RCS2-GD5N
Robo Cylinder, Mini Rod Type, Short-Length Double-Guide Type, Actuator Width 46mm, 200V Servo Motor, Ball Screw Specification

Model Specification Items
- Series: RCS2 — Type: GD5N
- Encoder type: Incremental specification
- Motor type: 60: 60W Servo motor
- Lead: 10: 10mm 5: 5mm 2.5: 2.5mm
- Stroke: 50: 50mm 75: 75mm
- Applicable controller: T2: SCON-CA SSEL XSEL-P/Q

<table>
<thead>
<tr>
<th>Stroke (mm)</th>
<th>Standard price</th>
</tr>
</thead>
<tbody>
<tr>
<td>50</td>
<td>—</td>
</tr>
<tr>
<td>75</td>
<td>—</td>
</tr>
</tbody>
</table>

Actuator Specifications

Leads and Payloads

- Model number:
  - RCS2-GD5N-I-60-10-T2-3
  - RCS2-GD5N-I-60-5-T2-1
  - RCS2-GD5N-I-60-2.5-T2-2

- Motor output (W):
  - 60 (Ballscrew)

- Lead screw:
  - 10mm: 5mm 2.5mm

- Max. Load Capacity:
  - Normal: 5mm 2.5mm
  - Vertical: 5mm

- Rated Thrust (N):
  - 89 ±0.02

- Stroke (mm):
  - 50 75

Stroke and Maximum Speed

- Lead Stroke
  - 50 (mm)
  - 75 (mm)

- Stroke (mm):
  - 10 280 <230> 380 <330>
  - 5 250 <230> 250
  - 2.5 125

Options

- Brake: B
- CE compliance: CE
- Connector cable exits (left): K1
- Connector cable exits (front): K2
- Connector cable exits (right): K3

Appendix

CE compliance is optional.

(1) The horizontal payload is the value when used in combination with a guide so that a radial load and moment load are not applied to the rod. See page A-111 for correlation diagrams of the end load and service life when a guide is not installed.

(2) The payload is the value when the actuator is operated at an acceleration of 0.3 G (0.2G for 2.5mm-lead) horizontally and 0.2G vertically. The acceleration limit is the value indicated above.

(3) If the actuator is used vertically, pay attention to rod contact because the rod will come down when the power is turned off.

(4) See page A-71 for details on push motion.

Technical References

Appendix P.5

*CE compliance is optional.

Options

- Brake: B
- CE compliance: CE
- Connector cable exits (left): K1
- Connector cable exits (front): K2
- Connector cable exits (right): K3

Actuator Specifications

- Drive System
  - Ball screw, ø8mm, rolled C10
- Lost Motion
  - 0.1mm or less
- Frame
  - Material: Aluminum, white alumite treated
- Ambient operating temperature, humidity
  - 0 to 40°C, 85% RH or less (Non-condensing)
- Service life
  - 5,000km or 50 million cycles

Code explanation

➀ Stroke
➁ Cable length
➂ Options

*See page A-71 for details on push motion.

*See page A-59 for details on push motion.

*See page A-59 for cables for maintenance.
RCS2 ROBO Cylinder

**Dimensions and Weight by Stroke**

<table>
<thead>
<tr>
<th>Stroke</th>
<th>50</th>
<th>75</th>
</tr>
</thead>
<tbody>
<tr>
<td>L1</td>
<td>130</td>
<td>155</td>
</tr>
<tr>
<td>L2</td>
<td>108</td>
<td>133</td>
</tr>
<tr>
<td>Weight (kg)</td>
<td>1.6</td>
<td>1.9</td>
</tr>
</tbody>
</table>

*Brake-equipped models are heavier by 0.26kg.

**Applicable Controllers**

RCS2 series actuators can be operated with the controllers indicated below. Select the type according to your intended application.

<table>
<thead>
<tr>
<th>Name</th>
<th>External view</th>
<th>Model number</th>
<th>Features</th>
<th>Maximum number of positioning points</th>
<th>Input power</th>
<th>Power-supply capacity</th>
<th>Standard price</th>
<th>Reference page</th>
</tr>
</thead>
<tbody>
<tr>
<td>Positioner Type</td>
<td></td>
<td>SCON-CA-60I-NP-2-1</td>
<td>Up to 512 positioning points are supported</td>
<td>512 points</td>
<td>Single-phase 100 VAC</td>
<td>218 VA max.</td>
<td>—</td>
<td>—</td>
</tr>
<tr>
<td>Solenoid mode</td>
<td></td>
<td>SCON-CA-60I-NP-2-2</td>
<td>Can be operated with the same controls used for solenoid valves</td>
<td>7 points</td>
<td>Single-phase 200 VAC</td>
<td>—</td>
<td>—</td>
<td>P643</td>
</tr>
<tr>
<td>Network mode</td>
<td></td>
<td>SSEL-CS-1-60I-NP-2-1</td>
<td>Can be moved by direct numerical specification</td>
<td>768 points</td>
<td>3-phase 200 VAC</td>
<td>—</td>
<td>—</td>
<td>—</td>
</tr>
<tr>
<td>Pulse-train input control mode</td>
<td></td>
<td></td>
<td>Can be controlled using pulse trains</td>
<td>(—)</td>
<td>—</td>
<td>—</td>
<td>—</td>
<td>—</td>
</tr>
<tr>
<td>Program control type 1 or 2 axes</td>
<td></td>
<td>SSEL-CS-1-60I-NP-2-2</td>
<td>Program operation is supported Up to two axes can be operated</td>
<td>20,000 points</td>
<td>3-phase 200 VAC (XSEL-P/Q only)</td>
<td>—</td>
<td>—</td>
<td>P685</td>
</tr>
<tr>
<td>Program control type 1 or 6 axes</td>
<td></td>
<td>XSEL-CS-1-60I-N1-EEE-2-3</td>
<td>Program operation is supported Up to six axes can be operated</td>
<td>20,000 points</td>
<td>—</td>
<td>—</td>
<td>—</td>
<td>P695</td>
</tr>
</tbody>
</table>

*The values of SSEL and XSEL assume a 1-axis specification. * (1) indicates the type of power-supply voltage (1: 100 V/2: Single-phase 200 V). * (1) indicates the XSEL type (P/Q).

Please note that this model cannot be connected to the XSEL-P/Q type (5-axis/6-axis), XSEL-R/S type, or MSCON.

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(1) Connect the motor and encoder cables here. See page A-59 for details on cables.
(2) After homing, the slider moves to the ME, therefore, please watch for any interference with surrounding objects.

ME: Mechanical end  SE: Stroke end

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(With Brake size)