

Features at a Glance*:

| | <i>SM1720</i> | <i>SM2315</i> | <i>SM2310</i> | <i>SM2320</i> | <i>SM2330</i> | <i>SM2340</i> | <i>SM3415</i> | <i>SM3410</i> | <i>SM3420</i> | <i>SM3430</i> | <i>SM3440</i> | <i>SM3450</i> | <i>SM4210</i> | <i>SM4220</i> | <i>SM4230</i> | <i>SM5610</i> | <i>SM5620</i> | <i>SM5630</i> |
|--|---------------|---------------|---------------|---------------|---------------|---------------|---------------|---------------|---------------|---------------|---------------|---------------|---------------|---------------|---------------|---------------|---------------|---------------|
| Cost | Med | Low | Med | Med | Med | Med | Low | Med | Med | Med | Med | Med | Med | Med | Med | Med | Med | Med |
| Performance | High | Med | High | High | High | High | Med | High | High | High | High | High | High | High | High | High | High | High |
| True BLDC Servo | | | | | | | | | | | | | | | | | | |
| Poles | 4 | 8 | 4 | 4 | 4 | 4 | 8 | 4 | 4 | 4 | 4 | 4 | 4 | 4 | 4 | 4 | 4 | 4 |
| Slots | 15 | 12 | 15 | 15 | 15 | 15 | 12 | 24 | 24 | 24 | 24 | 24 | 24 | 24 | 24 | 24 | 24 | 24 |
| Peak Torque (oz-in) | 90 | 88 | 53 | 90 | 125 | 125 | 326 | 180 | 540 | 575 | 625 | 750 | 4,147 | 3,100 | 4,224 | 3,870 | 6,494 | 9,052 |
| Cont. Torque (oz-in) | 35 | 20 | 20 | 38 | 50 | 55 | 45 | 45 | 100 | 155 | 210 | 250 | 208 | 320 | 428 | 456 | 729 | 1,050 |
| Top Speed (rpm) | 8,700 | 10,786 | 13,220 | 7,820 | 5,590 | 5,310 | 3,750 | 5,060 | 4,310 | 3,850 | 3,609 | 3,398 | 2,225 | 2,950 | 2,200 | 4,075 | 2,425 | 1,743 |
| Torque Con. (oz-in/amp) | 7.57 | 6.02 | 5.55 | 8.92 | 12.60 | 13.90 | 17.20 | 12.50 | 14.60 | 16.40 | 17.40 | 18.50 | 172.80 | 129.60 | 172.80 | 94.40 | 158.40 | 220.80 |
| Voltage Con. (V/krpm) | 5.50 | 4.45 | 4.11 | 6.60 | 9.32 | 10.26 | 12.80 | 9.20 | 10.80 | 12.10 | 12.90 | 13.70 | 128.00 | 96.00 | 128.00 | 70.00 | 117.00 | 164.00 |
| Weight (inches) | 1.21 | 1.00 | 1.20 | 1.74 | 2.27 | 2.79 | 2.50 | 2.50 | 3.50 | 4.50 | 5.50 | 6.50 | 22.00 | 27.00 | 32.00 | 36.00 | 46.00 | 56.00 |
| Rot. Inertia (oz-in-sec ²) | 0.00026 | 0.00099 | 0.00095 | 0.00184 | 0.00273 | 0.00362 | 0.0060 | 0.0060 | 0.0130 | 0.0190 | 0.0250 | 0.0300 | 0.029 | 0.042 | 0.054 | 0.11 | 0.18 | 0.24 |
| Width (inches) | 1.65 | 2.25 | 2.25 | 2.25 | 2.25 | 2.25 | 3.25 | 3.25 | 3.25 | 3.25 | 3.25 | 3.25 | 4.25 | 4.25 | 4.25 | 5.75 | 5.75 | 5.75 |
| Length (inches) | 3.70 | 2.25 | 3.08 | 3.73 | 4.37 | 5.02 | 3.00 | 3.49 | 4.14 | 4.79 | 5.44 | 6.09 | 13.50 | 15.00 | 16.50 | 14.50 | 16.50 | 18.50 |
| Shaft Diameter (inches) | 0.188** | 0.250 | 0.250 | 0.250 | 0.250 | 0.250 | 0.375 | 0.375 | 0.375 | 0.375 | 0.375 | 0.375 | 0.625 | 0.625 | 0.625 | 1.125 | 1.125 | 1.125 |
| Encoder Resolution | 2,000 | 2,000 | 2,000 | 2,000 | 2,000 | 2,000 | 4,000 | 4,000 | 4,000 | 4,000 | 4,000 | 4,000 | 4,000 | 4,000 | 4,000 | 4,000 | 4,000 | 4,000 |
| Opt 256,000 counts/rev | | | | | | | | | | | | | | | | | | |
| 32 Bit Pos. Vel. Acc. | | | | | | | | | | | | | | | | | | |
| All Changeable on Fly | | | | | | | | | | | | | | | | | | |
| Limit Inputs | | | | | | | | | | | | | | | | | | |
| Encoder Outputs | | | | | | | | | | | | | | | | | | |
| Encoder Follow/Gearing | | | | | | | | | | | | | | | | | | |
| Infinite Ratio Camming | | | | | | | | | | | | | | | | | | |
| Step & Direction Input | | | | | | | | | | | | | | | | | | |
| 7 Analog Inputs (10-bit) | | | | | | | | | | | | | | | | | | |
| Removable Memory | | | | | | | | | | | | | | | | | | |
| Non Vol. Data Memory | | | | | | | | | | | | | | | | | | |
| AniLink Port | | | | | | | | | | | | | | | | | | |
| AniLink Port with 485 | | | | | | | | | | | | | | | | | | |
| AniLink & Separate 485 | | | | | | | | | | | | | | | | | | |
| D.C. Input to 48 Volts | | | | | | | | | | | | | | | | | | |
| A.C. Input to 208, 3ph | | | | | | | | | | | | | | | | | | |
| Standard Military Con. | | | | | | | | | | | | | | | | | | |
| Optional IP65+ | | | | | | | | | | | | | | | | | | |
| Connector Entry | Side | Side | Side | Side | Side | Side | Side | End | End | End | End | End | Side | Side | Side | Side | Side | Side |
| Nema Standard Frame | | | | | | | | | | | | | | | | | | |
| Full Firmware Implement | | | | | | | | | | | | | | | | | | |
| CE Mark | | | | | | | | | | | | | | | | | | |

*As of July 16, 1999 ** Changing to 0.1965 Dia. (5mm) as of fourth quarter, 1999 to adhere to true Nema standards