

# LATICRETE® 255 Multimax™

DS-255.0-0913

# **Globally Proven** Construction Solutions



## 1. PRODUCT NAME

LATICRETE 255 Multimax™<sup>Λ</sup>

## 2. MANUFACTURER

LATICRETE UK

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# 3. PRODUCT DESCRIPTION

LATICRETE® 255 Multimax™∧ is a patented, lightweight versatile polymer fortified thin-set that provides maximum non-sag performance on walls, maximum buildup of up to 19 mm without shrinkage for floors and maximum coverage due to its lightweight creamy smooth consistency. In addition, LATICRETE® 255 MULTIMAX^ is reinforced with Kevlar® to provide maximum strength and durability. It is also GreenGuard certified and now contains >10% premium recycled content.

# Uses

- For wall installations of interior and exterior ceramic tile, porcelain tile and stone.
- Can be used as a medium bed mortar for flooring installations.
- Ideal for showers, bathrooms and wet areas where large format tiles are to be installed on walls & floors.
- vertical. & horizontal installation manufactured stone and thin brick veneers on exterior and interior installations.
- Ideal for both commercial and residential installations.

## **Advantages**

- Revolutionary patented formula combines excellent workability with optimum medium bed performance.
- Anti-fungal protection inhibits the growth of stain-causing mould and mildew
- Reinforced with Kevlar® for maximum strength and performance.
- Incredible non-sag performance, even with heavy tile.
- High coverage—15% more than conventional thin-sets.
- Lightweight mortar—very smooth and easy to trowel.
- medium bed performance. Excellent thick without shrinkage.
- "Extra Heavy Service" rating per TCNA performance levels (RE: ASTM C627 Robinson Floor Test).

## Suitable Substrates

- Exterior glue plywood\*
- Concrete
- Mortar Bed
- Concrete block
- Cement Plaster/Render
- Ceramic tile
- Gypsum wallboard\*
- Cement backer board\*\*
- Masonry and brick

## **Packaging**

15 kg bag

## Colours

Grey and White

## Approximate Coverage

15 kg bag mixed with 5.0ℓ of water

## **Trowel Size**

Wall Applications—5.0 € of Water	m²	
6 mm x 6 mm notched trowel	7.0 - 8.0	
6 mm x 9 mm notched trowel	4.2 – 5.0	
Medium Bed Applications—5.0 € of Water		
12 mm x 12 mm notched trowel	3.2 – 3.8	
Thin Bed Applications—5.7 € of Water		
6 mm x 6 mm notched trowel	6.4 – 7.5	
6 mm x 9 mm notched trowel	4.3 – 4.8	

<sup>\*\*</sup> Consult cement backer board manufacturer for specific installation recommendations and to verify acceptability for exterior use.

#### **Shelf Life**

Factory sealed containers of this product are guaranteed to be of first quality for one (1) year\* if stored off the ground in a dry area.

\* High humidity will reduce the shelf life of bagged product.

#### Limitations

- Not for use directly over particle board, luan, Masonite<sup>®</sup> or hardwood floors.
- For veneer installations using this product, consult local building code requirements regarding limitations and installation system specifications.
- Not for use over VAT, VCT cutback, vinyl and plastic laminates.
- Adhesives/mastics, mortars and grouts for ceramic tile, pavers, brick and stone are not replacements for waterproofing membranes. When a waterproofing membrane is required, use a LATICRETE HYDROBAN Waterproofing Membrane (see Section 10 FILING SYSTEM).
- Not for use in submerged applications. For these applications, use 254 Platinum.

Note: Surfaces must be structurally sound, stable and rigid enough to support ceramic/stone tile, thin brick and similar finishes. Substrate deflection under all live, dead and impact loads, including concentrated loads, must not exceed L/360 for thin bed ceramic tile/brick installations or L/480 for thin bed stone installations where L=span length (except where local building codes specify more stringent deflection requirements)

#### **Cautions**

Consult MSDS for more safety information.

- Some marbles and other natural stone have low flexural strength and might not be suitable for installation over wood floors.
- Use LATAPOXY® 300 Adhesive for installing green marble or water sensitive stone and agglomerates, and resin backed tiles and stones.
- During cold weather, protect finished work from traffic until fully cured.
- Contains portland cement and silica sand. May irritate eyes and skin. Avoid contact with eyes or prolonged contact with skin. In case of contact, flush thoroughly with water.
- DO NOT take internally. Silica sand may cause cancer or serious lung problems. Avoid breathing dust. Wear a respirator in dusty areas
- For white and light-colored stones, use 255 MULTIMAX™† (white).
- Keep out of reach of children.

#### 4. TECHNICAL DATA

## **VOC/LEED Product Information**



This product has been certified for Low Chemical Emissions (ULCOM/GG UL2818) under the UL GREENGUARD Certification Program For Chemical Emissions For Building Materials, Finishes and Furnishings (UL 2818 Standard) by UL Environment.

Total VOC Content pounds/gallon (grams/liter) of product in unused form is 0.00 g/l.

## Applicable Standards

ANSI A118.4, ANSI A118.11, EN12004 C2TE

## **Physical Properties**

Mixed with 5.0 ℓ of water

Test	Test Method	Results
Shear Bond, Porcelain Tile, 28 day	ANSI A118.4 5.2.4	300–330 psi (2.1–2.3 MPa)
7 day Cure, Water Soak Test, Porcelain Tile	ANSI A118.4 5.2.3	275–300 (1.9–2.1 MPa)
Shear Bond, Quarry Tile/Plywood, 28 day	ANSI A118.11 4.1.1.2	150–160 psi (1.0–1.1 MPa)
Sag on Wall	ISO 13007-2 4.2	0 mm

From NAP Report 154

**Working Properties** 

Pot Life	4 hours
Time To Traffic	24 hours
Wet Density	1.3 gm/cm <sup>3</sup>

Specifications subject to change without notification. Results shown are typical but reflect test procedures used. Actual field performance will depend on installation methods and site conditions.

## 5. INSTALLATION

## **Surface Preparation**

The substrate must be clean, firm and free of dust, dirt, oil, grease and loose flaking coatings. They must also be structurally sound and strong enough to support the weight of the tiles being fixed. Worn or

porous masonry surfaces should be sealed with NXT® PRIMER diluted as 1 to 3 with water. Do not apply onto bare, un-sealed gypsum plaster or anhydrite floor screed before first sealing this type surface with two coats of neat NXT® PRIMER.

New concrete slabs shall be damp cured and 28 days old before application. Movement joints shall be provided through the tile work from all existing construction or expansion joints in the substrate. Follow BS 5385–5:2009 section 8 for the design & installation of movement joints within the tiled area. Do not cover movement joints with mortar.

Minimum construction for interior plywood floors:

**SUBFLOOR:** minimum 15 mm thick (WBP) exterior glue plywood, either plain with all sheet edges blocked or tongue and groove, over bridged joints spaced no more than 400 mm maximum. Screw fix plywood at 150 mm (6") centres along sheet ends and 200 mm centres along intermediate supports with coated or hot galvanized screws; allow 3 mm between sheet ends and 6 mm between sheet edges at the perimeter; all sheet ends must be supported by a framing member; glue sheets to joints with construction adhesive.

**UNDERLAYMENT:** WBP 15 mm thick exterior glue plywood fastened at 150 mm (6") centres along sheet ends and 8" (200 mm) centres in the panel field (both directions) with coated or hot galvanized screws; allow 3 mm to 6 mm between sheets and 6 mm between sheet edges and any abutting surfaces; offset underlayment joints from joints in subfloor and stagger joints between sheet ends; glue underlayment to subfloor with construction adhesive. Refer to Technical Data Sheet 152 "Bonding Ceramic Tile, Stone or Brick Over Wood Floors".

#### Mixing

## For Walls and Medium Bed Applications

Place 5.0 ℓ of clean water in a pail and slowly add the entire bag of 255 MULTIMAX™†. Mix with slow speed mixer for one minute or until a creamy smooth consistency is reached. Allow to stand for 5 minutes. remix and use. Job site conditions might vary. Add slightly more water if necessary for proper consistency.

## For Thin Bed Applications

Place 5.5 ℓ of clean water in a pail and slowly add the entire bag of 255 MULTIMAX<sup>†</sup>. Mix with slow speed mixer for one minute or until a creamy smooth consistency is reached. Allow to slake for 5 minutes, remix and use.

# **Application**

#### Walls

Key materials into substrate thoroughly. Comb on additional mortar with the notched side, use 6 mm x 9 mm notched trowel. Back butter all tile and stone of 300 mm x 300 mm or larger to provide full bedding of the veneer.

Note: Use proper sized notched trowel to ensure full bedding of the tile. Spread only enough mortar that can be covered with tile within 15-20 minutes. Place tile and beat in with rubber mallet to embed. Adjust as Check mortar for complete coverage periodically removing a tile and inspecting the transfer onto the back of the tile. The size and weight of the veneer will vary. Conduct a small test area for non-sag performance.

#### Medium Bed

Key the mortar to the substrate with the flat side of the trowel. Press firmly to work into the surface. Comb on additional mortar with the notched side. Use 12 mm x 12 mm or 18 mm half loop flooring grade trowel.

#### Grouting:

Grout all joints within the installation after a minimum of 24 hours curing time at 70°F (21°C). Cooler temperatures require a longer curing time. Grout joints with either LATICRETE® Permacolour grout or LATICRETE® Spectralock Premium PRO grout in accordance with the product instructions.

#### Cleaning

Clean tools with water.

# 6. AVAILABILITY AND COST

# Availability

LATICRETE and LATAPOXY® materials are available worldwide. For on-line Distributor Information, call 0151 486 6101 or visit LATICRETE UK at

www.laticrete.co.uk

## 7. MAINTENANCE

LATICRETE and LATAPOXY grouts require routine cleaning with a neutral pH soap and water. All other LATICRETE and LATAPOXY materials require no maintenance but installation performance and durability may depend on properly maintaining supplied by other manufacturers.

## 8. TECHNICAL SERVICES

#### **Technical Assistance**

Information is available by calling the LATICRETE UK Technical Service Hotline:

Tel: 0151 486 6101 Fax: 0151 448 1982

e-mail: sales@laticrete.co.uk

# **Technical and Safety Literature**

To acquire technical and safety literature, please visit our website at www.laticrete.co.uk

#### 9. DISCLAIMER

The information contained in this document is given in good faith and to the best of our knowledge is true and accurate.

This information is subject to change without notice and it is the responsibility of the user to obtain up to date and current information.

The use of this product is beyond our control and liability is assumed by the user when used incorrectly and not in accordance with LATICRETE guidelines.

The manufacturer is not responsible for any loss or damage arising from incorrect usage of this product.

The specifier or other party responsible for the project must ensure that the details in this data sheet are appropriate for the intended application and that additional detailing is performed for specific design or any areas that fall outside the scope of this specification.

^ United States Invention Patent No.:6784229 (and other Patents)

† United States Invention Patent No.: 6881768 (and other Patents)

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