



CORROPIPE 'S'

TECHNICAL DATA

SINGLE COMPONENT PIPELINE COATING

THE PRODUCT AND ITS USES

CorroPipe 'S' is a single-component-plus-catalyst coating for steel, ductile iron, and concrete pipes, valves and fittings. The finished product offers superior resistance to corrosion, chemicals, abrasion and cathodic disbondment.

The product is designed for use as an internal lining or external coating for buried pipelines. The material is also well suited to field joint applications, bell and spigot corrosion protection, or on fittings and other specialty items.

CorroPipe 'S' (CM) is a ceramic modified version of CorroPipe 'S' that offers excellent abrasion resistance – ideal for highly abrasive or high flow applications.

CorroPipe 'S' (AM) is a modified version of CorroPipe 'S' that contains an EPA registered Anti-Microbial agent. Although the standard formulation is not susceptible to bacterial attack, CorroPipe 'S' (AM) provides for extended service life in sewer environments.

TECHNICAL INFORMATION

PROPERTY	TEST DESCRIPTION	RESULTS
Application Temperatures	N/A	-15°C(10°F) to 65°C(150°F)
Viscosity	Brookfield Viscometer	1500 cps
Pot Life		20 minutes to 2 hrs - depends on catalyst
Initial Setting Time		30 to 120 minutes - depends on catalyst
Recoat Time*		12 to 24 hours - depends on catalyst
Solids Content	ASTM D-1259	72%
Volatile Organic Compounds (VOCs)	ASTM D-2369	282 grams/litre
Theoretical coverage	N/A	625 m ² /litre/micron (1150 ft ² /US gal/mil)
Adhesion	ASTM D-4541 (SSPC 5)	Greater than 1200 p.s.i.
Hardness	ASTM D-2240 Shore D	60 +/- 5
Flexibility	ASTM D-522	180° over 1" mandrel
Abrasion Resistance	ASTM D-4060 (CS-17 wheels, 1 kgs weights, 1000 revolutions)	60 mg loss (standard version) 20 mg loss (CM version)
Permeability	ASTM E-96 (@ 15 mils)	1.4 x 10 ⁻³ perm inches
Resistance to Cathodic Disbondment	CSA Z-245 (65°C, 48 hours, 20 mils)	Excellent; less than 10 mm
Chemical Resistance	ASTM D-543	Excellent; see Chemical Resistance Chart
Dielectric strength	ASTM D-149	Greater than 200 volts per mil
Impact Resistance	ASTM G-14 (20 mils)	Greater than 40 in. lb.
Temperature Resistance	ASTM D-870, ASTM D-2485	-40°C(-40°F) to 65°C(150°F) Wet -40°C(-40°F) to 90°C(195°F) Dry
Colours		Black, Gray, Off-white

*However, recoat window varies depending on the spray equipment temperature setting, the ambient conditions, product temperature/thickness, and the temperature of the substrate being coated.

NOTE: All statements, technical information and recommendations contained herein are typical of results obtained under laboratory conditions and are not intended to be used as contract specifications. For specification guidelines please contact Madison Chemical.

APPLICATION INSTRUCTIONS

CONTACT MADISON FOR DETAILED APPLICATION INSTRUCTIONS.

A. SURFACE PREPARATION

- 1) Ensure that surface is clean, dry and uncontaminated. Proceed only if the substrate temperature is more than 3°C(5°F) above the dew point temperature during surface preparation and coating application.
- 2) Abrasive blast clean with sand or grit (G40 or coarser). DO NOT USE steel shot or non-angular media.
For **steel** surfaces, blast to a Near White Blast (SSPC-SP10; NACE 2; SA 2.5):
 - minimum 3.0 mil (75 microns) profile for immersion;
 - minimum 2.5 mil (65 microns) profile for buried;
 - minimum 2.0 mil (50 microns) profile for atmospheric service.For **ductile iron** surfaces, abrasive blast to achieve a surface anchor profile of 2.5 mils or greater. Remove all rust and loose oxides.
For **concrete** surfaces, abrasive blast to remove any laitance.
- 3) See Madison Application Instructions for details.

B. APPLICATION OF COATING

- 1) Add 5% (by volume) of Madison Catalyst to CorroPipe 'S' and mix thoroughly for 3 to 5 minutes. Faster catalysts allow higher film builds. To thin material ONLY use Madison VR-1 Viscosity Reducer
 - C-4 Catalyst (30 minute pot life)
 - C-7 Catalyst (45 to 60 minute pot life)
 - C-10 Catalyst (1.5 to 2 hours pot life)
- 2) CorroPipe 'S' can be applied using a brush, single component spray equipment or automated lances. Methods vary depending on field or plant environment.
- 3) A second coat may be applied over the first, if it is applied within the recoat window. Otherwise, sand the surface to create a minimum 2.0 mil profile to ensure good intercoat adhesion.

C. CLEAN-UP AND STORAGE

- 1) This material will react with humidity and moisture. Keep containers tightly sealed and store upside down. Avoid dropping or subjecting the material to strong force. For clean-up, use Madison VR-1 Viscosity Reducer, M.E.K. or a 50:50 blend of M.E.K. and Xylol. Other solvents may react with the product.
- 2) Store between 10°C(50°F) and 27°C(80°F). DO NOT FREEZE. Use product within 6 months of receiving.

HEALTH AND SAFETY

CorroPipe "S" might build up gas over time. To avoid any sudden burst of gas, open the container carefully, thus allowing the gas to escape slowly. Avoid dropping or subjecting the material to strong force. CorroPipe "S" is intended for industrial use only. It contains no monomeric isocyanates but may nevertheless cause respiratory distress in some people. Provide ample ventilation. Wear a fresh air respirator when using in confined areas or when spraying. Wear rubber gloves, safety goggles and protective clothing. If swallowed, DO NOT induce vomiting as this will cause additional throat irritation; contact physician. If splashed on skin, remove immediately with rubbing alcohol and then wash with soap and water. If splashed in eyes, wash liberally with clean water and contact physician; temporary irritation of eyes may last several days. Contains no known or suspected carcinogens or mutagens. See MSDS for more information. The finished product is totally inert and harmless.

LIMITED TWO YEAR WARRANTY

Madison will replace any product which, in service for which it is suitable, fails to meet specifications within two years of sale and which is proven to be defective when applied according to instructions by a Madison Approved Applicator or Certified OEM Applicator. Madison accepts no responsibility or liability for any other loss, claim, damage, injury or expense, direct or consequential, in contract or negligence. This product replacement warranty is in lieu of any other right, warranty, guarantee or condition, statutory or otherwise, expressed or implied, whether as to fitness for a particular purpose or as to merchantable quality or otherwise.

The information contained herein is believed to be accurate as of the date of publication. Madison reserves the right to change product specifications without notice.

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