FGFT® Polycarbonaat 15% Carbon Fiber

Item no.: PC-15CF-NA01-X-XX

Technical information

Description	Method	Typical value
Specific gravity	ISO 1183	1,25 g/cc
MFI 300 °C/1,2kg	ISO 1133	22 gr/10 min
Tensile modulus (E)	ISO 527	6600 Mpa
Tensile strength at yield	ISO 527	105Mpa
Tensile strength at break	ISO 527	104Mpa
Elongation at break		7,3%
Impact strength – charpy method 23 °C	ISO 179	5,7 kJ/m2
Vicat	ISO 306	153 °C
Mold shrinkage		

Printing recommendations	
Pre-drying	Hot air 120°C / 4hrs - dry air 120°C / 2hrs
Zone 1 temperature	220 - 260°C
Zone 2 temperature	240 - 280°C
Zone 3 temperature	260 - 290°C
Zone 4 temperature	270 - 300°C
Mass temperature	270 - 300°C
Die temperature	270 - 300°C
Max. moisture content	0,05%

FGFT® PC 15% Carbon Fiber is an advanced polycarbonate-based composite designed for high-performance applications in aerospace, automotive, and industrial manufacturing. Engineered for superior strength, thermal stability, and ease of machining, this material is ideal for demanding environments requiring precision and durability.

Material features:

- Thermal performance
- Dimensional stability
- Optimized machinability
- Chemical resistance
- Expectional mechanical properties

Applications:

- Tooling
- Molds
- Structural components
- Autoclave

Additional information:

- Store cool and dry (15-25 °C)
- Available in cylindricals and UWG
- For FGF applications

All raw materials used in the production of products are in conformity with the REACH regulation (EC) no.1907/2006.
***Disclaimer:** All above-mentioned data have been carefully checked according specific testing procedures and/or based on of raw material data and experience with compatible formulations. The data are provided for informational purposes only. Therefore, no guarantee or warranty can be expected from these data. They are part of the quality and delivery specifications. The applicability of the product should be tested under local processing conditions at the converter.*

www.fgftechnology.com info@fgftechnology.com +31 (0) 492 234 210

FGFT® Polycarbonaat 15% Carbon Fiber

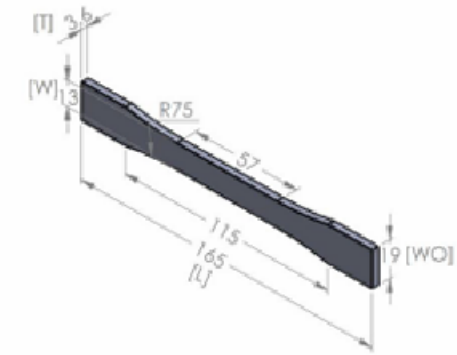
Item no.: PC-15CF-NA01-X-XX

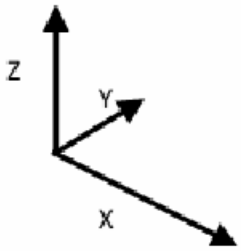
Analysis Data Sheet

CLTE (Coefficient of Linear Expansion) analysis was performed on a TA Instruments DMA (Dynamic Mechanical Analyser) with compression clamp installed in Controlled Force mode.

- Temperature range: RT to 80˚C at 5˚/min
- Preload force: 0,05N

Sample Specimen:





Specimen were cut from injection moulded tensile test bars.
Analysis were performed in three directions (x,y,z) towards the injectomoulding direction.
For each analysis a new sample was used.

All raw materials used in the production of products are in conformity with the REACH regulation (EC) no.1907/2006.
***Disclaimer:** All above-mentioned data have been carefully checked according specific testing procedures and/or based on of raw material data and experience with compatible formulations. The data are provided for informational purposes only. Therefore, no guarantee or warranty can be expected from these data. They are part of the quality and delivery specifications. The applicability of the product should be tested under local processing conditions at the converter.*

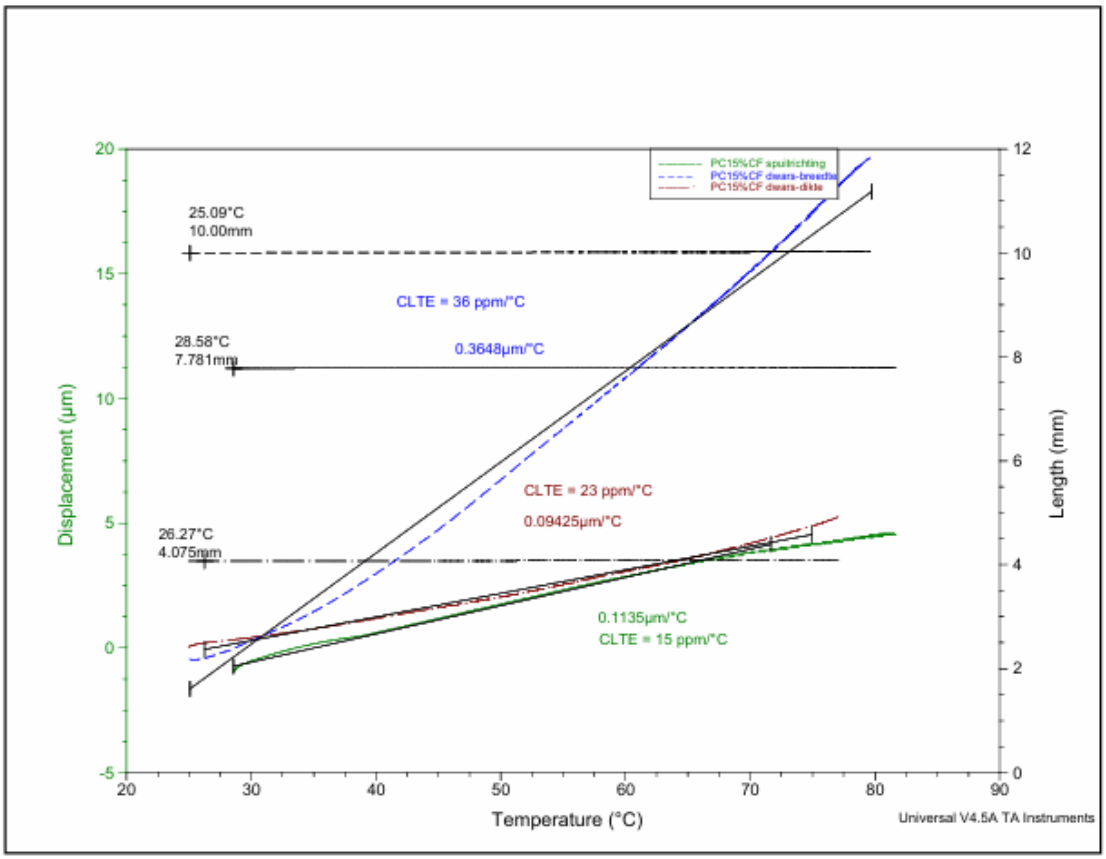
www.fgftechnology.com info@fgftechnology.com +31 (0) 492 234 210

FGFT® Polycarbonaat 15% Carbon Fiber

Item no.: PC-15CF-NA01-X-XX

Results

Sample Injection Moulded	Direction	Length (mm)	CLTE (ppm/°C)
X	Injection Moulding	8	15
Y	Thickness	4	23
Z	Width	10	36



All raw materials used in the production of products are in conformity with the REACH regulation (EC) no.1907/2006.
***Disclaimer:** All above-mentioned data have been carefully checked according specific testing procedures and/or based on of raw material data and experience with compatible formulations. The data are provided for informational purposes only. Therefore, no guarantee or warranty can be expected from these data. They are part of the quality and delivery specifications. The applicability of the product should be tested under local processing conditions at the converter.*