# **Product Information**

# Description

SC802 Intumescent Basecoat is a waterbased, white, thin film intumescent coating for the protection of internal structural steelwork.

# Usage / Purpose

SC802 can provide up to 60 minutes fire resistance.

## Finish

SC802 can be applied to a smooth matt finish. A compatible top-seal can be applied if a decorative finish is required.

Colour

White

## Packaging

Supplied in 25 kg drums

# **Environmental Considerations**

Very low VOC. Contains no substances of very high concern.

## **Availability**

Only available via Nullifire Specialist Contractors or direct from Nullifire (see back of leaflet for address and telephone details).

# **Usage Guidelines**

## **Protective Equipment**

Use in well ventilated conditions and ensure all recommended protective equipment is worn during handling & use of this product. For full recommendation, refer to safety data sheet.

# **Surface Preparation & Priming**

- SC802 should be applied onto a clean, undamaged, dry and primed steel surface.
- Certain types of primers can cause char adhesion problems in a fire. In particular, thermoplastic primers must be avoided.
- Nullifire recommend and have tested PM015, PM019 and PM020 primerssee website for details.
- Nullifire have carried out compatibility testing on a wide range of primers and can be contacted on +44 (0) 24 7685 5000 for confirmation of compatibility with SC802.
- SC802 should not be applied directly to galvanised surfaces or zinc rich primer.

- The primer must be applied in accordance with the manufacturer's instructions.
- Nullifire should be consulted for technical advice when zinc rich primers or the overcoating of existing paints are specified for use.

# **Application Conditions**

- Nullifire SC802 is recommended for application and use on dry protected structural steel only.
- If the basecoat is allowed to get wet, it is likely to be damaged – blistering and wrinkling may occur.
- SC802 should only be applied when the air and steel temperatures are above 5°C. Relative humidity should be below 80% for successful application. Steel surface temperature should be a minimum of 3°C above the dew point.
- Ensure the steel is dry and free from contact with rain or condensation during the application and drying of SC802.

# **Application Equipment**

Airless spray equipment is recommended and should match these guidelines: Operating Pressure: 2500- 3000psi (175 - 210 kg/cm<sup>2</sup>) Tip Size: 17 – 21 thou Fan Angle: 20° – 40° Hose Diameter: 10 mm (3/8″) (internal diameter) Hose Length: Max. 60 metres, in-line filters should not normally be used.

## Mixing

SC802 is supplied ready for use and must not be thinned but should be mechanically stirred prior to use.

# Application

AIRLESS SPRAYING

- SC802 may be applied up to a maximum wet film thickness (WFT) of 1.0 mm in a single spray coat comprising of several quick passes. Achieving maximum loadings will depend on site conditions.
- The vast majority of 60 minute loadings can be applied in one coat.

# **BRUSH/ROLLER APPLICATION**

• For brush application use a "laying on" technique to avoid heavy brush marking.





Intumescent Basecoat On-Site, Water-Based





# **Key Benefits Summary**

- Water based intumescent coating suitable for internal use on structural steelwork for up to 60 minute fire resistance
- "Next generation" product with greater efficiency on site
- Compatible with a full range of Nullifire primers and top seals
- Very low VOC





SC802 Intumescent Basecoat



- Maximum wet film per coat when applied using a brush or roller is 0.6 mm. A short piled roller will produce a light textured finish.
- During application, measure the wet film thickness frequently with the WFT gauge provided to ensure the correct thickness is being applied.
- To use the gauge, insert the teeth into the wet basecoat. The last tooth to be coated indicates the wet film thickness achieved.
- In the event of over or under applications, adjustments to the loading rates of subsequent coats will be required.

## **Drying Times**

	Temperature		
WFT	10°C	20°C	30°C
0.2 mm	3 h	2 h	1 h
0.5 mm	4 h	3 h	2 h
1.0 mm	6 h	4 h	3 h

These are times for a typical mid-range humidity and good air flow. Higher humidity, poor airflow or overnight condensation will all lengthen these times.

Do not over coat if the surface is not touch dry. Check web-flange joints.

### **Application Advice**

The following instructions are for on-site application only. For off-site application, refer to Nullifire. Ensure that:

- The primer is compatible with SC802 and has been applied correctly.
- The overcoating period for the primer has not been exceeded.
- The correct primer is used for galvanised steel.
- All damage to the primer has been repaired & re-primed.
- Site and weather conditions are within specification.
- SC802 has been stored correctly.
- Surface is clean, dry and free from contamination.
- Correct spray equipment is available, if appropriate.
- Application instructions have been read prior to commencement of work.
- Ensure different basecoats are not applied on the same section of steel.



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# **Technical Data**

Property	Result	
Composition	A very low VOC, water-based formulation	
Certification	BS476 Part 21: 1987	
Building Classification	C1 and C2 environments	
Properties (Typical Values)		
Specific Gravity	1.38 ±0.02	
Volume Solids	70% ±3%	
VOC	≤16 g/l	
Theoretical Coverage	979 g/m <sup>2</sup> based on an applied 0.5 mm dry film thickness	
StorageStore in secure, dry warehouse cond between +5°C and +35°C		
Shelf Life	6 months when stored as recommended in original unopened container	

- Equipment should be clean and free from contaminants or dried material.
- Wet film gauges are available for use.

### Cleaning

Spray equipment can be cleaned using water only.

## **Top Seal Requirements**

Once DFT's have been achieved as specified, a Nullifire top seal can be applied: TS134 (acrylic polymer), TS815 (modified acrylic) or TS816 (water-based acrylic), can be applied. Ensure the SC802 is completely dry before applying top seal.

### **Maintenance & Repair**

Damaged areas should be abraded back to a sound surface. The surface should then be clean and dry before re-applying. FC101 Filler may be used for repairing scratches and chips. Once repaired topseal should be reapplied. Refer to Nullifire Maintenance Instructions.

### **Specification**

A tremco illbruck Representative will provide a specification for each project. tremco illbruck accepts no responsibility for defects arising from failure to follow the specification.

### **Health & Safety Precautions**

Safety data sheet must be read and understood before use.

### **Technical Service**

tremco illbruck has a team of experienced Technical Sales Representatives who provide assistance in the selection and specification of products. For more detailed information, service and advice, please call Customer Services on 01942 251400.

### **Guarantee / Warranty**

tremco illbruck products are manufactured to rigid standards of quality. Any product which has been applied (a) in accordance with tremco illbruck written instructions and (b) in any application recommended by tremco illbruck, but which is proved to be defective, will be replaced free of charge.

No liability can be accepted for the information provided in this leaflet although it is published in good faith and believed to be correct. tremco illbruck Limited reserves the right to alter product specifications without prior notice, in line with Company policy of continuous development and improvement.