



## Low density polyethylene (LDPE)

**Lotrène® FE3000**  
**Qatar Petrochemical Company, Qatar**

### PROPERTIES

<b>Description</b>	Lotrène® FE3000 is an additive free grade produced by a tubular high pressure process mainly recommended for heavy duty film applications. Lotrène® FE3000 is offering high strength combined with good optical properties. Lotrène® FE3000 has a molecular structure allowing to produce films with excellent optical properties, very good shrink properties and good mechanical properties.
<b>Applications</b>	Heavy duty bags, industrial shrink film, construction film, agricultural film.
<b>Processing</b>	Lotrène® FE3000 can be easily processed on all types of extruders designed for polyethylene. The melt temperature is suggested to be in the range of 180-210 °C. The best and balanced properties of the blown film are achieved at blow up ratios between 2.0: 1 and 3.5:1. The recommended thickness range is from 40 µm to 200 µm.
<b>Additives</b>	NO.

<b>Melt Flow Index</b>	g/10min	<b>0.30</b>	ASTM D-1238
<b>Density @ 23 °C</b>	g/cm <sup>3</sup>	<b>0.923</b>	ASTM D-792
<b>Crystalline Melting Point</b>	°C	<b>112</b>	ASTM E-794
<b>Vicat Softening Point</b>	°C	<b>99</b>	ASTM D-1525
<b>Tensile Strength @ Yield MD/TD</b>	MPa	<b>12/126</b>	ASTM D-882
<b>Tensile Strength @ Break MD/TD</b>	MPa	<b>35/29</b>	ASTM D-882
<b>Elongation @ Break MD/TD</b>	%	<b>400/600</b>	ASTM D-882
<b>Tear resistance MD/TD</b>	N/mm	<b>47/47</b>	ASTM D-1922
<b>Impact Strength, F 50</b>	g	<b>150</b>	ASTM D-1709
<b>Puncture Force</b>	N	<b>62</b>	Internal Method
<b>Coefficient Of friction</b>		<b>0.75</b>	ASTM D-1894
<b>Haze</b>	%	<b>8</b>	ASTM D-1003
<b>Gloss (@ 45)</b>		<b>56</b>	ASTM D-2457

*These are typical properties: not to be construed as specification.*