



**Product Data Sheet &
General Processing Conditions**

**RTP 1203 S-65D
Ester-based Thermoplastic Polyurethane
Elastomer (TPUR/TPU)
Glass Fiber Reinforced**

PROPERTIES & AVERAGE VALUES OF INJECTION MOLDED SPECIMENS

PERMANENCE	English	SI Metric	ASTM TEST
Primary Additive	20 %	20 %	
Specific Gravity	1.36	1.36	D 792
Molding Shrinkage 1/8 in (3.2 mm) section	0.0020 in/in	0.20 %	D 955

MECHANICAL

Impact Strength, Izod notched 1/8 in (3.2 mm) section	7.7 ft-lbs/in	411 J/m	D 256
unnotched 1/8 in (3.2 mm) section	No Break	No Break	D 4812
Tensile Strength	8200 psi	57 MPa	D 638
Tensile Elongation	25.0 %	25.0 %	D 638
Tensile Modulus	0.27 x 10 ⁶ psi	1862 MPa	D 638
Flexural Strength	6600 psi	46 MPa	D 790
Flexural Modulus	0.21 x 10 ⁶ psi	1448 MPa	D 790
Hardness Shore D, instantaneous	70	70	D 2240

THERMAL

Ignition Resistance* Flammability**	HB @ 1/16 in	HB @ 1.5 mm	D 635
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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

	English	SI Metric
Injection Pressure	8000 - 12000 psi	55 - 83 MPa
Melt Temperature	380 - 430 °F	193 - 221 °C
Mold Temperature	60 - 130 °F	16 - 54 °C
Drying	6 hrs @ 190 °F	6 hrs @ 88 °C
Moisture Content	0.01 %	0.01 %
Dew Point	-30 °F	-34 °C

PROCESSING NOTES

Desiccant Type Dryer Required.

3 Apr 2018 MAB

This information is intended to be used only as a guideline for designers and processors of modified thermoplastics. Because design and processing is complex, a set solution will not solve all problems. Observation on a "trial and error" basis may be required to achieve desired results.

Data are obtained from specimens molded under carefully controlled conditions from representative samples of the compound described herein. Properties may be materially affected by molding techniques applied and by the size and shape of the item molded. No assurance can be implied that all molded articles will have the same properties as those listed.

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