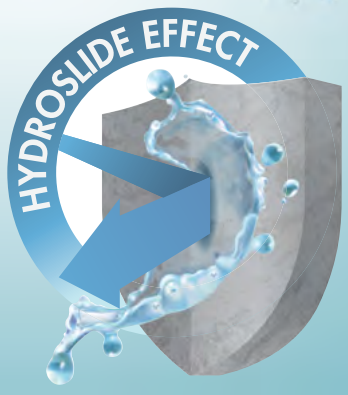
Polybit

Best protection against water

Discover Polybit slurries with Hydroslide Effect



Henkel

Quality for Professionals

Polybit waterproofing slurries with Hydroslide Effect

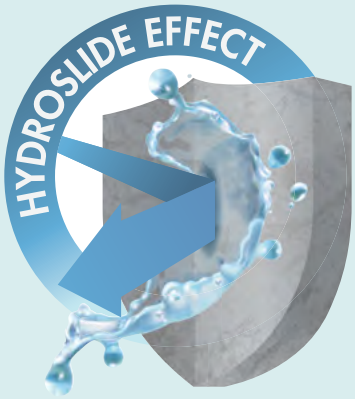
Our range of **cementitious slurries** offers you the right solution, no matter from what kind of water intrusion you would like to protect your building.

The waterproofing slurries from Polybit create an **immediate water-repellent effect,** which results in a stronger reduction of capillary absorption of water vs. other standard slurries.

Polybit Hydroslide Effect ensures a better protection & reinforcement of building structures, by providing unique benefits.

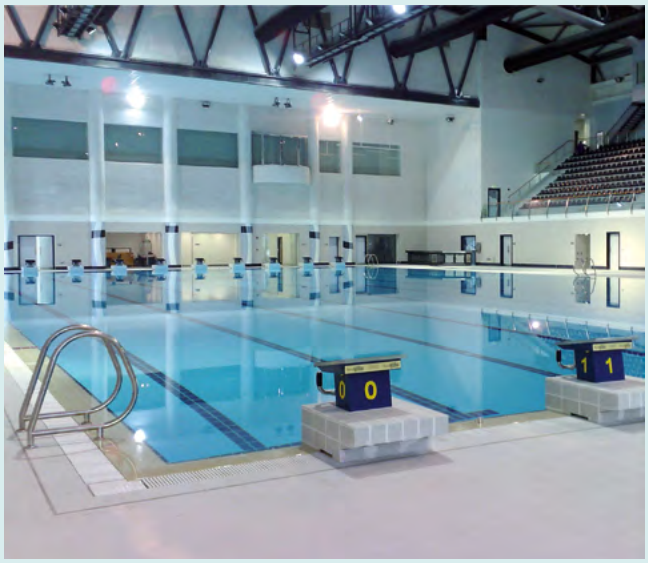
Stronger reduction of capillary absorption of water vs. standard slurries

Higher protection against dirt, mold and mildew



Stronger reduction of aggressive substances dissolved in water (e.g chlorides, de-icing salt)

Long lasting aesthetic effect



What is the Hydroslide Effect?

Polybit slurries with Hydroslide Effect reduce capillary absorption of water. Thanks to selected **hydrophobic agents.** This is the reason why our slurries have the property to **active repel water maintaining an optimal water vapor permeability.**

The hydrophobic effect can be measured with the contact angle, which is the angle between the edge of a droplet and a flat surface.

Hydroslide Effect – How to test it? With a simple spray test you can check whether a waterproofing slurry has a hydrophobic effect

Preparation

- Apply 2 mm thick waterproofing slurry on a test board 50 cm x 100 cm and let it dry for one day
- Fill an atomizer with clear cold water, make sure that the spray creates a water mist
- Distance from the sample surface: 30-40 cm
- Create a straight angle with the vertical surface and spray the water on the sample (5 times within 10 seconds)
- Observe the surface just after spraying

Test results

No hydrophobic effect:
Water is soaked in the surface. When observed against the light, the surface appears matt.

Polyflex
Hydrophobic effect:
Water is slightly soaked in the surface and drops are sliding, but they are partially absorbed on the way down. When observed against the light, the surface appears matt.

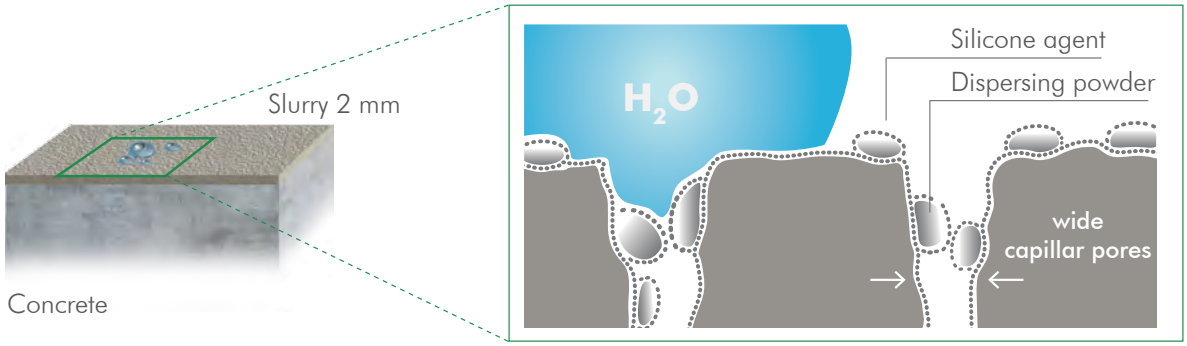
Polyflex combo & Polyflex S
Strong hydrophobic effect:
Most of the water is not soaked in the surface and drops are sliding down to the bottom. When observed against the light, the surface appears glossy.

The Hydroslide Effect in Polybit waterproofing slurries

All cementitious slurries have a capillary pore structure, which is responsible for water absorption. However, the level of capillary absorption is different in rigid and flexible slurries, due to the different performance requirements in specific application fields.

Capillary pore structure of Polyflex

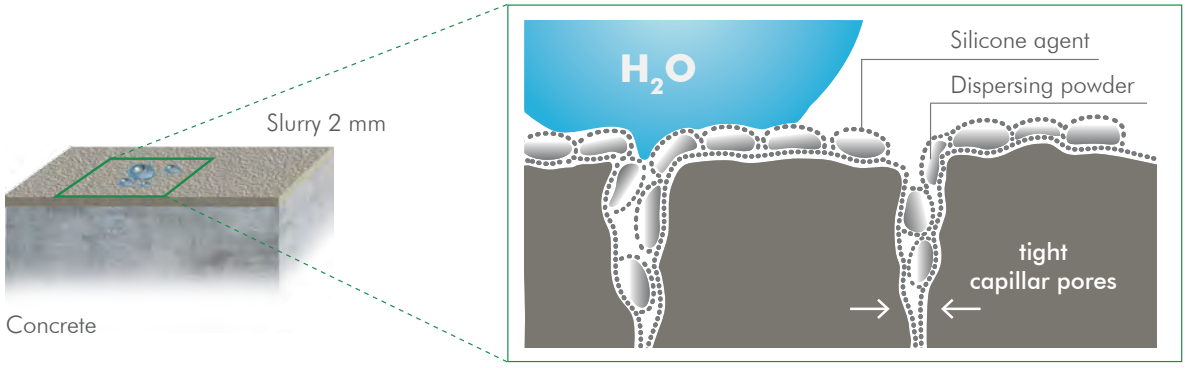
Generally, rigid slurries like **Polyflex** have a **wider capillary pores structure** vs. flexible slurries. Due to state-of-art combination of hydrophobic agents, our rigid slurry Polyflex is the best choice for defined application fields on non-critical substrates.



Capillary pore structure of Polyflex combo and Polyflex S

Polyflex Combo have **tighter capillary pores structure,** thanks to the specific combination of polymers, binders and fillers, which provides very high hydrophobic property. As a result, the more compact constitution ensures the optimal flexibility and crack bridging ability, which make Polyflex combo the excellent choice in application fields with deformable substrates, where structural movements can cause cracks in the concrete.

Polyflex S have **tight pores capillary structure** thanks to the increased hydrophobic content and add-on salts, which grow when in contact with water allowing the sealing of hairline cracks.



To ensure the best waterproofing protection, all Polybit slurries present the optimal level of capillary absorption in their required application fields, which can be visibly observed through the Hydroslide Effect. Test it now!

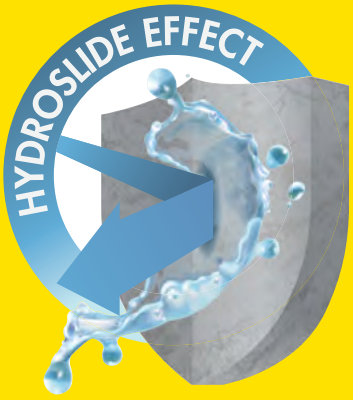
Why concrete needs best protection against water

Concrete surface features a network of micro-openings like capillaries, pores and cracks, which allows water to be absorbed: on one side, water absorption is necessary to hydration and hardening process; on the other, **water is the major transporter of harmful chemicals into the surface,** which leads to the **dramatic deterioration and damage of concrete.**

Without concrete protection

With concrete protection

Capillary absorption of water allows aggressive substances dissolved in water, like chlorids and other salts, to penetrate in the surface, causing **the corrosion of steel reinforcements** and other **structural damages.** Wet concrete surfaces are also exposed to organic growth of **dirt and mold/mildew,** which cause aesthetical and structural damages.



Polybit waterproofing slurries with Hydroslide Effect create an immediate water-repellent effect, which prevents deterioration and damage of concrete.

The reduced capillary absorption of water makes concrete protection & waterproofing more efficient, allowing to save cost of maintenance and to keep building structures durable and long lasting.

With our cementitious slurries you are always on the safe side!

Polyflex Combo

Acrylic modified elastomeric cementitious waterproofing and protective coating for concrete

CHARACTERISTICS

- Good flexibility. Thermal co-efficient of expansion similar to that of concrete.
- Good adhesion to both, porous and non porous surfaces.
- Good mechanical properties.
- Good abrasion resistance. Suitable for pedestrian traffic.
- High durability to long term weathering effect and UV.
- Non toxic, therefore suitable for potable water applications.

Polyflex S

Acrylic modified cementitious waterproofing coating

CHARACTERISTICS

- Factory produced and packed to avoid on site variations
- Seals light weight aerated blocks.
- Seals pre-cast joints.
- Non-Toxic, compatible with drinking water.
- Anti carbonation protection.

Polyflex

Two part acrylic modified cementitious waterproofing coating

CHARACTERISTICS

- Good flexibility. Thermal co-efficient of expansion similar to that of concrete
- Good adhesion to both, porous and non porous surfaces
- Good mechanical properties
- Suitable for light pedestrian traffic

Waterproofing and concrete protection

Pools, Wet areas, Drinking water tanks

Bridges, Industrial buildings, Pillars

Balconies, Terraces

Basements and foundations

Application areas

Characteristics	Polyflex	Polyflex S	Polyflex combo
Components	2K	2K	2K
Flexibility level	Low	Moderate	High
Crack bridging ability (according to specific norms)	>0.5mm	>0.5mm	>0.5mm
Under tile usage (EN local approval) – terraces, balconies, pools	✓	✓	✓
Pools	✓	✓	✓
Critical surfaces	✓	✓	✓
Kitchen/bathrooms	✓	✓	✓
Balconies/Terraces	✓	✓	✓
Wet substrates application	✓	✓	✓
Concrete protection (EN 1504-2)	✓	✓	✓
Drinking water tanks	✓	✓	✓
Negative water pressure resistance	3bar	3bar	3bar
Positive water pressure resistance	5bar	5bar	5bar
Shallow foundations	✓	✓	✓
Water reservoirs	✓	✓	✓

Application methods of cementitious slurries

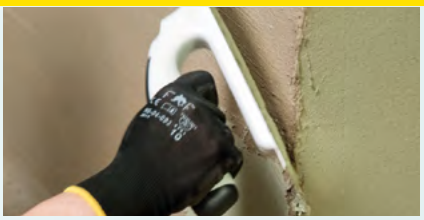
Substrate preparation



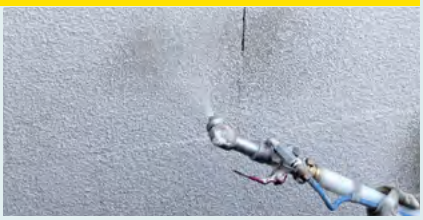
Make sure that the substrate is properly treated before applying the slurry. See Technical Data Sheet of the product for detailed information. You can download it from www.henkelpolybit.com.

Application methods

Brush application – Apply the first layer always with a brush. Apply the second layer only when the first one is already hard.



Trowel application – The second layer can be applied with a trowel only when the first one is already hard.



Spray application – The second layer can be applied with a spray only when the first one is already hard and then smoothened with a trowel.

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Your Polybit partner

Got your interest
For more information please contact our
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