

# POLYLAC® PA-765A

Acrylonitrile Butadiene Styrene  
CHI MEI CORPORATION



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## Technical Data

### General

Material Status	• Commercial: Active		
Literature <sup>1</sup>	• Processing (English) • Technical Datasheet - ASTM (English) • Technical Datasheet - ISO (English)		
UL Yellow Card <sup>2</sup>	• E56070-565074 • E56070-565073		
Search for UL Yellow Card	• CHI MEI CORPORATION • POLYLAC®		
Availability	• Africa & Middle East • Asia Pacific	• Europe • Latin America	• North America • South America
RoHS Compliance	• RoHS Compliant		
Processing Method	• Injection Molding		

Physical	Nominal Value (English)	Nominal Value (SI)	Test Method
Specific Gravity			
--	1.17	1.17 g/cm <sup>3</sup>	ASTM D792
--	1.17 g/cm <sup>3</sup>	1.17 g/cm <sup>3</sup>	ISO 1183
Melt Mass-Flow Rate (MFR)			ASTM D1238
200°C/5.0 kg	4.6 g/10 min	4.6 g/10 min	
220°C/10.0 kg	46 g/10 min	46 g/10 min	
Melt Volume-Flow Rate (MVR) (220°C/10.0 kg)	2.81 in <sup>3</sup> /10min	46.0 cm <sup>3</sup> /10min	ISO 1133
Mechanical	Nominal Value (English)	Nominal Value (SI)	Test Method
Tensile Stress			
Yield	5800 psi	40.0 MPa	ISO 527-2/50
Break	4060 psi	28.0 MPa	ISO 527-2/50
0.118 in (3.00 mm) <sup>4</sup>	5690 psi	39.2 MPa	ASTM D638
Tensile Elongation			
Break, 0.118 in (3.00 mm) <sup>4</sup>	20 %	20 %	ASTM D638
Break	10 %	10 %	ISO 527-2/50
Flexural Modulus			
0.236 in (6.00 mm) <sup>5</sup>	327000 psi	2260 MPa	ASTM D790
-- <sup>6</sup>	247000 psi	1700 MPa	ISO 178
Flexural Strength			
0.236 in (6.00 mm) <sup>5</sup>	9100 psi	62.8 MPa	ASTM D790
-- <sup>6</sup>	7830 psi	54.0 MPa	ISO 178
Impact	Nominal Value (English)	Nominal Value (SI)	Test Method
Charpy Notched Impact Strength	9.5 ft·lb/in <sup>2</sup>	20 kJ/m <sup>2</sup>	ISO 179
Notched Izod Impact			
73°F (23°C), 0.118 in (3.00 mm)	4.4 ft·lb/in	240 J/m	ASTM D256
73°F (23°C), 0.236 in (6.00 mm)	3.7 ft·lb/in	200 J/m	ASTM D256
--	9.0 ft·lb/in <sup>2</sup>	19 kJ/m <sup>2</sup>	ISO 180/1A
Hardness	Nominal Value (English)	Nominal Value (SI)	Test Method
Rockwell Hardness (R-Scale)	101	101	ASTM D785
Ball Indentation Hardness (H 358/30)	11700 psi	81.0 MPa	ISO 2039-1

Thermal	Nominal Value (English)	Nominal Value (SI)	Test Method
Deflection Temperature Under Load			
264 psi (1.8 MPa), Unannealed	169 °F	76.0 °C	ASTM D648 ISO 75-2/A
264 psi (1.8 MPa), Annealed	185 °F	85.0 °C	ASTM D648
264 psi (1.8 MPa), Annealed	196 °F	91.0 °C	ISO 75-2/A
Vicat Softening Temperature			
--	198 °F	92.0 °C	ASTM D1525 <sup>7</sup>
--	194 °F	90.0 °C	ISO 306/A50
--	174 °F	79.0 °C	ISO 306/B50
Flammability	Nominal Value (English)	Nominal Value (SI)	Test Method
Flame Rating			
0.0591 in (1.50 mm)	V-1	V-1	UL 94
0.0787 in (2.00 mm)	V-0	V-0	
0.0827 in (2.10 mm)	V-0	V-0	
0.0984 in (2.50 mm)	5VA	5VA	
Injection	Nominal Value (English)	Nominal Value (SI)	
Drying Temperature	176 to 185 °F	80.0 to 85.0 °C	
Drying Time	2.0 to 4.0 hr	2.0 to 4.0 hr	
Rear Temperature	356 to 410 °F	180 to 210 °C	
Middle Temperature	374 to 428 °F	190 to 220 °C	
Front Temperature	374 to 428 °F	190 to 220 °C	
Mold Temperature	104 to 158 °F	40.0 to 70.0 °C	
Injection Pressure	711 to 1140 psi	4.90 to 7.85 MPa	
Injection Rate	Slow-Moderate	Slow-Moderate	
Holding Pressure	284 to 711 psi	1.96 to 4.90 MPa	
Back Pressure	71.1 to 142 psi	0.490 to 0.981 MPa	
Cushion	0.125 in	3.18 mm	

**Notes**

- <sup>1</sup> These links provide you with access to supplier literature. We work hard to keep them up to date; however you may find the most current literature from the supplier.
- <sup>2</sup> A UL Yellow Card contains UL-verified flammability and electrical characteristics. UL IDES continually works to link Yellow Cards to individual plastic materials in Prospector, however this list may not include all of the appropriate links. It is important that you verify the association between these Yellow Cards and the plastic material found in Prospector. For a complete listing of Yellow Cards, visit the UL Yellow Card Search.
- <sup>3</sup> Typical properties: these are not to be construed as specifications.
- <sup>4</sup> 0.24 in/min (6.0 mm/min)
- <sup>5</sup> 0.11 in/min (2.8 mm/min)
- <sup>6</sup> 0.079 in/min (2.0 mm/min)
- <sup>7</sup> Rate A (50°C/h)

## Where to Buy

### Supplier

#### CHI MEI CORPORATION

Tainan County, Taiwan  
**Telephone:** 886-6-266-3000  
**Web:** <http://www.chimeicorp.com/>

### Distributor

#### AMP FRANCE

**Telephone:** +33-3-8920-1390  
**Web:** <http://www.amp.fr/>  
**Availability:** France

#### AMP TUNISIA

**Telephone:** +216-52-27-21-73  
**Web:** <http://www.amp.fr/>  
**Availability:** Tunisia

#### Biesterfeld Plastic GmbH

*Biesterfeld Plastic GmbH is a Pan European distribution company. Contact Biesterfeld Plastic GmbH for availability of individual products by country.*

**Telephone:** +49-40-32008-0  
**Web:** <http://www.biesterfeld-plastic.com/>  
**Availability:** Algeria, Austria, Belgium, Bosnia and Herzegovina, Bulgaria, Croatia, Cyprus, Czech Republic, Denmark, Egypt, Faroe Islands, Finland, France, Germany, Greece, Hungary, Iceland, Italy, Libyan Arab Jamahiriya, Luxembourg, Mauritania, Morocco, Netherlands, Norway, Poland, Portugal, Romania, Serbia, Slovakia, Slovenia, Spain, Sweden, Switzerland, Tunisia, Turkey

#### Calsak Polymers

**Telephone:** 800-743-2595  
**Web:** <http://www.calsakpolymers.com/>  
**Availability:** North America

#### Entec Polymers

**Telephone:** 800-375-5440  
**Web:** <http://www.entecpolymers.com/>  
**Availability:** North America

#### M. Holland Canada Company

**Telephone:** 905-665-1168  
**Web:** <http://www.mholland.com/>  
**Availability:** Canada

#### M. Holland Company

**Telephone:** 855-497-1403  
**Web:** <http://www.mholland.com/>  
**Availability:** Mexico, United States

#### Plastribution

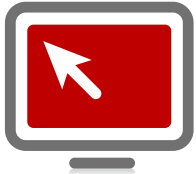
**Telephone:** +44-845-345-4560  
**Web:** <http://www.plastribution.co.uk/>  
**Availability:** United Kingdom

#### The Materials Group

**Telephone:** 616-863-6046  
**Web:** <http://thematerialsgroup.com/>  
**Availability:** North America



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### Prospector Plastics Database - [www.ides.com/prospector](http://www.ides.com/prospector)

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– Birgit Elvardt Bader, Production Manager, Micotron

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**Automotive Plastics Search** – easily locate automotive approved plastics.

**Curve Data** – view, overlay and export curve data.



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– Kevin Chase, Owner & President, Chase Plastics



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