

RE-CAP[®] CONCRETE RESURFACER

PRODUCT No. 1131-47

PRODUCT DESCRIPTION

QUIKRETE[®] Re-Cap[®] Concrete Resurfacer is a polymer-modified portland cement-based product designed for making thin layer repairs and restoring the appearance of existing worn or scaled concrete surfaces.

PRODUCT USE

QUIKRETE[®] Re-Cap[®] Concrete Resurfacer is a special blend of Portland cement, sand, polymer, and other additives designed to provide a shrinkage compensated repair material. QUIKRETE[®] Re-Cap[®] Concrete Resurfacer is designed to provide a new, durable, and wear-resistant surface over worn or scaled concrete.

- Apply from feather edge of 1/16 in to 1/2 in (1.6 mm to 13 mm) thickness
- Apply using squeegee, trowel, or brush
- Superior bond strength to old concrete surface
- Walk on in 8 hours and drive on in 24 hours
- Superior flow and finish

SIZES

- 40 lb (18.1 kg) bags

YIELD

One 40 lb (18.1 kg) bag of Re-Cap[®] Concrete Resurfacer will cover approximately 16 ft² (1.5 m²) of surface at a thickness of 1/4 in (6.3 mm) or approximately 65 ft² (6.0 m²) per bag when applied at the 1/16 in (1.6 mm) thickness with a broom or squeegee.

TECHNICAL DATA

APPLICABLE STANDARDS

- ASTM C109 Standard Test Method for Compressive Strength of Hydraulic Cement Mortars (Using 2-in [50-mm] Cube Specimens)
- ASTM C157 Standard Test Method for Length Change of Hardened Hydraulic-Cement, Mortar and Concrete
- ASTM C1708 Standard Test Methods for Self-leveling Mortars Containing Hydraulic Cements
- ASTM C1583 Standard Test Method for Tensile Strength of Concrete Surfaces and the Bond Strength or Tensile Strength of Concrete Repair and Overlay Materials by Direct Tension (Pull-off Method)
- ACI 305R Guide to Hot Weather Concreting
- ACI 306R Guide to Cold Weather Concreting

PHYSICAL/CHEMICAL PROPERTIES

Typical results obtained for QUIKRETE[®] Re-Cap[®] Concrete Resurfacer, when tested in accordance with the referenced ASTM procedures, are shown in Table 1.

DIVISION 32

03 01 00 Maintenance of Concrete
03 90 00 Concrete Restoration & Repair
03 92 00 Concrete Resurfacers



INSTALLATION

The specifications and information herein are provided for the cleaning, rehabilitating, and resurfacing of aged, dirty, and stained concrete driveways, sidewalks, and floors. By following the step-by-step instructions provided, old, worn-out concrete surfaces can be transformed into attractive, new-looking durable surfaces.

SURFACE PREPARATION

Old concrete must be rigorously cleaned to ensure proper adhesion of Re-Cap[®] Concrete Resurfacer to the old surface. Follow these easy steps to prepare the surface:

Manual Cleaning of Debris from Surface

- Wash, sweep, scrape, chip or grind the surface to remove loose concrete and foreign materials such as paint, greasy residue, algae, mildew, or other materials which may be stuck to the old surface

Pressure Washing

- Clean the surface using a 2500 PSI (17.2 MPa) pressure washer
NOTE: This step is essential to ensure a proper bond
- Follow pressure washer manufacturer's instructions as to safe operation and effective use

Penetrated oil or grease stains can be removed by acid washing, detergent washing or bleaching following manufacturer's instructions. Acid washing can damage the existing concrete if not performed properly. Be sure to rinse thoroughly with water to remove traces of cleaning solutions. Incomplete rinsing of the surface will interfere with performance of the Re-Cap[®] Concrete Resurfacer.

CONCRETE REPAIRS

Repairs to damaged concrete must be made before resurfacing can be initiated. Repair and level to the surrounding grade all badly damaged areas using one of the recommended concrete repair products made by the QUIKRETE® Companies. Allow repair material to cure thoroughly before applying Re-Cap® Concrete Resurfacer.

SPALLED AND PITTED SURFACES REPAIR

- Spalled and pitted surfaces may be repaired with Re-Cap® Concrete Resurfacer mixed to a trowel able consistency

CRACK REPAIR

- Cracks must be widened, cleaned, and filled with Re-Cap® Concrete Resurfacer mixed to a trowel-able consistency
- Existing control joints should be maintained
- Reflective cracking into the new surface cannot be completely prevented, especially if the slab does not contain adequate control joints or if slab settlement occurs
- Old expansion joints must be maintained, and new material installed to raise the expansion joints to the projected new height

CURB & EDGE REPAIRS

Repair the edges of broken concrete with QUIKRETE® Quick-Setting Cement (No. 1240) mixed with QUIKRETE® Concrete Acrylic Fortifier (No. 8610) or QUIKRETE® FastSet™ Repair Mortar (No. 1241).

PREPARATION FOR SLOPE & SURFACE

- No forms are needed for toppings less than 1/8 in (3.2 mm)
- For thicker toppings, use form boards or other leveling/slope guides. The guides should be sturdily fixed in place, but removable after the job is finished.
- Mask off surrounding areas
- Build up to the desired thickness in thin layers, each not exceeding 1/4 in (6.3 mm) in thickness

PLANNING THE PLACEMENT

- Section off the work into areas no larger than about 144 ft² (13 m²)
- Control joints and expansion joints can usually be used as natural breaking points. It is essential that control joints and expansion joints be maintained. Protect the joints to prevent spillage of the Re-Cap® Concrete Resurfacer into these joints. Duct tape or weather-stripping is helpful for protecting joints and surrounding areas.

MIXING

Mix in a 5 gal (19 L) bucket with a 1/2 in (13 mm) drill and paddle mixer. For squeegeeable / brushable consistency use approximately 2-3/4 qt to 3-1/4 qt (2.6 L to 3.1 L) of water per 40 lb (18.1 kg) bag. Add the powder to the water while mixing and mix for 2 minutes to a lump-free pourable consistency. Allow the mixed product to rest undisturbed for about 1 to 2 minutes, and then remix for 1 minute. Larger quantities can be mixed using a mortar mixer. For a decorative effect, add QUIKRETE® Liquid Cement Colors (No. 1317) to the water following the instructions on the bottle.

For a trowelable consistency, use approximately 2-1/2 qt to 2-3/4 qt (2.3 L to 2.6 L) of water per 40 lb (18.1 kg) bag.

APPLICATION

Water the existing concrete surface to saturated surface dry condition (SSD). Then completely remove any standing water from all places especially from low elevation spaces.

FIRST COAT USING SQUEEGEE APPLICATION

- Pour and spread a thin layer of mixed material onto the concrete surface with a long-handled squeegee
- Use sufficient pressure to work the material into the surface pores and build to a nominal 1/16 in to 1/8 in (1.6 mm to 3.2 mm) thickness. Do not overwork
- Finish off hard-to-reach corners and edges with a masonry brush

FIRST COAT USING TROWEL APPLICATION

- Pour the prepared mix onto the concrete surfaces
- Force a thin dash coat of material into the surface using a trowel
- Build up to nominal 1/16 in to 1/4 in (1.6 mm to 6.3 mm) thickness

RECOMMENDED OPTIONAL SECOND COAT

- Before applying second coat, allow the first coat to remain undisturbed until the surface can withstand light foot traffic
- Gently apply a light mist of water over the first coat
- The second coat must be applied within 24 hours of the first coat. Otherwise, the pressure washing technique used for preparation for the first coat must also be performed. Exercise caution to avoid washing off the first coat.
- Mix the material to the desired working consistency
- Apply the material to the desired total thickness, up to 1/2 in (13 mm)

FINISHING AND EXTRA TIPS

- To give a professional appearance, apply broom finish when surface is thumb print hard. Be sure all the broom strokes are in the same direction, perpendicular to the flow of traffic.
- If desired, a concrete edger and groover can be used to give a finished look around the edges when the material reaches appropriate hardness
- To achieve even, consistent patterns, apply the Re-Cap® Concrete Resurfacer starting at one end of the area and working towards the other. Ensure adequate labor is available so this process is not interrupted. Work from one expansion or control joint to the next, squeegeeing to a smooth uniform thickness before stopping. Continue in this manner until the entire job has been evenly completed.
- Finishing time will be reduced in hot weather, over 90 °F (32 °C).
- Finishing time will be extended in cold weather, under 50 °F (10 °C).

WORKING TIME

At squeegee consistency (2-3/4 qt to 3-1/4 qt (2.6 to 3.1 L) of water) Re-Cap® Concrete Resurfacer has a working time of about 20 minutes at 73 °F (23 °C). If the product begins to set in the bucket within this time, remix before using. Do not retemper. Wait 8 hours before allowing foot traffic on the surface. Allow 24 hours for vehicle traffic.

ADVERSE TEMPERATURE CONDITIONS

For the application, temperature of air and concrete surfaces should be in the range of 50 °F (10 °C) to 90 °F (32 °C). For application outside of this range contact Quikrete Technical Services and/or follow recommended guidelines.

CURING

Moist curing should begin as soon as product is hardened enough to not be damaged by a gentle mist of water. Continue moist curing for 24 - 48 hours prior to use. Protect from rain for at least 8 hours. Do not cover unless immediate rain protection is necessary. When covering, use sheet plastic.

NOTE: Color may be affected where plastic comes into direct contact with Re-Cap® Concrete Resurfacer

COLORS

QUIKRETE® Re-Cap® Concrete Resurfacer is grey in color and can be colored with QUIKRETE® Liquid Cement Colors (No. 1317) or with other pigments approved for use in concrete and masonry products. QUIKRETE® Re-Cap® Concrete Resurfacer has been designed to match typical concretes in color. Concrete colors vary. Determine color is acceptable by mixing a small amount, placing it in an inconspicuous area, and allowing it to harden overnight before proceeding with the entire project. Re-Cap® Concrete Resurfacer color will also vary depending on water added, curing conditions and variations in the underlying concrete.

PRECAUTIONS

- This product helps to provide a consistent surface appearance. However, variations in the underlying concrete and repairs may reflect minor shadows through the Re-Cap® Concrete Resurfacer.
- Old cracks can reappear due to movement in the base concrete.
- Temperature, relative humidity, wind velocity, sunlight, and shading, as well as dampness or dryness of the surface receiving the material, have an effect on the final color of the Re-Cap® Concrete Resurfacer.
- Apply only to bare concrete. Do not apply to painted or sealed surfaces
- Do not apply to surfaces coated with QUIKRETE® Concrete Bonding Adhesive (No. 9902)
- Mix only with potable water; do not use QUIKRETE® Concrete Acrylic Fortifier (No. 8610)
- Do not apply product over acrylic or polyurethane crack fillers, including but not limited to QUIKRETE® Concrete Crack Seal, QUIKRETE® Blacktop Crackseal, QUIKRETE® Concrete Repair or QUIKRETE® Self-Leveling Polyurethane Sealant.
- Concrete to be resurfaced must be kept damp. If the surface to be coated becomes dry, re-dampen before proceeding.
- For Squeegee application - mix no more material than can be used in 20 minutes; For Trowel application - mix no more material than can be used in 10 minutes.

- 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).
- For best results, do not overwork the material

TABLE 1 TYPICAL PHYSICAL PROPERTIES

Squeegeeable / brushable consistency water per bag	Approx. 2-3/4 qt to 3-1/4 qt (2.6 L – 3.1 L)
Flow, (ASTM C1708)	4-3/4 in to 5-1/2 in (120 mm to 140mm)
Compressive strength, ASTM C109 (Modified)	
Age	PSI (MPa)
1 day	1200 (8.3)
7 days	4500 (31.0)
28 days	5500 (37.9)
Tensile Strength by Direct Tension (Pull Off Method), ASTM C1583	
Age	PSI (MPa)
7 days	400 (2.7)
Trowelable consistency water per bag	Approx. 2-1/4 qt to 2-3/4 qt (2.1 L – 2.6 L)
Flow, (ASTM C1708)	4 in to 4-1/2 in (100 mm to 115 mm)
Compressive strength, ASTM C109 (Modified)	
Age	PSI (MPa)
1 day	1800 (12.4)
7 days	5500 (37.9)
28 days	6500 (44.8)
Tensile Strength by Direct Tension (Pull Off Method), ASTM C1583	
Age	PSI (MPa)
7 days	≥400 (2.7)

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 under the authority of The Quikrete Companies, LLC. © 2021 Quikrete International, Inc