

FLEX NORYL™ Resin WCD891B - Asia

(PPE+TPE)

Saudi Basic Industries Corporation (SABIC)

Product Texts

FLEX NORYL™ WCD891B resin is a flexible, non-reinforced extrudable blend of Polyphenylene Ether (PPE) + Thermoplastic Elastomer (TPE). This material contains non-halogenated flame retardant and performance capable of meeting UL VW-1 requirements, 80C end use temperature rating, and heat deformation performance as defined by UL 1581. FLEX NORYL WCD891B resin is intended for evaluation in wire and cable applications in dark colors. It has a Shore A Hardness reading of 89 and exhibits superior thermal stability, very low water absorption, good electric properties, and low specific gravity. Processing is typically conducted on standard extrusion equipment, and UL 1581 testing is conducted on 2.0mm wire with 0.12mm X 20 stranded copper conductor.

UL Yellow Card Link [E207780-100045800](https://www.ul.com/yellow-card/E207780-100045800)

Processing/Physical Characteristics	Value	Unit	Test Standard
ASTM Data			
Melt Flow Index, MFI	20	g/10min	ASTM D 1238
Temperature	250	°C	-
Load	5	kg	-
Mechanical properties			
ISO Data			
Yield strain	140	%	ISO 527
Stress at break	15	MPa	ISO 527
ASTM Data			
Tensile Strength at Break	16	MPa	ASTM D 638
Elongation at Break	170	%	ASTM D 638
Shore A Hardness	89	-	ASTM D 2240
Thermal properties			
ISO Data			
Burning behav. at thickness h	V-0	class	IEC 60695-11-10
Thickness tested	4.0	mm	-
Glow Wire Flammability Index (GWFI)	850	°C	IEC 60695-2-12
GWFI - thickness tested (2)	3	mm	-
Glow Wire Ignition Temperature (GWIT)	750	°C	IEC 60695-2-13
GWIT - thickness tested (3)	3	mm	-
Electrical properties			
ISO Data			
Relative permittivity, 1MHz	2.9	-	IEC 62631-2-1
Dissipation factor, 1MHz	400	E-4	IEC 62631-2-1
Comparative tracking index	600	-	IEC 60112
ASTM Data			
Surface Resistivity	>1E15	Ohm	ASTM D 257
Volume Resistivity	>1E15	Ohm*cm	ASTM D 257
Other properties			
Density	1100	kg/m ³	ASTM D 792
Processing Recommendation Injection Molding			
Screw speed	15 - 85	rpm	-

Characteristics**Additives**

Flame retarding agent

Regional Availability

Asia Pacific

Special Characteristics

Flame retardant