

POLYMER SOLUTIONS

PA 2220 HighReuse

Material Data Sheet

PA 2220 HIGHREUSE

Product Description

EOS PA 2220 HighReuse is a highly efficient polyamide 12 material serving a broad variety of applications thanks to its balanced property profile.

With a reusability rate of 70% and a reduced powder carbon footprint, EOS PA 2220 HighReuse enables printing of leading quality production parts on the EOS P3 Next at competitive costs.

MAIN CHARACTERISTICS

- Highly efficient PA12
- Balanced property profile
- White multipurpose material
- Easy to color with state-of-the-art solutions

TYPICAL APPLICATIONS

- Eyewear in the consumer goods industry
- Structural components, e.g., brackets
- Production equipment like grippers, jigs and fixtures
- Spare parts like covers, e.g., in the automotive industry
- Functional parts for prototyping incl. integrated hinges or threads

MECHANICAL PROPERTIES	DRY / CONDITIONED	UNIT	TEST STANDARD	DRY / CONDITIONED	UNIT	TEST STANDARD
Tensile Modulus			ISO 527-1/-2	-	-	-
X Orientation	1800 / 1500	MPa				
Y Orientation	1800 / 1500	MPa				
Z Orientation	1800 / 1300	MPa				
Tensile Strength			ISO 527-1/-2	-	-	-
X Orientation	48 / 45	MPa				
Y Orientation	48 / 45	MPa				
Z Orientation	48 / 42	MPa				
Nominal Strain at Break			ISO 527-1/-2	-	-	-
X Orientation	10 / 14	%				
Y Orientation	9 / 15	%				
Z Orientation	8 / 12	%				
Charpy Impact Strength (+23°C)			ISO 179/1eU	-	-	-
X Orientation	24 / -	kJ/m ²				
Y Orientation	23 / -	kJ/m ²				
Z Orientation	19 / -	kJ/m ²				
Charpy Impact Strength (-30°C)			ISO 179/1eU	-	-	-
Z Orientation	18 / -	kJ/m ²				
Charpy Notched Impact Strength (+23°C)			ISO 179/1eA	-	-	-
X Orientation	2,6 / -	kJ/m ²				
Y Orientation	2,3 / -	kJ/m ²				
Z Orientation	2,5 / -	kJ/m ²				
Charpy Notched Impact Strength (-30°C)			ISO 179/1eA	-	-	-
Z Orientation	2,1 / -	kJ/m ²				
Shore D Hardness			ISO 7619-1	-	-	-
X Orientation	79 / -	-				

THERMAL PROPERTIES	DRY / CONDITIONED	UNIT	TEST STANDARD	DRY / CONDITIONED	UNIT	TEST STANDARD
Melting Temperature	176,5	°C	ISO 11357-1/-3	-	-	-
Temperature of Deflection under Load 1.			ISO 75-1/-2	-	-	-
X Orientation	64	°C				
Z Orientation	57	°C				

OTHER PROPERTIES	VALUE	UNIT	TEST STANDARD	VALUE	UNIT	TEST STANDARD
Density	0.99	g/cm ³	DIN EN ISO 1183	-	-	-
Powder Color	white	-	-	-	-	-
Components Color	white	-	-	-	-	-

HEADQUARTERS

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Status as of 11.06.2026. Subject to technical modifications. EOS is certified according to ISO 9001.

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