



UNI EN ISO 9001:2008
Quality System Certified Company

PRODUCT

RTN 30 AZ

EPOXY ADHESIVE FOR PUTTYING STONE SLABS
MEDIUM VISCOSITY, QUITE GOOD TRANSPARENCY,
APPLICABLE ALSO AT LOW TEMPERATURES AND
MEDIUM/LOW HUMIDITY

Liquid bi-component epoxy adhesive, solvent free, fairly good transparent (GARDNER colour max. 5) of medium viscosity (350-450 cPs), self-levelling for strengthening and puttying stone slabs by manual or automatic system with oven of 100-120 minutes. Fairly good stability to the atmospheric agents and UltraViolet rays and suitable for exteriors.

USE

Stuccoing, puttying, strengthening marble, granite, natural and artificial stones.

PREPARING SURFACE

The pieces to be treated must be porous, clean and dry, as well as free of dust, oils and foreign matters.

COMPOSITION

COMPONENT A: Bisphenol A epoxy resin with reactive diluent/thinner

COMPONENT B: mix of poly-amines of low viscosity

MIXING RATIO (in weight):

COMPONENT A : COMPONENT B = 100 : 30

(i.e. 100 grams of comp. A mixed with 30 grams of B)

Epoxy adhesives require exact resin/catalyst mixing ratio (in weight)

Active substance content	%	100
Density at 25°C (77°F)	gr/cm ³	1.09
Flash point	°C (°F)	97 (206)
Time of use after mixing (test of 200 gr. at 25°C[77°F])	minutes	10-15
Air drying time (RH 50% 25°C[77°F]):		
High thicknesses 5 mm	hours	1-2
Low thicknesses 100 µm	hours	3-4
Use temperature	°C (°F)	>5 (>41)
Mineral fillers		absent

IMPORTANT: The reaction of catalysis (hardening) requires temperatures higher than 5°C-10°C (41°F-50°F).

APPLICATION: manually by spatula/spreading or by automatic machine

THICKNESS: recommended between 0,2 to 0,6 mm.

CONSUMPTION: 250-800 gr/m² depending on material porosity

TECHNICAL DATA SHEET

HARDENING

The speed of polymerisation/hardening increases with the increase of the temperature; anyway, when applying the product, the temperature must not be lower than 8°C-10°C (46°F-50°F).

The product hardens in **5-6 hours** and can be worked (grinded, polished etc.) after **10-12 hours**

The catalysis is fully completed after 24-36 hours.

SHRINKAGE ON HARDENING 0.25%

CHEMICAL RESISTANCE (Variations in % weight on diskettes after 21 days soaking at 25°C [77°F]).

Distilled water	1.6
Sodium hydroxide 10%	1.2
Acetic acid 10%	8.3
Hydrochloric acid 10%	2.0
Sulphuric acid 10%	3.3
Methylisobutylketone	4.8
Xylene	0.9
Ethanol 96%	11.8

STABILITY

The product must be kept in closed and sealed containers. If the containers are not properly closed, component B can absorb humidity and carbon dioxide which, during hardening, could produce air bubbles and opalescence. To avoid increase of viscosity and opalescence, it is suggested to store the product at temperatures higher than 10°C-15°C (50°F-59°F) or condition them to such temperatures.

SAFETY see Material Safety Data Sheet

MECHANICAL SPECIFICATION

(after 10 days' hardening at 25°C [77°F])

FLEXURE maximum load	N/mm ²	98
FLEXURE modulus of elasticity	N/mm ²	3650
COMPRESSION attrition load	N/mm ²	112
COMPRESSION modulus of elasticity	N/mm ²	2920
TRACTION breaking load	N/mm ²	51
TRACTION breaking extension	%	1.2
HDT	°C (°F)	87 (188)
HARDNESS	Shore D15	84

REMARKS: Epoxy adhesive compounds have excellent setting characteristics even on slightly damp surfaces. The low shrinkage (0.1 - 0.5%) causes only limited stress both during and after hardening, thereby favouring greater gluing and material stability. Once hardened they are resistant to severe atmospheric conditions (from -25°C to +60°C) and to water so they are also ideal for exterior use. The prolonged direct sunlight action can however cause the resin to turn yellow. Thanks to the great adhesive flexibility, heterogeneous materials such as concrete, steel, wood, many plastic materials, natural and artificial stones can be glued together, including in alternate layers.