**Samsung Total PP HJ730L**

High Crystallinity Polypropylene

SAMSUNG TOTAL PETROCHEMICALS Co., Ltd.

**Technical Data**

**Product Description**

SAMSUNG TOTAL HJ730L is a highly isotactic Homo PP(HIPP) with high crystalline properties compared to normal Homo PP. The product's crystalline properties have enhanced its strength and heat resistance. HJ730L is highly useful for use in electrical/electronic appliances and high strength automobile parts which are exposed to lengthy periods of high temperatures.

**General**

- **Material Status**: Commercial: Active
- **UL Yellow Card**: E140331-222941
- **Search for UL Yellow Card**: SAMSUNG TOTAL PETROCHEMICALS Co., Ltd.
- **Availability**: Asia Pacific, North America

**Features**

- Crystalline
- Good Flow
- Good Impact Resistance
- Heat Stabilized
- High Hardness
- High Heat Resistance
- High Stiffness
- High Strength
- Homopolymer
- Isophthalic
- Low Blooming
- Scratch Resistant

**Uses**

- Appliances
- Automotive Applications
- Automotive Exterior Parts
- Automotive Interior Parts
- Automotive Interior Trim
- Electrical/Electronic Applications
- Lids

**Agency Ratings**

- FDA 21 CFR 177.1520

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**Physical**

<table>
<thead>
<tr>
<th>Property</th>
<th>Nominal Value (English)</th>
<th>Nominal Value (SI)</th>
<th>Test Method</th>
</tr>
</thead>
<tbody>
<tr>
<td>Density</td>
<td>0.910 g/cm³</td>
<td>0.910 g/cm³</td>
<td>ASTM D1505</td>
</tr>
<tr>
<td>Melt Mass-Flow Rate (MFR)</td>
<td>5.0 g/10 min</td>
<td>5.0 g/10 min</td>
<td>ASTM D1238</td>
</tr>
</tbody>
</table>

**Mechanical**

<table>
<thead>
<tr>
<th>Property</th>
<th>Nominal Value (English)</th>
<th>Nominal Value (SI)</th>
<th>Test Method</th>
</tr>
</thead>
<tbody>
<tr>
<td>Tensile Strength (Yield)</td>
<td>6120 psi</td>
<td>42.2 MPa</td>
<td>ASTM D638</td>
</tr>
<tr>
<td>Tensile Elongation (Break)</td>
<td>200 %</td>
<td>200 %</td>
<td>ASTM D638</td>
</tr>
<tr>
<td>Flexural Modulus</td>
<td>299000 psi</td>
<td>2060 MPa</td>
<td>ASTM D790</td>
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**Impact**

<table>
<thead>
<tr>
<th>Property</th>
<th>Nominal Value (English)</th>
<th>Nominal Value (SI)</th>
<th>Test Method</th>
</tr>
</thead>
<tbody>
<tr>
<td>Notched Izod Impact (73°F)</td>
<td>0.73 ft·lb/in</td>
<td>39 J/m</td>
<td>ASTM D256</td>
</tr>
</tbody>
</table>

**Hardness**

<table>
<thead>
<tr>
<th>Property</th>
<th>Nominal Value (English)</th>
<th>Nominal Value (SI)</th>
<th>Test Method</th>
</tr>
</thead>
<tbody>
<tr>
<td>Rockwell Hardness (R-Scale)</td>
<td>105</td>
<td>105</td>
<td>ASTM D785</td>
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**Thermal**

<table>
<thead>
<tr>
<th>Property</th>
<th>Nominal Value (English)</th>
<th>Nominal Value (SI)</th>
<th>Test Method</th>
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</thead>
<tbody>
<tr>
<td>Deflection Temperature Under Load</td>
<td>279 °F</td>
<td>137 °C</td>
<td>ASTM D648</td>
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</tbody>
</table>

**Optical**

<table>
<thead>
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<th>Nominal Value (English)</th>
<th>Nominal Value (SI)</th>
<th>Test Method</th>
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</thead>
<tbody>
<tr>
<td>Gloss</td>
<td>90</td>
<td>90</td>
<td>ASTM D2457</td>
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</tbody>
</table>

**Injection**

<table>
<thead>
<tr>
<th>Property</th>
<th>Nominal Value (English)</th>
<th>Nominal Value (SI)</th>
<th>Test Method</th>
</tr>
</thead>
<tbody>
<tr>
<td>Rear Temperature</td>
<td>320 to 392 °F</td>
<td>160 to 200 °C</td>
<td></td>
</tr>
<tr>
<td>Middle Temperature</td>
<td>392 to 464 °F</td>
<td>200 to 240 °C</td>
<td></td>
</tr>
<tr>
<td>Front Temperature</td>
<td>428 to 500 °F</td>
<td>220 to 260 °C</td>
<td></td>
</tr>
<tr>
<td>Mold Temperature</td>
<td>86.0 to 122 °F</td>
<td>30.0 to 50.0 °C</td>
<td></td>
</tr>
<tr>
<td>Injection Pressure</td>
<td>14200 to 35600 psi</td>
<td>98.1 to 245 MPa</td>
<td></td>
</tr>
<tr>
<td>Holding Pressure</td>
<td>11400 to 32700 psi</td>
<td>78.5 to 226 MPa</td>
<td></td>
</tr>
</tbody>
</table>

**Injection Notes**

- Cooling Time: 25 to 40 sec
Notes

1 A UL Yellow Card contains UL-verified flammability and electrical characteristics. UL Prospector continually works to link Yellow Cards to individual plastic materials in Prospector, however this list may not include all of the appropriate links. It is important that you verify the association between these Yellow Cards and the plastic material found in Prospector. For a complete listing of Yellow Cards, visit the UL Yellow Card Search.

2 Typical properties: these are not to be construed as specifications.
Where to Buy

Supplier

SAMSUNG TOTAL PETROCHEMICALS Co., Ltd.
Seosan Si, Chung Nam Korea
Telephone: +82-41-660-6114
Web: http://www.samsungtotal.com/

Distributor

KMI Group
Telephone: 949-502-8136 x201
Web: http://www.kmigroup.com/
Availability: North America

Reseller

Honrun International Co., Ltd.
Telephone: 852-69575415
Web: http://www.ponci.com.cn/eng/
Availability: China