SFM-4H™

PRODUCT INFORMATION

Modified bitumen membrane with strong puncture resistance and excellent low temperature flexibility

OVERVIEW

BITEC SFM-4H is a hot asphalt or cold adhesive applied, mineral surfaced, modified bitumen waterproofing membrane that is strong, puncture resistant and has excellent low temperature flexibility, making it ideal for applications in climates with extreme temperature variations.

It is composed of carefully selected asphalts and blended with high quality styrene-butadiene-styrene rubber. SFM-4H is reinforced with a high-strength fiberglass mat. SFM-4H waterproofing membrane yields the following performance characteristics:

- Impermeable to water
- Low temperature flexibility
- Thermally stable
- Excellent adhesion
- Resistant to acids and most bases
- Excellent workability
- Longevity
- Mechanical strength
- Deterioration resistance
- Dimensional stability

SFM-4H incorporates a smooth and even application of coal slag to prevent blocking of rolls and to provide a smooth, acceptable application surface. SFM-4H can be applied by using hot asphalt or by using BITEC elastomeric cold process adhesives.

After installation of the roofing membrane is complete, the surface may be coated with a BITEC approved roof coating to protect the membrane from the harmful effects of ultra violet radiation and for UL fire rating if required. BITEC recommends a period of at least 45 days elapse before roof coatings are applied. This will effectively allow the membrane to cure and accept the roof coating.

PACKAGING

Palletized units contain 20 rolls of SFM-4H waterproofing membrane. Each unit is shrink wrapped in a special polyethylene bag for stability. BITEC recommends that units of material be single stacked.

APPLICATION

BITEC SFM-4H must be fully adhered. When applying the membrane, the coal slag surface should always be down, facing the roof deck. Prior to application, the membrane should be unrolled completely, aligned, allowed to relax and set before the actual installation of the membrane occurs. The membrane should then be rolled up half way, leaving the other half fully extended. (This will ensure the membrane will remain aligned during the installation process.)

BITEC SFM-4H is designed to be applied by conventional methods of hot asphalt or cold adhesive application. BITEC PMA-186 or PMA-2000 cold process adhesive should be applied at a rate of 1.5 to 2.5 gallons per 100 ft^2. (The substrate that the cold process adhesive is being applied over may affect consumption rates.) Refer to the adhesive technical data sheets for application methods. Hot asphalt applications require ASTM D312 Type III mopping asphalt for low slope applications or ASTM D312 Type IV for slopes greater than 1” per foot. Hot asphalt should be applied at a rate of 25 lb./100 ft^2. Follow NRCA and the asphalt manufacturers guidelines for EVT requirements when heating asphalt. Refer to the BITEC General Application Instructions in the BITEC Products and Application Guide for proper application techniques.

All side and end laps should be a minimum of 4” and 6”, respectively. BITEC SBS hot applied membranes can be installed in hot roofing asphalt or in BITEC approved cold process adhesives.

BITEC SBS membranes are not recommended for use over coal tar or pitch roofs unless the existing deck is separated from the BITEC membrane by a minimum 1⁄2” thick, mechanically attached recovery board. Only mastics and adhesives provided by or approved by BITEC should be used with our SBS membranes.

As with any roofing project, good roofing practices should always be followed. Consult the BITEC specification and details book for information governing certain systems.

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Before using this product, be certain that all information concerning the installation of this product and safety guidelines pertaining thereto have been read and fully understood. The application of modified membranes requires the use of explosive gas and molten asphalts, which if mishandled can and will cause personal injury and/or property.

SAFETY

Contractor
It is the contractor's responsibility to observe all fire prevention policies and practices, to train, instruct and warn employees on the use of heat weld equipment. Follow OSHA and NRCA provisions for fire protection, including but not limited to those listed in OSHA 1910.151, 155, 156, 157, and 1910.1101, which apply to heat weld application. The contractor should be familiar with NFPA 58 "Standard for the Storage and Handling of Liquefied Petroleum Gas" and any other appropriate publications of the National LP Gas Association.

Fire Department Regulations
The contractor should be familiar with all local fire codes in his area. The contractor is responsible for obtaining all necessary permits or certificates before any work is started.

Personnel
Proper clothing should be worn at all times while installing any modified membrane. Long sleeve shirt, long pants, leather or durable flat sole shoes and work gloves. Workers, other than the heat weld operator, should be no closer than 3' from open flame. Alternately, a hot air welding device may be employed.

NOTE: The roofing contractor and his employees are the key to success regarding safety. Safety should always be first!

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BITEC BITUMEN TECHNOLOGY®

Technical Schedule	
APPROXIMATE ROLL DIMENSIONS	33.9' X 3.28" (10.34 m x 1 m)
SEAM WIDTH	3.5" (89 mm)
APPROXIMATE INSTALLED COVERAGE	100 ft² (9.3 m)
TOP SURFACE	Coal Slag
BOTTOM SURFACE	Coal Slag
APPROXIMATE THICKNESS	4.0 mm (160 mils)
APPROXIMATE WEIGHT	100 lb (45.5 kg)
REINFORCEMENT	Fiberglass Mat
SOFTENING POINT (ASTM D36)	250°F (120°C)
TEAR STRENGTH (ASTM D5147)	105 lbf (467 N)
TENSILE STRENGTH (ASTM D5147 @ 23°C lbf/in)	MD 60 XMD 40 (MD 10.51 kN/m XMD 7.00 kN/m)
ELONGATION %	MD 10 XMD 10
PENETRATION (ASTM D5 @ 25°C)	40 dmm
LOW TEMPERATURE FLEXIBILITY (ASTM D5147)	-22°F (-30°C)
PERMEANCE	<1 perm

All Information is given in good faith, but normal tolerances of manufacture and testing will apply. BITEC reserves the right to improve and change its products at any time without prior notice or advice. The use of BITEC products is determined by local conditions and individual requirements of each contract. In consideration of the many factors involved, BITEC cannot be held responsible for the application of its products and for conditions beyond its control. All claims filed against BITEC warranties will be subject to the provisions set forth at the date of warranty issuance, and any addendum thereto. Under no circumstances will BITEC be held liable for any damage, whether personal injury or property damage, which occur during or after the application of the membrane.

Approvals:

CLASSIFIED UL R-13231

Membrane for Roofing Systems As to an external fire exposure only 49S8

STANDARD SPECIFICATION:

ASTM D6163, Type I, Grade G

Member of:

NATIONAL ROOFING CONTRACTORS ASSOCIATION

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