

# CHANG CHUN PLASTICS CO., LTD.

NO. 301, SONGKIANG ROAD, 7<sup>TH</sup> FL., TAIPEI, 10477 TAIWAN  
TEL : 886-2-2503-8131 (REF) FAX : 886-2- 2501-8018

## Engineering Plastics Polybutylene Terephthalate

### Technical Data

#### CCP PBT 4815-NCB

PBT glass fiber 15% reinforced injection moulding grade.

#### Characteristics

- 1)excellent electrical property
- 2)excellent temperature resistance, high heat distortion temperature.
- 3)excellent mechanic and chemical property
- 4)excellent weatherability
- 5)excellent wear property
- 6)excellent moldability
- 7)High resistance to fuels, oil, fats and many solvents

#### Injection Moulding Condition

Cylinder temperatures	: 240-270°C
Nozzle temperature	: 260-270°C
Mould temperature	: 40-120°C , suitable temperature 60-80°C
Injection rate	: middle – fast
Screw speed	: 60-120 rpm, to be chosen in such a way that plasticizing time is just within cooling time.
Pressure	Injection pressure : 500-1200 kg/cm <sup>2</sup>
	Holding pressure : 300-800 kg/cm <sup>2</sup>
	Back pressure : 0-3 kg/cm <sup>2</sup>
Mould shrinkage	Mould shrinkage 1.6 mm thickness horizon is 0.3-0.6% and vertical is 1.4-2.0% under the test method ASTM D955.

#### Packaging

25 kg/ paper bag .

#### Material handing

Moisture pick-up from ambient air should be avoided. Keep hopper properly closed.

# CHANG CHUN PLASTICS CO., LTD.

NO. 301, SONGKIANG ROAD, 7<sup>TH</sup> FL., TAIPEI, 10477 TAIWAN  
TEL : 886-2-2503-8131 (REF) FAX : 886-2- 2501-8018

## Engineering Plastics Polybutylene Terephthalate

### CCP PBT 4815-NCB

Property	Value	Unit	Test method ASTM
Glass Fiber Content	15	%	
Specific gravity	1.48	-	D792
Melting point	225	°C	DSC
Coef. of linear thermal expansion	5.5	10 <sup>-5</sup> cm/cm°C	D696
Heat deflection temperature under load			
--- 18.6 kg/cm <sup>2</sup>	195	°C	D648
--- 4.6 kg/cm <sup>2</sup>	220	°C	D648
Moisture absorption (24h)	0.03	%	D570
Flammability acc. to UL94, 3.2 mm thickness	V-0	-	UL94
Tensile strength	980	kg/cm <sup>2</sup>	D638
Tensile elongation	3.8	%	D638
Flexural strength	1420	kg/cm <sup>2</sup>	D790
Flexural modulus	55000	kg/cm <sup>2</sup>	D790
Izod impact strength - notched 1/4"	6.4	kg-cm/cm	D256
Hardness - rockwell	120	R	D785
Dielectric strength, 2 mm thickness	23	KV/mm	D149
Volume resistivity	10 <sup>15</sup>	Ω-cm	D257
Surface resistivity	10 <sup>13</sup>	Ω	D257
Dielectric constant	3.3	60Hz	D150
Dielectric dissipation factor	0.001	60Hz	D150
Arc resistance	90	SEC	D495

(1) For reference only

(2) All data in the table are the typical values of the material and not the minimum values of the material specifications.