

FORTRON® FX75T1 R

Polyphenylene sulfide

Fortron® FX75T1 R is an unreinforced, impact-modified poly(phenylene sulfide) with high melt viscosity suitable for extrusion.

Typical mechanical properties

Tensile modulus	1500 MPa	ISO 527-1/-2
Tensile stress at break, 50mm/min	40 MPa	ISO 527-1/-2
Tensile strain at break, 50mm/min	80 %	ISO 527-1/-2
Flexural modulus	1700 MPa	ISO 178
Flexural strength	55 MPa	ISO 178
Charpy notched impact strength, 23°C	>50 kJ/m ²	ISO 179/1eA
Charpy notched impact strength, -30°C	15 kJ/m ²	ISO 179/1eA
Poisson's ratio	0.43 ^[C]	

[C]: Calculated

Thermal properties

Melting temperature, 10°C/min	280 °C	ISO 11357-1/-3
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Physical/Other properties

Density	1200 kg/m ³	ISO 1183
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Characteristics

Processing	Other Extrusion
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Additional information

Other extrusion

Preprocessing

Predrying in a dehumidified air dryer at 80°C / 3-4 hours is recommended.

Processing

On single-screw extruders with 15-25 D long multi-section screws, as are usual in the trade, the FORTRON is processable.

Extrusion temperature 295-305 °C

A medium extrusion rate is normally preferred.

Processing Notes

Pre-Drying

FORTRON should in principle be predried. Because of the necessary low maximum residual moisture content the use of dry air dryers is recommended. The dew point should be ≤ -30 °C. The time between drying and processing should be as short as possible.

Storage

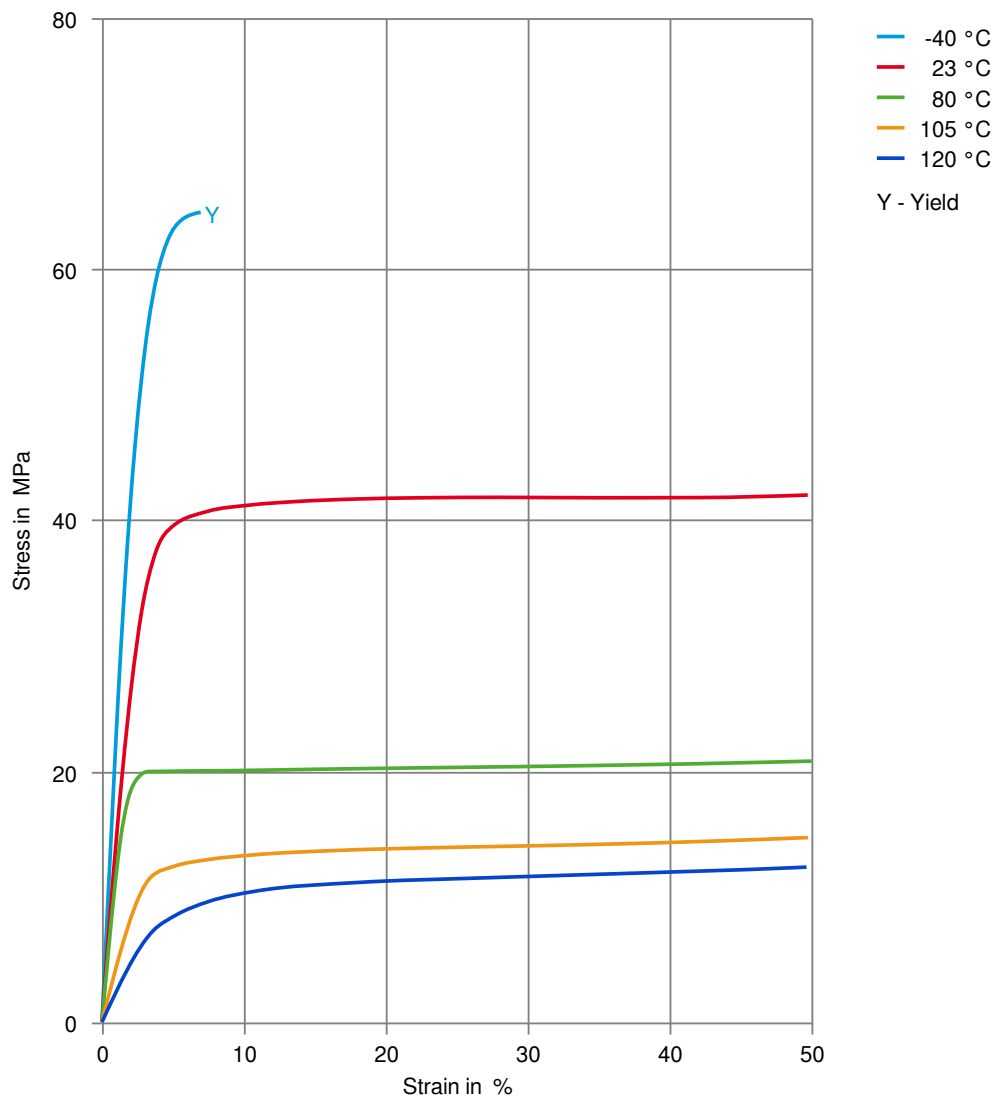
For subsequent storage the material should be stored dry in the dryer until

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processed (≤ 60 h).

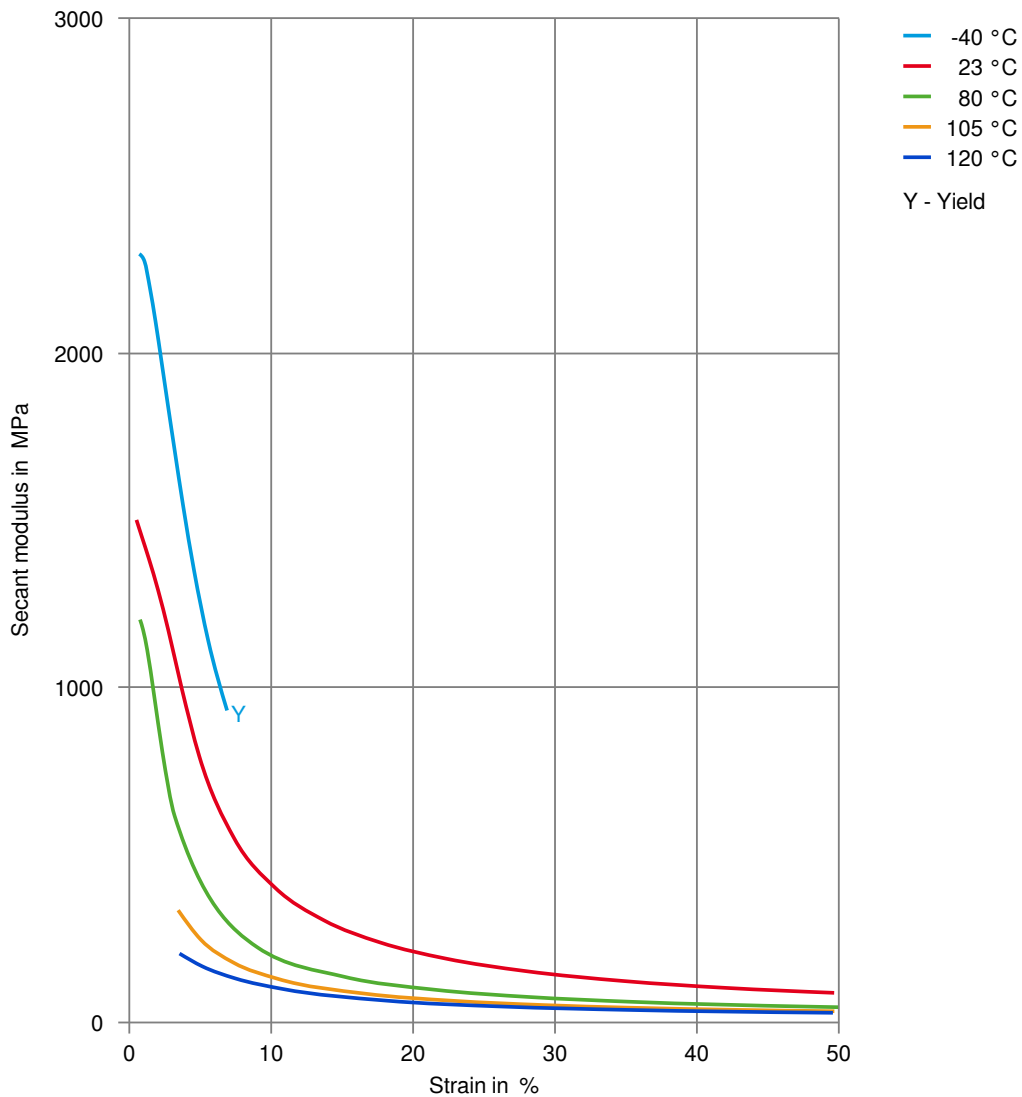
Stress-strain



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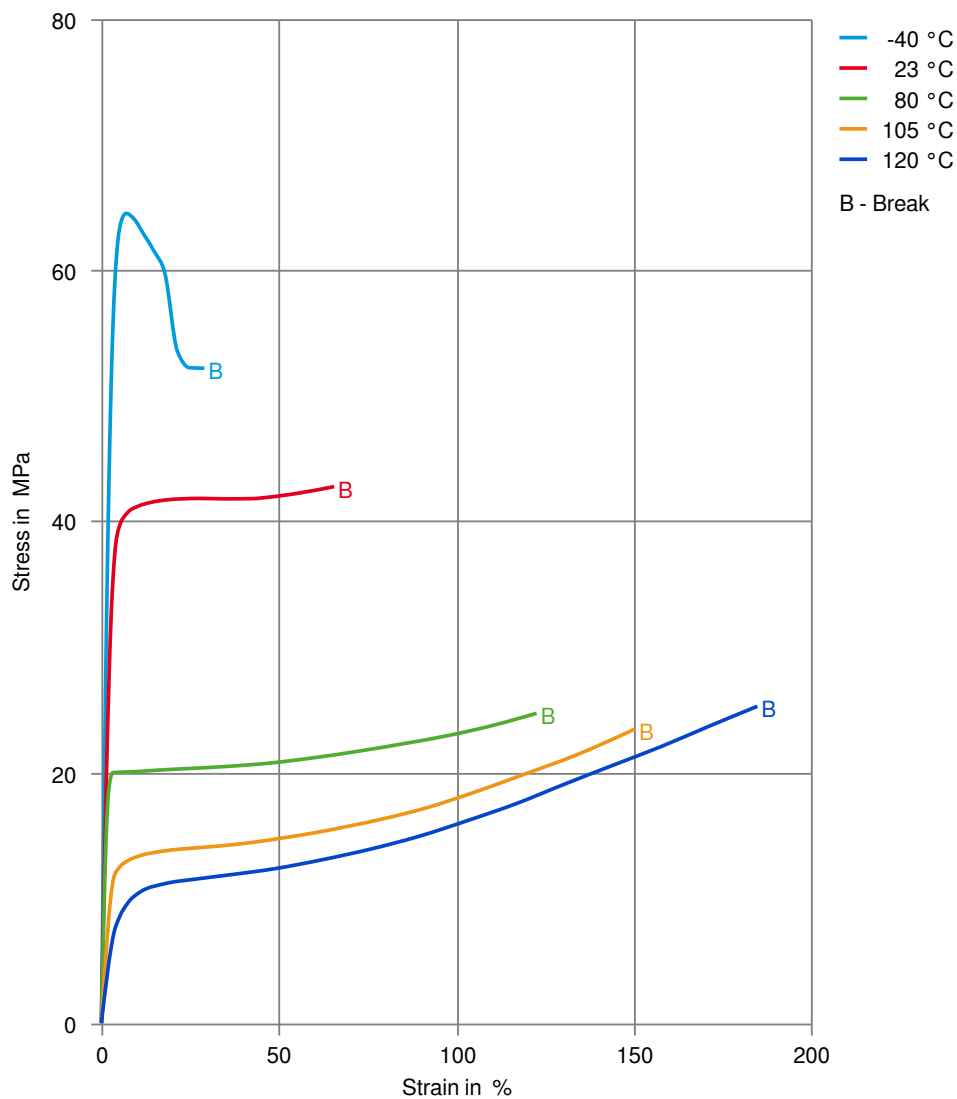
Secant modulus-strain



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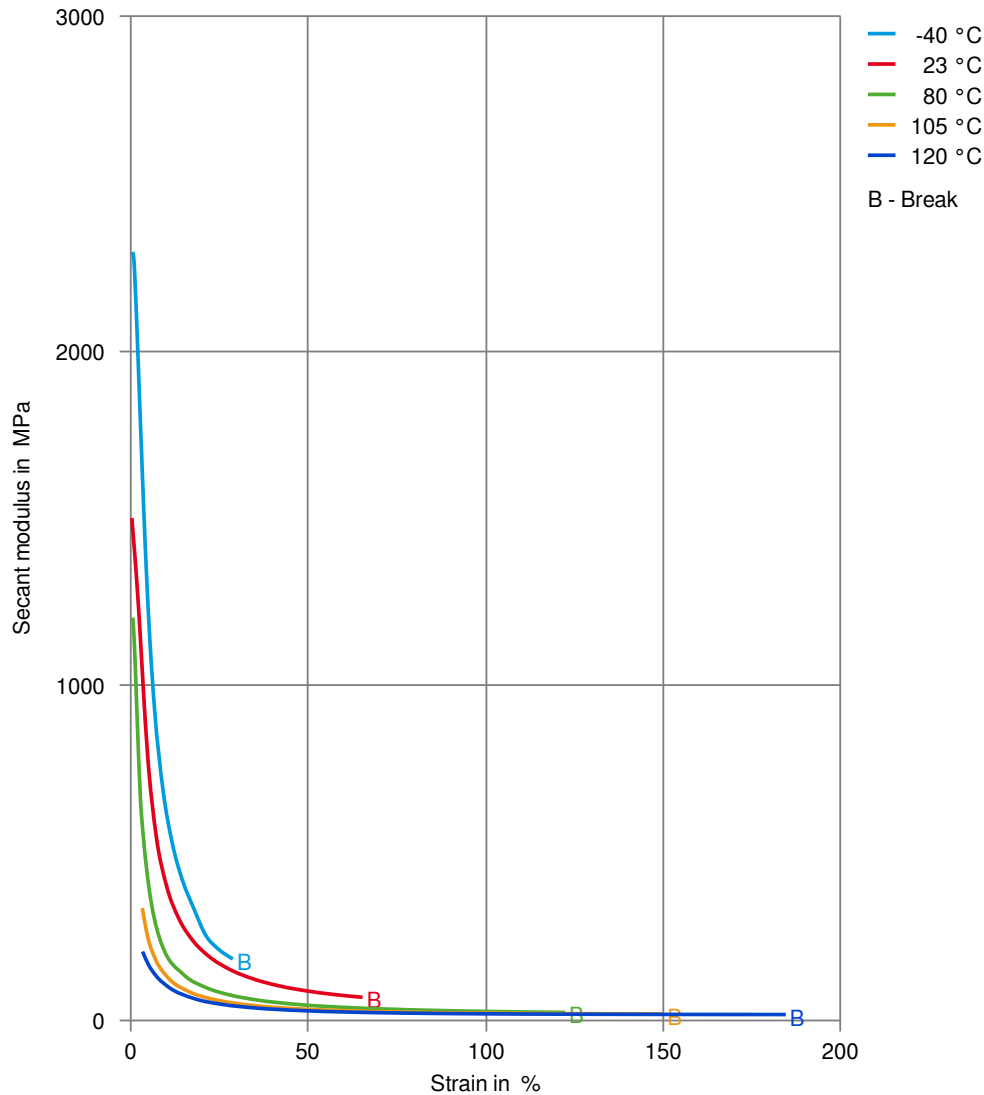
Stress-strain, 50mm/min



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Secant modulus-strain, 50mm/min



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