

Product Data Sheet

Nemcon™ H PC DP120/X2

Nemcon™ H-series products are designed for use in high performance electronic assemblies where heat removal is critical to system performance. Nemcon™ H ES DP110/X3 is a natural, thermally conductive polycarbonate, combining good thermal conductivity with improved HDT and processability relative to conventional polycarbonate compounds.

Typical Applications

- Housings for power components.
- Encapsulation/housings for bobbins, actuators, and coils.
- IC thermal management components, such as heat sinks, heat spreaders, or heat pipes.
- LED lighting assemblies.

Properties*	Standard	Unit	Typical Value
Physical			
Specific Gravity	D 792	-	1.6
Mechanical			
Tensile Stress @ brk, 50 mm/min	D 638	MPa.	45
Tensile Modulus, 50 mm/min	D 638	MPa.	3100
Flexural Stress @ brk, 1.3 mm/min, 50 mm span	D 790	MPa.	75
Flexural Modulus, 1.3 mm/min, 50 mm span	D 790	MPa.	6000
Izod Impact, notched @ 23°C	D 256	ft-lb/in.	0.5
Thermal			
HDT @ 264 psi, 3.2 mm, unannealed	D 648	°C	130
Conductivity			
Thermal Conductivity- In-Plane	E 1461	W/mK	6.2
Thermal Conductivity- Thru-Plane	E 1461	W/mK	2.2
Electrical - Surface Resistivity	D 257	Ohms/sq.	8.0E+12

*All properties are measured after 48 hours of conditioning at 23°C and 50% relative humidity. All samples are prepared according to ASTM standards. Variations within normal tolerances are possible for various types of colors and functional properties like UV resistance.

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