

UNISEAL/CEM

Product Data Sheet
Edition 3, 2009
Identification no. UNC
UNISEAL/CEM

Cementitious Flexible Waterproofing Coating

UNISEAL/CEM is a two component (acrylic/cementitious) waterproof protective coating for concrete and masonry substrate.

UNISEAL/CEM is a ready to use two part system, which waterproofs/weatherproofs and protects concrete and similar structures.

USES

UNISEAL/CEM can be applied to new or old concrete or blockwall structures that are structurally sound:

- Marble/ Stone base waterproof / vapour barrier coating
- Concrete roof slabs, Wet areas (Bathrooms and Toilets), floors of balconies.
- Swimming pools Floors & walls
- Bridge deck, Structural surfaces of dykes, and dam walls
- Water Features
- Waterproof coating (bottom coat) for marble, granite and other natural stones.
- Weather-proof coating on building facades
- Shower walls

Application Instructions

Mixing

Place the liquid component in a suitable mixing container and slowly add powder, mixing with a stirrer using power tool at slow speed.

Reinforcing Application

Virgin polypropylene reinforcing mesh can be used over joints, cracks and pipe penetrations. After applying the first coat install the mesh tightly and overcoat the entire area.

Bathrooms/Wet Areas

Surface should be cleaned and remove all loose particles prior to applications. Wet the surface prior to application. Surrounding the pipes & fittings must be treated with Corners/edges should be carefully treated with fibre mesh reinforcement.

Two coat of **UNISEAL/CEM** applied @ 1kg/m² first coat by a masonry brush or appropriate power spray equipment. All applications where two coats are recommended, the second coat shall be applied when the first coat is completely dried. Do not flood or over expose to water until it is completely cured. Total build up thickness >2-3 mm DFT. Recommended to apply two coats @ 2-3 mm thick at a coverage of approximately 2 kg/m²

Advantages

- Provides a flexible low permeability surface.
- Excellent resistance to ingress of water
- Excellent adhesion to concrete, natural and artificial stone.
- Abrasion and UV rays.
- Slip resistant & waterproof for concrete.
- Resistance to chloride ion diffusion and carbondioxide.

*Two Part System for Waterproofing.
Weatherproofs and Protects
concrete and Similar structures.*

Coverage

Approximately 2 kg/sq.m @ 2 mm thickness

Standards

BS 8102, ASTM

Shelf Life

UNISEAL/CEM shelf life period of 12 months, if stored in a coll and dry environment.

Packing

Kit	20 Kg
Powder	15 Kg
Liquid	5 Kg

Technical Data

Testing	Results
Colour	Gery/White
Toxicity	Non Toxic
Specific Gravity	1.95 kg/Lit
Solid Content (Polymer)	72%
Abrasion Resistance	0.10 cm/km
Negative Pressure	>2bar
Chloride ion diffusivity	Not measurable after 24 months of testing.
Chloride content	<1.0%
Moisture vapour transmission (equivalent air layer thickness)	SD ≤ 1.5m (839µm dft)
Initial Surface Absorption @ 10 mins	Nil
Reduction in chloride Ion Penetration @ 28 days.	0.057
Surface burning characteristics Flame Spread Smoke developed	0 5
Fire Propagation Flame Spread	Index=1.5 Class 1
Volatile Organic Compounds (VOC)	< 10g/L

Curing

It is essential that good concreting practice is performed and maintained at every stage of the application process. Ensure that **UNISEAL/CEM** is cured properly after application. Minimum 3 days curing is essential before flooding.

Minimum Coating thickness

Swimming pools, Wet area, water tanks
Recommended 2mm thickness
Facades Recommended to apply one coat @ 1mm thick at a coverage of approximately 0.7 - 1kg/sq.m

Technical Specifications

UNISEAL/CEM is a two-part system supplied as a preblended powder mix and a new generation of acrylic emulsion specifically designed to modify cement composition.

Health and Safety

UNISEAL/CEM is alkaline and should not come into contact with skin or eyes. Avoid inhalation of dust during mixing. Gloves, goggles and dust masks should be worn. Splashes to eyes should be washed immediately with water & seek medical advice.

Technical Support

UNIROOF will be pleased to offer full technical support on specific applications.

Note:

The technical data given above are average values the results of which were carried out on the material. These tests are the Industry Standard for this type of material and comply with the criteria stipulated in: BS 8102, ASTM. Uniroof International Limited reserves the right to change or modify the data without prior notice.

UNIROOF® International Limited

Worth Corner, Turners Hill Road, Pound Hill, Crawley, West Sussex RH10 7SL England.

www.uniroof.com. Email: waterproofing@uniroof.com. Tel: +441293.889888