

ACRYLICFOAM® MP

ACRYLICFOAM® is a closed-cell rigid PMI (Polymethacrylimide) foam, which used as the core of lightweight sandwich structure.

MP is an improved and economic grade. It is suitable for medium temperature curing epoxy resin system and suitable (based on density) for various curing processes (Autoclave, vacuum infusion, RTM, VARTM, VARI, HP-RTM, etc.). It also can be easily thermoformed or CNC machined.

The cell size is an important specification of the foam material and determines the difference in the amount of curing resin absorbed during the foam processing. We have divided it according to the cell size in order to better fit the different processing processes.

TYPICAL PROPERTY VALUES

ACRYLICFOAM® MP-FC

FC is a fine cell structure that guarantees a lowest curing resin absorption of up to 50g/m², thus reducing the weight of the final product, and is particularly suitable for vacuum infusion and RTM processes.

Properties	Unit	31 MP-FC	51 MP-FC	71 MP-FC	110 MP-FC	Standard
Density	kg/m ³	32	52	75	110	ISO 845
	lbs/ft ³	2	3.25	4.68	6.87	ASTM D1622
Compressive Strength	MPa	0.4	0.9	1.6	3.4	ISO 844
	psi	58.01	130.53	232.06	493.13	ASTM D1621
Tensile Strength	MPa	1	1.9	2.3	3.4	ISO 527-2
	psi	145.04	275.57	333.59	493.13	ASTM D638
Shear Strength	MPa	0.4	0.8	1.3	2.4	DIN 53294
	psi	58.01	116.03	188.55	348.09	ASTM C273
Elastic Modulus	MPa	33	65	90	152	ISO 527-2
	psi	4786.24	9427.45	13053.40	22045.74	ASTM D638
Shear Modulus	MPa	14	22	33	57	DIN 53294
	psi	2030.53	3190.83	4786.24	8267.15	ASTM C273
Elongation at Break	%	5	5	5	5	ASTM D638
HDT	°C	165	165	165	165	DIN 53424



	°F	329	329	329	329	
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The above technical data are typical values at nominal densities

Burning Behavior of ACRYLICFOAM® 71MP-FC

Test company: Pony Testing International Group

Test Method: GB 8410-2006

Report Number: BTHCUFSB5711255C4

Preparation Condition: (23+2)°C, (50+5)%RH 24h

Test Item	Sample Number	Standard mm/min	Test Result			Conclusion
			L, mm	T, s	V, mm/min	
Flammability	B5711255C4-C1-1	≤100	254	217	D-70	Pass
	B5711255C4-C1-2		254	236	D-65	Pass
	B5711255C4-C1-3		254	220	D-69	Pass
	B5711255C4-C1-4		254	219	D-70	Pass
	B5711255C4-C1-5		254	225	D-68	Pass

ACRYLICFOAM® MP-MC

MC is a medium cell structure, which can get a good balance between peel strength and light weight requirements.

Properties	Unit	31 MP-MC	51 MP-MC	71 MP-MC	110 MP-MC	Standard
Density	kg/m³	32	52	75	110	ISO 845
	lbs/ft³	2	3.25	4.68	6.87	ASTM D1622
Compressive Strength	MPa	0.4	0.9	1.6	3.4	ISO 844
	psi	58.01	130.53	232.06	493.13	ASTM D1621
Tensile Strength	MPa	1	1.9	2.3	3.4	ISO 527-2
	psi	145.04	275.57	333.59	493.13	ASTM D638
Shear Strength	MPa	0.4	0.8	1.3	2.4	DIN 53294
	psi	58.01	116.03	188.55	348.09	ASTM C273
Elastic Modulus	MPa	33	65	90	152	ISO 527-2
	psi	4786.24	9427.45	13053.40	22045.74	ASTM D638
Shear Modulus	MPa	14	22	33	57	DIN 53294
	psi	2030.53	3190.83	4786.24	8267.15	ASTM C273
Elongation at Break	%	5	5	5	5	ASTM D638
HDT	°C	165	165	165	165	DIN 53424
	°F	329	329	329	329	

The above technical data are typical values at nominal densities



Sales Range

Grade	Size (mm)	Standard Sheet Thickness (mm)	Possible Sheet Thickness (mm)
31 MP	2500*1250	100	1-145mm
51 MP	2500*1250	90	1-130mm
71 MP	2500*1250	80	1-115mm
110 MP	2160*1100	70	1-100mm

Thickness tolerance $\pm$ (0.5mm), others are available upon request

Disclaimer

Our technical advice on the applications of our products is given without obligation.
The buyer is responsible for their use and processing, and is also liable for observing any third-party rights.

Technical data concerning our products are typical values. Subject to alteration.

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