behr Devices

for standard analysis in animal feed

Quality made in Germany

Extraction

Determination of dioxine (PCDD/ PCDF) and dioxine-like PCB contents

- Extraction units for 1 sample place
- In-line extraction devices for 4, 6 or 8 sample places

Determination of crude oil and fat content

1 **Classic extraction: Soxhlet**

behr equipment for Soxhlet extraction comply with the most various requirements of daily laboratory routines.

- Extractor sizes from 30 ml to 5000 ml
- Compact apparatus with one sample position
- Series extraction devices with 4, 6 or 8 sample positions

2 **Hot extraction according to Twisselmann**

Between 30% - 60% faster than the classic Soxhlet method (depending on sample material).

- Single position, 4 positions, 6 positions and 8 Stellen

3 **Hot extraction according to Randall**

Up to 40% - 70% faster than the classic Soxhlet method (depending on sample material)

- Single position, 4 positions and 6 positions

1 KEX 100 F-FB

2 R 108 T-FB

3 E 1

Find detailed information in our special leaflet:
behr Devices Extraction/distillation

Kjeldahl

Determination of crude protein content

1 ■ Standard Kjeldahl block digestors with 8, 12 or 20 sample places
for digestion vessels of 250 ml volume

2 ■ Micro Kjeldahl block digestors with 16, 24 or 40 sample places
for digestion vessels of 100 ml volume

■ Kjeldahl block digestors with fully automatic lift with 12 or 20 sample places
for 250-ml digestion vessels or with 24 or 40 sample places
for 100-ml digestion vessels

3 ■ 2-step acid fume extractor (scrubber)

4 ■ Steam distillers S 1 – S 5

5 ■ Titration stand STI

2   K 40

1   K 12

4   S 4

3   behrosog 3

Find detailed information in our
special leaflet: Nitrogen/Protein

5   STI

Kjeldahl

Determination of volatile nitrogen-containing bases by distillation

behr S series steam distillers are the optimum addition to the behr Kjeldahl digestion system. The top of the range unit, the behr S 5, is prepared for work with an external titrator, such as TB2.

1 ■ Steam distillers S 1 – S 5
2 ■ Titration module TB 2

Determination of the content of volatile nitrogenous bases by microdiffusion

■ Magnetic stirrer
■ Conway Diffusion Cells with the lid
3 ■ Titration stand STI

Determination of total phosphorus content

■ Standard Kjeldahl block digestors with 8, 12 or 20 sample places for digestion vessels of 250 ml volume
■ Kjeldahl block digestors with fully automatic lift with 12 or 20 sample places for 250-ml digestion vessels
4 ■ Infrared quick digestion system with 6 or 12 sample places for digestion vessels of 250 ml volume
5 ■ 2-step acid fume extractor (scrubber)

1   S 5   2   TB 2

Find detailed information in our special leaflet: Nitrogen/Protein

3   STI

4   InKjel 1225 TCP

5   behrosog 3

4

Distillation/Reflux distillation

Determination of dithiocarbamate and thiuramdisulfide residues. Spectrophotometric procedure

- Decomposition and distillation devices including flowmeter, mounting and tubing connections

Determination of dithiocarbamate and thiuramdisulfide residues. Gas-chromatographic procedure

- Heating plate for pre-heating the tin(II)chloride solution

1   D 2

Hydrocyanic acid determination by HPLC

1 - Steam distillers S 1 – S 5 and D 2

Determination of amino acids content (not including tryptophan)

2 - Reflux distillation mit 250 ml Rundkolben für 1, 4, 6 und 8 Destillationen gleichzeitig

Determination of vitamin A and vitamin E (Tocopherole und Tocotrienole) nach Verseifung

The complete apparatus consists of:

3 - Reaction vessels
- behr high performance glass coolers
- Cooling water distribution strip ensures uniform cooling at sample positions
- Precision heating block with integrated magnetic stirrers
- Separate control unit with very precise temperature control
- Flowmeter for nitrogen

optionally:

4 - KW 6 cooling trough

2   RH 254

3 VAE 6 zusammen
4 mit KW 6

Hydrolysis/Filtration

Determination of ashes insoluble in hydrochloric acid

1 ■ Hydrolysis digestion devices with 4 or 6 sample places

2 ■ Filtration unit with 4 or 6 sample places

■ behrotest® Muffle Furnance

Determination of crude fibre content B-II 7 (87)

Basic Line (manually):

1 ■ crude fibre separation apparatus with 4 or 6 sample positions

2 ■ filtration unit with 4 or 6 sample positions
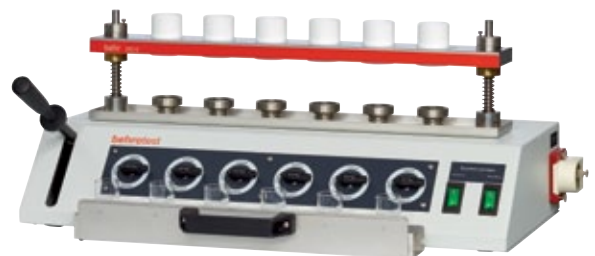
Comfort Line (semi-automatic):

3 ■ Semi-automatic crude fiber extraction unit with 4 or 6 sample positions

4 ■ Cold extraction unit for degreasing with 4 or 6 sample positions

5 ■ behrotest® Muffle Furnace

Determination of calcium, sodium, phosphorus, magnesium, potassium, iron, zinc, copper, manganese, cobalt, molybdenum, arsenic, lead, and cadmium by ICP-AES

5 ■ behrotest® Muffle Furnance

6 ■ behrotest® Heating plates

7 ■ behrotest® desiccator

1   EXR 6

2   SC 6

4   DG 6

3   CF 6

5   MO 8

6 KP 4

7 EXK 300

Calcimeter

Determination of carbonate content

1 ■ Calcimeter according to Scheibler with 1 sample position

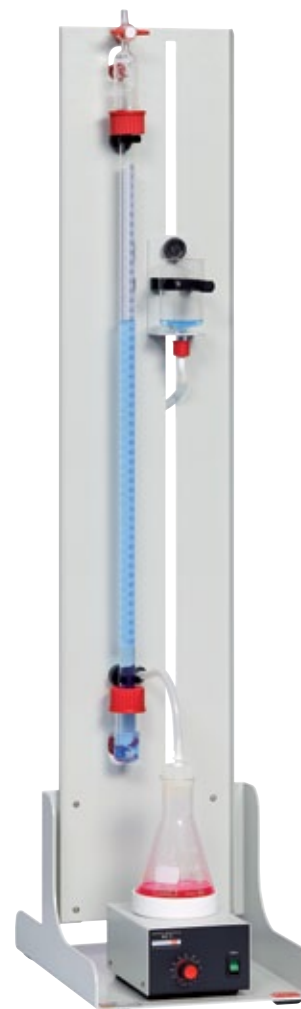**2** ■ Calcimeter according to Scheibler with 5 sample positions

optionally:

3 ■ behrotest® inductive magnetic stirrer

3 IMR 10 E

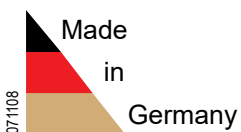**1** SCM 1

2 SCM 5

This may also interest you

Detailed information about our products can be found in our special brochures:

- Extraction/Distillation

- Kjeldahl method for determining nitrogen

- Determination of crude fibre

and in our product overview

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Subject to technical modifications, errors excepted.

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