

### Meets the requirements of ASTM D 6223, Type I, Grade G

#### Features and Components

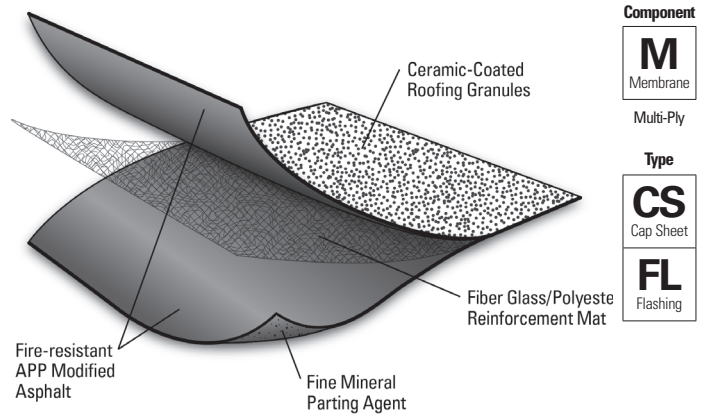
BICOR M FR is used as a premium cap or flashing sheet in APP multi-ply roofing systems.

**Ceramic-coated Roofing Granules:** Specifically engineered for optimal embedment in the APP-blended sheet. The ceramic coating promotes excellent long-term adhesion. Granules are available in white, black and tan (Black and tan may require extended lead times).

**Premium APP (Atactic Polypropylene) Polymer, Asphalt and Fire-Retardant Blend:** Provides an extremely durable sheet with excellent weathering characteristics, flexibility and dimensional stability for ease of handling and quick installations.

**Fiber Glass/Polyester Reinforcement Mat:** Combines the excellent tensile strength, toughness and puncture resistance of a polyester mat with the dimensional stability and lay-flat characteristics of fiber glass.

**Surfacing:** Fine mineral parting agent on the bottom side. Enables the product to be applied in cold adhesive or heat welding techniques.



<b>Component</b>
<b>M</b> Membrane
Multi-Ply
<b>Type</b>
<b>CS</b> Cap Sheet
<b>FL</b> Flashing



Colors: white, black and tan (Black and tan may require extended lead times).

#### System Compatibility This product may be used as a component in the following systems. Please reference product application for specific installation methods and information.

Multi-Ply	BUR		APP			SBS			
	HA	CA	HW	HA	CA	HW	SA	MF	
<i>Compatible with the selected multi-ply systems above</i>									

Single Ply	TPO				PVC			EPDM		
	MF	AD	SA	IW	MF	AD	IW	MF	AD	BA
<i>Do not use in single ply systems</i>										

**Key:** HA = Hot Applied CA = Cold Applied HW = Heat Weldable SA = Self Adhered MF = Mechanically Fastened IW = Induction Weld BA = Ballasted AD = Adhered

#### Energy and the Environment

Pre-consumer Recycled Content	0%
Post-consumer Recycled Content	0%

#### Peak Advantage® Guarantee Information

Systems	Guarantee Term
Dependent on system*	Up to 30 years

\*Contact JM Technical Services for specific system requirements or guarantee terms.

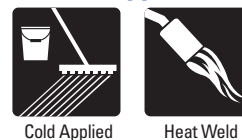
#### Codes and Approvals



- UL Class A ratings may be obtained in numerous constructions, both new and re-roof.

Refer to the Safe Use Instructions and product label prior to using this product. The Safe Use Instructions are available by calling (800) 922-5922 or on the Web at [www.jm.com/roofing](http://www.jm.com/roofing).

#### Product Application



Refer to JM APP modified bitumen specifications and detail drawings for application and slope information.

#### Packaging and Dimensions

Roll Width	39 3/8" (1 m)
Roll Length	32' 10" (10.01 m)
Roll Coverage*	95.8 ft² (8.9 m²)
Roll Weight	111 lb (50.3 kg)
Rolls per Pallet	20
Pallets per Truck**	21
Producing Locations	South Gate, CA    Macon, GA Plattsburgh, NY

\*Assumes a 4" side lap.

\*\* Assumes a 48' flatbed truck.

**Meets the requirements of ASTM D 6223, Type I, Grade G**

**Tested Physical Properties**

Physical Properties		ASTM Test Method	Standard for ASTM D 6223, Type II, Grade G	BICOR M FR		
				MD*	XMD**	
Strength	Tear Resistance @ 77°F	D 4073 / 5147	≥ 120 lbf	165 lbf	160 lbf	
	Peak Load at 0°F	D 5147	≥ 150 lbf/in-width	190 lbf/in-width	170 lbf/in-width	
	Peak Load at 77°F	Unconditioned	D 5147	≥ 65 lbf/in-width	131 lbf/in-width	122 lbf/in-width
		90-Day Heat Conditioned	D 5147 / 5869	≥ 65 lbf/in-width	165 lbf/in-width	145 lbf/in-width
Longevity	Low Temp. Flexibility @ 180° on 1" Mandrel (Pass-Fail)	Unconditioned	D 5147	Pass @ 32° F "none of the specimens show cracking"	Pass	
		90-Day Heat Conditioned	D 5147 / 5869		Pass	
	Low Temperature Unrolling (Pass-Fail) Unroll in 4-6s; Visual Inspection in "unrolled" position	D 5636	Pass @ 41° F "none of the specimens show cracking"	Pass		
	Compound Stability - 2 hr 15 min @ 230° F (Pass-Fail)	D 5147	Pass "no failures showing signs of flowing, dripping, or drop formation"	Pass		
	Granule Loss	D 4977/5147	2 g (0.07 oz)	0.7 g (0.02 oz)		
	Thickness	D 5147	≥ 160 mils	180 mils		
	Bottom Coating Thickness	D 5147	≥ 40 mils	72 mils		
	Water Absorption - water by distillation	D 5147 / 95	≤ 3.2%	0.6%		
	Moisture Content - water by distillation	D 5147 / 95	≤ 1%	0.2%		
	Ultimate Elongation at 77°F	D 6222				
	Elongation at Peak Load @ 0° F	D 5147	≥ 3%	5%	5%	
	Elongation at Peak Load @ 77° F	Unconditioned	D 5147	≥ 3%	4%	4%
		90-Day Heat Conditioned	D 5147 / 5869	≥ 3%	5%	5%
	Installation	Dimensional Stability - 24 hr @ 176° F	D 5147 / 1204	≤ 1%	0.2%	0.2%
Net Mass per Unit Area		D 146	≥ 90 lb/100 ft <sup>2</sup>	99 lb/100 ft <sup>2</sup>		

\*MD = Machine Direction

\*\*XMD = Cross-Machine Direction

Note: All data represents tested values.

Technical specifications as shown in this literature are intended to be used as general guidelines only. Please refer to the Safety Data Sheet and product label prior to using this product. The Safety Data Sheet is available by calling (800) 922-5922 or on the web at [www.jm.com/roofing](http://www.jm.com/roofing). The physical and chemical properties of the product listed herein represent typical, average values obtained in accordance with accepted test methods and are subject to normal manufacturing variations. They are supplied as a technical service and are subject to change without notice. Check with the regional sales representative nearest you for current information.

All Johns Manville products are sold subject to Johns Manville's standard Terms and Conditions, which includes a Limited Warranty and Limitation of Remedy. For a copy of the Johns Manville standard Terms and Conditions or for information on other Johns Manville roofing products and systems, visit [www.jm.com/terms-conditions](http://www.jm.com/terms-conditions).