

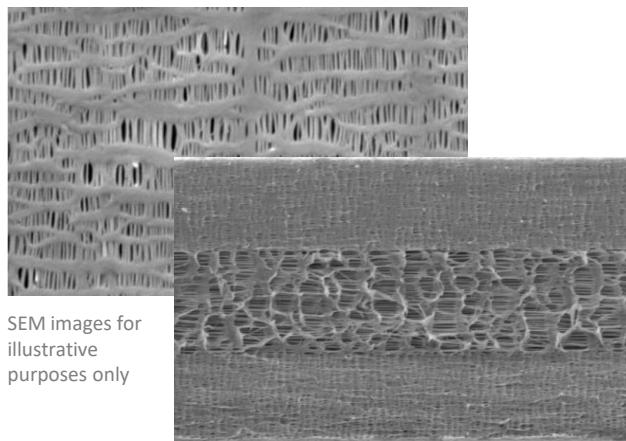
Product Name & Description

Celgard® H1809
18µm Trilayer Microporous Membrane (PP/PE/PP)

Primary Applications

High Power Lithium Battery Systems; especially those that require exceptional safety and energy density advantages.

Also an ideal substrate for coating, if required



Product Benefits

- Zero TD shrinkage reduces internal shorting
- Uniform pore structure with high chemical & thermal stability
- High porosity for excellent high-rate performance
- PP outer layer provides high temperature melt integrity, oxidation resistance
- PE inner layer provides high-speed shutdown features
- Ultra-low electrical impedance

Technical Data (Typical Properties)

Basic Film Properties	Unit of Measure	Typical Value
Thickness	µm	18
Gurley (JIS)	Seconds	195
Porosity (calculated)	%	49
TD Shrinkage @ 105°C / 1 Hour (typical)	%	0
MD Shrinkage @ 105°C / 1 Hour (typical / max)	%	2.0 / 6.0
TD Tensile Strength (typical / min)	Kg/cm ²	160 / 100
MD Tensile Strength (typical / min)	Kg/cm ²	1880 / 1100
Puncture Strength (typical / min)	Grams Force (gf)	410 / 300

Packaging

Please contact your Celgard representative for more information on product roll lengths and slit widths.

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Users of any substance should satisfy themselves by independent investigation that the material can be used safely. We may have described certain hazards, but we cannot guarantee that these are the only hazards that exist. Review the Product Safety Data Sheet for environmental, health and safety information related to this product.

