PLA EXTRAFILL

addimen
additive manufacturing
Gonvarri Industries

DESCRIPTION

Fillamentum PLA Extrafill is a material for the FFF (also known as FDM) 3D printing technology.

The advantage of this material is that it can be used in 3D printers easily, that it allows a high quality of printing even in tricky details and an excellent lamination of the printed object.

PLA filament is made of natural ingredients and is easily biodegradable by composting. It complies with the require-ments for food contact.

The material may be used for production of electrical and electronic equipment. It doesn't contain the restricted substances.
Fillamentum guarantees high precision of filament dimensions within the tolerance of +/- 0,05 mm, which is strictly controlled throughout the production.

Printing filaments reported on the marked under the trademark Fillamentum are produced in a wide variety of colours in accordance with the colour charts RAL and Pantone, and also in own unique colour ranges.
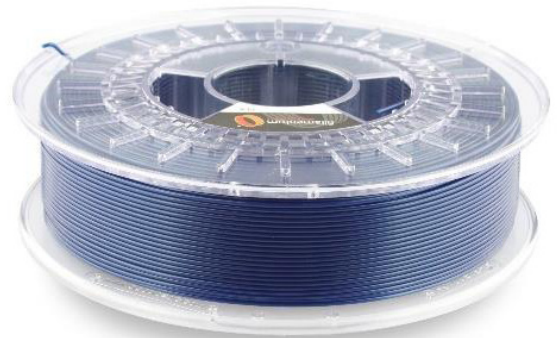
PHYSICAL PROPERTIES	TYPICAL VALUE	TEST METHOD	TEST CONDITION
Material density	1,24 g/cm3	ASTM D792	
Melt flow index	6 g/10 min	ASTM D1238	210 °C, 2,16 kg
Diameter tolerance	± 0,05 mm		
Weight	750 g of filament (+ 250 g spool)		

MECHANICAL PROPERTIES	TYPICAL VALUE	TEST METHOD	TEST CONDITION
Tensile strength	60 MPa 53 MPa	ASTM D882 ASTM D882	at yield at break
Elongation at break	6 %	ASTM D882	
Tensile modulus	3600 MPa	ASTM D882	
Flexural strength	83 MPa	ASTM D790	
Flexural modulus	3800 MPa	ASTM D790	
Izod impact strength	16 J/m	ASTM D256	23 °C, notched

THERMAL PROPERTIES	TYPICAL VALUE	TEST METHOD	TEST METHOD
Glass transition temperature	55–60 °C	ASTM D3418	
Heat distortion temperature	55 °C	ASTM E2092	0,45 MPa

PRINTING PROPERTIES	RECOMMENDED	NOTES
Print temperature	190–210 °C	Recommended settings!
Hot pad	50–60 °C	It may differ according to the printer and the object. Try your own optimization before printing.
Bed adhesive	Magigoo	