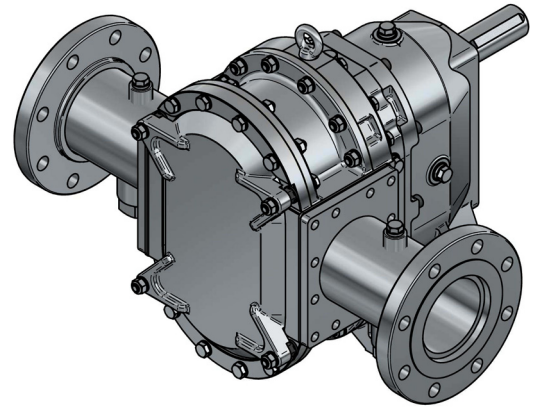




# M50



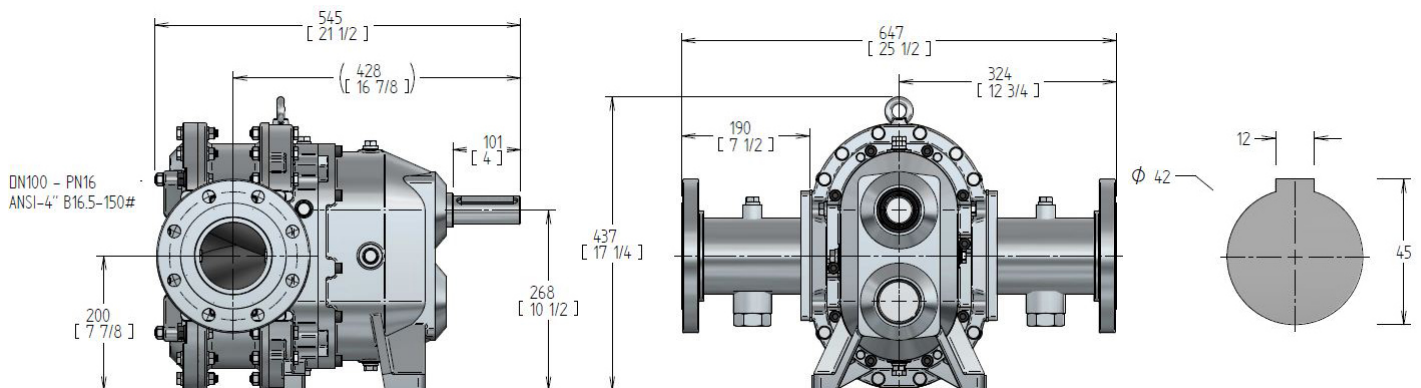
SPECIFICATIONS	US	Metric
Rated Capacity:	0-300 gpm	0-68 m <sup>3</sup> /h
Displacement (per 100 revolutions):	50 gal (US)	189 L
Maximum Continuous Pressure:	125 psi	8.6 bar
Starting Torque:	1,273 in lbf	144 N m
Rated Speed:	0-600 RPM	0-600 RPM
Shaft Diameter:	1.65"	42 mm
Flange Connection Class:	ANSI 16.5-150#	DN – PN 16
Flange Connection Size:	ANSI 4"	DN 100
Weight:	290 lbs	132 kg
Solids Handling:		
Spherical Compressible	1.5"	38 mm
Spherical Hard*	1/8"	3 mm

\* Larger hard solids will pass through but may cause damage.

## Positive Displacement Rotary Lobe Pumps

MODEL >	SM50	CM50	DM50
Service	Sludge, Mud and Slurries*	Chemical/Corrosive	Oil, Gas & Abrasives
<b>WETTED PARTS</b>			
<b>Rotary Lobes</b>			
Elastomer	NBR Opt. HNBR, FKM, EPDM or Eng. Rec.	FKM or HNBR Opt. NBR, EPDM or Eng. Rec.	FKM or HNBR Opt. NBR, EPDM or Eng. Rec.
Lobe Profile	Helix	Helix	Helix
Number of lobe wings	4	4	4
Core	Carbon Steel	Carbon Steel	Carbon Steel
<b>Sealing Elastomers</b>			
O-rings	FKM	FKM or Engineer Recommendation	FKM or Engineer Recommendation
Lip seals	FKM or Engineer Recommendation	FKM or Engineer Recommendation	FKM or Engineer Recommendation
<b>Mechanical Seals</b>			
Mechanical Seal	Duronit	Silicon Carbide	Silicon Carbide
Seal Holders	Opt. Tungsten Carbide, Silicon Carbide, or Eng. Rec. Carbon Steel with Corrosion resistant coating	Opt. Tungsten Carbide or Engineer Rec. Stainless Steel Type 316	Opt. Tungsten Carbide or Engineer Rec. Duplex Stainless Steel
<b>Wear Plates</b>			
Wear Plates	AR500 Steel (Brinell 500)	Duplex Stainless Steel	Duplex Stainless Steel
<b>Housing Segments</b>			
Housing Segments	ASTM A48 Grey Iron rust primed	Stainless Steel Type 316 or Duplex	Duplex Stainless Steel
<b>Flange Ring</b>			
Flange Ring	ASTM A36 Carbon Steel	Stainless Steel Type 316L	Duplex Stainless Steel
<b>Bolts</b>			
Bolts	Carbon Steel ISO 898-I	Stainless Steel A2-A4	Duplex Stainless Steel
<b>Pressure Disc</b>			
Pressure Disc	Stainless Steel Type 316L	Stainless Steel Type 316L	Duplex Stainless Steel
<b>LIMITED EXPOSURE PARTS</b>			
Quench /Seal Cooling Chamber	ASTM A48 Grey Iron rust primed	ASTM A48 Grey Iron with PTFE / Ceramic Teflon etched on face	ASTM A48 Grey Iron with PTFE / Ceramic Teflon etched on face
Pump Cover	ASTM A48 Grey Iron rust primed	ASTM A48 Grey Iron Opt. 316 Stainless Steel	ASTM A48 Grey Iron Opt. Duplex Stainless Steel
<b>NON-WETTED PARTS</b>			
Gears	GMA Class 9 AISI 1045 steel	GMA Class 9 AISI 1045 steel	GMA Class 9 AISI 1045 steel
Gear Housing	ASTM A48 Grey Iron rust primed	ASTM A48 Grey Iron rust primed	ASTM A48 Grey Iron rust primed
Shaft	AISI 4140 Alloy Steel	AISI 4140 Alloy Steel	AISI 4140 Alloy Steel
<b>PAINTING REQUIREMENTS</b>			
Standard Painting	SSPC/SP6 Sandblast Paint LobePro Blue	SSPC/SP6 Sandblast Paint LobePro Silver	SSPC/SP6 Sandblast Paint LobePro Silver

**NOTE:** Listed above are standard pump assemblies; lobe styles and materials subject to recommendation by LobePro Engineering. A wide range of optional materials are available for each model. Consult LobePro for further information. \*Consult Factory for application temperature above 80°C (175°F).



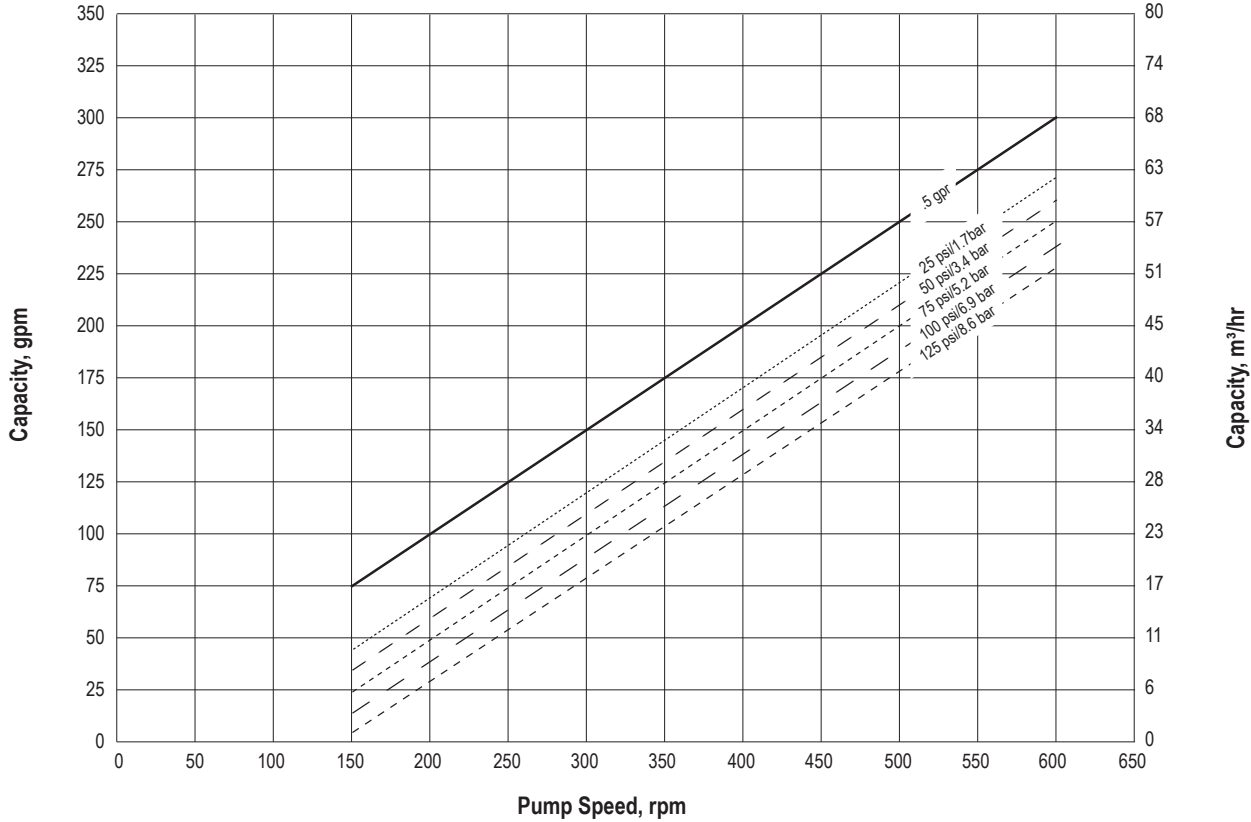
**Section 40-15**

16 April 2018

**M50 CURVES**

**Performance Curve - NBR Lobes\***

Based on 70°F (21°C) fresh water (1 cp) at Sea Level.  
Output will increase as viscosity of the fluid increases from 1.



\*Note: Output from lobes coated with elastomers other than NBR maybe lower. Contact Engineering for further information.

**Horsepower Requirements**

