### TECHNICAL DATA

# REPCON 928 FS (CONCENTRATE)

rapid-setting concrete repair mortar concentrate



### **DESCRIPTION**

REPCON 928 FS is a rapid-setting concrete repair mortar concentrate, that when mixed with stone, sand and water is suitable for use on concrete floors, highway pavements, bridge decks and other applications requiring early resumption of traffic or use. REPCON 928 FS is formulated to meet the requirements of ASTM C928 Packaged, Dry, Rapid Hardening Cementitious Material for Concrete Repair and AASHTO T260. REPCON 928 FS incorporates the latest in polymer technology offering superior durability, performance and ease of application without liquid activators or primers.

# FEATURES/BENEFITS

- Dry-polymer technology for ease of use and excellent freeze-thaw durability
- Fiber-reinforced for added flexural strength
- Air entrained for excellent freeze-thaw durability
- Natural concrete-gray color
- Formulated for horizontal application
- Takes foot traffic in 1 hour after set

### **APPLICATION**

#### **Surface Preparation**

The concrete must be sound and free of all foreign material, including oil, grease, dust, laitance or other surface contaminants. Square edges by saw cutting the perimeter of the repair 1/8" deeper than the depth of the repair, creating a notched, reinforced edge for maximum durability. Mechanically abrade the surface by an engineered approved method, such as grinding, abrasive blasting, or scarifying. All concrete of poor quality that is in contact with reinforcing steel should be removed. Remove rust from exposed reinforcing steel by brushing or sandblasting. Have all necessary tools and materials as near work areas as possible to permit rapid and continuous placement of REPCON 928 FS. All surfaces to be repaired should be in a saturated-surface-dry (SSD) condition with no standing water on the surface.

#### **Approximate Mix Design (1 cubic yard)**

1) RepCon 928 FS Concentrate 750 lbs 2) Sand 1125 lbs 3) 3/8"Stone 1875 lbs 4) Water (26-28 gal) 225 lbs

This mix design should be used only as a guideline. Use only clean washed, well graded sand and stone conforming to ASTM C33. The final mix design will depend on the local raw materials submitted for final review.

Follow ACI procedures when encountering hot or cold Weather conditions.

#### Mixing:

Place recommended amount of clean water in a suitable mixer. Add RepCon 928 FS with sand, 3/8" stone and mix thoroughly.

Initial set is approximately 20 minutes so mixer should be located close to the and placement area. Do not retemper or use hardened material.

#### Placement:

Scrub mixed material into prepared substrate. Place mixed REPCON 928 FS firmly into the prepared area, ensuring intimate contact with the bonding surface. Level and finish the material with wood or magnesium tool and finished to the desired texture (broom or tine). Finish REPCON 928 level with the surrounding concrete and allow to take an initial set.

#### Finishing/Curing

Immediately cure the material with wet burlap, rags or a SpecChem approved ASTM C309 compliant, membrane forming curing compound, Follow ACI recommended curing procedure in severe conditions such as hot, dry or cold weather conditions.

# **TYPICAL TEST DATA**

Test Data based on Typical Mix Design	
Set Time at 70°F (ASTM C266)	
Initial Set	20 min
Final Set	25 min
Compressive Strength (ASTM C109)	
1 hour	3000 psi
3 hours	4000 psi
1 day	6100 psi
7 days	8750 psi
28 days	10,100 psi
Bond Strength (ASTM C882 modified)	
7 days	1600 psi
Flexural Strength (ASTM C348)	
7 days	750 psi
28 days	1150 psi



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# SPECIFICATIONS/COMPLIANCE

ASTM C928 (Rapid Hardening Mortar) AASHTO T-260

# **PACKAGING**

- 50 lb bag
- 2500 lb bulk bags

### **CLEAN UP**

Tools and equipment may be cleaned with water before REPCON 928 hardens.

# **SHELF LIFE**

Shelf life of unopened bags stored in a dry facility is 6 months. Excessive temperature differential and/or high humidity can shorten the shelf life expectancy. Store in a cool, dry area away from direct sunlight.

# LIMITATIONS/PRECAUTIONS

Minimum thickness when mixed with stone for horizontal repairs subjected to traffic is 2". Do not retemper after initial mixing. Do not add other cements or additives to this product. Repcon 928 FS concentrate is a fast setting product, so mixing equipment should be cleaned with water as soon as possible. Use only potable water for mixing. Do not use limestone aggregate.

Cold Weather Application: Application at temperatures below 40°F/30°C optimal results will be reached by following the cold weather concrete procedures outlined in ACI 306. Heating the repair area, using warm water for mixing, and tenting or insulating the patch area after application will increase strength development. Do not use direct, unvented heat on the patch after installation. Do not allow repairs to freeze until the material has reached a minimum of 1000 psi compressive strength. In adverse temperatures, follow ACI recommendations for hot/cold weather concreting practices. For optimum results, condition material to between 65°F and 85°F. Do not place on concrete surfaces over 90° or under 40°F.

**Caution:** Contains Portland cement and sand. Cement will cause irritation. Avoid contact. A dust respirator, safety goggles, and rubber gloves are recommended. Avoid prolonged contact with clothing. In case of contact with eyes, immediately flush with water for at least 15 minutes. Get prompt medical attention. Do not wear contact lenses when working with this product. DO NOT take internally. Keep out of reach of children.

Avoid hazards by following all precautions found in the Safety Data Sheet (SDS), product labels, and technical literature. Please read this information prior to using the product.

DO NOT EXPOSE TO OR APPLY NEAR FIRE OR FLAMES. FOR WELL VENTILATED OR EXTERIOR USE ONLY!

### WARRANTY

# NOTICE-READ CAREFULLY CONDITIONS OF SALE

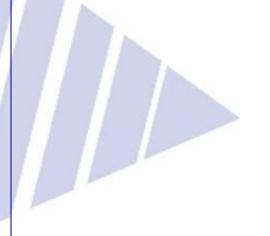
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Purchaser assumes all risk associated with the use or application of the product.





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