

Description:

The implantable PEEK shapes and film products produced by Genesis are extruded from implantable PEEK resin that meets or exceeds requirements of the latest version of ASTM F2026. The PEEK resin is produced in a cGMP clean room setting and in accordance with ISO 10993.

Genesis PEEK semi-finished shapes and film also comply with the most current version of the ASTM F2026 Standard Specification.

Typical Applications – Implantable PEEK:

- Spinal fusion cages
- Spinal rods
- Suture anchors
- Cardiovascular implants
- Joint replacements
- CMF surgical applications
- Dental implants
- Intramedullary implants

Implantable PEEK Resin Properties*

PHYSICAL PROPERTIES	TYPICAL VALUES	ASTM F2026-17
Tensile Strength	100 MPa at yield 83 MPa at break	90 MPa 70 MPa
Tensile Elongation	7%	5%
Flexural Strength	145 MPa	110 MPa
Flexural Modulus	3.5 GPa	3.0 GPa
Impact Strength	80 J/m	50 J/m
Density	1.3 g/cc	1.28 - 1.32 g/cc
THERMAL PROPERTIES		
Melt Temp./ T_m	338° C	320 - 360°C
Recrystallization Temp., T_c	288°C	260 - 320°C
Recrystallization Temp., T_g	150°C	125 - 165°C

*Typical properties data are derived from standard ASTM test specimens tested under laboratory conditions. They do not represent or indicate suitability for use in any application. It is the sole responsibility of the user to determine whether any material is suitable for an actual application. This requires a thorough evaluation of materials by the user relative to actual application performance and regulatory requirements to validate suitability for devices or device components.