

#### Features/Benefits

- Process sealed, withstands soldering and cleaning
- Long life contact design
- Snap-fitting plunger available, accepts a variety of caps
- RoHS compliant models available

#### Typical Applications

- Instrumentation
- Telecommunications and networking equipment
- Computers and peripherals



#### **Specifications**

CONTACT RATING: Q contact material: 4 AMPS @ 125 V AC or 28 V DC. See page A-50 for additional ratings.

ELECTRICAL LIFE: 40,000 make-and-break cycles at full load.

CONTACT RESISTANCE: Below 20 m $\Omega$  typ. initial @ 2–4 V DC, 100 mA, for both silver and gold plated contacts.

INSULATION RESISTANCE:  $10^9\Omega$  min.

DIELECTRIC STRENGTH: 1000 Vrms min. @ sea level.

OPERATING TEMPERATURE: -30°C to 75°C.

CAP INSTALLATION FORCE: 10 lbs. max. permissible.

SOLDERABILITY: Per MIL-STD-202F method 208D, or

EIA RS-186E method 9 (1 hour steam aging).

NOTE: Any models supplied with P, Q, B or G contact material are RoHS compliant

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

#### **Materials**

CASE & BUSHING: Glass filled nylon 6/6, flame retardant (UL 94V-0).

PLUNGER: Glass filled nylon or glass filled polyester (PBT) (UL 94V-0), with internal o-ring seal standard.

SWITCH SUPPORT: Brass or steel, matte-tin plated.

SWITCH SUPPORT RETAINER: Stainless steel.

END CONTACTS: Q contact material: Coin silver, silver plated. See A-50 for additional ratings.

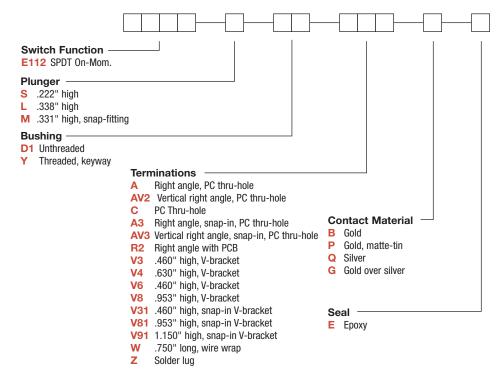
CENTER CONTACTS & ALL TERMINALS: Q contact material: Copper alloy, silver plated. See page A-50 for additional ratings.

TERMINAL SEAL: Epoxy.

HARDWARE: Nut & locking ring-Brass, nickel plated. Lockwasher-Steel, nickel plated.

#### **Build-A-Switch**

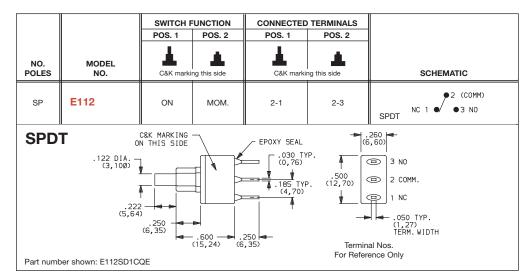
To order, simply select desired option from each category and place in the appropriate box. Available options are shown and described on pages A-47 thru A-51. For additional options not shown in catalog, consult Customer Service Center. All models are process sealed to withstand machine soldering temperatures and pressure wash cleaning methods.







#### SWITCH FUNCTION ----

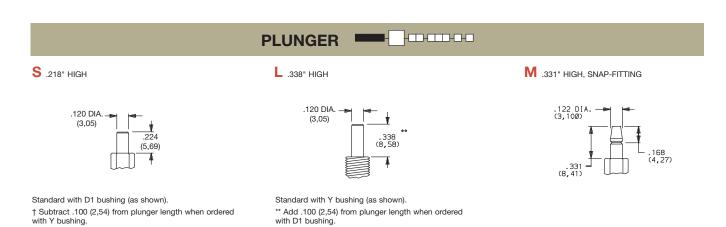


MOM. = Momentary

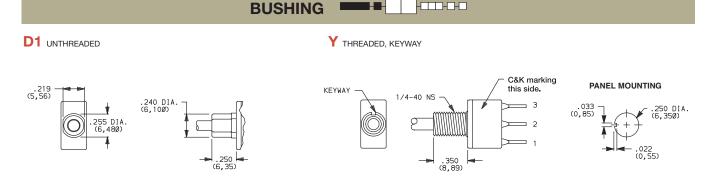
All models

c**71**2° US

with all options when ordered with G or Q contact material.



NOTE: Caps available for all plunger options, see pages A-50 and A-51.



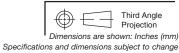
S plunger standard with D1 bushing.

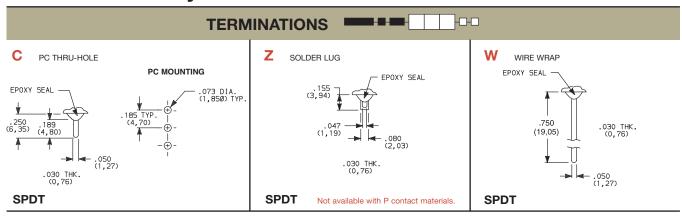
L plunger standard with Y bushing. Available only with C, Z terminations. Hardware: One dress nut part number 299D01201, one hex nut and lockwasher supplied standard.  $\frac{1}{2} \left( \frac{1}{2} \right) \left( \frac{1$ 

Withstands 4 in./lbs. without distortion.



NOTE: Internal o-ring actuator seal standard for all bushing options.



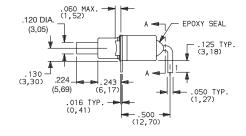


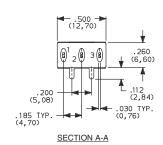
RIGHT ANGLE, PC THRU-HOLE



**SPDT** 

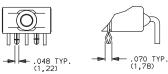




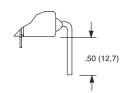


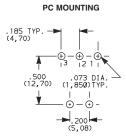
RIGHT ANGLE, SNAP-IN, PC THRU-HOLE

AW RIGHT ANGLE, EXTENDED, PC THRU-HOLE









AV2 VERTICAL RIGHT ANGLE, PC THRU-HOLE, .150" PITCH

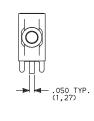
NOTE: Terminal bend radii and lead-in manufacturing option.

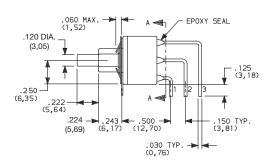


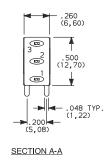
E112SD1AV2BE

**SPDT** 

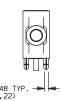
Available with D1 bushing only.



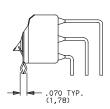


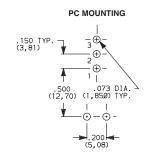


VERTICAL RIGHT ANGLE, SNAP-IN, PC THRU-HOLE, .150" PITCH



NOTE: Terminal bend radii and lead-in manufacturing option. Available with D1 bushing only.





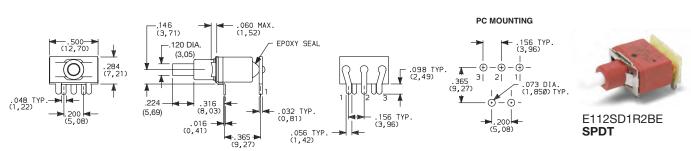




# **Sealed Momentary Pushbutton Switches**

#### **TERMINATIONS**

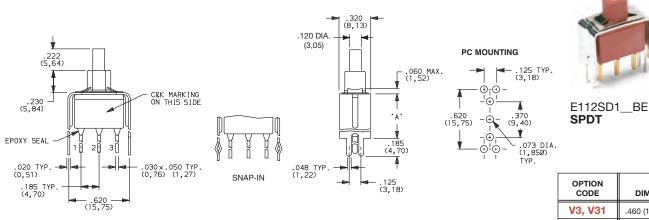
**R2** RIGHT ANGLE WITH PCB



NOTE: Available with D1 bushing and B contact material only.

VERTICAL MOUNT, V-BRACKET

V31, V91 VERTICAL MOUNT, V-BRACKET, SNAP-IN

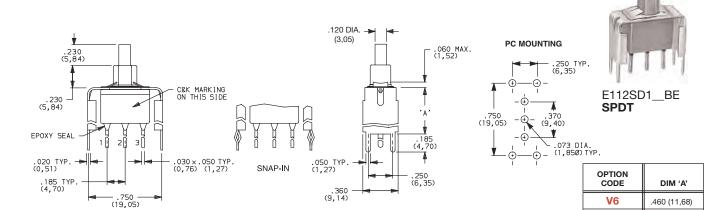


OPTION CODE	DIM 'A'	
V3, V31	.460 (11,68)	
<b>V</b> 4	.630 (16,00)	
<b>V</b> 91	1.150 (29,21)	

NOTE: Available with D1 bushing only.

**V6, V8** VERTICAL MOUNT, V-BRACKET

VERTICAL MOUNT, V-BRACKET, SNAP-IN



NOTE: Available with D1 bushing only.



V8, V81

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



.953 (24,21)

#### CONTACT MATERIAL

OPTION CODE	CONTACT MATERIAL	TERMINAL PLATING	RATINGS	
В		GOLD <sup>1</sup>		
Р	GOLD <sup>1</sup>	MATTE-TIN <sup>6</sup>	LOW LEVEL/DRY CIRCUIT	0.4 VA MAX. @ 20 V AC OR DC MAX.
Q	SILVER 4,5	SILVER <sup>5</sup>	POWER	4 AMPS @ 125 V AC 0R 28 V DC.
G	GOLD OVER SILVER 2,3	GOLD <sup>3</sup>	LOW LEVEL/DRY CIRCUIT OR POWER	0.4 VA MAX. @ 20 V AC OR DC MAX. OR 4 AMPS @ 125 V AC 0R 28 V DC.

<sup>\*</sup> Note: See Technical Data section of this catalog for RoHS compliant and compatible definitions and specifications.

- <sup>1</sup> CONTACTS & TERMINALS: Copper alloy, with gold plate over nickel plate.
- $^{2}$  END CONTACTS: Coin silver, with gold plate over nickel plate.
- <sup>3</sup> CENTER CONTACTS & ALL TERMINALS: Coin silver, with gold plate over nickel plate.
- <sup>4</sup> END CONTACTS: Coin silver, silver plated.
- <sup>5</sup> CENTER CONTACTS & ALL TERMINALS: Copper alloy, silver plated.
- <sup>6</sup> TERMINALS: Copper alloy, with matte-tin over nickel plate.

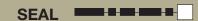
NOTE: Any models supplied with P, Q, B or G contact material are RoHS compliant.

All models cases with all options when ordered with G or Q contact material.

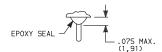
B contact material standard with all terminations except C, Z.

B contact material must be ordered with R2 terminations. Q contact material standard with C, Z terminations.

P contact materials not available with Z terminations.



EPOXY SEAL



#### **AVAILABLE HARDWARE** Сар Сар Сар .310 DIA. (7,87ø) .375 DIA. .200 DIA. .120 (3,05) (5,08ø) .250 (6,35) (3,51) 120 L .250-.155 -(6,35)(3,94)PART NO. PART NO. PART NO. 801801000 WHITE 708901000 WHITE **752701000** WHITE 801802000 BLACK 708902000 BLACK 752702000 BLACK 708903000 RED 752703000 RED 801803000 RED Material: Nylon Material: Nylon Material: Nylon Finish: Gloss Finish: Gloss Finish: Gloss

**NOTE:** Additional nuts, locking rings and lockwashers available separately, see section "Technical Data and Additional Hardware". Other cap colors available, consult Customer Service Center.





#### **AVAILABLE HARDWARE**

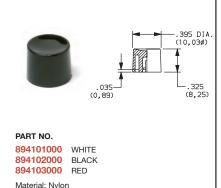
Cap, Snap-fitting plunger



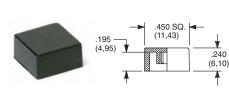


**452D02000** BLACK **452D03000** RED Material: Nvlon

Finish: Gloss



#### Сар



PART NO.

484601000 WHITE 484602000 BLACK 484603000 RED

Material: Nvlon

PART NO. 798201000 798202263

BLACK 798203000 RED

Material: Nvlon

NOTE: Additional nuts, locking rings and lockwashers available separately, see section "Technical Data and Additional Hardware".

Frames snap into panel opening and are independent from switch mounting. Accurate positioning of the PC mounted switch relative to the panel opening is necessary to provide proper clearance between actuator and frame. Available in two basic styles and four panel thicknesses .047-.125 in. Material: Nylon. Finish: Matte.

#### TYPICAL APPLICATION



.047" (1,19) PANEL THK.

.062" (1,57) PANEL THK.

.090" (2,29) PANEL THK.

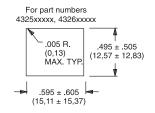
.125" (3,18) PANEL THK.

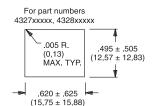
PART NO. 432502263 PART NO. 432602263 PART NO. 432702263 PART NO.

432802263 BLACK



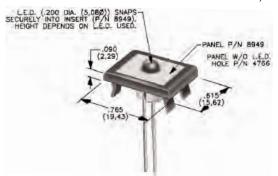
#### PANEL MOUNTING





#### Panel Inserts

Above frames (part nos. 432XXXXXX) are also available with insert which accepts LED for indicator light assembly. Order insert separately from frame. Blank insert panel (without hole for LED) also available. LED not included.



PANEL INSERT WITH HOLE FOR LED BLANK PANEL INSERT WITHOUT HOLE FOR LED

PART NO.

894902000

PART NO.

476602000 BLACK

Special colors, custom markings available, consult Customer Service Center.

