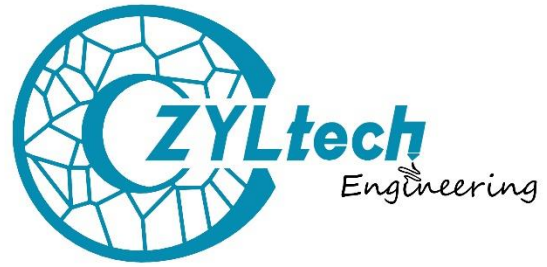


ABS Filament

Technical Data Sheet



Product Description

ZYLtech ABS filament is designed for precision and reliability, making it an excellent choice for a wide range of 3D printing applications. Renowned for its high impact resistance, low odor, and exceptional flow rate, ZYLtech ABS delivers consistent performance to meet the demands of professionals and hobbyists alike.

Each spool is manufactured using premium virgin ABS resin sourced directly from a highly reputable resin manufacturer. Our stringent quality assurance ensures that every spool is traceable to its specific batch, maintaining the highest standards of material integrity and consistency.

Produced in our state-of-the-art extrusion facility located in Houston Texas, ZYLtech ABS filament undergoes meticulous testing for quality and reliability. By combining top-quality, U.S.-sourced raw materials with advanced manufacturing technology, we ensure reliable results with every spool, providing customers with the confidence they need for their 3D printing projects.

Filament Specifications

Parameter	Value
Filament Diameter	1.75 mm
O. D. Tolerance	± 0.01 (99% Probability) ± 0.02 (100% Probability)
Ovality	< 0.02 mm
Net Filament Weight	1 kg

Spool Specifications

Parameter	Value
Spool Diameter	198 mm
Spool Height	60 mm
Hole Diameter	58 mm
Spool Material	ABS
Spool Heat deflection temperature	70 °C
Spool Weight	150 g

Recommended Printer Setting

Parameter	Value
Bed temperature	90 – 110 °C for PEI build plate
Nozzle temperature	230 – 280 °C
Chamber temperature	40 – 60 °C
Print speed	up to 400 mm/s
Maximum flow rate	15 – 22 mm ³ /s
Part cooling fan	Minimal
Drying recommendation	65 – 70 °C 24Hr in filament dryer

Typical Properties

Physical Property	Value	Test Method
Density	1.04 g/cm ³	ISO 1183
Thermal Property	Value	Test Method
Melting temperature	200 – 210 °C	ISO 11357
Heat deflection temperature , 1.8 MPA, unannealed	85 – 86 °C	ISO 75
Heat deflection temperature , 1.8 MPA, annealed	95 – 100 °C	ISO 75
Mechanical Property	Value	Test Method
Young's modulus	2050 – 2400 MPa	ISO 527
Tensile Strength at break	36 – 43 Mpa	ISO 527
Breaking elongation	8 – 10 %	ISO 527
Flexural modulus	2200 – 2480 Mpa	ISO 178
Izod impact strength, Notched (23 °C)	25 – 30 KJ/m ²	ISO 180

Disclaimer:

The information included in this document is for reference purposes only. Testing results may vary between colors and batches. Printing conditions also greatly affect the testing results. It is the user's responsibility to determine whether the filament and the information in this document are appropriate for any specific application. Zyltech Engineering LLC assumes no obligation or liability for the information in this document.

For additional information, please contact Zyltech Engineering LLC customer support email csr@zyltech.com.