

PRODUCT DESCRIPTION

The IAA™TP mortar is a 2-component reaction resin mortar based on a pure epoxy and will be delivered in an exclusive 2-C cartridge system. This high performance product may be used in combination with a hand, battery, or pneumatic tool and a static mixer. It was designed especially for the anchoring of threaded rods, reinforcing bars or internal threaded rod sleeves into concrete (also porous and light) as well as solid masonry.

Based on the excellent standing behavior, the usability is given in combination with a special plastic sleeve in hollow material. The IAA™TP mortar product is characterized by a huge range of applications with an installation on temperature from +5°C and a service temperature up to 72°C, as well as by high chemical resistance for applications in extreme ambiances, e.g. in swimming pools (chlorine) or closeness to the sea (salt). The wide range of certificates, and national and international approvals, allows nearly every application.

PRODUCT FEATURES

- European approval acc. to TR 029 in concrete Opt 1+7: ETA-11/0132
- US-approval acc. to AC 308 in concrete (ICC-ES): ESR-3245
- Certificated for drinking water applications acc. to NSF Standard 61
- For heavy anchoring - doweling and post-installed rebar connection
- Fire resistance test report: 3122/388/11
- Suitable for dynamic loads
- Hammer-drilled and diamond-drilled holes possible
- Overhead application; water-filled bore holes
- Suitable for attachment points close to the edge, since anchoring is free of expansion forces
- High chemical resistance

PRODUCT USES

Suitable for facades, roofs, wood constructions, metal constructions, metal profiles, columns, beam, console, railing, sanitary devices, cable trays, piping, post-installed rebar connection (reconstruction or reinforcement), etc.

Application

Design should comply with ACI 440.2R or recognized design/ specification entity, and is typically based on CFRP contribution determined by detailed analysis. Design values will vary based on project requirements and applicable environmental and strength reduction factors. Contact our company to determine applicable design factors.

Underground

Cracked concrete, non-cracked concrete, light concrete, porous concrete, solid masonry, natural stone; hammer-drilled and diamond-drilled holes

Anchor Elements

Threaded rods (zinc plated or hot dip, stainless steel and high corrosion resistance steel), reinforcing bars, internal threaded rods, profiled rod and steel section with undercuts (e.g. perforated section)

Loading



Injectable Adhesive Anchor- IAA™TP

Static; quasi-static and seismic loading

Technical Data & Sizes

Rebar (mm)	Borehole (mm)
8	12
10	14
12	16
14	18
16	20
20	24
25	32
28	35
32	40
36	46
40	50

APPLICATION

- 1- Drill a hole into the base material to the size and embedment depth required by the selected anchor.
- 2- Standing water must be removed before cleaning. Starting from the bottom of the bore hole, blow the hole clean with compressed air or a hand pump a minimum of two times. If the bore hole ground is not reached, an extension shall be used. The hand-pump can be used for anchor sizes up to borehole diameter 20 mm. For bore holes larger than 20 mm or deeper than 240 mm, compressed air (min. 6 bar) must be used.
- 3- Finally, blow the hole clean again with compressed air or a hand pump a minimum of two times. If the bore hole ground is not reached, an extension shall be used. The hand pump can be used for anchor sizes up to borehole diameter 20 mm. For bore holes larger than 20 mm or deeper than 240 mm, compressed air (min. 6 bar) must be used.
- 4- Attach a supplied static-mixing nozzle to the cartridge and load the cartridge into the correct dispensing tool. For every working interruption longer than the recommended working time as well as for new cartridges, a new static-mixer shall be used.
- 5- Prior to inserting the anchor rod into the filled bore hole, the position of the embedment depth shall be marked on the anchor rods.
- 6- Prior to dispensing into the anchor hole, squeeze out separately a minimum of three full strokes and discard non-uniformly mixed adhesive

components until the mortar shows a consistent red color.

- 7- Starting from the bottom of the cleaned anchor hole, fill the hole up to approximately two-thirds with adhesive. Slowly withdraw the static mixing nozzle as the hole fills to avoid creating air pockets. For embedment depth larger than 190 mm, an extension nozzle shall be used. For overhead and horizontal installation in bore holes bigger than 20 mm, a piston plug and extension nozzle shall be used. Observe the gel / working times given.
- 8- Push the threaded rod or reinforcing bar into the anchor hole while turning slightly to ensure positive distribution of the adhesive until the embedment depth is reached. The anchor should be free of dirt, grease, oil or other foreign material.
- 9- Be sure that the anchor is fully seated at the bottom of the hole and that excess mortar is visible at the top of the hole. If these requirements are not maintained, the application has to be renewed.
- 10- Allow the adhesive to cure to the specified time prior to applying any load or torque. Do not move or load the anchor until it is fully cured.
- 11- After full curing, the add-on part can be installed with the max. torque by using a calibrated torque wrench.

LIMITATIONS

- Design calculations must be achieved by a professional company.
- Concrete deterioration and steel corrosion must be resolved prior to application
- Only apply this product when the ambient temperature is within the temperature range of the approved epoxy adhesive. Minimum application temperature is 4°C

Handling & STORAGE

• Storage:

Store in a cold and dark place, storage temperature: from +5°C up to +35°C

• Shelf Life:

24 months

CLEANUP

Dispose of material in accordance with local disposal regulations. Uncured material can be removed with approved solvents. Cured materials can only be removed mechanically.

FIRST AID

In case of skin contact, wash thoroughly with soap and water. For eye contact, flush immediately with plenty of water; contact physician immediately. For respiratory problems, remove to fresh air. Wash clothing before reuse.

DISCLAIMER OF LIABILITY

AFZIR, LLC warrants its products to be free from manufacturing defects. Buyer determines suitability of product for use and assumes all risks. Buyer's sole remedy shall be limited to replacement of product. Any claim for breach of this warranty must be brought within six months of the date of purchase.

AFZIR shall not be liable for any consequential or special damages of any kind, resulting from any claim

or breach of warranty, breach of contract, negligence or any legal theory.

The Buyer, by accepting the products described herein, agrees to be responsible for thoroughly testing any application to determine its suitability before committing to production.