




**Product Data Sheet &
General Processing Conditions**

**RTP 1400 AG-360 M1
Polyethersulfone (PES)
Glass Fiber
UL94 V-1**



PROPERTIES & AVERAGE VALUES OF INJECTION MOLDED SPECIMENS

| PERMANENCE | English | SI Metric | ASTM TEST |
|--|-----------------------|------------------|------------------|
| Specific Gravity | 1.57 | 1.57 | D 792 |
| Molding Shrinkage 1/8 in (3.2 mm) section | 0.0015 - 0.0030 in/in | 0.15 - 0.30 % | D 955 |
| Water Absorption, 24 hrs @ 23°C | 0.400 % | 0.400 % | D 570 |

MECHANICAL

| | | | |
|--|----------------------------|-------------|--------|
| Impact Strength, Izod notched 1/8 in (3.2 mm) section | 2.0 ft-lbs/in | 107 J/m | D 256 |
| unnotched 1/8 in (3.2 mm) section | 10.5 ft-lbs/in | 561 J/m | D 4812 |
| Tensile Strength | 20000 psi | 138 MPa | D 638 |
| Tensile Elongation | 1.0 - 3.0 % | 1.0 - 3.0 % | D 638 |
| Tensile Modulus | 1.45 x 10 ⁶ psi | 9998 MPa | D 638 |
| Flexural Strength | 28000 psi | 193 MPa | D 790 |
| Flexural Modulus | 1.40 x 10 ⁶ psi | 9653 MPa | D 790 |
| Hardness Rockwell, R | 122 | 122 | D 785 |

ELECTRICAL

| | | | |
|--------------------|---------------|---------------|-------|
| Volume Resistivity | > 1E16 ohm.cm | > 1E16 ohm.cm | D 257 |
|--------------------|---------------|---------------|-------|

THERMAL

| | | | |
|--|---------------|--------------|-------|
| Deflection Temperature @ 264 psi (1820 kPa) | 390 °F | 199 °C | D 648 |
| Ignition Resistance* Flammability | V-1 @ 1/16 in | V-1 @ 1.5 mm | UL94 |

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.

GENERAL PROCESSING FOR INJECTION MOLDING

| | English | SI Metric |
|--------------------|-------------------|------------------|
| Injection Pressure | 10000 - 15000 psi | 69 - 103 MPa |
| Melt Temperature | 650 - 710 °F | 343 - 377 °C |
| Mold Temperature | 275 - 350 °F | 135 - 177 °C |
| Drying | 6 hrs @ 300 °F | 6 hrs @ 149 °C |
| Moisture Content | 0.04 % | 0.04 % |
| Dew Point | -25 °F | -32 °C |

PROCESSING NOTES

Desiccant Type Dryer Required.