

## Technical Data Sheet

### Polyfort PPC MGB6 RD H1 BLK72025



Polypropylene Copolymer

#### Product Description

Hybrid filled low density PP-Copolymer with excellent scratch resistance, low emission and UV-stability especially for automotive interior parts

**Processing Method** Injection Molding

**Attribute** Heat Stabilized; Low Density; Low Emissions; Scratch Resistant

**Filler/Reinforcement** Glass Bubble; Mineral

| Typical Properties                                                  | Nominal Value | Units                   | Test Method   |
|---------------------------------------------------------------------|---------------|-------------------------|---------------|
| <b>Physical</b>                                                     |               |                         |               |
| Melt Volume Flow Rate, (230 °C/2.16 kg)                             | 10            | cm <sup>3</sup> /10 min | ISO 1133      |
| Density, (Method A)                                                 | 0.900         | g/cm <sup>3</sup>       | ISO 1183      |
| <b>Mechanical</b>                                                   |               |                         |               |
| Tensile Stress at Yield, (Type 1A, 50 mm/min)                       | 23.0          | MPa                     | ISO 527-2     |
| Nominal Tensile Strain at Break, (50 mm/min, Type 1A)               | 110           | %                       | ISO 527-2     |
| Flexural Modulus                                                    | 1640          | MPa                     | ISO 178       |
| Tensile Strain at Yield, (Type 1A, 50 mm/min)                       | 5.0           | %                       | ISO 527-2     |
| Tensile Stress at Break, (Type 1A, 50 mm/min)                       | 15.0          | MPa                     | ISO 527-2     |
| Tensile Modulus, (1 mm/min, Type 1A)                                | 1700          | MPa                     | ISO 527-1     |
| Flexural Stress                                                     | 29            | MPa                     | ISO 178       |
| <b>Impact</b>                                                       |               |                         |               |
| Charpy Impact Strength - Notched                                    |               |                         |               |
| (23 °C, Type 1, Edgewise, Notch A)                                  | 4.0           | kJ/m <sup>2</sup>       | ISO 179       |
| (-30 °C, Type 1, Edgewise, Notch A)                                 | 2.0           | kJ/m <sup>2</sup>       | ISO 179       |
| Charpy Impact Strength - Unnotched                                  |               |                         |               |
| (23 °C, Type 1, Edgewise)                                           | 70            | kJ/m <sup>2</sup>       | ISO 179       |
| (-30 °C, Type 1, Edgewise)                                          | 25            | kJ/m <sup>2</sup>       | ISO 179       |
| <b>Thermal</b>                                                      |               |                         |               |
| Vicat Softening Temperature                                         |               |                         |               |
| (B (50N), 50 °C/h)                                                  | 60.0          | °C                      | ISO 306       |
| (A (10N), 50 °C/h)                                                  | 148           | °C                      | ISO 306       |
| Deflection Temperature Under Load Unannealed (0.45 MPa), (Flatwise) | 87.0          | °C                      | ISO 75-2/B    |
| Deflection Temperature Under Load Unannealed (1.80 MPa), (Flatwise) | 55.0          | °C                      | ISO 75-2/A    |
| <b>Electrical</b>                                                   |               |                         |               |
| Volume Resistivity                                                  | >1.0E+13      | ohm*m                   | IEC 62631-3-1 |
| Surface Resistivity                                                 | >1.0E+15      | ohm                     | IEC 60093     |

|                  |    |        |           |
|------------------|----|--------|-----------|
| <b>Flammable</b> |    |        |           |
| Burning Rate     |    |        |           |
| (2.00 mm)        | 70 | mm/min | FMVSS 302 |
| (2.00 mm)        | 70 | mm/min | ISO 3795  |

|                             |    |  |                      |
|-----------------------------|----|--|----------------------|
| <b>UL Information</b>       |    |  |                      |
| Flammability Classification |    |  |                      |
| (1.5 mm)                    | HB |  | IEC 60695-11-10, -20 |
| (3.0 mm)                    | HB |  | IEC 60695-11-10, -20 |

| <b>Injection Parameters</b> | <b>Nominal</b> |              |
|-----------------------------|----------------|--------------|
|                             | <b>Value</b>   | <b>Units</b> |
| Drying Time                 | 2.0 to 3.0     | hr           |
| Drying Temperature          | 80             | °C           |
| Processing (Melt) Temp      | 220 to 260     | °C           |
| Mold Temperature            | 30 to 60       | °C           |