

Thumb Joystick Controller - Potentiometer Type
Series 802


- Dual Axis
- Pushbutton Version
- Spring Return to Center
- 50° (±25°) Electrical Angle
- PCB Mount
- 100,000 Operations Life

▪  **RoHS**

Electrical Data (Note 1)

Electrical Travel	50° (±25° fro center)
Resistance Value	10k Ω ±20%
Maximum Applied Voltage	30VDC
Power Rating	0.1W @ 70°C
Contact Noise (CRV)	< 10% total resistance
Contact Resistance (ENR)	< 15% C.R.V.
Resolution	Essentially Infinite
Center Return Accuracy	50% ±3%
Insulation Resistance	> 100M Ω @ 250VDC
Withstand Voltage	250VAC 1 minute
Pushbutton Type	SPST (momentary)
Pushbutton Rating	12V, 50mA

Mechanical Data (Note 1)

Mechanical Travel	±30° (60° overall) Circular pattern
Operating Force	220 ±40 gf
Stopper Strength	> 3.1 Kgf (3 seconds min.)
Operating Temperature	-50°C ~ +125°C
Life Expectancy	> 100,000 random operations
Weight	Approx. 6g

Special Specifications Available

Custom electrical angles, shaft modifications, hall effect type

Note 1: Customers should test and verify device performance in any given application. General specifications values are measured at temperatures of +15°C ~ +35°C. Specifications are subject to change without notice.

Series 802

Model: **802-20110-A**
Without Pushbutton



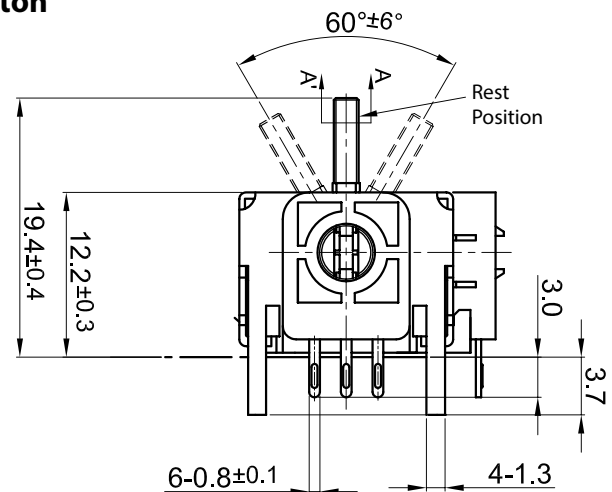
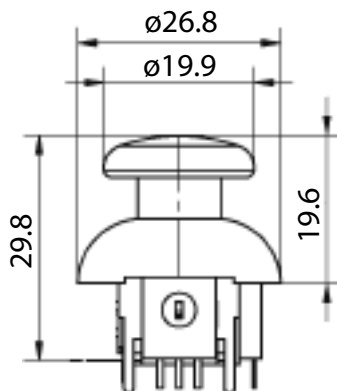
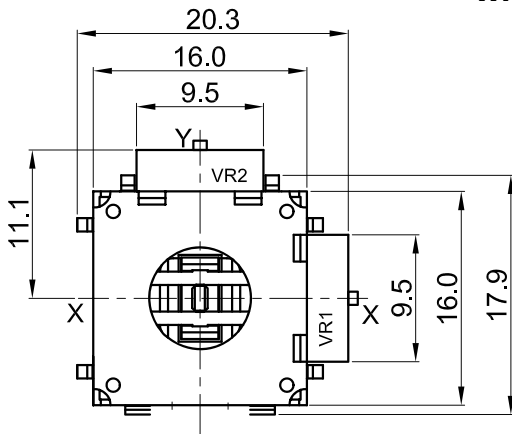
Knob
(included with delivery,
not attached)

Model: **802-30110-A**
With Pushbutton



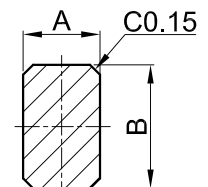
Dimensions (mm)

Model: 802-20110-A
Without Pushbutton



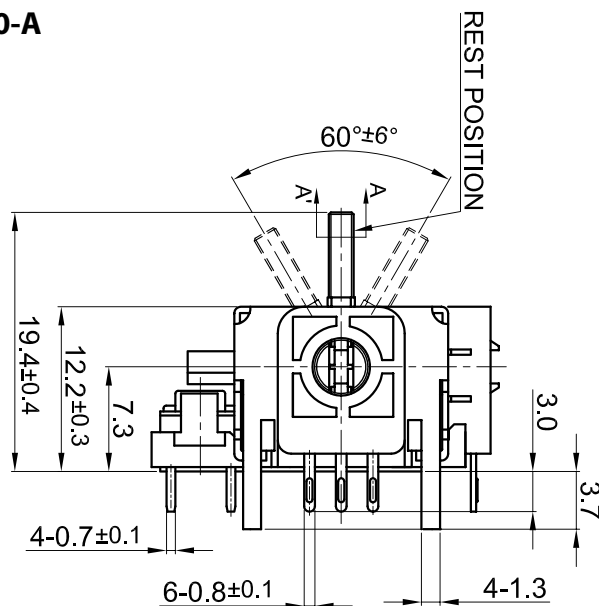
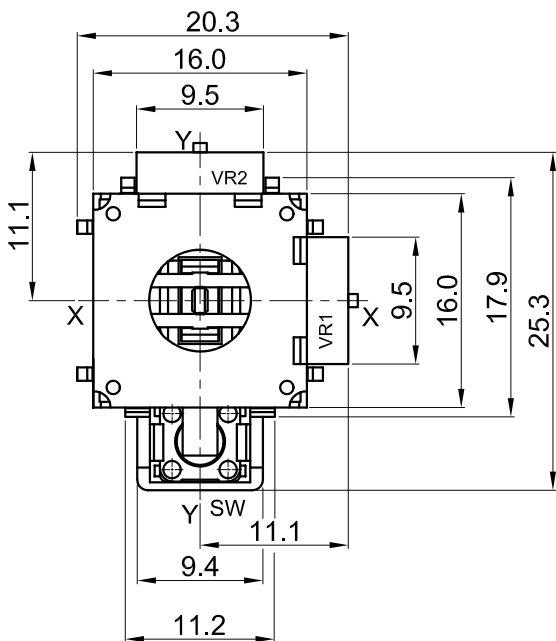
DETAIL A-A'(5/1)

Code	P
A	$1.15^{+0}_{-0.05}$
B	$1.85^{+0}_{-0.07}$



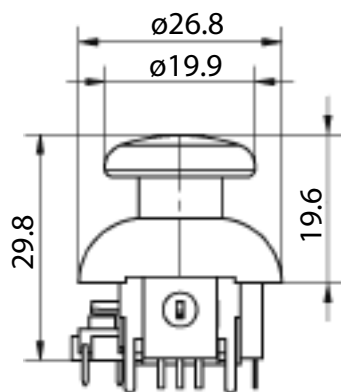
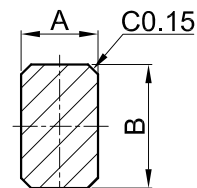
Series 802

With Pushbutton



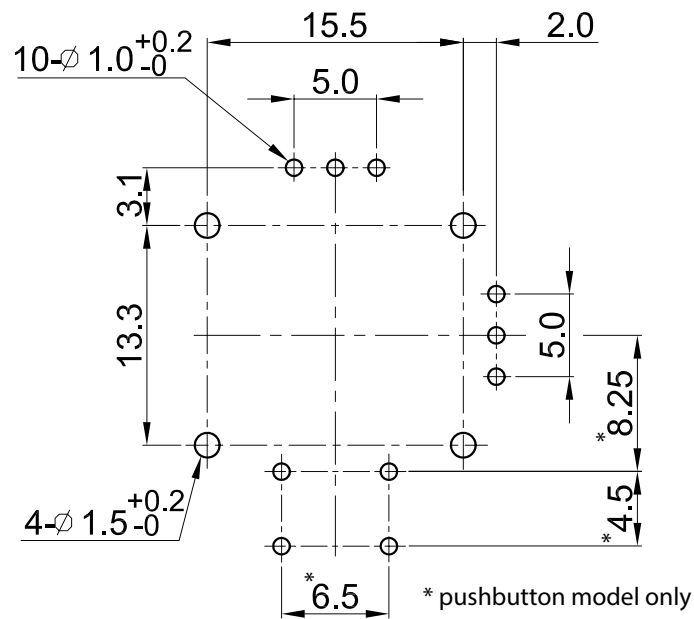
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PCB Mounting Details

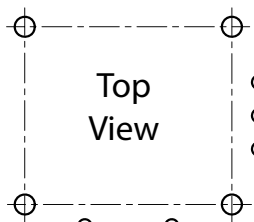
Series 802



Electrical Characteristics / Terminations

Y Potentiometer

1 2 3
○ ○ ○



Switch (12V, 50mA, spst, momentary)

X Potentiometer

○ 1
○ 2
○ 3

