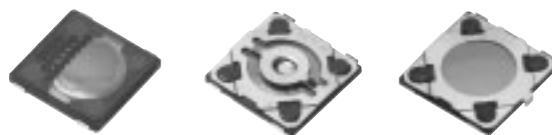


### 4 mm Square SMD Light Touch Switches

Type: **EVQP6/EVQ6P6/EVQ7P6/EVQ9P6**



#### ■ Features

- External dimensions : 4.1 mm×4.1 mm  
Height :Without Push Plate 0.35 mm, With Push Plate 0.58 mm  
:Without Push Plate-With Ground Terminal 0.43 mm
- Long-life :1000000 cycles min.  
(Operating Force 1.6 N Type)
- Dust-proof structure

#### ■ Recommended Applications

- Operating switches for portable electronic equipment  
(Mobile phones, Camcorders, Portable audio players, etc.).

#### ■ Explanation of Part Numbers

1	2	3	4	5	6	7	8	9
<b>E</b>	<b>V</b>	<b>Q</b>						
Product Code			Hight					
			Type					
			4th, 5th, 6th P6□ · With Push Plate, Without Push Plate · Without Grounf Terminal					
			6P6 7P6 · Without Push Plate 9P6 · With Grounf Terminal					

#### ■ Product Chart

Height	Without Push Plate H=0.35 mm	With Push Plate H=0.58 mm	Without Push Plate With Ground Terminal H=0.43 mm
Packaging	Embossed	Embossed	Embossed
Operating Force			
1.0 N	—	—	EVQ7P6
1.6 N	EVQP6D	EVQP6L	EVQ6P6
2.4 N	EVQP6P	EVQP6Y	EVQ9P6
3.5 N	EVQP6J	EVQP6W	—

#### ■ Specifications

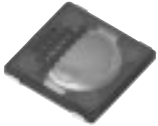
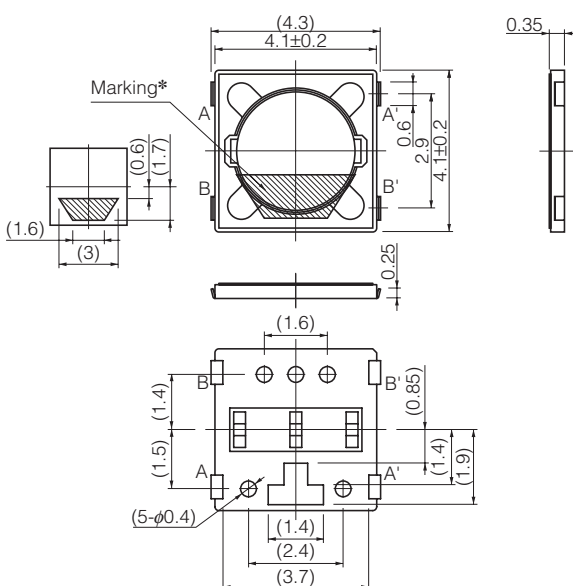
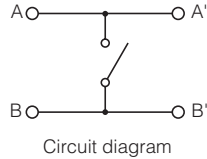
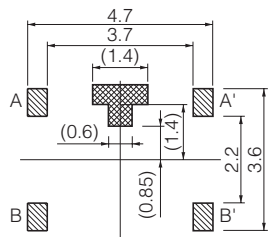


Type		Snap action / Push-on type SPST	
		Without Push Plate	With Push Plate
Electrical	Rating	10 $\mu$ A 2 Vdc to 20 mA 15 Vdc (Resistive load)	
	Contact Resistance	100 m $\Omega$ max.	
	Insulation Resistance	50 M $\Omega$ min.	
	Dielectric Withstanding Voltage	250 Vac for 1 minute	
	Bouncing	8 ms max. (ON, OFF)	
Mechanical	Operating Force	1.0 N, 1.6 N, 2.4 N, 3.5 N	
	Travel	0.2 mm	
Endurance	Operating Life	1.0 N, 1.6 N : 1000000 cycles min. 2.4 N : 500000 cycles min. 3.5 N : 200000 cycles min.	
Operating Temperature		-20 °C to +70 °C	
Storage Temperature		-40 °C to +85 °C (Bulk) -20 °C to +60 °C (Taping)	
Minimum Quantity/Packing Unit		10000 pcs. Embossed Taping (Reel Pack)	
Quantity/Carton		50000 pcs.	

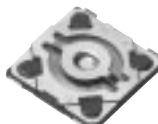
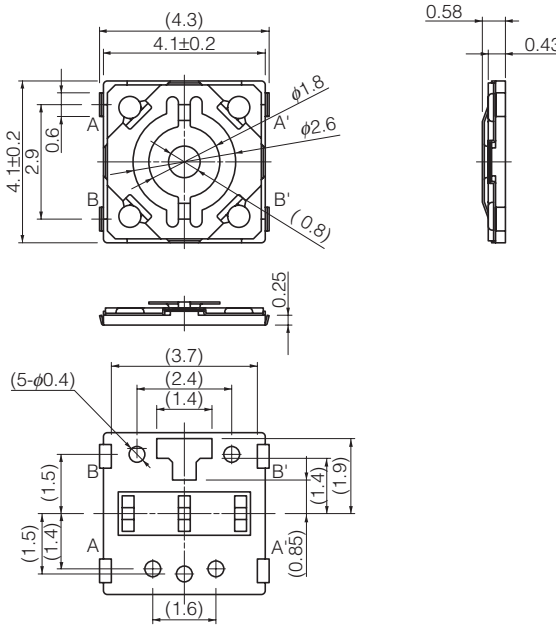
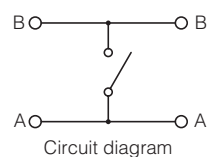
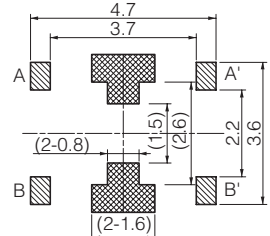


Note: Non washable

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Should a safety concern arise regarding this product, please be sure to contact us immediately.

Jul. 2008

### ■ Dimensions in mm (not to scale)

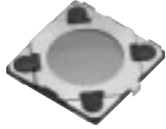
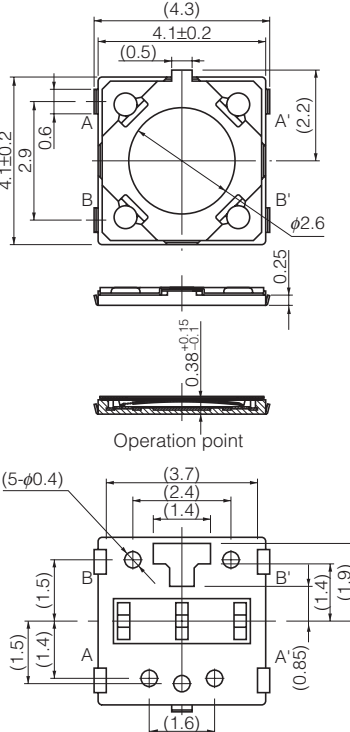
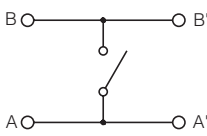
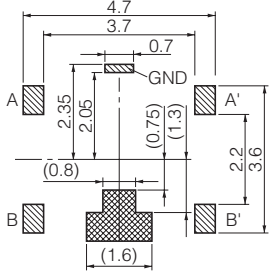


<div>No. 1</div> <div>EVQP6D EVQP6P EVQP6J</div> <div>(Embossed Taping)</div> <div>Surface mount For reflow soldering Without push plate</div> <div></div>	<div></div> <div>*Marking varies according to push force.</div>	<div></div> <div>Circuit diagram</div> <div></div> <div>PWB land pattern for reference Part of A-A' terminal is exposed at  area. Any land pattern or vias shall not be provided at  area.</div>	
Part Numbers	Operating Force	Height	Operating Life
EVQP6DB35	1.6 N	0.35 mm	1000000 cycles
EVQP6PB35	2.4 N	0.35 mm	500000 cycles
EVQP6JB35	3.5 N	0.35 mm	200000 cycles

<div>No. 2</div> <div>EVQP6L EVQP6Y EVQP6W</div> <div>(Embossed Taping)</div> <div>Surface mount For reflow soldering With push plate</div> <div></div>	<div></div> <div>*Marking varies according to push force.</div>	<div></div> <div>Circuit diagram</div> <div></div> <div>PWB land pattern for reference Part of A-A' terminal is exposed at  area. Any land pattern or vias shall not be provided at  area.</div>	
Part Numbers	Operating Force	Height	Operating Life
EVQP6LB55	1.6 N	0.58 mm	1000000 cycles
EVQP6YB55	2.4 N	0.58 mm	500000 cycles
EVQP6WB55	3.5 N	0.58 mm	200000 cycles

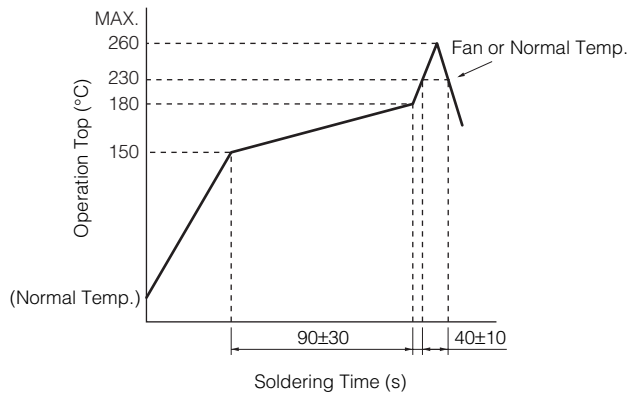
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Mar. 2008

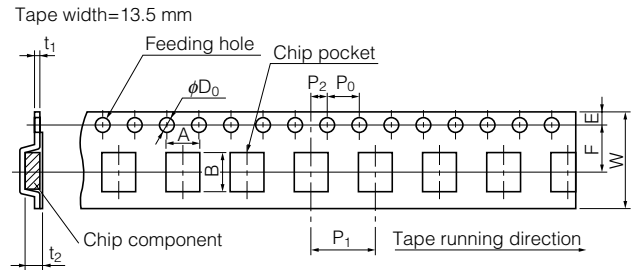
### ■ Dimensions in mm (not to scale)

<p>No. 3</p> <p>EVQ7P6 EVQ6P6 EVQ9P6</p> <p>(Embossed Taping)</p> <p>Surface mount For reflow soldering Without push plate With Ground Terminal</p> 	 <p>Operation point</p> <p>(5-φ0.4)</p> <p>(4.3) 4.1±0.2 (0.5) 4.1±0.2 0.6 2.9 A B A' B' φ2.6 0.25 0.38±0.15 0.43</p> <p>Circuit diagram</p>  <p>PWB land pattern for reference</p>  <p>Part of A-A' terminal is exposed at  area. Any land pattern or vias shall not be provided at  area.</p>		
Part Numbers	Operating Force	Height	Operating Life
EVQ7P6B40	1.0 N	0.43 mm	1000000 cycles
EVQ6P6B40	1.6 N	0.43 mm	1000000 cycles
EVQ9P6B40	2.4 N	0.43 mm	500000 cycles

### ■ Recommended Reflow Soldering Conditions



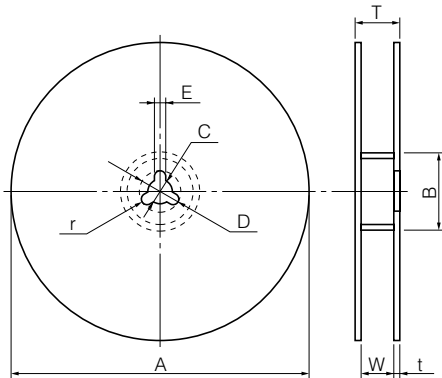
### ● Embossed Carrier Taping



Unit: mm

Part No.	Height	A	B	W	F	E	P <sub>1</sub>	P <sub>2</sub>	P <sub>0</sub>	D <sub>0</sub> Dia.	t <sub>1</sub>	t <sub>2</sub>
EVQP6	0.35/0.58	4.0±0.2	5.0±0.2	12.0 <sup>+0.3</sup> <sub>-0.1</sub>	5.5±0.1	1.75±0.10	8.0±0.1	2.0±0.1	4.0±0.1	1.5 <sup>+0.1</sup> <sub>-0</sub>	0.30±0.05	0.5/0.7 <sup>+0.2</sup> <sub>-0.1</sub>
EVQ6P6	0.43											
EVQ7P6												
EVQ9P6												

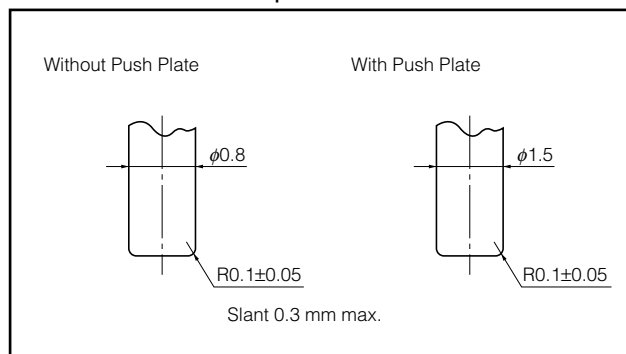
### ● Standard Reel Dimensions in mm (not to scale)



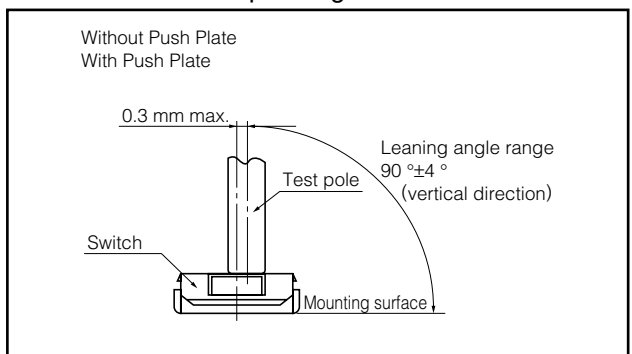
Item	A	B	C	D	E
Rate (mm)	φ380.0±2.0	φ80.0 min.	φ13.0±0.5	φ21.0±1.0	2.0±0.5

Item	W	T	t	r
Rate (mm)	13.5±1.5	17.5±1.0	1.0 to 3.0	1.0±0.5

### ■ Recommended Shape of Test Pole



### ■ Recommended Operating Conditions



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