WHITE HYDRAULICS

•Features

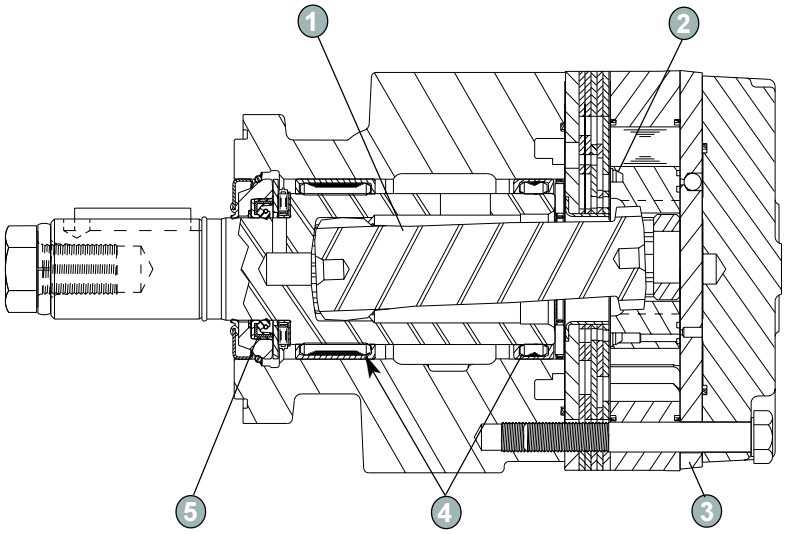
1. **Heavy-Duty Drive Link** is most durable in its class and receives full flow lubrication to provide long life.

2. **Valve-In-Rotor Design** provides cost effective, efficient distribution of oil and reduces overall motor length.

3. **Pressure-Compensated Balance Plate** improves volumetric efficiency at low flows and high pressure.

4. **Three Bearing Options** allow load carrying capability of motor to be matched to application.

5. **High Pressure Viton® Shaft Seal** offers superior seal life and performance and eliminates need for case drain.



Dependable Power, Affordable Price

The RE Series motors offer the perfect compromise between price and performance by producing work horse power at a reasonable cost. Although these motors perform well in a wide range of applications, they are especially suited for low flow, high pressure applications. During startup, pressure causes the balance plate to flex toward the rotor, vastly improving volumetric efficiency. As the motor reaches operating pressure, the balance plate relaxes, allowing the rotor to turn freely which translates into higher mechanical efficiencies. Transmitting this power to the output shaft is the most durable drive link in its class. Three bearing options, combined with standard mounting flanges and output shafts, allow the motor to be configured to suit nearly any application.

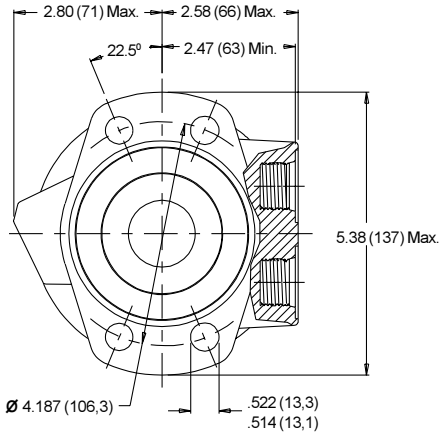
Specifications

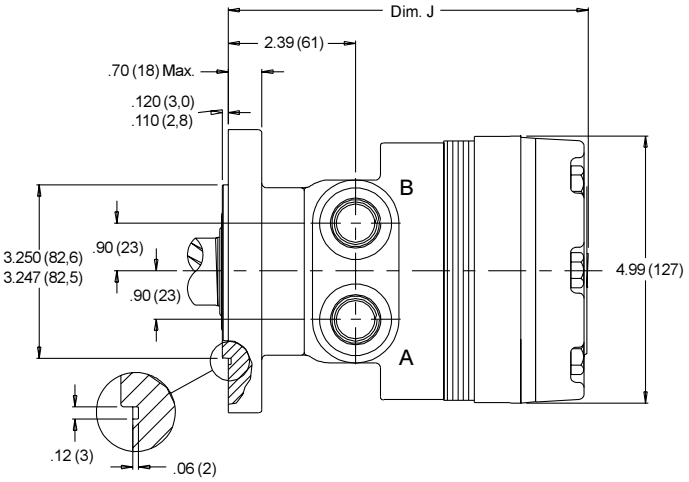
Code	Displacement in ³/rev (cc)	Max Speed RPM		Max Flow GPM (LPM)		Max Torque lb-in (Nm)			Pressure ΔPSI(ΔBar)		
		Cont.	Inter.	Cont.	Inter.	Cont.	Inter.	*Stall	Cont.	Inter.	Peak
120	7.4 (121)	360	490	12 (45)	16 (61)	2900 (327)	3400 (383)	2240 (253)	3000 (207)	3500 (241)	4000 (276)
160	9.9 (162)	370	470	16 (61)	20 (76)	4200 (475)	4800 (542)	3100 (350)	3000 (207)	3500 (241)	4000 (276)
200	12.4 (204)	300	370	18 (68)	22 (83)	4800 (542)	5600 (633)	4200 (475)	3000 (207)	3500 (241)	4000 (276)
230	14.2 (232)	260	320	18 (68)	22 (83)	5700 (644)	6300 (712)	4905 (554)	3000 (207)	3500 (241)	4000 (276)
260	15.9 (261)	260	350	20 (76)	24 (91)	6300 (712)	7000 (791)	5345 (604)	3000 (207)	3500 (241)	4000 (276)
300	18.3 (300)	250	320	22 (83)	25 (95)	7300 (825)	8300 (938)	6095 (689)	3000 (207)	3500 (241)	4000 (276)
350	21.2 (348)	220	270	22 (83)	25 (95)	8150 (921)	9250 (1045)	6290 (711)	3000 (207)	3500 (241)	4000 (276)
375	22.8 (375)	200	250	20 (76)	24 (91)	8900 (1006)	10250 (1158)	7600 (859)	3000 (207)	3500 (241)	4000 (276)
470	28.3 (465)	160	200	20 (76)	24 (91)	9700 (1096)	10475 (1184)	8040 (909)	2500 (172)	2750 (189)	3000 (207)
540	32.7 (536)	140	170	20 (76)	24 (91)	8700 (983)	11000 (1243)	7260 (820)	2000 (138)	2500 (172)	3000 (207)
750	45.6 (748)	100	130	20 (76)	24 (91)	9400 (1062)	10950 (1237)	7905 (893)	1500 (103)	1750 (121)	2000 (138)

* Stall torque measured at 1 RPM at continuous pressure per SAE J746b.

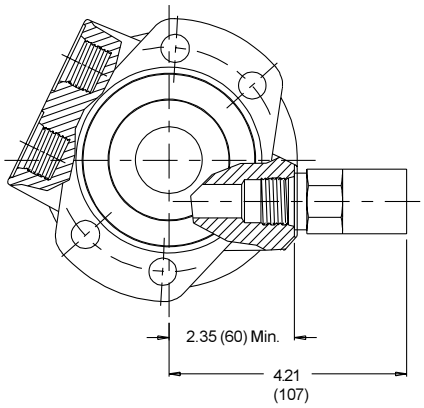
•Housings
SAE "A" Flange

A31	4-Hole Front Aligned Ports 7/8" O-Ring
A38	4-Hole Front Aligned Ports 1/2" BSP.F

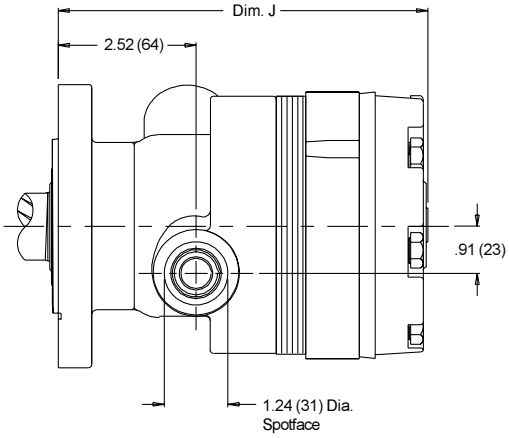




Optional Relief Cartridge shown installed and is available for both the A31 and A38 housings.

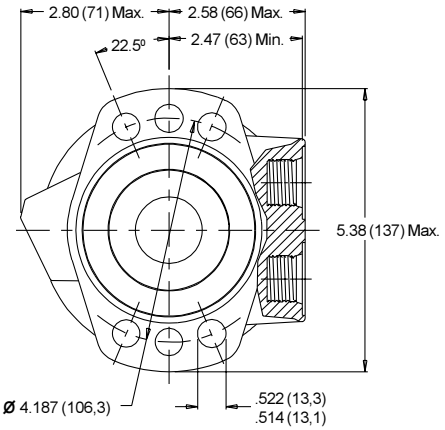


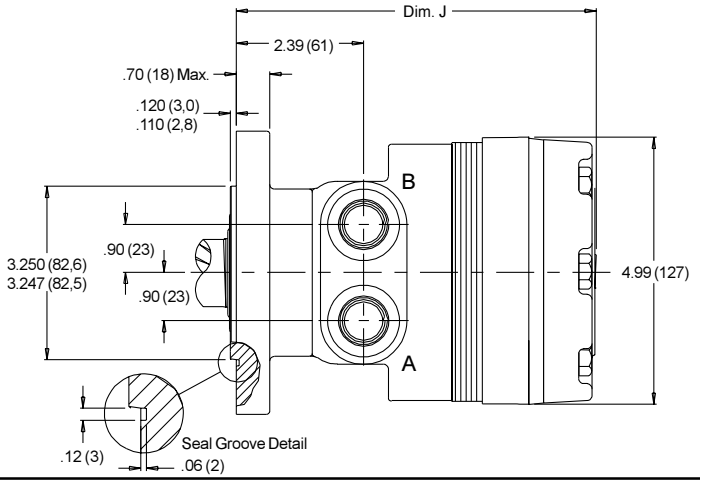
Valve Cavity - 10 Series/2-way (7/8-14 UNF-2B)



Dim J is on page 13

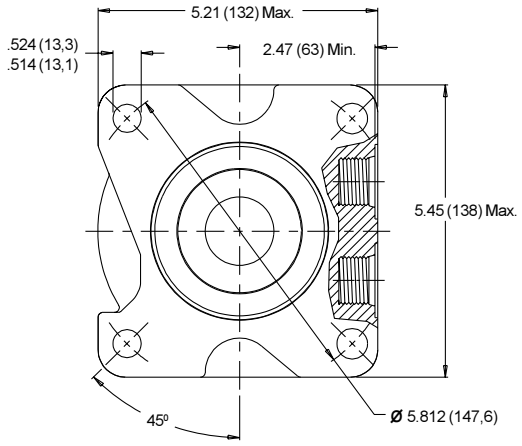
A51	6-Hole Front Aligned Ports 7/8" O-Ring
A58	6-Hole Front Aligned Ports 1/2" BSP.F

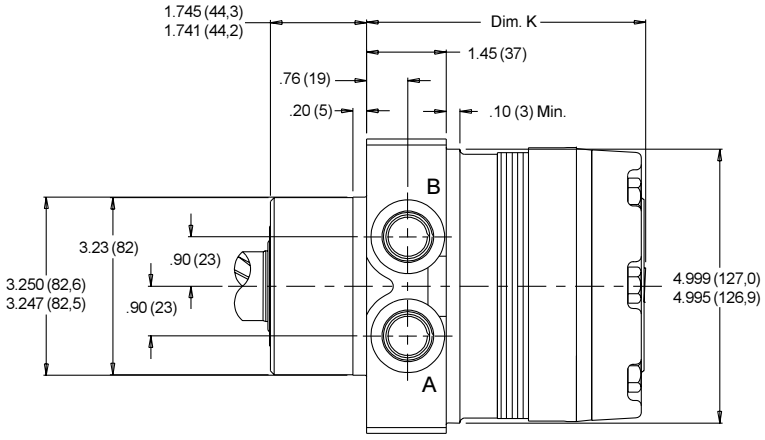




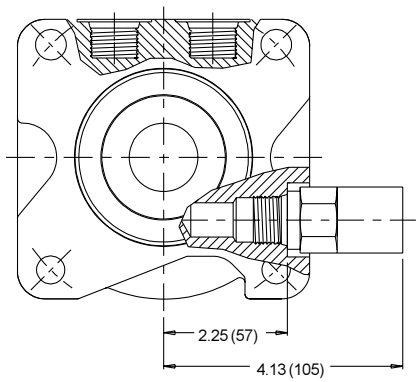
•Housings
Wheel Mount

W31	4-Hole Front Aligned Ports 7/8" O-Ring
W38	4-Hole Front Aligned Ports 1/2" BSP.F

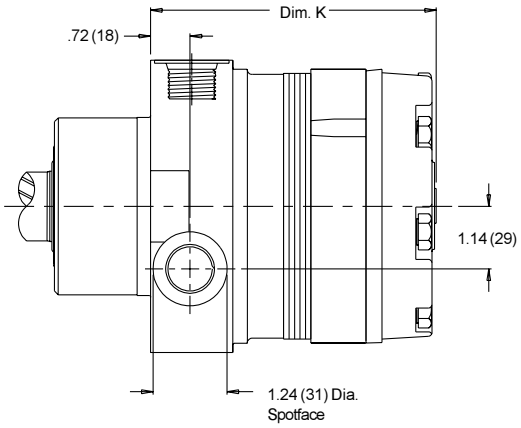




Optional Relief Cartridge shown installed and is available for both the W31 and W38 housings.



Valve Cavity - 10 Series/2-way (7/8-14 UNF-2B)

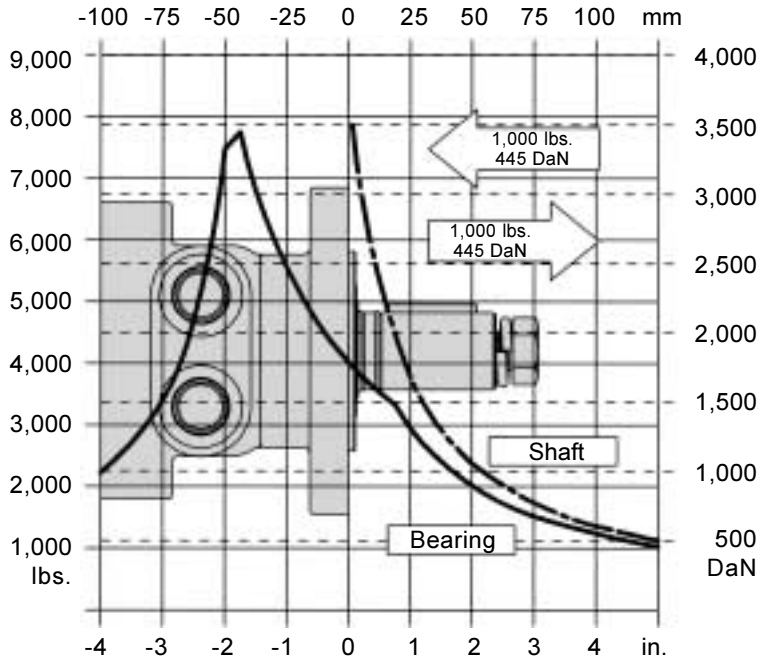


Allowable Bearing And Shaft Loading

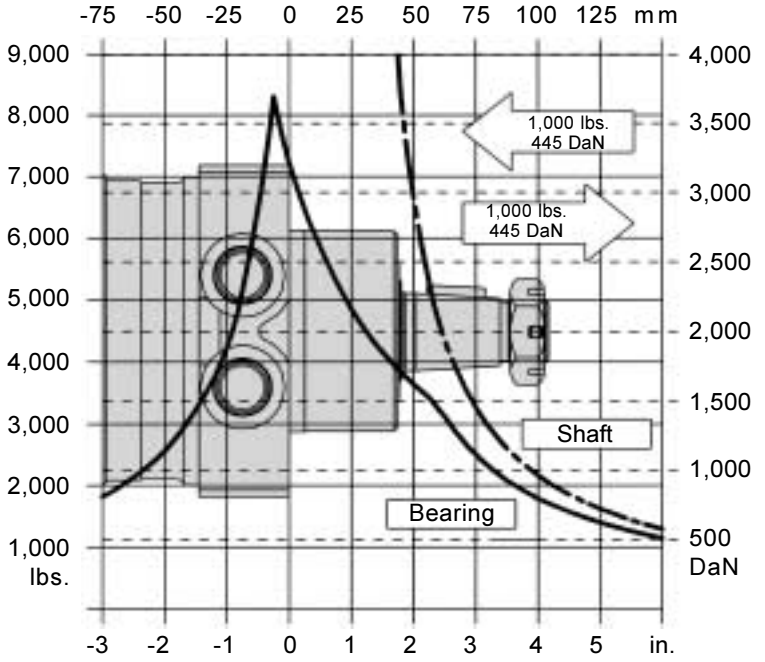
Bearing Curve: The bearing curve represents allowable bearing loads based on ISO 281 bearing capacity for an L_{10} life of 2000 hours at 100 RPM. Radial loads for speeds other than 100 RPM may be calculated using the multiplication factor table below.

Shaft Curve: The shaft curve represents a 3:1 safety factor based on a tensile strength of 330 kpsi.

"A" Style Flange



Wheel Mount



Length and Weight Tables

"A" Style Flange

Disp. Code	Dim. J in (mm)	Weight lbs (kg)
120	6.37 (162)	23.4 (10,6)
160	6.37 (162)	23.4 (10,9)
200	6.51 (165)	24.2 (11,0)
230	6.61 (168)	24.4 (11,1)
260	6.70 (170)	25.0 (11,3)
300	6.83 (174)	25.8 (11,7)
350	7.38 (187)	28.2 (12,8)
375	7.08 (180)	27.0 (12,2)
470	7.38 (187)	28.2 (12,8)
540	7.62 (194)	29.4 (13,3)
750	8.33 (212)	32.5 (14,7)

RE motor weights vary ± 1 lb (.45 kg) depending upon motor configuration.

Wheel Mount

Disp. Code	Dim. K in (mm)	Weight lbs (kg)
120	4.72 (120)	25.8 (11,7)
160	4.72 (120)	25.8 (11,7)
200	4.86 (123)	26.6 (12,1)
230	4.95 (126)	26.8 (12,2)
260	5.05 (128)	27.4 (12,4)
300	5.18 (132)	28.2 (12,8)
350	5.73 (146)	30.6 (13,9)
375	5.43 (138)	29.4 (13,3)
470	5.73 (146)	30.6 (13,9)
540	5.97 (152)	31.8 (14,4)
750	6.68 (170)	34.9 (15,8)

RE motor weights vary ± 1 lb (.45 kg) depending upon motor configuration.

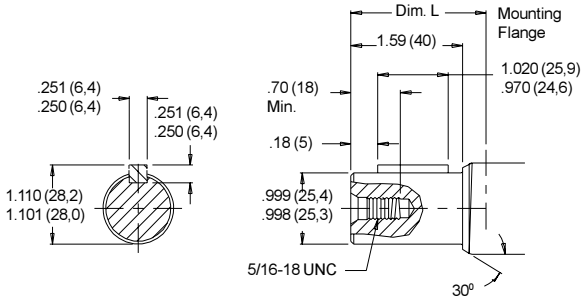
Bearing Load Multiplication Factor Table

RPM	Multiplication Factor
50	1.23
100	1.00
200	0.81
300	0.72
400	0.66
500	0.62
600	0.58
700	0.56
800	0.50

•Shafts

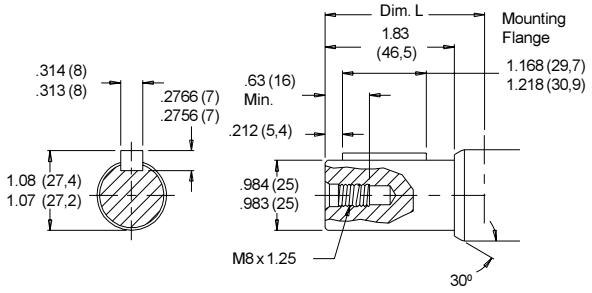
10 1" Straight

Max. Torque: 5,880 lb-in
660 Nm



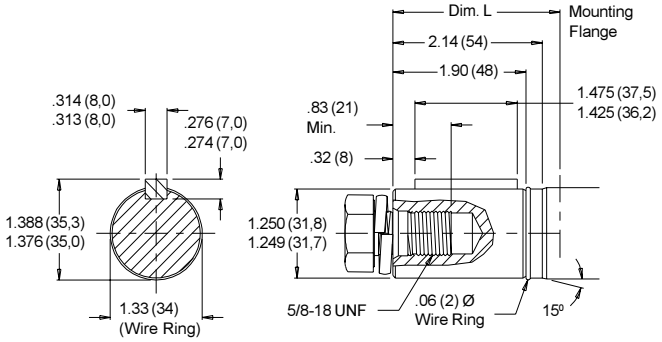
12 25mm Straight

Max. Torque: 5617 lb-in
635 Nm



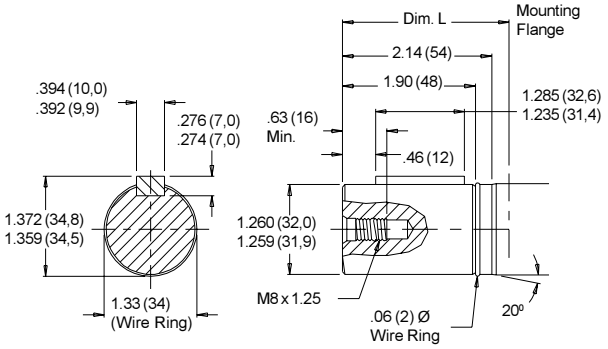
20 1-1/4" Straight

Max. Torque: 10,600 lb-in
1,200 Nm



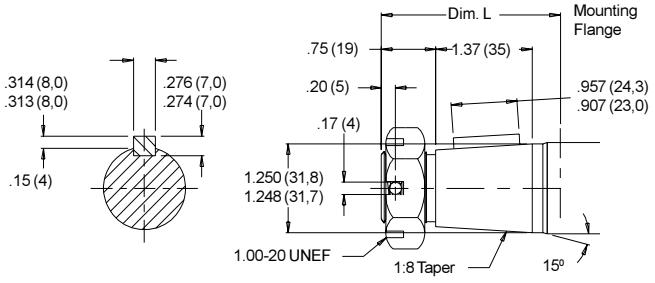
21 32mm Straight

Max. Torque: 10,600 lb-in
1,200 Nm



22 1-1/4" Tapered

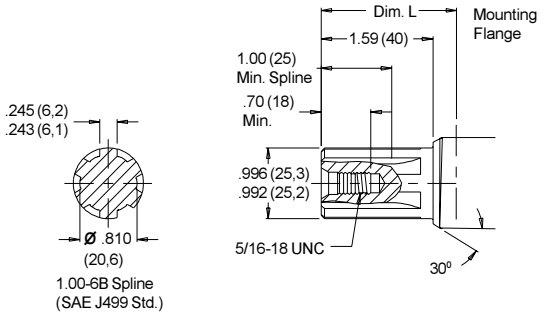
Max. Torque: 10,600 lb-in
1,200 Nm



Note: A slotted nut is standard on this shaft.

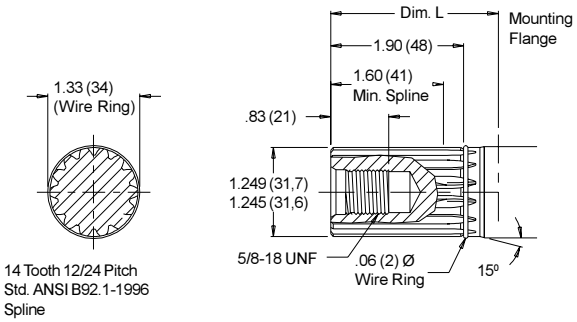
02 6-B Spline

Max. Torque: 10,600 lb-in
1,200 Nm



23 14 Tooth Spline

Max. Torque: 10,600 lb-in
1,200 Nm



Shaft Lengths

Dim. L

Shaft Code	"A" Style Flange in (mm)	Wheel Mount in (mm)
02	1.97 (50)	3.60 (91)
22	2.58 (66)	4.22 (107)
20	2.41 (61)	4.05 (103)
23	2.42 (61)	4.06 (103)
10	1.97 (50)	3.60 (91)
21	2.41 (61)	4.05 (103)
12	2.21 (56)	3.84 (98)

Shaft lengths vary ± .030 in (,8mm)

•Ordering Information

SERIES
501 — REVERSED TIMING
500

DISPLACEMENT | HOUSING | SHAFT | OPTIONS | MISCELLANEOUS

Code	Displacement
120	7.4 in³/r 121 cc
160	9.9 in³/r 162 cc
200	12.4 in³/r 204 cc
230	14.2 in³/r 232 cc
260	15.9 in³/r 261 cc
300	18.3 in³/r 300 cc
350	21.2 in³/r 348 cc
375	22.8 in³/r 375 cc
470	28.3 in³/r 465 cc
540	32.7 in³/r 536 cc
750	45.6 in³/r 748 cc

Code	Housing
W38	4-Hole Front Ports 1/2" BSP.F
A38	4-Hole Front Ports 1/2" BSP.F (S)
W31	4-Hole Front Ports 7/8" O-ring
A31	4-Hole Front Ports 7/8" O-ring (S)
A51	6-Hole Front Ports 7/8" O-ring
A58	6-Hole Front Ports 1/2" BSP.F

Code	Shafts
02	6-B Spline
22	1-1/4" Tapered
20	1-1/4" Straight
23	14 Tooth Spline
10	1" Straight
12	25mm Straight
21	32mm Straight

Code	Options
AA	None
AC	Freeturning Rotor
AE	Hydraulic Declutch (With Freeturning Rotor)

PAINT

Code	Options
A	Dark Metallic Gray
B	Dark Metallic Gray (Unpainted Flange Face)
C	Black
D	Black (Unpainted Flange Face)
Z	No Paint

CAVITY

Code	Options
A	None
*B	Relief Valve Cavity
*C	1000 PSI (69 Bar) Relief Valve Installed
*D	1250 PSI (86 Bar) Relief Valve Installed
*E	1500 PSI (104 Bar) Relief Valve Installed
*F	1750 PSI (121 Bar) Relief Valve Installed
*G	2000 PSI (138 Bar) Relief Valve Installed
*J	2500 PSI (173 Bar) Relief Valve Installed
*L	3000 PSI (207 Bar) Relief Valve Installed

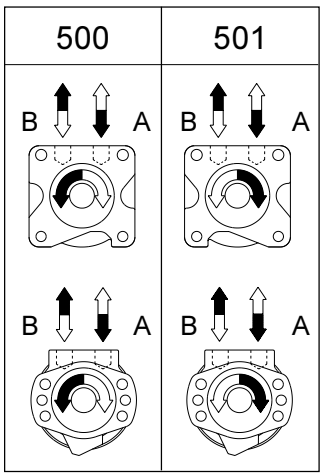
ADD ONS

Code	Options
A	Standard
B	Lock Nut
C	Solid Hex Nut
**W	4-Pin Male Weatherpack Connector (Dual)
**X	4-Pin M12 Male Connector (Dual)
**Y	3-Pin Male Weatherpack Connector (Single)
**Z	4-Pin M12 Male Connector (Single)

* Available with A31, A38, W31, and W38 housings

** Available with A31 and A38 housings and must use a medium duty shaft (see page 18 for order codes

(S) Speed sensor components



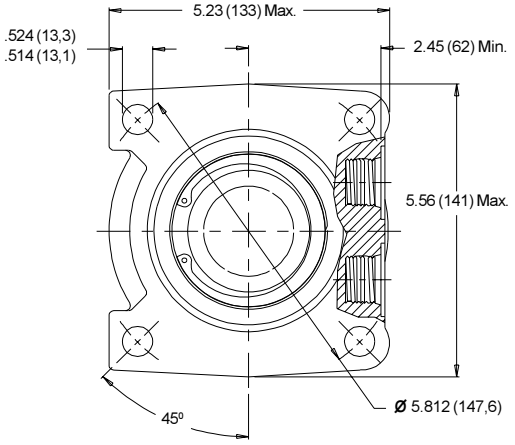
•Rotation Selection

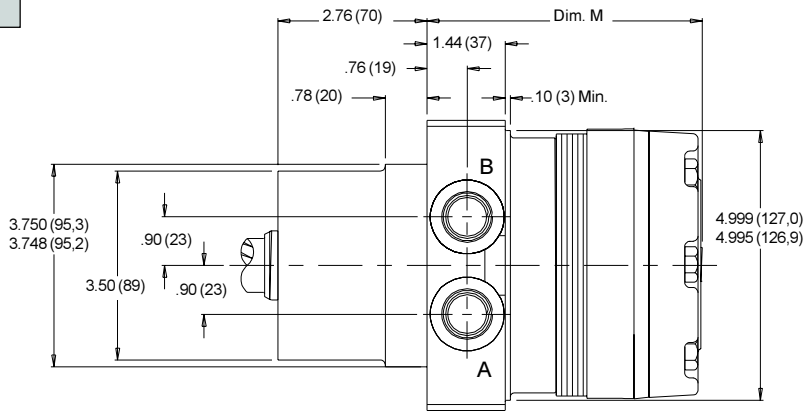
For applications requiring the motor to rotate in only one direction, shaft seal life may be prolonged by pressurizing the “A” port of the motor. To obtain the desired direction of shaft rotation, use the graphic at the left to determine the rotation code for the motor. For bidirectional applications, the 500 series is recommended. Preferred rotation direction is determined by the internal valving design.

•Housings

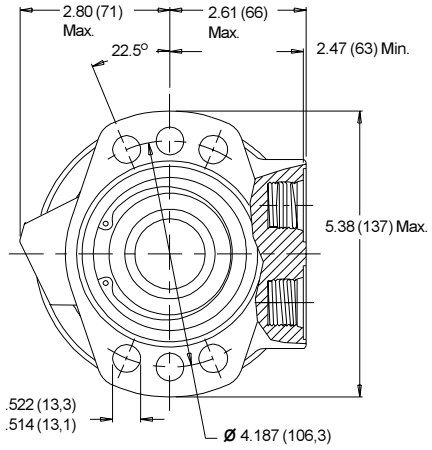
Wheel Mount & SAE "A" Flange

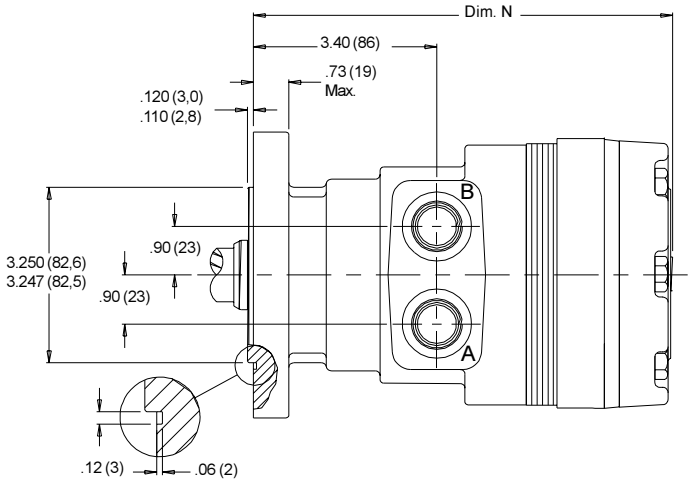
W31	4-Hole Front Aligned Ports 7/8" O-Ring
W38	4-Hole Front Aligned Ports 1/2" BSP.F





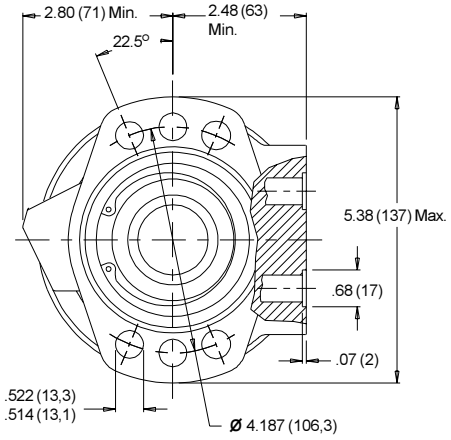
A51	6-Hole Front Aligned Ports 7/8" O-Ring
A58	6-Hole Front Aligned Ports 1/2" BSP.F

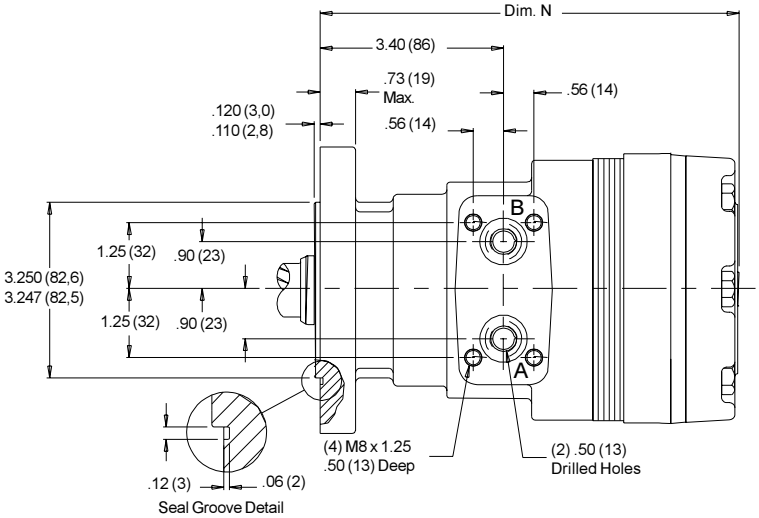




Seal Groove Detail

A57	6-Hole Front Manifold Ports





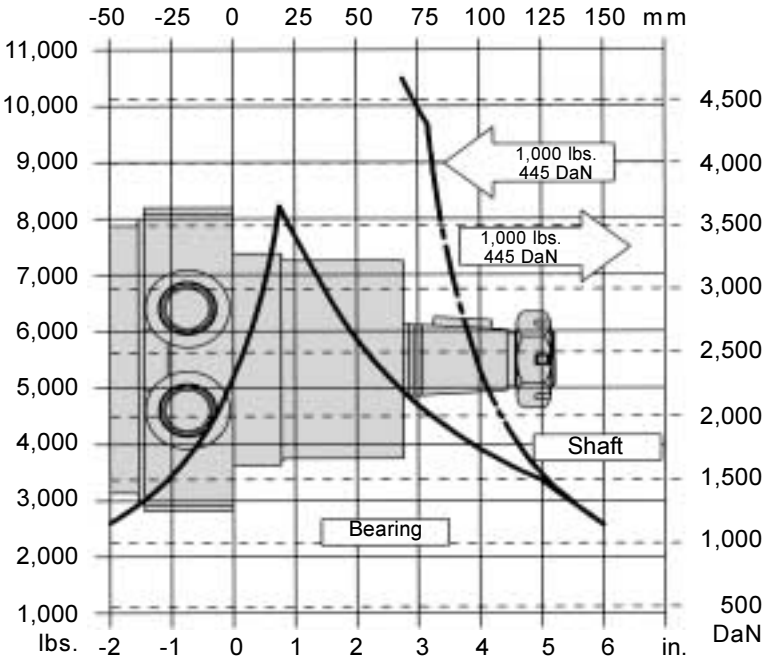
Seal Groove Detail

Allowable Bearing And Shaft Loads

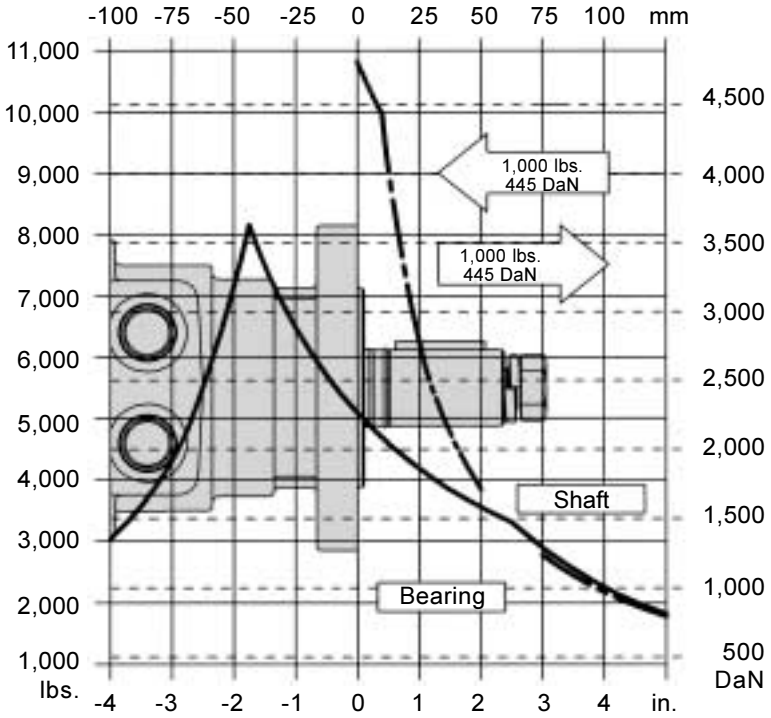
Bearing Curve: The bearing curve represents allowable bearing loads based on ISO 281 bearing capacity for an L_{10} life of 2000 hours at 100 RPM. Radial loads for speeds other than 100 RPM may be calculated using the multiplication factor table located on page 13.

Shaft Curve: The shaft curve represents a 3:1 safety factor based on a tensile strength of 330 kpsi.

Wheel Mount



"A" Style Flange



Length and Weight Tables

Wheel Mount

Disp. Code	Dim. M in (mm)	Weight lbs (kg)
120	4.72 (120)	28.4 (12,9)
160	4.72 (120)	28.4 (12,9)
200	4.86 (123)	29.2 (13,2)
230	4.95 (126)	29.4 (13,3)
260	5.05 (128)	30.0 (13,6)
300	5.18 (132)	30.8 (14,0)
350	5.73 (146)	33.2 (15,1)
375	5.43 (138)	32.0 (14,5)
470	5.73 (146)	33.2 (15,1)
540	5.97 (152)	34.4 (15,6)
750	6.68 (170)	37.5 (17,0)

RE motor weights vary ± 1 lb (.45 kg) depending upon motor configuration.

"A" Style Flange

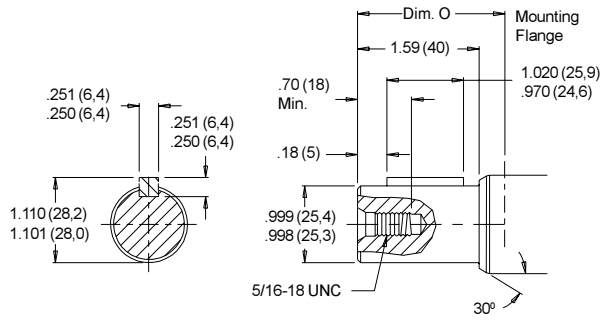
Disp. Code	Dim. N in (mm)	Weight lbs (kg)
120	7.37 (187)	29.4 (13,3)
160	7.37 (187)	29.4 (13,3)
200	7.51 (191)	30.2 (13,7)
230	7.61 (193)	30.4 (13,8)
260	7.70 (196)	31.0 (14,1)
300	7.83 (199)	31.8 (14,4)
350	8.38 (213)	34.2 (15,5)
375	8.08 (205)	33.0 (15,0)
470	8.38 (213)	34.2 (15,5)
540	8.62 (219)	35.4 (16,1)
750	9.33 (237)	38.5 (17,5)

RE motor weights vary ± 1 lb (.45 kg) depending upon motor configuration.

•Shafts

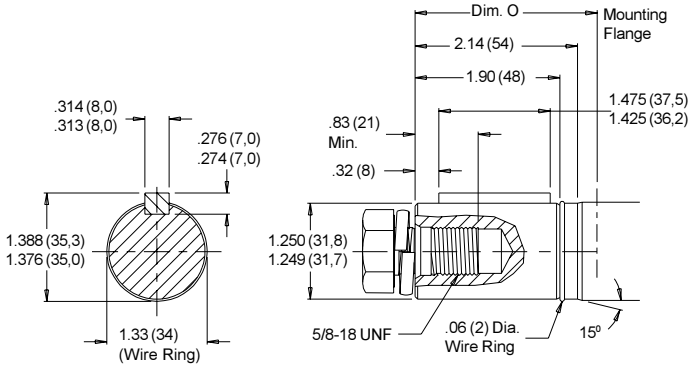
15 1" Straight Ext.

Max. Torque: 5,800 lb-in 660 Nm



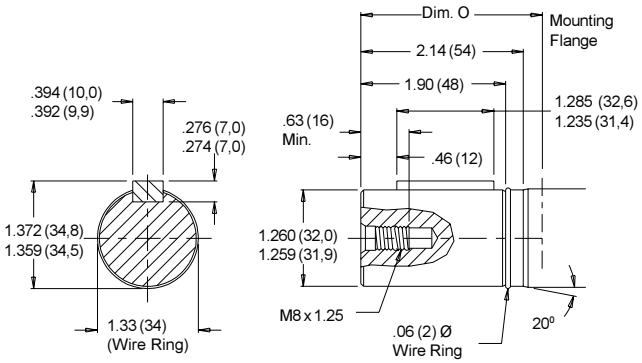
07 1-1/4" Straight Ext.

Max. Torque: 10,600 lb-in 1,200 Nm



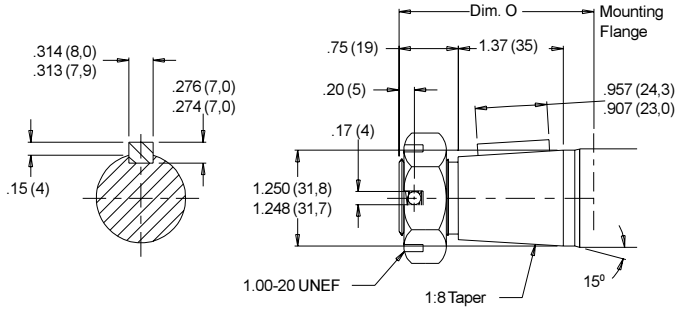
08 32mm Straight Ext.

Max. Torque: 10,600 lb-in 1,200 Nm



25 1-1/4" Tapered Ext.

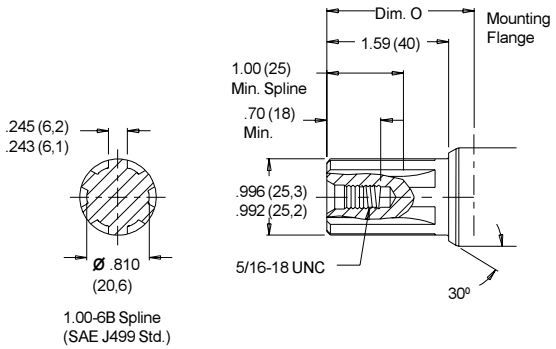
Max. Torque: 10,600 lb-in 1,200 Nm



Note: A slotted nut is standard on this shaft.

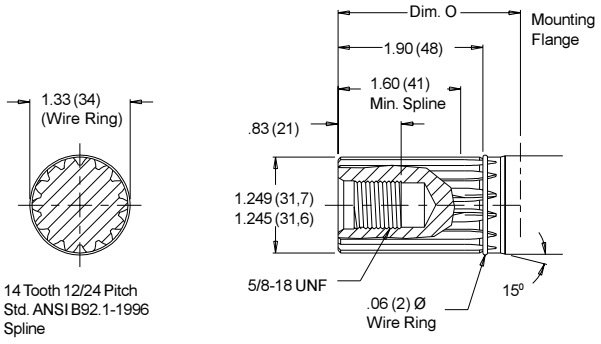
03 6-B Spline Ext.

Max. Torque: 10,600 lb-in 1,200 Nm



09 14 Tooth Spline Ext.

Max. Torque: 10,600 lb-in 1,200 Nm



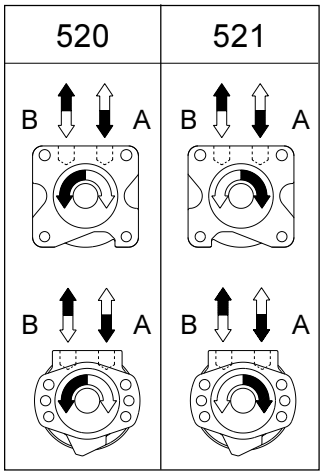
Shaft Lengths

Dim. O

Shaft Code	"A" Style Flange in (mm)	Wheel Mount in (mm)
25	2.63 (67)	5.31 (135)
07	2.47 (63)	5.15 (131)
09	2.46 (62)	5.14 (130)
08	2.47 (63)	5.15 (131)
03	2.02 (51)	4.69 (119)
15	2.02 (51)	4.69 (119)

Shaft lengths vary ± .030 in (,8mm)

•Rotation Selection



For applications requiring the motor to rotate in only one direction, shaft seal life may be prolonged by pressurizing the “A” port of the motor. To obtain the desired direction of shaft rotation, use the graphic at the left to determine the rotation code for the motor. For bidirectional applications, the 520 series is recommended. Preferred rotation direction is determined by the internal valving design.

•Ordering Information

SERIES
521 — REVERSED TIMING
520

OPTIONS

DISPLACEMENT | HOUSING | SHAFT | MISCELLANEOUS

Code	Displacement
120	7.4 in^3/r 121 cc
160	9.9 in^3/r 162 cc
200	12.4 in^3/r 204 cc
230	14.2 in^3/r 232 cc
260	15.9 in^3/r 261 cc
300	18.3 in^3/r 300 cc
350	21.2 in^3/r 348 cc
375	22.8 in^3/r 375 cc
470	28.3 in^3/r 465 cc
540	32.7 in^3/r 536 cc
750	45.6 in^3/r 748 cc

Code	Housings
W31	4-Hole Front Ports 7/8" O-ring
W38	4-Hole Front Ports 1/2" BSP.F
A51	6-Hole Front Ports 7/8" O-ring
A58	6-Hole Front Ports 1/2" BSP.F
A57	6-Hole Manifold Ports

Code	Shafts
25	1-1/4" Tapered Ext.
07	1-1/4" Straight Ext.
09	14 Tooth Spline Ext.
08	32mm Straight Ext.
03	6-B Spline Ext.
15	1" Straight Ext.

Code	Options
AA	None
AC	Freeturning Rotor
AE	Hydraulic Declutch (With Freeturning Rotor)

PAINT | CAVITY | ADD ONS

Code	Options
A	Dark Metallic Gray
B	Dark Metallic Gray (Unpainted Flange Face)
C	Black
D	Black (Unpainted Flange Face)
Z	No Paint

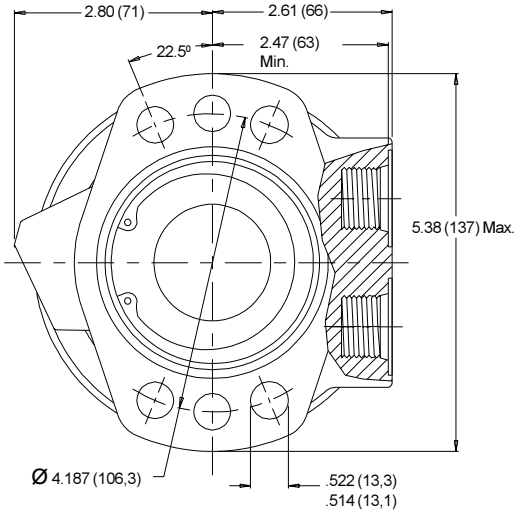
Code	Options
A	None

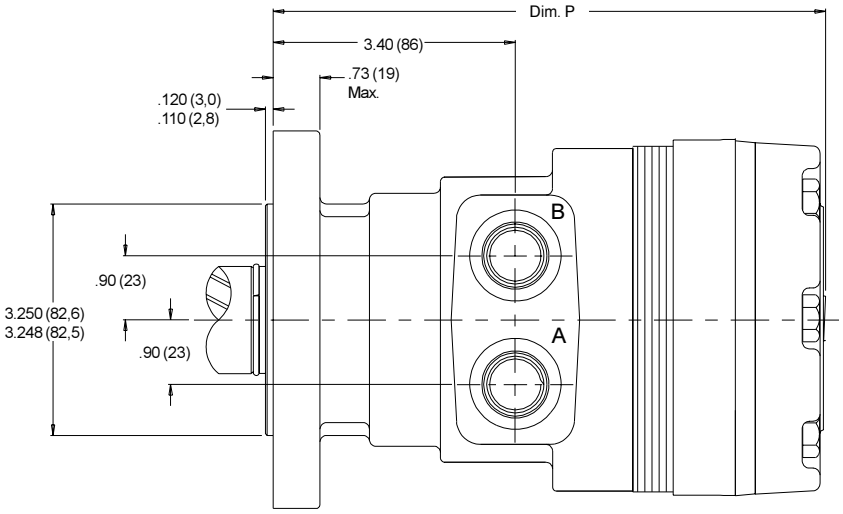
Code	Options
A	Standard
B	Lock Nut
C	Solid Hex Nut

•Housings

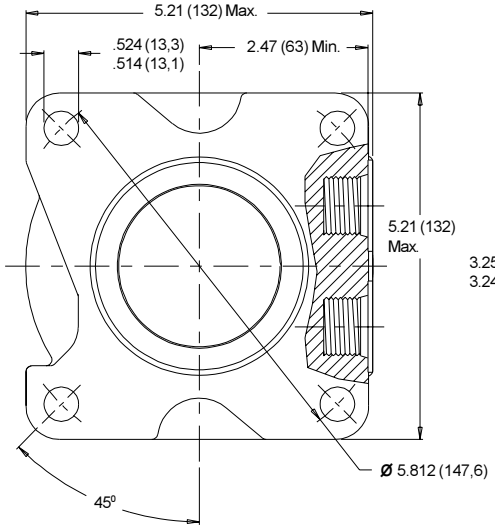
”A” Flange & Wheel Mount

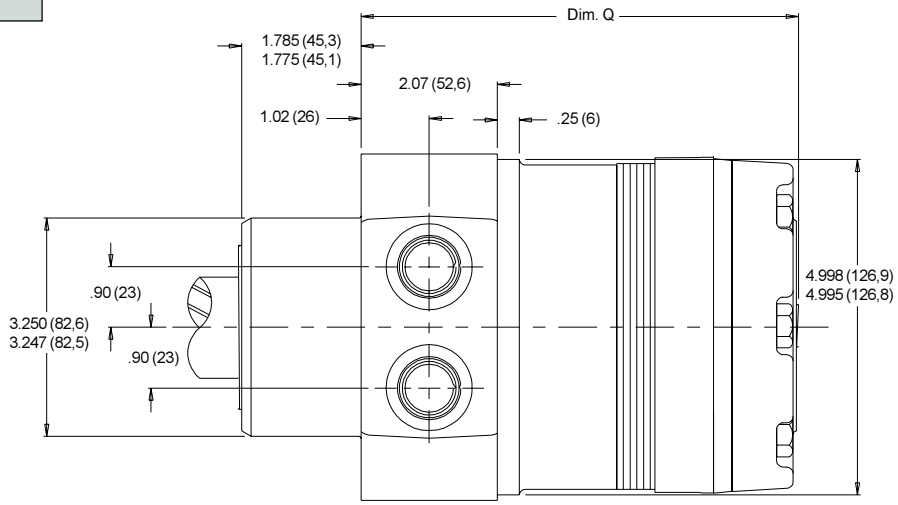
A51	6-Hole Front Ports 7/8” O-Ring
A58	6-Hole Front Ports 1/2” BSP.F





W31	4-Hole Front Ports 7/8” O-Ring
W38	4-Hole Front Ports 1/2” BSP.F

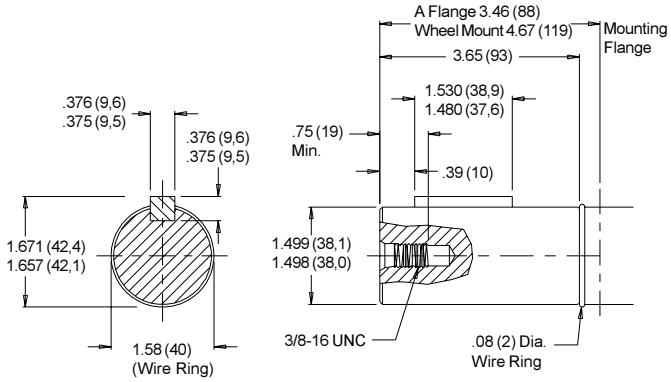




•Shafts

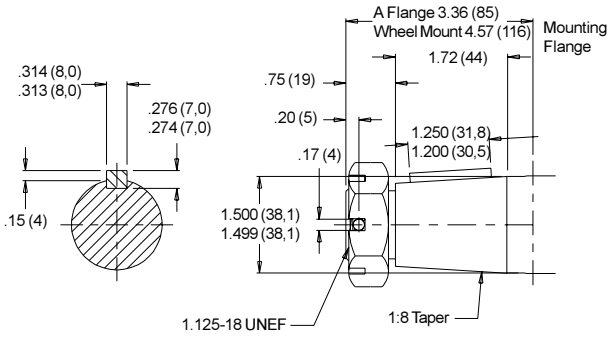
30 1-1/2" Straight

Max. Torque: 10,600 lb-in
1,200 Nm



31 1-1/2" Tapered

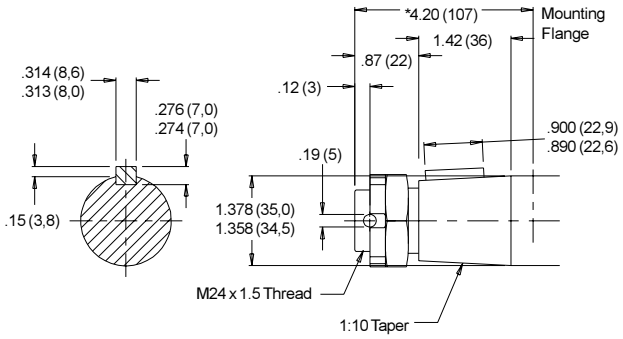
Max. Torque: 10,600 lb-in
1,200 Nm



Note: A slotted nut is standard on this shaft.

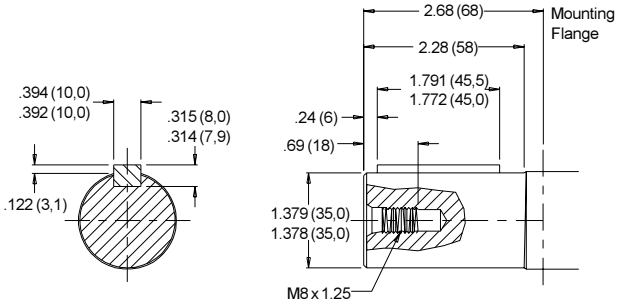
28 35mm Tapered

Max. Torque: 10,600 lb-in
1,200 Nm



27 35mm Straight

Max. Torque: 10,600 lb-in
1,200 Nm



Mounting flange lengths vary ± .030 in (,8mm)

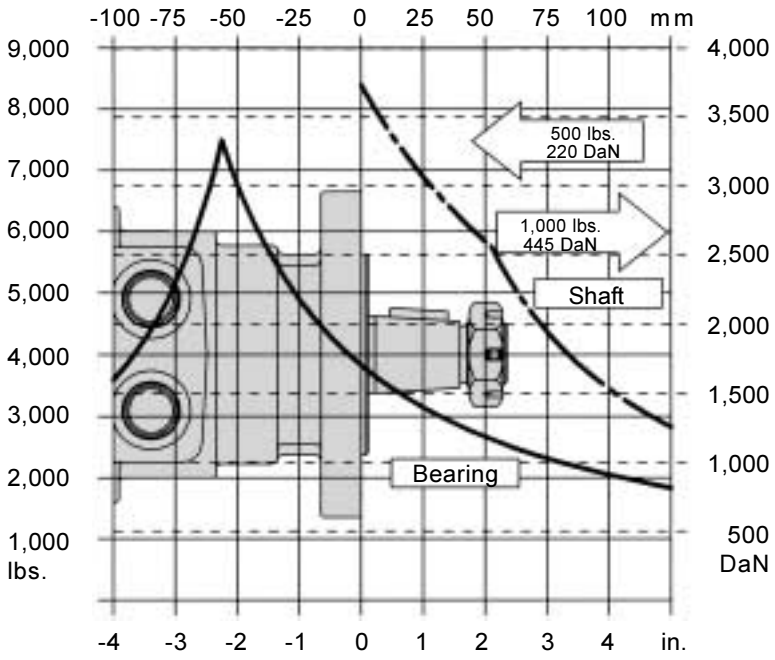
•Technical

Allowable Bearing And Shaft Loads

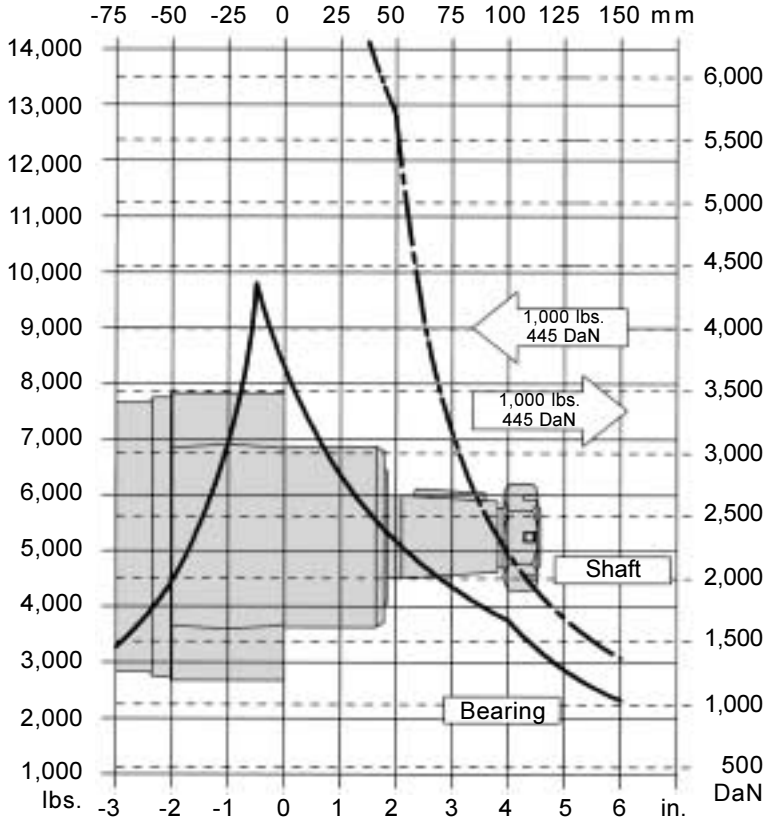
Bearing Curve: The bearing curve represents allowable bearing loads based on ISO 281 bearing capacity for an L_{10} life of 2000 hours at 100 RPM. Radial loads for speeds other than 100 RPM may be calculated using the multiplication factor table located on page 13.

Shaft Curve: The shaft curve represents a 3:1 safety factor based on a tensile strength of 330 kpsi.

"A" Style Flange



Wheel Mount



Length and Weight Tables

"A" Style Flange

Disp. Code	Dim. P in (mm)	Weight lbs (kg)
120	7.37 (187)	29.4 (13,3)
160	7.37 (187)	29.4 (13,3)
200	7.51 (191)	30.2 (13,7)
230	7.61 (193)	30.4 (13,8)
260	7.70 (196)	31.0 (14,1)
300	7.83 (199)	31.8 (14,4)
350	8.38 (213)	34.2 (15,5)
375	8.08 (205)	33.0 (15,0)
470	8.38 (213)	34.2 (15,5)
540	8.62 (219)	35.4 (16,1)
750	9.33 (237)	38.5 (17,5)

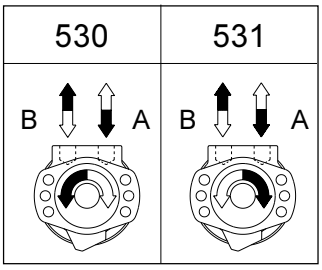
RE motor weights vary ± 1 lb (.45 kg) depending upon motor configuration.

Wheel Mount

Disp. Code	Dim. Q in (mm)	Weight lbs (kg)
120	6.15 (156)	32.8 (14,9)
160	6.15 (156)	32.8 (14,9)
200	6.29 (159)	33.6 (15,2)
230	6.38 (162)	33.8 (15,3)
260	6.48 (165)	34.4 (15,6)
300	6.61 (168)	35.2 (16,0)
350	7.16 (182)	37.6 (17,1)
375	6.86 (174)	36.4 (16,5)
470	7.16 (182)	37.6 (17,1)
540	7.40 (188)	38.9 (17,6)
750	8.11 (206)	41.9 (19,0)

RE motor weights vary ± 1 lb (.45 kg) depending upon motor configuration.

•Rotation Selection



For applications requiring the motor to rotate in only one direction, shaft seal life may be prolonged by pressurizing the "A" port of the motor. To obtain the desired direction of shaft rotation, use the graphic at the left to determine the rotation code for the motor. For bidirectional applications, the 530 series is recommended. Preferred rotation direction is determined by the internal valving design.

•Ordering Information

SERIES
531 — REVERSED TIMING
530

OPTIONS

DISPLACEMENT | HOUSING | SHAFT | MISCELLANEOUS

Code	Displacement
120	7.4 in^3/r 121 cc
160	9.9 in^3/r 162 cc
200	12.4 in^3/r 204 cc
230	14.2 in^3/r 232 cc
260	15.9 in^3/r 261 cc
300	18.3 in^3/r 300 cc
350	21.2 in^3/r 348 cc
375	22.8 in^3/r 375 cc
470	28.3 in^3/r 465 cc
540	32.7 in^3/r 536 cc
750	45.6 in^3/r 748 cc

Code	Housings
W31	4-Hole Aligned Ports 7/8" O-Ring
W38	4-Hole Aligned Ports 1/2" BSP.F
A51	6-Hole Aligned Ports 7/8" O-Ring
A58	6-Hole Aligned Ports 1/2" BSP.F

Code	Shafts
31	1-1/2" Tapered
30	1-1/2" Straight
28	35mm Tapered
27	35mm Straight

Code	Options
AA	None
AC	Freeturning Rotor
AE	Hydraulic Declutch (With Freeturning Rotor)

PAINT

Code	Options
A	Dark Metallic Gray
B	Dark Metallic Gray (Unpainted Flange Face)
C	Black
D	Black (Unpainted Flange Face)
Z	No Paint

CAVITY

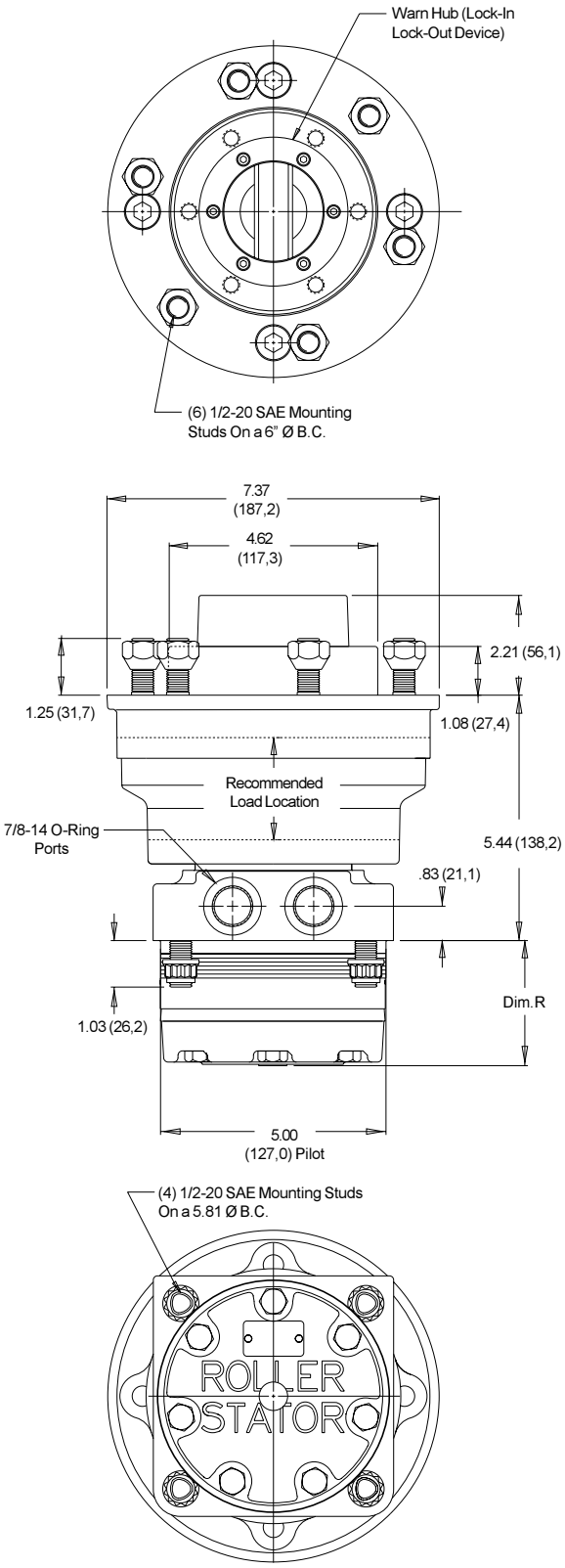
Code	Options
A	None

ADD ONS

Code	Options
A	Standard
C	Solid Hex Nut

•Housing

W31 4-Hole Aligned Ports 7/8" O-Ring

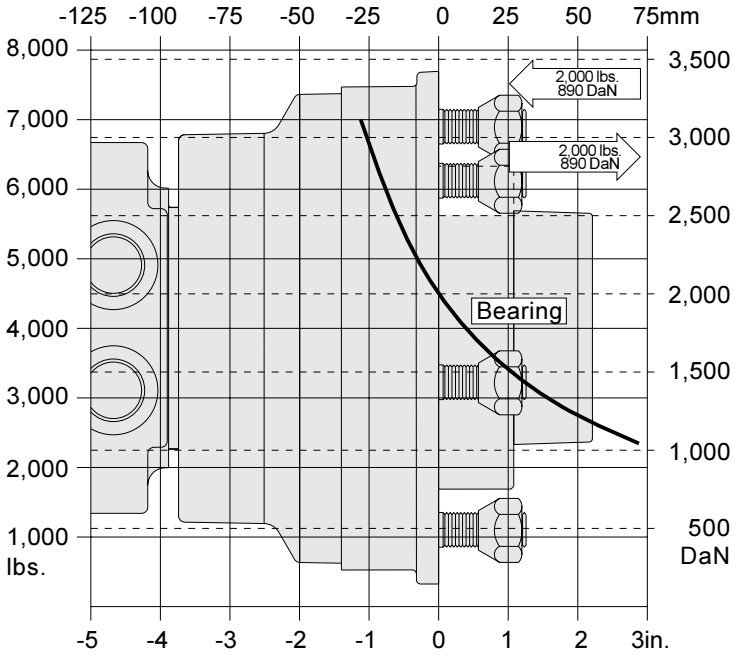


Allowable Bearing And Shaft Loads

Bearing Curve: The bearing curve represents allowable bearing loads based on ISO 281 bearing capacity for an L_{10} life of 2000 hours at 100 RPM. Radial loads for speeds other than 100 RPM may be calculated using the multiplication factor table located on page 13.

Shaft Curve: The shaft curve represents a 3:1 safety factor based on a tensile strength of 330 kpsi.

RE 125mm



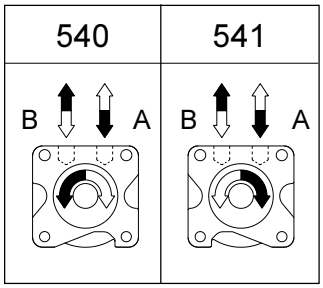
Length and Weight Table

RE 125mm

Disp. Code	Dim. R in (mm)	Weight lbs (kg)
120	2.77 (70)	49.1 (22,3)
160	2.77 (70)	49.1 (22,3)
200	2.90 (74)	49.9 (22,6)
230	2.99 (76)	50.1 (22,7)
260	3.09 (79)	50.7 (23,0)
300	3.22 (82)	51.5 (23,4)
350	3.77 (96)	53.9 (24,4)
375	3.47 (88)	52.7 (23,9)
470	3.77 (96)	53.9 (24,4)
540	4.01 (102)	55.1 (25,0)
750	4.72 (120)	58.2 (26,4)

RE motor weights vary ± 1 lb (.45 kg) depending upon motor configuration.

•Rotation Selection



For applications requiring the motor to rotate in only one direction, shaft seal life may be prolonged by pressurizing the “A” port of the motor. To obtain the desired direction of shaft rotation, use the graphic at the left to determine the rotation code for the motor. For bidirectional applications, the 540 series is recommended. Preferred rotation direction is determined by the internal valving design.

•Ordering Information

SERIES
541 — REVERSED TIMING
540

OPTIONS

DISPLACEMENT | HOUSING | SHAFT | MISCELLANEOUS

Code	Displacement
120	7.4 in^3/r 121 cc
160	9.9 in^3/r 162 cc
200	12.4 in^3/r 204 cc
230	14.2 in^3/r 232 cc
260	15.9 in^3/r 261 cc
300	18.3 in^3/r 300 cc
350	21.2 in^3/r 348 cc
375	22.8 in^3/r 375 cc
470	28.3 in^3/r 465 cc
540	32.7 in^3/r 536 cc
750	45.6 in^3/r 748 cc

Code	Housing
W31	4-Hole Aligned Ports 7/8" O-ring

Code	Shafts
61	6-Bolt Wheel Flange With Warn Hub

Code	Options
AA	None
AC	Freeturning Rotor
AE	Hydraulic Declutch (With Freeturning Rotor)

PAINT | CAVITY | ADD ONS

Code	Options
A	Dark Metallic Gray
C	Black
Z	No Paint

Code	Options
A	None

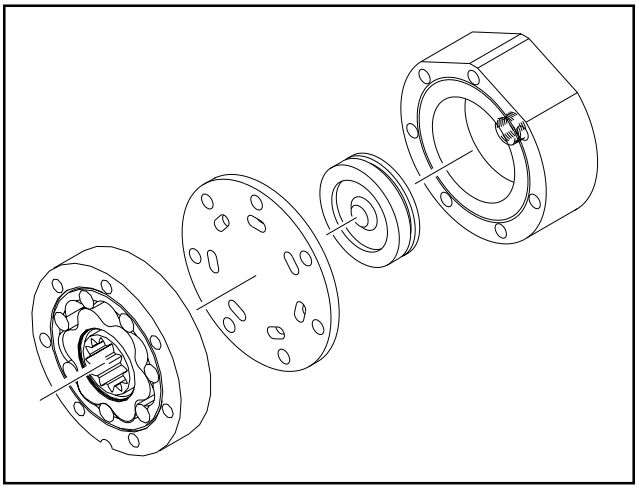
Code	Options
A	Standard

•Description

The declutch or “J” option, available on the RE and CE Series motors, has been specifically designed for applications requiring the motor to have the ability to “freewheel” when not pressurized. By making minor changes to the components used within the motor, the torque required to turn the output shaft is minimal. Selection of this option allows freewheeling speeds up to 1,000 RPM depending on the displacement of the motor and duty cycle of the application.

To allow the motor to perform this function, the standard rotor assembly is replaced with a freeturn rotor assembly. Next, the standard balance plate and endcover is replaced with a special wear plate and ported endcover. The wear plate features seven holes that connect the stator pockets to each other. The ported endcover features a movable piston capable of sealing the seven holes in the wear plate.

When standard motor function is required, pressure is supplied to the endcover port, moving the piston against the wear plate. This action seals the seven holes allowing the motor to function as normal. However, when pressure is removed from the endcover port, the pressure created by the turning rotor assembly pushes the piston away from the wear plate, opening the rotor pockets to each other. In this condition, the oil may circulate freely within the rotor and endcover assemblies, allowing the rotor assembly to rotate freely within the motor.



This option is especially useful in applications ranging from winch drives to towable wheel drives. Depending on the valves and hydraulic circuitry, operation of the freewheel function may be manually or automatically selected. A basic schematic is shown below.

•Connections