Skim Coat & Patch Cement Underlayment



1. Product Name

Skim Coat & Patch Cement Underlayment

2. Product Description

A fast-setting, polymer-modified, cement-based compound that provides a smooth finish to interior and exterior subfloors prior to the installation of a floor covering. Mix with Patching & Leveling Latex Additive to form an ultra high-strength system over a variety of floor coverings or as an embossed vinyl floor leveler.

Key Features

- Patches and smooths existing flooring or plywood from featheredge to 1/2” (13 mm)
- Floor coverings can be placed in as little as 60 to 90 minutes

Suitable Substrates

- Concrete
- RedGard® Waterproofing and Crack Prevention Membrane
- Exterior Grade Plywood (interior applications)
- Ceramic tile, pavers, brick
- Stone
- Concrete terrazzo
- Sheet vinyl
- VCT
- Cutback adhesive (non-water soluble)

Composition of Product

Skim Coat & Patch Cement Underlayment is a blend of Portland cement, sand, and inorganic polymers.

Benefits of Product in the Installation

- Quick-setting formula permits floor covering installation in as little as 60-90 minutes
- Smoothes the finishes on interior and exterior subfloors
- Patches and levels concrete and plywood to 1/2" (13 mm)
- Combines with Patching & Leveling Latex Additive for added floor system strength

Limitations to the Product

- Do not bond directly to hardwood, lauan plywood, particleboard, parquet, cushion or sponge back vinyl flooring, metal, fiberglass, plastic or OSB panels.
- Do not use over lightweight concrete or gypsum underlayment, OSB, particleboard, hardwood floors, parquet floors or metal.
- Do not use over cushion backed vinyl flooring.
- Do not use when temperature is below 50°F (10°C).

Packaging

25 lb (11.34 kg) Bags

3. Technical Data

Applicable Standards

American National Standards Institute (ANSI) ANSI A108.01 and A108.02 of the American National Standards for the Installation of Ceramic Tile ASTM International (ASTM)

- ASTM C109 Standard Test Method for Compressive Strength of Hydraulic Cement Mortars (Using 2-in. or (50-mm) Cube Specimens)
- ASTM C531 Standard Test Method for Linear Shrinkage
- ASTM C580 Standard Test method for Flexural Strength Resilient Floor Covering Institute (RFCI) Recommended Work Practices for Removal of Resilient Floor Coverings

Tile Council of North America (TCNA) TCNA Handbook for Ceramic Tile Installation, TCNA Method EJ171

Environmental Consideration

Custom® Building Products is committed to environmental responsibility in both products produced and in manufacturing practices. Use of Skim Coat & Patch Underlayment can contribute to LEED® certification.

4. Instructions

General Surface Prep

USE CHEMICAL-RESISTANT GLOVES, such as nitrile, when handling product.

Surfaces must be structurally sound, clean, dry and free from grease, oil, dirt, curing compounds, sealers, adhesives or any other contaminant that would prevent a good bond. Glossy or painted surfaces must be sanded, stripped and cleaned of waxes, dirt or any contaminants. Concrete must be cured 28 days and accept water penetration. Concrete must be free of efflorescence and not subject to hydrostatic pressure. Concrete slabs should have a broomed or brushed finish to enhance the bond. Plywood flooring including those under resilient flooring must be structurally sound and meet all ANSI and deflection requirements. For questions about proper subfloor installation, call Technical Services. Smooth concrete surfaces, existing glazed tile, terrazzo, or polished stone should be roughened or scarified. Sheet vinyl must be well-bonded and stripped of old finish. Roughen the surface by sanding or scarifying, rinse and allow to dry. Expansion joints should never be bridged with setting material. Do not sand flooring materials containing asbestos. Ambient temperature, surfaces and materials should be maintained at a temperature above 50° F (10° C) or below 100° F (38° C) for 72 hours.

Bonding To Concrete Surfaces

Concrete or plaster must be fully cured and must accept water penetration. Test by sprinkling water on various areas of the substrate. If water penetrates, then a good bond can be achieved; if water beads, surface contaminants are present, and loss of adhesion may occur. Contaminants should be mechanically removed before installation. Concrete must be free of efflorescence and not subject to hydrostatic pressure. Concrete slabs should have a broomed or brushed finish to enhance the bond. Smooth concrete slabs must be mechanically abraded to ensure a good bond.

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Bonding to Gypsum Surfaces

Lightweight or gypsum-based underlayments must first be treated with RedGard® Waterproofing and Crack Prevention Membrane and must obtain a minimum 2000 psi (13.8 MPa) compressive strength at the recommended cure time. The underlayment must be sufficiently dry and properly cured to the manufacturer's specifications for permanent, non-moisture permeable coverings. Surfaces to be tiled must be structurally sound and subject to deflection not to exceed the current ANSI Standards All lightweight concrete and gypsum-based underlayment surfaces to receive RedGard® must be primed with properly applied sealer or a primer coat of RedGard®, consisting of 1-part RedGard® diluted with 4-parts clean, cool water. Mix in a clean bucket at low speed to obtain a lump-free solution. The primer can be brushed, rolled or sprayed to achieve an even coat. Apply the primer coat to the floor at a rate of 300 ft/gallon (7.5 M/L). Drying time depends on site conditions, but is normally less than 1 hour. Extremely porous surfaces may require 2 coats. At this point, RedGard® can be applied to the primed lightweight or gypsum-based surface. Refer to the individual product data sheet or packaging directions for application instructions. Expansion joints must be installed in accordance with local building codes and ANSI/TCNA guidelines. Refer to TCNA EJ171.

Bonding to Plywood and OSB Surfaces

Plywood floors, including those under resilient flooring, must be structurally sound and must meet all ANSI A108.01 Part 3.4 requirements. See TCNA F150. For questions about proper subfloor installation, call Custom® Building Products.

Bonding to Cutback Adhesive

Adhesive layers must be removed, as they reduce mortar bond strength to cement surfaces. Use extreme caution; adhesives may contain asbestos fibers. Do not sand or grind adhesive residue, as harmful dust may result. Never use adhesive removers or solvents, as they soften the adhesive and may cause it to penetrate into the concrete. Adhesive residue must be wet-scraped to the finished surface of the concrete, leaving only the transparent staining from the glue. To determine desirable results, do a test bond area before starting. Refer to the RFCI Pamphlet, "Recommended Work Practices for Removal of Resilient Floor Coverings", for further information.

Mixing Ratios

Mix 1 gallon (3.78 L) clean, cool water to a 25 lb (11.34 kg) bag of Skim Coat & Patch Cement Underlayment. For applications over cutback adhesive, sheet vinyl, terrazzo, ceramic tile or plywood, or to level embossed sheet vinyl, substitute Patching & Leveling Latex Additive for water.

Mixing Procedures

Slowly add powder to liquid while mixing with a low speed drill (300 RPM or less) and mixing paddle to a lump-free consistency. Mix amounts that can be applied in 10 minutes. Substitute Patching Latex Additive for water for better bond strength over cutback adhesive, sheet vinyl, terrazzo, ceramic tile, plywood, and when leveling embossed sheet vinyl flooring.

Application of Product

USE CHEMICAL-RESISTANT GLOVES, such as nitrile, when handling product.

Dampen all surfaces except for wood. Force material into all cracks and voids up to 1/2" (13 mm) thickness using a broad knife or trowel and finish flush with surface. For skim coating, use a smooth-edged trowel to level the surface area. Only spot patching should be done on wood surfaces. If a leveling layer over 5 ft. (1.5 M) in diameter is required, use an appropriate Custom® self-leveling underlayment.

Cleaning of Equipment

Clean tools and hands with soap and water.

Health Precautions

This product contains Portland cement. Avoid eye contact or prolonged contact with skin. Wash thoroughly after handling. If eye contact occurs, flush with water for 15 minutes and consult a physician. Use with adequate ventilation; do not breathe dust and wear a NIOSH approved respirator. If ingested, do not induce vomiting; call a physician immediately.

Conformance to Building Codes

Installation must comply with the requirements of all applicable local, state and federal code jurisdictions.

5. Size & Availability

Location	Item Code	Size	Package
USA	LQCSP25	25 lb (11.34 kg)	Bag
Canada	CLQCSP25	25 lb (11.34 kg)	Bag

6. Product Warranty

Custom® Building Products warrants to the original consumer purchaser that its product shall be free from defects in material and workmanship under normal and proper usage for a period of one year following the date of original purchase. Custom's® sole liability under this warranty shall be limited to the replacement of the product. Some states, countries or territories do not allow the exclusion or limitation of incidental or consequential damages, so the above limitation or exclusion may not apply to you. This warranty will not extend to any product which has been modified in any way or which has not been used in accordance with Custom's® printed instructions. Custom® makes no other warranties either expressed or implied. This warranty gives you specific legal rights, and you may have other rights that vary from state to state or from one country/territory to another. For details and complete warranty information, visit /reference-library/warranties.aspx

7. Product Maintenance

Properly installed product requires no special maintenance.

8. Technical Services Information

For technical assistance, contact Custom® Building Products.

9. Filing System

Additional product information is available from the manufacturer upon request.

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Coverage Chart

SQUARE FOOT COVERAGE PER 25 LB BAG (SQUARE METER PER 11.34 KG)

Thickness	Min Coverage	Max Coverage
1/8" (3 mm)	25 sq. ft. (2.3 M²)	27 sq. ft. (2.5 M²)

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