# Meets automotive needs with a sealed contact structure for dust resistance





# ■ Typical Specifications

Items	Specifications
Rating (max.)	25mA 16V DC
Rating (min.)	10μA 1V DC
Initial contact resistance	500mΩ max.
Travel (mm)	0.12

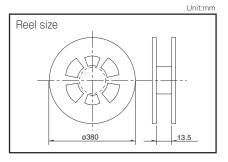
# ■ Product Line

Product No.	uct No. Operating force Operating direction Operating life Stem height		Minimum order unit (pcs.)		Drawing		
T TOUGET NO.	Operating force	operating direction	(5mA 5V DC)	Otom noight	Japan	Export	No.
SKTHBAE010	3N	Top push	200,000 cycles	2.5mm	4,000	4,000	1
SKTHACE010	1.4N	τορ ρασιτ	100,000 cycles	1.8mm	5,000	5,000	2

# Packing Specifications

# Taping

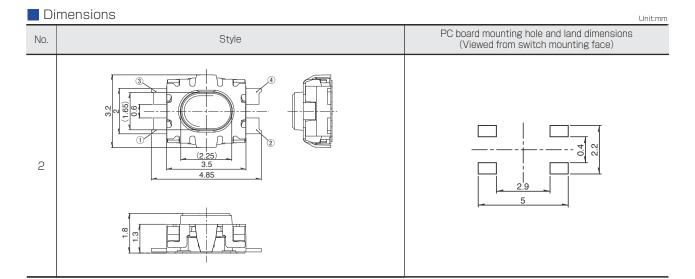
Corion	Numb	er of packages	Tape width	Export package	
Selles	Series 1 reel 1 case / Japan 1 case / export packing		(mm)	measurements (mm)	
SKTHBA	4,000	40,000	40,000	12	401×401×214
SKTHAC	<b>SKTHAC</b> 5,000 50,000		50,000	12	401/401/214

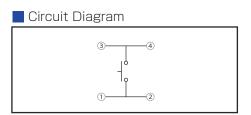


For reels of 330mm diameter, please inquire.

	Dimensions					
No.	Style	PC board mounting hole and land dimensions (Viewed from switch mounting face)				
1	3 9 9 1 1 1 1 1 1 1 1 1 1 1 1 1	2.9				







	Туре				Sharp Fe	eling Type			
					Surfac	e Mount			
	Series	SKTH	SKRP	SKQM	SKQY	SKSU	SKST	SKRA	SKHM
	Photo	NEW						9	P
	Features	Compact size	High operation force Compact size	Comp	act size		Middle travel	l	_
	Water-proof	_	_	_	_	•	_	0	_
	Dust-proof	•	_	_	_	•	_	0	_
	IP standard	_	_	_	_	67 equivalency	_	67 equivalency	_
Operatir	Top push	•	•	•	•	•	•	•	•
directio		_	_	_	_	_	_	_	_
	W	3.5	4.2	6	6.1	5.3	8.5		6.2
Dimensio (mm)	ons D	3.2	3.2	3.5	3.7	5.4	8.5	- □6.2	6.5
()	Н	1.8/2.5	2.5	4.3/5	2.5	3.85	3.95	3.5/5.2	3.1
Operation force coverage	2N to 3N	1	1	Ţ	Ţ	<b>\$</b>	<b>+</b>		Ţ
	Travel (mm)	0.12	0.2	0.	.25	0.7	0.9	See the relevant pages for respective product descriptions	0.25
G	round terminal	_	_	_	0	_	_	_	•
Operatir	ng temperature range			-	-40°C to +90	C			-40℃ to +85℃
А	utomotive use	•	•	•	•	•	•	0	_
	Life Cycle	<b>*</b> 2	*3	<b>*</b> 2	<b>*</b> 2	<b>*</b> 3	<b>*</b> 2	*3	*3
	Rating (max.) (Resistive load)	25mA 16V DC	50mA 16V DC	50mA	12V DC	50mA 1	6V DC	50mA	I2V DC
Electrical	Rating (min.) (Resistive load)				10μΑ	VIV DC			
performance	Insulation resistance	100MΩ min. 100V DC 1min.							
	Voltage proof	100V AC 1min.				250V AC 1min.			
Durobilit	Vibration	bration  O to 55 to 10Hz/min., the amplitude is 1.5mm for all the frequencies, in the 3 direction of X, Y and Z for 2 hours respectively							
Durability	Lifetime			Shall be in	accordance wi	th individual spe	cifications.		
	Cold	-40℃ 96h	-40℃ 1,000h	-40	°C 96h		-40°C 1,000h	า	-40℃ 96h
Environmental performance	Dry heat	90℃ 96h	90°C 1,000h	90°0	96h	90°C 1,000h		90℃ 96h	
	Damp heat	60°C, 90 to 95%RH 96h	60°C, 90 to 95%RH 1,000h	60°C, 90 to	95%RH 96h	60°C, 90 to 95%RH 1,000h		60°C, 90 to 95%RH 96h	
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W: Width. The most outer dimension excluding terminal portion.

D : Depth. The most outer dimension excluding terminal portion. H : Height. The minimum dimension if there are variances.

	11. Height. The minimum difficultion in there are variances.
TACT Switch™ Soldering Conditions · · · · · · · · · · · · · · · · · · ·	
TACT Switch <sup>TM</sup> Cautions	

#### Notes

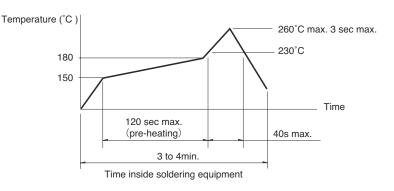
- 1. The automotive operating temperature range to be individually discussed upon request.
- 2. lacktriangle Indicates applicability to all products in the series, while  $\bigcirc$  indicates applicability to some products in the series.

# TACT Switch™ Soldering Conditions

### Condition for Reflow

Available for Surface Mount Type.

- 1. Temperature measurement: Thermocouple  $\phi$  0.1 to 0.2 CA (K) or CC (T) at solder joints (copper foil surface).
  - A heat resistive tape should be used to fix thermocouple.
- 2. Temperature profile



### Notes

- The above temperature shall be measured of the top of switch. There are cases where the PC board's temperature greatly differs from that of the switch, depending on the material, size, thickness of PC boards and others.
   The above-stated conditions shall also apply to switch surface temperatures.
- Soldering conditions differ depending on reflow soldering machines. Prior verification of soldering condition is highly recommended.

## Conditions for Auto-dip

Available for Snap-in Type and Radial Type.

Items	Condition
Flux built-up	Mounting surface should not be exposed to flux
Preheating temperature	Ambient temperature of the soldered surface of PC board. 100°C max.
Preheating time	60s max.
Soldering temperature	260℃ max.
Duration of immersion	5s max.
Number of soldering	2times max.

## SKHH, SKPD Series

Items	Condition
Flux built-up	Mounting surface should not be exposed to flux
Preheating temperature	Ambient temperature of the soldered surface of PC board. 110°C max.
Preheating time	60s max.
Soldering temperature	260°C max.
Duration of immersion	5s max.
Number of soldering	2times max.

# SKQJ, SKQK, SKEG Series

Items	Condition	
Flux built-up	Mounting surface should not be exposed to flux	
Preheating temperature	Ambient temperature of the soldered surface of PC board. 100 $^{\circ}\!$	
Preheating time	45s max.	
Soldering temperature	255℃ max.	
Duration of immersion	5s max.	
Number of soldering	2times max.	

## Manual Soldering

Items	Condition
Soldering temperature	350℃ max.
Duration of soldering	3s max.
Capacity of soldering iro	n 60W max.

#### SKHH, SKHW, SKRG, SKPD Series

Items	Condition
Soldering temperature	360°C max.
Duration of soldering	3s max.
Capacity of soldering iron	60W max.

### SKTD, SKTG, SKQJ, SKQK, SKEG Series

Items	Condition
Soldering temperature	350°C max.
Duration of soldering	3s max.
Capacity of soldering iron	20W max.

# Notes

- 1. Prevent flux penetration from the top side of the TACT Switch™.
- 2. Switch terminals and a PC board should not be coated with flux prior to soldering.
- 3. The second soldering should be done after the switch is stable with normal temperature.
- 4. Use the flux with a specific gravity of min 0.81. (EC-19S-8 by TAMURA Corporation, or equivalents.)



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