



AMPLIFY™ TY 1451B

The Dow Chemical Company - Functional Polymer

Sunday, November 3, 2019

General Information

Product Description

AMPLIFY™ TY 1451B Functional Polymer is a maleic anhydride grafted (MAH) polymer. In tie layers for flexible packaging, AMPLIFY™ TY 1451B Functional Polymer promotes adhesion of Polyethylene to barrier polymers, such as polyamide and ethylene vinyl alcohol (EVOH), and to ionomers and other polar substrates.

Main Characteristics:

- Excellent adhesion to polyamide and EVOH, ionomers and polyethylene
- Excellent physical properties
- Wide range of process and service temperature
- For blown and cast film, thermoforming applications

Complies with:

- 21 CFR 175.105(c)(5)

Consult the regulations for complete details.

General

Material Status	• Commercial: Active
Availability	• Asia Pacific • Europe • Latin America • North America
Additive	• Antiblock: No • Processing Aid: No • Slip: No
Agency Ratings	• FDA 21 CFR 175.105(c) (5)
Forms	• Pellets

ASTM & ISO Properties ¹

Physical	Nominal Value	Unit	Test Method
Density	0.906	g/cm ³	ASTM D792
Melt Mass-Flow Rate (190°C/2.16 kg)	1.8	g/10 min	ASTM D1238
MAH Graft Level ²	Low		Internal Method
Thermal	Nominal Value	Unit	Test Method
Vicat Softening Temperature	187	°F	ASTM D1525
Melting Temperature (DSC)	252	°F	Internal Method

Notes

¹ Typical properties: these are not to be construed as specifications.

² Low: <0.25 wt%, Medium 0.25-0.5, High >0.5 wt%