

## Technical Data Sheet

### *Polyfort* TPP1C30HBNANAT



Polypropylene, Homopolymer

#### Product Description

*Polyfort* TPP1C30HBNANAT is a Polypropylene Homopolymer Talc, 30% filled material and is typically used in Injection Molding applications. Features include: Homopolymer.

|                      |                   |
|----------------------|-------------------|
| Processing Method    | Injection Molding |
| Attribute            | Homopolymer       |
| Forms                | Pellets           |
| Filler/Reinforcement | Talc, 30%         |

| Typical Properties                                     | Nominal Value | Units             | Test Method |
|--------------------------------------------------------|---------------|-------------------|-------------|
| <b>Physical</b>                                        |               |                   |             |
| Melt Flow Rate                                         | 16            | g/10 min          | ASTM D1238  |
| Density - Specific Gravity                             | 1.14          | g/cm <sup>3</sup> | ASTM D792   |
| <b>Mechanical</b>                                      |               |                   |             |
| Tensile Strength at Yield, (23 °C)                     | 31.7          | MPa               | ASTM D638   |
| Flexural Modulus, (23 °C, Tangent)                     | 2830          | MPa               | ASTM D790   |
| <b>Impact</b>                                          |               |                   |             |
| Gardner Impact                                         | 0.452         | J                 | ASTM D3029  |
| Notched Izod Impact, (23 °C, 3.18 mm)                  | 21            | J/m               | ASTM D256   |
| <b>Hardness</b>                                        |               |                   |             |
| Durometer Hardness, (Shore D)                          | 75            |                   | ASTM D2240  |
| <b>Thermal</b>                                         |               |                   |             |
| Deflection Temperature Under Load Unannealed (264 psi) | 71.1          | °C                | ASTM D648   |
| Deflection Temperature Under Load Unannealed (66 psi)  | 121           | °C                | ASTM D648   |

| Injection Parameters   | Nominal Value | Units |
|------------------------|---------------|-------|
| Drying Time            | 2.0 to 4.0    | hr    |
| Drying Temperature     | 82 to 104     | °C    |
| Processing (Melt) Temp | 199 to 227    | °C    |
| Front Temperature      | 177 to 221    | °C    |
| Middle Temperature     | 177 to 221    | °C    |
| Rear Temperature       | 177 to 221    | °C    |
| Injection Rate         | Moderate      |       |
| Back Pressure          | 0.138 to 2.07 | MPa   |
| Mold Temperature       | 21 to 49      | °C    |
| Cushion                | 6.35 to 12.7  | mm    |