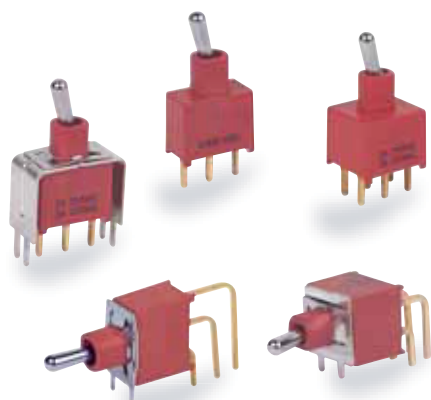


S1A Series

Sealed Miniature Toggle Switches



IP 67
ACCORDING TO
EN 60529:1989+A1:2001
IEC 60529:2001

SPECIFICATIONS

CONTACT RATING: Dependent upon contact material.

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: Glass 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.

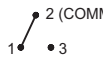
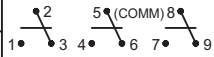
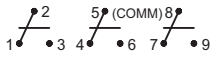
SWITCH SUPPORT RETAINER: Stainless steel.

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

HOW TO ORDER

MODEL NO.	ACTUATOR	BUSHING	TERMINATIONS	CONTACT MATERIAL	SEAL	ROHS SOLDERING
MODEL NO. S1AS1 S1AS2 S1AS3 S1AS4 S1AS5 S1AD1 S1AD2 S1AD3 S1AD4 S1AD5 S1AD6 S1AD7 S1AD8 S1A31 S1A32 S1A33 S1A34 S1A35 SP On-None-On SP On-None-Mom SP On-Off-On SP Mom-Off-Mom SP On-Off-Mom DP On-None-On DP On-None-Mom DP On-Off-On DP Mom-Off-Mom DP On-Off-Mom DP On-On-On DP MOm-On-Mom DP On-On-Mom 3P On-None-On 3P On-None-Mom 3P On-Off-On 3P Mom-Off-Mom 3P On-Off-Mom	ACTUATOR T1 T2 TA TB TC 12.70 high 7.62 high Plastic, anti-static, black 12.70 high Plastic, anti-static, black 7.62 high Plastic, anti-static, silver 12.70 high	BUSHING B1 B4 8.89 high 6.10 high	TERMINATIONS M1 M2 M5-1 M5-2 M5-3 M5-4 M6 M6N M7 VS2 V2N VS3 Solder Lug PC thru-hole 18.70 high, wire wrap 24.20 high, wire wrap 10.55 high, wire wrap 26.97 high, wire wrap Right angle, PC thru-hole Right angle, snap-in, PC thru-hole Vertical right angle, PC thru-hole 11.68 high, V-bracket 11.68 high, snap-in V-bracket 16.00 high, V-bracket	CONTACT MATERIAL Q R G S C K Silver Gold Gold, tin-lead Silver, tin-lead Gold over silver Gold over silver, tin-lead	SEAL E EPOXY (std)	ROHS SOLDERING □ S F Rohs Compliant Rohs & Lead Free Halogen Free+RoHS

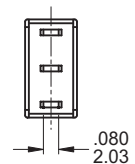
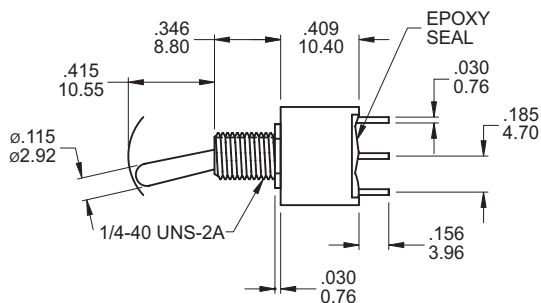
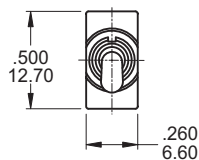
SWITCH FUNCTION

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	S1AS1	ON	NONE	ON	2-3 	N/A	2-1 
	Q11A12	S1AS2	ON	NONE	MOM		OPEN	
	Q11A13	S1AS3	ON	OFF	ON			
	Q11A14	S1AS4	MOM	OFF	MOM			
	Q11A15	S1AS5	ON	OFF	MOM			
DP	Q11A21	S1AD1	ON	NONE	ON	2-3,5-6 	N/A	2-1,5-4 
	Q11A22	S1AD2	ON	NONE	MOM		OPEN	
	Q11A23	S1AD3	ON	OFF	ON			
	Q11A24	S1AD4	MOM	OFF	MOM			
	Q11A25	S1AD5	ON	OFF	MOM			
	Q11A26	S1AD6	ON	ON	ON	2-3,5-6	2-3,5-4	2-1,5-4
	▲ Q11A27	S1AD7	MOM	ON	MOM			
	▲ Q11A28	S1AD8	ON	ON	MOM			
3P	Q11A31	S1A31	ON	NONE	ON	2-3,5-6,8-9 	N/A	2-1,5-4,8-7 
	Q11A32	S1A32	ON	NONE	MOM		OPEN	
	Q11A33	S1A33	ON	OFF	ON			
	Q11A34	S1A34	MOM	OFF	MOM			
	Q11A35	S1A35	ON	OFF	MOM			

MOM=MOMENTARY

▲ Please check the availability in advance before order

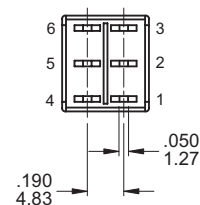
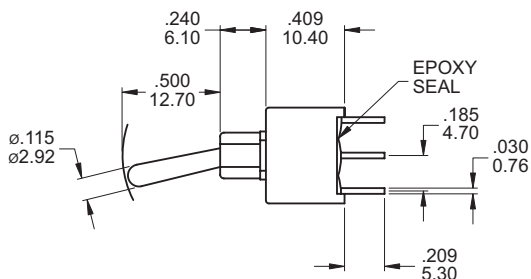
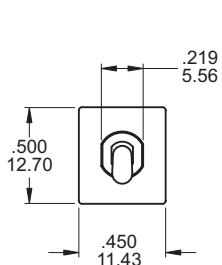
POLE OPTIONS



SPDT

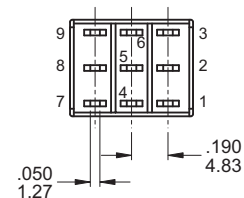
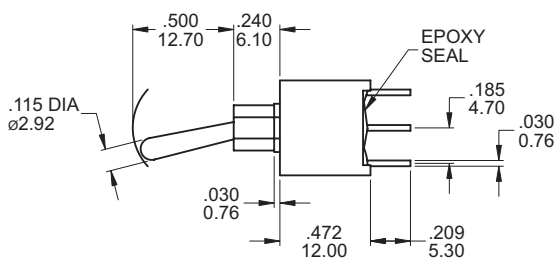
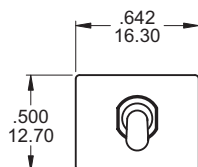
Part No. Shown : S1AS1T1B1M1QE

喜威達企業股份有限公司
SWEETA PRODUCTS CORPORATION



DPDT

Part No. Shown : S1AD1T1B4M2RE



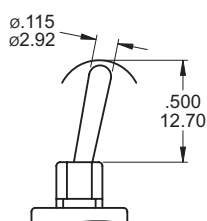
3PDT

Part No. Shown : S1A31T1B4M2RE

ACTUATOR OPTIONS

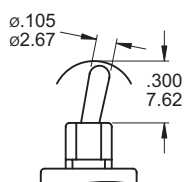
Actuator shown with standard B4 Bushing,
Subtract .085 (2.15) for B1 bushing.

T1



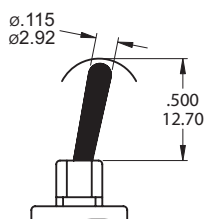
Standard with
M1,M2 terminations.

T2



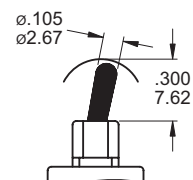
Standard with
M6,M7,VS2-3 terminations.

TA



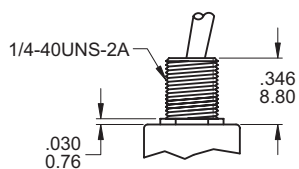
ESD
PLASTIC ACTUATOR
(TC anti-static , silver)

TB



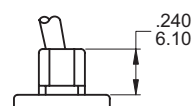
BUSHING OPTIONS

B1



Std for M1

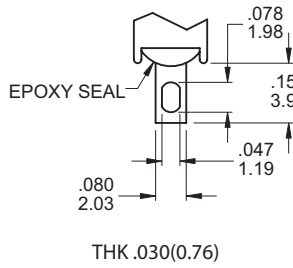
B4



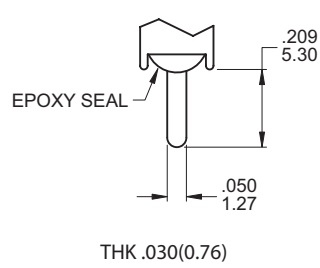
Std for M2, M6, M7, VS termination

TERMINATION OPTIONS

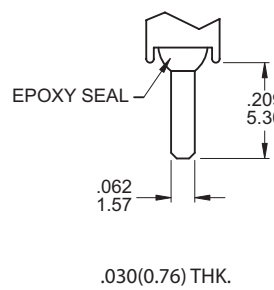
M1 SOLDER LUG



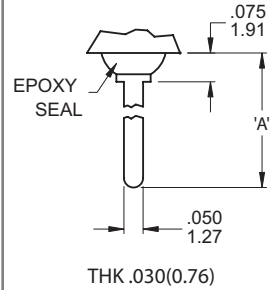
M2 PC THRU-HOLE



M3 QUICK CONNECT



M5 WIRE WRAP



OTHER TERMINATION OPTIONS

M6 RIGHT ANGLE P.C. MOUNT

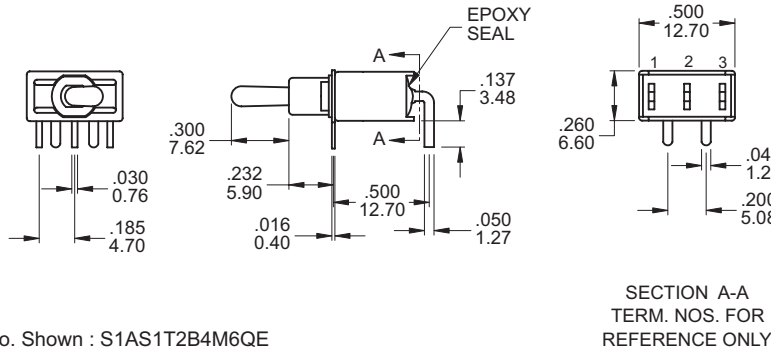
M7 RIGHT ANGLE P.C. MOUNT

VS2 VERTICAL BRACKET P.C. MOUNT

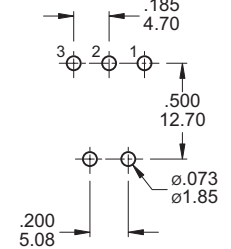
VS3 VERTICAL BRACKET P.C. MOUNT

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



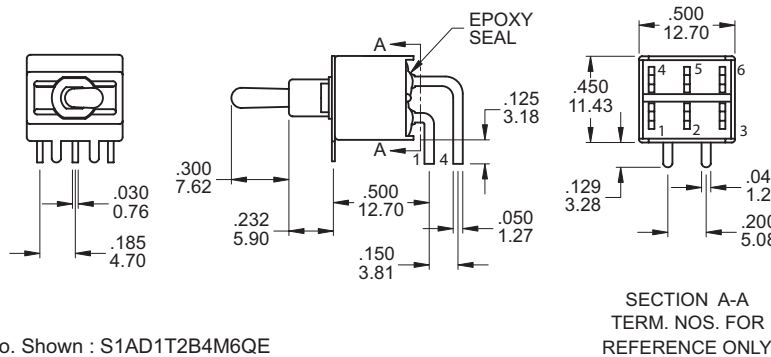
P.C. MOUNTING



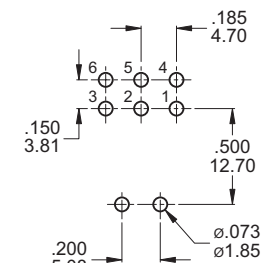
SPDT

Part No. Shown : S1AS1T2B4M6QE

M6



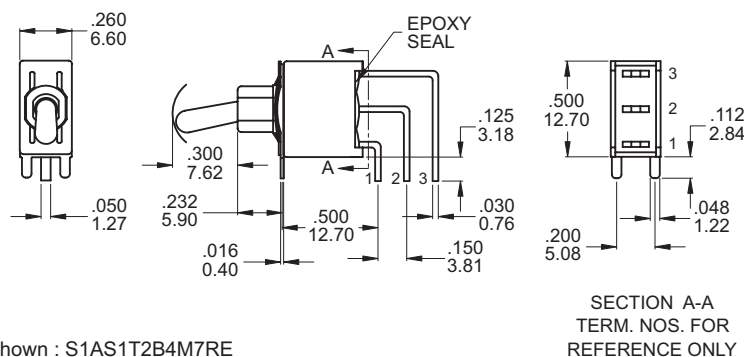
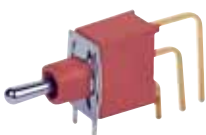
P.C. MOUNTING



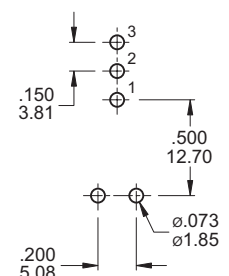
DPDT

Part No. Shown : S1AD1T2B4M6QE

M7



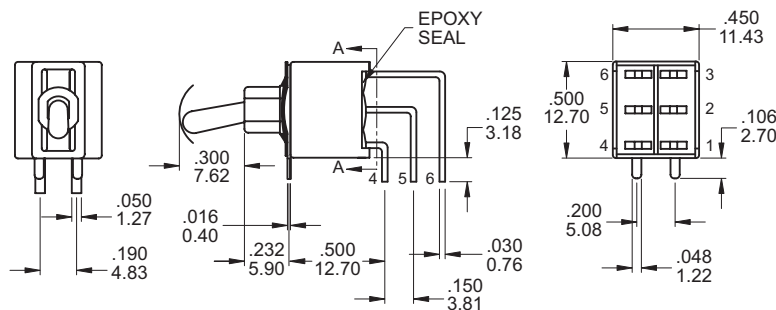
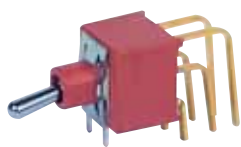
P.C. MOUNTING



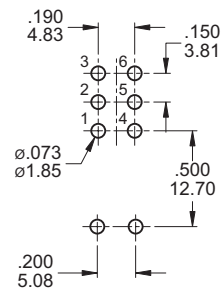
SPDT

Part No. Shown : S1AS1T2B4M7RE

M7



P.C. MOUNTING

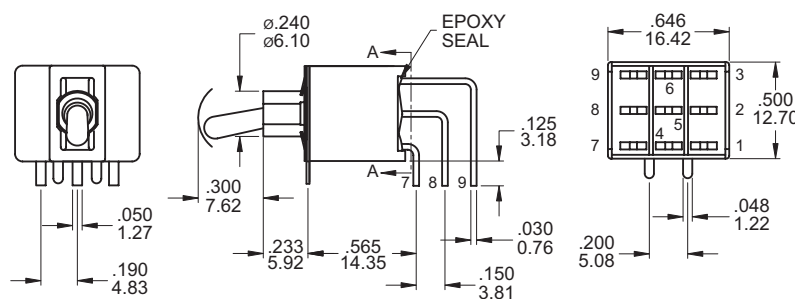


DPDT

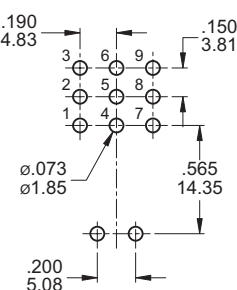
Part No. Shown : S1AD1T2B4M7RE

SECTION A-A
TERM. NOS. FOR
REFERENCE ONLY

M7



P.C. MOUNTING

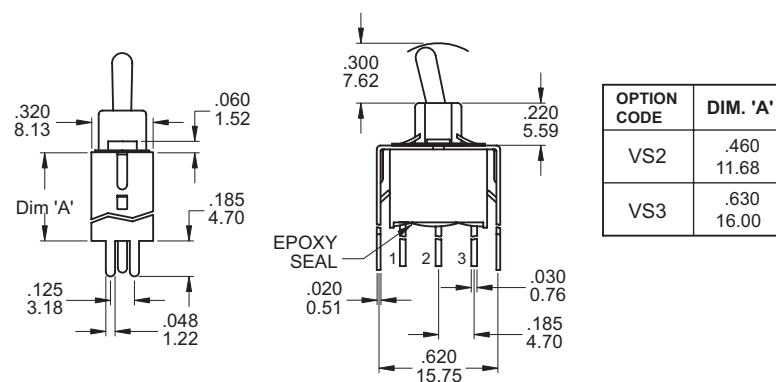


3PDT

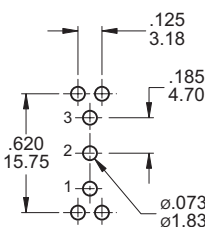
Part No. Shown : S1A31T2B4M7RE

SECTION A-A
TERM. NOS. FOR
REFERENCE ONLY

VS2 - VS3



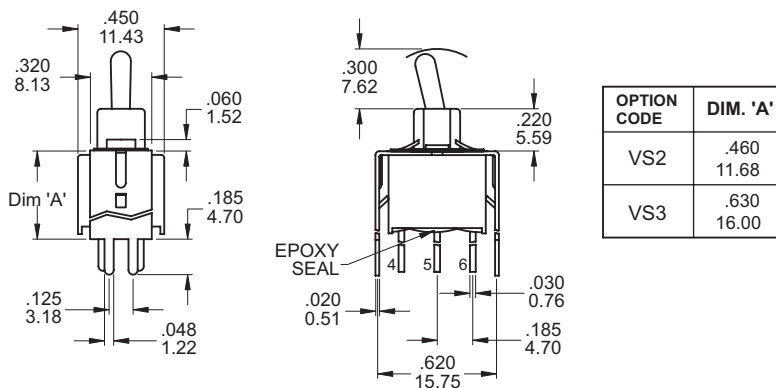
P.C. MOUNTING



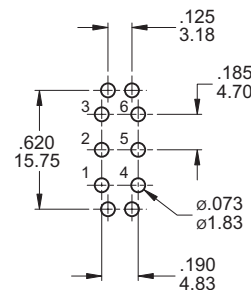
SPDT

Part No. Shown : S1AS1T2B4VS2RE

VS2 - VS3



P.C. MOUNTING



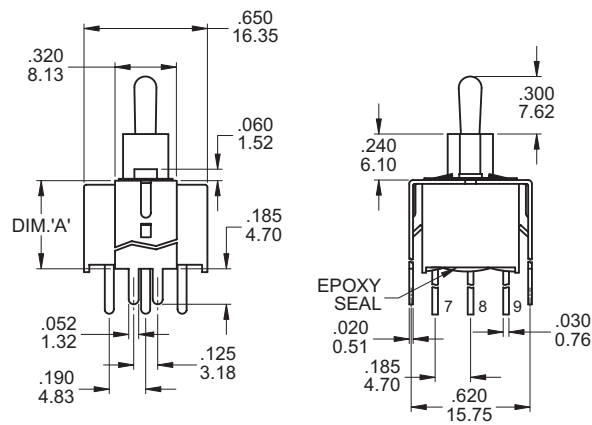
DPDT

Part No. Shown : S1AD1T2B4VS2RE

VS2 - VS3

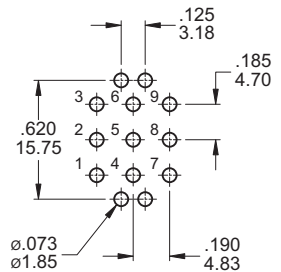


3PDT



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

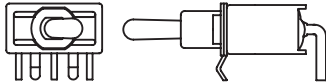
P.C. MOUNTING



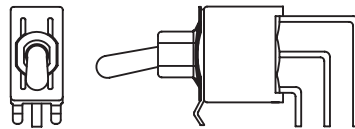
Part No. Shown : S1A31T2B4VS2QE

SNAP-IN TERMINATION OPTIONS

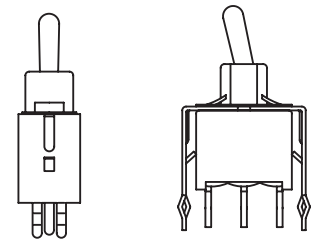
M6N



M7N



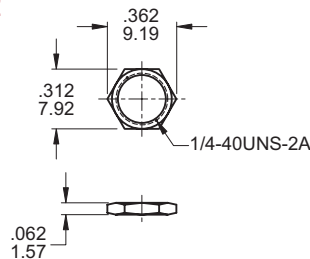
V2N



HARDWARE

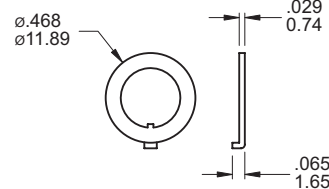
NUT

HDW2



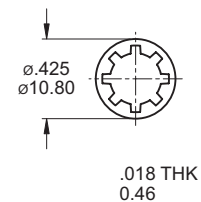
LOCKING RING

HDW15



LOCK WASHER

HDW11



CONTACT MATERIAL OPTIONS

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

SOLDERING PROCESSES

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

WAVE SOLDERING : Recommended Soldering Temperature : 260 ± 5°C

Duration of Solder Immersion : Max 5sec. (PCB is 1.6mm in thickness)

SOLDERING : Vapor phase