

MasterSeal[®] Traffic 2500

High-solids polyurethane waterproofing, traffic bearing membrane systems for vehicular and pedestrian areas

DESCRIPTION

MasterSeal Traffic 2500 is a fluid-applied polyurethane waterproofing system.

MasterSeal Traffic 2500 uses a fast-setting two-component reactive curing mechanism. It has a very low odour and is VOC compliant.

MasterSeal Traffic 2500 is composed of:

- **MasterSeal P 255** - a two-component polyurethane-based adhesive primer.
- **MasterSeal M 265** - a two-component fast curing polyurethane base coat with outstanding mechanical properties, including excellent elongation.
- **MasterSeal TC 275** - a two-component fast curing aromatic polyurethane topcoat with outstanding mechanical properties, including high tensile strength and excellent tear and abrasion resistance.
- **MasterSeal TC 295** (exterior applications) – a high performance, two-component aliphatic, high solids urethane waterproofing membrane designed as a topcoat for the **MasterSeal Traffic 2500**.

ADVANTAGES

Two-component system provides faster setting times, even in cooler climates, to help reduce facility downtime

- Low odour / high solids allow **MasterSeal Traffic 2500** to be used over or near inhabited structures; Non-flammable and solvent-free
- Seamless waterproof membrane helps protect concrete from freeze/thaw damage; protects occupied spaces below from water damage and has no seams that may result in leaks
- Excellent chloride resistance to protect against chloride intrusion, extending the life of reinforcing steel
- Excellent chemical resistance helps protect against common parking deck chemicals including gasoline, diesel fuel, oil, alcohol, ethylene glycol, de-icing salt, bleach and cleaning agents
- Skid resistant to increase safety and offers excellent durability and superior abrasion resistance

VOC CONTENT

- **MasterSeal P 255** Part A: 10 g/L less water and exempt solvents, when components are mixed
- **MasterSeal P 255** Part B: 10 g/L less water and exempt solvents, when components are mixed
- **MasterSeal M 265** Part A: 4 g/L less water and exempt solvents, when components are mixed
- **MasterSeal M 265** Part B: 5 g/L less water and exempt solvents, when components are mixed
- **MasterSeal TC 275** Part A: 71 g/L less water and exempt solvents, when components are mixed
- **MasterSeal TC 275** Part B: 13 g/L less water and exempt solvents, when components are mixed
- **MasterSeal TC 295** Part A: 0 g/L less water and exempt solvents when components are mixed
- **MasterSeal TC 295** Part B: 5 g/L less water and exempt solvents when components are mixed

APPLICATIONS

- Interior or exterior, above grade
- Mechanical rooms
- Balconies
- Plaza decks
- Elevated concrete slabs
- Plywood decks/balconies

INDUSTRIES

- Stadium
- Parking Garages
- Commercial Construction
- Building and Restoration

PACKAGING

MasterSeal P 255 - 12.90 L (14.016 kg) kits

MasterSeal M 265 - 17.60 L (18.098 kg) kits

MasterSeal TC 275 - 18.10 L (28.032 kg) kits

MasterSeal TC 295 - 18.93 L (21.900 kg) unit

COLOURS

Gray, Charcoal, Black

MasterSeal[®] Traffic 2500

TYPICAL PROPERTIES*

Property	Value
Solid content, (%)	
MasterSeal P 255	99
MasterSeal M 265	99
MasterSeal TC 275	99
MasterSeal TC 295	90
Viscosity, (cps)	
MasterSeal P 255	630
MasterSeal M 265	3,400
MasterSeal TC 275	1,600
MasterSeal TC 295	2,500-4,000
Working time, (min*)	
MasterSeal P 255	30 ± 10
MasterSeal M 265	20 ± 5
MasterSeal TC 275	20 ± 5
MasterSeal TC 295	30 ± 10
Initial cure, (hrs)	
MasterSeal P 255	2-3
MasterSeal M 265	3-4
MasterSeal TC 275	3-4
MasterSeal TC 295	4-8

*Tested at 23°C and 50% relative humidity. Warm temperatures will shorten pot life; plan work accordingly

TEST DATA

Property	Results	Test Method
Crack bridging, MasterSeal M 265	Passes	ASTM C957
Adhesion, (MPa) MasterSeal P 255 / MasterSeal M 265	2.76	ASTM D4541
Tensile strength, (MPa) Base Coat MasterSeal TC 275 MasterSeal TC 295	17.2 20.7 20.6	ASTM D412
Elongation, (%) Base Coat MasterSeal TC 275 MasterSeal TC 295	900 30 250	ASTM D412
Hardness, (Shore D) MasterSeal TC 275 MasterSeal TC 295	70 92	ASTM D2240
Taber abrasion resistance, (mgms;) CS-17 wheel, 1,000g load, 1,000 cycles Primer / Base Coat / 275 Top Coat	100	ASTM D4060
Taber abrasion resistance, (mgms;) CS-17 wheel, 1,000g load, 1,000 cycles Primer / Base Coat / Intermediate 275 / 295 Top Coat	47	ASTM D4060

Test results are averages obtained under laboratory conditions. Reasonable variations can be expected.

MasterSeal® Traffic 2500

APPLICATION GUIDELINES

SURFACE PREPARATION

Concrete

1. Concrete must be fully cured (28 days), structurally sound, clean and dry (ASTM D4263). All concrete surfaces (new and old) must be shot blasted to remove previous coatings, laitance and all miscellaneous surface contamination and to provide profile for proper adhesion. Abrasive shot blasting must occur after concrete repair has taken place. Acid-etching is not permitted. Proper profile should be a minimum of ICRI CSP-3 (as described in ICRI document 03732.)
2. Repair voids and delaminated areas with Master Builders Solutions branded cementitious and epoxy patching materials. For application when fastturn repairs are required, **MasterSeal M 265** can be used to repair patches up to 25mm in depth. Please refer to Technical Service for proper application techniques.
3. All units must be applied within the specified pot life.

MIXING

Primer (**MasterSeal P 255**)

1. Before mixing, precondition both components to a temperature of approximately 21°C.
2. Add entire contents of Part B to Part A. Mix both components with a slow-speed drill for a minimum of 3 minutes. Scrape down sides and bottom of mixing vessel, then mix again for 2 minutes. Keep the mixing paddle submerged during mixing to avoid adding air into the mixture.

DETAILED APPLICATION

Please refer to the Method Statement.

COVERAGE / YIELD

MasterSeal P 255	0.1 mm	6.4-7.37 m ² /L
MasterSeal M 265	0.5 mm	1.5 m ² /L
MasterSeal TC 275	0.5 mm	2.0 m ² /L
MasterSeal TC 275	0.4 mm	2.5 m ² /L
MasterSeal TC 295	0.5 mm	1.5 m ² /L
MasterSeal TC 295	0.4 mm	2.5 m ² /L

Coverage may vary with the application technique used. Actual coverage rate and thickness depend on substrate porosity and surface profile

STORAGE AND SHELF LIFE

Store unopened containers in cool, clean, dry area. Shelf life is 12 months when products is stored in shaded areas in unopened containers.

Failure to comply with the recommended storage conditions may result in premature deterioration of the product or packaging. For specific storage advice consult Master Builders Solutions Technical Services Department.

HEALTH AND SAFETY

As with all chemical products, care should be taken during use and storage to avoid contact with eyes mouth, skin and foodstuffs. Treat splashes to the eyes and skin immediately. If accidentally ingested, seek immediate medical attention.

Reseal containers after use. For further information, refer to the material safety data sheet.

QUALITY AND CARE

All products originating from Master Builders Solutions Dubai, UAE facility are manufactured under a management system independently certified to conform to the requirements of the quality, environmental and occupational health & safety standards ISO 9001 and ISO 14001.

® = Registered trademark of the MBCC Group in many countries.

MBS_CC-UAE/SI_2500_03_15/v1/10_22

STATEMENT OF RESPONSIBILITY

The technical information and application advice given in this Master Builders Solutions publication are based on the present state of our best scientific and practical knowledge. As the information herein is of a general nature, no assumption can be made as to a product's suitability for a particular use or application and no warranty as to its accuracy, reliability or completeness either expressed or implied is given other than those required by law. The user is responsible for checking the suitability of products for their intended use.

NOTE

Field service where provided does not constitute supervisory responsibility. Suggestions made by Master Builders Solutions either orally or in writing may be followed, modified or rejected by the owner, engineer or contractor since they, and not Master Builders Solutions, are responsible for carrying out procedures appropriate to a specific application.

