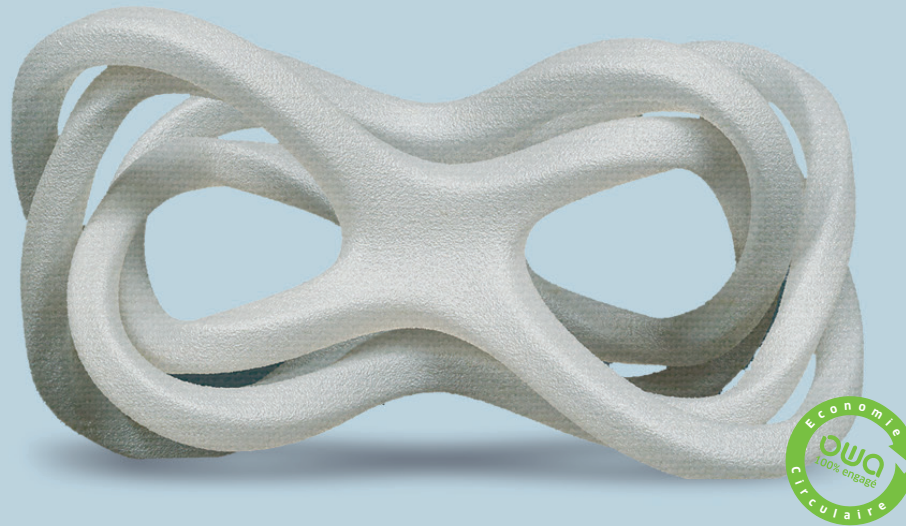




PLA-HI OWA



PLA-HI OWA is reinforced with impact modifier. It has 4 times higher impact resistance than PLA-S OWA

| EASY TO PRINT | SHINY APPEARANCE

| BRIGHT COLORS | BIOSOURCED

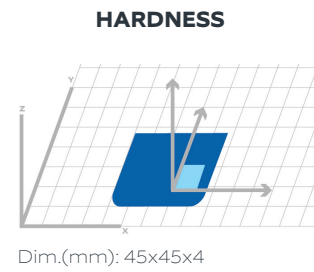
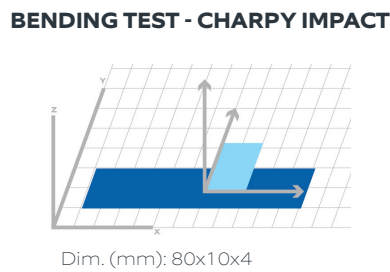
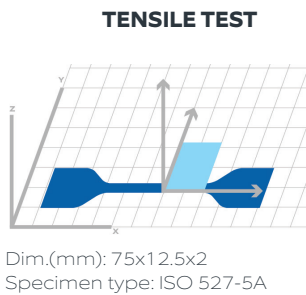
FILAMENT PROPERTIES

| DESCRIPTION | TEST METHODS | UNITS | VALUES |
|---|---|-------------------|------------|
| Diameter | INS-6712 | mm | 1.75 ± 0.1 |
| | | | 2.85 ± 0.1 |
| Density | ISO 1183-1 | g/cm ³ | 1.210 |
| Moisture rate | INS-6711 | % | < 10,000 |
| Melt Flow Index (MFI) (@210°C – 2,16 kg) | ISO 1133-1 | g/10min | 5.7 |
| Glass transition temperature T _g | ISO 11357-1 DSC (10°C/min – 20 à 220°C) | °C | 60 |
| Melting temperature T _m | ISO 11357-1 DSC (10°C/min – 20 à 220°C) | °C | 155 |

PRINT PARAMETERS AND SPECIMENS DIMENSIONS

| | |
|------------------------------|--------------------|
| PRINTING DIRECTION | XY |
| PRINTING SPEED | 50 mm/s |
| INFILL | 100% - rectilinear |
| INFILL ANGLE | 45°/-45° |
| EXTRUSION TEMPERATURE | 200°C |
| BED TEMPERATURE | 60°C |

RESULTS



PRINTED SPECIMENS PROPERTIES

| | PROPERTIES | TEST METHODS | UNITS | VALUES |
|----------------------|---|--------------|-------------------|--------|
| TENSILE TEST | Tensile modulus | ISO 527 | MPa | 2,491 |
| | Strength | ISO 527 | MPa | 43.0 |
| | Strain at Strength | ISO 527 | % | 2.0 |
| | Stress at break | ISO 527 | MPa | 22.9 |
| | Strain at break | ISO 527 | % | 4.2 |
| BENDING TEST | Flexural modulus | ISO 178 | MPa | 2,097 |
| | Flexural stress at conventional deflection (3,5% strain)* | ISO 178 | MPa | 62.8 |
| | Flexural strain at flexural strength | ISO 178 | % | 4.0* |
| CHARPY IMPACT | Charpy impact resistance | ISO 179 | kJ/m ² | 16.5 |
| HARDNESS | Shore Hardness | ISO 868 | Shore D | 76.8 |

*According to ISO 178, end of the test at 5% deformation even if there is no specimen break