

## Nitrogen determination acc. to Kjeldahl, Behr

### Behrotest® InKjel infrared quick digestion units

InKjel quick digestion systems with direct heating of the samples by means of infrared radiators (1500 W).

#### Configurations:

- 6 digestion vessels at 250 ml each
- 12 digestion vessels at 100 ml each
- 12 digestion vessels at 250 ml each
- 4 digestion vessels at 500 ml each
- 4 digestion vessels at 750 ml each

With digestion vessels of 500 ml or 750 ml, the behrotest® InKjel M meets requirements of water and sewage water analytics.

The basic unit of the InKjel can take in different application racks and suction systems. Thus, the user himself can convert the device to different vessel sizes by simply exchanging the application rack and the suction system.

| Article                                                              | Order No.          |
|----------------------------------------------------------------------|--------------------|
| <b>InKjel 635 M manually controllable infrared digestion system</b>  | <b>10 48 49998</b> |
| for 6 glasses at 250 ml each                                         |                    |
| <b>InKjel 1210 M manually controllable infrared digestion system</b> | <b>10 48 49500</b> |
| for 12 glasses at 100 ml each                                        |                    |
| <b>InKjel 1225 M manually controllable infrared digestion system</b> | <b>10 48 49999</b> |
| for 12 glasses at 250 ml each                                        |                    |
| <b>InKjel 450 M manually controllable infrared digestion system</b>  | <b>10 48 49450</b> |
| for 4 glasses at 500 ml each                                         |                    |
| <b>InKjel 475 M manually controllable infrared digestion system</b>  | <b>10 48 49475</b> |
| for 6 glasses at 250 ml each                                         |                    |
| <b>InKjel 625 P programmable infrared digestion system</b>           | <b>10 48 50001</b> |
| for 6 glasses at 250 ml each                                         |                    |
| <b>InKjel 1210 P programmable infrared digestion system</b>          | <b>10 48 49501</b> |
| for 12 glasses at 100 ml each                                        |                    |
| ① <b>InKjel 1225 P programmable infrared digestion system</b>        | <b>10 48 50002</b> |
| for 12 glasses at 250 ml each                                        |                    |
| <b>InKjel 450 P programmable infrared digestion system</b>           | <b>10 48 50003</b> |
| for 4 glasses at 500 ml each                                         |                    |
| <b>InKjel 475 P programmable infrared digestion system</b>           | <b>10 48 50004</b> |
| for 4 glasses at 750 ml each                                         |                    |

### Standard Kjeldahl block digestion systems behr K 8, K 12 and K 20

Block digestion systems with high-quality corrosion-resistant block housing made of stainless steel. With 8, 12 or 20 sample spaces for standard Kjeldahl digestion vessels with a volume of 250 ml. High-capacity heating and suction hood with exhaust collector

- behr one-button operation for especially simple and quick programming
- Menu structure in national language
- 25 freely assignable programmes for block temperature and digestion time
- Applications can be saved

Complete systems with digestion vessels, rack and suction hood.

| Article                                                         | Order No.          |
|-----------------------------------------------------------------|--------------------|
| <b>K 8 Standard Kjeldahl block digestion system</b>             | <b>10 48 49100</b> |
| 8 sample spaces, for digestion vessels with a volume of 250 ml  |                    |
| <b>K 12 Standard Kjeldahl block digestion system</b>            | <b>10 48 49101</b> |
| 12 sample spaces, for digestion vessels with a volume of 250 ml |                    |
| ② <b>K 20 Standard Kjeldahl block digestion system</b>          | <b>10 48 49102</b> |
| 20 sample spaces, for digestion vessels with a volume of 250 ml |                    |



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### Micro Kjeldahl block digestion systems behr K 16, K 24 and K 40

Block digestion systems with high-quality block housing made of stainless steel. With 16, 24 or 40 sample spaces for Mikro Kjeldahl digestion vessels with a volume of 100 ml. High-performance heating and suction hood with exhaust collector.

- behr one-button operation for especially simple and quick programming
- Menu structure in national language
- 25 freely assignable programmes for block temperature and digestion time
- Applications can be saved

Complete systems with digestions vessels, rack and suction hood.



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| Article                                                         | Order No.          |
|-----------------------------------------------------------------|--------------------|
| <b>K 16 Micro Kjeldahl block digestion system</b>               | <b>10 48 49150</b> |
| 16 sample spaces, for digestion vessels with a volume of 100 ml |                    |
| <b>K 24 Micro Kjeldahl block digestion system</b>               | <b>10 48 49151</b> |
| 24 sample spaces, for digestion vessels with a volume of 100 ml |                    |
| ③ <b>K 40 Micro Kjeldahl block digestion system</b>             | <b>10 48 49152</b> |
| 40 sample spaces, for digestion vessels with a volume of 100 ml |                    |

### Macro Kjeldahl block digestion system behr K 8 B

Block digestion system with high-quality block housing made of stainless steel. With 8 sample spaces for Macro Kjeldahl digestion vessels with a volume of 500 ml. High-performance heating and suction hood with exhaust collector.

- behr one-button operation for especially simple and quick programming
- Menu structure in national language
- 25 freely assignable programmes for block temperature and digestion time
- Applications can be saved

Complete systems with digestions vessels, rack and suction hood.

| Article                                                        | Order No.          |
|----------------------------------------------------------------|--------------------|
| <b>K 8 B Macro Kjeldahl block digestion system</b>             | <b>10 48 49110</b> |
| 8 sample spaces, for digestion vessels with a volume of 500 ml |                    |

### Accessories for the Kjeldahl digestion

| Article                                                                                                                  | Order No.          |
|--------------------------------------------------------------------------------------------------------------------------|--------------------|
| <b>KT 1 catalyser tablets</b>                                                                                            | <b>10 48 40100</b> |
| (5.0 g K <sub>2</sub> SO <sub>4</sub> ; 0.5 g CuSO <sub>4</sub> ), container with 1000 pieces                            |                    |
| ④ <b>KT 2 catalyser tablets</b>                                                                                          | <b>10 48 40101</b> |
| (5.0 g K <sub>2</sub> SO <sub>4</sub> ; 0.15 g CuSO <sub>4</sub> ; 0.15 g TiO <sub>2</sub> ), container with 1000 pieces |                    |
| <b>KT 3 catalyser tablets</b>                                                                                            | <b>10 48 40103</b> |
| (3.5 g K <sub>2</sub> SO <sub>4</sub> ; 0.4 g CuSO <sub>4</sub> ), container with 1000 pieces                            |                    |
| <b>KT 4 catalyser tablets</b>                                                                                            | <b>10 48 49920</b> |
| (3.5 g K <sub>2</sub> SO <sub>4</sub> ; 3.5 g Se), container with 1000 pieces                                            |                    |
| <b>AFS anti-foam tablets</b>                                                                                             | <b>10 48 40102</b> |
| <b>Boiling stones, content 100 g</b>                                                                                     | <b>80 48 30700</b> |
| To prevent boiling retardation.                                                                                          |                    |
| <b>Weighing paper, 100 sheets/Pad</b>                                                                                    | <b>10 48 41136</b> |



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## behr distilling unit

The behr steam distilling devices offer an automatic steam generator, pressure monitoring, automatic monitoring of filling level of storage tank, visibly mounted glass parts for distilling behind safe door made of acrylic glass with safety switch (no distilling possible when door is open), automatic time-controlled programme run, error diagnostics with optical and acoustic display, „standby“ function for lower consumption of power and cooling water, RS323-interface for data recording and control, user-friendly construction, behr one-button operation, user surface in many languages.

### behr steam distilling device S 1

Automatic adding of NaOH. The steam capacity is variable between 10% and 100%.

### behr steam distilling device S 2

Convenient distilling device. Programme control for adding of H<sub>2</sub>O and NaOH. The steam capacity is variable between 10% and 100%. Information on programme run and error messages by means of LED-display.

### behr steam distilling device S 3

Convenient distilling device for medium sample volume. Programme control for adding H<sub>2</sub>O and NaOH as well as extracting distilled sample residue. The steam capacity is variable between 10% and 100%. Information on programme run and error messages by means of LED-display.

### behr steam distilling device S 4

99 programs. Automatic adding of NaOH, H<sub>2</sub>O and H<sub>3</sub>BO<sub>3</sub>. Automatic extraction of distilled sample residue. The steam capacity is variable between 10% and 100%.

### behr steam distilling device S 5

Steam distilling device for applications involving a high sample workload, with option to connect an external titration unit. The steam capacity is variable between 10% and 100%

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| Article                                                  | Order No.          |
|----------------------------------------------------------|--------------------|
| <b>S 1 distilling system, semi-automated</b>             | <b>10 48 49001</b> |
| <b>S 2 distilling system, semi-automated</b>             | <b>10 48 49002</b> |
| ⑤ <b>S 3 distilling system, semi-automated</b>           | <b>10 48 49003</b> |
| <b>S 4 distilling system, fully automatic</b>            | <b>10 48 49004</b> |
| <b>S 5 distilling system, fully automatic</b>            | <b>10 48 49005</b> |
| prepared for external titrator (such as TB 2)            |                    |
| <b>KAS 20 canister set for S 1 and S 2</b>               | <b>10 48 49020</b> |
| consists of 2 canisters at 20 l each, incl. float switch |                    |
| <b>KAS 30 canister set for S 3</b>                       | <b>10 48 49030</b> |
| consists of 3 canisters at 20 l each, incl. float switch |                    |
| <b>KAS 40 canister for S 4 and S 5</b>                   | <b>10 48 49040</b> |
| consists of 4 canisters at 20 l each, incl. float switch |                    |
| <b>Titration modul TB 2</b>                              | <b>10 48 49050</b> |
| for connection to distilling unit S 5                    |                    |

## Process suction system behrosog 3

Features:

- Infinitely adjustable extraction performance
- Transparent safety screen for more user safety
- External, easy to access operating elements prevent the user from touching the hot glass elements
- Acid-proof diaphragm pump

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| Article                                                                          | Order No.          |
|----------------------------------------------------------------------------------|--------------------|
| ⑥ <b>behrosog 3 process suction system</b>                                       | <b>10 48 40008</b> |
| Scrubber with suction pump (40 l/h), condensation level and neutralisation level |                    |
| <b>ACS additional cooling system for behrosog 3</b>                              | <b>10 48 40009</b> |
| <b>TS mixed indicator according to Tashiro, 1 l</b>                              | <b>10 48 49148</b> |

## Manual Titration Station STI

The manual titration station STI consists of:

- a burette with digital display, and
- a magnetic stirrer with accurately fitting holder for one Erlenmeyer flask.

A screen is used as a neutral background, allowing the user an accurate identification of the color change at the end of titration. Thus, the user carries out all titrations under similar optical conditions, increasing the accuracy and reproducibility of the results.

The exact positioning of the sample vessel in the rack on the top of the magnetic stirrer also contributes to this result. The inclined side panels of the screen provide an additional protection from lateral glare.

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| Article                                               | Order No.          |
|-------------------------------------------------------|--------------------|
| ⑦ <b>Manual titration station STI</b>                 | <b>10 48 42020</b> |
| for nitrogen determination with Kjeldahl method       |                    |
| Delivery does not include the illustrated accessories |                    |

