

CAPOXY ANCHOR

EPOXY ANCHOR BOLT GROUT

DESCRIPTION

CAPOXY ANCHOR is a three component preweighed epoxy resin based grout designed to anchor threaded rod, bolds, rebar dowels and smooth dowels from 10- 50 mm diameter into concrete, grout filled block and other non reinforced masonry. Excellent bond to concrete along with high compressive, flexural and tensile strength make CAPOXY ANCHOR ideally suited to resist vibration, high torque loads and other physical stresses. CAPOXY ANCHOR is available on two grades "TC" and "FC".

CAPOXY ANCHOR "TC" is "thixotropic consistency" is designed for overhead or horizontal holes application.

CAPOXY ANCHOR "FC" is "flow-able consistency" is designed for horizontal surface holes anchoring application.

Anchoring bolt is a quick and efficient job with CAPOXY ANCHOR, just drill a hole slightly larger than the bolt and pour CAPOXY ANCHOR to anchor as desired.

USES:

CAPOXY ANCHOR is suitable to use for

- Anchoring application for horizontal, vertical and over-head surface.
- Hand rails
- Posts
- Railways tracks
- Reinforcement dowelling for abutments.
- Ground anchors for towers, cranes.

ADVANTAGES

- Fast and controlled setting time.
- High early strength
- High Mechanical resistance.
- Non-expansive
- Exceptional impact resistance.
- Excellent adhesion to most building material
- Easy to use economical and fast.

STANDARDS/TEST METHODS

ASTM C-881, C-579, C-580, C 413

Technical information

Wet density kg/liter : 2.1

Mixed consistency

CAPOXY ANCHOR "TC" : Thixotropic.
CAPOXY ANCHOR "FC" : Flow-able
Pot life at 25° C : 30 minutes.

Curing properties @ 25° c

Initial curing : Approx 12 hrs

Final cure : 7 days

Physical properties

Compressive strength

 $\begin{array}{ll} 1 \text{ day} & :> 50 \text{ N/mm}^2 \\ 7 \text{ days} & :> 80 \text{ N/mm}^2 \end{array}$

Bond strength

 $\begin{array}{ll} 1 \text{ day} & : 3000 \text{ psi} \\ 7 \text{ days} & : 3500 \text{ psi} \\ \text{Water Absorption} & : < 0.05 \% \end{array}$

CHEMICAL RESISTANCE:

Excellent against distilled water, inorganic acids, and alkalis. very good against organic acids and many organic solvent.

Application Temperature: 5 to 35 °C

DIRECTIONS FOR USE

Parameters of anchor design

Strong anchors can be created due to high strength of CAPOXY ANCHOR. The ultimate strength is determined by strength of substrate, embedment length of resin to bar, type of hole preparation, type and dimension of bar.

Hole preparation and formation

Optimum performance of CAPOXY ANCHOR requires rough sided, dust free holes. Use of rotary percussive drill with air or water flushing is recommended.

Diamond drilled holes should be under reamed unless necessary safety factors are incorporated. Cast holes should preferably be inverse dovetail configuration. If parallel sided holes are casted they should be roughened to provide adequate

Bar preparation

keying.

All bars should be degreased and all flakey rust removed.

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Hole Dimensions

Hole Depth - 12 times bolt diameter Hole Diameter – 1.5 times bolt diameter. Over 600mm deep a minimum of plus 50mm bolt diameter is recommended.

Mixing:

Stir each component separately in clean mixing container with a slow speed drill. Empty the components B in component A and, mix it for 2-3 Minutes slowly add component C and mix it 1-2 minutes with force action mixer, make sure there is no lumps or dry pockets of powder on paddles or in corner of the mixer. The amount of aggregates can be adjusted slightly to achieve desired consistency for specific use.

INSTALLATION:

Using the calculated volume of grout based on below mentioned table, the grout should be poured steadily into the prepared holes. The anchor bar is then pressed into the hole to the required depth. Slight agitation of the bar will assist in achieving a complete bond. The bar should then be left undisturbed in the required position until the resin has set.

Quantity estimate guide table indicates volume of CAPOXY ANCHOR "TC" and "FC" in ml/100 mm bond length.

Volume of grout for bolt diameter

volume of grout for bolt diameter								
Hole Diameter	12	16	20	25	32	38	45	51
mm	mm	mm	mm	mm	mm	mm	mm	mm
20	25							
25	50	40	25					
32	80	70	60	40				
38		100	100	75	45			
45			150	130	100	70		
51				180	150	120	75	
57				235	200	170	130	80
64				300	280	250	200	160
76					425	400	350	300

COVERAGE CAPOXY ANCHOR

4 kg kit Yields - 1.9 liters 30 kg kit yields - 14.3 liters

CLEANING OF TOOLS

Clean the tools and mixing equipment with CAP THINNER immediately after use. Cured material may only be removed mechanically

PACKAGING

CAPOXY ANCHOR (a+b+c) Grades "TC" and "FC" are available in : 4 kg, 30 kg kit

CAP THINNER : 5 liters

STORAGE

CAPOXY ANCHOR should be stored under shade at temperatures between 10^o C and 30^o C.

SHELF LIFE:

12 months in sealed original container, under recommended storage conditions.

SAFETY PRECAUTIONS

Keep container closed when not in use Keep out of reach of Children

Both components are irritant, prolonged contact with skin or Eye may cause sensitization.

FIRST AID

Skin contact

Wash thoroughly with soap and water.

Eve contact

Flush immediately with clean water and seek Medical advice

Respiratory Problem

Remove affected person to fresh air immediately And contact physician.

Hygiene

Wash hand immediately with **CAP THINNER** followed by soap and water.

TECHNICAL SERVICE:

Our Technical Service Department is available at any time to advise you in the correct use of this product or any other Ahlia products.

Note: The information presented herein is based on the best of our knowledge and expertise for which every effort is made to ensure its reliability. Although all the products are subjected to rigid quality tests and are guaranteed against defective materials and manufacture, no specific guarantee can be extended because results depend not only on quality but also on other factors beyond our control.

As all Ahlia Technical Data Sheets are updated on a regular basis, it is the user responsibility to collect most recent issue.

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