

## OVERVIEW

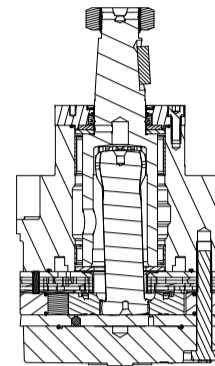
RE Series motors offer the perfect compromise between price and performance by producing work horse power at a reasonable cost. Although these motors perform well in a wide range of applications, they are especially suited for low flow, high pressure applications. During startup, pressure causes the 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. Four bearing options, combined with standard mounting flanges and output shafts, allow the motor to be configured to suit nearly any application.

## FEATURES / BENEFITS

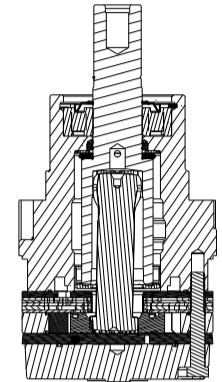
- High Pressure Shaft Seal offers superior seal life and performance and eliminates need for case drain.
- Three Bearing Options allow load carrying capability of motor to be matched to application.
- Heavy-Duty Drive Link is the most durable in its class and receives full flow lubrication to provide long life.
- Valve-In-Rotor Design provides cost effective, efficient distribution of oil and reduces overall motor length.
- Pressure-Compensated Balance Plate improves volumetric efficiency at low flows and high pressure.

## SERIES DESCRIPTIONS

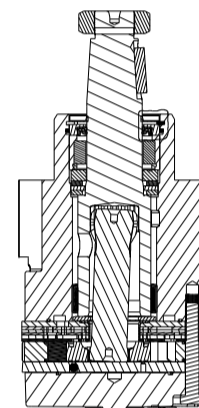
**505/506** - Hydraulic Motor  
*Standard*



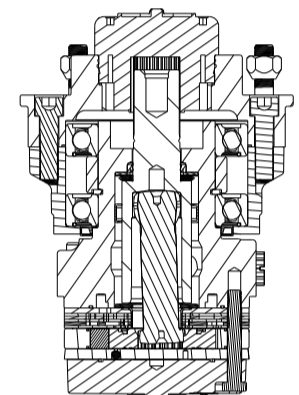
**520/521** - Hydraulic Motor  
*With Medium Duty Bearing*



**530/531** - Hydraulic Motor  
*With Heavy Duty Bearing*



**540/541** - Hydraulic Motor  
*With Wheel Hub*



## TYPICAL APPLICATIONS

Medium-duty wheel drives, augers, mixers, winch drives, swing drives, grapple heads, feed rollers, broom drives and more

## SPECIFICATIONS

CODE	Displacement cm <sup>3</sup> [in <sup>3</sup> /rev]	Max. Speed rpm		Max. Flow lpm [gpm]		Max. Torque Nm [lb-in]		Max. Pressure bar [psi]		
		cont.	inter.	cont.	inter.	cont.	inter.	cont.	inter.	peak
120	121 [7.4]	360	490	45 [12]	61 [16]	327 [2900]	383 [3400]	207 [3000]	241 [3500]	276 [4000]
160	162 [9.9]	370	470	61 [16]	76 [20]	475 [4200]	542 [4800]	207 [3000]	241 [3500]	276 [4000]
200	204 [12.4]	300	370	68 [18]	83 [22]	542 [4800]	633 [5600]	207 [3000]	241 [3500]	276 [4000]
230	232 [14.2]	260	320	68 [18]	83 [22]	644 [5700]	712 [6300]	207 [3000]	241 [3500]	276 [4000]
260	261 [15.9]	260	350	76 [20]	91 [24]	712 [6300]	791 [7000]	207 [3000]	241 [3500]	276 [4000]
300	300 [18.3]	250	320	83 [22]	95 [25]	825 [7300]	938 [8300]	207 [3000]	241 [3500]	276 [4000]
350	348 [21.2]	220	270	83 [22]	95 [25]	921 [8150]	1045 [9250]	207 [3000]	241 [3500]	276 [4000]
375	375 [22.8]	200	250	76 [20]	91 [24]	1006 [8900]	1158 [10250]	207 [3000]	241 [3500]	276 [4000]
470	465 [28.3]	160	200	76 [20]	91 [24]	1096 [9700]	1184 [10475]	172 [2500]	189 [2750]	207 [3000]
540	536 [32.7]	140	170	76 [20]	91 [24]	983 [8700]	1243 [11000]	138 [2000]	173 [2500]	207 [3000]
620	631 [38.5]	120	150	76 [20]	91 [24]	1014 [8976]	1291 [11421]	121 [1750]	155 [2250]	173 [2500]
750	748 [45.6]	100	130	76 [20]	91 [24]	1062 [9400]	1237 [10950]	103 [1500]	121 [1750]	138 [2000]

► Performance data is typical. Performance of production units varies slightly from one motor to another. Running at intermittent ratings should not exceed 10% of every minute of operation.

**DISPLACEMENT PERFORMANCE**

		Pressure - bar [psi]						Max. Cont.	Max. Inter.		
<b>120</b>		17 [250]	35 [500]	69 [1000]	104 [1500]	138 [2000]	173 [2500]	207 [3000]	241 [3500]		
121 cm <sup>3</sup> [7.4 in <sup>3</sup> ] / rev											
		Torque - Nm [lb-in], Speed rpm						Intermittent Ratings - 10% of Operation			
Flow - lpm [gpm]	2 [0.5]	21 [187] 14	51 [448] 13	97 [859] 11	140 [1239] 8					Theoretical rpm	
	4 [1]	24 [215] 26	54 [474] 25	111 [986] 25	162 [1429] 20	225 [1991] 13					16
	8 [2]		57 [500] 58	118 [1043] 53	176 [1554] 51	226 [1997] 44	271 [2400] 40	302 [2673] 35	343 [3036] 27		32
	15 [4]		54 [479] 111	116 [1030] 106	186 [1642] 97	237 [2094] 93	278 [2459] 89	335 [2964] 85	359 [3179] 79		63
	23 [6]		49 [433] 174	116 [1023] 167	168 [1483] 155	232 [2051] 150	279 [2467] 144	328 [2903] 139	360 [3185] 137		125
	30 [8]			111 [984] 245	169 [1497] 214	223 [1973] 205	283 [2505] 200	326 [2884] 197	385 [3404] 188		188
	38 [10]			104 [923] 294	166 [1469] 281	218 [1930] 269	272 [2411] 261	325 [2878] 250	385 [3404] 242		250
	45 [12]			99 [872] 358	161 [1428] 344	217 [1918] 331	276 [2444] 326	321 [2839] 321	385 [3403] 304		313
	53 [14]			91 [807] 415	155 [1372] 413	208 [1845] 398	267 [2363] 391	338 [2992] 369			375
	61 [16]			84 [745] 487	145 [1283] 475	211 [1864] 457	272 [2403] 447	327 [2897] 427			438
<b>Rotor Width</b>		Overall Efficiency - 70 - 100% <input type="checkbox"/> 40 - 69% <input type="checkbox"/> 0 - 39% <input type="checkbox"/>									
13.8 [542] mm [in]		Theoretical Torque - Nm [lb-in]									
		33 [295]	67 [589]	133 [1178]	200 [1768]	266 [2357]	333 [2946]	399 [3535]	466 [4124]		
Displacement tested at 54°C [129°F] with an oil viscosity of 46cSt [213 SUS]											

		Pressure - bar [psi]						Max. Cont.	Max. Inter.		
<b>160</b>		17 [250]	35 [500]	69 [1000]	104 [1500]	138 [2000]	173 [2500]	207 [3000]	241 [3500]		
162 cm <sup>3</sup> [9.9 in <sup>3</sup> ] / rev											
		Torque - Nm [lb-in], Speed rpm						Intermittent Ratings - 10% of Operation			
Flow - lpm [gpm]	2 [0.5]	37 [326] 7	77 [685] 3	149 [1323] 3	223 [1977] 3	310 [2741] 2	349 [3088] 1			Theoretical rpm	
	4 [1]	30 [264] 21	80 [704] 18	164 [1448] 17	244 [2158] 16	324 [2865] 14	378 [3344] 13	442 [3909] 9			12
	8 [2]	36 [317] 45	80 [711] 43	161 [1423] 41	242 [2143] 39	316 [2792] 37	379 [3350] 35	481 [4258] 32	551 [4880] 28		24
	15 [4]	39 [342] 92	75 [664] 90	171 [1510] 86	253 [2241] 84	321 [2838] 82	379 [3351] 80	451 [3992] 76	516 [4569] 72		47
	23 [6]		71 [631] 138	158 [1395] 134	235 [2078] 131	317 [2806] 127	389 [3447] 122	462 [4088] 121	518 [4586] 118		94
	30 [8]		67 [596] 186	164 [1449] 182	236 [2090] 179	312 [2760] 173	385 [3411] 170	456 [4033] 167	513 [4537] 163		140
	38 [10]		72 [640] 232	149 [1323] 230	234 [2074] 229	309 [2736] 222	376 [3329] 220	455 [4022] 213	522 [4623] 207		187
	45 [12]		67 [596] 279	144 [1275] 279	226 [1998] 272	304 [2689] 270	369 [3270] 264	440 [3890] 255	497 [4397] 247		234
	53 [14]			135 [1190] 326	228 [2022] 323	310 [2739] 317	375 [3317] 311	457 [4040] 304	541 [4789] 299		280
	61 [16]			123 [1087] 372	213 [1889] 372	298 [2634] 364	368 [3253] 361	435 [3847] 357	502 [4439] 350		327
68 [18]			108 [952] 419	199 [1764] 417	283 [2501] 416	362 [3201] 407	419 [3708] 401		374		
76 [20]			105 [929] 466	195 [1726] 465	280 [2476] 462	349 [3092] 453	453 [4008] 443		420		
<b>Rotor Width</b>		Overall Efficiency - 70 - 100% <input type="checkbox"/> 40 - 69% <input type="checkbox"/> 0 - 39% <input type="checkbox"/>									
13.8 [542] mm [in]		Theoretical Torque - Nm [lb-in]									
		45 [394]	89 [788]	178 [1576]	267 [2365]	356 [3153]	445 [3941]	534 [4729]	623 [5518]	467	
Displacement tested at 54°C [129°F] with an oil viscosity of 46cSt [213 SUS]											

► Performance data is typical. Performance of production units varies slightly from one motor to another. Operating at maximum continuous pressure and maximum continuous flow simultaneously is not recommended. For additional information on product testing please refer to page 7.

**DISPLACEMENT PERFORMANCE**

<b>200</b>		Pressure - bar [psi]						Max. Cont.	Max. Inter.	
		17 [250]	35 [500]	69 [1000]	104 [1500]	138 [2000]	173 [2500]	207 [3000]	241 [3500]	
204 cm <sup>3</sup> [12.4 in <sup>3</sup> ] / rev										
Flow - lpm [gpm]		Torque - Nm [lb-in], Speed rpm						Intermittent Ratings - 10% of Operation		
		40 [358] 7	91 [808] 4	133 [1181] 4	294 [2602] 4	375 [3323] 3				10
Max. Cont.	4 [1]	43 [376] 16	85 [753] 13	200 [1769] 12	276 [2442] 11	373 [3304] 10	442 [3915] 9	526 [4656] 6		19
	8 [2]	44 [385] 34	93 [851] 31	195 [1727] 29	299 [2646] 27	374 [3311] 27	461 [4079] 25	542 [4792] 23	616 [5451] 20	38
	15 [4]	39 [347] 72	94 [834] 69	198 [1752] 67	305 [2701] 63	401 [3549] 60	477 [4222] 58	544 [4818] 55	629 [5568] 51	75
	23 [6]		82 [724] 111	191 [1694] 109	284 [2518] 107	389 [3446] 103	463 [4098] 100	553 [4894] 99	636 [5628] 90	112
	30 [8]		80 [704] 148	188 [1661] 145	285 [2518] 141	402 [3556] 136	458 [4053] 134	543 [4802] 130	628 [5554] 124	150
	38 [10]		66 [581] 185	180 [1592] 181	276 [2445] 176	364 [3224] 173	458 [4051] 170	535 [4737] 164	615 [5441] 160	187
	45 [12]			165 [1462] 221	261 [2312] 214	362 [3200] 210	450 [3982] 207	535 [4731] 198	618 [5471] 196	224
	53 [14]			150 [1328] 257	273 [2413] 256	368 [3253] 247	449 [3975] 244	558 [4936] 241	602 [5328] 235	261
	61 [16]			134 [1183] 296	253 [2242] 292	335 [2969] 284	435 [3850] 277	524 [4639] 273	598 [5292] 269	299
	68 [18]			121 [1068] 334	232 [2056] 330	339 [3003] 327	416 [3686] 320	512 [4532] 313	599 [5299] 308	336
	76 [20]			110 [970] 372	206 [1823] 372	308 [2725] 365	401 [3552] 357	507 [4484] 352		373
	83 [22]				191 [1689] 407	285 [2520] 403	379 [3353] 397	486 [4303] 388		410
Rotor Width		Overall Efficiency - 70 - 100% <input type="checkbox"/> 40 - 69% <input type="checkbox"/> 0 - 39% <input type="checkbox"/>								
17.3 [682] mm [in]		Theoretical Torque - Nm [lb-in]								
		56 [494]	112 [987]	223 [1975]	335 [2962]	446 [3949]	558 [4936]	669 [5924]	781 [6911]	
Displacement tested at 54°C [129°F] with an oil viscosity of 46cSt [213 SUS]										

<b>230</b>		Pressure - bar [psi]						Max. Cont.	Max. Inter.	
		17 [250]	35 [500]	69 [1000]	104 [1500]	138 [2000]	173 [2500]	207 [3000]	241 [3500]	
233 cm <sup>3</sup> [14.2 in <sup>3</sup> ] / rev										
Flow - lpm [gpm]		Torque - Nm [lb-in], Speed rpm						Intermittent Ratings - 10% of Operation		
		45 [397] 6	92 [813] 4	184 [1628] 3	293 [2590] 2	375 [3323] 1				9
Max. Cont.	4 [1]	48 [429] 14	101 [890] 12	223 [1972] 11	316 [2793] 11	414 [3660] 9	493 [4366] 7	560 [4955] 4		17
	8 [2]	51 [453] 30	105 [926] 27	215 [1899] 25	329 [2911] 25	425 [3760] 23	524 [4637] 20	618 [5468] 17	710 [6286] 12	33
	15 [4]	43 [384] 63	108 [960] 59	209 [1851] 55	326 [2884] 54	435 [3846] 52	539 [4771] 47	655 [5799] 42	721 [6381] 39	66
	23 [6]		102 [603] 93	213 [1889] 88	339 [3001] 85	428 [3789] 82	536 [4747] 77	628 [5559] 73	718 [6355] 69	98
	30 [8]		89 [789] 127	207 [1830] 122	316 [2793] 120	425 [3762] 115	521 [4612] 110	639 [5653] 107	717 [6341] 98	131
	38 [10]		78 [690] 161	198 [1750] 157	311 [2752] 151	436 [3856] 148	527 [4660] 143	612 [5420] 140	703 [6218] 132	163
	45 [12]			189 [1669] 191	296 [2624] 186	425 [3764] 182	510 [4517] 176	599 [5304] 170	689 [6098] 163	196
	53 [14]			177 [1565] 224	293 [2596] 216	388 [3434] 214	495 [4384] 208	587 [5197] 205	680 [6017] 198	228
	61 [16]			150 [1326] 256	272 [2408] 255	397 [3509] 249	484 [4280] 245	574 [5077] 237	669 [5925] 227	261
	68 [18]			142 [1261] 292	264 [2333] 286	355 [3140] 282	493 [4366] 276	569 [5032] 274	655 [5799] 259	293
	76 [20]			122 [1083] 324	237 [2096] 321	347 [3068] 316	453 [4009] 309	571 [5057] 305		326
	83 [22]				210 [1855] 357	338 [2987] 351	464 [4104] 345	550 [4864] 339		358
Rotor Width		Overall Efficiency - 70 - 100% <input type="checkbox"/> 40 - 69% <input type="checkbox"/> 0 - 39% <input type="checkbox"/>								
19.7 [777] mm [in]		Theoretical Torque - Nm [lb-in]								
		64 [565]	128 [1131]	256 [2261]	383 [3392]	511 [4522]	639 [5653]	767 [6783]	894 [7914]	
Displacement tested at 54°C [129°F] with an oil viscosity of 46cSt [213 SUS]										

► Performance data is typical. Performance of production units varies slightly from one motor to another. Operating at maximum continuous pressure and maximum continuous flow simultaneously is not recommended. For additional information on product testing please refer to page 7.

**DISPLACEMENT PERFORMANCE**

<b>260</b>		Pressure - bar [psi]						Max. Cont.	Max. Inter.	
		17 [250]	35 [500]	69 [1000]	104 [1500]	138 [2000]	173 [2500]	207 [3000]	241 [3500]	
261 cm <sup>3</sup> [15.9 in <sup>3</sup> ] / rev										
Flow - lpm [gpm]		Torque - Nm [lb-in], Speed rpm						Intermittent Ratings - 10% of Operation		
		49 [432] 5	112 [989] 2							Theoretical rpm
4 [1]	54 [475] 12	113 [998] 11	240 [2125] 10	365 [3230] 9	478 [4227] 8	578 [5112] 7	648 [5736] 5		8	
8 [2]	54 [474] 27	115 [1021] 25	247 [2184] 24	367 [3244] 22	488 [4318] 21	591 [5230] 19	703 [6223] 16		15	
15 [4]	49 [429] 57	114 [1010] 55	261 [2307] 51	363 [3214] 51	486 [4300] 48	595 [5268] 46	697 [6171] 43	807 [7143] 39	30	
23 [6]	45 [397] 86	115 [1016] 83	236 [2090] 80	364 [3221] 78	497 [4398] 76	590 [5225] 71	721 [6379] 68	802 [7096] 63	59	
30 [8]		94 [833] 114	227 [2008] 109	348 [3078] 109	477 [4224] 105	592 [5239] 101	692 [6128] 96	794 [7027] 88	88	
38 [10]		85 [752] 145	231 [2044] 144	340 [3013] 141	470 [4155] 138	585 [5180] 133	685 [6063] 127	796 [7048] 119	117	
45 [12]		78 [692] 173	217 [1919] 173	354 [3135] 168	464 [4108] 166	567 [5018] 161	672 [5945] 153	802 [7095] 144	146	
53 [14]		64 [563] 202	198 [1754] 202	326 [2886] 200	445 [3941] 196	568 [5026] 184	668 [5908] 181	765 [6771] 176	175	
61 [16]			182 [1608] 231	299 [2644] 229	448 [3965] 221	552 [4884] 219	651 [5763] 216	752 [6659] 209	204	
68 [18]			160 [1417] 261	304 [2693] 261	417 [3690] 256	550 [4870] 247	643 [5689] 240	740 [6551] 232	233	
76 [20]			136 [1204] 290	278 [2460] 289	391 [3464] 285	521 [4614] 277	636 [5628] 274	736 [6516] 263	262	
83 [22]			132 [1168] 319	263 [2325] 319	374 [3314] 315	512 [4535] 311	615 [5442] 301		291	
91 [24]			82 [722] 348	227 [2009] 347	361 [3190] 345	496 [4386] 340			320	
<b>Rotor Width</b>		<b>Overall Efficiency -</b> 70 - 100% <input type="checkbox"/> 40 - 69% <input type="checkbox"/> 0 - 39% <input type="checkbox"/>								
22.1 [0.872] mm [in]		Theoretical Torque - Nm [lb-in]								
		72 [633]	143 [1266]	286 [2532]	429 [3798]	572 [5064]	715 [6330]	858 [7596]	1001 [8861]	
Displacement tested at 54°C [129°F] with an oil viscosity of 46cSt [213 SUS]										

<b>300</b>		Pressure - bar [psi]						Max. Cont.	Max. Inter.	
		17 [250]	35 [500]	69 [1000]	104 [1500]	138 [2000]	173 [2500]	207 [3000]	241 [3500]	
300 cm <sup>3</sup> [18.3 in <sup>3</sup> ] / rev										
Flow - lpm [gpm]		Torque - Nm [lb-in], Speed rpm						Intermittent Ratings - 10% of Operation		
		51 [452] 3	95 [839] 1							Theoretical rpm
4 [1]	63 [557] 11	145 [1282] 10	302 [2675] 9	433 [3829] 8	510 [4513] 7	627 [5552] 4			7	
8 [2]	62 [551] 22	158 [1400] 20	308 [2722] 19	437 [3866] 19	571 [5056] 16	679 [6011] 13	768 [6796] 9	830 [7346] 5	13	
15 [4]	66 [588] 48	145 [1281] 47	316 [2793] 45	430 [3805] 43	577 [5107] 38	680 [6015] 33	820 [7258] 28	908 [8040] 21	26	
23 [6]	58 [511] 75	140 [1241] 75	290 [2566] 72	424 [3755] 69	546 [4830] 65	690 [6105] 57	801 [7088] 49	946 [8372] 40	51	
30 [8]	46 [405] 100	128 [1136] 100	305 [2699] 99	391 [3460] 96	571 [5056] 87	700 [6199] 82	826 [7313] 71	930 [8233] 62	76	
38 [10]		111 [981] 125	282 [2493] 124	409 [3623] 121	503 [4447] 115	683 [6043] 106	794 [7028] 98	919 [8131] 88	101	
45 [12]		92 [814] 150	261 [2313] 150	388 [3435] 148	472 [4177] 143	641 [5676] 133	783 [6927] 122	881 [7794] 113	127	
53 [14]		77 [684] 176	245 [2165] 175	391 [3464] 175	530 [4687] 173	661 [5848] 163	809 [7157] 151	949 [8398] 138	152	
61 [16]		63 [553] 201	224 [1983] 201	366 [3243] 199	508 [4498] 192	633 [5599] 187	796 [7044] 173	916 [8103] 163	177	
68 [18]			201 [1780] 225	339 [2999] 225	467 [4135] 222	666 [5898] 211	804 [7115] 199	899 [7955] 194	202	
76 [20]			172 [1522] 251	327 [2895] 251	480 [4247] 247	611 [5410] 240	745 [6596] 232	910 [8051] 217	228	
83 [22]			144 [1276] 277	321 [2836] 276	466 [4127] 269	575 [5084] 263	732 [6474] 254		253	
91 [24]			119 [1049] 302	281 [2483] 301	435 [3853] 300	559 [4943] 291	703 [6223] 280		278	
95 [25]			105 [928] 315	262 [2319] 314	434 [3838] 311	553 [4894] 307	707 [6257] 294		303	
<b>Rotor Width</b>		<b>Overall Efficiency -</b> 70 - 100% <input type="checkbox"/> 40 - 69% <input type="checkbox"/> 0 - 39% <input type="checkbox"/>								
25.4 [1.000] mm [in]		Theoretical Torque - Nm [lb-in]								
		82 [729]	165 [1457]	329 [2914]	494 [4371]	659 [5828]	823 [7285]	988 [8742]	1152 [10199]	
Displacement tested at 54°C [129°F] with an oil viscosity of 46cSt [213 SUS]										

► Performance data is typical. Performance of production units varies slightly from one motor to another. Operating at maximum continuous pressure and maximum continuous flow simultaneously is not recommended. For additional information on product testing please refer to page 7.

**DISPLACEMENT PERFORMANCE**

		Pressure - bar [psi]						Max. Cont.	Max. Inter.	
<b>350</b>		17 [250]	35 [500]	69 [1000]	104 [1500]	138 [2000]	173 [2500]	207 [3000]	241 [3500]	
348 cm <sup>3</sup> [21.2 in <sup>3</sup> ] / rev										
		Torque - Nm [lb-in], Speed rpm						Intermittent Ratings - 10% of Operation		
Flow - lpm [gpm]	2 [0.5]	64 [566] 4	134 [1183] 4	272 [2404] 3	399 [3532] 2					Theoretical rpm
	4 [1]	64 [570] 10	134 [1189] 9	296 [2619] 8	437 [3869] 8					
	8 [2]	69 [607] 21	145 [1285] 20	312 [2764] 19	462 [4092] 18	600 [5308] 18	742 [6571] 17	855 [7569] 14		
	15 [4]	71 [627] 42	151 [1340] 41	313 [2767] 40	471 [4169] 39	630 [5577] 37	772 [6834] 35	889 [7869] 34	993 [8785] 28	
	23 [6]	62 [549] 64	149 [1618] 63	315 [2788] 62	474 [4191] 60	630 [5577] 57	768 [6796] 54	925 [8182] 51	1032 [9137] 45	
	30 [8]	53 [472] 86	139 [1233] 85	307 [2713] 84	459 [4058] 82	626 [5537] 79	768 [6793] 75	928 [8210] 69	1051 [9300] 65	
	38 [10]		113 [1004] 108	298 [2639] 108	431 [3814] 108	601 [5317] 102	745 [6593] 100	910 [8056] 93	1062 [9399] 87	
	45 [12]		98 [869] 130	265 [2346] 129	445 [3936] 128	581 [5144] 125	740 [6552] 117	891 [7889] 109	1044 [9237] 104	
	53 [14]		86 [758] 152	252 [2226] 151	422 [3738] 150	570 [5044] 147	723 [6398] 139	881 [7794] 133	1031 [9126] 120	
	61 [16]		63 [560] 173	235 [2079] 173	409 [3619] 172	549 [4859] 170	720 [6375] 163	850 [7522] 155	1012 [8952] 147	
	68 [18]			220 [1948] 195	394 [3490] 194	571 [5054] 190	693 [6134] 187	839 [7428] 175	986 [8727] 164	
	76 [20]			208 [1843] 217	375 [3320] 216	513 [4544] 214	683 [6044] 213	835 [7385] 195	975 [8632] 188	
	83 [22]			179 [1583] 239	352 [3112] 239	554 [4906] 238	685 [6064] 233	813 [7198] 221	958 [8482] 215	
	91 [24]			172 [1526] 261	360 [3186] 261	534 [4724] 260	666 [5890] 256			
95 [25]				369 [3264] 271	529 [4682] 270	647 [5730] 265				
<b>Overall Efficiency</b> - 70 - 100% <input type="checkbox"/> 40 - 69% <input type="checkbox"/> 0 - 39% <input type="checkbox"/>										
<b>Rotor Width</b>		Theoretical Torque - Nm [lb-in]								
39.4 [1.553] mm [in]		95 [844]	191 [1688]	381 [3376]	572 [5064]	763 [6752]	954 [8439]	1144 [10127]	1335 [11815]	
Displacement tested at 54°C [129°F] with an oil viscosity of 46cSt [213 SUS]										

		Pressure - bar [psi]						Max. Cont.	Max. Inter.	
<b>375</b>		17 [250]	35 [500]	69 [1000]	104 [1500]	138 [2000]	173 [2500]	207 [3000]	241 [3500]	
375 cm <sup>3</sup> [22.8 in <sup>3</sup> ] / rev										
		Torque - Nm [lb-in], Speed rpm						Intermittent Ratings - 10% of Operation		
Flow - lpm [gpm]	2 [0.5]	76 [674] 3								Theoretical rpm
	4 [1]	84 [745] 8	162 [1432] 7	329 [2911] 6	490 [4337] 6	639 [5652] 5	763 [6756] 3			
	8 [2]	82 [724] 18	171 [1510] 17	361 [3196] 16	537 [4754] 16	689 [6095] 14	836 [7399] 12	955 [8449] 9		
	15 [4]	77 [680] 39	163 [1439] 37	358 [3164] 37	537 [4756] 36	695 [6151] 32	857 [7587] 29	989 [8750] 25	1121 [9923] 20	
	23 [6]	67 [595] 60	158 [1398] 59	354 [3130] 56	527 [4661] 56	695 [6155] 52	864 [7642] 47	1011 [8951] 40	1168 [10334] 36	
	30 [8]	57 [508] 80	149 [1321] 80	340 [3010] 78	510 [4512] 77	695 [6154] 71	845 [7476] 65	1009 [8930] 60	1156 [10229] 51	
	38 [10]		134 [1187] 100	322 [2849] 99	495 [4383] 96	681 [6024] 93	836 [7399] 87	1007 [8913] 80	1157 [10235] 71	
	45 [12]		115 [1013] 121	301 [2661] 120	480 [4249] 118	645 [5711] 113	809 [7159] 108	980 [8674] 98	1141 [10098] 92	
	53 [14]		93 [819] 141	280 [2475] 140	477 [4218] 138	633 [5602] 134	795 [7036] 128	949 [8402] 120	1117 [9887] 105	
	61 [16]		73 [646] 161	261 [2314] 161	429 [3797] 160	598 [5296] 155	770 [6817] 151	934 [8267] 141	1085 [9605] 130	
	68 [18]			236 [2091] 181	434 [3843] 181	597 [5282] 177	765 [6771] 168	907 [8026] 161	1080 [9554] 150	
	76 [20]			209 [1851] 202	384 [3396] 201	561 [4969] 198	740 [6549] 191	877 [7764] 183	1027 [9091] 168	
	83 [22]			178 [1576] 222	374 [3309] 221	530 [4694] 218	696 [6160] 213	840 [7431] 205		
	91 [24]			141 [1246] 242	319 [2822] 241	511 [4523] 239	662 [5860] 233			
<b>Overall Efficiency</b> - 70 - 100% <input type="checkbox"/> 40 - 69% <input type="checkbox"/> 0 - 39% <input type="checkbox"/>										
<b>Rotor Width</b>		Theoretical Torque - Nm [lb-in]								
31.8 [1.252] mm [in]		103 [908]	205 [1815]	410 [3631]	615 [5446]	821 [7261]	1026 [9076]	1231 [10892]	1436 [12707]	
Displacement tested at 54°C [129°F] with an oil viscosity of 46cSt [213 SUS]										

► Performance data is typical. Performance of production units varies slightly from one motor to another. Operating at maximum continuous pressure and maximum continuous flow simultaneously is not recommended. For additional information on product testing please refer to page 7.

**DISPLACEMENT PERFORMANCE**

<b>470</b>		Pressure - bar [psi]					Max. Cont.	Peak	
		17 [250]	35 [500]	69 [1000]	104 [1500]	138 [2000]	173 [2500]	207 [3000]	
465 cm <sup>3</sup> [28.3 in <sup>3</sup> ] / rev									
Flow - lpm [gpm]		Torque - Nm [lb-in], Speed rpm					Intermittent Ratings - 10% of Operation		
		93 [823] 2	185 [1635] 1						Theoretical rpm
4 [1]	97 [857] 7	203 [1794] 5	409 [3618] 5	610 [5402] 5	815 [7209] 4		5		
8 [2]	98 [865] 15	209 [1845] 14	435 [3851] 13	659 [5836] 13	855 [7563] 12	1025 [9071] 11	1196 [10586] 9	17	
15 [4]	94 [834] 31	200 [1774] 30	444 [3932] 28	659 [5829] 28	886 [7836] 26	1066 [9434] 23	1250 [11062] 21	33	
23 [6]	86 [759] 48	193 [1704] 47	438 [3880] 44	673 [5955] 44	872 [7715] 41	1073 [9499] 37	1258 [11128] 32	49	
30 [8]	73 [643] 64	179 [1587] 63	424 [3752] 60	663 [5863] 60	857 [7586] 57	1098 [9718] 50	1279 [11317] 43	66	
38 [10]	52 [464] 81	164 [1455] 80	407 [3597] 78	627 [5550] 78	851 [7533] 75	1067 [9444] 68	1276 [11288] 61	82	
45 [12]		141 [1248] 97	379 [3350] 94	630 [5575] 93	832 [7363] 90	1067 [9441] 83	1273 [11264] 76	98	
53 [14]		114 [1006] 113	350 [3094] 112	580 [5133] 111	802 [7101] 108	1013 [8964] 102	1222 [10817] 94	115	
61 [16]		83 [736] 130	322 [2846] 129	545 [4819] 127	796 [7040] 123	965 [8538] 119	1190 [10528] 113	131	
68 [18]		56 [497] 146	275 [2434] 145	526 [4657] 145	737 [6519] 142	956 [8464] 138	1166 [10317] 128	147	
76 [20]			235 [2078] 162	479 [4239] 161	706 [6249] 158	917 [8117] 154	1122 [9933] 143	164	
83 [22]			202 [1790] 179	460 [4075] 178	669 [5920] 176	883 [7811] 170		180	
91 [24]			157 [1392] 195	385 [3410] 194	620 [5484] 190	843 [7464] 186		196	
<b>Rotor Width</b>		Overall Efficiency - 70 - 100% <input type="checkbox"/> 40 - 69% <input type="checkbox"/> 0 - 39% <input type="checkbox"/>							
39.4 [1.553]		Theoretical Torque - Nm [lb-in]							
mm [in]		127 [1127]	255 [2253]	509 [4506]	764 [6760]	1018 [9013]	1273 [11266]	1528 [13519]	
Displacement tested at 54°C [129°F] with an oil viscosity of 46cSt [213 SUS]									

<b>540</b>		Pressure - bar [psi]					Max. Cont.	Max. Inter.	
		17 [250]	35 [500]	69 [1000]	104 [1500]	138 [2000]	173 [2500]		
536 cm <sup>3</sup> [32.7 in <sup>3</sup> ] / rev									
Flow - lpm [gpm]		Torque - Nm [lb-in], Speed rpm					Intermittent Ratings - 10% of Operation		
		104 [921] 2	197 [1748] 2						Theoretical rpm
4 [1]	126 [1111] 6	230 [2031] 5	467 [4136] 5	699 [6183] 5	939 [8310] 5	1149 [10165] 4		4	
8 [2]	134 [1189] 13	240 [2120] 13	501 [4436] 12	755 [6679] 12	977 [8646] 11	1185 [10484] 10		8	
15 [4]	120 [1058] 27	232 [2055] 27	510 [4510] 26	757 [6697] 26	988 [8740] 24	1223 [10827] 23		15	
23 [6]	97 [859] 41	224 [1984] 41	505 [4469] 40	783 [6930] 40	993 [8787] 38	1225 [10838] 34		29	
30 [8]	78 [692] 56	213 [1887] 56	484 [4285] 55	750 [6635] 54	983 [8698] 53	1251 [11075] 48		43	
38 [10]	59 [523] 70	190 [1678] 70	455 [4026] 69	728 [6445] 69	959 [8487] 67	1244 [11008] 62		57	
45 [12]		176 [1554] 84	438 [3879] 83	719 [6360] 83	945 [8360] 80	1203 [10646] 77		71	
53 [14]		139 [1233] 98	418 [3703] 97	682 [6035] 96	952 [8421] 94	1183 [10467] 91		85	
61 [16]		109 [963] 112	385 [3407] 111	668 [5908] 111	899 [7957] 110	1163 [10290] 105		99	
68 [18]		83 [736] 126	356 [3154] 126	612 [5417] 125	869 [7694] 124	1116 [9876] 123		114	
76 [20]			323 [2861] 140	603 [5333] 139	829 [7335] 138	1109 [9816] 134		128	
83 [22]			297 [2629] 154	537 [4753] 153	792 [7011] 152			142	
91 [24]			215 [1905] 169	491 [4349] 168	750 [6639] 168			156	
<b>Rotor Width</b>		Overall Efficiency - 70 - 100% <input type="checkbox"/> 40 - 69% <input type="checkbox"/> 0 - 39% <input type="checkbox"/>							
45.5 [1.791]		Theoretical Torque - Nm [lb-in]							
mm [in]		147 [1302]	294 [2604]	588 [5207]	883 [7811]	1177 [10414]	1471 [13018]		
Displacement tested at 54°C [129°F] with an oil viscosity of 46cSt [213 SUS]									

► Performance data is typical. Performance of production units varies slightly from one motor to another. Operating at maximum continuous pressure and maximum continuous flow simultaneously is not recommended. For additional information on product testing please refer to page 7.

**DISPLACEMENT PERFORMANCE**

		Pressure - bar [psi]				Max. Cont.	Max. Inter.	
<b>620</b>		17 [250]	35 [500]	69 [1000]	104 [1500]	121 [1750]	155 [2250]	
631 cm <sup>3</sup> [38.5 in <sup>3</sup> ] / rev								
		Torque - Nm [lb-in], Speed rpm				Intermittent Ratings - 10% of Operation		
Flow - lpm [gpm]	2 [0.5]	120 [1060] 2	228 [2021] 1					Theoretical rpm
	4 [1]	136 [1202] 5	264 [2332] 5	535 [4733] 5	796 [7048] 4	935 [8275] 3		
	8 [2]	142 [1256] 11	276 [2445] 11	571 [5055] 11	853 [7550] 10	985 [8717] 9	1256 [11117] 7	
	15 [4]	131 [1159] 23	269 [2379] 23	581 [5141] 23	870 [7696] 22	1008 [8920] 21	1279 [11320] 17	
	23 [6]	111 [982] 35	260 [2300] 35	575 [5087] 34	883 [7811] 34	1014 [8976] 33	1285 [11368] 29	
	30 [8]	91 [809] 47	247 [2184] 47	555 [4914] 46	855 [7570] 45	1000 [8853] 44	1291 [11421] 40	
	38 [10]	67 [595] 59	220 [1943] 58	526 [4655] 58	833 [7372] 57	972 [8602] 56	1268 [11225] 52	
	45 [12]		203 [1794] 71	504 [4456] 70	815 [7208] 70	953 [8437] 69	1240 [10977] 65	
	53 [14]		160 [1419] 83	476 [4213] 81	778 [6888] 80	930 [8233] 79	1225 [10843] 78	
	61 [16]		124 [1095] 95	439 [3885] 94	753 [6666] 93	895 [7917] 92	1187 [10509] 90	
	68 [18]		91 [801] 107	407 [3599] 107	703 [6223] 106	852 [7537] 105	1147 [10147] 104	
	76 [20]			358 [3172] 119	675 [5974] 118	815 [7215] 117	1100 [9736] 115	
	83 [22]			328 [2901] 131	614 [5431] 131	759 [6715] 130		
	91 [24]			247 [2185] 143	556 [4922] 142	706 [6249] 141		
<b>Rotor Width</b>		<b>Overall Efficiency</b> - 70 - 100% <input type="checkbox"/> 40 - 69% <input type="checkbox"/> 0 - 39% <input type="checkbox"/>						
54.0 [2.125] mm [in]		<b>Theoretical Torque - Nm [lb-in]</b> 173 [1532] 346 [3064] 692 [6127] 1039 [9191] 1212 [10729] 1559 [13794]						
Displacement tested at 54°C [129°F] with an oil viscosity of 46cSt [213 SUS]								

		Pressure - bar [psi]				Max. Cont.	Peak	
<b>750</b>		17 [250]	35 [500]	69 [1000]	104 [1500]	138 [2000]		
748 cm <sup>3</sup> [45.6 in <sup>3</sup> ] / rev								
		Torque - Nm [lb-in], Speed rpm				Intermittent Ratings - 10% of Operation		
Flow - lpm [gpm]	2 [0.5]	147 [1299] 2	281 [2487] 1					Theoretical rpm
	4 [1]	156 [1379] 4	322 [2852] 4	652 [5768] 4	967 [8554] 3	1308 [11571] 3		
	8 [2]	158 [1403] 9	339 [3003] 9	693 [6134] 9	1027 [9088] 8	1360 [12033] 7		
	15 [4]	153 [1350] 19	331 [2933] 19	705 [6241] 19	1064 [9419] 18	1416 [12534] 16		
	23 [6]	135 [1194] 29	321 [2840] 29	697 [6166] 28	1059 [9373] 28	1408 [12462] 26		
	30 [8]	114 [1008] 40	304 [2690] 40	678 [6002] 39	1039 [9197] 38	1421 [12573] 34		
	38 [10]	82 [722] 50	271 [2395] 49	648 [5733] 49	1015 [8980] 48	1371 [12130] 47		
	45 [12]	54 [477] 60	249 [2207] 60	616 [5452] 59	983 [8699] 59	1345 [11902] 56		
	53 [14]		197 [1739] 70	577 [5104] 69	946 [8372] 68	1311 [11600] 67		
	61 [16]		150 [1325] 80	533 [4718] 79	905 [8008] 78	1271 [11249] 76		
	68 [18]		105 [927] 90	494 [4374] 90	860 [7614] 89	1225 [10843] 88		
	76 [20]		62 [552] 100	423 [3741] 100	805 [7123] 99	1173 [10385] 98		
	83 [22]			385 [3404] 110	747 [6608] 110			
	91 [24]			302 [2669] 121	670 [5932] 120			
<b>Rotor Width</b>		<b>Overall Efficiency</b> - 70 - 100% <input type="checkbox"/> 40 - 69% <input type="checkbox"/> 0 - 39% <input type="checkbox"/>						
63.5 [2.501] mm [in]		<b>Theoretical Torque - Nm [lb-in]</b> 205 [1815] 410 [3631] 821 [7261] 1231 [10892] 1641 [14522]						
Displacement tested at 54°C [129°F] with an oil viscosity of 46cSt [213 SUS]								

► Performance data is typical. Performance of production units varies slightly from one motor to another. Operating at maximum continuous pressure and maximum continuous flow simultaneously is not recommended. For additional information on product testing please refer to page 7.

# RE (505/506 Series) Medium Duty Hydraulic Motor



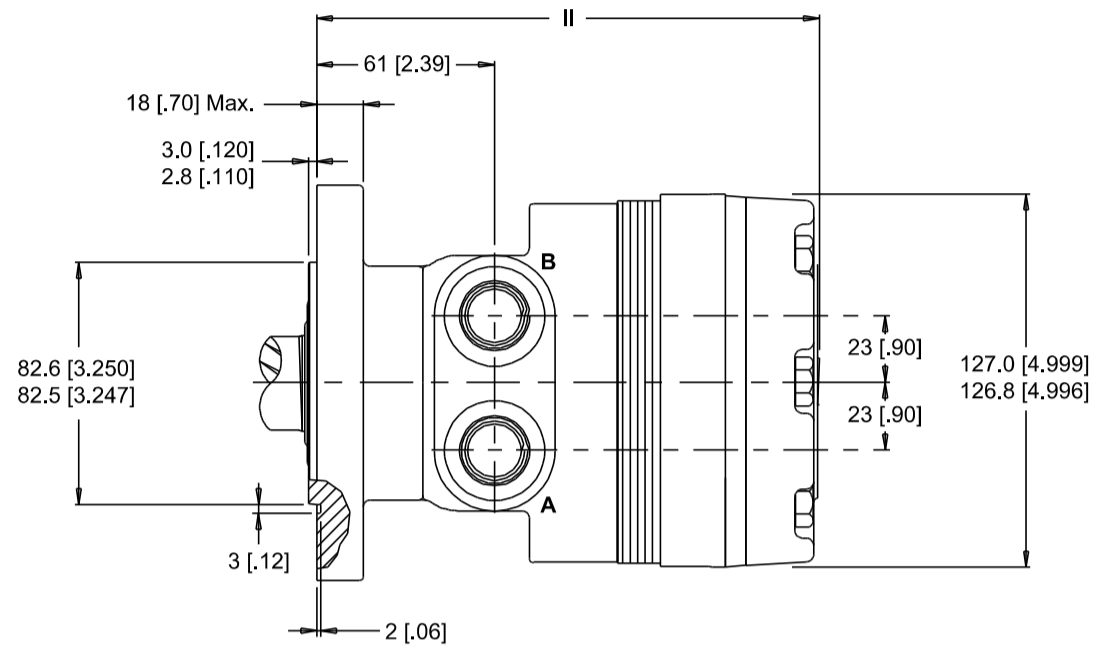
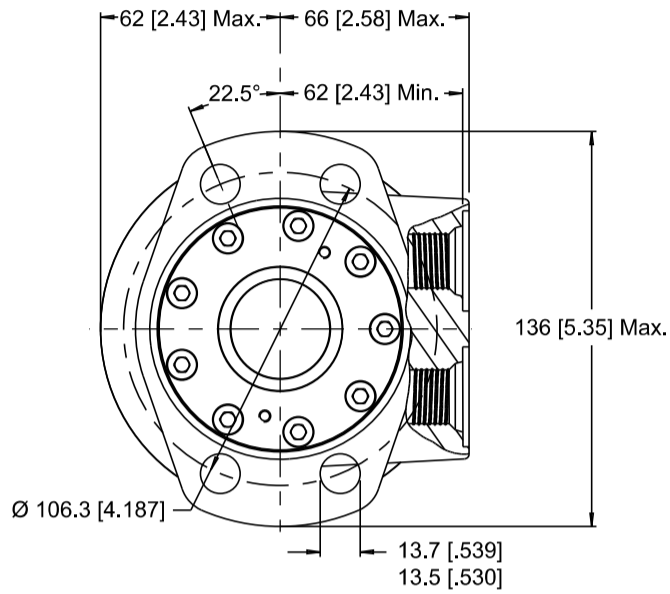
## HOUSINGS

► Dimensions shown are without paint. Paint thickness can be up to 0.13 [.005].

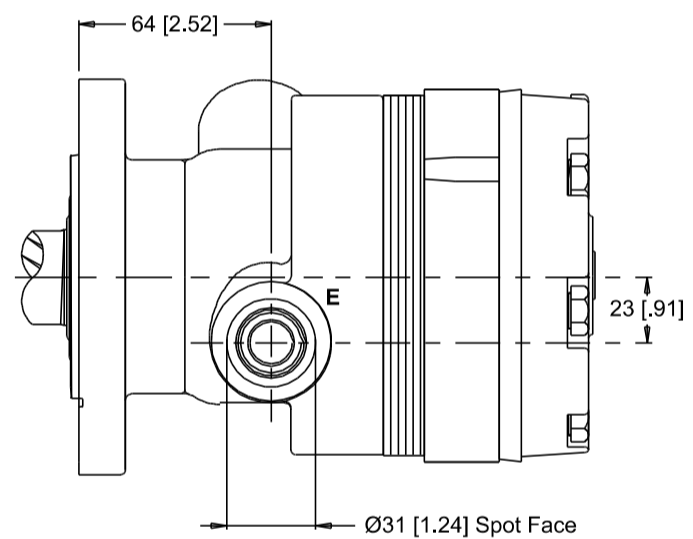
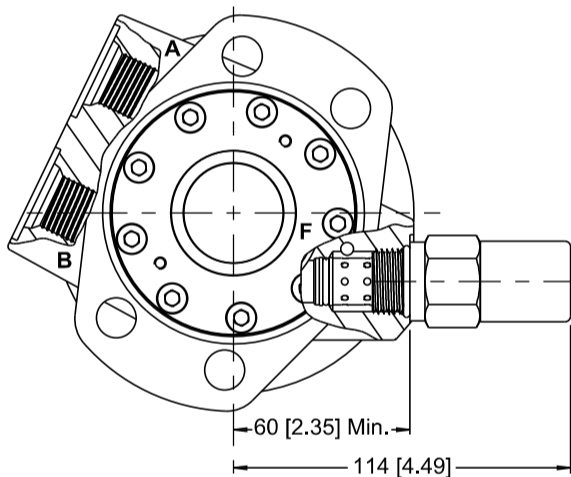
### 4-HOLE, MAGNETO MOUNT, ALIGNED PORTS

**A31** 7/8-14 UNF    **A38** G 1/2

STANDARD



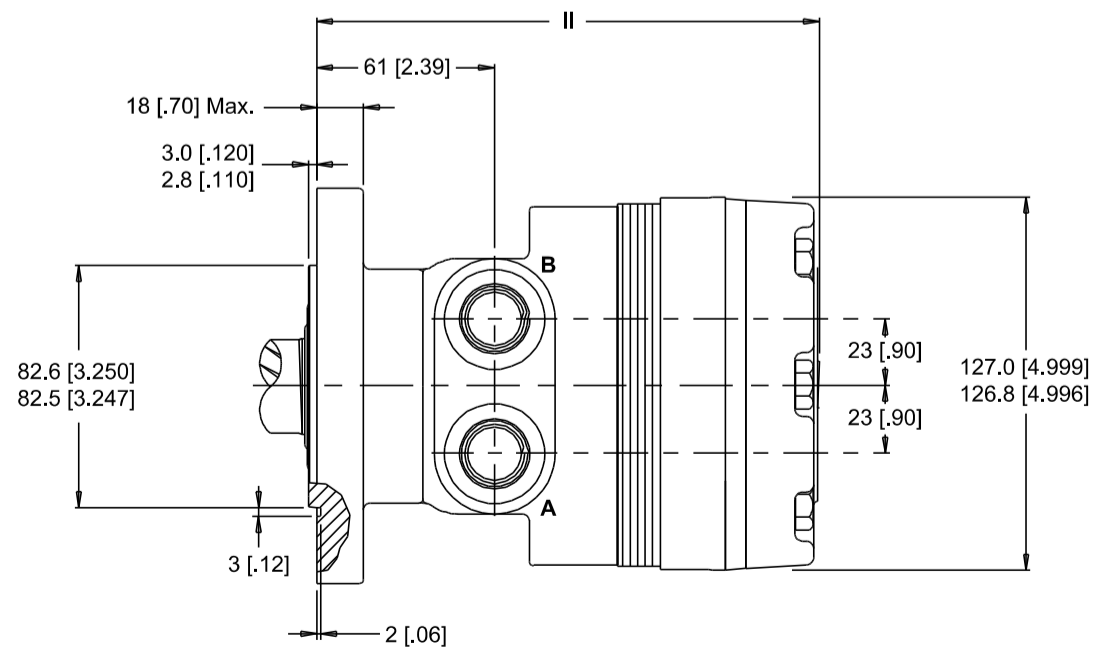
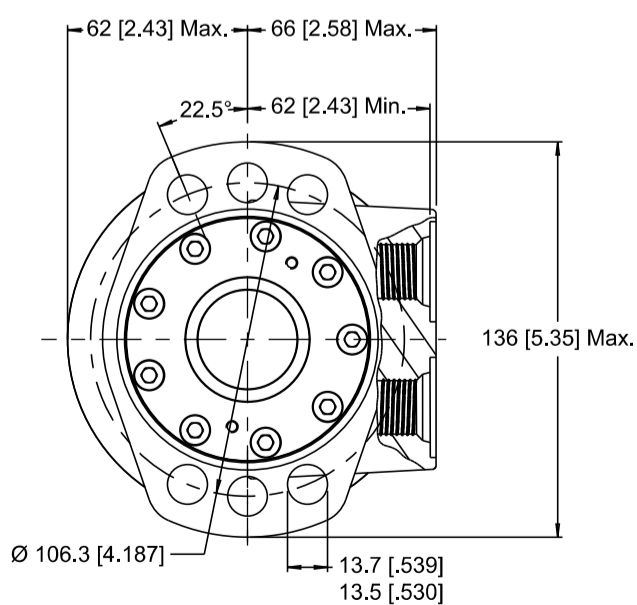
### OPTIONAL VALVE CAVITY



E: 10 Series/2-Way Valve Cavity 7/8-14 UNF    F: Valve Cartridge Installed

### 6-HOLE, SAE A MOUNT, ALIGNED PORTS

**A51** 7/8-14 UNF    **A58** G 1/2



► Dimension II is charted on page 76.



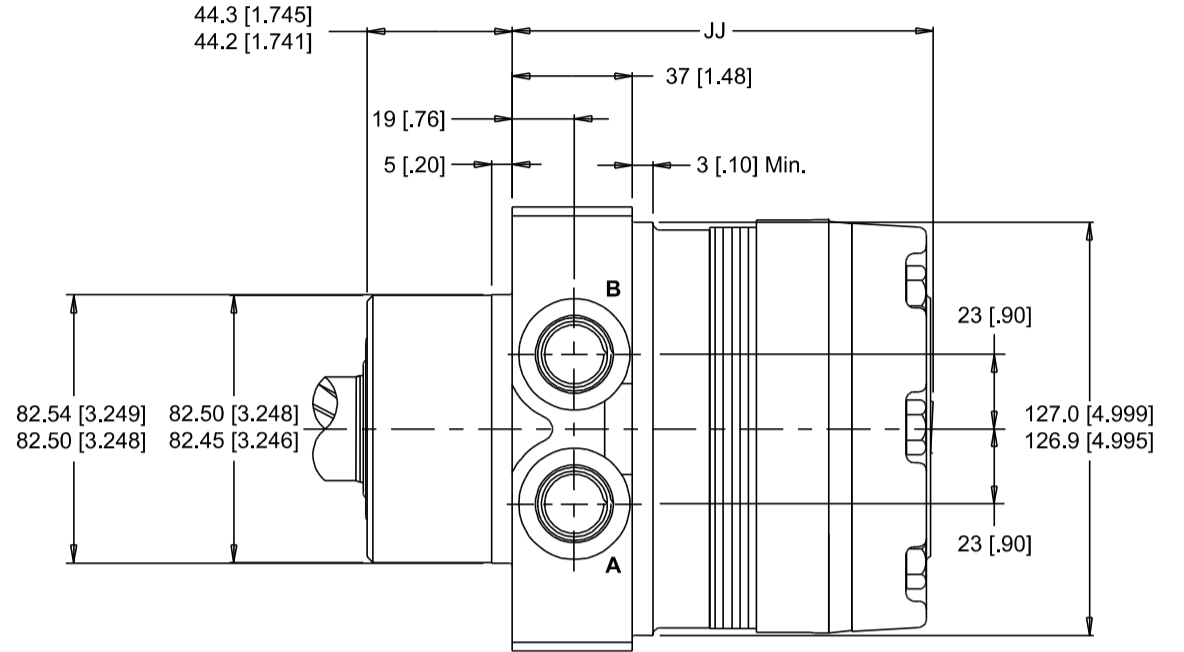
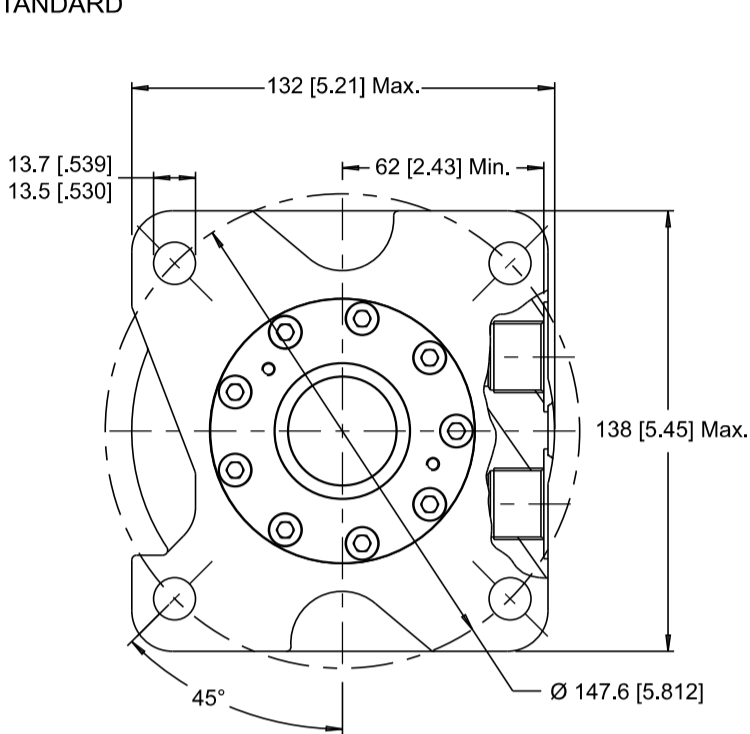
**HOUSINGS**

► Dimensions shown are without paint. Paint thickness can be up to 0.13 [.005].

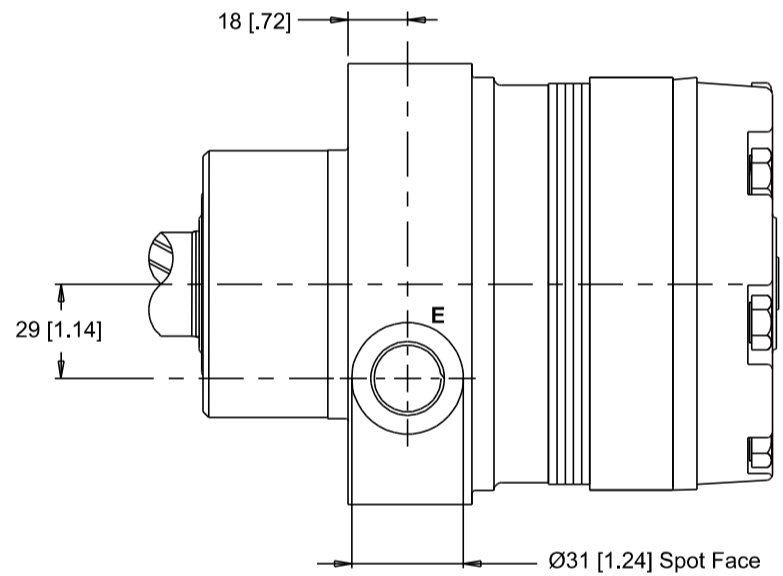
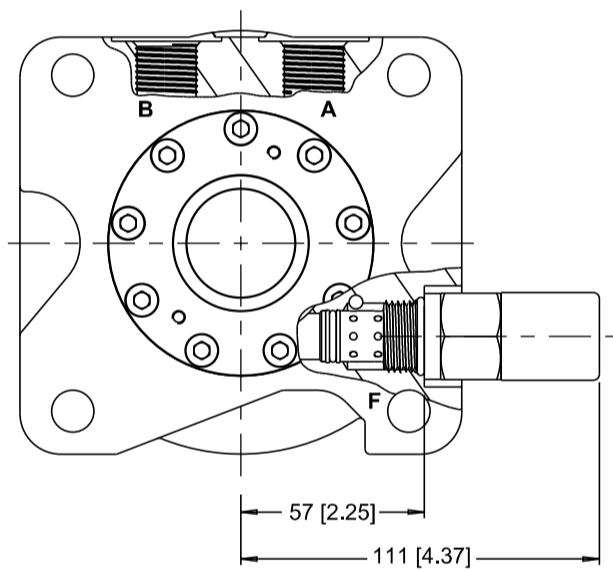
**4-HOLE, WHEEL MOUNT, ALIGNED PORTS**

**W31** 7/8-14 UNF **W38** G 1/2

STANDARD



OPTIONAL VALVE CAVITY



**E:** 10 Series/2-Way Valve Cavity 7/8-14 UNF **F:** Valve Cartridge Installed

► Dimension JJ is charted on page 76.

# RE (505/506 Series)

## Medium Duty Hydraulic Motor

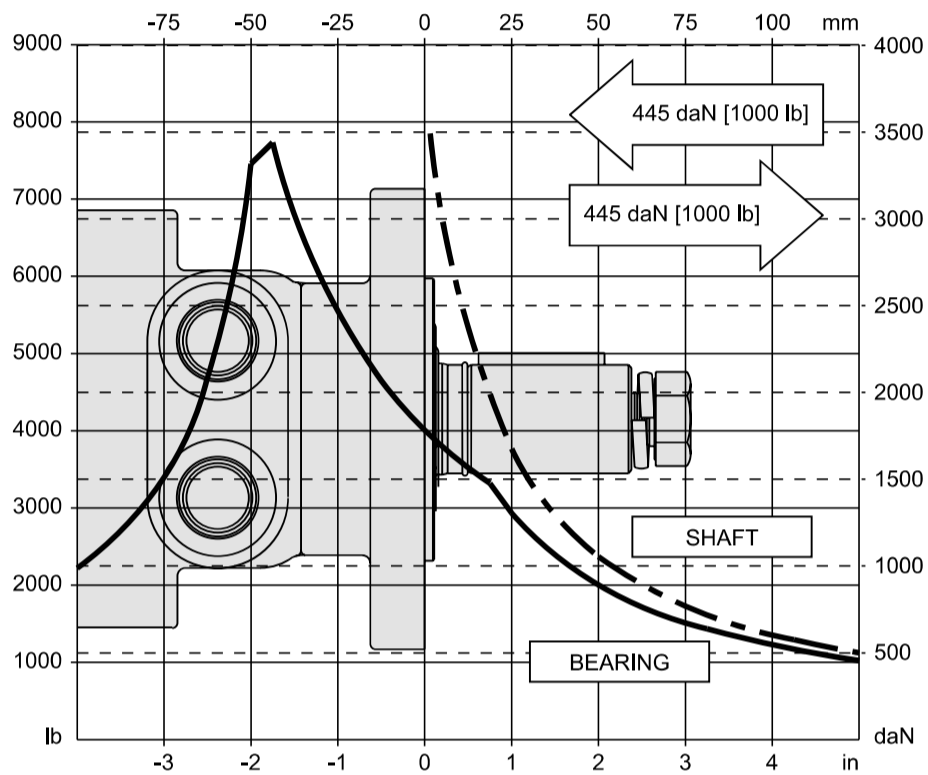


### TECHNICAL INFORMATION

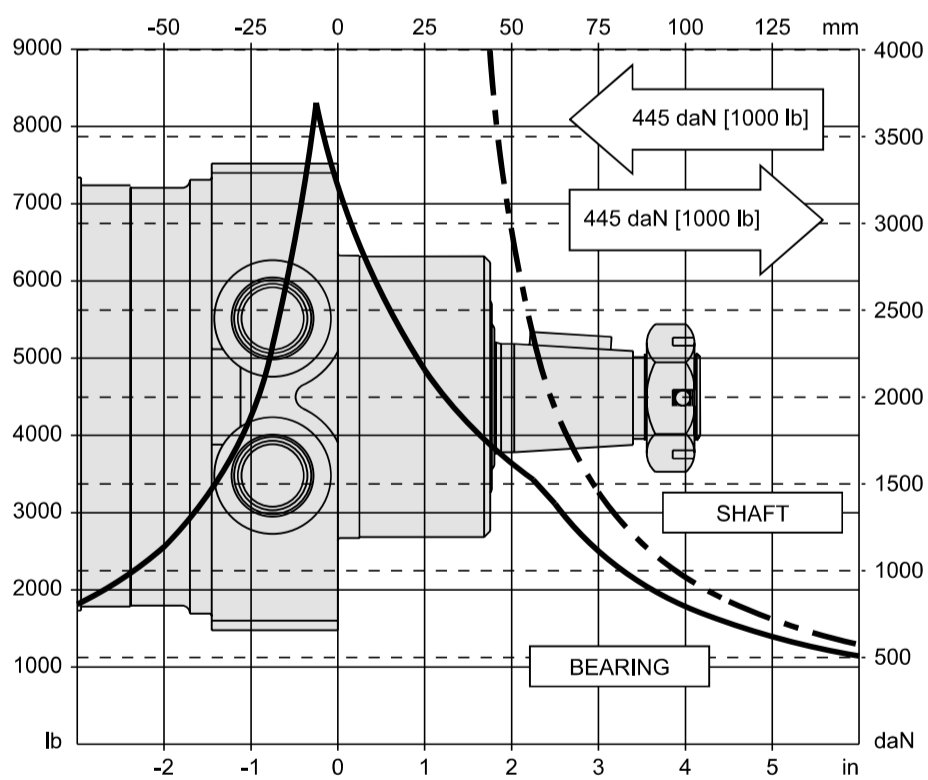
#### ALLOWABLE SHAFT LOAD / BEARING CURVE

The bearing curve represents allowable bearing loads based on ISO 281 bearing capacity for an  $L_{10}$  life of 2,000 hours at 100 rpm. Radial loads for speeds other than 100 rpm may be calculated using the multiplication factor table on page 8.

#### MAGNETO & SAE A MOUNTS



#### WHEEL MOUNTS



#### LENGTH & WEIGHT CHART

Dimensions II & JJ are the overall motor lengths from the rear of the motor to the mounting flange surface and are referenced on detailed housing drawings listed on pages 74 & 75.

II #	Length mm [in]	Weight kg [lb]
120	162 [6.37]	10.6 [23.4]
160	162 [6.37]	10.6 [23.4]
200	165 [6.51]	11.0 [24.2]
230	168 [6.61]	11.1 [24.4]
260	170 [6.70]	11.3 [25.0]
300	174 [6.83]	11.7 [25.8]
350	187 [7.38]	12.8 [28.2]
375	180 [7.08]	12.2 [27.0]
470	187 [7.38]	12.8 [28.2]
540	194 [7.62]	13.3 [29.4]
620	202 [7.95]	14.1 [30.9]
750	212 [8.33]	14.8 [32.5]

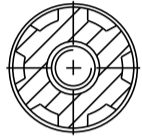
JJ #	Length mm [in]	Weight kg [lb]
120	120 [4.72]	11.7 [25.8]
160	120 [4.72]	11.7 [25.8]
200	123 [4.86]	12.1 [26.6]
230	126 [4.95]	12.2 [26.8]
260	128 [5.05]	12.4 [27.4]
300	132 [5.18]	12.8 [28.2]
350	146 [5.73]	13.9 [30.6]
375	138 [5.43]	13.3 [29.4]
470	146 [5.73]	13.9 [30.6]
540	152 [5.97]	14.4 [31.8]
620	161 [6.35]	15.1 [33.4]
750	170 [6.68]	15.8 [34.9]

► All RE series motor weights can vary  $\pm 0.5$  kg [1 lb] depending on model configurations such as housing, shaft, endcover, options etc.

**SHAFTS**

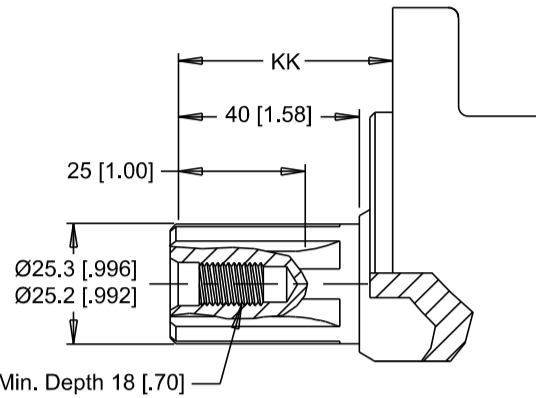
**02** 1" 6B Spline

6B Spline  
SAE J499 Standard



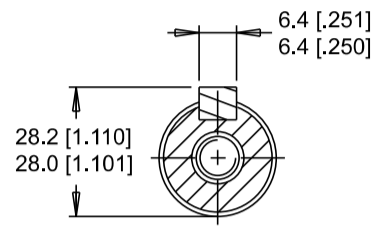
5/16-18 UNC, Min. Depth 18 [.70]

**03** 1" 6B Spline Extended



Max. Torque: 678 Nm [6000 lb-in]

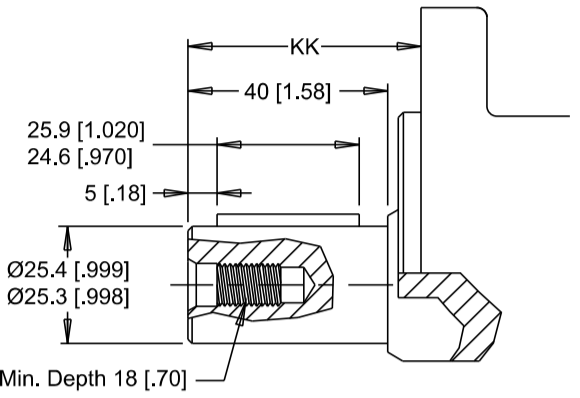
**10** 1" Straight



5/16-18 UNC, Min. Depth 18 [.70]

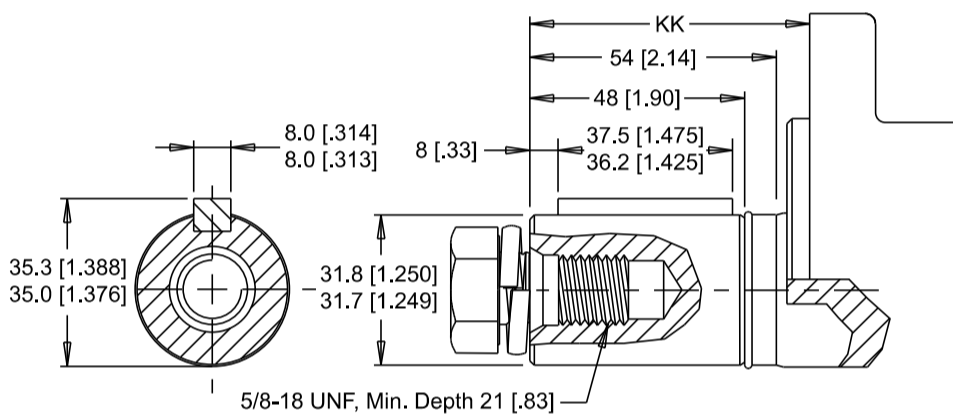
Max. Torque: 655 Nm [5800 lb-in]

**15** 1" Straight Extended



**07** 1-1/4" Straight Extended

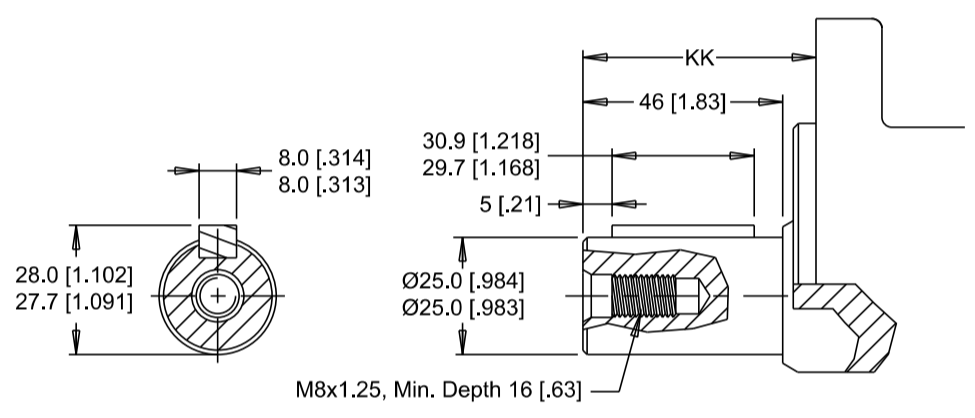
**20** 1-1/4" Straight



5/8-18 UNF, Min. Depth 21 [.83]

Max. Torque: 1200 Nm [10600 lb-in]

**12** 25mm Straight

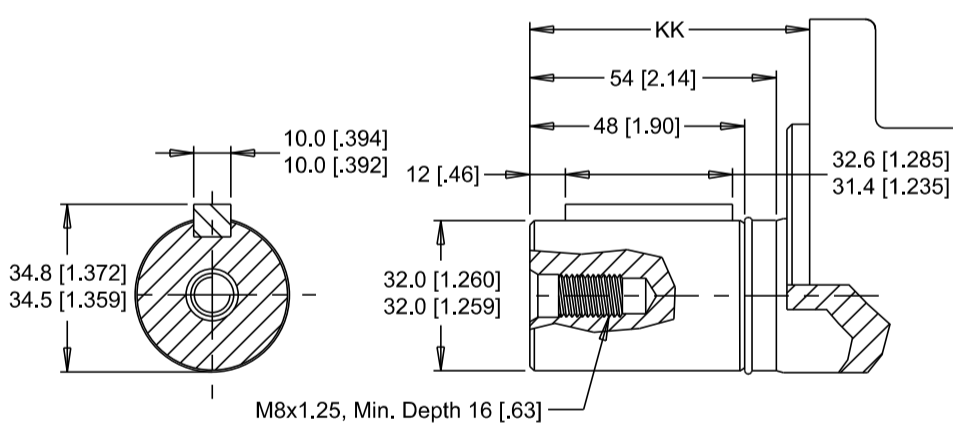


M8x1.25, Min. Depth 16 [.63]

Max. Torque: 678 Nm [6000 lb-in]

**08** 32mm Straight Extended

**21** 32mm Straight

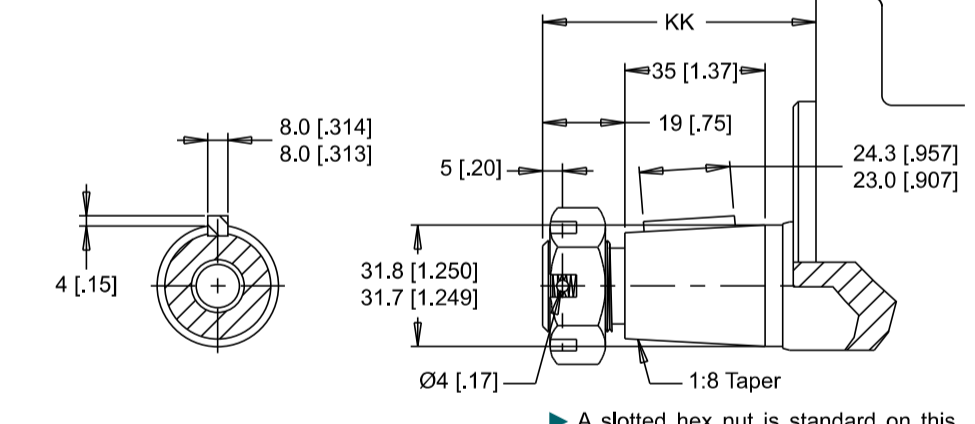


M8x1.25, Min. Depth 16 [.63]

Max. Torque: 1200 Nm [10600 lb-in]

**22** 1-1/4" Tapered

**25** 1-1/4" Tapered Extended



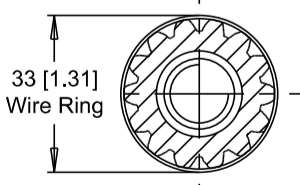
► A slotted hex nut is standard on this shaft.

Max. Torque: 1200 Nm [10600 lb-in]

**09** 14 Tooth Spline Extended

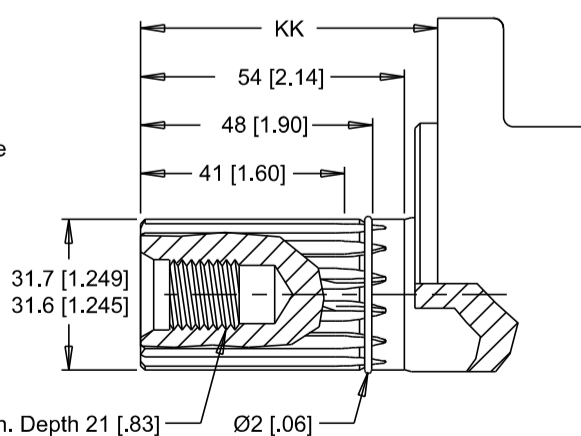
**23** 14 Tooth Spline

14 Tooth Spline 12/24 Pitch  
Standard ANSI B92.1-1996 Spline



33 [1.31]  
Wire Ring

5/8-18 UNF, Min. Depth 21 [.83]



Max. Torque: 1200 Nm [10600 lb-in]

**MOUNTING / SHAFT LENGTH CHART**

Dimension KK is the overall distance from the motor mounting surface to the end of the shaft and is referenced on detailed shaft drawings above.

KK #	Magneto & A Mounts mm [in]	Wheel Mounts mm [in]
02	50 [1.97]	91 [3.60]
03	76 [3.01]	118 [4.64]
07	88 [3.45]	129 [5.09]
08	88 [3.45]	129 [5.09]
09	88 [3.45]	129 [5.09]
10	50 [1.97]	91 [3.60]
12	56 [2.21]	98 [3.84]
15	76 [3.01]	118 [4.64]
20	61 [2.41]	103 [4.05]
21	61 [2.41]	103 [4.05]
22	66 [2.58]	107 [4.22]
23	61 [2.41]	103 [4.05]
25	92 [3.62]	134 [5.26]

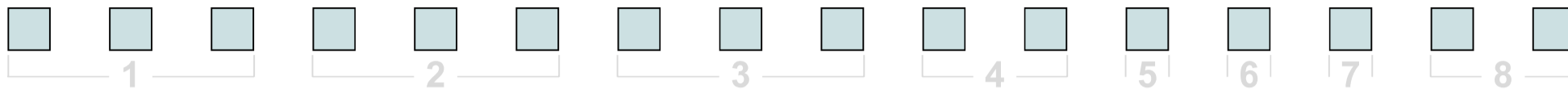
► Shaft lengths vary ± 0.8 mm [.030 in.]

# RE (505/506 Series)

## Medium Duty Hydraulic Motor



### ORDERING INFORMATION



#### 1. CHOOSE SERIES DESIGNATION

<b>505</b> Standard Rotation	<b>506</b> Reverse Rotation
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► The 505 & 506 series are bi-directional. 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.

#### 2. SELECT A DISPLACEMENT OPTION

<b>120</b> 121 cm <sup>3</sup> /rev [7.4 in <sup>3</sup> /rev]	<b>350</b> 348 cm <sup>3</sup> /rev [21.2 in <sup>3</sup> /rev]
<b>160</b> 162 cm <sup>3</sup> /rev [9.9 in <sup>3</sup> /rev]	<b>375</b> 375 cm <sup>3</sup> /rev [22.8 in <sup>3</sup> /rev]
<b>200</b> 204 cm <sup>3</sup> /rev [12.4 in <sup>3</sup> /rev]	<b>470</b> 465 cm <sup>3</sup> /rev [28.3 in <sup>3</sup> /rev]
<b>230</b> 232 cm <sup>3</sup> /rev [14.2 in <sup>3</sup> /rev]	<b>540</b> 536 cm <sup>3</sup> /rev [32.7 in <sup>3</sup> /rev]
<b>260</b> 261 cm <sup>3</sup> /rev [15.9 in <sup>3</sup> /rev]	<b>620</b> 631 cm <sup>3</sup> /rev [38.5 in <sup>3</sup> /rev]
<b>300</b> 300 cm <sup>3</sup> /rev [18.3 in <sup>3</sup> /rev]	<b>750</b> 748 cm <sup>3</sup> /rev [45.6 in <sup>3</sup> /rev]

#### 3. SELECT A MOUNT & PORT OPTION

<b>A31</b> 4-Hole, Magneto Mount, Aligned Ports, 7/8-14 UNF
<b>A38</b> 4-Hole, Magneto Mount, Aligned Ports, G 1/2
<b>A51</b> 6-Hole, SAE A Mount, Aligned Ports, 7/8-14 UNF
<b>A58</b> 6-Hole, SAE A Mount, Aligned Ports, G 1/2
<b>W31</b> 4-Hole, Wheel Mount, Aligned Ports, 7/8-14 UNF
<b>W38</b> 4-Hole, Wheel Mount, Aligned Ports, G 1/2

► Speed sensor option is not available with wheel mounts

#### 4. SELECT A SHAFT OPTION

<b>02</b> 1" 6B Spline	<b>15</b> 1" Straight Extended
<b>03</b> 1" 6B Spline Extended	<b>20</b> 1-1/4" Straight
<b>07</b> 1-1/4" Straight Extended	<b>21</b> 32mm Straight
<b>08</b> 32mm Straight Extended	<b>22</b> 1-1/4" Tapered
<b>09</b> 14 Tooth Spline Extended	<b>23</b> 14 Tooth Spline
<b>10</b> 1" Straight	<b>25</b> 1-1/4" Tapered Extended
<b>12</b> 25mm Straight	

► Extended shafts are designed for use with one of the speed sensor options listed in STEP 7.

#### 5. SELECT A PAINT OPTION

<b>A</b> Black
<b>B</b> Black, Unpainted Mounting Surface
<b>Z</b> No Paint

#### 6. SELECT A VALVE CAVITY / CARTRIDGE OPTION

<b>A</b> None	<b>E</b> 104 bar [1500 psi] Relief
<b>B</b> Valve Cavity Only	<b>F</b> 121 bar [1750 psi] Relief
<b>C</b> 69 bar [1000 psi] Relief	<b>G</b> 138 bar [2000 psi] Relief
<b>D</b> 86 bar [1250 psi] Relief	

► Valve cavity is not available on the A51 & A58 housings.

#### 7. SELECT AN ADD-ON OPTION

<b>A</b> Standard
<b>B</b> Lock Nut
<b>C</b> Solid Hex Nut
<b>W</b> Speed Sensor, Dual, 4-Pin Male Weatherpack Connector
<b>X</b> Speed Sensor, Dual, 4-Pin M12 Male Connector
<b>Y</b> Speed Sensor, Single, 3-Pin Male Weatherpack Connector
<b>Z</b> Speed Sensor, Single, 4-Pin M12 Male Connector

#### 8. SELECT A MISCELLANEOUS OPTION

<b>AA</b> None
<b>AC</b> Freeturning Rotor
<b>AE</b> Hydraulic Declutch With Freeturning Rotor