

SUMIKASUPER® E6810LHF Z

LCP-(GF+MX)50

Sumitomo Chemical Co., Ltd.

| Processing/Physical Characteristics | Value | Unit | Test Standard |
|-------------------------------------|--------|-------|---------------|
| ASTM Data | | | |
| Mold Shrinkage, MD | 0.0013 | mm/mm | ASTM D 955 |
| Mold Shrinkage, TD | 0.0038 | mm/mm | ASTM D 955 |

| Mechanical properties | Value | Unit | Test Standard |
|-------------------------------|-------|-------------------|---------------|
| ISO Data | | | |
| Tensile Strength | 95 | MPa | ISO 527 |
| Flexural modulus, 23°C | 13700 | MPa | ISO 178 |
| Charpy impact strength, +23°C | 25 | kJ/m ² | ISO 179/1eU |
| ASTM Data | | | |
| Tensile Strength | 105 | MPa | ASTM D 638 |
| Flexural Modulus | 12600 | MPa | ASTM D 790 |
| Flexural Strength | 133 | MPa | ASTM D 790 |
| Izod Impact unnotched, 1/8 in | 200 | J/m | ASTM D 256 |

| Thermal properties | Value | Unit | Test Standard |
|--|-------|------|---------------|
| ISO Data | | | |
| Temp. of deflection under load, 1.80 MPa | 273 | °C | ISO 75-1/-2 |
| ASTM Data | | | |
| UL 94 Flame rating | V-0 | - | UL 94 |
| Thickness tested | 0.3 | mm | - |
| DTUL @ 264 psi | 266 | °C | ASTM D 648 |

| Electrical properties | Value | Unit | Test Standard |
|----------------------------|-------|--------|---------------|
| ASTM Data | | | |
| Dissipation Factor, 1 MHz | 0.02 | - | ASTM D 150 |
| Dielectric Constant, 1 MHz | 4.1 | - | ASTM D 150 |
| Volume Resistivity | 1E15 | Ohm*cm | ASTM D 257 |
| Arc Resistance | 181 | s | ASTM D 495 |

| Other properties | Value | Unit | Test Standard |
|------------------|-------|-------------------|---------------|
| Density | 1820 | kg/m ³ | ASTM D 792 |

| Processing Recommendation Injection Molding | Value | Unit | Test Standard |
|---|-----------|------|---------------|
| Pre-drying - Temperature | 130 | °C | - |
| Pre-drying - Time | 4 - 24 | h | - |
| Melt temperature | 350 | °C | - |
| Mold temperature | 40 - 160 | °C | - |
| Zone 1 | 280 - 320 | °C | - |
| Zone 2 | 320 - 340 | °C | - |
| Zone 3 | 340 - 360 | °C | - |
| Nozzle temperature | 340 - 360 | °C | - |
| Screw speed | 50 - 100 | rpm | - |
| Injection pressure | 80 - 160 | MPa | - |
| Back pressure | 1 - 5 | MPa | - |
| Holding pressure | 20 - 40 | MPa | - |

Characteristics**Processing**

Injection Molding

Regional Availability

North America, Europe, Asia Pacific

Delivery form

Black, Natural Color