

## SPECIFICATIONS

**CONTACT RATING:** Dependent upon contact material See page 18.

**MECHANICAL LIFE:** 30,000 make-and-break cycles.

**CONTACT RESISTANCE:** 10mΩ max. initial @ 2-4VDC

100mA for both silver and gold plated contacts.

**INSULATION RESISTANCE:** 1,000MΩ min.

**DIELECTRIC STRENGTH:** 1,000 V RMS@sea level.

**OPERATING TEMPERATURE:** -30°C to 85°C.

## MATERIALS

**CASE & BUSHING:** Class filled nylon 66, flame retardant, heat stabilized (UL94v-0).

**ACTUATOR:** Brass, chrome plated with internal, O-ring seal standard.

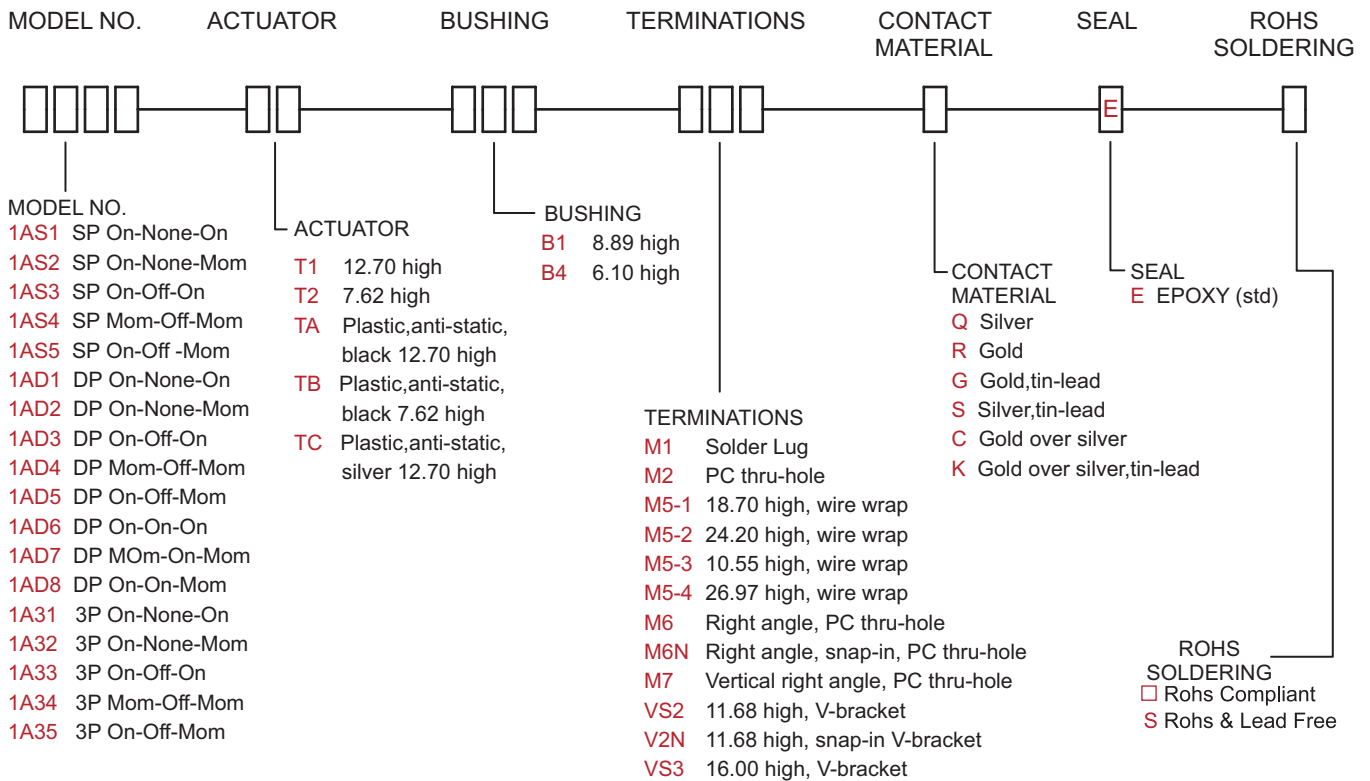
**SWITCH SUPPORT:** Brass or steel, tin plated.

**SWITCH SUPPORT RETAINER:** Stainless steel.

**CONTACT / TERMINALS:** Copper alloy, with Silver or gold plated.

(See Page 18)

## HOW TO ORDER



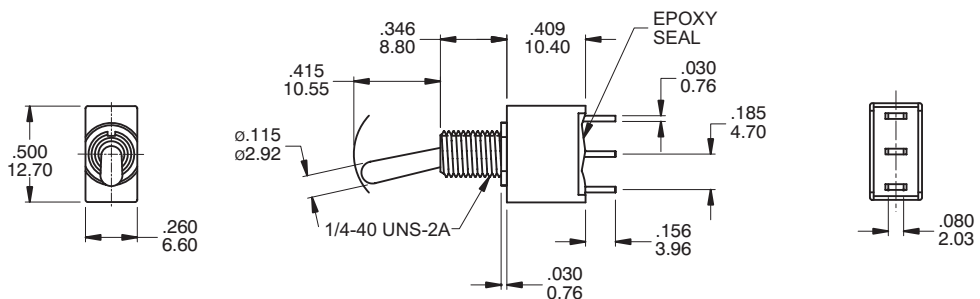
**SWITCH FUNCTION**

NO. POLES	UL/CSA MODEL NO.	MODEL NO.	SWITCH FUNCTION			CONNECTED TERMINALS / SCHEMATIC		
			POS.1	POS.2	POS.3	POS.1	POS.2	POS.3
SP	Q11A11	1AS1	ON	NONE	ON		N/A	
	Q11A12	1AS2	ON	NONE	MOM			
	Q11A13	1AS3	ON	OFF	ON			
	Q11A14	1AS4	MOM	OFF	MOM			
	Q11A15	1AS5	ON	OFF	MOM			
DP	Q11A21	1AD1	ON	NONE	ON		N/A	
	Q11A22	1AD2	ON	NONE	MOM			
	Q11A23	1AD3	ON	OFF	ON			
	Q11A24	1AD4	MOM	OFF	MOM			
	Q11A25	1AD5	ON	OFF	MOM			
	▲ Q11A27	1AD7	MOM	ON	MOM			
	▲ Q11A28	1AD8	ON	ON	MOM			
	3P	Q11A31	1A31	ON	NONE			
Q11A32		1A32	ON	NONE	MOM			
Q11A33		1A33	ON	OFF	ON			
Q11A34		1A34	MOM	OFF	MOM			
Q11A35		1A35	ON	OFF	MOM			

MOM=MOMENTARY

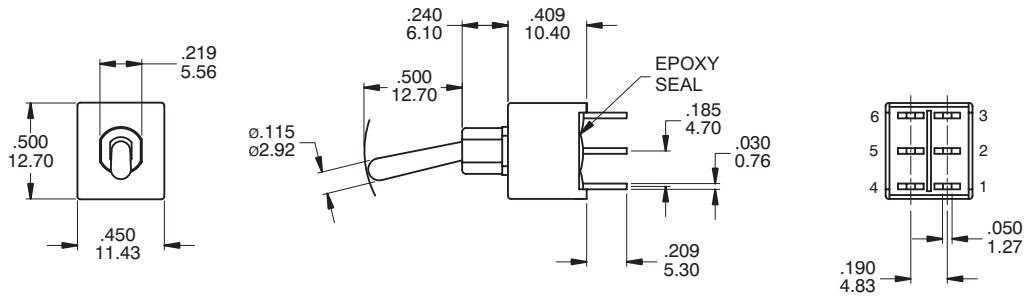
▲ Please check the availability in advance before order

**POLE OPTIONS**



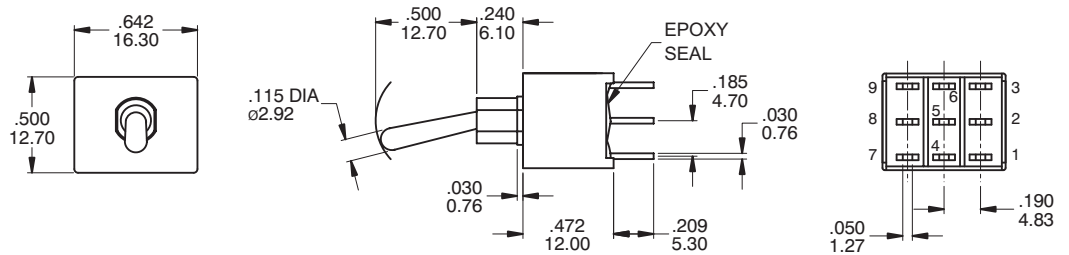
SPDT

Part No. Shown : 1AS1T1B1M1QE



## DPDT

Part No. Shown : 1AD1T1B4M2RE



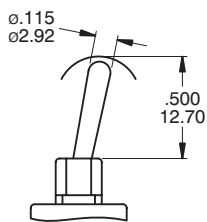
## 3PDT

Part No. Shown : 1A31T1B4M2RE

## ACTUATOR OPTIONS

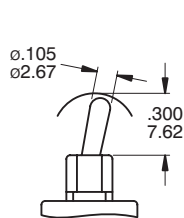
Actuator shown with standard B4 Bushing,  
Subtract .085 (2.15) for B1 bushing.

### T1



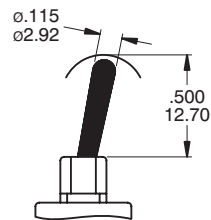
Standard with M1,M2 terminations.

### T2



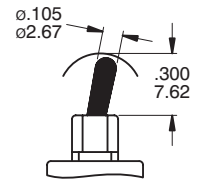
Standard with M6,M7,VS2-3 terminations.

### TA



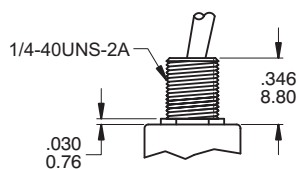
ESD  
PLASTIC ACTUATOR  
(TC anti-static , silver)

### TB



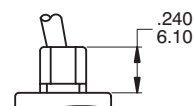
## BUSHING OPTIONS

### B1



Std for M1

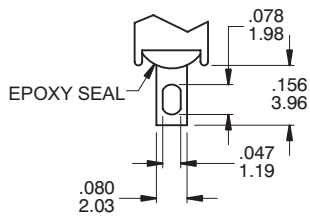
### B4



Std for M2, M6, M7, VS termination

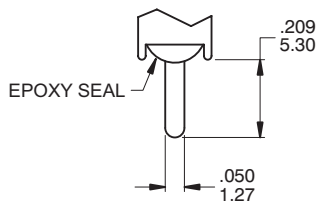
## TERMINATION OPTIONS

### M1 SOLDER LUG



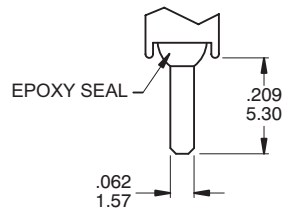
THK .030(0.76)

### M2 PC THRU-HOLE



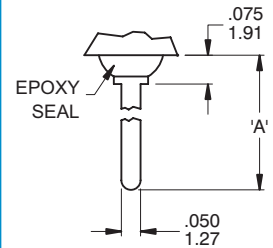
THK .030(0.76)

### M3 QUICK CONNECT



.030(0.76) THK.

### M5 WIRE WRAP



THK .030(0.76)

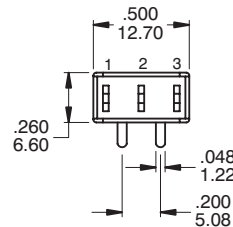
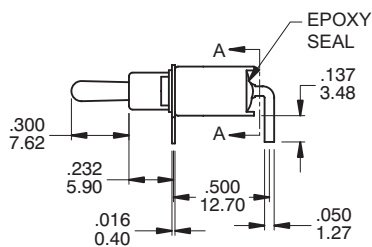
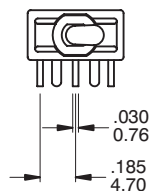
## OTHER TERMINATION OPTIONS

- M6 RIGHT ANGLE P.C. MOUNT
- M7 RIGHT ANGLE P.C. MOUNT
- VS2 VERTICAL BRACKET P.C. MOUNT
- VS3 VERTICAL BRACKET P.C. MOUNT

RE Mating Quick Connector  
Amp P / N 60900 - 1

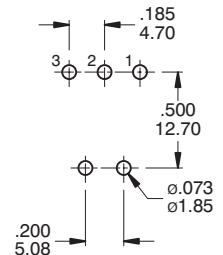
OPTION CODE	DIM. 'A'
M5-1	.736 ( 18.70 )
M5-2	.953 ( 24.20 )
M5-3	.415 ( 10.55 )
M5-4	1.062 ( 26.97 )

### M6



SECTION A-A  
TERM. NOS. FOR  
REFERENCE ONLY

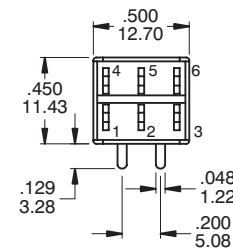
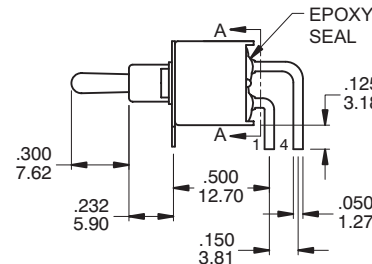
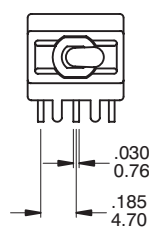
#### P.C. MOUNTING



### SPDT

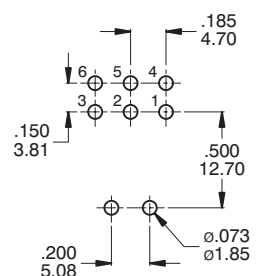
Part No. Shown : 1AS1T2B4M6RE

### M6



SECTION A-A  
TERM. NOS. FOR  
REFERENCE ONLY

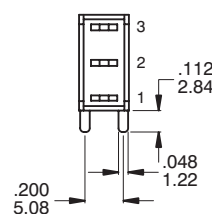
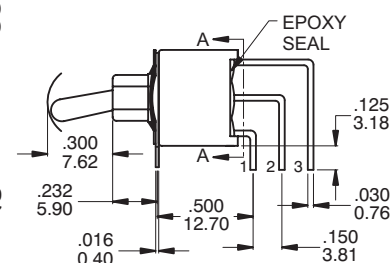
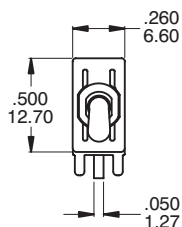
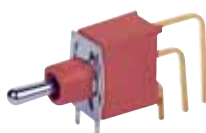
#### P.C. MOUNTING



### DPDT

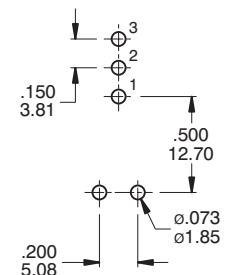
Part No. Shown : 1AD1T2B4M6QE

### M7



SECTION A-A  
TERM. NOS. FOR  
REFERENCE ONLY

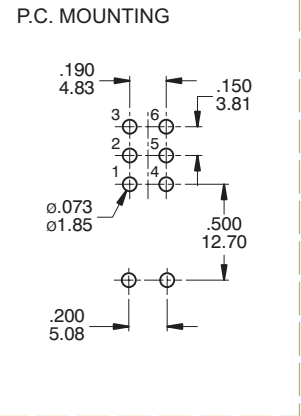
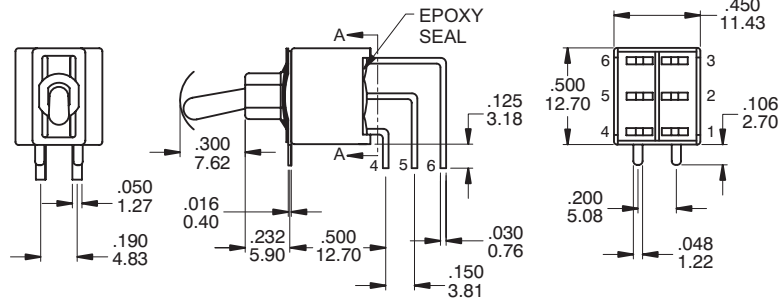
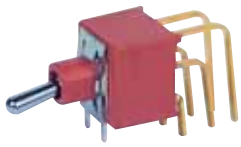
#### P.C. MOUNTING



### SPDT

Part No. Shown : 1AS1T2B4M7RE

**M7**

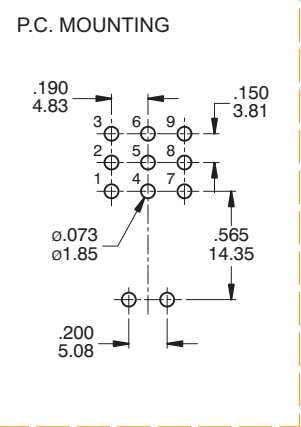
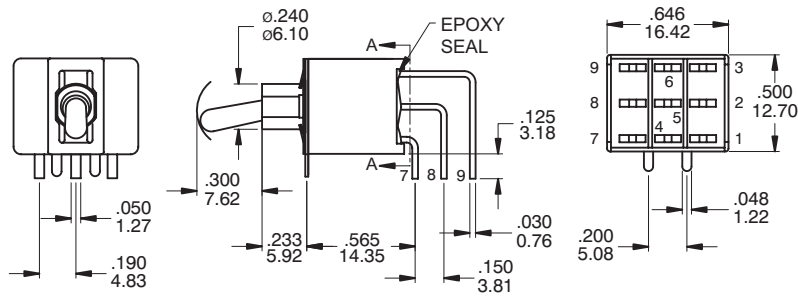
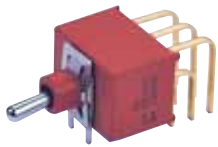


**DPDT**

Part No. Shown : 1AD1T2B4M7RE

SECTION A-A  
TERM. NOS. FOR  
REFERENCE ONLY

**M7**

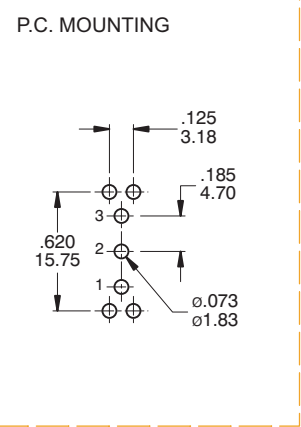
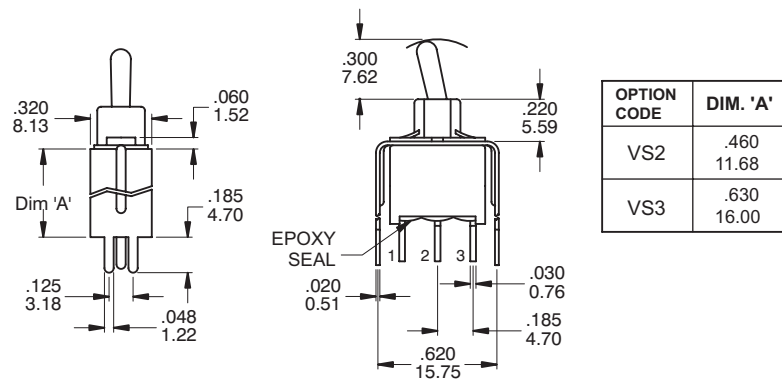


**3PDT**

Part No. Shown : 1A31T2B4M7RE

SECTION A-A  
TERM. NOS. FOR  
REFERENCE ONLY

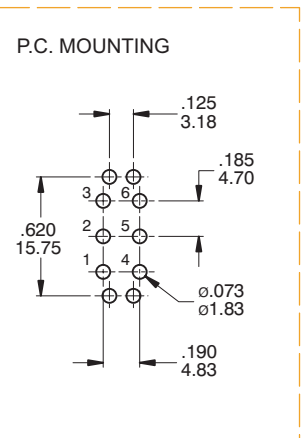
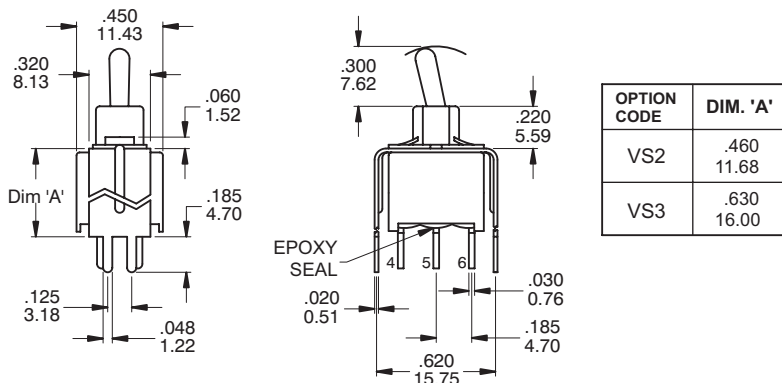
**VS2 - VS3**



**SPDT**

Part No. Shown : 1AS1T2B4VS2RE

**VS2 - VS3**



**DPDT**

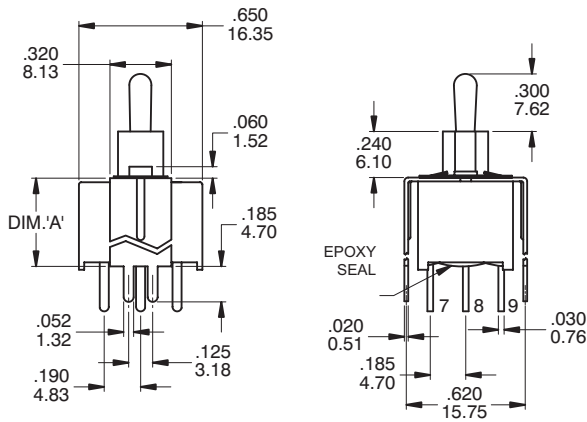
Part No. Shown : 1AD1T2B4VS2RE

**VS2 - VS3**

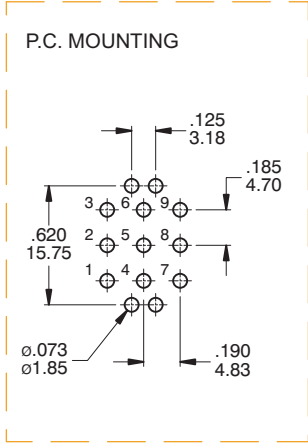


**3PDT**

Part No. Shown : 1A31T2B4VS2RE



OPTION CODE	DIM. 'A'
VS2	.460 11.68
VS3	.630 16.00

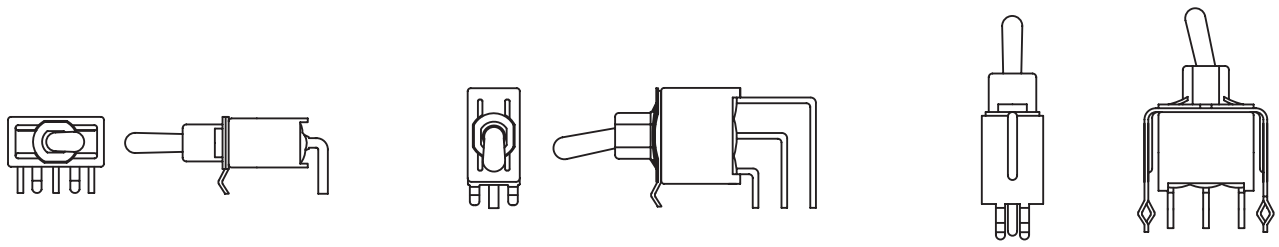


## SNAP-IN TERMINATION OPTIONS

**M6N**

**M7N**

**V2N**



## HARDWARE

**NUT**

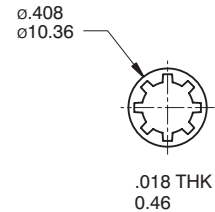
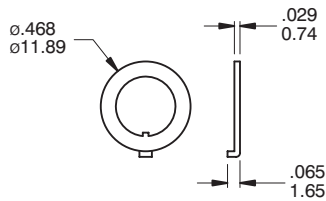
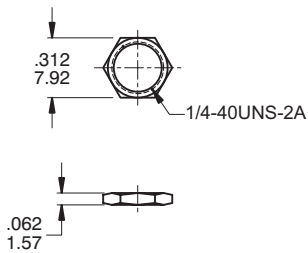
**LOCKING RING**

**LOCK WASHER**

**HDW2**

**HDW15**

**HDW11**



## CONTACT MATERIAL OPTIONS

	CONTACT MATERIAL	TERMINAL PLATING	RATINGS
<b>Q</b>	Silver	<b>Q</b> = Gold flash over silver	5 Amps with resistant load @ 120VAC or 28VDC 2 Amps with resistant load @ 250VA
<b>S</b>		<b>S</b> = Gold flash over silver, pure - tin	
<b>C</b>	Gold over Silver	<b>C</b> = Gold over silver	
<b>K</b>		<b>K</b> = Gold over silver, pure - tin	
<b>R</b>	Gold	<b>R</b> = Gold	0.4 Volt - Amps ( VA ) max. @ 20V max. ( AC or DC )
<b>G</b>		<b>G</b> = Gold, pure - tin	



**IP 67**  
 ACCORDING TO  
 EN 60529:1991+A1:2001  
 IEC 60529:2001

**SOLDERING PROCESSES**

**MANUAL SOLDERING :** Use soldering iron of 30 watts, controlled st 350°C approximately 5 seconds while applying solder.

**WAVE SOLDERING :** Recommended Soldering Temperature : 260 ± 5°C  
 Duration of Solder Immersion : 5 ± 1 seconds  
 (PCB is 1.6mm in thickness)

**SOLDERING : Vapor phase**

