TECHNICAL DATA SHEET

VERSION 1.1 REVISION: 07/11/2022



PLA RECYCLED

It is a biodegradable and compostable filament, compatible with all printers. It is very easy to print, and has no contractions, allowing, in this way, to manufacture large pieces.

The final finish is very good and smooth, it also has a wide range of colors, these being more matte than normal PLA.









Allow for all printers

Compostable

Biodegradable

	VALUES		UNIT OF MEASUREMENT	STANDARD
PHYSICAL PROPERTIES Chemical composition	Polylactic aci	d		
Density	1.24		g/cm ³	ISO 1183
MECHANICAL PROPERTIES (1)	XY PLANE	XZ PLANE		
Tensile strength	55.5	43.8	MPa	ISO 527
Traction module	4635.7	3129.8	MPa	ISO 527
Bending strength	107	18	MPa	ISO 178
Flexural module	3189.7	2467.1	MPa	ISO 178
Elongation at maximum effort	1	1.4	%	ISO 527
Elongation by traction at break	1.1	1.4	%	ISO 527
Elongation by bending at break	5.2	1.8	%	ISO 178
Charpy Impact Force (no notch)	-	-	kJ/m ²	ISO 179
Hardness	85.4		Shore D	ISO 7619 – 1
(1) Values obtained on printed specimens, nozzle 0.4 m www.smartmaterials3d.com THERMAL PROPERTIES	m , rectilinear infill 100%, layı	er height 0.2 mm For m	nore information contact us by email at <u>info@s</u>	martmaterials.com or visit our webs
Glass transition temperature (Tg)	60		°C	ISO 11357

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VICAT B (50N 50ºC/h)	59	°C	ISO 306
HDT B (0,45 Mpa)	60	°C	ISO 75
PRINTING PROPERTIES			
Printing temperature	200 – 230	°C	
Bed temperature	40 - 60	°C	
Layer fan	100	%	
Print Speed	25 – 50	mm/s	
Material flow	100	%	
Layer height	≥ 0.2	mm	
Nozzle recommendations	≥0.4	mm	

SIZE	NET WEIGHT	GROSS WEIGHT	DIAMETER	COLOR	PACKAGING
М	750 g	1065 g	1.75 mm	Several	Cardboard box, cardboard coil, vacuum bag, desiccant.

NOTICE: The information provided in the data sheets is intended for reference only. It should not be used as design or quality control values. Actual values may differ significantly depending on printing conditions. The final performance of printed components not only depends on materials, design and printing conditions are also important.