



WARRIOR® W-1®

CEMENT STRENGTHENER

WATERPROOFING THIN SET TILE BONDING, TILE BONDING, ANTI-CHLORIDE, PLASTICISER, INJECTION POLYMER AND SEALER



FEATURES

Cement added with **W1** will have

- Improved bonding strength by 2 to 3 times to 30.57 kg/cm, especially good for bonding homogeneous tiles, granites and marble tiles, and to prevent staining.
- Increased flexural and compressive strength by 40% to 100%. Compressive strength to 570.64 kg/cm². Flexural strength to 127.41 kg/cm² (ASTM C 39).
- Quickened cement setting time, reduced surface cracking and dusting. Good for wall plaster, wet area and swimming pool waterproofing.
- 10 to 20 times more resistant to oil, salt water, chloride, acid and vapour penetration. A feature particularly important in steel reinforced concrete structure.
- Improved plasticity and flow (ASTM C 124-71), higher workability and reduced porosity.

APPLICATION METHODS

1. Tile Bonding Aid:

Add **W1** into cement and mix thoroughly into a homogenous paste.

Ratio: **W1** + water + cement = 1 + 2 + 10

W1 Consumption: +/- 0.15 kg/m²/mm thickness

For **new-to-old plastering, concrete patching**, apply the above bonding cement mortar thinly (1mm) onto the surface. When the bonding mortar starts to gel up, apply new plastering or concrete mix.

For higher bonding strength, the portion of water can further be replaced by **W1** totally.

2. Tile Over Tile Bonding:

Dilute **W1** + Water = 1 + 1 by weight, before adding into the Cement (30% by weight).

1. Brush a thin coat of **W1** + cement over the entire old tile surface, to about 1.0 mm.
2. Allow the cement coating to dry and cure for at least one day.

Blk 17 Marsiling Industrial Estate Road 1 #01-11 Singapore 739279

Tel: (65) 6364 5100 Fax: (65) 6364 0629 www.warrior.com.sg



WARRIOR® W-1®

CEMENT STRENGTHENER

WATERPROOFING THIN SET TILE BONDING, TILE BONDING, ANTI-CHLORIDE, PLASTICISER, INJECTION POLYMER AND SEALER

3. Bond tiles on the cured cement surface, as per the tile bonding method above.

3. Waterproofing:

1. Add **W1** into cement and mix thoroughly into a homogenous paste.
Ratio: **W1** + water + cement = 1 + 1 + 5
2. Apply the waterproofing mortar to the surface to be treated (1mm thickness).
3. After 24 hours, apply second coat of waterproofing mortar (1mm thickness).
4. Allow at least 24 hours of curing, before installing subsequent layers.

W1 Consumption: +/- 0.3kg/m²/mm thickness

4. Priming for waterproofing and painting:

1. Brush **W1** polymer directly onto the surface to be painted or to be waterproofed.
2. When the **W1** polymer starts to dry and become tacky, apply subsequent painting or waterproofing layer over it.

W1 polymer will bind the painting and waterproofing layer strongly onto the substrate.

5. Powdery surface treatment:

1. Dilute **W1** with one time of water.
2. Brush / spray **W1** solution over the powdery surface.
3. Allow the solution to dry for one day.

The polymer will be absorbed into the surface and lock the loose surface particles. It will create a smooth and sound surface to received subsequent layer. Overlaying materials can be applied as recommended.

6. Injection into cracks

W1 polymer can be injected or poured directly into cracks and holes, until overflows or seen dripping down from below.

W1 polymer will dry to seal up the cracks and stop water penetration.

TECHNICAL DATA

Colour: Milky solution
pH: 9.5
Shelf Life: 12 months

PACKING

1 kg-bottle/ 4 kg-carboy/ 20 kg-jerry can