Fosroc Cemtop HD30

**Cementitious floor topping internal/external trafficable waterproofing surface (2mm to 4mm thickness)**

**1.00 Floor Topping Treatment**

**1.10 Substrate Preparation**

1.11 Where so designated on the drawings, surfaces shall be treated with a high performance, heavy duty, polymer modified, trafficable, cementitious topping.

1.12 **General**

All surfaces shall be prepared, primed and the topping material applied strictly in accordance with the current manufacturer technical data sheet.

All work shall be carried out by an experienced contractor, who is well trained in the application of the specific, documented, topping system.

All materials used in conjunction with the topping system, shall be approved by the topping manufacturer.

1.13 **Surface Preparation**

All surfaces to which the topping material is to be applied, shall be clean, sound, and free from loose material and contamination such as plaster, oil, paint and grease. New concrete should be at least 14 days old.

Excess laitance should be removed by light grinding or captive shot blasting followed by vacuuming to remove all dust debris.

All large substrate cracks, holes and surface imperfections are to be primed, filled, and cured, prior to topping application, using a suitable, compatible material.

1.14 **Priming / Sealing**

The object of priming is to improve adhesion of the topping to the concrete substrate. Apply the recommended primer in accordance with the product TDS.

Primer coat must not be allowed to dry before applying the topping.

**1.20 Topping Material**

1.21 The topping material shall be a high performance, heavy duty, cementitious material, capable of application thicknesses from 2mm to 4mm. The topping shall provide a strong and durable cementitious waterproof coating that can be applied to a wide variety of substrates, including concrete, concrete blocks, aerated concrete blocks (AAC) and fibre cement.

1.22 The topping material is to consist of a blend of selected cements and aggregates modified with polymers that is supplied as a pre-bagged product, which requires the addition of the associated liquid polymer and clean water to produce the mixed material.

1.23 The topping material is to be non-hazardous in accordance with Australian Inventory of Industrial Chemicals containing <0.1% RCS (Respirable Crystalline Silica).

1.24 The topping material shall exhibit the following approximate properties;

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| Compressive Strength: | 28 days | 57 MPa |
| Flexural Strength: | 28 days | 9.9 MPa |
| Tensile Strength: | 28 days | 5.7 MPa |
| Modulus of Elasticity | 28 days | 17.7 GPa |
| Shear Bond Strength: | 28 days | 7.0 MPa |
| Water Permeability: | 28 days | Class E (ASTM E514-74) (highest resistance to water penetration) |
| Abrasion Index: | 28 days | Excellent (3.9) (Main Roads MA20) |
| Drying time @ 25oC: | 2mm thick | 3 to 4 hours |
| Recoat time @ 25oC | 2mm thick | 24 hours |
| Time to traffic @ 25oC: | Foot | 24 hours |
| Vehicle | 48 hours |
| Application Temperature: |  | 10oC to 30oC |
| Service Temperature: |  | 3oC to 60oC |

1.25 **Fosroc Cemtop HD30** with diluted **Nitoprime 330** as the primer meet the product criteria and is an approved product.