

Xerox® ElemX™ 3D Printer

Additive manufacturing for a more flexible resilient supply chain.

MATERIAL DATA SHEET

Tensile Properties: A356/4008 – T6 Condition (ElemX printed properties)

Tested Per ASTM E8, machined from printed block	XYZ Orientation	ZYX Orientation
Ultimate Tensile Strength (ksi/Mpa)	42 / 289	39 / 269
Yield Strength (ksi/Mpa)	26 / 179	26 / 179
Elongation at Break (%)	12	8
Tensile Modulus (msi/Gpa)	11 / 1.6	11 / 1.6

T6 CONDITION SCHEDULE

Solution Treatment:

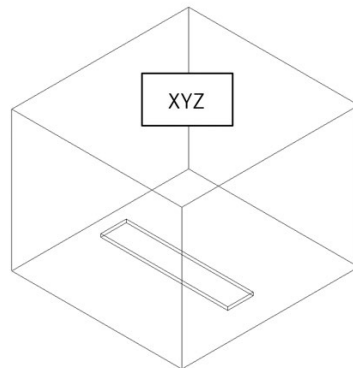
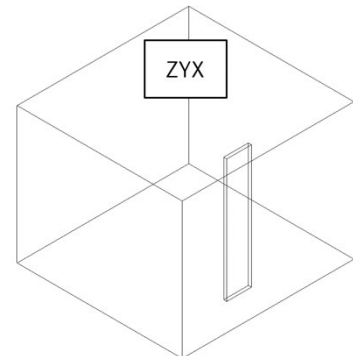
538°C ± 6°C (1000°F ± 10°F) for 4 hours + 30/-0 minutes. Allow for additional soak time of 30 minutes per 13mm (0.5 inch) of section thickness over 25mm (1 inch)

Quench:

Quench using 20-27°C (68°F - 80°F) water within 10 seconds of furnace door opening.

Aging Cycle:

Within 1 hour of quenching, age at 154°C (310°F) for 3 hours +15/-0 minutes. Allow for additional soak time of 30 minutes per 13mm (0.5 in) of section thickness over 25mm (1 in).



For more information visit: www.xerox.com/3DPrinting