# M

## C&K 3P Series Miniature Pushwheel Switches



#### Features/Benefits

- Snap-in front mount design for easy assembly
- 10 position models available Illuminated backlighting available

#### **Typical Applications**

- Test & measurement equipment
- Industrial machinery
- Computer peripherals

#### **Specifications**

CONTACT RATING:

CARRY: 1 AMP continuous.

SWITCH: 0.4 VA max., 100 mA max., 28 V DC max.

OPERATING VOLTAGE: 50 mV to 28 V DC. ELECTRICAL LIFE: 100,000 actuations.

CONTACT RESISTANCE: Below 300 m  $\Omega$  typ. @

2-4 V DC, 100 mA.

INSULATION RESISTANCE:  $10^9~\Omega$  min. (dry). DIELECTRIC STRENGTH: 500 Vrms min. @ sea level between common terminal and any output. OPERATING TEMPERATURE:  $-10^\circ$ C to  $65^\circ$ C.

#### Materials

HOUSING: Polycarbonate (UL 94V-0). PUSHWHEEL: Polycarbonate (UL 94V-0). PUSHBUTTON: Polycarbonate (UL 94V-0).

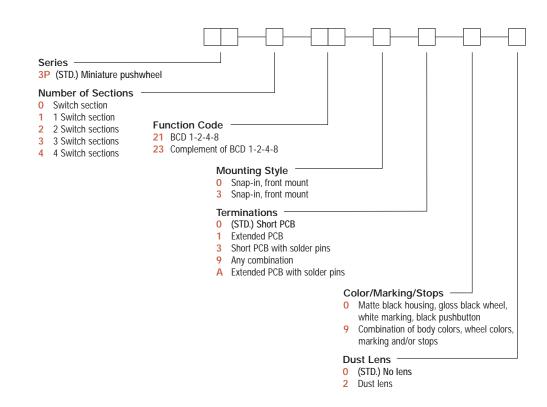
ROTOR CONTACTS: Gold over nickel over copper alloy. STATOR CONTACTS: Hard gold over nickel over copper

on epoxy fiberglass.

**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**

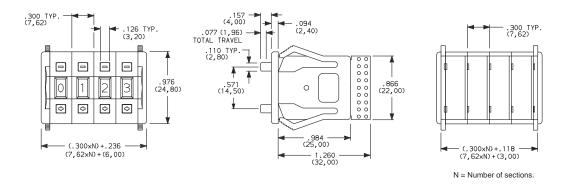
To order, simply select desired option from each category and place in the appropriate box. Available options are shown and described on pages M-17 thru M-19. For additional options not shown in catalog, consult Customer Service Center. Consult factory for illumination availability.





Dimensions are shown: IN (mm) Dimensions subject to change

3P (STD.) MINIATURE PUSHWHEEL SWITCH



#### 

- Switch section only, no endplates.
- Number of switch sections in assembly, includes endplates.

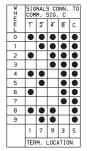
NOTE: Endplates and blank sections available separately, see page M-20.

#### **FUNCTION CODE**

21 BCD 1-2-4-8, 10 POSITION 23 COMPLEMENT OF BCD 1-2-4-8, 10 POSITION

W H E E L	SIGNALS CONN. TO COMM. SIG. C										
Ē	1	2	4	8	С						
0					•						
1	•				•						
2		•			•						
3	•	•			•						
4			•		•						
5	•		•		•						
6		•	•		•						
7	•	•	•		•						
8				•	•						
9	•			•	•						
	1	3	5	7	9						
	TERM. LOCATION										

Available Terminations: A, 0, 1, 3 See figs. 2 & 3, page M-19.



Available Terminations: 0, 1, 3 See figs. 2 & 3, page M-19.

NOTE: For terminal location diagrams, see page M-19.

M-17



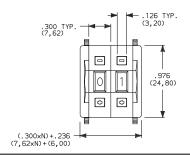
Dimensions are shown: IN (mm) Dimensions subject to change



Cannon

#### MOUNTING STYLE

O SNAP-IN FRONT MOUNT, SECTION PITCH: .300 (7,62) EACH SECTION

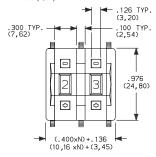


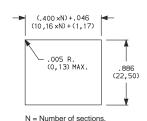
(.300×N)+.146 (7,62×N)+(3,70)

N = Number of sections.

Recommended panel thickness: .039-.156 (0,99-3,95)

3 SNAP-IN FRONT MOUNT WITH SPACER, SECTION PITCH: .400 (70,16) EACH SECTION, LAST SECTION .300 (7,62)

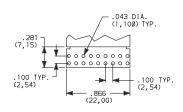




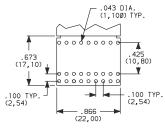
Recommended panel thickness: .039-.156 (0,99-3,95)

#### TERMINATIONS ----

) (STD.) SHORT PCB

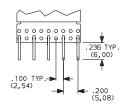


1 EXTENDED PCB WITH PROVISION FOR COMPONENTS



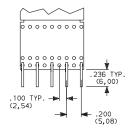
Signal traces cut, except for common(s).

3 SHORT PCB, TYPE 0 WITH SOLDER PINS



For terminal location numbers, see next page.

A EXTENDED PCB, TYPE 1 WITH SOLDER PINS



For terminal location numbers, see next page. Signal traces cut, except for common(s). 9 ANY COMBINATION OF TERMINATION CONFIGURATIONS OR SPECIAL TERMINATIONS

Specify on configuration form, page M-21 and consult Customer Service Center.

PC Board 1/32" (0,79) thick.

**NOTE:** All terminal holes shown may not be present for all function codes, consult Customer Service Center.

M-18



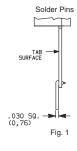
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Dimensions are shown: IN (mm) Dimensions subject to change

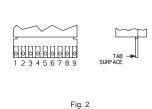
#### TERMINATIONS ---



#### **Terminal Location Numbers**



(STD.) MATTE BLACK HOUSING (Gloss black wheel with white characters, black pushbuttons, no stops.)



- COLOR/MARKING/STOPS ----
- 9 SPECIAL COLORS, MARKINGS FOR HOUSING OR WHEEL, STOPS (Specify on CONFIGURATION FORM, page M-21 and consult Customer Service Center).

### DUST LENS

0 (STD.) NO LENS

0

2 DUST LENS (Protects character face of the wheel from abrasion and dust.)









### **C&K 3P Series** Miniature Pushwheel Switches

## **AVAILABLE HARDWARE**

Blank sections, .300 THK.



PART NO.

663702000 BLACK 663709000

Stop pins



PART NO. 657800000 End plates



LEFT-with hole

PART NO.

623502000 LEFT-BLACK 623509000 LEFT-GRAY

623602000 RIGHT-BLACK 623609000 RIGHT-GRAY



RIGHT-with pin

One left and one right

piece required for complee assembly.

PART NO.

663602000 BLACK 663609000

Spacers, .100 THK. (Makes section pitch .400)

Terminal connnector



PART NO. 630000000

Fits 0, 1 terminations only.





Configuration Form GRAY SHADED AREAS TO BE FILLED IN BY CUSTOMER SERVICE.												( Q	) K								
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CUSTOMER CONTACT DATE											-	DETA	AILS:								
ORIGIN	NATED	BY _							_ SA	LES	REP	P				-					
	SECTIONS OF C					FUNCTION CODE — TERMINATIONS— COLOR/MARKING/STOPS/SEAL — ILLUMINATION  NTER OPTION CODES IN APPROPRIATE BOXES. FUNCTION CODES INCLUDE BLANK SECTIONS (SEE PAGE M-17).							DE	SC	RIBE	IN AP	PROP	RIATE	ROW		
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Dimensions are shown: IN (mm) Dimensions subject to change

### **Mouser Electronics**

**Authorized Distributor** 

Click to View Pricing, Inventory, Delivery & Lifecycle Information:

**C&K Switches**:

623502000 623602000