 907 26

This test paper is used for the fast detection of iron ions (Fe²⁺ and Fe³⁺). In contrast to Dipyridyl paper it reacts with Fe(II) as well as Fe(III) ions. For the specific detection of Fe(II) please use Dipyridyl paper (REF 907 25).

Type: test paper
Limit of sensitivity: 10 mg/l Fe²⁺ or Fe³⁺
Sufficient for: 100 tests
Colour change: yellow-white → red-brown

Lead acetate paper

REF 907 44

The test paper allows the quick and easy detection of hydrogen sulphide. This gas occurs in the processing of raw oil. It is toxic even in low concentrations. Therefore, critical points are carefully checked. Sulphide containing solutions also give a positive reaction.

Lead acetate is toxic and the test paper needs to be declared as hazardous. The technically equivalent Sulphide test paper (REF 907 61, page 42) is a non-toxic and safe alternative.

Type: test paper
Limit of sensitivity: 1 drop of a solution containing 5 mg/l Sulphide (S²⁻) shows a positive reaction
Presentation: reel of 5 m length
Colour change: white → brown-black



This test paper is also available as refill pack with 3 reels (REF 907 45) and as booklet with 100 strips (REF 907 46).

Mastitis

see Udder test paper, page 42

Mercury bromide paper

see Arsenic test paper, page 36

Test papers for qualitative determinations

Description of individual parameters and tests

Nickel test paper

REF 907 30

This test paper allows the quick and easy detection of nickel.

For non-destructive testing of materials apply a drop of 3% nitric acid (1 part Nitric acid 85%, 5 parts water) to the degreased surface. After 1 minute absorb the liquid with the test paper. With this procedure Nickel contents > 0.5% are safely detected.

Type: test paper
Limit of sensitivity: 10 mg/l Ni²⁺
Sufficient for: 200 tests
Colour change: white → red



Nitratesmo

REF 906 11

This test paper allows the reliable detection of nitrate and nitrite. It shows different colours for the two ions.

Type: test paper
Limit of sensitivity: 10 mg/l Nitrate (NO₃⁻), 5 mg/l Nitrite (NO₂⁻)
Presentation: reel of 5 m length
Colour change: Nitrate: white → red (dip test paper into sample and afterwards into sulphuric acid 96%)
Nitrite: white → yellow (dip test paper into sample and afterwards into Hydrochloric acid 5 mol/l)

Oil test paper

REF 907 60

This test paper allows the fast and reliable detection of oil contaminations of water and soil. The sensitivity largely depends on the nature of the respective hydrocarbon. For detection of oil in soil, press the paper firmly against the soil to be tested and rinse with clear water. To determine oil in water, move the paper back and forth a few times in the sample. In case of volatile hydrocarbons, the colour reaction of the test paper has to be evaluated immediately.

Substance	Colour change	
	lower limit mg/l of water	clearly detectable mg/l of water
Petroleum ether (b. p. 40 – 80 °C)	250	400
Gasoline (high octane)	10	25
Fuel oil	5	10
Lubricating oil	1	5

Type: test paper
Limit of sensitivity: see table
Sufficient for: 100 tests
Colour change: pale blue → dark blue



Peroxtesmo KM

REF 906 05

This test paper allows the fast and sensitive detection of blood traces. In criminal investigations it is used as a quick screening test.

The test paper uses the pseudo-peroxidatic effect of blood. The material in question is allowed to soak in water for about 1 minute. Then the test paper is pressed to the sample. Blood traces lead to a distinct discoloration within a few seconds. The test papers are individually sealed in plastic. This ensures safe results at any time.

Type: test paper
Sufficient for: 25 tests
Colour change: white → blue

Test papers for qualitative determinations

Description of individual parameters and tests

Peroxtesmo KO

REF 906 06

This test paper allows the quick and easy detection of peroxidase in food. It is used in the food processing industry to evaluate the quality of canned food.

A drop of the sample is put onto the test paper. Alternatively, the paper can be pressed to freshly cut surfaces. In the presence of peroxidase a blue colour appears within 2 minutes.

Type: test papers
Sufficient for: 100 tests
Colour change: white → blue-green



Phosphatesmo KM

REF 906 07

The test paper allows the quick and easy detection of sperm. In criminal investigations it is used as a rapid screening test.

The paper is specific for acid phosphatase. The material in question is allowed to soak in physiological saline solution for about 1 minute. Then the material is placed on the paper. In presence of acid phosphatase the paper turns violet. The reaction is not a suitable substitute for the microscopic determination of live spermatozoa.

The test papers are individually sealed in plastic. This ensures clear results at any time.

Type: test papers
Sufficient for: 25 tests
Colour change: white → violet



Peroxtesmo MI

REF 906 27

This test paper allows the specific detection of lactoperoxidase in milk. In the dairy industry the test is used for the quick and easy quality control of ultra heat treated (UHT) milk. In contrast to the alternative guaiacol method, Peroxtesmo MI is odorless and non-toxic.

A drop of milk is put onto the test paper. If the paper remains white, the ultra heat treatment process is completed.

Type: test paper
Limit of sensitivity: 3 % raw milk in UHT-milk
Sufficient for: 100 tests
Colour change: white → blue

Test papers for qualitative determinations

Description of individual parameters and tests

Phosphatesmo MI

REF 906 12

This test strip allows the specific detection of alkaline phosphatase in milk. In the dairy industry the test is used for the quick and easy quality control of pasteurized milk.

The strip is dipped into the milk and incubated at 36 °C. If the paper remains white, the pasteurization is complete. The test should be stored at 2 – 8 °C to ensure optimal results.

Type:	test paper
Limit of sensitivity:	0.5% raw milk in pasteurized milk or 300 U/l alkaline phosphatase in UHT milk
Sufficient for:	50 tests
Colour change:	white → yellow



Plumbtesmo

REF 906 02

The test paper allows the quick and easy detection of lead on surfaces including metal surfaces, dishes, ceramics and toys. In criminal investigations it is used to search for traces of bullets.

The surface in question is moistened with distilled water. The test paper is pressed against the surface for about 2 minutes. In the presence of lead the paper turns pink to dark purple.

Type:	test paper
Limit of sensitivity:	5 mg/l Pb ²⁺
Sufficient for:	40 tests
Colour change:	yellow-white → pink-purple

Potassium test paper

REF 907 27

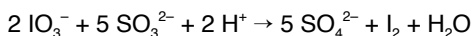
The test paper allows the quick and easy detection of potassium. Rubidium, caesium and thallium(I) give the same reaction. Sodium and heavy metal ions decrease the sensitivity. The leaflet describes a method to eliminate these interferences.

Type:	test paper
Limit of sensitivity:	250 mg/l K ⁺
Sufficient for:	200 tests
Colour change:	bright yellow → orange

Potassium iodate starch paper

REF 907 53

The test paper allows the fast detection of sulphite and sulphur dioxide. The paper is used in food analyzing laboratories. The reaction is as follows:



Sulphurous acid or sulphites reduce potassium iodate to free iodine. With starch, iodine gives a characteristic blue-black colour. For a detection of sulphite with highly sensitivity we recommend sulphite test paper (REF 907 63, page 42)

Type:	test paper
Limit of sensitivity:	5 mg/l SO ₂
Presentation:	reel of 5 m length
Colour change:	white → blue-black

Potassium iodide starch paper

This test paper allows the quick and easy detection of strong oxidizers like nitrite and free chlorine. It also used to control diazotization reactions. Nitrite or free chlorine oxidize potassium iodide to form elemental iodine which reacts with starch to a blue-violet complex.

Potassium iodide starch paper may be used by dipping it into the sample or by applying drops of the sample to the paper

MN 816 N standard grade

REF 907 54

MN 616 T recommended for spot tests

REF 907 58

Type:	test paper
Limit of sensitivity:	1 mg/l NO ₂ ⁻ / 1 mg/l free Cl ₂
Presentation:	reel of 5 m length (907 54) or box of 200 strips (907 58)
Colour change:	white → blue-violet



The standard grade is also available as refill (REF 907 55) and booklet with 100 strips (REF 907 56).

Silver test paper

REF 907 32

The test paper allows the quick and easy detection of silver ions. These cause red-violet spots on a salmon background. The leaflet describes a method to eliminate interferences of Hg, Cu, Au, Pt and Pd.

Type:	test paper
Limit of sensitivity:	20 mg/l Ag ⁺
Sufficient for:	40 tests
Colour change:	salmon → red-violet

Test papers for qualitative determinations

Description of individual parameters and tests

Sulphide test paper

REF 907 61

The test paper allows the easy and reliable detection of hydrogen sulphide. This gas occurs in the processing of raw oil. It is toxic even in low concentrations. Therefore, critical points are carefully checked. Sulphide ions in solution also give a positive reaction.

The frequently used lead acetate paper (REF 907 44, page 38) is toxic and needs to be declared as hazardous. Sulphide test paper provides an alternative which is non toxic and safe.

Type: test paper
Limit of sensitivity: 1 drop of a solution containing 5 mg/l Sulphide (S^{2-}) shows a positive reaction
Presentation: roll of 5 m length
Colour change: white → brown-black



Turmeric paper

REF 907 47

The test paper allows the quick and easy detection of boric acid and borates. It is impregnated with curcumin, the yellow dye extracted from the roots of Curcuma tinctoria (yellow ginger). The paper is dipped into the sample containing hydrochloric acid (pH 1 – 2). Afterwards it is allowed to dry. In presence of borate the paper turns orange to red. Dipping into conc. sodium hydroxide causes a green-black colour. In the absence of borate, sodium hydroxide leads to a brown-red colour.

Type: test paper
Limit of sensitivity: 20 mg/l B (100 mg/l H_3BO_3)
Sufficient for: 200 tests
Colour change: yellow → red; oxidising substances and iodide interfere



Sulphite test paper

REF 907 63

The test paper allows the quick and easy detection of sulphite and sulphur dioxide. In food analyzing laboratories it is used to detect sulphite in meat products. In medical diagnostics it is used as a quick test on sulphite oxidase deficiency.

Type: test paper
Limit of sensitivity: 10 mg/l Na_2SO_3
Sufficient for: 100 tests
Colour change: white → pink-red



Udder test paper

REF 907 48

The test paper allows the quick and easy detection of the pH of milk. It is used as a screening test on mastitis. Milk of infected cattle must not be sold.

All four tits of the udder require testing. A drop of milk is placed on the test zone. For healthy cows the colour turns to yellow-red (pH 6.4 – 6.6). A green (pH 7) or blue (pH 8) colour indicates mastitis. If the indicator remains yellow, the pH of the milk is about 6.3. This finding is likewise pathological and requires further diagnostic or therapeutic action.

Type: test paper
Sufficient for: 20 x 4 tests
Colour change: yellow → green → blue



Test papers for qualitative determinations

Description of individual parameters and tests

Watesmo

REF 906 09

The test paper allows the quick and easy detection of water and water vapour. On contact with water the paper changes colour from light blue to dark blue. The reaction is not reversible. Even after drying, the contact with water can clearly be proved.

The test paper is used to control the leak-tightness of tubing or to detect condensed water. It can also be used to control if sensitive products like electronics come into contact with water. This helps to detect unjustified complaints.

In chemical laboratories the test paper is used to control solvents. If the paper remains uncoloured after evaporation of the solvent, the solvent is anhydrous. In reactions sensitive to water it can then safely be used.

For the detection of water vapor in gas streams the paper is moistened with anhydrous isopropanol. The gas stream is directed on the paper. The presence of water vapor is indicated by a blue colour.

Type: test paper
Presentation: reel of 5 m length
Colour change: light blue → dark blue



Water

REF 906 10

The test paper allows the quick and easy determination of the water distribution in butter. It is a special presentation of Watesmo for the dairy industry.

On contact with water the paper develops dark spots. Size and number of these spots are correlated to the distribution of water in butter. This is evaluated with a 5-point evaluation chart described in DIN 10 311.

For water detection for other applications we recommend Watesmo (REF 906 09).

Type: test paper
Sufficient for: 50 tests
Colour change: light blue → dark blue



Zirconium test paper

REF 907 21

This test paper allows the quick and easy detection of zirconium. When used in accordance with the instructions, the test paper shows red-violet spots against a yellow background. The colour reaction is specifically for zirconium; only hafnium interfere.

The Zirconium test paper can also be used for the determination of aluminum by following the instructions applicable to the aluminum test paper.

Type: test paper
Limit of sensitivity: 20 mg/l Zr^{4+}
Sufficient for: 100 tests
Colour change: yellow → red-violet