

Product Information Sheet



FyreWrap® LiB Thermal Barriers

INTRODUCTION

FyreWrap® LiB (Lithium-ion Battery) thermal barriers from Alkegen are a family of high-temperature, lightweight, thermal and electrically insulating materials designed to prevent thermal runaway propagation in lithium-ion battery applications.

Building on our thermal management expertise and manufacturing excellence, combined with extensive experience in aerospace, automotive and fire protection application, Alkegen offers customized solutions for lithium-ion thermal runaway propagation prevention.

CAPABILITIES

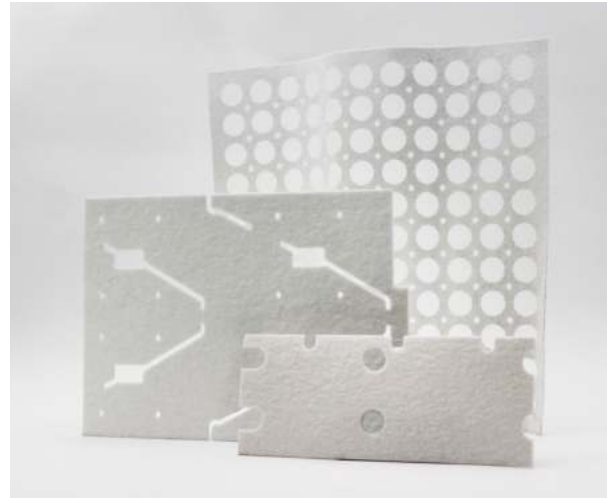
- Thermal Runaway propagation prevention
- Fire resistant, and flame barrier
- High Temperature Thermal and Electrical Insulation
- Thin, light-weight uniform flexible materials
- Easy to wrap, shape or cut
- Excellent chemical stability
- Non-woven compressible fiber matrix

MATERIAL PROPERTIES

- Temperature grade (°C): 1260 - 1600
- Thermal conductivity: 0.0337 W/mK @ 25°C (ASTM E1530)
- Thickness (mm): 0.8 - 10.0
- Weight (kg/m²): 0.3 - 0.4
- Dielectric strength (ASTM D149): >3.5 kV/mm at minimum thickness
- Arc resistivity (ASTM D495): <40 sec

APPLICATIONS

- Cell and Module Protection
- Lid, Pack and Enclosure Protection
- Pack Sub-Component Protection
- Battery Transportation Packaging



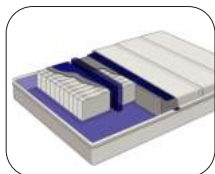
PRODUCT FAMILIES

- IN70 Series
- FX70 Series
- SA95 Series

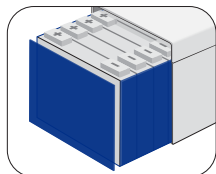
Alkegen offers customers unique solutions that cater to each application's performance criteria, cost structure, and product handling needs. The information presented refers to our core products and their typical characteristics. Alkegen offers application support for many specifications and/or enhancements, such as:

- Adhesive and foil backings
- Encapsulation and lamination
- Hybrid fiber systems and composites

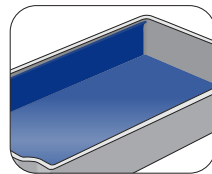
Please contact the Alkegen Battery team to discuss Additional enhancement requirements at +1 716-768-6472.



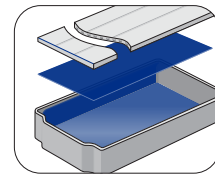
Various Pack Sub-components



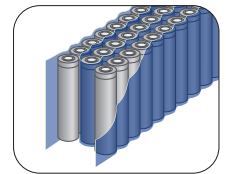
Side Plate and End Plate



Pack Walls and Bottom



Cooling Plate Pad



Cell Protection

The following are registered trademarks of Alkegen: FyreWrap. The test data shown are average results of tests conducted under standard procedures and are subject to variation. Results should not be used for specification purposes. Product Information Sheets are periodically updated by Alkegen. Before relying on any data or other information in this Product Information Sheet, you should confirm that it is still current and has not been superseded. A Product Information Sheet that has been superseded may contain incorrect, obsolete and/or irrelevant data and other information.

Form A-5261
Effective 02/24
© 2024 Alkegen
All Rights Reserved

Alkegen

Headquarters

5215 N. O'Connor Blvd, Suite 2300
Irving, TX 75039

Telephone: 716-768-6500

Website: www.alkegen.com

Email: batterygroup@alkegen.com

