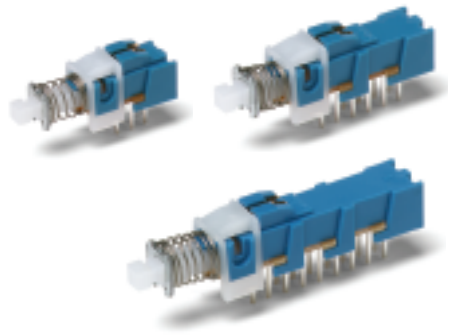
PHA Series
Short Stroke Pushbutton Switches



Features/Benefits

- *Momentary or latching action*
- *Low cost, reliable contact design*
- *2, 4 & 6 pole configurations*
- *Sealed contacts*
- *Optional buttons*
- *RoHS compliant*

Typical Applications

- *Computers and peripherals*
- *Instrumentation and measurement equipment*
- *Non-power, on-off switch applications*

Specifications

SWITCHING POWER MAX.: 3 W DC

SWITCHING VOLTAGE MAX.: 30 V DC

SWITCHING CURRENT MAX.: 100 mA DC

DIELECTRIC STRENGTH (50 Hz/1 min.): 500 V between open contacts. 1500 V between chassis and contacts.

OPERATING LIFE: Impulse/momentary (OA): ^ 10^4 operations. Latching (EE): ^10^4 operations

CONTACT RESISTANCE: New: %20 mΩ
After 105 operations: %40 mΩ

INSULATION RESISTANCE: ^10^{10}Ω

CAPACITANCE: %1.5 pF

CONTACT BOUNCE: %2 ms
Operating speed 200 mm/s (7.87 inch/s)

TOTAL TRAVEL/LATCHING TRAVEL: 2.5mm/1.5mm (.0984 inch/.0591 inch)

OPERATING FORCE:
2U: 170cN±50cN (170 grams±50 grams)
4U: 230cN±70cN (230 grams±70 grams)
6U: 300cN±100cN (300 grams±100 grams)

SEALING: Sealed contacts.

Materials

FIXED TERMINAL: Brass, silver plated.

MOVABLE CONTACT: Phosphor bronze, silver plated.

SWITCH BODY: PPE

ACTUATOR: POM

STANDOFF CLIP: POM

RETURN SPRING: Music wire.

RETURN SPRING RETAINER: Carbon steel, tin plated.

DETENT SPRING PLATE: Phosphor bronze.

DETENT SPRING: Stainless steel.

BASE: Laminated phenolic.

TERMINAL SEAL: Epoxy.

NOTE: All models are RoHS compliant and compatible.

NOTE: Specifications and materials listed above are for switches with standard options. For information on specific and custom switches, consult Customer Service Center.

Build-A-Switch

To order, simply select desired option from each category and place in the appropriate box. Available options are shown and described on pages A-85 thru A-87. For additional options not shown in catalog, consult Customer Service Center.

Switch **Button**

P H A

Contact Arrangement
2U 2 Changeovers
4U 4 Changeovers
6U 6 Changeovers

Mechanical Function
OA Momentary
EE Push-push

Indexed
G001A Black
G001G Gray
G001I Ivory
G001R Red

Round
G003A Black
G003G Gray
G0031 Ivory
G003R Red

Rectangular
G002A Black
G002G Gray
G0021 Ivory
G002R Red

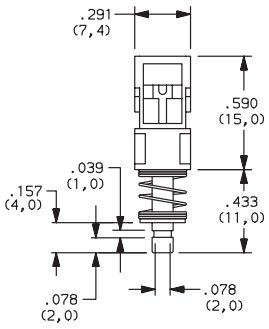
Square
G004A Black
G004G Gray
G0041 Ivory
G004R Red

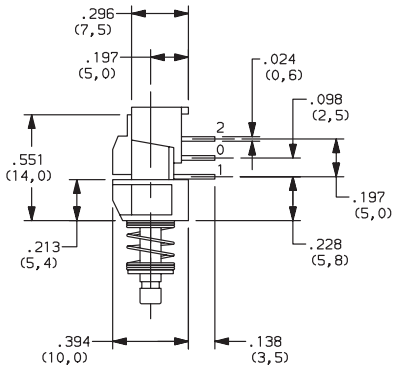
BUTTON REMOVAL

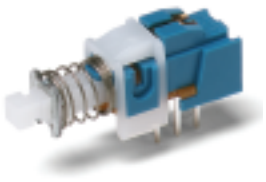
A button of a push-push switch should only be removed in the "OFF" non-latching position.

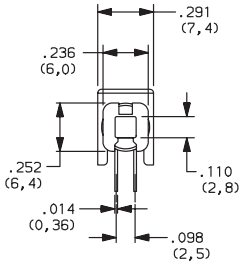
DESIGNATION

2U 2 CHANGEOVERS

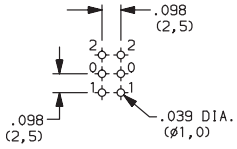




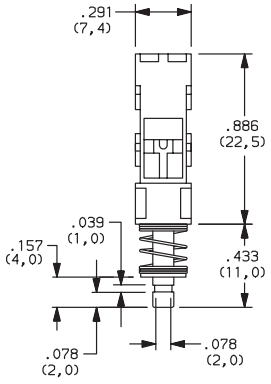


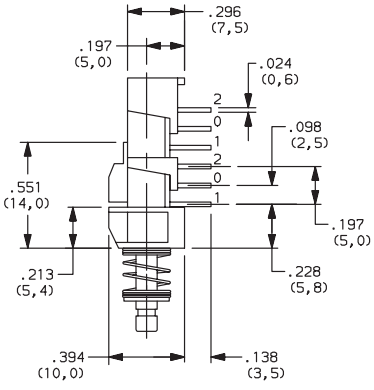


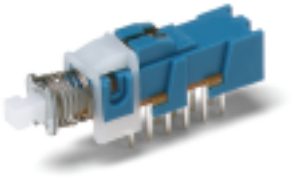
PC MOUNTING

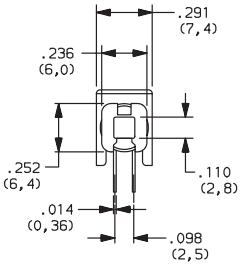


4U 4 CHANGEOVERS

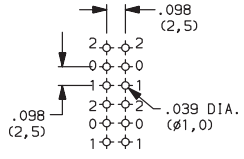








PC MOUNTING



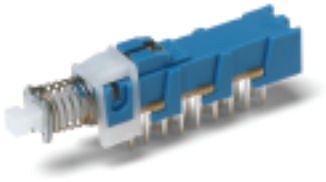
Third Angle Projection

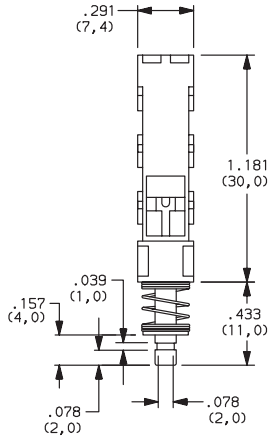
Dimensions are shown: Inches (mm)
Specifications and dimensions subject to change

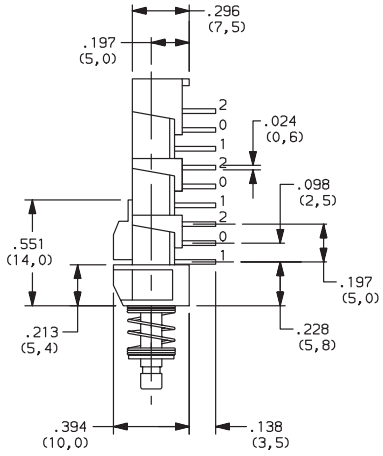
PHA Series
Short Stroke Pushbutton Switches

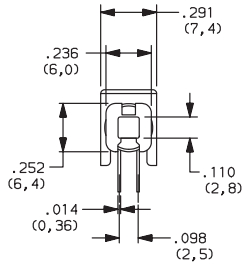
DESIGNATION

6U 6 CHANGEOVERS

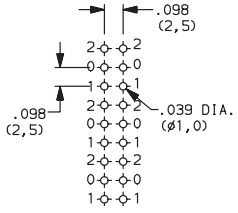








PC MOUNTING



CONTACT ARRANGEMENT

OPTION CODE	NO. OF POLES *	SCHEMATIC
2U	2PDT	
4U	4PDT	2X
6U	6PDT	3X

*Non-shorting contacts.

MECHANICAL FUNCTION

OPTION CODE	FUNCTION
OA	Momentary
EE	Push-push

Third Angle Projection

Dimensions are shown: Inches (mm)
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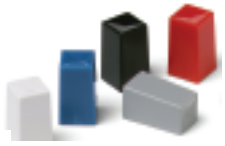
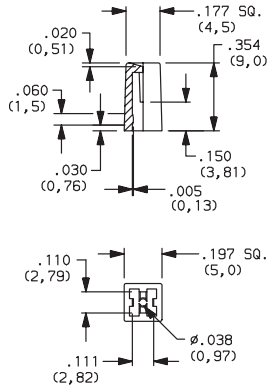
BUTTONS

Indexed

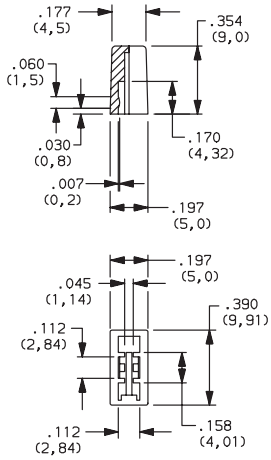
G001A Black
G001G Gray
G001I Ivory
G001R Red





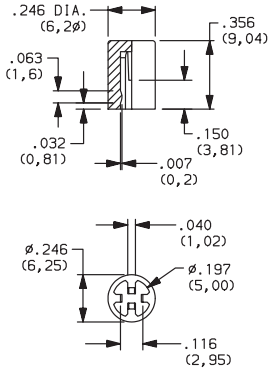
Rectangular

G002A Black
G002G Gray
G002I Ivory
G002R Red



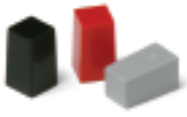
Round

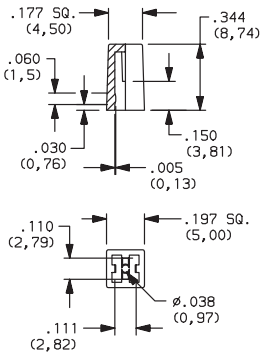
G003A Black
G003G Gray
G003I Ivory
G003R Red



Square

G004A Black
G004G Gray
G004I Ivory
G004R Red





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