

# Mosaic PEEK

## Technical Data Sheet

Compatible with Element, Element HT & Array



## Description

Mosaic PEEK is a thermoplastic engineering-grade material with exceptional strength, durability and low flammability, making it ideal for various industries, including automotive, aerospace, medicine, and dentistry.

### Key Features

- ✓ Fatigue Resistant
- ✓ Durable
- ✓ Autoclavable
- ✓ High Chemical Resistance
- ✓ High Thermal Resistance

### Sample Applications

- ✓ Medical Tools
- ✓ Wire Protections/Shieldings
- ✓ Aerospace Components
- ✓ Dental Instruments
- ✓ Mechanical Parts

## Available Colours



Natural

## Filament Specifications

Diameter	Tolerance
1.75 mm	+/- 0.05 mm

## Printing Guidelines

<b>Slicer Profile</b>	Coming soon to canvas3d.io
<b>Nozzle Temperature</b>	400°C
<b>Heated Chamber</b>	Required
<b>Build Surface</b>	Element Bed Type II with glue stick
<b>Special Considerations</b>	Mosaic PEEK can be challenging to print and requires tuning based on part geometry

**Note:** For best results, parts should only be printed one at a time. If more parts are printed at once, the interlayer adhesion becomes significantly weaker.

## Storage/Handling Considerations

<b>Hygroscopicity</b>	High
<b>Drying Temperature</b>	120°C
<b>Drying Time</b>	4 Hours

**Note:** When not in use, spool should be stored in a Mosaic Material Pod or inside a vacuum sealed container.

## Material Properties

<b>Property</b>	<b>Standard</b>	<b>Typical Value</b>
Density	ISO 1183	1.3 g/cc
Tensile Strength, Break	ISO 527	92.23 MPa
Tensile Modulus	ISO 527	3654 MPa
Elongation at Break	ISO 527	11.5%
Heat Deflection Temp.	ISO 75 0.45MPa	138.1°C

## Multi-Material Compatibility

### Automation

Same-material Automated Changeover	With Material Pod
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### Supports

Same-material support	Yes
Compatible Soluble Materials	None
Compatible Breakaway Materials	None