

## POWER SECTION

**Model No: AT962675.0**

Revised: 9/24/2020

Rotor Specifications	
	inches
Overall Length	202.00
Contour Length	195.00
Major Diameter	6.403
Eccentricity	0.428
Head diameter	5.500
Thread Form	4.00 API FH
Weight	1378 lbs
Material	17-4 PH <sup>1</sup>

Stator Specifications	
	inches
Overall Length	218.00
Tube OD	9.63
Tube ID	7.88
Rubber Cutback Top/End	8.00 / 8.00
Weight	1676 lbs
Number of Stages	5.0
Tube Material	4140/4142 Alloy Steel
Rubber Options	NBR-HPW & NBR-HPO

NBR-HPW (in)		Fits (+ Compression / - Loose)				
Size	Minor <sup>2</sup>	75 °F	125 °F	175 °F	250 °F	300 °F <sup>3</sup>
.5 US						
STD	5.536	0.011	0.035	0.058	0.094	0.117
.5 OS	5.556	-0.009	0.015	0.038	0.073	0.096
1.0 OS	5.575	-0.028	-0.004	0.019	0.053	0.076
1.5 OS						
2.0 OS						
2.5 OS						

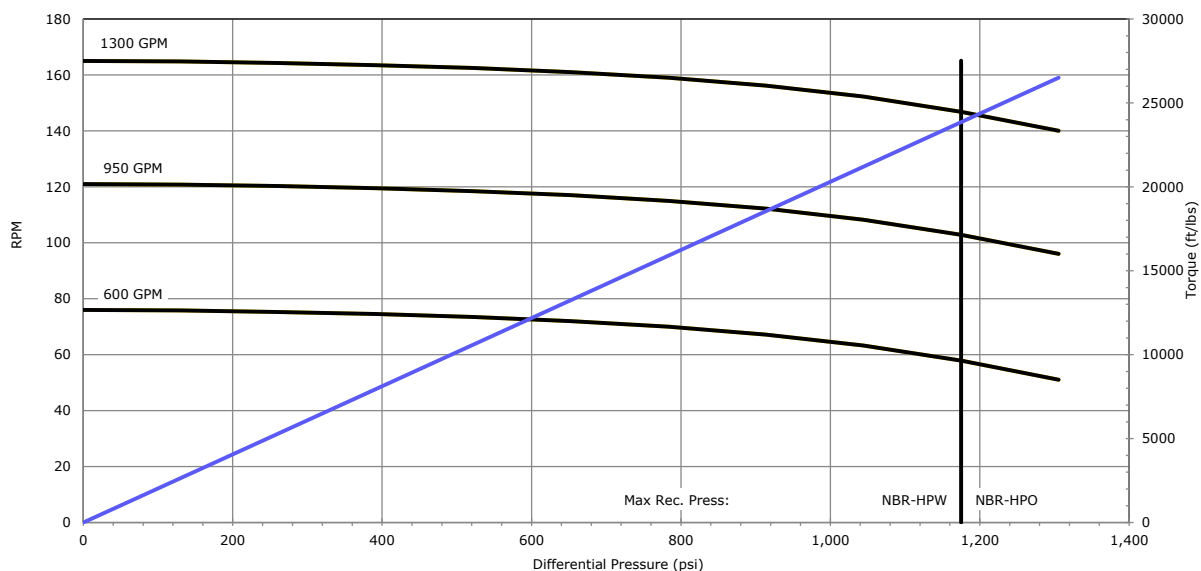
NBR-HPO (in)		Fits (+ Compression / - Loose)				
Size	Minor <sup>2</sup>	75 °F	125 °F	175 °F	250 °F	300 °F <sup>3</sup>
.5 US						
STD	5.536	0.011	0.035	0.058	0.094	0.117
.5 OS	5.556	-0.009	0.015	0.038	0.073	0.096
1.0 OS	5.575	-0.028	-0.004	0.019	0.053	0.076
1.5 OS						
2.0 OS						
2.5 OS						

Performance Specifications	
Flow Range (gpm)	600 - 1300
Speed Range (rpm)	80 - 170
Torque Slope (ft-lb/psi)	20.30
Rotation (rev/gal)	0.127
Off Bottom Pressure (psi)	140

Performance Details		NBR-HPW	NBR-HPO
Max Diff Press (psi)		1180	1180
Stall Diff Press (psi)		1860	1860
Max Torque (ft-lb)		23860	23860
Stall Torque (ft-lb)		37570	37570

■ (NBR-HPW/HPO)

■ Torque



<sup>1</sup> Coating options of chrome or tungsten carbide are available <sup>2</sup> Vector Gauge Readings at Room Temp 75°F <sup>3</sup> BHCT Exceeding 320°F will void warranty for NBR-HPW/HPO.

Performance curves are based on new rotor and stator dimensions and for reference only. Actual performance may vary depending on fit and drilling conditions. The stall torque may exceed that specified for the connected components. Operating over the recommended limits may result in damage to the power section and connected components. Please visit [www.AbacoDrilling.com](http://www.AbacoDrilling.com) for the latest specification revisions.

### LOCATIONS

US: Headquarters 713 Northpark Central Dr., #400 Houston, TX 77073 - Tel: (281) 869-0700 - Fax: (281) 869-0701  
 US: Sales & Distribution 11308 West Interstate 20 East, Odessa, TX 79765 - Tel: (432) 248-1814  
 CANADA: Stator Manufacturing 6303-39th Street Leduc, Alberta T9E 0Z3 Canada - Tel: (780) 986-8947 - Fax: (780) 986-8842  
 DUBAI UAE: Stator Manufacturing Oilfields Supply Center B#57, Jebel Ali, Dubai UAE, P.O. Box 19909 - Tel: 971-4-870-8600

## POWER SECTION - METRIC

**Model No: AT962675.0**

Revised: 9/24/2020

Rotor Specifications	
	mm
Overall Length	5130.8
Contour Length	4953.0
Major Diameter	162.64
Eccentricity	10.86
Head diameter	139.70
Thread Form	4.00 API FH
Weight	625 kg
Material	17-4 PH <sup>1</sup>

Stator Specifications	
	mm
Overall Length	5537.2
Tube OD	244.5
Tube ID	200.2
Rubber Cutback Top/End	203.0 / 203.0
Weight	760 kg
Number of Stages	5.0
Tube Material	4140/4142 Seamless Alloy Steel
Rubber Options	NBR-HPW & NBR-HPO

NBR-HPW (mm)		Fits (+ Compression / - Loose)				
Size	Minor <sup>2</sup>	25 °C	75 °C	100 °C	125 °C	150 °C <sup>3</sup>
.5 US						
STD	140.61	0.29	1.36	1.90	2.44	2.97
.5 OS	141.12	-0.22	0.85	1.38	1.91	2.44
1.0 OS	141.61	-0.70	0.36	0.88	1.41	1.94
1.5 OS						
2.0 OS						
2.5 OS						

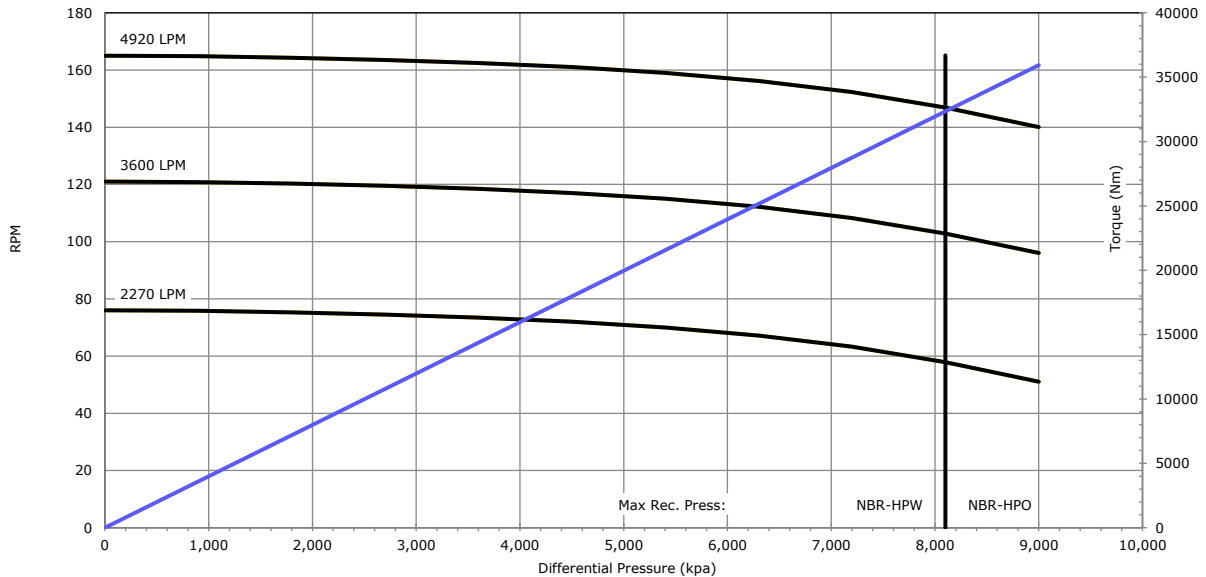
NBR-HPO (mm)		Fits (+ Compression / - Loose)				
Size	Minor <sup>2</sup>	25 °C	75 °C	100 °C	125 °C	150 °C <sup>3</sup>
.5 US						
STD	140.61	0.29	1.36	1.90	2.44	2.97
.5 OS	141.12	-0.22	0.85	1.38	1.91	2.44
1.0 OS	141.61	-0.70	0.36	0.88	1.41	1.94
1.5 OS						
2.0 OS						
2.5 OS						

Performance Specifications	
Flow Range (lpm)	2270 - 4920
Speed Range (rpm)	80 - 170
Torque Slope (Nm/kpa)	3.99
Rotation (rev/Liter)	0.0335
Off Bottom Pressure (kpa)	990

Performance Details		
	NBR-HPW	NBR-HPO
Max Diff Press (kpa)	8200	8200
Stall Diff Press (kpa)	12800	12800
Max Torque (Nm)	32400	32400
Stall Torque (Nm)	51000	51000

■ (NBR-HPW/HPO)

■ Torque



<sup>1</sup> Coating options of chrome or tungsten carbide are available <sup>2</sup> Vector Gauge Readings at Room Temp 25°C <sup>3</sup> BHCT Exceeding 160°C will void warranty for NBR-HPW/HPO.

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