

Non yellowing epoxy binder

DESCRIPTION AND APPLICATIONS



2-component, clear epoxy resin, suitable for use as an aggregate binder. Designed for use as a binder for pavement applications that are draining floors, with no yellowing over time.



BENEFITS

Easy to mix and apply, with an excellent support and stone wetting ability. Suitable for small repairs or smoothing finishes, mixed with fine grain size sand.



TECHNICAL DATA

INFORMATION ON THE PRODUCT BEFORE APPLICATION

	Component A	Component B
Chemical description	Epoxy resin	Polyamine mixture
Physical state	Liquid	Liquid
Packaging	Metal container 10 kg 3.33 kg	Metal container 5 kg 1.66 kg
Non-volatile content (%)	98%	98%
Flash point	>120°C	>100°C
Colour	Colourless	Slightly yellow
Density		
	Temp (°C) Density (g/cm3)	Temp (°C) Density (g/cm3)
	23 1.12	23 1.10
Viscosity		
approximate Brookfield	Temp (°C) Viscosity (mPa.s)	Temp (°C) Viscosity (mPa.s)
	25 100-200	25 7600
VOC	Almost 0	Almost 0
A/B mixing ratio	A=100, B=54.4 by weight A=89, B=49 by volume	
Mixture properties	Density: 1,1 g/cm3 at 23°C Viscosity: 530 mPa.s at 23°C Colour: slightly yellow	
Pot life approximate	Temperature (°C)	Pot life(100g,min)
	20	40
Storage	Keep between 10°C and 30°C, in a dry place	
Use before	12 months after manufacturing date.	

INFORMATION ON THE FINAL PRODUCT

Final state	Solid film
Colour	Colourless, slightly yellow
Solid density	1,00 g/cm3
Hardness (shore)	85D
Mechanical properties	Elongation at break: <5% Ultimate tensile strength: no data (EN-ISO 527-3)
UV resistance	No noticeable yellowing upon sunlight exposure is to be expected
Chemical resistance	Surface contact (24 hours, room temperatur, 5=ok, 0= not recommended)

Chemical	Result
White Spirit	5
Coffee	5
Isopropyl alcohol	5
Methoxypropyl acetate	5
Petrol/gasoline	5
Xylene	5
Sodium hydroxide (saturate)	5
Ethanol	4
Bleach	5
Trichloroisocyanuric acid	5
Formaline	5
Lubricant oil	5
Hydrogen peroxide	4
Acetic acid (10%)	2
Sulphuric Acid (30%)	1
Skydrol	5
Ammonia (3%)	5
Diesel	5

SUPPORT REQUIREMENTS

In order to achieve a good degree of penetration and bonding, support must be:

1. Flat and leveled (Product is self-leveling)
2. Compact and cohesive (pull off test must show a minimum resistance of 1,4 N/mm2).
3. Even and regular surface
4. Free from cracks and fissures. If any, they must be previously repaired.
5. Clean and dry, free of dust, loose particles, oils, organic residues or laitance

TEMPERATURE AND AMBIENTAL CONDITIONS

Optimal temperature range for application is 10°C- 30°C. These temperatures must be constant throughout drying process. Application should be done with plenty of air/ventilation.

SUPPORT PREPARATION

Concrete surfaces must be previously prepared by sandblasting or any other suitable means. Remove all dust and loose material before priming. Cut suitable joints along the concrete slab, depending on the total surface to be covered..

MIXING

Stir and homogenize thoroughly component A and B using a low-speed stirrer. The mixture turns to a homogenous clear liquid. Do not mix more material than the amount usable within the pot life window.

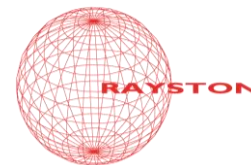
APPLICATION

To ensure good aggregate binding, the resin amount will depend on several points:

- Grain size
- Dust content in the mineral aggregates
- Degree of absorption of the mineral aggregates.

Depending on these points, the required amount of resin will range from 3% to 10% of the mineral aggregates, by weight.

Apply using a suitable spreader.



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It is advisable to apply a final sealing topcoat made with the same (diluted) resin or Colodur. It is important to prevent excess of sealing product since it will be readily absorbed and will give foamed and discoloured spots.

CURING TIME

For a 500 g/m² thick application.

Conditions	Dry to touch (h)
35°C, 25% rh	2
23°C, 50% rh	8
23°C, 5% rh	9
7°C, 60% rh	>20
-15°C	uncured

TOOL CLEANING

Cleaning of tools contaminated with both components must be done with Solvent Rayston.

SAFETY

Impermax Aqua 2k contains isocyanates. Always follow the instructions provided in the material safety data sheet and take the precaution described there. As a general rule, suitable ventilation must be ensured and any skin contact avoided. This product is intended to be used only for the uses and in the way here described. This product is to be used only by industrial or professional users. It is not suitable for DIY-type uses.

ENVIRONMENTAL PRECAUTIONS

Empty containers must be handled taking the same precautions as if they were full. Containers must be considered as hazardous waste, to be transferred to an authorized waste manager. If there is some residual product in the containers, component A and B can be mixed, always according to the A/B ratio, and allowed to cure. Do not mix volumes bigger than 5 litres in order to prevent dangerous reactions.

OTHER INFORMATION

The information contained in this DATA SHEET, as well as our advice, both written as verbal or provided through testing, are based on our experience, and they do not constitute any product guarantee for the installer, who must consider them as simple information.

We recommend to study deeply all information provided before proceeding to the use or application of any of our products, and strongly advise to conduct tests "on-site" in order to determine their convenience for a specific project.

Our recommendations do not exempt of the obligation of installers to deeply study the right application method for these systems before use, as well as to conduct as many preliminary tests as possible should any doubt arise. The application, use and processing of our products are beyond our control, and therefore under the exclusive responsibility of the installer. In consequence, the installer will be the only responsible of any damage derived from the partial or total in-observation of our indications, and in general, of the inappropriate use or application of these materials.

This data sheet supersedes previous versions.