Primer BHH

Description

Primer BHH is a solvent free two part epoxy construction resin.
Primer BHH has great adhesive qualities for normal to strong absorbent porous substrates and is the recommended primer for porous cementitious substrates such as normal concrete and cement screeds.
Primer BHH can also be used as a scratch coat if a calcium carbonate such as Microdol A 100 is added at a mixing ratio of 1:1.
Even the use as a binder for a trowel floor or stone carpet is possible.

For use as:

- Economical Primer
- Scratch coats
- Binder for decorative gravel / mortar

Properties

Approx. 100% solid, solvent-free	
Low viscosity	
High adhesive strength	
Easily processable	
Alkylphenol-free hardener	
Very good pore filling capacity	
Density[1] (g/cm³) Primer	1,00
Density[1] (g/cm³) Scratch coat	1,50
Electrical conduction	>100 GΩ
Viscosity[2] (mPa.s) Primer	500 - 750
Viscosity[2] (mPa.s) Scratch coat	3,500 – 4,000
Adhesive strength[3] (N/mm²)	> 1.5 (Concrete fracture)
Shore hardness[4]	> D80

[1] = EN 12190, 14 days/ + 23 ºC/50% R.H
[2] = Brookfield, LV4, 30 RPM, @ 23ºC
[3] = EN 4624, 14 days/ + 23 ºC/50% R.H
[4] = DIN 53505, 14 days/ + 23ºC/50% R.H

Form

Component A: Liquid, clear
Component B : Liquid, clear to light yellow

Packaging

Component A: 8.5 kg and 20 kg bucket
Component B : 4 kg and 9.4 kg bucket

Sets: 12.5 kg and 29.4 kg

When used as a scratch coat the mixing ratio is 1 part resin to 1 part calcium carbonate.
When used as a binder for trowel applications we recommend 10% resin by weight.

Shelf life / Storage

Up to 12 months after the production date in the original, sealed, unopened and undamaged packaging, stored dry between +5ºC and +30ºC.

Mixing

Mixing ratio: Component A: Component B = 68: 32 (parts by weight)

Add part B to part A and mix continuously for two minutes until a uniform mixture has been achieved.

To ensure thorough mixing pour the materials into a clean second container and mix again for one minute to achieve an even consistency.

To minimize air bubbles avoid over mixing.

Mixing is preferably done with a power mixer on low speed, from 300 to 400 RPM, with a Quartzline WK90 mixer paddle.

System construction

Primer for porous substrates: ***Quartzline Primer BHH***

When in doubt always perform a preliminary adhesion test.

Scratch coat: To seal or level the surface, scratch with a combination of Primer BHH and a calcium carbonate such as Microdol A 100.

Wearing course: The following Quartzline floor systems can be used:

- Quartzline SL-PU D60
- Quartzline SL-PU D70
- Quartzline SL-PU UV
- Quartzline SL-EP 2K
- Quartzline Coating EPG
- Quartzline Coating PU SG Coloured
- Quartzline Mortar flooring

Topcoat Coating PU MG Matt or Satin Gloss, Coating PU STU and Coating PU SG Coloured or Transparent.

See corresponding technical data sheet to see witch floor / coating combinations are possible.

FOR EACH SELF-LEVELING / COATING SYSTEM THE FOLLOWING APPLIES:
After use of the primer and any scratch coat the substrate must be sealed BEFORE the self-leveling is applied. This is to avoid blisters and holes in the wearing course.

Consumption

Primer: For the first layer 125-150 and for the optional second layer 75-100 g/m²

Scratch coat: Instead of a second layer of primer a scratch coat can be used.
1 part Quartzline Primer BHH and 1 part calcium carbonate filler at 500 - 1000 g/m²

All values are theoretical and depend on porosity and levelness of the substrate.

Substrate preparation

The substrate must be clean and dry and free of dirt, oil, grease and any other impurities or contaminants.

The substrate must be sound and sufficiently compression resistant (at least 25 N/mm²), with a minimum adhesive strength of 1.5 N/mm².

Weak concrete and loose cementitious levelling must be removed, and surface damage such as blowholes and voids must be repaired with Quartzline Epoxygel and then primed again. **DO NOT USE POLYESTER PUTTY** as no adhesion will be obtained.

The concrete or screed substrate must be primed.
Uneven substrates must be levelled in order to achieve an even substrate. Use Quartzline Cementitious SL Underlayment or Cementitious SL Constructive. Please see corresponding Technical Data Sheet for more information.

Before applying the product, all dust and loose parts must be fully removed, preferably using a brush and/or industrial vacuum cleaner.
Concrete substrates must be mechanically prepared using abrasive blast cleaning or scarifying equipment to remove cement laitance and achieve an open textured surface.

Application conditions

Surface temperature:	Minimum 10ºC, maximum +35ºC
Ambient temperature:	Minimum 10ºC, maximum +35ºC
Substrate moisture content:	< 4% damp To be tested with a carbide meter.
Relative air humidity	Maximum 80% R.H.
Dew point:	Beware of condensation!

The temperature of the substrate and non-hardened material must be at least 3ºC higher than the dew point to reduce the risk of condensation, efflorescence or stickiness (carbamate formation) on the floor finish.

Remark: Low temperatures and high air humidity increase the risk of efflorescence or carbamate formation.

Application

Potlife @ 20ºC	25 minutes
Touch-dry @ 20ºC	12 hours
Foot Traffic @ 20ºC	2 days
Fully hardened @ 20ºC	7 days

Check the moisture content of the substrate, the R.H. and dew point before applying the product.

Primer and Scratch Coat application:

Apply the material evenly on the substrate, using a trowel or squeegee.

Primer BHH must be overlaid within 48 hours.

Remarks

The most important issue of priming and scratching is the filling of all the (micro) pores to avoid air bubbles and pinholes in the wearing coarse.
Uneven or dirt covered substrates should not be treated with thin coatings. Both substrate and adjacent areas should always be thoroughly prepared and cleaned prior to application.

Protection from rain and water is necessary during processing and hardening.

Wrong assessment and treatment of cracks can result in a reduction of lifespan and recurring cracking.
Mixed materials must be processed immediately as flow and defoaming will be reduced when pot life date expires.

If heating is required, do not use gas, oil, paraffin or other fossil fuel burners.
These produce large quantities of CO_2 and water vapour, which can adversely affect the finish. For heating, only use electrically powered hot air ventilation systems.

Cleaning/maintenance

To maintain the appearance of the floor after application, the floor must be kept clean and all spillages removed immediately.
The floor must be cleaned regularly using a rotary brush, mechanical scrubbers, scrubber dryer, high pressure washer, wash and vacuum techniques etc.
Always use suitable detergents and waxes.
Clean the floor with tepid water. Never use hot water (warmer than 40 °C).

Value base

All technical data stated in this technical data sheet is based on laboratory tests.
Actual measured data may vary due to circumstances beyond our control.

Health and safety information

For information and advice on the safety handling, storage and disposal of chemical products, users should refer to the most recent material safety data sheet containing physical, ecological, toxicological and other safety related data.

Legal notes

The information, and in particular the recommendations related to the application and end use of Quartzline products, is provided in good faith based on our current knowledge and experience of the products. It is valid for products that are correctly stored, treated and applied under normal conditions in accordance with Quartzline's recommendations.

In practice, differences in materials, substrates and actual on-site conditions are such that no warranty in respect of merchantability or of suitability for a particular purpose, nor any liability arising out of any legal relationship whatsoever, can be inferred either from this information, or from any written recommendations, or from any other advice offered.
The user of the products must test the product's suitability for the intended application and purpose. Quartzline reserves the right to change the properties of its products. The proprietary rights of third parties must be observed. All orders are accepted subject to our current terms of sale and delivery. Users must always refer to the most recent issue of the technical data sheet for the product concerned, copies of which will be supplied on request.

CE labelling

The harmonised European standard EN 13 813 „Screed material and floor screeds - Screeds - Material properties and requirements" specifies requirements for screeds for use with floor constructions.
Structural screeds or coatings, for example those contributing to the load bearing capacity of the construction, are excluded from this standard.
Both synthetic resin floors and cement-bonded screeds are covered by these specifications. They must be CE labelled according to Annex ZA. 3, Table ZA.1.5 and 3.3 and comply with the requirements of the Construction Products Directive (89/106):

CE	
Quartzline BV Daltonstraat 54 3316GD Dordrecht The Netherlands	
14 [1)]	
EN 13 813 SR-B1.5	
Primer (systems as in the Technical Data Sheet)	
Reaction to fire:	NPD[2)]
Release of corrosive substances: (Synthetic Resin Screed)	SR
Water permeability:	NPD
Abrasion resistance:	NPD
Adhesive strength:	B 1.5
Impact resistance:	NPD
Noise insulation:	NPD
Noise absorption:	NPD
Thermal resistance:	NPD
Chemical resistance:	NPD

[1)] The last two figures of the year in which the mark was awarded.
[2)] No Performance Determined.