

**Datasheet AIEPGC311**



AI EP GC 311 Can be describe as an all-in-one material. The carefully composed resins combine with the glass base result not only in exceptional resistance, but also amazing electrotechnical properties. Suitable for countless applications.

**Application**

Electrical and mechanical application with with flammability UL 94 V-0 with halogen-free flame retardant V-0

**Material**

Epoxy with woven glass cloth composite

**Availability**

	Value	Unit
Sheet thickness	on request	
Sheet size	on request	



## AIEPGC311 - Specifications

### Physical properties

	Test standard	Value	Unit
Density	ISO 1183-A	1,85	g/cm <sup>3</sup>
Poisson factor	NF X 70-100-1/-2	0,06	[-]
Water absorption at 23 °C	ISO 62-1	20	mg
Flammability	IEC 60695-11-10	V-0	[-]

### Mechanical properties

	Test standard	Value	Unit
Compressive strength static	ISO 604	500	MPa
Module of elasticity - Youngs modulus		on request	
Tensile strength	ISO 527	300	MPa
Shear strength	ISO 60893-2	45	MPa
Impact strength		on request	
Flexural strength		on request	
Insulation resistance		on request	
Elastic modulus from bending test	ISO 178	20000	MPa
Compressive strength perpendicular		on request	
Izod impact strength, parallel with layers	ISO 180/2A	60	Kj/m <sup>2</sup>
Shear strength parallel		on request	

### Thermal properties

	Test standard	Value	Unit
Thermal endurance 20,000 h (T.I)		155	T.I.

### Friction properties

	Test standard	Value	Unit
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### Electrical properties

	Test standard	Value	Unit
Dielectric strength perpendicular thickness 3 mm		on request	
Resistance to tracking (CTI)	IEC 60112	600	CTI
Permittivity 50Hz	IEC 60250	4,5	[-]
Permittivity 1MHz	IEC 60250	4,5	[-]
Dissipation factor 50Hz	IEC 60250	0,005	[-]
Dissipation factor 1 MHz	IEC 60250	0,008	[-]
Insulation resistance after submersion in water	IEC 60167	500.000	MΩ