




**MS-Fireshield** by **EnviroECOats** is a single component waterborne elastomeric intumescent fire-resistant barrier coating that will withstand direct flame contact for up to 2 hours fire protection. It does not emit continuous smoke with E84 testing yielding 0=flame spread and 20=smoke during flame exposure.

**MS-Fireshield** is listed by the “Cool Roof Rating Council” and can be used to comply with **LEED and 2016 California Title 24** cool roof requirements, provides outstanding UV stability and rated at 84% reflectivity with an SRI 106. Help us protect the Environment and save money.

		<u>Initial</u>	<u>Weathered</u>
	<b>Solar Reflectance</b>	<b>0.84</b>	<b>0.77</b>
	<b>Thermal Emittance</b>	<b>0.90</b>	<b>0.88</b>
	Rated Product ID Number	0001	
	CRRC Licensee ID Number	1212	
	Classification	Production Line	
<small>Cool Roof Rating Council ratings are determined for a fixed set of conditions, and may not be appropriate for determining seasonal energy performance. The actual effect of solar reflectance and thermal emittance on building performance may vary.</small>			
<small>Manufacturer of product stipulates that these ratings were determined in accordance with the applicable Cool Roof Rating Council procedures.</small>			

This material may be used directly on foam, wood, textiles, masonry, wallboard, metal, etc. It does not normally require the use of primers on most substrates to obtain proper adhesion. Material must be stirred thoroughly prior to use. All surfaces must be clean and free of contaminants. Application temperature ranges from 50°F to 110°F. Tack free time is 30 min at 75°F with full cure in 24 hours. Re-coat time is normally 20-30 min. Functional operating temperature ranges from -40°F to 1800°F. Application film thickness dependent on barrier requirement but typically 20-30 mils per coat.

Subsequent coats may be applied after the first coat is fully dry. Fire rating is 1 hr. rating per 60 mils. A 2-hr. rating would be 120 mils. Coverage is 100 sq.ft./gal.

## MS-Fireshield Technical Data Sheet

<u>Characteristics</u>	<u>Test Results</u>	<u>Test Method</u>
Fire Rating	Class A 0- Flame 20-Smoke	ASTM E84
Fire Rating	< 3 hrs.	ASTM E119
Hardness	45-50	Shore D
Bond Strength	50 psi	ASTM D952-90
Compressive Strength	300 psi	ASTM D695-91
Elongation	100-150%	ASTM D882
Abrasion Resistance	0 grams loss	ASTM D1044-90
Impact	.8 lbs./in of notch	ASTM D256-90b
% Solids by weight (liquid)	50-65 %	
Spread Rate	100 sq ft/gal	
VOC	Non-Detect	

### Adhesion Results of Typical Substrates per ASTM D4541 Elcometer

Concrete-primed	>300 psi	Concrete cohesive Failure: excellent Bonding
Steel-primed	>1000 psi	Excellent Bonding
Wood- primed	>300 psi	Wood Failure; Excellent Bonding