

**Repair, Reinforcement and Restoration /
Epoxy Based Repair, Renovation and Reinforcement Products****REPOX® 340**

Polyester Chemical Anchoring Adhesive

DESCRIPTION

Polyester resin based, double component fast curing, high strength, multi-purpose, chemical anchoring in cartridge.

APPLICATION AREAS

- Indoor and outdoor
- Horizontal and vertical surfaces,
- Anchoring and mounting in areas exposed to extreme loads,
- Embedding and securing reinforcement bars,
- Structural strengthening applications,
- Installation of pipe connections, cable ducts, kitchen and bathroom fittings, and window elements,
- Installation of awnings, shutters, sunshades, and road signs,
- Assembly of billboards, lamps and lighting systems,
- Assembly of bolts, large screws, heavy-duty nails, satellite dishes, grilles, railings, balustrades and similar materials to surfaces like concrete and stone.

TECHNICAL PROPERTIES

Mixture Density	1.70 ± 0.10 g/cm ³
Application Temperature	Between +5°C and 30°C
Compressive Strength	84 MPa
Working Time	4 – 8 minutes (23°C, 50% humidity)
Curing Time (80% Strength)	45 – 60 minutes (23°C, 50% humidity)
Complete Curing Time	24 hours (23°C)
Service Temperature	Between -40°C and +80°C

ADVANTAGES

- Cures fast and has high strength.
- Can be applied on concrete, solid and hollow bricks, briquettes, natural stones, marble, granite and rocks.
- Can be applied on vertical and horizontal surfaces.
- Thixotropic, does not sag.
- Resistant to heat up to +80°C.
- Resistant to most of the chemicals.

CONSUMPTION:

Varies depending on the volume of the application area.

PACKAGING:

300 and 345 ml cartridges

APPLICATION

PREPARATION OF THE SURFACE

- The surface must be cured.
- The surface must be free of weakly adhered parts, clear of materials which prevent bonding, such as dust, oil, paint, curing agents, detergents and mold release oils and dry.
- When applying to porous structural elements such as masonry or brick, stress values may vary; therefore, safety factors should be considered depending on the substrate structure and strength.
- For optimum performance, the spacing between anchors should be at least twice the anchorage depth, and the distance from edges should be at least 1.25 times the anchorage depth.
- For anchoring applications, the drill bit diameter should be at least 4–5 mm larger than the reinforcement diameter.
- Drill holes suitable for the diameter and depth of the anchor, if possible *to improve bonding*.
- Clean dust, dirt, concrete particles remaining in the hole with a brush or air compressor. Cover the hole with a sponge or piece of paper to prevent dust and dirt from entering until the application time and the opening of the next hole.
- Anchor rods must be clean, free from oil and rust.

MIXTURE

- REPOX 340 is packaged in appropriate quantities as two components.
- Open the cartridge cover. Place the product in the special cartridge gun and attach the mixer tip. Spray on a cardboard until it gets a homogeneous and light gray color (10 – 15 cm), do not use this part.

APPLICATION

- Fill 2/3 of the hole with homogeneously mixed product, starting from the bottom of the hole, without air being drawn into it.
- Use transparent extension tube in deep holes if necessary.
- Rotate anchor rods slowly into the hole and place them so that their ribs are plastered with the product. Some REPOX 340 should overflow.
- Place the anchor rods within the open waiting period of the product.
- Throw away the mixer tip after use. If there is any material left, close the cartridge cover for future use.

Performance Table for Applications in Concrete Structures

Anchoring		Anchorage Depth h_{ef}	Standard Edge Distance C_{cr}	Standard Anchorage Distance S_{cr}	Tightening Torque T_{inst}	Maximum Recommended Load Values (24–40°C)	
Anchoring Class 5.8	Hole Diameter d_0					Concrete Class C20/25 Tensile Strength (kN)	Concrete Class C20/25 Shear Resistance (kN)
	mm	mm	mm	mm	mm		
M8	10	80	80	160	10	8.7	5.4
M10	12	90	90	180	20	13.7	8.7
M12	14	110	110	220	40	16.9	12.5
M16	18	125	125	250	60	24.1	22.5
M20	24	170	170	340	100	35.8	35.0
M24	28	210	210	420	150	52.0	50.0

CAUTION

- Avoid application at temperatures below +10°C and above +30°C. Do not apply outdoors during rainy and/or windy conditions.
- Do not use the product coming first from the gun.
- Do not apply on wet surfaces.
- Material to be fixed can be moved within the working time of the product.
- Avoid application in areas that are frozen, at risk of freezing within 24 hours, or in areas open to direct sun and wind.
- Do not touch for at least 24 hours after the application and prevent water contact.
- Consume the product within 1 month after opening the package.

SHELF LIFE

Expires in 18 months. Store unopened packages in cool, ventilated, dry environments, between 5°C and 25°C. Avoid exposition to direct sunlight. Keep against freezing.

HEALTH AND SAFETY

As with all chemical products, contact with food, skin, eyes and mouth should be avoided during usage and storing. In case of contact, rinse with water. If swallowed by accident, do not induce vomiting and consult a doctor. During the application, work wears, protective gloves and goggles should be used according to the work place health regulations. Do not bring food or beverages in application areas. Do not approach with fire. Ventilate the application areas. Keep out of reach of children.

The application instructions and technical values given for the products have been obtained in accordance with our tests and experiences in accordance with international standards at 23±2°C temperature and 50±5% relative humidity conditions. These values may vary depending on ambient conditions. High temperatures shorten the times, low temperatures lengthen them. Before starting the application, the user should test whether the product is suitable for the application and purpose. FIXA Construction Chemicals Ltd. is not responsible. This Technical Data Sheet remains valid until the next revision is published. FIXA reserves the right to change the values specified in this Technical Data Sheet, provided that the new version is published. It is the user's responsibility to check that the document is up-to-date. Please contact our sales department for more information.