

**LUVOCOM® LFT 14-50542CF10NT**

LEHOSS Group - Polyamide 410

## General Information

**Product Description**

with carbon fibers; natural color

## Main Features

- Low influence from moisture and temperature on dimensional stability and electrical properties, compared with PA66.
- Strong, stiff parts.

**General**

Material Status	• Commercial: Active		
Availability	• Africa & Middle East	• Europe	• North America
	• Asia Pacific	• Latin America	
Filler / Reinforcement	• Carbon Fiber		
Features	• Good Dimensional Stability	• Good Heat Resistance	• High Strength
	• Good Electrical Properties	• High Stiffness	• Low Moisture Absorption
Appearance	• Natural Color		

 Properties <sup>1</sup>

Physical	Nominal Value	Unit	Test Method
Density	1.29	g/cm <sup>3</sup>	ISO 1183
Water Absorption (24 hr, 73°F)	< 1.0	%	ISO 62
Mechanical	Nominal Value	Unit	Test Method
Tensile Modulus	4.79E+6	psi	ISO 527-1/1
Tensile Stress	49300	psi	ISO 527-2
Tensile Strain (Yield)	1.3	%	ISO 527-2/50
Flexural Modulus <sup>2</sup>	3.77E+6	psi	ISO 178
Flexural Stress <sup>3</sup>	66700	psi	ISO 178
Flexural Strain - (Yield) <sup>4</sup>	2.0	%	ISO 178
Impact	Nominal Value	Unit	Test Method
Charpy Notched Impact Strength			ISO 179/1eA
--	9.0	ft·lb/in <sup>2</sup>	
-22°F	9.0	ft·lb/in <sup>2</sup>	
Charpy Unnotched Impact Strength			ISO 179/1eU
--	36	ft·lb/in <sup>2</sup>	
-22°F	31	ft·lb/in <sup>2</sup>	
Thermal	Nominal Value	Unit	Test Method
Deflection Temperature Under Load (264 psi, Unannealed)	482	°F	ISO 75-2/A
Continuous Use Temperature <sup>5</sup>	302	°F	IEC 60216
Service Temperature - during lifetime max. 200 hr	347	°F	
Electrical	Nominal Value	Unit	Test Method
Surface Resistivity	< 1.0E+2	ohms	IEC 62631-3-2
Insulation Resistance <sup>6</sup>	< 1.0E+2	ohms	IEC 62631-3-3

## Processing Information

Injection	Nominal Value	Unit
Drying Temperature - Desiccant Dryer, A	176	°F
Drying Time - Desiccant Dryer, A	2.0 to 8.0	hr
Rear Temperature	482 to 518	°F
Middle Temperature	500 to 536	°F
Front Temperature	500 to 536	°F



Nozzle Temperature	509 to 545 °F
Processing (Melt) Temp	536 °F
Mold Temperature	212 to 284 °F

#### Injection Notes

During processing, the moisture level should not exceed 0.01%, otherwise molecular degradation may occur. As the material absorbs water very quickly, the predried material should be fed to the processing immediately. The processing notes provided merely represent a recommendation for general use. Due to the large variety of machines, geometries and volumes of parts, etc., it may be necessary to employ different settings according to the specific application. Please contact us for further information.

#### Notes

<sup>1</sup> Typical properties: these are not to be construed as specifications.

<sup>2</sup> 0.079 in/min

<sup>3</sup> 0.39 in/min

<sup>4</sup> 10 mm/min

<sup>5</sup> 20,000 hr

<sup>6</sup> strip electrode R25

