



Longer range. Faster charging.

3M™ Battery Enhancement Material

Designed to protect your xEV battery from extreme environmental temperatures by reducing the power required for heating and cooling systems. Our lightweight insulation assists the battery in maintaining its optimum operating temperature. The result: improved driving range and battery performance.



Extended Driving
Range



Quicker Charging
Times



Extended Battery
Lifespan

Key benefits:

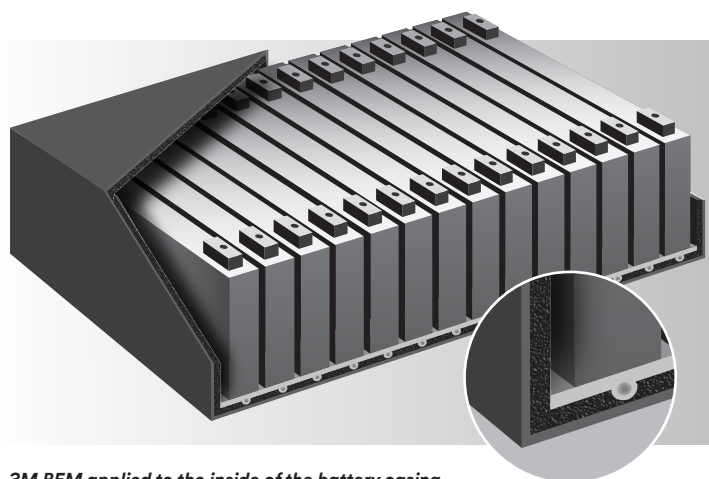
- Extended driving range
- Quicker charging times
- Extended battery lifespan and durability

Product features:

- Thin, lightweight and minimally fiber shedding
- Flame resistant (UL 94 V-0)
- High compressibility and recovery properties
- Excellent cavity filling
- Performs well in high temperature applications

3M™ Battery Enhancement Material (BEM) can be applied to a variety of battery pack constructions.

3M BEM can be placed on the bottom, top or all around the battery pack, but is most effective when wrapped around the whole pack.



3M BEM applied to the inside of the battery casing.

Physical properties:

	Typical Value ^A	Test Method
Color	Black	Visual
Basis weight	290 gsm	Mass per unit area
Initial Thickness	6 mm	SAE J1355
Thermal properties: R-Value ^C K-Value ^D	>0.17 m ² K/W < 0.035 W/mK @ nominal thickness	ASTM C518
Surface Electrical Resistance ^E	1.1X10 ⁹ ohm @ 25°C, 50% RH	ASTM D257, GB/T 1410
Flame resistance	Pass	UL 94 V-0

A: All the property value here are the Typical Value; not a standard value, but test data from 3M lab.

B: Nominal thickness is measured using a 12 in² plate with 0.002 psi applied to the sample per SAE J135.

C: R-Value is the thermal resistance of the insulation measured at the corresponding thickness per ASTM C518.

D: k-value is thermal conductivity of the insulation material per ASTM C518

E: The surface Electric resistivity may change under different temperature and humidity condition.

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