

TECHNICAL DATA SHEET Inslogic PC-ABS Filament



Inslogic PC-ABS is a high-performance material that combines the heat resistance of PC with the flexural strength of ABS. It withstands temperatures up to 103 °C and offers exceptional impact resistance. It provides fine detail and excellent surface quality, making it ideal for functional prototypes, tooling, and demanding applications in automotive, electronics, and more.

Key Features

- Ideal for end-use parts
- High-durability prototypes
- Functional mechanical parts
- Easier to print than most industrial-grade materials

Applications

- Automotive: Accessory mounts, handles, hooks
- Electronics: Adapters, chargers
- Functional prototyping
- Tooling and gears



Specifications

Material Name	Inslogic PC-ABS
Diameter	1.75 ± 0.03 mm
Net Filament Weight	1 kg

Recommended Print Settings

Drying Settings	70 °C for 12h; 80 °C for 6h
Nozzle Size	0.4, 0.6 mm
Nozzle Temperature & Printing Speed	260-280 °C at 50-230 mm/s
Bed Temperature	100 - 110 °C
Cooling Fan Speed	Off
Bed Type	Textured PEI Sheet

Physical Properties

Property	Method	Metric
Density	ISO 1183	1.08 g/cm ³
Glass Transition Temperature, 10 °C/min	ISO 11375-3	106 °C
Heat Deflection Temperature at 0.45 MPa	ISO 75	103 °C



Mechanical Properties

Property	Method	Metric
Tensile Strength	ISO 527/2	42 MPa
Elongation at Break	ISO 527/2	8.6%
Flexural Strength	ISO 178	72 MPa
Flexural Modulus	ISO 178	2334 MPa
Izod Impact, Notched	ISO 180	70 KJ/m ²



3, 13/F, Grand City Plaza
1-17 Sai Lau Kok Road
Tsuen Wan, New Territories
Hong Kong

Contact

WhatsApp: (852) 6268 5255
Sales: sales@inslogic3d.com
Support: support@inslogic3d.com

Disclaimer:

To the best of our knowledge, the information contained herein is accurate. However, Inslogic, Inc. makes no warranty, expressed or implied, regarding the accuracy of these results to be obtained from the use thereof. The results presented in this data sheet are just for your information and comparison. They should not be used for project specifications or its quality evaluation. In view of the many factors that may affect the processing and application of our product, these data do not relieve processors from carrying out their own investigations and tests; neither do these data imply any guarantee of certain properties, nor the suitability of the product for a specific purpose.

Each user is responsible for determining the safety, lawfulness, technical suitability, and disposal/recycling practices of Inslogic materials for the intended application. Inslogic makes no warranty of any kind unless announced separately, to the fitness for any particular use or application. Inslogic shall not be made liable for any damage, injury, or loss induced from the use of Inslogic materials in any particular application. Before using Inslogic material read properly all the details in the available safety data sheet (SDS).