



Thermal insulation Silicone foam KB1047HIF

KB1047HIF insulation silicone foam utilizes a modified polymer matrix barrier fillers to form a multi-layered structure. These fillers feature ultra-low thermal conductivity, creating effective heat-blocking barriers within the foam that significantly impede thermal transfer. Simultaneously, they enhance the foam's mechanical properties by improving compressive strength and abrasion resistance.

Engineered for application-specific optimization, KB1047HIF can be customized to balance thermal insulation, lightweight characteristics, and mechanical strength - delivering optimal thermal management and comprehensive performance tailored to distinct operational requirements.

The foam is environmentally compliant, non-toxic, and odorless. It exhibits fire resistance and flame retardancy with exceptional low smoke density and toxicity. Additional properties include outstanding weather resistance (UV/ozone resistance), thermal stability across extreme temperatures, and superior electrical insulation performance.

KB1047HIF-Technical Data Sheet of Thermal insulation silicone foam

Product Series: KB1047HIF						
Property		Unit	Normal value	Testing standards		
color		——	Black, White	Visual		
Thickness		mm	1.0~3.0	Thickness Gauge		
density		g/cm3	0.6~0.9	ASTM D 1056		
Tensile Strength		KPa	≥400	ASTM D 412		
Elongation at break		%	≥120	ASTM D 412		
Thermal conductivity		W/(mK)	≤0.2	ASTM C 518		
Flame retardant		/	V0	UL-94		
Volume resistivity		Ω.cm	10 ¹³	ASTM D 149		
Thermal insulation		The difference between hot and cold surfaces is about 250℃				
Note: The above indicators are for reference only. The specific indicators shall be subject to confirmation by actual samples or agreed indicators.						
Model Coding Rules_Example: KB1047HIF						
KB	1	047	HIF		color	B Black
Kompa New Materials	Main serial number	Derivative serial number	Heat -insulating Foam			W White

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**Main Application:**

Cushioning and shock absorption between square cells of power batteries in new energy vehicles; shock absorption, cushioning and lamination in the power industry.

Product Specifications:

Rolls: The standard width is 500mm or 1000mm. Customization according to customer requirements is acceptable, and die-cutting can be carried out according to customer drawings.

Backing Adhesive Service: Without backing adhesive, single-sided or double-sided backing adhesive is available.

Storage and Transportation:

Store in the original packaging at room temperature, keep away from open flames. Handle and transport it as general chemicals

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