



**Product Data Sheet &  
General Processing Conditions**

**RTP 152 HI  
Polypropylene (PP)  
Copolymer  
Flame Retardant**

The RTP 152 family of compounds are flame retarded, unreinforced polypropylene materials. They offer excellent moldability, non-corrosive characteristics and the living-hinge effect.

**PROPERTIES & AVERAGE VALUES OF INJECTION MOLDED SPECIMENS**

| <b>PERMANENCE</b>                            | <b>English</b>        | <b>SI Metric</b>     | <b>ASTM TEST</b> |
|--|-----------------------|----------------------|------------------|
| Specific Gravity                             | 0.93                  | 0.93                 | D 792            |
| Melt Flow Rate<br>@ 230 °C, / 2.16 kg        | 3.00 - 5.00 g/10 min  | 3.00 - 5.00 g/10 min | D 1238           |
| Molding Shrinkage<br>1/8 in (3.2 mm) section | 0.0150 - 0.0200 in/in | 1.50 - 2.00 %        | D 955            |
| Water Absorption, 24 hrs @ 23°C              | 0.010 %               | 0.010 %              | D 570            |

**MECHANICAL**

|  |                            |           |        |
|--|----------------------------|-----------|--------|
| Impact Strength, Izod<br>notched 1/8 in (3.2 mm) section | 12.0 ft-lbs/in             | 641 J/m   | D 256  |
| unnotched 1/8 in (3.2 mm) section                        | No Break                   | No Break  | D 4812 |
| Tensile Strength   | 2800 psi                   | 19 MPa    | D 638  |
| Tensile Elongation<br>Break                              | > 100.0 %                  | > 100.0 % | D 638  |
| Tensile Modulus  | 0.14 x 10 <sup>6</sup> psi | 965 MPa   | D 638  |
| Flexural Strength  | 3300 psi                   | 23 MPa    | D 790  |
| Flexural Modulus   | 0.12 x 10 <sup>6</sup> psi | 827 MPa   | D 790  |

**ELECTRICAL**

|                    |               |               |       |
|--------------------|---------------|---------------|-------|
| Volume Resistivity | > 1E15 ohm.cm | > 1E15 ohm.cm | D 257 |
|--------------------|---------------|---------------|-------|

**THERMAL**

|  |               |              |        |
|--|---------------|--------------|--------|
| Deflection Temperature<br>@ 264 psi (1820 kPa) | 110 °F        | 43 °C        | D 648  |
| Ignition Resistance*<br>Flammability**         | V-2 @ 1/32 in | V-2 @ 0.8 mm | D 3801 |

**PROPERTY NOTES**

Data herein is typical and not to be construed as specifications.

Unless otherwise specified, all data listed is for natural or black colored materials. Pigments can affect properties.

\* This rating is not intended to reflect hazards of this or any other material under actual fire conditions.

\*\* Values per RTP Company testing.

**GENERAL PROCESSING FOR INJECTION MOLDING**

|                    | <b>English</b>    | <b>SI Metric</b> |
|--------------------|-------------------|------------------|
| Injection Pressure | 10000 - 15000 psi | 69 - 103 MPa     |
| Melt Temperature   | 375 - 450 °F      | 191 - 232 °C     |
| Mold Temperature   | 90 - 150 °F       | 32 - 66 °C       |
| Drying             | 2 hrs @ 175 °F    | 2 hrs @ 79 °C    |