

ISO Property | LOTTE Advanced Materials

INFINO	Grade	HN-3104
	Resin Type	PC/GF

Flame Retardant, Wiring Devices, Smart Meter - UV resistance : dE < 1.0 for Light Grey color [UV-A (350nm), 0.68W/m², 60°C, 8hrs -> Darkness, 50°C, 4hrs, 6cycle]

Item	Measuring Method	Condition	Unit	Value
Physical				
Specific Gravity	ISO 1183	Natural or representative color	-	1.28
Melt Flow Index	ISO 1133	250°C, 10kg	g/10min	12.5
Melt Flow Index	ISO 1133	260°C, 5kg	g/10min	8.0
Mold Shrinkage(MD)	ISO 2577	Flow at 3.2mm(MD)	%	0.3-0.6
Mold Shrinkage(TD)	ISO 2577	X-Flow at 3.2mm(TD)	%	0.3-0.6
ASH Content	ISO 3451	-	%	10.5
Mechanical				
Tensile Strength at Yield	ISO 527	5mm/min	MPa	60
Tensile Strain at break	ISO 527	5mm/min	%	6.0
Tensile Modulus	ISO 527	5mm/min	MPa	3500
Tensile Strength at break	ISO 527	5mm/min	MPa	60
Flexural Strength	ISO 178	2mm/min	MPa	90
Flexural Modulus	ISO 178	2mm/min	MPa	3500
Izod Impact Strength (notched)	ISO 180 1A	at 23°C, 4mm	KJ/m ²	10
Charpy Impact Strength (V-notched)	ISO 179 1eA	at 23°C, 4mm	KJ/m ²	10
Rockwell Hardness	ISO 2039-2	R-scale	-	115
Thermal				
Heat Deflection Temperature(Unannealed)	ISO 75-2	1.8MPa, 4.0mm	°C	137
Heat Deflection Temperature(Unannealed)	ISO 75-2	0.45MPa, 4.0mm	°C	136
VICAT Softening Temperature	ISO R 306	B/50	°C	135
Flammability				
Flammability	UL94	V-0	mm	1.5, 3.0
Glow-Wire Flammability Index	IEC 60695-2-12	1.5mm	°C	960
Electric				
Comparative Tracking Index	IEC 60112	-	PLC	3

1. The value above is the representative value of the NP or representative color and may have deviation. It can only be used for selecting materials.
2. The value above shall not be regarded as a material specification and cannot be used for molding designs.

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※ The last update date : 06/20/2016

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UL Certification | LOTTE Advanced Materials

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Component - Plastics [\[guide info\]](#)

E115797

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HN-3104(+)(f1)(M)

Polycarbonate (PC), glass reinforced, "INFINO", furnished as pellets

Color	Min Thk (mm)	Flame Class	HWI	HAI	RTI Elec	RTI Imp	RTI Str
ALL	1.5	V-0	0	1	80	80	80
	3.0	V-0, 5VA	0	0	80	80	80

Comparative Tracking Index (CTI): 3

Dielectric Strength (kV/mm): 23

High-Voltage Arc Tracking Rate (HVTR): 4

Dimensional Stability (%): -

Inclined Plane Tracking (IPT): -

Volume Resistivity (10⁸ ohm-cm): 11

High Volt, Low Current Arc Resis (D495): 7

(+) - May be replaced by one, two, or three numbers and/or letter(s)

(M) - IEC CTI Solution B: CTI 125M

(f1) - Suitable for outdoor use with respect to exposure to Ultraviolet Light, Water Exposure and Immersion in accordance with UL 746C.

ANSI/UL 94 small-scale test data does not pertain to building materials, furnishings and related contents. ANSI/UL 94 small-scale test data is intended solely for determining the flammability of plastic materials used in the components and parts of end-product devices and appliances, where the acceptability of the combination is determined by UL.

Report Date: 2011-04-08

Last Revised: 2012-01-18

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IEC and ISO Test Methods

Test Name	Test Method	Units	Thk (mm)	Value
Flammability	IEC 60695-11-10, IEC 60695-11-20	Class (color)	1.5	V-0 (ALL)
			3.0	V-0, 5VA (ALL)
Glow-Wire Flammability (GWFI)	IEC 60695-2-12	C	1.5	960
			3.0	960
Glow-Wire Ignition (GWIT)	IEC 60695-2-13	C	1.5	850
			3.0	875
IEC Comparative Tracking Index	IEC 60112	Volts (Max)	3.0	CTI175
IEC Ball Pressure	IEC 60695-10-2	C	-	-
ISO Heat Deflection (1.80 MPa)	ISO 75-2	C	-	-
ISO Tensile Strength	ISO 527-2	MPa	-	-
ISO Flexural Strength	ISO 178	MPa	-	-
ISO Tensile Impact	ISO 8256	kJ/m ²	-	-
ISO Izod Impact	ISO 180	kJ/m ²	-	-
ISO Charpy Impact	ISO 179-2	kJ/m ²	-	-