

HIGH SPEED PLA

High Speed PLA Filament

1.75 mm · 1 kg spool · ± 0.03 mm tolerance

Toughened PLA formulated for fast printing on modern high speed printers, without giving up strength or surface quality.

✓ Up to 350 mm/s

✓ Toughened PLA

✓ Low warping, no enclosure

✓ Wide colour range

Recommended Print Settings

Nozzle temperature	190–220 °C
Bed temperature	25–60 °C
Print speed	60–350 mm/s
Support material	PVA, PETG (as support interface)

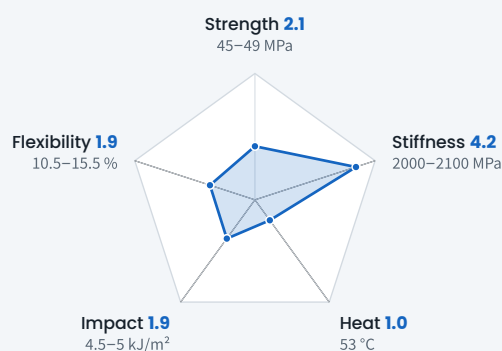
Filament Specifications

Material	High speed PLA
Diameter	1.75 mm
Diameter tolerance	± 0.03 mm
Net filament weight	1 kg

Spool & Packaging

Empty spool weight	150 g
Spool with filament	1.15 kg
Spool outer diameter	200 mm
Hub diameter	52 mm
Spool width	65 mm
Shipping weight	1.3 kg
Box dimensions	210 × 220 × 75 mm

Property Profile



Scores from 1 to 5 relative to the OzFDM filament range, based on the typical values in this sheet (stiffness and impact on a log scale).

Storage & Handling

Drying
40–45 °C for 4–6 hours in a filament dryer or food dehydrator.

Storage
Airtight bag or container with desiccant in a cool, dark and dry area to prevent moisture absorption. For optimal long term storage we recommend drying the filament prior to sealing the filament spool in a vacuum bag with desiccant.

Mechanical Properties

PROPERTY	TEST METHOD	TYPICAL VALUE
Tensile strength (X-Y)	ISO 527	45–49 MPa
Tensile strength (X-Z)	ISO 527	35–40 MPa
Elongation at break (X-Y)	ISO 527	10.5–15.5 %
Elongation at break (X-Z)	ISO 527	5–8 %
Tensile modulus (X-Y)	ISO 527	2000–2100 MPa
Tensile modulus (X-Z)	ISO 527	1950–2050 MPa
Flexural strength (X-Y)	ISO 178	70–80 MPa
Impact strength (X-Y)	ISO 180	4.5–5 kJ/m ²

Physical Properties

PROPERTY	TEST METHOD	TYPICAL VALUE
Density	ISO 1183	1.25–1.26 g/cm ³
Melt flow rate (190 °C, 2.16 kg)	ISO 1133	10–20 g/10min
Moisture absorption (23 °C, 24 h)	ISO 62	<0.3 %

Thermal Properties

PROPERTY	TEST METHOD	TYPICAL VALUE
Heat deflection temperature (0.455 MPa)	ISO 75	53 °C
Continuous use temperature	IEC 60216	50 °C

Available Colours 26

								
Black	Grey	White	Cool White	Fire Engine Red	Army Green	Blue	Neon Green	Neon Yellow
								
Neon Orange	Light Green	Natural	Rose	Orange	Cyan	Light Blue	Yellow	Light Brown
								
Light Pink	Purple	Chocolate Brown	Pink	Bone	Skin	Green	Brown	

Swatches are indicative only. Colours vary between screens and with print settings.

NOTES

Values shown are typical results measured on test specimens and are provided for guidance only. They are not guaranteed specifications and should not be used as design limits. Printed part properties vary with printer, settings, print orientation and part geometry. Test your parts for suitability before use in critical applications.