

FAST-SETTING SELF-LEVELING FLOOR RESURFACER

PRODUCT No. 1249-51, -52, -58

DIVISION 3

03-53-00 Concrete Topping
03-54-16 Hydraulic Cement Underlayment

PRODUCT DESCRIPTION

QUIKRETE® Fast-Setting Self-Leveling Floor Resurfacer is a rapid setting, self-finishing floor topping and underlayment specially formulated to work without troweling for both indoor and outdoor applications.



PRODUCT USE

QUIKRETE® Fast-Setting Self-Leveling Floor Resurfacer produces a smooth surface ready for the installation of ceramic tile, resilient flooring, carpet, or other finishes. QUIKRETE® Fast-Setting Self-Leveling Floor Resurfacer can also be used as a wear surface for light duty industrial floors. The following are typical substrates:

- Precast concrete plank
- New concrete floor slabs with unacceptable finishes
- Existing concrete floors with damaged finishes
- Over wood floor systems, utilizing expanded metal lath reinforcement
- QUIKRETE® Fast-Setting Self-Leveling Floor Resurfacer may be used for interior or exterior applications

SIZES

- 50 lb (22.6 kg) bags
- 50 lb (22.6 kg) pails

YIELD

- At a pourable consistency, a 50 lb (22.6 kg) pail will provide 0.45 ft³ (12.7 L) of material.

TECHNICAL DATA

APPLICABLE STANDARDS

- ASTM C109 Standard Test Method for Compressive Strength of Hydraulic Cement Mortars (Using 2-in. or [50-mm] Cube Specimens)
- ASTM C157 Standard Test Method for Length Change of Hardened Hydraulic-Cement, Mortar, and Concrete
- ASTM C191 Standard Test Method for Time of Setting of Hydraulic Cement by Vicat Needle
- ASTM C348 Standard Test Method for Flexural Strength of Hydraulic-Cement Mortars
- ASTM C1708 Standard Test Methods for Self-leveling Mortars Containing Hydraulic Cements
- ACI 305R Guide to Hot Weather Concreting
- ACI 306R Guide to Cold Weather Concreting

PHYSICAL/CHEMICAL

Typical results obtained for QUIKRETE® Fast-Setting Self-Leveling Floor Resurfacer, when tested in accordance with the referenced ASTM procedures, are shown in Table 1.

TABLE 1 TYPICAL PHYSICAL PROPERTIES

Flow, ASTM C1708	5 in to 6 in (125 mm to 150 mm)
Compressive Strength, ASTM C109 (Modified)	
Age	PSI (MPa)
24 hours	1800 (12.4)
7 days	4000 (27.5)
28 days	5500 (37.9)
Setting Time, ASTM C191	
Final Set	Approximately 90 minutes
Length Change, ASTM C157	
Age, Condition	
28 days, air	≥ -0.1%
28 days, water	≤ 0.1%
Flexural Strength, ASTM C348	
Age	PSI (MPa)
28 days	1200 (8.3)

INSTALLATION

SURFACE PREPARATION

Large holes should be repaired prior to the application of either product. Repair all holes deeper than 1 inch (25 mm) and holes that are deeper than 1/2 inch with an area greater than 6 in² (38.7 cm²). Make repairs with QUIKRETE Commercial Grade FastSet® Repair Mortar (No. 1241-60, -50, -20) or QUIKRETE Commercial Grade FastSet® Non-Shrink Grout (No. 1585-09, -50, -20) or other appropriate product. Allow repaired areas to cure overnight before final preparation. All surfaces should be clean and free of foreign substances including but not limited to the following: dirt, dust, oil, grease, and paint. The appropriate personal protective equipment should be worn during surface preparation. A final cleaning is required prior to priming. In most cases, pressure washing or shot blasting are the preferred final cleaning methods. Acid etching, solvents, and sanding are not acceptable means for preparing the substrate. If installing over wood floors, reinforce to prevent flexing of the floor. Seal all perimeter openings to retain leakage. These dams should be able to retain the resurfacer material at a height

greater than the finished surface elevation. Prime the clean, dry floor surface with diluted QUIKRETE® Concrete Bonding Adhesive (No. 9902). The primer should consist of 1 part QUIKRETE® Concrete Bonding Adhesive (No. 9902) blended with 2 parts water to obtain the proper penetration into the subfloor. Old, excessively porous concrete will require 2 coats.

Note – The primer consisting of diluted QUIKRETE® Concrete Bonding Adhesive (No. 9902) should be brushed or sprayed on the subfloor in such a manner as to produce a uniform coating. No pools or puddles should be present when resurfacer is applied. Allow the primer to dry to the touch (about 1 to 2 hours depending upon conditions).

MIXING

Mechanically mix both products for a minimum of 4 minutes using either a mortar mixer or in a 5 gallon (19 L) bucket using a heavy duty drill with paddle attachment capable of 650 RPM or greater. To ensure proper mixing, always add dry material to water when mixing, and never water to dry material. Use approximately 5 quarts (4.7 L) of clean potable water per 50 lb (22.6 kg) bag of either product. Adjust water as needed to achieve a self-leveling consistency. Higher water contents can cause separation, reduction of strength and shrinkage of the cured resurfacer. Mix until the material is thoroughly blended and free of lumps.

APPLICATION

Small areas may be placed by pouring from a 5 gallon (19 L) bucket or another suitable container. Larger areas should be resurfaced with continuous pumping equipment. Place the resurfacer by pouring directly from the mixing container. Placing should be done as one continuous operation. No screeding or troweling is required. The mixed material will remain fluid for approximately 20 minutes. Pour the material in continuous strips of about 1 foot (30 cm) in width across the narrow section of the application area. The material will level itself to a smooth surface. Pour the next strip adjacent to the edge of the previously placed material. Adjacent strips should be poured within 15 to 20 minutes to ensure a smooth continuous surface. Continue to work without breaks until the entire application area is covered.

QUIKRETE® Fast-Setting Self-Leveling Floor Resurfacer can be installed from 5/8 inch (16 mm) thick to a feather edge. For areas deeper than 5/8 inch (16 mm), apply QUIKRETE® Fast-Setting Self-Leveling Floor Resurfacer in layers no greater than 5/8 inch (16 mm) each. QUIKRETE® Fast-Setting Self-Leveling Floor Resurfacer can be installed from 1-1/2 inch (38 mm) thick to a feather edge, although a 1/4 inch (6.3 mm) minimum thickness is required for heavy traffic areas. For areas deeper than 1-1/2 inch (38 mm), apply QUIKRETE® Fast-Setting Self-Leveling Floor Resurfacer in layers no greater than 1-1/2 inch (38 mm) each. Prime the floor between layers with QUIKRETE® Concrete Bonding Adhesive (No. 9902) diluted per package instructions. Alternatively, for areas deeper than 1-1/2 inch (38 mm), QUIKRETE® Fast-Setting Self-Leveling Floor Resurfacer may be extended up to 50% with high quality minus 1/2 in (minus 13 mm) pea gravel. For best results, apply a final 1/4 inch to 1-1/2 inch (6.3 mm to 38 mm) layer without extension.

Note – The primer consisting of diluted QUIKRETE® Concrete Bonding Adhesive (No. 9902) should be brushed or sprayed on the subfloor in such a manner as to produce a uniform coating. No pools or puddles should be present when resurfacer is applied. Allow the primer to dry to the touch (about 1 to 2 hours depending upon conditions).

CURING

During the first 24 hours, it is best to keep the application area covered or damp to prevent excessive loss of water. Under hot, dry, and windy placement conditions, all concrete tends to lose moisture unevenly and may develop plastic shrinkage cracks. The use of QUIKRETE® Acrylic Concrete Cure & Seal (No. 8730), plastic sheeting, or an application of a very fine fog spray of water helps prevent shrinkage cracking.

PRECAUTIONS

- Control and expansion joints should be maintained to prevent cracking
- Follow ACI 305R when using product in hot weather. An example of an additional step would be using cold water when mixing in extremely hot weather.
- Follow ACI 306R when using product in cold weather. Examples of additional steps would be using hot water when mixing in severely cold weather and using plastic sheeting and insulation blankets if temperatures are expected to fall below 32 °F (0 °C).
- Protect the leveled floor until QUIKRETE® Fast-Setting Self-Leveling Floor Resurfacer has developed sufficient strength to withstand foot traffic. QUIKRETE® Fast-Setting Self-Leveling Floor Resurfacer may be walked on within 6 hours, depending on conditions.
- Allow 24 hours to 48 hours before applying finished flooring over QUIKRETE® Fast-Setting Self-Leveling Floor Resurfacer
- Before laying floor tiles and other materials, test for excessive moisture by taping a square polyethylene sheet tightly against the surface. After several hours, examine the sheet for entrapped moisture. If condensation exists, flooring should not be applied until this test results in a dry surface. Be sure to follow the application instructions of the tile or other finished flooring manufacturer.

SAFETY

IMPORTANT: Read Safety Data Sheet carefully before using. **WEAR IMPERVIOUS GLOVES**, such as nitrile, mask, and eye protection.

DANGER: Causes severe skin burns and serious eye damage. Prolonged or repeated inhalation of dust may cause lung damage or cancer.

Keep out of reach of children

WARRANTY

NOTICE: Obtain the applicable **LIMITED WARRANTY** at www.quikrete.com/product-warranty or send a written request to The Quikrete Companies, LLC, Five Concourse Parkway, Atlanta, GA 30328, USA. Manufactured by or under the authority of The Quikrete Companies, LLC. © 2023 Quikrete International, Inc.