TAIRILAC AG15A1

Acrylonitrile Butadiene Styrene

Formosa Plastics Corporation

UPMold PROSPECTOR®

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Technical Data

Product Description

FCFC ABS resin AG15A1 meets the requirements of UL, SGS, FDA and the certificates of environmental protection.

General

Material Status	• Commercial: Active		
Literature [1]	• Processing (English) • Technical Datasheet (English)		
UL Yellow Card [2]	• E162823-224731		
Search for UL Yellow Card	• Formosa Plastics Corporation • TAIRILAC		
Availability	• Asia Pacific	• Europe	• North America
Agency Ratings	• EC 1907/2006 (REACH)		
RoHS Compliance	• RoHS Compliant		
UL File Number	• E162823		
Forms	• Pellets		
Processing Method	• Injection Molding		

Physical	Nominal Value (English)	Nominal Value (SI)	Test Method
Specific Gravity			
--	1.05	1.05 g/cm³	ASTM D792
73°F (23°C)	1.05 g/cm³	1.05 g/cm³	ISO 1183
Melt Mass-Flow Rate (MFR)			ASTM D1238 ISO 1133
200°C/5.0 kg	1.9 g/10 min	1.9 g/10 min	
220°C/10.0 kg	19 g/10 min	19 g/10 min	
Molding Shrinkage - Flow	4.0E-3 to 7.0E-3 in/in	0.40 to 0.70 %	Internal Method
Mechanical	**Nominal Value (English)**	**Nominal Value (SI)**	**Test Method**
Tensile Strength			
73°F (23°C)	6900 psi	47.6 MPa	ASTM D638
73°F (23°C)	6960 psi	48.0 MPa	ISO 527-2
Flexural Modulus (73°F (23°C))	384000 psi	2650 MPa	ASTM D790 ISO 178
Flexural Strength (73°F (23°C))	11500 psi	79.4 MPa	ASTM D790 ISO 178
Impact	**Nominal Value (English)**	**Nominal Value (SI)**	**Test Method**
Unnotched Izod Impact			ASTM D256 ISO 180
73°F (23°C), 0.250 in (6.35 mm)	3.7 ft·lb/in	200 J/m	
Hardness	**Nominal Value (English)**	**Nominal Value (SI)**	**Test Method**
Rockwell Hardness (R-Scale, 73°F (23°C))	110	110	ASTM D785 ISO 2039-2
Thermal	**Nominal Value (English)**	**Nominal Value (SI)**	**Test Method**
Deflection Temperature Under Load			ASTM D648 ISO 75-2/A
264 psi (1.8 MPa), Unannealed, 0.500 in (12.7 mm)	185 °F	85.0 °C	
264 psi (1.8 MPa), Annealed [4]	203 °F	95.0 °C	
Vicat Softening Temperature	212 °F	100 °C	ISO 306/A ASTM D1525 [5]
Flammability	**Nominal Value (English)**	**Nominal Value (SI)**	**Test Method**
Flame Rating (0.06 in (1.5 mm), All Colors)	HB	HB	UL 94

Injection	Nominal Value (English)	Nominal Value (SI)
Drying Temperature	158 to 176 °F	70 to 80 °C
Drying Time	2.0 to 3.0 hr	2.0 to 3.0 hr

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Document Created: Tuesday, August 23, 2016
Added to Prospector: February 2004
Last Updated: 8/29/2014

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Injection	Nominal Value (English)	Nominal Value (SI)
Mold Temperature	104 to 176 °F	40 to 80 °C
Injection Pressure	9960 to 15600 psi	68.6 to 108 MPa

Injection Notes

Screw Temp: 190 to 230°C

Notes

[1] 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.

[2] A UL Yellow Card contains UL-verified flammability and electrical characteristics. UL Prospector 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.

[3] Typical properties: these are not to be construed as specifications.

[4] 80°Cx8Hr

[5] Loading 1 (10 N)

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Where to Buy

Supplier

Formosa Plastics Corporation
Taipei, Taiwan
Telephone: +886-2-2712-2211
Web: http://www.fpc.com.tw/

Distributor

GAZECHIM PLASTIQUES
GAZECHIM PLASTIQUES is a Pan European distribution company. Contact GAZECHIM PLASTIQUES for availability of individual products by country.
Telephone: +33-4-67-49-55-37
Web: http://www.gazechim.com/
Availability: Italy

Osterman & Company
Telephone: 800-914-4437
Web: http://www.osterman-co.com/
Availability: North America

PolySource
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