

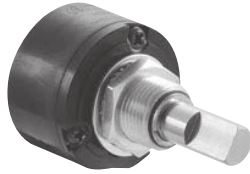


S02A

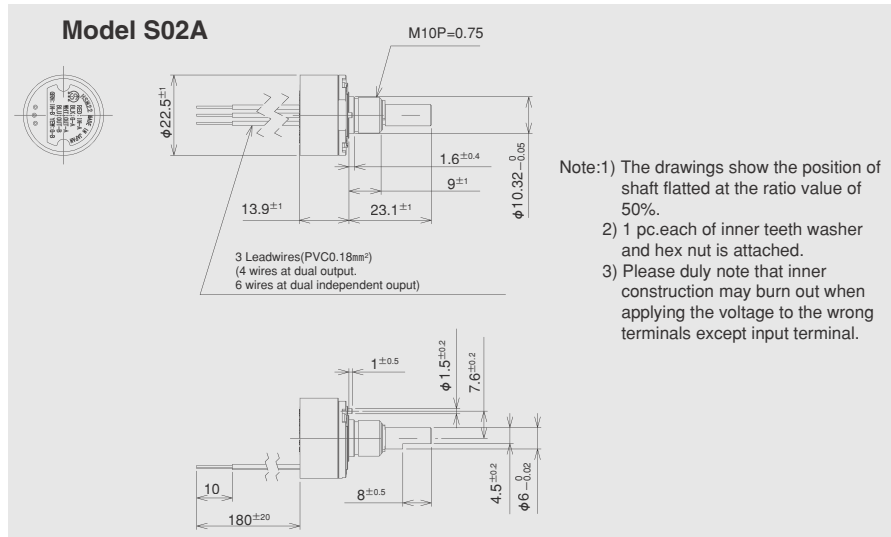
Hall effect IC · Bushingmount · RoHS Compliant



● Standard Dimensions



Model S02A



- Note:1) The drawings show the position of shaft flattened at the ratio value of 50%.
 2) 1 pc. each of inner teeth washer and hex nut is attached.
 3) Please duly note that inner construction may burn out when applying the voltage to the wrong terminals except input terminal.

● General Specifications

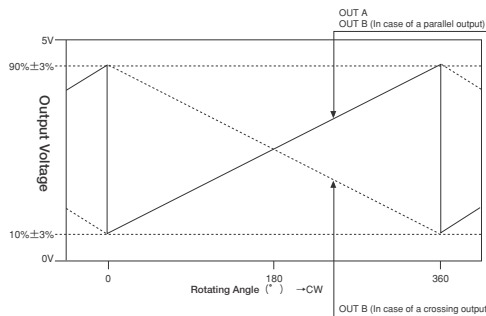
Current Consumption	Single output: Max. 16mA Dual output: Max. 32mA
Independent Linearity Tolerance	$\pm 0.5\%FS (FS=360^\circ)$
Mechanical Rotating Angle	360° (Endless)
Effective Electrical Angle	360° (Endless)
Applied Voltage	5V $\pm 10\%$ D.C.
Load resistance	10k Ω min
Effective Output	10% $\pm 3\% \sim 90\% \pm 3\%$ Vin
Output Temperature Characteristics	Within $\pm 0.3\%$ Vout/FS
Operating Temperature Range	-40°C \sim +105°C
Storage Temperature Range	-40°C \sim +105°C
Mass	Approx. 20g
Rotating Torque	Within 5mN · m (within 50gf · cm)

● Environmental Specifications

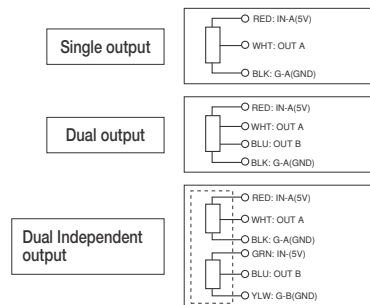
Thermal Shock	5 cycles -40°C \sim +105°C
Exposure at Low Temperature	24 hours at -40°C
Exposure at High Temperature	1,000 hours at +105°C
Vibration	10 to 2,000Hz 196m/s ² 12 hours
Shock	980m/s ² 6ms (18 times)
Rotational Life Expectancy	Approx. 50,000,000
EMS Tolerance	100V/m (80MHz \sim 1GHz 1kHz Sinwave 80% Amplitude Modulation)
ESD Tolerance	± 8 kV contact discharge ± 15 kV aerial discharge (Based on IEC 61000-4-2)

Note: Rotational Life Expectancy may differ from the specifications depending on status of use.

● Output Characteristics



● Terminal Connection Diagram



● Special Specifications Available

- (In case of the potentiometer with special specifications, the general specifications and environmental specifications may change. Please consult us in advance.)
- Special effective electrical angle (90°, 180°, 270° - arbitrary angles)
 - Special machining on the shaft
 - Special output (Cross, parallel, Dual independent output)
 - Special applied voltage (12V, 24V)
 - PWM output
 - Low current consumption in slow mode