**Description and Specifications:**

- **Model**
  - Torque range
  - Speed range

- **Isolated Signals**
  - Optical isolation 1000V min [AI and AF models only]

- **Feedback 4..20mA**
  - For sensing resistor of [AF model only]
  - max. 250 ohms. Floats +6VDC / -2VDC from power Gnd

- **Position power loss**
  - Standard: “remembers” position before shut down, will reseat valve based on torque setting when the signal is between 3 and 4 mA

**Other Specifications Multi-turn Models:**

- **Range/ Speed setting**
  - Dip switches inside enclosure

**Other Specifications ¼ and ½ turn Models:**

- **TTL Signals in**
  - Internal pull up, < 1mA required to pull down

- **TTL signals out (Feedback)**
  - Will drive max. 2.5mA

**Weights:**

- Rxx: 980 g
- RxH/RxU: 1700 g

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**Enclosure:**
- Aluminum die cast anodized, stainless Class I, Div 1 Groups B, C, D/T6
- Class II Groups E, F, G/T6 (85 deg. cel)

**Temperature range:**
- 0..70 deg Cel (derate duty cycle at high temp.)

**Ext. temp. range:**
- -40..80 deg Cel (w. Heater option)

**Stall protection:**
- Electronic position and motion detection

**Feedback:**
- TTL, 4 - 20mA

**Manual Override:**
- Optional, N/A for Ex-proof enclosure

**Gears & Bearings:**
- Metal and bronze, oiled/greased for life

**External Fasteners:**
- Stainless Steel

**Life Expectance:**
- 250,000 cycles in specified conditions

**Motor:**
- Brushless DC motor, computer control

**Voltagess/Current:**
- 12-24 VDC/Max3A @ 24VDC
- 110/220 VAC/Max3A @ 110/220VAC

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**Positioning precision:**
- +/- 3 deg for 1/4 – 1/2 turn
- +/- 0.25 deg for multi turn

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**Positioning resolution:**
- +/- 0.15 deg max.

**Range/ Speed setting:**
- Analog (4 - 20 mA, 1 - 5 V, 1 - 10 V), Modbus, TTL (on/off)

**End travel detection:**
- For needle valve, by motion detection

**Power setting:**
- Adjustable

**Mechanical shock:**
- Repeated ≤ 130 g - force no effect, occasional ≤ 150 g - force no effect > 150 g - force not tolerated

**Mechanical vibration:**
- Random SAE J1211, Chassis, Exterior

**Thermal Shock:**
- -20 deg cel to + 70 deg cel 10 min

**Failsafe battery:**
- LiPo rechargeable battery

**Failsafe spring return:**
- For specific selected applications

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**RCx Multi-turn models**

<table>
<thead>
<tr>
<th>Model</th>
<th>Torque range</th>
<th>Speed range</th>
</tr>
</thead>
<tbody>
<tr>
<td>RCJ</td>
<td>3..17</td>
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<tr>
<td>RCL</td>
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<td>1..7</td>
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<tr>
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<td>RCL - F</td>
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<td>RCH</td>
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<tr>
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<td>230..915</td>
<td>38..152</td>
</tr>
<tr>
<td>RCU</td>
<td>372..1490</td>
<td>60..240</td>
</tr>
</tbody>
</table>

* De-rate the duty cycle to 25% for the highest torque values

**Note:** speed and torque depend on settings by dip switch of actuator

Consult user manuals of individual units. Actuators are set for optimum speed.