

Redicote[®] E-11 HF-1

Emulsifier for cationic slow set bitumen emulsions for tack, prime, slurry seal and cold mix applications. Emulsifier for oils and resins used for dust control and rejuvenating. Break retarder for slurry.

Benefits and features

- Low use level:**
 Good quality slow set emulsions are formed at low use level
- Safe and easy handling:**
 Redicote E-11 HF-1 does not contain flammable solvents and so it is much safer to use. The low viscosity, low pour point and water solubility of Redicote E-11 HF-1 makes it easy and safe to use both as emulsifier and as a break control additive (retarder) for slurry
- Good adhesion:**
 Emulsions made with Redicote E-11 HF-1 pass the particle charge test and provide good adhesion to siliceous aggregates
- No need for acid:**
 No acid is required for soap preparation. The neutral pH of the emulsion is preferred in applications like tack coats for concrete, when emulsifying bio-based binders and when water soluble thickeners are incorporated.

Storage and handling

Redicote E-11 HF-1 may be stored in carbon steel tanks. Redicote E-11 HF-1 is compatible with polyethylene and polypropylene. Bulk storage does not need to be heated. Redicote E-11 HF-1 contains quaternary amines and may cause severe irritation or burns to skin and eyes. Protective goggles and gloves must be worn when handling this product. For further information consult the Safety Data Sheet.

Dosage

Cationic slow set emulsion	0.8-1.5%	pH 2-7 hydrochloric acid
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No acid is required to prepare stable emulsions

Specification

Activity, %	48-52	PM 5.020
pH (10% in water)	6-9	EP 5003N

Physical properties

Appearance at 25°C (77°)	liquid			
Flash point, °C	>90 (>200°F)			
Pour point, °C	-10 (14°F)			

	10	20	30	40	°C
	50	68	86	104	°F
Density, g/cc	1.06	1.05	1.04	1.03	
Density, lbs/U.S. gal	8.78	8.71	8.63	8.58	
Viscosity, mPa s (cP)	1160	620	360	190	

Physical properties are typical data based on our own measurements or derived from the literature. They do not constitute part of the delivery specification.

Packaging information

Redicote E-11 HF-1 is available in bulk shipment, in tight head lined steel drums of 400 lbs (181 kg) net weight, or in one-way totes (IBCs) of 2200 lbs (998 kg) net weight.

For more information and sample formulations contact us at asphalt@nouryon.com.

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We are a global specialty chemicals leader. Markets worldwide rely on our essential chemistry in the manufacture of everyday products such as paper, plastics, building materials, food, pharmaceuticals, and personal care items. Building on our nearly 400-year history, the dedication of our 10,000 employees, and our shared commitment to business growth, strong financial performance, safety, sustainability, and innovation, we have established a world-class business and built strong partnerships with our customers.

We operate in over 80 countries around the world and our portfolio of industry-leading brands includes Eka, Dissolvine, Trigonox, and Berol.

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