



## KÖSTER BD 50

Technical Data Sheet B 290 010

Issued: 2019-01-28

- Test report 857/18/SG from the "Institute of Ceramics and Building Materials" Krakau, Poland according to DIN EN 14891
- Test report according to ZDB of the MPA Dresden
- CE certified according to the ETAG 022 as part of the KÖSTER BD System
- Laboratory test report ECL180403-253 VOC content and emission analysis

## Solvent-free elastic waterproofing for damp- and wet rooms under tile

	<b>KÖSTER BAUCHEMIE AG</b> Dieselstraße 1-10, 26607 Aurich 18 B 290 EN 14891:2012 <b>Liquid applied water                  impermeable product for                  external installations on walls                  and floors, beneath ceramic                  tiling</b>
	Initial tensile adhesion strength $\geq 0.5 \text{ N/mm}^2$ Tensile strength after contact with water $\geq 0.5 \text{ N/mm}^2$ Tensile adhesion strength after heat aging $\geq 0.5 \text{ N/mm}^2$ Tensile adhesion strength after freeze-thaw cycles $\geq 0.5 \text{ N/mm}^2$ Tensile adhesion strength after contact with lime water $\geq 0.5 \text{ N/mm}^2$ Crack bridging ability $\geq 0.75 \text{ mm}$ Waterproofing No penetration

### Features

KÖSTER BD 50 is a ready-for-use, solvent-free and easy to apply sealing compound for waterproofing surfaces under tile and coverings in damp and wet rooms. Once applied to the substrate, it cures to a highly flexible, waterproof synthetic foil which is highly elastic and crack-bridging. All customary solvent-free, flexible tile adhesives can be applied on top of KÖSTER BD 50. The tile can be laid in mortar or using the thick-bed or the standard thin-bed method.

### Technical Data

Viscosity	pasty
Density	approx. $1.50 \text{ g/cm}^3$
Application temperature above	+ 5 °C
Color	grey
Airing time 1st coat	approx. 3 hours
Wet layer thickness 1st and 2nd coat	0.5 mm
Drying time 2nd coat (prior to laying tile)	approx. 20 hours
Water vapor diffusion	$7.6 \text{ g/m}^2 \text{ d}$
Breaking load (N/mm <sup>2</sup> )	$2.1 \text{ N/mm}^2$
Elongation at break	220% (at + 23 °C)

### Fields of Application

KÖSTER BD 50 forms a seamless- waterproofing under tile and coverings on wall- and floor areas in damp and wet rooms, e.g. in showers, bathrooms, kitchens, car washes, etc. KÖSTER BD 50 is the area waterproofing layer under tile as part of the KÖSTER BD 50

System.

### Substrate

The substrate must be dry and clean, free of oil and grease, nonslip and sound, as well as stable, solid and level. Salt burdened substrates require priming with KÖSTER Polysil TG 500 (consumption: approx.  $130 \text{ g/m}^2$ ). All other substrates are primed with KÖSTER BD Primer.

In both cases, KÖSTER BD 50 can be applied after approx. 3 hours. Suited substrates include concrete, masonry, mineral plasters, porous concrete, fiberboards, gypsum, gypsum plaster boards and gypsum fiber boards, cement-, anhydrite- and magnesite screeds and all kinds of ceramic coverings.

### Application

Stirr KÖSTER BD 50 well prior to application. Apply KÖSTER BD 50 with a brush or roller. We recommend roughening of non-absorbent surfaces such as glazed tiles by sanding prior to the application of KÖSTER BD 50. On details such as corners and wall/floor junctions the application of additional system components such as KÖSTER BD Flex Tape K 120, KÖSTER Floor Sleeves and KÖSTER Inside- and Outside Corners is required in the fresh first coat. Alternatively, KÖSTER Superfleece can be embedded on top of the first coat in areas susceptible to cracking or to strengthen the waterproofing coating. Afterwards, apply the second coat. Approx. 20 hours after the second coating, tile can be laid. KÖSTER BD Flexible Tile Adhesive is perfectly suited for all mineral substrates.

### Consumption

Approx.  $1 \text{ kg/m}^2$

Per coat: approx.  $0.5 \text{ kg/m}^2$ . When applying the material with a roller, multiple coats are necessary.

### Cleaning

Clean tools immediately after use with water.

### Packaging

B 290 010 10 kg bucket

### Storage

Store the material cool but frost free. In originally sealed packages it can be stored for a minimum of 12 months.

### Related products

KÖSTER BD 50 Primer	Prod. code B 190 005
KÖSTER BD Flexible Tile Adhesive	Prod. code B 540 025
KÖSTER BD Flex Tape K 120	Prod. code B 931
KÖSTER BD Inside Corner	Prod. code B 932 001
KÖSTER BD Outside Corner	Prod. code B 933 001
KÖSTER BD Wall Sleeve	Prod. code B 934 001
KÖSTER BD Floor Sleeve	Prod. code B 935 001

The information contained in this technical data sheet is based on the results of our research and on our practical experience in the field. All given test data are average values which have been obtained under defined conditions. The proper and thereby effective and successful application of our products is not subject to our control. The installer is responsible for the correct application under consideration of the specific conditions of the construction site and for the final results of the construction process. This may require adjustments to the recommendations given here for standard cases. Specifications made by our employees or representatives which exceed the specifications contained in this technical guideline require written confirmation. The valid standards for testing and installation, technical guidelines, and acknowledged rules of technology have to be adhered to at all times. The warranty can and is therefore only applied to the quality of our products within the scope of our terms and conditions, not however, for their effective and successful application. This guideline has been technically revised; all previous versions are invalid.

KÖSTER Polysil TG 500  
KÖSTER Superfleece  
KÖSTER SB Bonding Emulsion

Prod. code M 111  
Prod. code W 412  
Prod. code W 710

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**KÖSTER BAUCHEMIE AG • Dieselstraße 1-10 • D-26607 Aurich • Tel. 04941/9709-0 • Fax -40 • [info@koester.eu](mailto:info@koester.eu) • [www.koester.eu](http://www.koester.eu)**