



# Corroprufe FCW

# Two component, flexible, cementitious, waterproof coating

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#### **Product Features**

Corroprufe FCW is a two component, cementitious coating comprising of pre-weighed polymer modified powder & liquid components that when mixed together provide an elastomeric, waterproof coating with exceptional crack bridging capabilities. Corroprufe FCW provides a durable, flexible coating with excellent adhesion characteristics and is non toxic making it suitable for use in contact with potable water.

# **Typical Uses**

**Corroprufe FCW** is typically used to waterproof concrete in internal or external applications as potable & storm water tanks, reservoirs, swimming pools and wet areas to kitchens, showers & bathrooms below screed & tile finishes.

Technical Data			
Properties	Test Standards	Typical Values	
Appearance			
Part A		: grey or white powder	
Part B		: white-milky liquid	
Particle size (Part A)		: 0.1 - 0.5 mm	
Bulk Density (Part B)		: 1.3 ± 0.1	
pH (Part B)		: 7	
Pot life		: 30 minutes at 20°C	
Recoat time		: 4 - 24 hours	
Colours		: grey or white	
Pull off strength test	BS 1881 Part		
@ 7 days	207-1992	: 0.6 N/mm²	
@ 28 days		: 1 N/mm²	
Crack bridging ability	ASTM C 836:95	: > 1.5 mm	
@ 28 days			
Elongation test @ 28 days	ASTM D 412:98	: 60%	
Water permeability @ 28	BS EN 12390 part	: 100%	
days resistance to water	8:2000		
penetration			
Non toxicity, @ 28 days	BS 6920:2000	Passed	

Note: All values given are subject to 5 - 10% tolerance.

# **Directions for Use**

### Preparation

#### Concrete

Long term durability and function can only be achieved with good preparation to give a strong adhesive & mechanical bond to the substrate.

New concrete should be fully cured with a maximum residual relative humidity (RH) of 75%.

Prepare concrete surfaces preferably by mechanical methods such as angle grinding to remove laitance, curing compounds and other loose materials to provide a mechanical key for **Corroprufe FCW**.

Thoroughly soak concrete substrates with clean water for at least 1 - 2 hours, removing standing and excess water prior to the application of **Corroprufe FCW**.

#### **Priming**

#### Concrete

Priming is not normally required however please ensure the substrate is pre-soaked, clean, sound and free from contamination.

#### **Mixing**

It is essential that the mixing instructions are carefully followed to ensure the correct characteristics of the product are achieved. Failure to do so can result in lower performance or even possible failure of the product.

Place the liquid component in a suitable empty container with sufficient volume to accommodate the mixed material.

Slowly add the powder to the liquid component and mix continuously for 4 - 5 minutes using a slow speed drill and paddle or forced action mixer, until a homogenous consistency is achieved.

Leave the mixed material to stand in the container for several minutes prior to application.

No additional water should be used as this will change the performance of the mixed material.

#### **Application**

A minimum of 2 coats of **Corroprufe FCW** are recommended.

Apply the first coat of **Corroprufe FCW** using brushes or rollers to a theoretical coverage rate of 1 - 1.5 kg per  $m^2$ , in a continuous uniform coating.

For high risk applications, we recommend a fabric scrim be embedded into the wet first coat, particularly at floor / wall junctions and joints in concrete substrates, to reinforce the coating.

Do not pre-soak between coats, simply apply the second coat of **Corroprufe FCW** in opposite directions but in the same manner and coverage rate as the first, allowing 4 - 8 hours drying time between coats.

Expansion joints must be reflected through the **Corroprufe FCW** and subsequent floor finishes, and preferably sealed with a sealant from the **Corroseal** range.

**Corroprufe FCW** will be compatible with most cementitious floor screeds or tile adhesives, however we recommend a trial area is done to confirm compatibility.



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#### Curing

Allow **Corroprufe FCW** to cure fully for 4 - 7 days before screeding, tiling or exposing to full environmental conditions.

#### **Hot Weather Conditions**

For application above 40°C we recommend adopting the following guidelines:

Store unmixed materials in a cool preferably air conditioned environment.

Avoid exposure of mixed & unmixed materials to direct sunlight.

Keep equipment that will be in contact with the product cool and away from direct sunlight.

Avoid application during the hottest time of day.

# Cleaning

Clean tools & equipment immediately after use with detergent and water.

# **Limitations**

Substrate temperatures should be above 5°C and rising.

For application in temperatures above 40°C please refer to hot weather condition recommendations.

Avoid application if the work area may be subject to the onset of rain or moving water.

Do not part mix under any circumstances.

All products shold be used within the pot life. Materials not used within the specified time should be discarded.

If the above general application details do not meet with your requirements, please contact Corrotech for a project specific method statement.

# **Estimating**

**Corroprufe FCW** pack size: 23 kg kit. Coverage rate approximately 2 - 3 kg per m² in two coats.

All coverage rates given are theoretical and subject to actual site conditions. We recommend trial areas are done to establish practical consumption particularly for primers.

# **Health & safety**

Always use appropriate PPE including gloves, goggles and a barrier cream to avoid contact with skin and eyes.

Should contact with skin or eyes occur, wash immediately with plenty of clean water and seek medical advice.

If swallowed, seek medical attention immediately. Do not induce vomiting.

Avoid inhalation and ensure adequate ventilation or suitable respiratory equipment if working in confined spaces.

Do not expose products to fire or naked flames under any circumstances.

Always refer to the product Material Safety Data Sheet (MSDS) for full health & safety and handling recommendations.

### **Storage**

**Corroprufe FCW** has a maximum shelf life of 12 months from the date of manufacture.

To maximize shelf life always store products in their original, unopened packaging in a dry environment, away from direct sunlight with a minimum temperature of 10°C but not exceeding 35°C.

Damaged packaging, high humidity or extreme temperatures may reduce the shelf life.

