

Product Texts

CYCOLOY CX7720 Polycarbonate/Acrylonitrile Butadiene Styrene (PC/ABS) blend is an injection moldable, high flow, high heat resistant, non chlorinated/brominated flame retardant grade. It has a UL94 V0@1.2mm, 5VA@2.5mm and 5VB@1.5mm flame rating. This grade has improved chemical resistance compared to standard PC/ABS blends and is a good candidate for thin wall applications.

UL Yellow Card Link [F207780-100028765](https://www.ul.com/yellow-card/F207780-100028765)

Processing/Physical Characteristics	Value	Unit	Test Standard
ISO Data			
Melt volume-flow rate, MVR	22	cm ³ /10min	ISO 1133
Temperature	260	°C	-
Load	5	kg	-
Density of melt	1110	kg/m ³	-
Thermal conductivity of melt	0.24	W/(m K)	-
Spec. heat capacity of melt	1850	J/(kg K)	-
Ejection temperature	116	°C	-
ASTM Data			
Melt Flow Index, MFI	25	g/10min	ASTM D 1238
Temperature	260	°C	-
Load	5	kg	-

Mechanical properties	Value	Unit	Test Standard
ISO Data			
Tensile Modulus	2900	MPa	ISO 527
Yield stress	65	MPa	ISO 527
Yield strain	5	%	ISO 527
Stress at break	65	MPa	ISO 527
Strain at break	50	%	ISO 527
Flexural modulus	2090	MPa	ISO 178
Charpy notched impact strength, +23°C	11	kJ/m ²	ISO 179/1eA
Charpy notched impact strength, +23°C, 3mm	11	kJ/m ²	ISO 179/1eA
Izod notched impact strength, +23°C, 4mm	8	kJ/m ²	ISO 180/1A
Izod notched impact strength, +23°C, 3mm	11	kJ/m ²	ISO 180/1A
Izod notched impact strength, -30°C, 3mm	8	kJ/m ²	ISO 180/1A
ASTM Data			
Tensile Modulus	2860	MPa	ASTM D 638
Tensile Strength at Yield	65	MPa	ASTM D 638
Tensile Strength at Break	66	MPa	ASTM D 638
Elongation at Yield	5	%	ASTM D 638
Elongation at Break	126	%	ASTM D 638
Flexural Modulus	2810	MPa	ASTM D 790
Izod Impact notched, 1/8 in	150	J/m	ASTM D 256
Izod Impact notched, Low-Temperature	63	J/m	ASTM D 256
Temperature	-30	°C	-

Thermal properties	Value	Unit	Test Standard
ISO Data			
Temp. of deflection under load, 1.80 MPa	110	°C	ISO 75-1/-2
Vicat softening temperature, B	127	°C	ISO 306
Vicat softening temperature, 120°C/h 50N	129	°C	ISO 306
Coeff. of linear therm. expansion, parallel	70.4	E-6/K	ISO 11359-1/-2
Coeff. of linear therm. expansion, normal	75.9	E-6/K	ISO 11359-1/-2
Burning behav. at thickness h	V-1	class	IEC 60695-11-10
Thickness tested	1.0	mm	-
Burning behav. 5V at thickness h	5VB	class	IEC 60695-11-20
Thickness tested	1.5	mm	-
ASTM Data			
DTUL @ 66 psi	122	°C	ASTM D 648
DTUL @ 264 psi	110	°C	ASTM D 648
Vicat Temperature	127	°C	ASTM D 1525

CYCOLOY™ FR Resin CX7720 - Asia

(PC+ABS)

Saudi Basic Industries Corporation (SABIC)

Other properties	Value	Unit	Test Standard
Water absorption	0.15	%	Sim. to ISO 62
Humidity absorption	0.07	%	Sim. to ISO 62
Density	1220	kg/m ³	ISO 1183
Density	1220	kg/m ³	ASTM D 792

Processing Recommendation Injection Molding	Value	Unit	Test Standard
Pre-drying - Temperature	90 - 100	°C	-
Pre-drying - Time	2 - 4	h	-
Processing humidity	≤0.04	%	-
Melt temperature	270 - 300	°C	-
Mold temperature	60 - 90	°C	-
Zone 1	260 - 300	°C	-
Zone 2	260 - 300	°C	-
Zone 3	265 - 300	°C	-
Screw speed	40 - 70	rpm	-
Back pressure	0.3 - 0.7	MPa	-

Characteristics**Processing**

Injection Molding

Additives

Flame retarding agent

Special Characteristics

Flame retardant

Chemical Resistance

General Chemical Resistance

Regional Availability

Asia Pacific