CYCOLAC™ RESIN MG94F

REGION EUROPE

DESCRIPTION

Superior flow, injection molding ABS. Good impact. For thin-wall applications. FDA compliant.

TYPICAL PROPERTY VALUES

Revision 20190925

PROPERTIES	TYPICAL VALUES	UNITS	TEST METHODS
MECHANICAL			
Tensile Stress, yield, 5 mm/min	40	MPa	ISO 527
Tensile Stress, break, 5 mm/min	35	MPa	ISO 527
Tensile Stress, yield, 50 mm/min	45	MPa	ISO 527
Tensile Stress, break, 50 mm/min	35	MPa	ISO 527
Tensile Strain, yield, 5 mm/min	2	%	ISO 527
Tensile Strain, break, 5 mm/min	35	%	ISO 527
Tensile Strain, yield, 50 mm/min	2.2	%	ISO 527
Tensile Strain, break, 50 mm/min	45	%	ISO 527
Tensile Modulus, 1 mm/min	2400	MPa	ISO 527
Flexural Stress, yield, 2 mm/min	65	MPa	ISO 178
Flexural Modulus, 2 mm/min	2450	MPa	ISO 178
Ball Indentation Hardness, H358/30	95	MPa	ISO 2039-1
Hardness, Rockwell R	129	-	ISO 2039-2
IMPACT			
Izod Impact, notched 80*10*4 +23°C	18	kJ/m²	ISO 180/1A
Izod Impact, notched 80*10*4 -30°C	7	kJ/m²	ISO 180/1A
Charpy 23°C, V-notch Edgew 80*10*4 sp=62mm	23	kJ/m²	ISO 179/1eA
Charpy -30°C, V-notch Edgew 80*10*4 sp=62mm	10	kJ/m²	ISO 179/1eA
THERMAL			
CTE, 23°C to 60°C, flow	8.7E-05	1/°C	ISO 11359-2
CTE, 23°C to 60°C, xflow	8.7E-05	1/°C	ISO 11359-2
Vicat Softening Temp, Rate B/50	99	°C	ISO 306
Vicat Softening Temp, Rate B/120	100	°C	ISO 306
HDT/Be, 0.45MPa Edgew 120*10*4 sp=100mm	91	°C	ISO 75/Be
HDT/Ae, 1.8 MPa Edgew 120*10*4 sp=100mm	80	°C	ISO 75/Ae
PHYSICAL			
Mold Shrinkage on Tensile Bar, flow	0.5 – 0.7	%	SABIC method
Density	1.04	g/cm³	ISO 1183
Moisture Absorption (23°C / 50% RH)	0.16	%	ISO 62
Melt Volume Rate, MVR at 220°C/10.0 kg	39	cm³/10 min	ISO 1133
Melt Flow Rate, 230°C/3.8 kg	11.7	g/10 min	ASTM D 1238
Melt Flow Rate, 220°C/5.0 kg	12	g/10 min	ISO 1133
FLAME CHARACTERISTICS			
UL Yellow Card Link	E45329-102071280	-	-

PROPERTIES	TYPICAL VALUES	UNITS	TEST METHODS
Glow Wire Flammability Index 650°C, passes at	3.2	mm	IEC 60695-2-12
INJECTION MOLDING			
Drying Temperature	85 – 95	°C	
Drying Time	2 – 4	hrs	
Maximum Moisture Content	0.1	%	
Melt Temperature	220 – 260	°C	
Nozzle Temperature	210 – 250	°C	
Front - Zone 3 Temperature	220 – 260	°C	
Middle - Zone 2 Temperature	220 – 260	°C	
Rear - Zone 1 Temperature	200 – 240	°C	
Hopper Temperature	60 – 80	°C	
Mold Temperature	40 – 80	°C	

DISCLAIMER