


**Akulon® Ultraflow K-FG3**

PA6-GF15

DSM Engineering Plastics

**Product Texts**

15% Glass Reinforced, High Flow

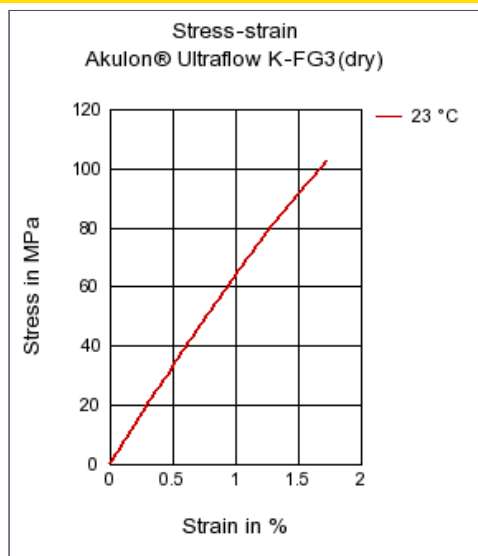
ISO 1043 PA6-GF15

[Akulon website](#)

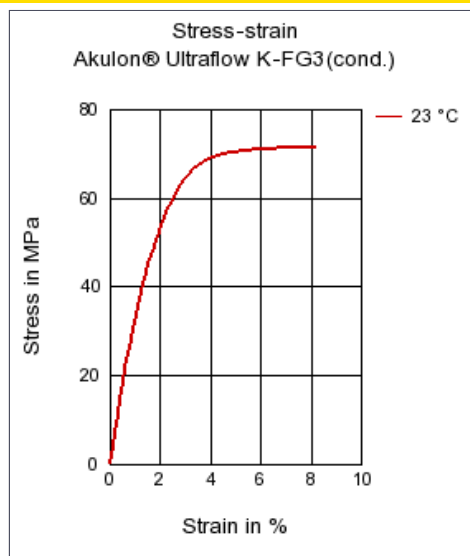
Rheological properties	dry / cond	Unit	Test Standard
<b>ISO Data</b>			
Molding shrinkage, parallel	0.3 / *	%	ISO 294-4, 2577
Molding shrinkage, normal	0.9 / *	%	ISO 294-4, 2577
<b>Mechanical properties</b>			
<b>ISO Data</b>			
Tensile Modulus	5800 / 3400	MPa	ISO 527-1/-2
Stress at break	110 / 65	MPa	ISO 527-1/-2
Strain at break	3 / 8.5	%	ISO 527-1/-2
Charpy impact strength (+23°C)	25 / 35	kJ/m <sup>2</sup>	ISO 179/1eU
Charpy impact strength, -30°C	20 / 20	kJ/m <sup>2</sup>	ISO 179/1eU
Charpy notched impact strength (+23°C)	6 / 15	kJ/m <sup>2</sup>	ISO 179/1eA
Charpy notched impact strength, -30°C	5 / 5	kJ/m <sup>2</sup>	ISO 179/1eA
<b>Thermal properties</b>			
<b>ISO Data</b>			
Melting temperature (10°C/min)	220 / *	°C	ISO 11357-1/-3
Temp. of deflection under load (1.80 MPa)	195 / *	°C	ISO 75-1/-2
Temp. of deflection under load (0.45 MPa)	215 / *	°C	ISO 75-1/-2
Coeff. of linear therm. expansion, parallel	30 / *	E-6/K	ISO 11359-1/-2
Coeff. of linear therm. expansion, normal	80 / *	E-6/K	ISO 11359-1/-2
Burning behav. at 1.5 mm nom. thickn.	HB / *	class	IEC 60695-11-10
Thickness tested	1.6 / *	mm	IEC 60695-11-10
<b>Electrical properties</b>			
<b>ISO Data</b>			
Relative permittivity, 100Hz	3.5 / 14	-	IEC 60250
Relative permittivity, 1MHz	4.7 / 4.5	-	IEC 60250
Dissipation factor, 100Hz	55 / 1500	E-4	IEC 60250
Dissipation factor, 1MHz	180 / 1200	E-4	IEC 60250
Volume resistivity	>1E13 / >1E13	Ohm*m	IEC 60093
Surface resistivity	* / 1E14	Ohm	IEC 60093
Comparative tracking index	- / 600	-	IEC 60112
<b>Other properties</b>			
<b>ISO Data</b>			
Water absorption	7.6 / *	%	Sim. to ISO 62
Humidity absorption	2.3 / *	%	Sim. to ISO 62
Density	1230 / -	kg/m <sup>3</sup>	ISO 1183
<b>Rheological calculation properties</b>			
<b>ISO Data</b>			
Density of melt	1060	kg/m <sup>3</sup>	-
Thermal conductivity of melt	0.19	W/(m K)	-
Spec. heat capacity of melt	2510	J/(kg K)	-
Eff. thermal diffusivity	7.23E-8	m <sup>2</sup> /s	-

## Diagrams

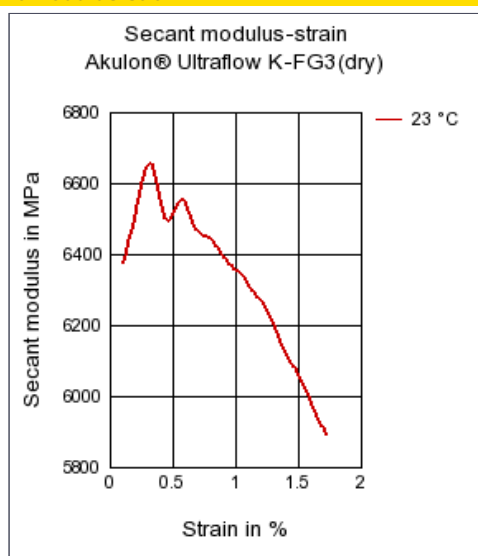
## Stress-strain



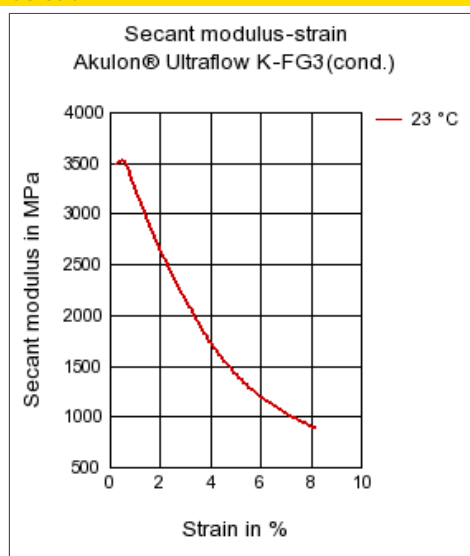
## Stress-strain



## Secant modulus-strain



## Secant modulus-strain



## Characteristics

## Processing

Injection Molding

## Delivery form

Pellets

## Other text information

## Injection Molding

[Injection Molding Recommendations](#)