



# UNIVAL™ DMDD-6200 NT 7 High Density Polyethylene Resin

## Overview

- Excellent stress crack resistance and rigidity
- High impact strength
- Moderate swell
- High melt strength
- Complies with:
  - U.S. FDA 21 CFR 177.1520 (c) 3.2a
  - EU, No 10/2011
  - CANADIAN HPFB NO OBJECTION (WITH LIMITATIONS)
  - Consult the regulations for complete details.

UNIVAL™ DMDD-6200 NT 7 High Density Polyethylene (HDPE) Resin is a multi-purpose polymer designed for high speed production of blow molded containers used to package food products, household industrial chemicals (e.g., detergents, bleach, fabric softeners), toiletries and cosmetics (e.g., shampoos, creams, lotions, etc.), health and medicinal aids. In addition, this product can be blow molded into other thin walled parts and houseware items, and also can be extruded into profiles.

## Additive

- Antiblock: No
- Slip: No
- Processing Aid: No

Physical	Nominal Value (English)	Nominal Value (SI)	Test Method
Density	0.953 g/cm <sup>3</sup>	0.953 g/cm <sup>3</sup>	ASTM D792
Melt Index			ASTM D1238
190°C/2.16 kg	0.25 g/10 min	0.25 g/10 min	
190°C/21.6 kg	23 g/10 min	23 g/10 min	
Environmental Stress-Cracking Resistance (ESCR)			ASTM D1693
122°F (50°C), 100% Igepal, F50	50.0 hr	50.0 hr	
Mechanical	Nominal Value (English)	Nominal Value (SI)	Test Method
Tensile Strength			ASTM D638
Yield	3800 psi	26.2 MPa	
Break	3700 psi	25.5 MPa	
Tensile Elongation			ASTM D638
Yield	6.0 %	6.0 %	
Break	900 %	900 %	
Flexural Modulus - 2% Secant	148000 psi	1020 MPa	ASTM D790B
Impact	Nominal Value (English)	Nominal Value (SI)	Test Method
Tensile Impact Strength <sup>1</sup>	100 ft-lb/in <sup>2</sup>	210 kJ/m <sup>2</sup>	ASTM D1822
Hardness	Nominal Value (English)	Nominal Value (SI)	Test Method
Durometer Hardness (Shore D)	59	59	ASTM D2240
Thermal	Nominal Value (English)	Nominal Value (SI)	Test Method
Deflection Temperature Under Load			ASTM D648
66 psi (0.45 MPa), Unannealed	158 °F	70.0 °C	
Brittleness Temperature	< -105 °F	< -76.1 °C	ASTM D746
Vicat Softening Temperature	264 °F	129 °C	ASTM D1525
Melting Temperature (DSC)	270 °F	132 °C	Dow Method
Peak Crystallization Temperature (DSC)	246 °F	119 °C	Dow Method

## Additional Information

Plaque molded and tested in accordance with ASTM D3976.

