# Radial Type

## List of Varieties

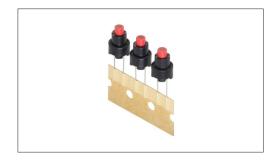
Se	ries	SKRC
Pt	noto	
Operation	on feeling	Sharp feeling
Wate	er-proof	•
Dus	t-proof	•
IP st	andard	In the coated state
Operating	Top push	•
direction	Side push	_
Ground	terminal	_
Dimens	ions (mm)	φ9mm×13
Operatin	g force (N)	1.57 2.55
Trave	el (mm)	0.25
Operating ten	nperature range	-30℃ to +85℃
	Rating (max.)	50mA 12V DC
Flootrical	Rating (min.)	10μΑ 1V DC
Electrical performance	Insulation resistance	100MΩ min. 100V DC 1min.
	Voltage proof	250V AC 1 min.
	Cold	-40℃ 96h
Environmental performance	Dry heat	90°C 96h
	Damp heat	60°C, 90 to 95%RH 1,000h
Auto	motive	-



• Indicates applicability to all products in the series, while  $\bigcirc$  indicates applicability to some products in the series.

### 9.0mm Diameter (Radial) SKRC Series

### Round terminal design with excellent mountability, achieving water-proof and dust-proof performance.







■ Series type: Sharp feeling type ■ Rating (max.):50mA 12V DC ■ Rating (min.): 10µA 1V DC

Applications: Energy\_Industrial: Industrial equipment Home: Major home appliances

#### ■ Product List

Products No.	Operating direction	Operating force (N)	Travel (mm)	Operating life (cycles)	Initial contact resistance	Dimensions (W×D×H) (mm)	Water-proof	Dust-proof	Water-proof & Dust-proof	Automotive	Drawing No.
SKRCACD010	Top push	1.57	0.25	100,000	500mΩ max.	φ9mm×13	•	•	In the coated state	_	1
SKRCADD010	Top push	2.55	0.25	100,000	500mΩ max.	φ9mm×13	•	•	In the coated state	_	'

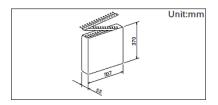
#### ⚠Note

- 1. This catalog shows only outline specifications. When using the products, please obtain formal specifications for supply.
- 2. When the switch is used in an environment subject to high humidity or condensation, make sure the terminals are coated thoroughly to prevent current leakage between terminals.
- 3. Avoid using coating material coating toluene or xylene. For more information on coating material, please contact us.
- 4. Switch terminals must be coated thoroughly until the terminals are fully covered.
- 5. For more information on coating material, please contact us.
- 6. Please use 1.6mm thick PC boards.
- 7. Please place purchase orders for taping products per minimum order unit (1 box or a case).

#### ■ Packing Specifications

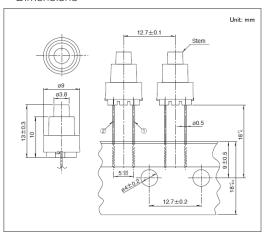
#### Radial taping

Numb	er of packages	Export package		
1 box	1 case / Japan	1 case / export packing	measurements (mm)	
900	9,000	9,000	353×764×309	

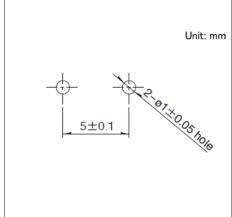


#### Drawing No.1

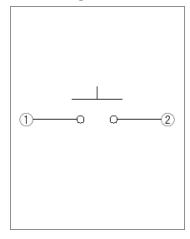
Dimensions



■ Mounting Hole Dimensions



■ Circuit Diagram



Viewed from mounting face.

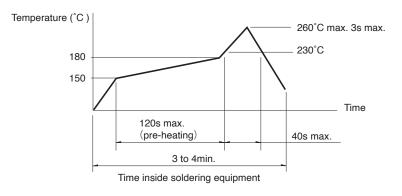


### TACT Switch™ / Soldering Conditions

#### ■ Condition for Reflow

Available for Surface Mount Type.

Temperature profile



#### Note

- 1. Please confirm the specifications of our product for the detailed condition.
- 2. Soldering conditions differ depending on reflow soldering machines. Prior verification of soldering condition is highly recommended.
- 3. Allowable soldering time: 2 times Max. The second soldering should be done after the switch is stable with normal temperature.

#### ■ 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 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℃ max.
Duration of immersion	5s max.
Number of soldering	2times max.

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	45s max.
Soldering temperature	255℃ max.
Duration of immersion	5s max.
Number of soldering	2times max.

#### SKHLTop Push Type, SKQJ Series

Items	Contaition
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	45s max.
Soldering temperature	255℃ max.
Duration of immersion	5s max.
Number of soldering	2times max.

#### Note

- 1. Prevent flux penetration from the top side of the TACT SwitchTM.
- 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.)

#### ■ Manual Soldering

#### Items

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

#### SKHH, SKHW Series

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

#### SKTD, SKQJ, SKSN Series

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

#### TACT Switch™ / Cautions

- 1. When terminals are exposed to mechanical stress during soldering, it may cause degradation in deformation and electrical property.
- 2. Through-hole PC board, or a PC board thickness other than the recommendation may cause larger heat stress. Prior verification is highly recommended.
- 3. In prior to the 2nd soldering swith shall be stable with normal temperature. It may cause deformation of swith, loose terminals, terminal removed from PC board, and / or degradation of electric property.
- 4. Verify samples with actual mass production conditions.
- 5. After soldering, do not wash switches with a solvent, etc.
- 6. The products are designed and manufactured for direct current resistance. Individual consultation is recommended for use of other resistances such as inductive (L) or capacitive (C).
- 7. The sizes of holes and patterns on a PC board for mounting a switch, be asper the recommended dimensions in the product drawings.
- 8. This switch is designed for manually operated units. Must not use this switch for a mechanical detection unit. For detection purposes, please use our detection switch.
- 9. The switch will be broken if impact force or a greater stress than that specified is applied. Take great care not to let the switch be subject to greater stress than specified.
- 10. Do not apply a force from the side of the stem.
- 11. Be sure to push the center of switch for "without-stem" type. Extreme care is required for a hinge structure type, as the activation point may shift when it is pressed down.
- 12. The circuit setting (software setting) shall be ensured for error-free operations, caused by bounce and chattering as specified by each model of the switches.
- 13. Prior verification is needed to ensure that no corrosive gas-generating components are used near our switch. It may give negative influence such as contact failure.
- 14. Contact resistance of a carbon contact type may vary depending on push force. Confirm that it functions sufficiently in using TACT Switch™ with a voltage divider circuit.
- 15. Be aware of dust intrusion into a non dust-proof TACT switch ™.

#### 16. Storage

- 1. Store the products as delivered, at a normal temperature and humidity, without direct sunshine and corrosive gas ambient. Use them at an earliest possible timing, not later than six months upon receipt.
- 2. After breaking the seal, keep the products in a plastic bag to prevent out ambient air, store them in the same environment as above, and use all as soon as possible.
- 3.Do not stack too many switches.
- 4. Store the key switches in released position.
- 17. TACT Switch is a trademark or registered trademark of Alps Alpine Co., Ltd.