



Raw Material Data Sheet

Centennial LLDPE Drip Tube for use in drip and micro irrigation.

DOW DFDA-7510 NT Linear Low Density Polyethylene Resin is produced using UNIPOL™ process technology. It is intended for use in micro irrigation and durable hose applications. It exhibits a combination of outstanding environmental stress cracking resistance, burst strength and good extrusion characteristics.

Centennial LLDPE Drip Tube, DOW DFDA-7510 NT Raw Material Properties

Property	ASTM Test Method	Typical Values	
		English Units	SI Units
Density (l ₂) @190°C/2.16kg, g/10/mi	D 792	-	0.920 g/cc
Melt Index ¹	D 1238	-	0.600
Flow R (l ₂) @190°C/2.16kg, g/10/mi	D 1238	-	44
Tensile Strength			
@ Yield, psi (Mpa)	D 638	1600 psi	11 MPa
@ Break psi (Mpa)	D 638	2250 psi	15.5 MPa
Elongation			
@ Break %	D 638	800%	800%
Flexural Modulus ¹	D 790, psi (Mpa)	45,000	
Brittleness Temperature F ⁰ , °C ²	D 746	<-148° F	<-100° C
Hardness (Shore D)	D 2240	44	44
ESCR, F ⁰ , hours ³	D1693	>500	
Carbon Black Concentration	D 1603	2.30%	2.30%
Cell Classification	D 3350	PE 123110A	PE 123110A

¹ method 1, procedure B

² procedure A

³ condition A

Centennial LLDPE Drip Tube is recommended for normal micro irrigation and drip irrigation applications. Centennial LLDPE Drip Tube is not pressure rated pipe.

Typical quick burst tests reflect the following:

1/2" 250 PSI @ 65-70 seconds

3/4" 218 PSI @ 65-70 seconds

1" 200 PSI @ 65-70 seconds