HOW-TO GUIDE

Sika Thoroseal® Plus Concrete & Masonry Waterproofer

A CEMENT-BASED COATING FOR SEALING/PROTECTING CONCRETE, BRICK & MASONRY

MATERIALS:

- Safety glasses and gloves
- ½" to ¾" drill and mixing paddle
- 35 lb. pail of Sika Thoroseal®
- 5-gal. mixing pail
- Masonry brush or broom
- Hopper spray gun/air compressor (optional)
- Approx. 5 qts of clean water
- Measuring jug
- Pump sprayer (or hose nozzle w/ mist setting)

SITE PREP & PROCEDURE

1. Always wear waterproof gloves and safety googles whenever mixing or using cement-based products. Before application, remove all dirt, loose material, oil, grease, unsound concrete, or any other foreign matter which will interfere with the product's ability to properly bond to the surface. The best method for removing any contaminants is through high-pressure water blasting (power-washing). Surfaces that are extremely smooth or glazed will need to be roughened with either sanding/grinding or with etching in order to promote good adhesion. If there are any non-moving cracks, breaks, joints, or honeycombing larger than 1/32", these should be cut out and repaired with Sika DRYLOK® Fast Plug® Hydraulic Cement or other Sika repair material.

2. After all surface preparation is complete, pour 1.2 gallons (≈ 5 qt.) of cool potable water into a suitably sized (5-gal pail) and clean mixing container using a measuring jug. Mixing can be done manually or mechanically, with a slow-speed (400-600 rpm) drill (½" – ¾") and mixing paddle. Slowly add Sika Thoroseal® Plus Concrete & Masonry Waterproofer to the water while the drill is running and mix the material until a consistency of smooth, heavy batter is achieved (2-5 minutes). Let the material rest undisturbed for approx. 10 minutes, then remix the wet material (about 1 minute). When remixing, a small amount of water can be added for better workability.

3. Once the material is fully mixed, thoroughly dampen the substrate with water before beginning the application to avoid premature setting. Sika Thoroseal® Plus Concrete & Masonry Waterproofer can be applied by masonry brush, broom, or traditional mortar spraying equipment. It is recommended that the first coat be applied with a brush to work it thoroughly into the substrate and completely fill and cover all voids, holes, and non-moving cracks.

a. **First Coat:**

i. Should be applied at a rate of 160 ft^2 per 35 lb. pail

ii. If applied in a negative hydrostatic pressure situation, the first coat should be finished with vertical brush movements. This will allow for the detection of small active voids that can be treated afterwards with Sika DRYLOK® Fast Plug Hydraulic Cement.

iii. In all other cases, the first coat should be finished with horizontal brush movements.

b. **Second Coat:**

i. Dampen the first coat before beginning the application of the second coat.

ii. If the first coat was applied by brush or broom the second coat requires back brushing (perpendicular direction to the first coat) to achieve a good and uniform coating.

iii. Second coat should be applied at a rate of 320 ft^2 per 35 lb. pail

iv. **Spray applications:**

1. Requires an air compressor and hopper gun/sprayer, set the orifice (tip size) on the sprayer to ¼" or larger.
2. Air compressor: at least 4.0 CFM @ 90 PSI recommended

4. Curing:

a. Dry environments: Once initial setting of the material has begun, the area must be sprayed or maintained damp.

b. Cold/Humid/Poorly Ventilated Environments: curing may take longer, and forced ventilation may be necessary to avoid condensation.

c. Avoid applying material in direct sunlight or excessive heat as this may lead to premature setting and cracking of the material

d. Protect from rain until it has cured

e. **Pot life:** 30-40 minutes

f. **Set Time:** 4.25 hours

g. **Final Set Time:** 6 hours


ADD ~5 QT WATER


ADD POWDER


MIX 2-5 MINS


BRUSH APPLIED


SPRAYER APPLIED