

# 18000 series

## Snap-action momentary pushbutton switches

*Distinctive features and specifications*

UG1006-A



- Panel and PC mount models
- Snap-in panel mounting version
- Tactile feedback

B

### ELECTRICAL SPECIFICATIONS

- Max. current/voltage rating with resistive load :
  - gold plated brass contacts : 100mA - 30VDC
  - gold plated silver contacts : 1A 125VAC, 1A 30VDC
- Initial contact resistance : 50 mΩ max.
- Insulation resistance : 1.000 MΩ min.
- Dielectric strength : 1.000 Vrms 50 Hz min.
- Electrical life : 60.000 cycles at full load

Models for high currents : see 18635A and 18645A at the end of the series.

### MATERIALS

- Case : PBT
- Actuator : polyamide, glass filled
- Bushing : brass, nickel plated
- Housing : stainless steel
- Bracket : tin plated steel
- Contacts
  - AD** : silver, gold plated
  - CD** : brass, gold plated
- Terminal seal : epoxy

### GENERAL SPECIFICATIONS

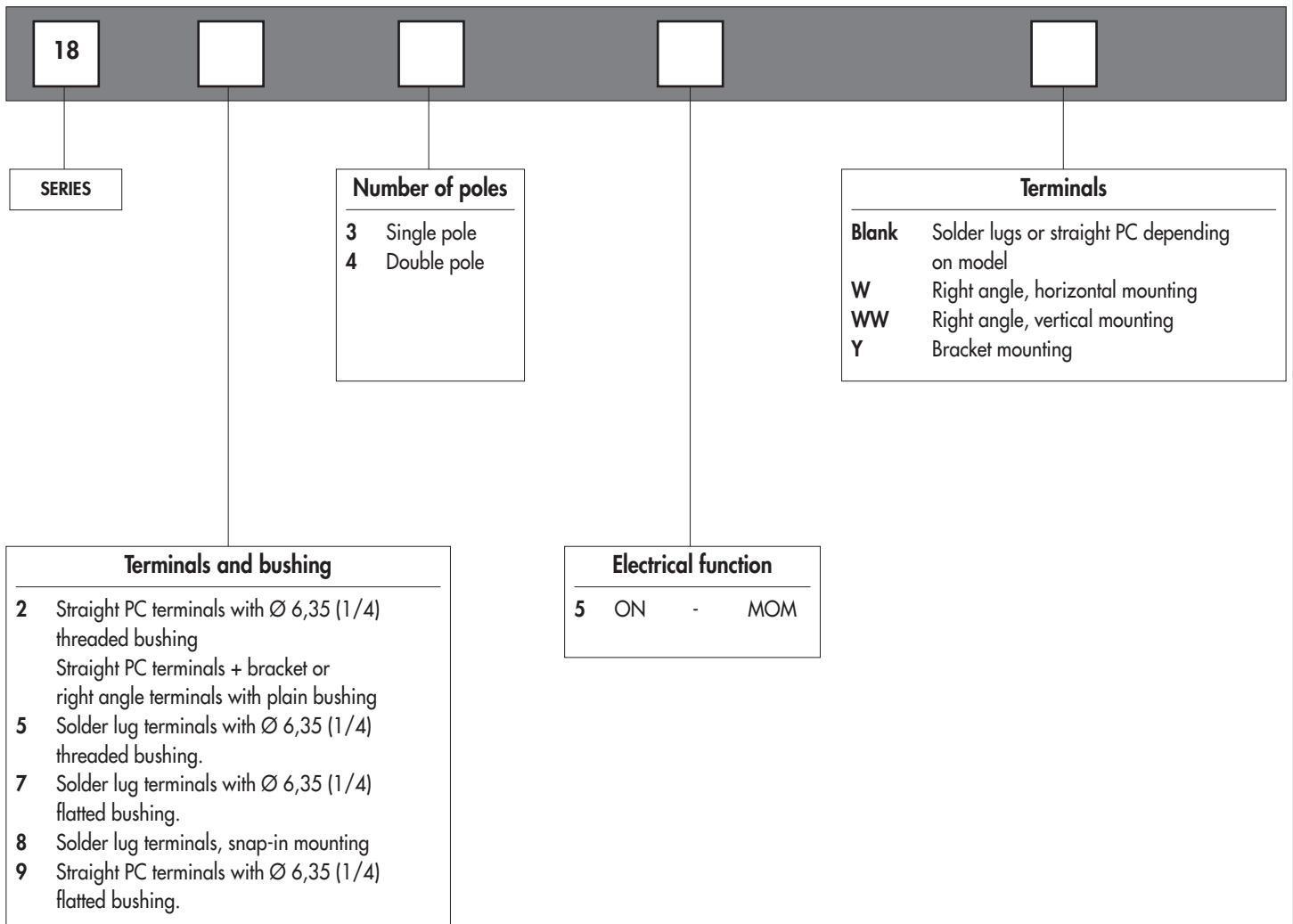
- Total travel : 0,5 mm (.019)
- Torque : 1,25 Nm (.922 Ft.lb) max. applied to nut
- Operating temperature : -30°C to +65°C
- Soldering : 300°C, 3 sec. max.



# 18000 series

## Snap-action momentary pushbutton switches

Overview



B

### ABOUT THIS SERIES

On the following pages, you will find successively :

- model structure of switches
- options in the same order as in above chart

**Dimensions** : first dimensions are in mm while inches are shown as bracketed numbers.



**NOTICE** : please note that not all combinations of above numbers are available. Refer to the following pages for further information.

# 18000 series

## Snap-action momentary pushbutton switches

Overview

OPTIONS



### Contact materials

AD	Silver, gold plated
CD	Brass, gold plated



### Special options

**X624** Shorter bushing and plunger  
**X662** Snap-in mounting and straight PC terminals

Other : specific bushings, etc... See following pages.



### Bezels

For snap-in mounting models  
**U1200**  
**U1210** for LED  
For bracket mounting models  
**U3200**

### Plungers

<b>Blank</b>	Ø 4 (.157), length 6 mm (.236) Standard with threaded bushing
<b>-6</b>	Ø 3,1 (.122), length 5,85 mm (.230)
<b>-3</b>	Ø 4 (.157), length 5,5 mm (.216) Standard with plain bushing
<b>-5</b>	Ø 3,1 (.122), length 6,3 mm (.248)

### Caps

<b>For Ø 4 (.157) plungers (-3, -13)</b>	
<b>U900</b>	Ø 5 (.196)
<b>U1140</b>	Ø 8 (.314)
<b>U1720</b>	Ø 9,4 (.370)
<b>U480</b>	Ø 10 (.393) - standard
<b>U630</b>	Ø 15 (.590)
<b>U2430</b>	Square Height 4 (.157)
<b>U2020</b>	Square Height 6 (.236)
<b>For Ø 3,1 (.122) plungers (-5, -6)</b>	
<b>U2400</b>	Ø 5 (.196)
<b>U2510</b>	Ø 8 (.314)
<b>U2130</b>	Ø 9,4 (.370)
<b>U2900</b>	Ø 10 (.393)
<b>U3400</b>	Ø 15 (.590)
<b>U910</b>	Square Height 4 (.157)
<b>U2340</b>	Square Height 6 (.236)



**Sealing boots** are available to protect the switches against dust and water. They are presented in section H.



**Mounting accessories** : standard hardware supplied with all models with Ø 6,35 (1/4) threaded bushing : 2 hex nuts 8 mm (.314) across flats, 1 locking ring and 1 lockwasher.  
Standard and special hardware available are presented in section I.



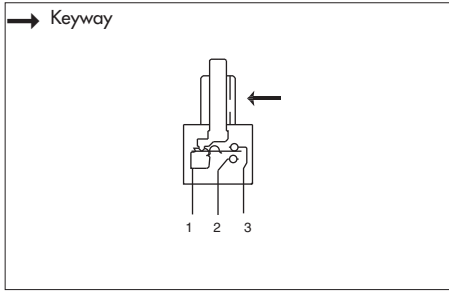
**Packaging unit** : 25 pieces for W, WW double pole and 18800 models  
50 pieces for other models.



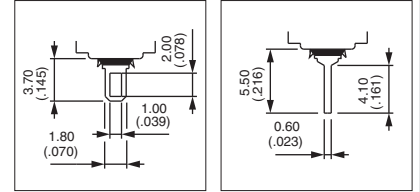
# 18000 series

Snap-action momentary pushbutton switches

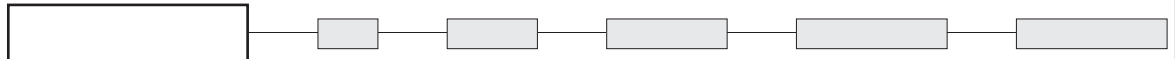
Threaded bushing  $\varnothing 6,35$  (1/4) : 18500 - 18700 - 18200



- Solder lug or straight PC terminals
- Epoxy sealed terminals standard



MODEL STRUCTURE



Shown with standard plunger

B

## Solder lug terminals : 18500

→ Keyway



Single pole  
**18535**

Double pole  
**18545**



1-3

ON

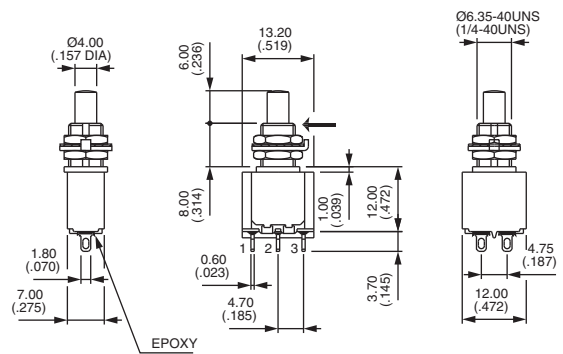


1-2

MOM

ON

MOM



## Flatted bushing - solder lug terminals : 18700

→ Flat



Single pole  
**18735**

Double pole  
**18745**



1-3

ON

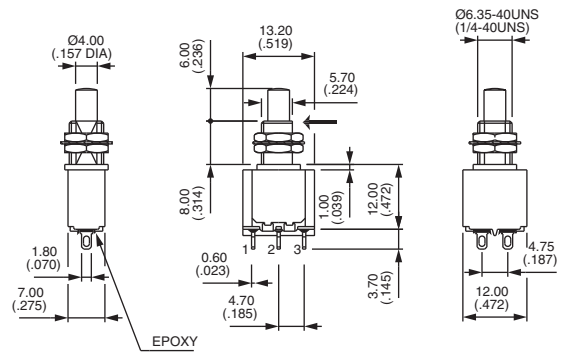


1-2

MOM

ON

MOM



## Straight PC terminals : 18200

→ Keyway



Single pole  
**18235**

Double pole  
**18245**



1-3

ON

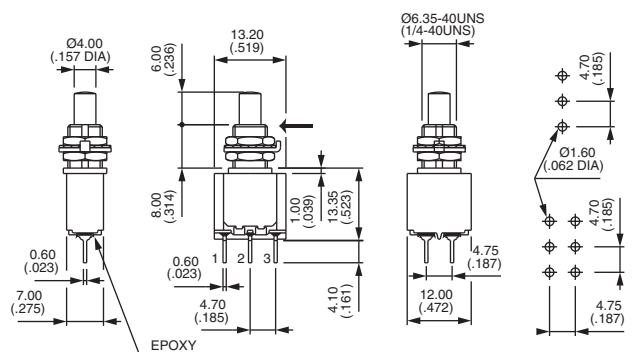


1-2

MOM

ON

MOM



# 18000 series

## Snap-action momentary pushbutton switches

Threaded bushing  $\varnothing 6,35$  (1/4) : 18900 - Snap-in mounting : 18800

MODEL  
STRUCTURE

### Flatted bushing - straight PC terminals : 18900

→ Flat



Single pole  
**18935**

Double pole  
**18945**



1-3

ON

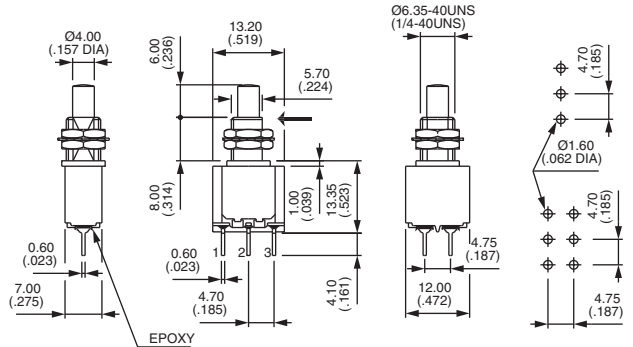


1-2

MOM

ON

MOM



B

### Snap-in mounting - solder lug terminals : 18800

Shown with cap U910 + U1200



Single pole  
**18835**

Double pole  
**18845**



1-3

ON

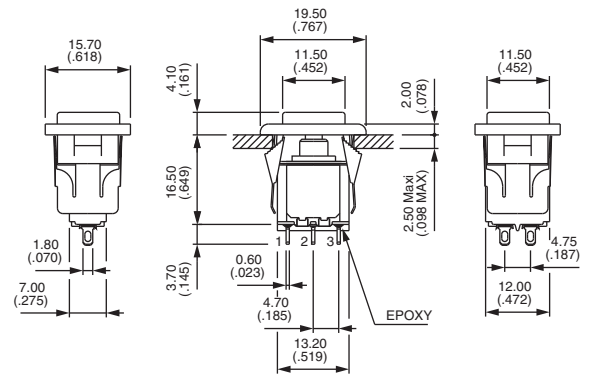


1-2

MOM

ON

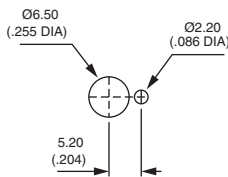
MOM



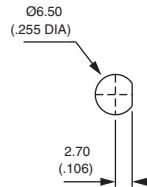
Available with straight PC terminals : see X662 under "Special options".

### PANEL CUT-OUT

18500 - 18200

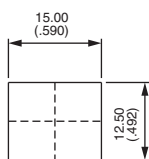


18700 - 18900

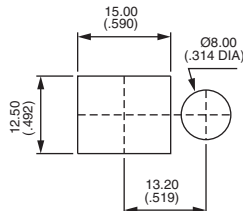


### PANEL CUT-OUT

18800



With bezel **U1200**



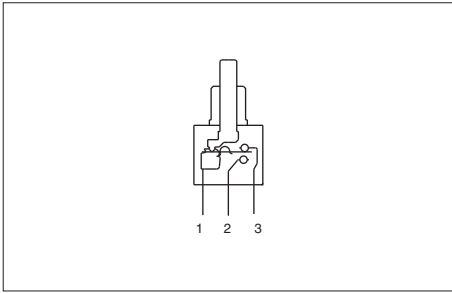
With bezel **U1210** for LED



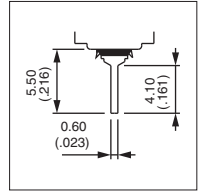
# 18000 series

Snap-action momentary pushbutton switches

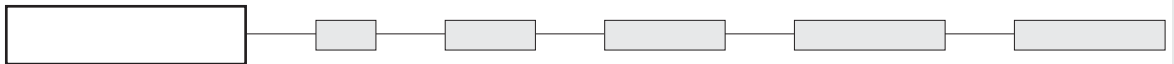
Plain bushing : 18200Y - 18200W - 18200WW



- Straight PC or right angle terminals
- Epoxy sealed terminals standard



MODEL STRUCTURE



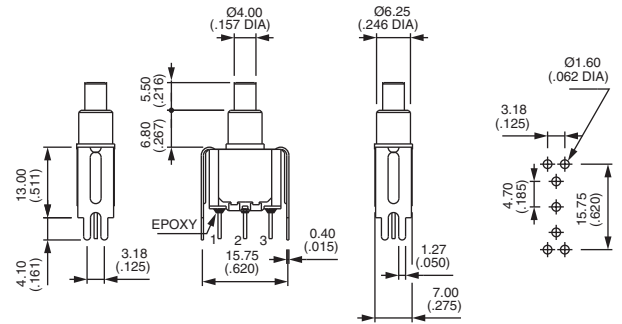
Shown with standard plunger (-3)

B

## Straight PC terminals - bracket mounting - single pole 18230Y



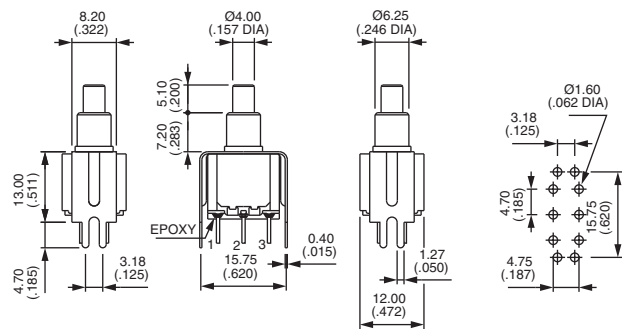
18235Y



## Straight PC terminals - bracket mounting - double pole 18240Y



18245Y



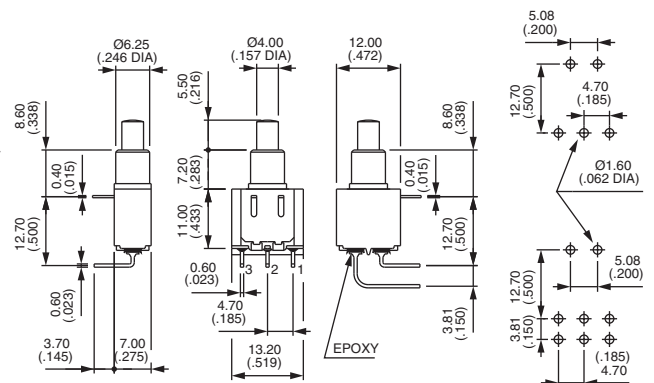
## Right angle terminals - horizontal : 18200W



Single pole  
18235W



Double pole  
18245W



# 18000 series

Snap-action momentary pushbutton switches

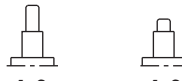


## Right angle terminals - vertical : 18200WW

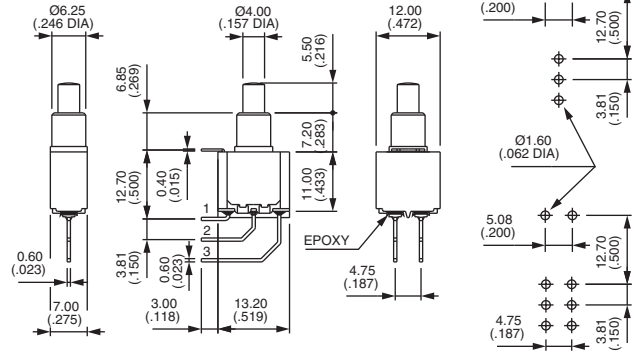


Single pole  
**18235WW**

Double pole  
**18245WW**



1-3	1-2
ON	MOM
ON	MOM



B

## CONTACT MATERIALS

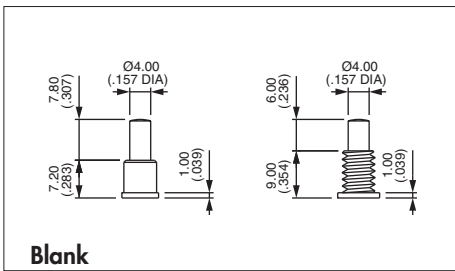


AD Silver, gold plated  
CD Brass, gold plated

## PLUNGERS

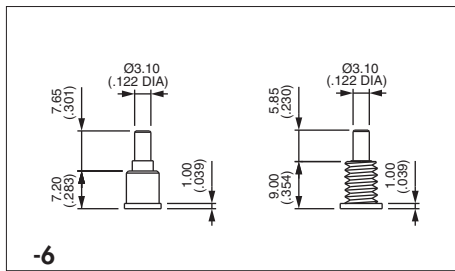


Dash compulsory before plunger code.



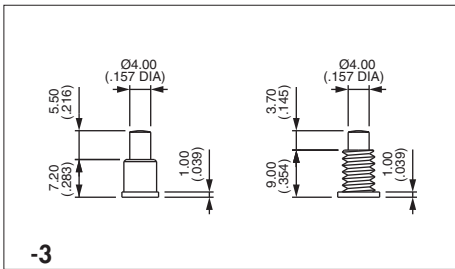
Blank

Ø 4 (.157) - standard with threaded bushing



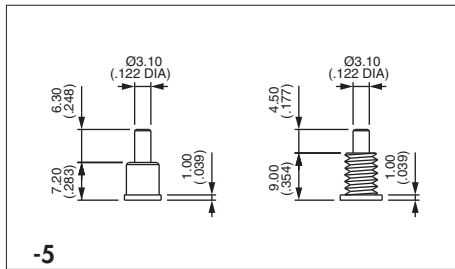
-6

Ø 3,1 (.122)



-3

Ø 4 (.157) - standard with plain bushing



-5

Ø 3,1 (.122)



# 18000 series

Snap-action momentary pushbutton switches

## SPECIAL OPTIONS



**X624** Straight PC terminals - bracket mounting - with shorter bushing and plunger

Single pole  
**18235Y -2X624**

Double pole  
**18245Y -2X624**

**X662** Snap-in mounting - straight PC terminals

Single pole  
**18835 X662**

Double pole  
**18845 X662**



# 18000 series

## Snap-action momentary pushbutton switches

OPTIONS



### SPECIAL OPTIONS (continued)

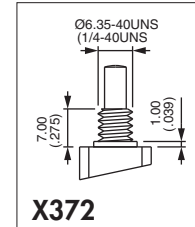


**X371** Plain bushing  $\varnothing$  6,25 mm (.246) (instead of standard threaded bushing).

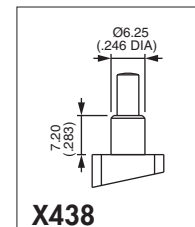
**X372** Shorter threaded bushing  $\varnothing$  6,35 (1/4). Height 7 mm (.274).

**X386** Threaded bushing  $\varnothing$  6,35 mm (1/4) to replace plain bushing on models W - WW and Y.

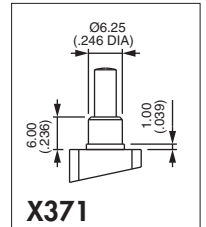
**X438** Plain bushing  $\varnothing$  6,25 mm (.246). Height 7,2 mm (.283) - without shoulder.



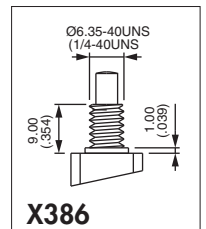
**X372**



**X438**

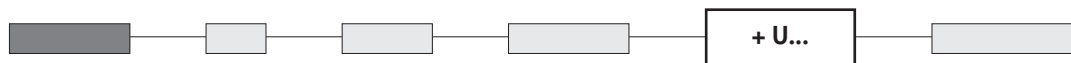


**X371**

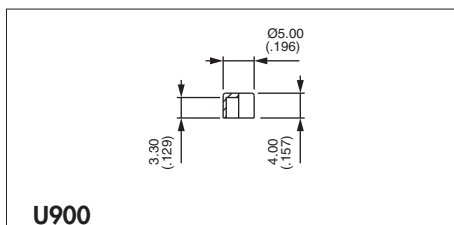


**X386**

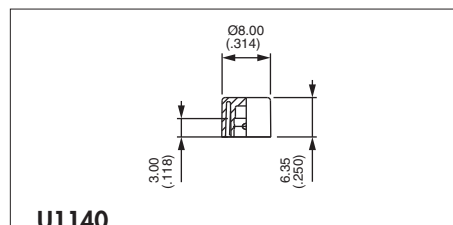
### CAPS



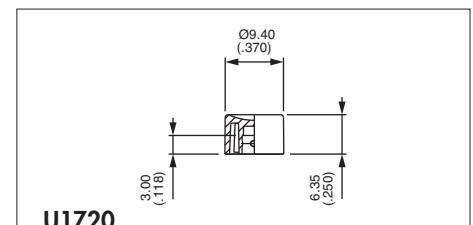
#### Caps for $\varnothing$ 4 (.157) plungers (-13, -3)



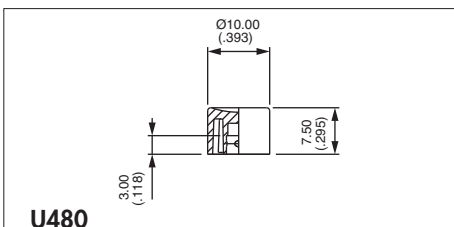
**U900**



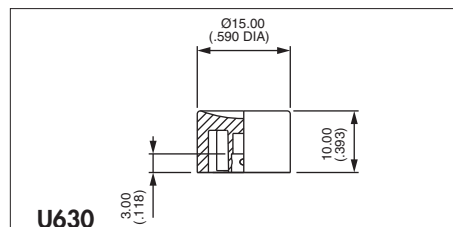
**U1140**



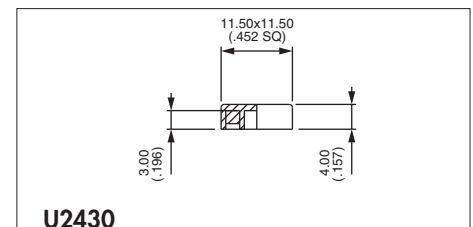
**U1720**



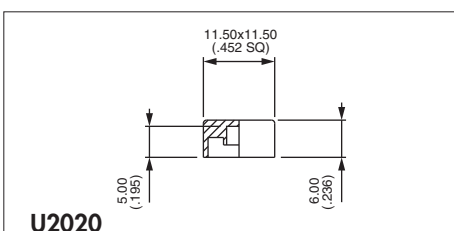
**U480**



**U630**



**U2430**



**U2020**

Square

#### Cap colours

Replace last "0" by number

1	blue	5	yellow
1/4	dark blue	6	red
2	black	7	ivory
3	green	7/1	white
4	grey	9	orange

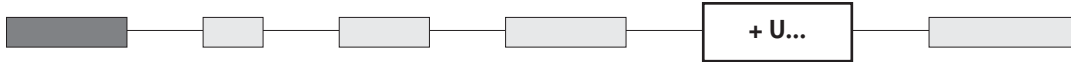
Square



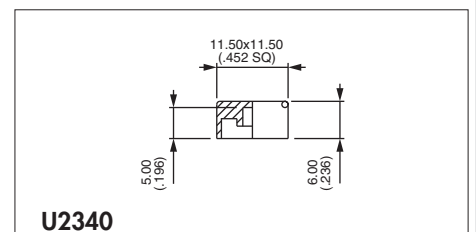
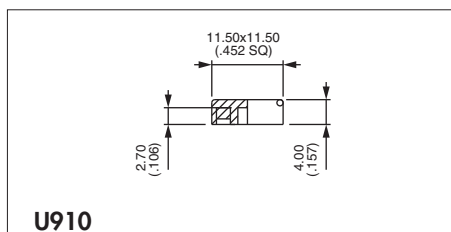
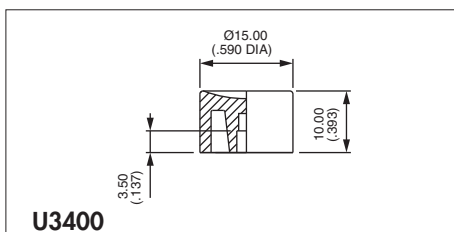
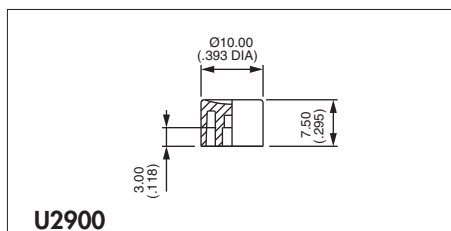
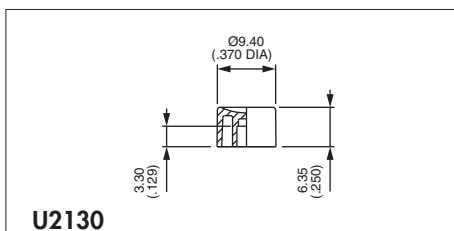
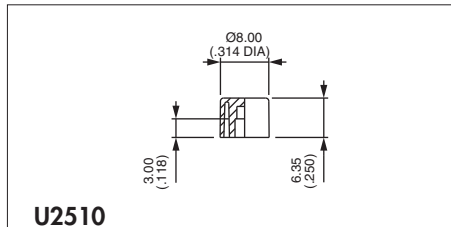
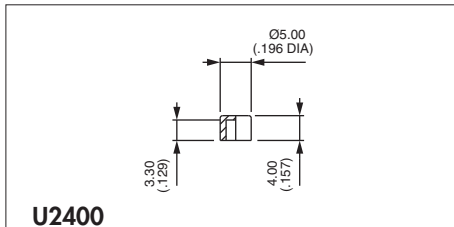
# 18000 series

Snap-action momentary pushbutton switches

## CAPS (continued)



### Caps for Ø 3,1 (.122) plungers (-5, -6)

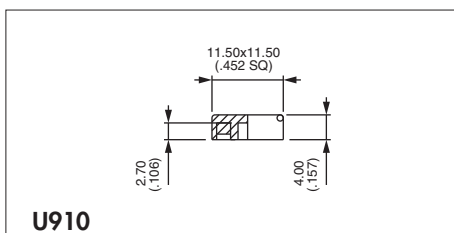


Cap colours	
Replace "0" by number	
1	blue
1/4	dark blue
2	black
3	green
4	grey
5	yellow
6	red
7	ivory
7/1	white
9	orange

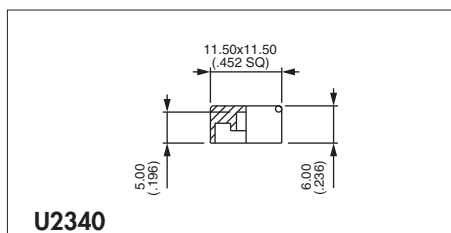
Square

Square

### Caps for 18800 and 18800X662 models



Square



Square

B

# 18000 series

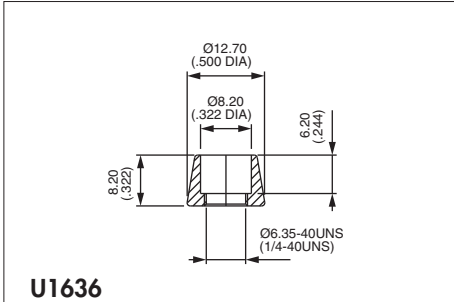
Snap-action momentary pushbutton switches



## DRESS NUTS

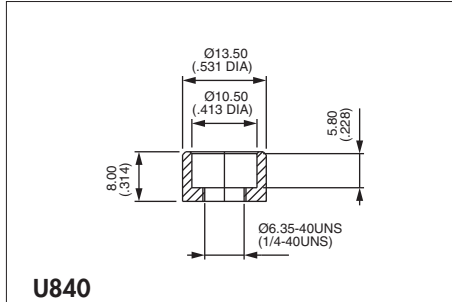
For models with threaded bushing (18500 - 18700 - 18200 - 18900)

Chrome plated - Order separately.



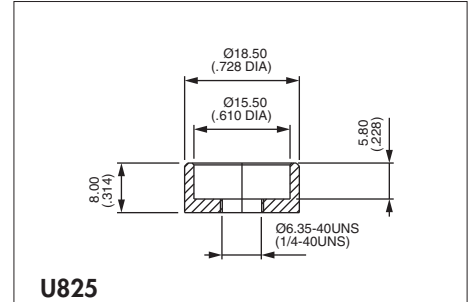
**U1636**

For caps U1140 and U2510



**U840**

For cap U480 and U2900



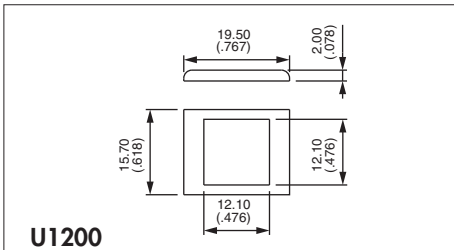
**U825**

For caps U630 and U3400

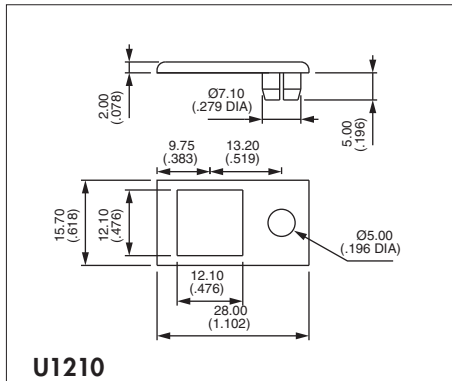
## BEZELS



For snap-in models (18800 - 18800X662)



**U1200**

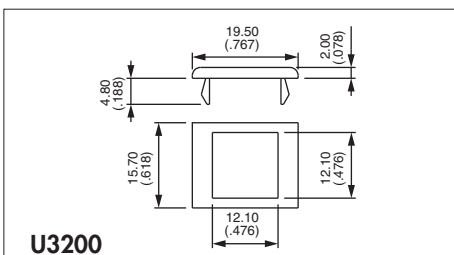


**U1210**

For LED Ø 5 - not supplied

Bezel colours	
Replace last "0" by number	
1	blue
1/4	dark blue
2	black
3	green
4	grey
5	yellow
6	red
7	ivory
7/1	white
9	orange

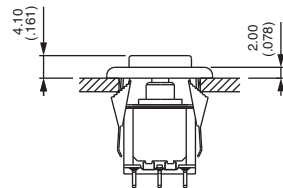
For bracket mounting models (18200Y & 18200YX624)



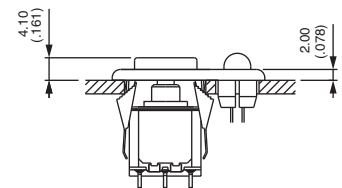
**U3200**

## STANDARD PANEL MOUNTING

Panel thickness with bezel : 1 mm (.039) to 2,5 mm (.098)



**18800 + U910 + U1200**



**18800 + U910 + U1210**

# 18000 series

Snap-action momentary pushbutton switches



For high currents

Tactile feedback

## ELECTRICAL SPECIFICATIONS

- Max. current/voltage rating with resistive load :  
3A 250VAC - 6A 125VAC - 7A 30VDC
- Initial contact resistance : 20 m $\Omega$  max. at 0,1A 3VDC
- Insulation resistance : 200.000 M $\Omega$  min. between terminals and frame
- Dielectric strength : 1.500 Vrms 50 Hz min.
- Electrical life : 60.000 cycles at full load

## GENERAL SPECIFICATIONS

- Travel : 0,90 mm (.035) approx.
- Operating temperature :  
-30°C to +85°C

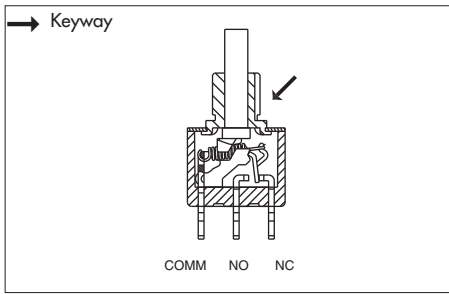
## MATERIALS

- Case : diallylphthalate (DAP)
- Actuator : glass filled polyester
- Bushing : brass, nickel plated
- Housing : stainless steel
- Contacts : silver
- Terminal seal : epoxy

B

# 18000 series

## Snap-action momentary pushbutton switches



- Threaded bushing  $\varnothing 6,35$  (1/4)
- Solder lug terminals
- Epoxy sealed terminals

### MODEL STRUCTURE

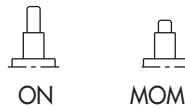


B

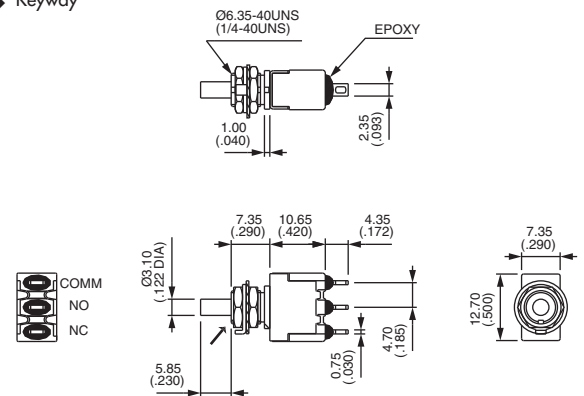
### Single pole



18635A



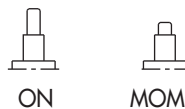
→ Keyway



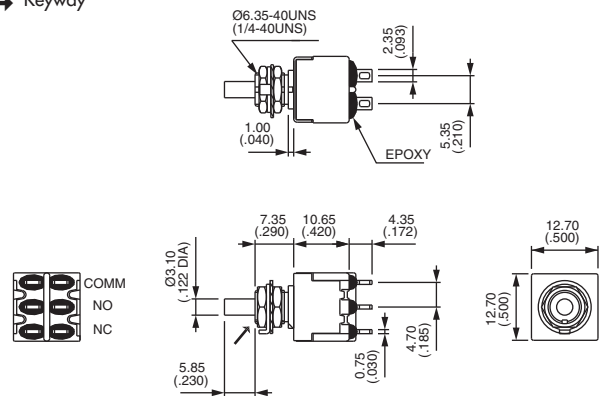
### Double pole



18645A



→ Keyway

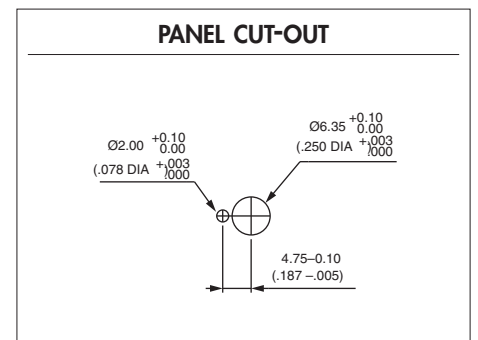


### CAPS



Round	
U2400	$\varnothing 5$ (.196)
U2510	$\varnothing 8$ (.314)
U2130	$\varnothing 9,4$ (.370)
U2900	$\varnothing 10$ (.393)
U3400	$\varnothing 15$ (.590)

Square	
U910	Height 4 (.157)
U2340	Height 6 (.236)



For cap dimensions, see "Caps for  $\varnothing 3,1$  (.122) plungers" on the preceding pages.