

Maxxam™ FR PE 161-1A

High Density Polyethylene
PolyOne Corporation

Technical Data

Product Description

Maxxam™ FR flame-retardant polyolefin compounds and masterbatches meet stringent flammability performance requirements defined by industry agencies, including Underwriters Laboratories UL 94 V-2, V-0, and 5VA performance ratings. In addition, many compounds in the Maxxam FR portfolio offer elevated Relative Thermal Index (RTI) ratings.

General

Material Status	• Commercial: Active		
Literature ¹	• Technical Datasheet		
UL Yellow Card ²	• E76261-101447929		
Search for UL Yellow Card	• PolyOne Corporation • Maxxam™ FR		
Availability	• Africa & Middle East • Asia Pacific	• Europe • North America	• South America
Features	• Flame Retardant		
RoHS Compliance	• RoHS Compliant		
Forms	• Pellets		

Physical	Nominal Value Unit	Test Method
Specific Gravity	0.998 g/cm³	ASTM D792
Melt Mass-Flow Rate (MFR) ⁴ (190°C/2.16 kg)	0.91 to 2.7 g/10 min	ASTM D1238

Mechanical	Nominal Value Unit	Test Method
Tensile Strength ⁵ (Yield)	20.7 MPa	ASTM D638
Tensile Elongation ⁵ (Break)	500 %	ASTM D638
Flexural Modulus	276 MPa	ASTM D790

Hardness	Nominal Value Unit	Test Method
Durometer Hardness		ASTM D2240
Shore D	66	
Shore D, 10 sec	65	

Thermal	Nominal Value Unit	Test Method
Deflection Temperature Under Load 0.45 MPa, Annealed, 3.18 mm	67.0 °C	ASTM D648

Flammability	Nominal Value Unit	Test Method
Flame Rating (0.750 mm, NC)	V-2	UL 94
Oxygen Index (3.18 mm)	27 %	ASTM D2863

Additional Information

*NOTE: HARDNESS DATA IS BASED ON SINGLE LOT DATA.

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 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.
- ³ Typical properties: these are not to be construed as specifications.
- ⁴ Procedure A
- ⁵ Type I, 51 mm/min