

# Nitoproof 300PF



constructive solutions

Liquid applied, pitch free, two component elastomeric waterproofing membrane

## Uses

A range of water/vapour proofing applications including foundations, basements, tunnels, floors, roofs, water retaining structures (not potable water), etc. Its excellent chemical resistance makes it suitable for tanking applications where aggressive ground water conditions prevail.

## Advantages

- Easily applied : Liquid application means details are simplified
- Highly elastic : Cures to give permanently flexible resilient barrier over a wide range of temperatures
- Excellent Adhesion : Can be applied to a wide range of substrates. Continuous adhesion prevents lateral migration of water
- Seamless : Liquid application means no joints in the membrane
- Easily repaired : Mechanical damage to the membrane is easily repaired by spot application of NITOPROOF 300PF

## Description

NITOPROOF 300PF is a two component pitch free polyurethane which cures by chemical reaction to give a tough elastomeric waterproof membrane.

## Properties

### Application properties

#### Minimum Application

Temperature:	5°C
Application Life:	60 minutes at 25°C
Tack free time at 25°C:	4 hours
Time to full time through cure at 25°C:	24 hours (1.5 mm)

## Cured Membrane Properties

Ultimate Elongation (%):	>350
Ultimate Tensile Strength (N/mm <sup>2</sup> ):	>1.6
Recovery from 200% Elongation (%):	90
Service temperature	- 40°C to + 70°C

## Chemical Properties

NITOPROOF 300PF is unaffected by a range of mild acids, alkalis and water borne salts and has resistance to biodeterioration. Check with FOSROC technical department for specific chemical data.

## Instructions to Use

### Surface Preparation

All surfaces to be waterproofed should be clean, sound and dry.

Concrete surfaces should have a light steel - trowel followed by a fine hair-broom or equivalent finish which is dry and free from dust, oil and other contaminants.

Moss and lichen must be removed physically followed by treatment with fungicidal wash to kill any spores and inhibit further growth. After treatment wash down thoroughly and allow to dry.

Laitance should be removed from concrete by grit blasting, wire brushing or water jet blasting and allow to dry.

All metal surfaces should be made clean from paint, oil, rust and other contaminants. Abrade to expose bright metal then wipe clean with FOSROC SOLVENT 102 before priming.

### Priming

Priming is not normally required on good quality concrete substrates. However, absorbent surfaces such as porous concrete, sand/cement screed and cement boards will require sealing to prevent absorption of NITOPROOF 300PF. This should be done using 1:1 mixture of NITOPROOF 300PF and recommended solvent (consult Fosroc technical department). NITOFLORE FC110 should be used for highly porous substrates.



# Nitoproof 300PF

---

Use NITOFLORE FELT PRIMER as a primer for bituminous surfaces and NITOPRIME 14 for metal, glazed and PVC surfaces. All metal and PVC surfaces should be cleaned and abraded before priming.

## Movement Joints

All expansion and movement joints should be sealed with THIOFLEX 600. When cured, NITOSEAL Debonding Tape should be applied to the top surface of the sealant and the joint overcoated with a 1.5 mm application of NITOPROOF 300PF extending 150 mm each side of the tape. Embed a 100 mm wide strip of NITOPROOF SCRIM, then allow to cure before general application.

## Cracks

All shrinkage and non-moving structural cracks should be pretreated with not less than a 1.5 mm coating of NITOPROOF 300PF extending 75 mm either side of the crack. Allow to cure overnight before general application.

## Right Angle Bends

All critical right angle bends must have a cant strip or coving detail installed. This may be either pre-formed or fabricated from NITOPROOF 300PF. If a pre-formed strip is used, it must be bedded to a layer of NITOPROOF 300PF then given a reinforcing pretreatment by application of a 1.5 mm thick coat extending 150 mm either side of the coving. Whilst still wet a 150 mm wide strip of NITOPROOF SCRIM is embedded into the NITOPROOF 300PF as reinforcement (ensure thorough wetting). If NITOPROOF 300PF is used, it should be firmly trowelled into the corner and formed into a 20 mm x 20 mm triangular coving.

All other angles, joints, protrusion and stress points should be pretreated with a heavy application of NITOPROOF 300PF extending 50 to 100 mm either side of the detail.

Reinforcement with NITOPROOF SCRIM is recommended where movement is possible.

Allow pretreatments to cure overnight before general application.

## General Application

NITOPROOF 300PF should be applied by brush, trowel or squeeze (two coat application on vertical surfaces).

NITOPROOF 300PF is applied at a minimum wet film thickness of 1.2 mm. This is in addition to preparatory work.

Roller application: use a short haired synthetic pile roller. The correct film thickness can be achieved by one pass. In critical applications where surety of thickness is paramount, two coats should be applied at right angles to one another. Quantities per coat should be gauged to give the specified final film thickness.

If a water test is to be run the membrane should cure for a minimum of 7 days.

## Flood Test (roof)

Prior to placement of protection, flood to a minimum depth of 50 mm of water for 24 hours. Drains should be plugged and barriers placed to contain the water.

## Curing and Protection

NITOPROOF 300PF membrane must be cured for a minimum of 24 hours at 25°C before placing protection. Where damage to the membrane is possible (by traffic, backfilling, etc) it should be protected by cementitious screed or protection boards. A dust coat of cement should be used to prevent adhesion of the membrane to the boards.

Where a bond with a topping is not required, a separator sheet should be used.

Protection from solar radiation. All exposed areas of NITOPROOF 300PF should be coated with NITOPROOF REFLECTACOAT to ensure maximum resistance to ultra-violet radiation.

## Cleaning

Tools and equipment should be cleaned with FOSROC SOLVENT 102 immediately after use. **DO NOT USE FOR THINNING**, except where a sealing coat is required.

## Precautions

### Health and Safety

Some people are sensitive to resin systems. Gloves and a barrier cream should be used when handling this product. If contact with the resin occurs it must be removed before it hardens, with a resin removing cream. **Do not use solvent.** The use of goggles is recommended but should accidental eye contact occur, wash thoroughly with plenty of water and seek medical advice.

Ensure adequate ventilation when using resin and solvent containing materials.

**FOSROC**



constructive solutions

# Nitoproof 300PF

---

## Fire

NITOPRIME 14, NITOFLOOR FC110, NITOPROOF REFLECTACOAT and FOSROC SOLVENT 102 contain flammable solvents. Do not use near open flames, not smoke during use.

## Flash Points

NITOPRIME 14	12°C
FOSROC SOLVENT 102	23°C
NITOFLOOR FC110	24°C
NITOFLOOR REFLECTACOAT	40°C

## Storage

The shelf life is at least 12 months in original unopened container if stored in a cool dry place below 30°C.

## Packaging

NITOPROOF 300PF    Part A 20 litre pails  
                                 Part B 2 litre cans

## Coverage

NITOPROOF 300PF	1 litre/m <sup>2</sup> /mm thickness
NITOFLOOR FC110	5 - 7 m <sup>2</sup> /litre
NITOPROOF FELT PRIMER	5 - 7 m <sup>2</sup> /litre
NITOPRIME14	6-8 m <sup>2</sup> /litre





# Nitoproof 300PF

---



## PT. Fosroc Indonesia

Jl. Akasia II Blok A8 No. 1  
Delta Silicon Industrial Park  
Lippo Cikarang  
Bekasi 17550  
Indonesia

[www.fosroc.com](http://www.fosroc.com)

### Important note

Fosroc products are guaranteed against defective materials and manufacture and are sold subject to its standard terms and conditions of sale, copies of which may be obtained on request. Whilst Fosroc endeavours to ensure that any advice, recommendation, specification or information it may give is accurate and correct, it cannot, because it has no direct or continuous control over where or how its products are applied, accept any liability either directly or indirectly arising from the use of its products, whether or not in accordance with any advice, specification, recommendation or information given by it.

---

#### telephone:

+ 62 21 897 2103  
+ 62 22 520 1308  
+ 62 31 502 9142

#### fax:

+ 62 21 897 2107  
+ 62 22 522 2713  
+ 62 31 502 2711

#### email:

[indonesia@fosroc.com](mailto:indonesia@fosroc.com)

