

Digital ABS | POLYJET DIGITAL PHOTOPOLYMER

Digital ABS™ (RGD5131-DM) is designed to simulate standard ABS plastics by combining high-temperature resistance with toughness. Digital ABS delivers those properties plus superior rigidity and toughness in walls thinner than 1.2 mm (.047 in.). This material is suitable for parts that require PolyJet technology's highest possible impact resistance and shock absorption

MECHANICAL PROPERTIES	TEST METHOD	IMPERIAL	METRIC
Tensile Strength	D-638-03	8,000 - 8,700 psi	55 - 60 MPa
Elongation at Break	D-638-05	25 - 40%	25 - 40%
Modulus of Elasticity	D-638-04	375,000 - 435,000 psi	2,600 - 3,000 MPa
Flexural Strength	D-790-03	9,500 - 1,000 psi	65 - 75 MPa
Flexural Modulus	D-790-04	245,000 - 320,000 psi	1,700 - 2,200 MPa
Izod Notched Impact	D-256-06	1.22 - 1.50 ft lb/inch	65 - 80 J/m

THERMAL PROPERTIES	TEST METHOD	IMPERIAL	METRIC
Heat Deflection (HDT) @ 0.45 MPa	D-648-06	136 - 154 °F	58 - 68 °C
Heat Deflection (HDT) @ 1.82 MPa	D-648-07	180 - 203 °F	82 - 95 °C
Glass Transition (Tg)	DMA, E	124 - 131 °F	51 - 55 °C

OTHER	TEST METHOD	IMPERIAL	METRIC
Shore Hardness	Scale D	85 - 87 Scale D	85 - 87 Scale D
Rockwell Hardness	Scale M	67 - 69 Scale M	67 - 69 Scale M
Polymerized Density	ASTM D792	-	1.17 - 1.18 g/cm ³

