

### **SECTION 1 - TYPICAL MATERIAL PROPERTIES**

<b>Physical Properties</b>	<b>Unit</b>	<b>Value</b>
Density	g/cc	7.8
Humidity Absorption	%	No information available
Tensile Strength	MPa	23.3
Tensile Elongation	%	7.57
Flexural Strength	MPa	45.5
Flexural Modulus	GPa	3500
Izod Impact Strength	kJ/m <sup>2</sup>	95.2

### **SECTION 2 - FILAMENT SPECIFICATION**

<b>Nominal Diameter</b>	<b>Diameter Tolerance</b>	<b>Ovality</b>
1.75mm	± 0.05	≥ 95%
2.85mm	± 0.05	≥ 95%
<b>Net Filament Weight</b>		<b>Metal Content</b>
1000 / 500 grams		92 - 95%

### **SECTION 3 - GUIDELINE FOR PRINT SETTINGS**

Advised Printing Temperature	205 - 235°C
Advised Build Plate Temperature	40 - 50°C
Build Plate Surface Type	Glass / PEI / G10 / Powder Coated Spring Steel
Build Plate Preparation	Glue Stick (on glass) Blue Painter's Tape (on PEI/G10) - Nothing needed for Powder Coated Spring Steel
Print Cooling	None Required
Advised Printing Speed	60mm/sec (3600mm/min)
Nooze Size/Type	0.6mm / Hardened Steel

### **SECTION 4 - ADDITIONAL INFORMATION**

**Sintering Temperature:** 1200-1400°C (2192-2552°F)

This filament is abrasive and will wear standard brass nozzles fast. The Virtual Foundry, Inc recommends a hardened steel nozzle. A Filawarmer is not required for this filament.

**DISCLAIMER:** The product and technical information provided in this datasheet is correct to the best of Rapid 3DShield's knowledge. The information given is provided as a guidance for good use, handling and processing and is not to be considered as a quality specification. The information only relates to the specific product and the material properties.