

Selection & Specification Data

Generic Type	High solids chemically cured intumescent fire-proofing coating, based on patented hybrid technology.
Description	Nullifire SC902 is a fast track on or off-site, low VOC, one coat high build system capable of providing up to 2 hours protection in a single coat.
Features	<ul style="list-style-type: none"> Fast cure, early weather resistance, shower proof within 1 hour Achieves external durability with an approved top seal Cures below 0°C and fully dry by the following day Self-priming system tolerant of light rusting to steel, up to 2 weeks post blasting High build capability with all ratings possible in one application Fire rating up to 120 minutes tested to BS476 and EN13381: Part 8 and assessed to meet AS1530.4 and AS4100; ref BRANZ FAR 3997 & FAR 4294 (RBSA) Fast Track: <ul style="list-style-type: none"> Conventional intumescent coating systems for 120 FRR that may take 7 days to complete can be completed in just 24 hours using Nullifire SC902
Gloss	Flat (with texture)
Colour	Off white
Primers	Not required for C1 environment; refer to Altex Technical Services or relevant Altex / Carboline Coating Specification for approved primer options.
Topcoats	Selected, approved, polyurethane coatings
Dry Film Thickness	Variable depending upon required FRR. 460 microns to 5000 microns per coat
Volume Solids	85%
Theoretical Coverage Rate	0.85 m ² per litre at 1000 microns DFT (1.75 kg / m ² at 1mm DFT)
Mix Ratio	8.26:1 by weight (Part A : Part B)
VOC Values	137 gm / litre mixed
Dry Temp. Resistance	Ambient conditions; prolonged exposure >40°C may be detrimental

Substrates & Surface Preparation

General	All surfaces should be free of grease, oil, fats, incompatible paints and other foreign matter.
Steel	<p>Optimum standard: Abrasive blast to AS1627.4 Class 2½ Prime as specified or apply SC902 direct to substrate.</p> <p>Minimum standard: Light re-rusting up to 2 weeks after Class 2½ preparation Prime as specified or apply SC902 direct to substrate.</p>
Galvanized Steel	<p>Nuts & Bolts: Degrease and apply SC902 direct to substrate</p> <p>Structural Steel: Refer to Altex Technical Services for preparation and priming recommendation.</p>
Previously Painted Surfaces	Remove all existing coatings and prepare as for Steel or Galvanized Steel above.

Application Equipment

Listed below are general equipment guidelines for the application of this product. Job site conditions may require modifications to these guidelines to achieve the desired results.

Spray Application (General) SC902 may be applied using either plural component or single leg airless spray. Refer to Altex Technical Services for plural equipment set-up

Conventional Spray Not recommended

Airless Spray (Single leg) NOTE: A pail ram-plate or hopper gravity feed is highly recommended for maximum throughput.

Pump Ratio: 30:1 (min.)
Pump Input Filter: None
Volume Output: 9.5 l/min min.
Material Hose: 9 mm I.D. min. (3/8")
Tip Size: 0.019-0.023"

Free-flow tip

Gun filter: 60 mesh

Output Pressure: 2000-2500 psi

Use a 9mm (3/8") minimum I.D. material hose

The following spray equipment from Graco, or equivalent has been found to be suitable.

Gun – Heavy duty texture gun-Graco XHF or 207-300

Pump* – Graco Mk V 45:1

*Teflon packings are recommended and available from pump manufacturer.

Brush & Roller Touch-up and repair only.

Brush Use a quality pure bristle brush with a good load capacity

Roller Not recommended

Mixing & Thinning

Mixing Thoroughly blend the Part A to a homogeneous consistency, and stir the Part B to ensure all the pigmentation is fully incorporated. Combine the Part B into the Part A pail and power stir to a homogeneous mix (indicated when no colour pigmentation 'streaking' occurs in the mix). Only mix complete kits; do NOT mix part kits.

Mix Ratio As supplied in the kit:
Part A: 22.3 kg
Part B: 2.7 kg

Thinning Use Carboline Thinner #10 sparingly to achieve a satisfactory spray pattern. Where lower DFTs and / or greater control of SC902 are required, thinning up 20% may be acceptable.

Induction None required after proper mixing

Pot Life 60 minutes at 20°C

Cleanup & Safety

Cleanup Use Thinner #10 or xylene. Do NOT use water or solvents containing alcohols.

Precautions For industrial use only. See the Altex Coatings General Safety Data Sheet, product label and Safety Data Sheet (MSDS) for health and safety information prior to use. Nullifire SC902 contains some flammable solvent. Keep away from heat, sparks and open flame. Use with adequate ventilation. May cause eye and skin irritation. Do not breathe vapour or spray. Wear suitable protective clothing ie: gloves and eye and face protection.

Application Conditions

Condition	Material	Surface	Ambient	Humidity
Normal	20°C	20°C	20°C	50%
Minimum	10°C	0°C	0°C	0%
Maximum	30°C	40°C	30°C	95%

Application Advice:

- Ensure all application equipment is free from water or alcohols prior to use.
- Part B is moisture sensitive and should remain tightly closed before use.
- Always mechanically mix product in full pack volumes.
- Ensure the components are thoroughly combined until a uniform colour is obtained.
- The product should be sprayed at close proximity to the work piece; approximately 600 mm from the surface to avoid dusting and promote good surface coalescence.
- Use of additional solvent mixed into material will assist in achieving a higher decorative finish. Note this will affect build characteristics.
- Use of a wet film gauge capable of reading up to 5000µm is recommended.
- Ensure mixed material is used within 2 hours at 15°C (sooner at higher temperatures).
- Keep spare 60 mesh gun hand-piece filters to hand and replace filters as required.
- Damaged coatings can be trimmed to a feathered edge and repair material troweled in one application.
- The applied product once cured can be easily finished to a high level by sanding or tooling with power or hand tools.

Curing Schedule

Surface Temp. & 50% Relative Humidity	Dry to Self-Recoat	Dry to Topcoat w/ Other Finishes	Cure to Handling
0°C	8 hours	Overnight	Overnight
10°C	1 hour	Overnight	8 hours
16°C	30 min	8 hours	6 hours
24°C	15 min	6 hours	2 hours
32°C	15 min	4 hours	1 hour

Packaging, Handling & Storage

Pack Sizes 25 kg (16.8 litres) kits

Flash Point 26°C

Storage Temperature & Humidity Store indoors and under cover in stable temperature conditions; avoid excessive heat. Ideally store at ≤20°C (10°C to 25°C)

Shelf Life* Parts A & B: 9 months

*Shelf Life: Minimum shelf life if stored under cover in original sealed containers and under recommended storage conditions.

Distributed in New Zealand by:-

Altex Coatings Ltd,
91-111 Oropi Road, Tauranga 3112
New Zealand
Phone: +64 7 5411221

Manufactured by:
tremco illbruck Limited
Coupland Rd, Hindley Green, Wigan
WN2 4HT

