## **M SERIES**

400, 675, 1000 & 1500 IN/LBS, NEMA 4



The M series rotary electric actuator was designed for small and medium size valve and damper applications. This industrial grade reversing actuator has been manufactured for over thirty years and has achieved an impeccable reputation for reliability in applications requiring repeated superior performance year after year.

## **SPECIFICATIONS:**

TORQUE MS 400 In-Lb (45.2 Nm)
MR 675 In-Lb (76.3 Nm)
ML 1000 In-Lb (113Nm)
MH 1500 In-Lb (169.5Nm)

CYCLE TIME MS 10 Sec./90 12Vdc, 24Vdc, 24Vac, 115Vac & 230Vac 23 Sec./90 115Vac extended duty motor (75%) MS 15 Sec./90 12Vdc, 24Vdc, 24Vac, 115Vac & 230Vac MR & ML 40 Sec./90 115Vac extended duty motor (75%) MR & ML 30 Sec./90 12Vdc, 24Vdc, 24Vac, 115Vac & 230Vac MH

MH 75 Sec./90 115Vac extended duty motor (75%)

DUTY CYCLE 25% standard on 115Vac and 230Vac

75% standard on 12Vdc, 24Vdc and 24Vac, 115Vac extended duty motor, optional

MOTOR Permanent split capacitor (for AC) with thermal overload protection

CURRENT RATINGS FL= Full Load, LR= Lock Rotor

|   |         | 115 Vac (Std.) |      | 115 Vac<br>Extended Duty |      | 24 Vac |      | 24 Vdc |      | 12 Vdc |      | 208<br>Vac/1Ph/60Hz |      | 230<br>Vac/1Ph/60Hz |      |
|---|---------|----------------|------|--------------------------|------|--------|------|--------|------|--------|------|---------------------|------|---------------------|------|
|   |         | FL             | LR   | FL                       | LR   | FL     | LR   | FL     | LR   | FL     | LR   | FL                  | LR   | FL                  | LR   |
|   | MS & MR | 0.38           | 0.75 | 0.38                     | 0.75 | 0.90   | 3.20 | 0.90   | 3.20 | 1.70   | 4.20 | 0.21                | 0.42 | 0.18                | 0.38 |
| ĺ | ML & MH | 0.38           | 0.75 | 0.38                     | 0.75 | 1.10   | 3.20 | 1.10   | 3.20 | 2.20   | 4.20 | 0.21                | 0.42 | 0.18                | 0.38 |

The motor's LR amps must be taken into account when sizing the input power supply and fuses. Slow blow fuses are recommended

CERTIFICATION CSA Master Contract 178618

CLASSIFICATION 3221 02 - Valves - Actuators; 3221 82 - Valves - Actuators Certified to US Standards

CANADIAN C22.2 No. 139-1982 (Reaffirmed 2000) – Electrically Operated Valves C22.2 No. 94-M91 (Reaffirmed 2001) – Special Purpose Enclosures

UNITED STATES UL 429, 5th Edition (8 Oct 2004) – Electrically Operated Valves

UL 50, 11th Edition (12 Sep 2003) - Enclosures for Electrical Equipment

APPROVED VOLTAGES 115Vac APPROVED ENCLOSURE Type 4

APPROVED TEMP. -4F (-20C) to 104F (40C)

APPROVED OPTIONS One or Two Auxiliary Switches, Declutching Manual Override with Hand Wheel, Friction Brake, Power On

Brake and Power Off Brake for 115Vac (For complete list of options, see option grid in catalog page 33)

COATING Thermally bonded polyester powder

POSITION INDICATOR Visual Dome Indicator

Electric Feedback from limit switches, same as operating voltage

SWITCHES Snap action SPDT, 15A @ 250Vac



## **M SERIES**

400, 675, 1000 & 1500 IN/LBS, NEMA 4



LUBRICATION Grease Permanent, little or no maintenance required

WEIGHT Pound MS, MR & ML - 16 (lb) MH - 22 (lb)

Kilogram MS, MR & ML - 7.26 (kg) MH - 10 (kg)

MOUNTING Universal

MOUNTING PAD ISO 5211 F07 with 17mm star drive (And F10 bolt circle on MH only)

TEMPERATURE -40F (-40C) to 150F (65.6C), heater & thermostat required 0F and below

Optional double heater for application up to -76F (-60C)

OVERRIDE Manual, Declutching Hand Wheel



