

# SYMEL SLEEVING SE5559UL

## ABOUT THIS PRODUCT

Symel SE5559UL is an extruded silicone elastomer sleeve. Symel SE5559UL is used in many applications including the insulation of lead-outs and connections in transformers and coils employing fine gauge winding wire.

Symel SE5559UL is also used to insulate carbon brushes and thyristor connections.

Symel sleeving can be supplied in reels, hanks or cut lengths.



## FEATURES AND BENEFITS

- Flexible
- Resistance to soldering
- Operating temperature -60°C to 250°C

## APPLICATIONS

- Lead-outs
- Connections in transformers and coils employing fine gauge winding wire
- Insulate carbon brushes and thyristor connections

## MATERIAL DATA

Thermal Classification	Class H (180°C)
Maximum Short Term Temperature	250°C
Bore Sizes	05-125.0mm
Wall Thickness	From 0.2mm
Electrical Strength	1.0kV per 0.1mm wall thickness
Appearance	Brown
Specific Gravity	1.28-133
UL File No	E36952

## Typical Properties of Cured Compound

ASTM METHOD	Property	Value	
		Typical Properties	Release Specification
	Formulation of Test Specimens		
	Curing Agent Type:	2.5 Dimethyl-2,5 Di(tbutyl peroxy) Hexane 50% Active	
	Curing Agent Level	0.8 parts	

	Physical Property		
D-2240	Hardness, Shore A	54	57±5
D-412	Tensile Strength, psi (Mpa)	1190 (19.3)	1100 (7.6) min
D-412	Elongation, %	560	500 min
D-624	Tear Resistance, Die B, ppi (KN/m)	110 (19.3)	80 (14) min
D-395	Compression Set, % 70 hrs, @ 100°C	18	
	70 hrs. @ 150°C	30	
D-2632	Resilience, %	45	
	Linear Shrinkage %	3.8	
	Specific Gravity	1.30	1.28-133

Combustion			
U.L.94	Flame Extinguishing Time (Sec)	7	50 Max
		<b>Non-flaming</b>	<b>Flaming</b>
NBS Smoke Chamber	Specific Optical density DM Corrected	47	50
	Time tp 90% (DM (Min.))	15.7	11.1
	Gas evolution (ppm) Carbon Monoxide	18	350
	Hydrogen Chloride	0	0
	Hydrogen Bromide	0	0
	Hydrogen Fluoride	0	0
	Hydrogen Cyanide	0	0
	Sulfur Dioxide	0	0
Electrical			
D-257	Volume Resistivity (ohm-cm)	5x10 <sup>15</sup>	
D-149	Dielectric Strength (V/mil)		
	Ac	500	
	Dc	≥1400	
D-150	Dielectric Constant and Power Factor	Dielectric Constant	Power Factor
	10 <sup>2</sup> Hz	3.1	0.004
	10 <sup>3</sup> Hz	3.1	0.003
	10 <sup>4</sup> Hz	3.1	0.002
	10 <sup>5</sup> Hz	3.1	0.001 <Ref No v1>
	10 <sup>6</sup> Hz	3.1	0.004