



**Persian**Petro

# HDPE Products

## Product Capacity of HDPE plant

GRADES	PROPERTY	MFR (190°C/2.16 kg)	Density
	UNIT	(g/10 min).	g/l
	ASTM METHOD	D 1238	ISO 1183
	INTERNAL METHOD	17066	
<b>1. INJECTION MOLDING</b>			
HC 7260	for transport and stacking bottle crates, particularly bottle crates	23±3	0.957±0.002
HC 7260 *	for transport and stacking bottle crates, particularly bottle crates	23±3	0.960±0.002
HD 7255	for thick walled highly stressed transport container, e.g. refuse bins and fish crates	11±2	0.954±0.002
HD 7255*	for thick walled highly stressed transport container, e.g. refuse bins and fish crates	11±2	0.954±0.002
<b>2. SMALL BLOW MOLDING</b>			
Available > HF 4750	for disinfectant bottles up to 2 liters, tubes for cosmetics, containers up to 10 liters and petrol cans up to 5 liters	1.1±0.3	0.944±0.002
HF 4760 (BL3)	for container with capacities ranging from a few ml up to 10 liters, also for production of sheets for thermoforming	1.2±0.3	0.954±0.002
HH 4765	for hollow articles where high stress cracking resistance is not demanded, such as bottles and caisters up to 10 liters, e.g. for fabric softeners	1.5±0.3	0.959±0.002+
<b>3. LARGE BLOW MOLDING</b>			
Available > HM 8355	general-purpose grade for large containers	0.25±0.06	0.951±0.002
<b>4. STRETCHED TAPE (RAFFIA)</b>			
HF 7740 F	stretched films and tapes for production of high-strength knitted and woven	1.8±0.3	0.944±0.002
HF 7740 F2	tapes to be used for agricultural packagings and as protective cover	1.8±0.3	0.944±0.002
<b>5. MONOFILAMENT</b>			
HF 7750 M	production of monofilaments with high tensile strength	2.5±0.3	0.956±0.002
HF 7750 M2	monofilaments for fishing notes, geo textiles and civil engineering	3.3±0.3	0.956±0.002

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<b>6. CABLE</b>				
HF 4750 K	cable insulation	3.5±0.5	0.946±0.002	
<b>7. PIPE(NATURAL/COLOR)</b>				
Available ▶	HM 5010 T2 N	pressure pipes, e.g. drinking-water and gas pipes,waste pipes and sewer pipes,their fittings and also sheets(UV stabilization and pigments during processing)	0.45±0.06	0.945±0.002
	HM 5010 T3 N	high-quality PE 80 pressure pipes for gas and water transportation(UV stabilization and pigments during processing)	0.43±0.03	0.944±0.002
	HM 5010 T3 Black	high-quality PE 80 pressure pipes for gas and water transportation(UV stabilization and pigments during processing) top quality PE 100 pressure pipes for gas and water transportation at higher pressures or with thinner walls as PE 80 (UV stabilization and/or pigments during precessing)	0.43±0.03	0.954±0.002
Available ▶	HM CRP 100 N	top quality PE 100 pressure pipes for gas and water transportation at higher pressures or with thinner walls as PE 80 (UV stabilization and/or pigments during precessing)	0.22±0.03	0.948±0.002
Available ▶	HM CRP 100 Black	top quality PE 100 pressure pipes for gas and water transportation at higher pressures or with thinner walls as PE 80 (UV stabilization and/or pigments during precessing)	0.22±0.02	0.957±0.002
	HM CRP 100 Blue	top quality PE 100 pressure pipes for gas and water transportation at higher pressures or with thinner walls as PE 80 (UV stabilization and/or pigments during precessing)	0.22±0.02	0.948±0.002
	HM CRP 100 O/Y	top quality PE 100 pressure pipes for gas and water transportation at higher pressures or with thinner walls as PE 80 (UV stabilization and/or pigments during precessing)	0.22±0.02	0.949±0.002
<b>8. FILM</b>				
	HM 9455 F	for blown films with paperlike quality,suitable for counter bags,carrier bags and wrapping films,excellent processing	0.28±0.05	0.956±0.002
Available ▶	HM 9450 F	for blown films with paperlike quality,suitable for counter bags,carrier bags and wrapping films,excellent processing	0.28±0.05	0.949±0.002
	HM 9450 F1	for blown films with paperlike quality,suitable for counter bags,carrier bags and wrapping films,excellent processing and sealability	0.22±0.05	0.950±0.002
	HM 9455 F1	for blown films with paperlike quality,suitable for counter bags,carrier bags and wrapping films,excellent processing	0.22±0.05	0.957±0.002
	HM 9445 HT	for blown films with paperlike quality,suitable for counter bags,carrier bags and wrapping films,excellent processing	0.18±0.03	0.944±0.002

**> HDPE made via Hostalen Process**



## HF-4760 (BL3)

HF-4760 (BL3) is a blow molding grade resin which is manufactured by suspension polymerization of ethylene monomer. HF-4760 (BL3) is a bi-modal high density polyethylene with 1-Butene as co monomer.

**HDPE: HF-4760(BL<sub>3</sub>)**

**Density: 0.942-0.956 g/cm<sup>3</sup>**

**MFR 190/5: 0.9-1.5**

### Characteristic Properties



- High density and Stiffness, good flowability and impact strength and good Stress Cracking resistance.

### Main Applications



- For container with capacities ranging from a few ml up to 10 liters, also for production of sheets for thermoforming.

### Additives



- Antioxidant / Process stabilizer
- Lubricant / acid scavenger

**Material properties** (This data are typical values and are not to be construed as product specifications.)

Resin Properties	Unit	Typical Value	Test Method
Melt Index(21.6)	(g/10 min)	23	ISO 1133
Melt Index(5)	(g/10 min)	1.2	ISO 1133
FRR (21.6/5)		19	
Density	g/cm <sup>3</sup>	0.954	ISO 1183
Moulded Properties	Unit	Typical Value	Test Method
Notched Impact @ 23 °C	mJ/mm <sup>2</sup>	9	ISO 179/ 1 eA

➤ *HDPE made via Hostalen Process*



## HM-8355 (BL4)

HM-8355(BL4) is a Blow molding grade resin which is manufactured by suspension polymerization of ethylene monomer. HM-8355 (BL4) is a bi-modal high density polyethylene with Butene-1 as co monomer with general purpose of large container.

**HDPE: HM-8355(BL4)**

### Characteristic Properties



- High molar mass, easily process-able high stiffness strength, good stress Cracking resistance and very good molding surface finish.

**Density: 0.949-0.953 g/cm<sup>3</sup>**

### Main Applications



- General purpose grade for large container.

**MFR 190/5: 0.29-0.41**

### Additives



- Antioxidant / Process stabilizer
- Lubricant / acid scavenger

**Material properties** (This data are typical values and are not to be construed as product specifications.)

Resin Properties	Unit	Typical Value	Test Method
Melt Index(21.6)	(g/10 min)	9.5	ISO 1133
Melt Index(5)	(g/10 min)	0.35	ISO 1133
FRR (21.6/5)		27	
Density	g/cm <sup>3</sup>	0.951	ISO 1183
Swell Ratio	%	110	
Moulded Properties	Unit	Typical Value	Test Method
Notched Impact @ 23 °C	mJ/mm <sup>2</sup>	10	ISO 179/ 1 eA

➤ HDPE made via Hostalen Process



## HM-5010T2N (EX3)

HM-5010T2N (EX3) is a pipe grade resin which is manufactured by the suspension polymerization of ethylene monomer. HM-5010T2N (EX3) is a bi-model high density polyethylene with 1-Butene as co monomer.

**HDPE: HM-5010T2N (EX<sub>3</sub>)**

**Density: 0.943-0.947 g/cm<sup>3</sup>**

**MFR 190/5: 0.39-0.51**

### Characteristic Properties



- Tough and rigid pipe resin.

### Main Applications



- Pressure pipes, e.g. drinking-water and gas pipes, waste pipes and sewer pipes, their fittings and also sheets (UV stabilization and pigments during processing)

### Additives



- Antioxidant / Process stabilizer
- Lubricant (processing aid) / acid scavenger

**Material properties** (This data are typical values and are not to be construed as product specifications.)

Resin Properties	Unit	Typical Value	Test Method
Melt Index (21.6)	(g/10 min)	12	ISO 1133
Melt Index (5)	(g/10 min)	0.45	ISO 1133
FRR (21.6/5)		27	
Density	g/cm <sup>3</sup>	0.945	ISO 1183
Moulded Properties	Unit	Typical Value	Test Method
Notched Impact @ 23 °C	mJ/mm <sup>2</sup>	12	ISO 179/ 1 eA
Mechanical Properties	Unit	Typical Value	Test Method
Hydrostatic Strength (80 °C)	h	(4.0 N/mm <sup>2</sup> ) 1000	ISO 1167

➤ HDPE made via Hostalen Process



## HMCRP 100N (PE100)

-M-CRP100N (PE100) is a natural pipe grade resin which is manufactured by suspension polymerization of ethylen monomer, HM-CRP100N (PE100) is a bi-model high density polyethylene with 1-Butene as co monomer.

**HDPE: HMCRP 100 N (PE100)**

**Density: 0.946-0.950 g/cm<sup>3</sup>**

**MFR 190/5: 0.19-0.25**

### Characteristic Properties



- Natural PE100 pipe resin.

### Main Applications



- Top quality PE100 pressure
- Pipes for gas and water transportation at higher pressures or with thinner walls as PE80 (UV stabilization and/ or pigments during precessing)

### Additives



- Antioxidant / Process stabilizer
- Lubricant (processing aid)/ acid scavenger

**Material properties** (This data are typical values and are not to be construed as product specifications.)

Test/Composition	Typical Value	Unit	ASTM Method
Density	0.948	g/ml <sup>3</sup>	ISO1183
FRR 21.6/5	28		
Hydrostatic Strength (80°C)	5000 (4.5N/mm <sup>2</sup> )	h	ISO1167
MFR190°/21.6	6.2	(g/10 min)	ISO1133
MFR190°/5	0.22	(g/10 min)	ISO1133
Notched Impact (23°C)	24	mJ/mm <sup>2</sup>	ISO179/1eA

- Test specimen from compression moulded sheet at 23°C.
- FRR values are statistical and calculated by dividing MFR values.
- Notch Impact Test specimen from compressed moulded sheet 23°C and The data quoted are average values .



➤ **HDPE made via Hostalen Process**



## HM CRP 100 Black

HM-CRP100 Black is a black pipe grade resin (PE100) which is manufactured by suspension polymerization of ethylene monomer. HM-CRP100 Blue is a bi-model high density polyethylene with 1-Butene as co monomer.

**HDPE: HM CRP 100 Black  
(PE100 Black)**

### Characteristic Properties



- Black PE100 resin

**Density: 0.955-0.959 g/cm<sup>3</sup>**

### Main Applications



- Top quality PE100 pressure pipes for gas and water transportation at higher pressures or with thinner walls as PE80

**MFR 190/5: 0.20-0.24**

### Additives



- Antioxidant/Process stabilizer
- Lubricant (processing aid)/acid scavenger
- Carton Black

**Material properties** (This data are typical values and are not to be construed as product specifications.)

Test/Composition	Typical Value	Unit	ASTM Method
Density	0.947	g/ml <sup>3</sup>	ISO1183
FRR 21.6/5	28		
Hydrostatic Strength (80°C)	5000 (4.5N/mm <sup>2</sup> )	h	ISO1167
MFR190°/21.6	6.2	(g/10 min)	ISO1133
MFR190°/5	0.22	(g/10 min)	ISO1133
Notched Impact (23°C)	24	mJ/mm <sup>2</sup>	ISO179/1eA

- Test specimen from compression moulded sheet at 23°C.
- FRR values are statistical and calculated by dividing MFR values
- Test specimen from compressed moulded sheet 23 C sheet 23 °C
- The data quoted are average values
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**HDPE made via Hostalen Process**


# HM9450F (EX5)

HM-9450F (EX5) is blown film grade resin which is manufactured by suspension polymerization of ethylen monomer. HM-9450F (EX5) is a bi-model high density polyethylene with 1-Butene as co monomer.

**HDPE: HM9450F (EX5)**
**Density: 0.947-0.951 g/cm<sup>3</sup>**
**MFR 190/5: 0.23-0.33**
**Characteristic Properties**


- High molar mass film grade, good stiffness and tenacity

**Main Applications**


- For blown films with paperlike quality, suitable for counter bags, carrier bags and wrapping films, excellent processing.

**Additives**


- Antioxidant / Process stabilizer
- Lubricant (processing aid)/ acid scavenge

**Material properties** (This data are typical values and are not to be construed as product specifications.)

Test/Composition	Typical Value	Unit	Method
Density	0.949	g/cm <sup>3</sup>	ISO1183
Fish Eye Note	≤3	note	Internal
FRR 21.6/5	29		
MFR 190°/21.6	8.0	g/10min	ISO1133
MFR190°/5	0.28	g/10min	ISO1133

- Test specimen from compression moulded sheet at 23°C.
- FRR values are statistical and calculated by dividing MFR values.
- Notch Impact Test specimen from compressed moulded sheet 23°C and The data quoted are average values