

High-Performance, High-Flow Concrete Patch





#### **DESCRIPTION**

Mapecem Quickpatch is a versatile, fast-setting, cementitious material used for the patching of interior/exterior concrete surfaces including concrete floors, driveways, sidewalks and concrete pads. Mapecem Quickpatch features extraordinary ease of placement, with a variable water ratio and outstanding workability. Light gray Mapecem Quickpatch can be applied from featheredge to 3" (7,5 cm) for ramping or filling. That makes it ideal for restoring weathered, damaged concrete surfaces to a uniform, superior wearing and better-than-new appearance. When used for horizontal substrate repair before application of self-leveling underlayments, Mapecem Quickpatch sets fast for easy and cost-efficient repairs, minimizing jobsite turnaround time.

#### **FEATURES AND BENEFITS**

- Natural gray to blend with existing concrete
- Extraordinary ease of placement
- Outstanding workability
- Fast-setting
- Highly versatile featheredge to 3" (7,5 cm)

#### **INDUSTRY STANDARDS AND APPROVALS**

LEED Points Contribution	LEED Points
MR Credit 4, Recycled Content*	Up to 2 points
IEQ Credit 4.1, Low-Emitting Materials –	
Adhesives & Sealants	1 point

\* Using this MAPEI product may help contribute to LEED certification of projects in the categories shown above. Points are awarded based on contributions of all project materials.

#### WHERE TO USE

- Patching concrete floors
- Patching exterior concrete, sidewalks and driveways
- Smoothing and ramping elevation changes
- Patching finished concrete surfaces where concrete's natural gray color is desired

#### **LIMITATIONS**

- Do not install over substrates containing asbestos.
- Mapecem Quickpatch is natural light gray and can be used as final wear surface.
- Mapecem Quickpatch can be installed from featheredge to 3" (7,5 cm) neat in confined areas.
- Mapecem Quickpatch can be primed and covered with a leveler, MAPEI's Concrete Renew™ or another topping in as little as 30 minutes depending on temperature.
- Mapecem Quickpatch can be colored with iron oxide pigments and liquid color packs. Verify compatibility before use.
- Mapecem Quickpatch is compatible with most sealers, dyes and concrete stains.

# Mapecem<sup>®</sup> Quickpatch















- Mapecem Quickpatch can be used for exterior concrete repairs and has excellent resistance to freeze/thaw cycles.
- Mapecem Quickpatch can be applied from 41°F to 95°F (5°C to 35°C). Allow for extra cure time when temperatures are below 65°F (18°C). Follow ACI guidelines when installing above 85°F (29°C).

#### **SUITABLE SUBSTRATES**

- Sound, stable, clean, horizontal interior and exterior concrete surfaces
- Properly prepared terrazzo, ceramic, stone and quarry tile

Consult MAPEI's Technical Services Department for installation recommendations regarding substrates and conditions not listed.

### SURFACE PREPARATION

- All substrates must be structurally sound, stable and clean.
- Thoroughly clean the surface of any substance that could interfere with the bond or the installation material including dirt, paint, tar, asphalt, wax, oil, grease, latex compounds, sealers, curing compounds, form release agents, laitance, loose toppings, foreign substances and adhesive residues.
- Concrete substrate and ambient temperatures must be between 41°F and 95°F (5°C and 35°C) before application. Temperatures must be maintained within this range for at least 4 hours after the installation of Mapecem Quickpatch. Protect from rain and fluid for 24 hours after application, and from freezing 24 hours after application.
- If necessary, mechanically remove weak concrete surface down to solid concrete, meeting at least 175 psi (1,21 MPa) tensile bond strengths.
- If using Mapecem Quickpatch for a final finished surface, repair all cracks in the substrate using conventional repair techniques before applying product. Use appropriate MAPEI product for crack repair (see Technical Data Sheet for instructions). Cracks will often telegraph through any overlay material. While crack repair is recommended before application of Mapecem Quickpatch, MAPEI does not warrant that cracks will not reappear, even when following established repair techniques.
- For best results, some porous or very dry substrates should be SSD (saturate surface-dry) with water. Do not apply on a wet surface.

#### **MIXING**

 Into a clean mixing container, pour the required amount of cool, clean potable water. Depending on application and desired consistency, mix with 0.81 to 1 U.S. qt.

- (0,77 to 0,95 L) of water per 10-lb. (4,54-kg) bag of *Mapecem Quickpatch*, or 4.1 to 5 U.S. qts. (3,88 to 4,73 L) of water per 50-lb. (22,7-kg) bag. Place water in mixing pail and mix product while slowly adding powder. The mixing ratio must remain consistent. Do not overwater material.
- 2. Mix with medium-speed drill (at 550 to 800 rpm), with a box or other appropriate paddle for at least 2 to 3 minutes, ensuring lump-free consistency.
- Use Planicrete® UA to increase performance and durability (refer to TDS for Planicrete UA). Do not add cements or other admixtures to Mapecem Quickpatch.
- 4. *Mapecem Quickpatch* can be extended up to 30% with clean, stable 3/8" (10 mm) aggregate for uses greater than 3" (7,5 cm) in depth.
- 5. Do not mix more material than can be applied in 15 to 20 minutes. Do not re-temper or add more mix water.

Note: Choose all appropriate safety equipment before use. Refer to MSDS for more information.

#### PRODUCT APPLICATION

- Read all installation instructions thoroughly before installation.
- Before application, test all surface treatments on a small sample area to ensure the desired results.
- 3. Do not apply over wet surfaces.
- 4. Do not apply when rain is expected before sealing the surface or until the product is well-cured.
- Primer is not required over clean, dry, well-prepared concrete substrates.
- 6. Primer may be required for nonporous substrates like ceramic, quarry tile, terrazzo, or when *Mapecem Quickpatch* is used as a final finished surface. Use *Primer L™* for porous substrates, and or *Primer T™* for nonporous substrates (see primer's Technical Data Sheets for instructions).
- Immediately after mixing, pour the Mapecem Quickpatch onto the surface and work it in to obtain an excellent mechanical bond. Allow the product to set before finishing.
- When using Mapecem Quickpatch as a final wear surface, apply an appropriate finish (such as a broom finish) shortly after the material has been placed.
- 9. Mapecem Quickpatch can be covered with a MAPEI leveler, Ultra SkimCoat™, tile-setting materials and other adhesives in as soon as 45 to 60 minutes (depending on temperature) after application. Wood floors and adhesives sensitive to moisture can be used over Mapecem Quickpatch in as soon as 16 hours. Always use standard ACI and ICRI guidelines for best results.

## **Product Performance Properties**

Laboratory Tests	Results
Pot life	20 minutes
Open time <sup>†</sup>	5 to 20 minutes after applying
Application temperature range	41°F to 95°F (5°C to 35°C)
Initial set	35 to 40 minutes
Final set	50 minutes
Drying time	16 hours (curing time)
Compressive strength (ASTM C109)	
4 hours	> 1,650 psi (11,4 MPa)
24 hours	> 2,700 psi (18,6 MPa)
7 days	> 3,700 psi (25,5 MPa)
28 days	> 4,000 psi (27,6 MPa)
Flexural strength (ASTM C348-02)	
28 days	> 1,200 psi (8,28 MPa)
Color	Natural gray

Protect containers from freezing in transit and storage. Provide for heated storage on site and deliver all materials at least 24 hours before work begins.

## **Mixing Ratio**

10 lbs. (4,54 kg)	0.81 to 1 U.S. qt. (0,77 to 0,95 L) of water
50 lbs. (22,7 kg)	4.1 to 5 U.S. qts. (3,88 to 4,73 L) of water

# **Shelf Life and Application Properties**

10-lb. (4,54-kg) or 50-lb. (22,7-kg) bag	1 year when stored in original, unopened container at 73°F (23°C) in a dry, heated area	
25-lb. (11,3-kg) bag	6 months when stored in original, unopened container at 73°F (23°C) in a dry, heated area. The product should be stored wrapped at all times.	

# **Packaging**

Product Code	Size
U.S. 10510000	Bag: 10 lbs. (4,54 kg)
Canada 1051000021	Bag: 10 lbs. (4,54 kg)
Canada 10525000	Bag: 25 lbs. (11,3 kg)
10550	Bag: 50 lbs. (22,7 kg)

# Approximate Product Yield\*

Per 10 l	lbs. (4,54 kg)	4 to 5 sq. ft. (0,37 to 0,46 m²) at 1/4" (6 mm)
Per 50 I	lbs. (22,7 kg)	20 to 24 sq. ft. (1,86 to 2,23 m <sup>2</sup> ) at 1/4" (6 mm)

<sup>\*</sup> Yield shown is for estimating purposes only. Actual jobsite yield may vary according to substrate conditions and setting practices.





<sup>†</sup> Open times vary based on temperature, humidity, substrate, application techniques and jobsite conditions.

# Mapecem<sup>®</sup> Quickpatch





# EXPANSION AND CONTROL JOINTS

- Honor all expansion and control joints. Cut them as soon as the Mapecem Quickpatch has cured hard enough to walk on without damaging the surface.
- Do not allow Mapecem Quickpatch to bridge any moving expansion joint.
- For repairs subject to high loads or heavy traffic, follow ACI and ICRI guidelines.

#### **CURING**

- Mapecem Quickpatch is self-curing; do not use a dampcuring method.
- When leaving Mapecem Quickpatch as an exposed wear surface seal with Mapefinish Wet Look or an alternate water-based sealer as soon as 3 hours after material dries (when temperatures are above 70°F [21°C]). If a solvent-based sealer is used, allow the Mapecem Quickpatch application to dry for 7 days before application of the sealer.
- Avoid walking on the installed surface for at 45 to 60 minutes after installation, depending on temperature and humidity conditions.

#### **CLEANUP**

 Wash hands and tools with water promptly before material hardens. Cured material must be mechanically removed.

### **PROTECTION**

- Protect from traffic, dirt and dust and moisture until Mapecem Quickpatch is cured.
- Do not expose Mapecem Quickpatch to rolling or dynamic loads for at least 24 hours after installation.
  Note: Cooler conditions require longer curing times before exposing to significant traffic.

 Test all surface treatments on a small sample area, before application, to ensure the desired results.

Refer to the MSDS for specific data related to VOCs, health and safety, and handling of product.

# STATEMENT OF RESPONSIBILITY

Before using, user shall determine the suitability of the product for its intended use and user alone assumes all risks and liability whatsoever in connection therewith. ANY CLAIM SHALL BE DEEMED WAIVED UNLESS MADE IN WRITING TO US WITHIN FIFTEEN (15) DAYS FROM DATE IT WAS, OR REASONABLY SHOULD HAVE BEEN, DISCOVERED.

We proudly support the following industry organizations:





















# **MAPEI Headquarters of the Americas**

1144 East Newport Center Drive Deerfield Beach, Florida 33442 Phone: 1-888-US-MAPEI (1-888-876-2734)

### Technical Services

1-800-992-6273 (U.S. and Puerto Rico) 1-800-361-9309 (Canada)

#### **Customer Service**

1-800-42-MAPEI (1-800-426-2734)

For the most current BEST-BACKED™ product data and warranty information, visit www.mapei.com.

Edition Date: June 9, 2010 PR4914 MQPD\_F10Evp © 2010 MAPEI Corporation. All Rights Reserved. Printed in the USA.