

# SILRES<sup>®</sup> BS 66



## Silane-Siloxane mixtures

SILRES<sup>®</sup> BS 66 is a liquid oligomeric siloxane which is intended primarily for in-plant water-repellent treatment of aerated concrete. It may also be diluted with organic solvents for use as a water repellent for facades.

## Technical data

### General Characteristics

Property	Condition	Value	Method
Density	25 °C	1.03 g/cm <sup>3</sup>	DIN 51757
Viscosity, dynamic	25 °C	12 - 17 mPa·s	-
Appearance	-	clear, colorless	-
Active substance	-	100 %	-
Flash point	-	50 °C	ISO 2719

These figures are only intended as a guide and should not be used in preparing specifications.

All the information provided is in accordance with the present state of our knowledge. Nonetheless, we disclaim any warranty or liability whatsoever and reserve the right, at any time, to effect technical alterations. The information provided, as well as the product's fitness for an intended application, should be checked by the buyer in preliminary trials. Contractual terms and conditions always take precedence. This disclaimer of warranty and liability also applies particularly in foreign countries with respect to third parties' rights.

## Applications

- Construction Materials

- Hydrophobic Impregnation

## Application details

Undiluted SILRES® BS 66 serves as a water-repellent admixture for aerated concrete. Even when added in very small quantities, it dramatically reduces water absorption, and also optimizes the concrete's pore structure.

When used as a water repellent for facades,

SILRES® BS 66 is diluted with organic solvents. The resulting solutions are characterized by their good depth of penetration and excellent resistance to alkalis. The product may be applied to practically all absorbent mineral substrates, such as bricks, sand-lime brick, concrete, natural stone, mineral paints and plasters.

When the main focus is a pronounced beading effect, it is preferable to use the all-round water-repellent agent SILRES® BS 290.

### Processing

Water-repellent admixture for aerated concrete

SILRES® BS 66 develops full water-repellent properties when admixed as a masterbatch to the concrete slurry (approx. 20% content of

SILRES® BS 66). The addition of just 0.1 - 0.2% SILRES® BS 66, expressed in terms of the solids content, is sufficient to dramatically reduce water absorption by the aerated concrete and to optimize its pore structure.

Guide formulation:

Masterbatch

133 parts SILRES® BS 66

467 parts water

53 parts sand

13 parts lime

Aerated concrete

1065 parts sand

750 parts water

67 parts cement

270 parts lime

7.5 parts masterbatch

2 parts aluminium

Water repellent for facades

For impregnating facades, SILRES® BS 66 is diluted with organic solvents in a ratio of 1:11 to 1:15 parts by weight.

Preferred solvents are petroleum hydrocarbons, such as White Spirit 130/175, Shellsol T and isoparaffins. If the resultant solution is likely to come into contact with bitumen or with plastics that are attacked by solvents, we recommend that an alcohol is used instead as solvent, e. g. ethanol or 2-propanol.

The surface to be treated should look dry, with no damp patches. Carefully cover glass and other surfaces that must avoid contact with the solution, as it is almost impossible to remove the silicone resin once it has cured. The solution is best applied by flooding. To avoid flaws, apply two coats, wet on wet. Before impregnating a surface, try out the solution on a test area. This facilitates calculating how much impregnating agent will be required, and provides an indication of the product's efficacy.

### Additional information

Enhancer for hard surfaces

SILRES® BS 66 can be used to enhance the appearance of natural stone surfaces. To achieve this effect, SILRES® BS 66 should be applied as supplied. One to two coats of the product are applied to achieve an enhanced appearance. More coats of the solution should be applied to achieve an enhanced appearance with gloss. SILRES® BS 66 can be applied with a soft, lint-free cloth, sponge, roller or paint brush. Excess material should be removed to prevent inconsistencies in the enhancement. The product should be fully cured within 24hrs.

## Packaging and storage

### Storage

SILRES® BS 66 must be stored in the tightly closed original container under exclusion of moisture.

The "Best use before end" date of each batch is shown on the product label.

Storage beyond the date specified on the label does not necessarily mean that the product is no longer usable. In this case however, the properties required for the intended use must be checked for quality assurance reasons.

## Safety notes

Comprehensive instructions are given in the corresponding Material Safety Data Sheets. They are available on request from WACKER subsidiaries or may be printed via WACKER web site <http://www.wacker.com>.

## QR Code SILRES® BS 66



### For technical, quality or product safety questions, please contact:

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