

## ICE FILAMENTS ICE-WOOD PRODUCT CARD

ICE Filaments ICE-Wood is a modified PLA based type of filament, that smells and feels like wood. The different wood-types enable us to manufacture this wide range of natural wood-colors. The filament is tough enough for supplies on reels up to 2,3kg and prints very easy. We recommend a nozzle size 0.5mm or larger.

## **FEATURES:**

- ∞ Feels and smells like wood
- ∞ Easy to print at low temperature
- ∞ Very low warping
- ∞ Biodegradable
- $\infty$  Easily printable with ≥ 0,5 mm nozzle



## **COLOURS:**

ICE Filaments ICE-Wood is available from stock in a variety of colors. Other colors on request.



FILAMENT SPECS			
Size	Ø tolerance	Roundness	
1.75mm	± 0,05mm	≥ 95%	
2.85mm	± 0,10mm	≥ 95%	

MATERIAL PROPERTIES		
Description	Testmethod	Typical value
Specific Gravity	ASTM D1505	1,20 g/cc
MFI	-	5,0 gr/10 min
Tensile strength	ASTM D882	70MPa(MD) 100MPa(TD)
Strain at break	ASTM D882	170% (MD) 110% (TD)
E-Modulus	ASTM D882	1900Mpa(MD)
		2300Mpa(TD)
Impact Strength	-	7 kJ/m²
Printing temperature	ICE FILAMENTS	180 – 215°C*
Melting temperature	-	150 ± 10°C
Melting temperature	ASTM D3418	140 – 150°C
Vicat softening temperature	ISO 306	45°C

## **ADDITIONAL INFO:**

Due to its low tendency to warp ICE-Wood can also be printed without heated bed. If you have a heated bed, the recommended temperature is  $\pm$  35 – 60°C. We advise a nozzle  $\geq$  0.5mm. ICE-Wood can be used on most common desktop FDM or FFF technology 3D printers. Storage: Cool and dry (15 – 25°C) and away from UV Light. This enhances shelf life significantly.

<sup>\*</sup> ICE-Wood Barnyard Brown, Bwana Black and Grasshopper Green can be printed up to temperatures  $\sim 205^{\circ}$ C maximum at 35 – 45 mm/s. ICE-Wood Original Oak and Marvelous Maple can be printed at higher temperatures up to  $\sim 215^{\circ}$ C maximum at 35 – 45mm/s. For more details, contact ICE Filaments.