



## LNP™ THERMOCOMP™ Compound EC006AQW

### Americas: COMMERCIAL

Also known as: LNP™ THERMOCOMP™ Compound EC006AQW

Product reorder name: EC006AQW

LNP\* THERMOCOMP\* EC006AQW is a compound based on Polyetherimide resin containing Carbon Fiber. Added features of this material include:  
Electrically Conductive.

TYPICAL PROPERTIES <sup>1</sup>	TYPICAL VALUE	Unit	Standard
<b>MECHANICAL</b>			
Tensile Stress, brk, Type I, 5 mm/min	2600	kgf/cm <sup>2</sup>	ASTM D 638
Tensile Strain, brk, Type I, 5 mm/min	1.4	%	ASTM D 638
Tensile Modulus, 5 mm/min	297900	kgf/cm <sup>2</sup>	ASTM D 638
Flexural Stress, brk, 1.3 mm/min, 50 mm span	3570	kgf/cm <sup>2</sup>	ASTM D 790
Flexural Modulus, 1.3 mm/min, 50 mm span	226300	kgf/cm <sup>2</sup>	ASTM D 790
Tensile Stress, break, 5 mm/min	257	MPa	ISO 527
Tensile Strain, break, 5 mm/min	1.4	%	ISO 527
Tensile Modulus, 1 mm/min	27540	MPa	ISO 527
Flexural Stress	350	MPa	ISO 178
Flexural Modulus, 2 mm/min	23280	MPa	ISO 178
Compressive Strength	234	MPa	SABIC Method
<b>IMPACT</b>			
Izod Impact, unnotched, 23°C	59	cm-kgf/cm	ASTM D 4812
Izod Impact, notched, 23°C	8	cm-kgf/cm	ASTM D 256
Izod Impact, unnotched 80*10*4 +23°C	32	kJ/m <sup>2</sup>	ISO 180/1U
Izod Impact, notched 80*10*4 +23°C	7	kJ/m <sup>2</sup>	ISO 180/1A
<b>THERMAL</b>			
HDT, 1.82 MPa, 3.2mm, unannealed	198	°C	ASTM D 648
HDT/Af, 1.8 MPa Flatw 80*10*4 sp=64mm	198	°C	ISO 75/Af
<b>PHYSICAL</b>			
Specific Gravity	1.39	-	ASTM D 792
Mold Shrinkage, flow, 24 hrs (5)	0.03 - 0.1	%	ASTM D 955
Mold Shrinkage, xflow, 24 hrs (5)	0.1 - 0.6	%	ASTM D 955
Melt Flow Rate, 380°C/6.7 kgf	10	g/10 min	ASTM D 1238

(1) Typical values only. Variations within normal tolerances are possible for various colors. All values are measured after at least 48 hours storage at 23°C/50% relative humidity. All properties, except the melt volume and melt flow rates, are measured on injection molded samples. All samples tested under ISO test standards are prepared according to ISO 294.

(2) Only typical data for selection purposes. Not to be used for part or tool design.  
(3) This rating is not intended to reflect hazards presented by this or any other material under actual fire conditions.  
(4) Internal measurements according to UL standards.  
(5) Measurements made from laboratory test coupon. Actual shrinkage may vary outside of range due to differences in processing conditions, equipment, part geometry and tool design. It is recommended that mold shrinkage studies be performed with surrogate or legacy tooling prior to cutting tools for new molded article.  
(6) Needs hard coat to consistently pass 60 sec Vertical Burn.

Source GMD, last updated:

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PROCESSING PARAMETERS	TYPICAL VALUE	Unit
<b>Injection Molding</b>		
Drying Temperature	120 - 150	°C
Drying Time	4	hrs
Maximum Moisture Content	0.02	%
Melt Temperature	380 - 400	°C
Front - Zone 3 Temperature	380 - 400	°C
Middle - Zone 2 Temperature	380 - 400	°C
Rear - Zone 1 Temperature	380 - 400	°C
Mold Temperature	165 - 180	°C
Back Pressure	0.3 - 0.7	MPa
Screw Speed	50 - 100	rpm

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