

- 规格书 -

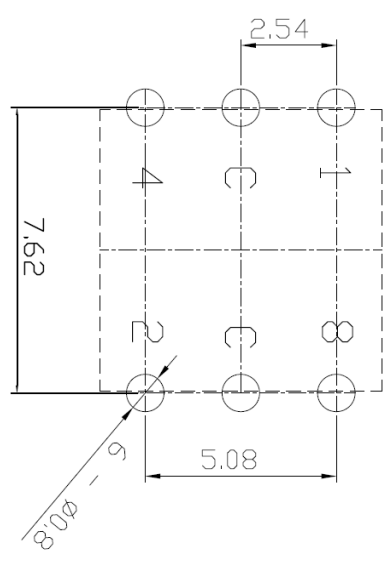
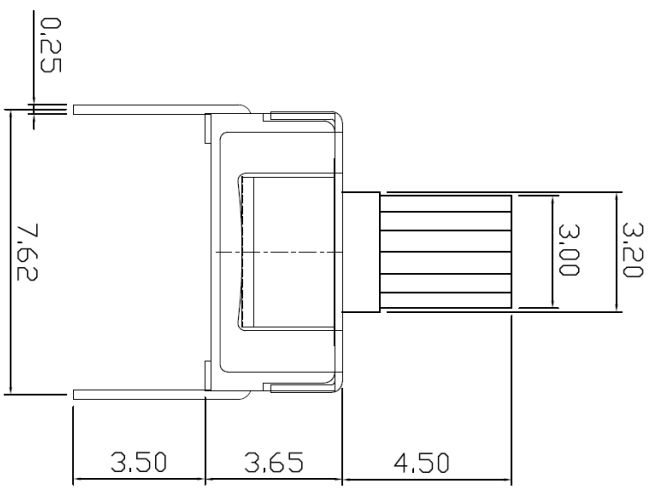
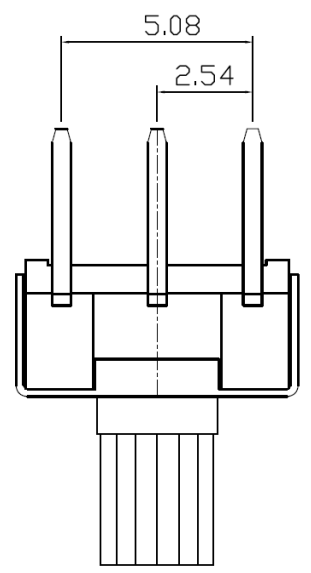
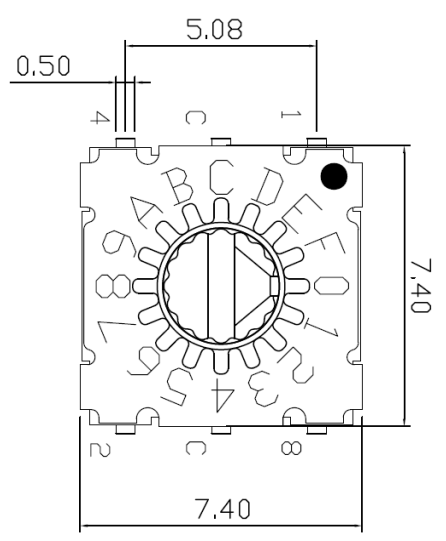
产品型号: SKCR-16

产品名称: 旋转编码开关

SM SWITCH CO.,LTD

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MARK	DATE	REMARKS
Δ		
Δ		



P.C.B. DIMENSION

Real Coded	
	0 1 2 4 8
0	● ● ● ● ●
1	● ● ● ● ●
2	● ● ● ● ●
3	● ● ● ● ●
4	● ● ● ● ●
5	● ● ● ● ●
6	● ● ● ● ●
7	● ● ● ● ●
8	● ● ● ● ●
9	● ● ● ● ●
A	● ● ● ● ●
B	● ● ● ● ●
C	● ● ● ● ●
D	● ● ● ● ●
E	● ● ● ● ●
F	● ● ● ● ●
10	● ● ● ● ●
11	● ● ● ● ●
12	● ● ● ● ●
13	● ● ● ● ●
14	● ● ● ● ●
15	● ● ● ● ●
16	● ● ● ● ●

NO.	DESCRIPTION	Q'TY	MAT'L	SPEC'	FINISH	REMARKS
3ANG	UNIT M/M	SCL.	ROTARY DIP SWITCH			
APPL. YD WANG	CHKD. J.S KIM	D'SGDD H.S LEE	TITLE SKCR-16	DRAWG. No. 1/2	REV 7	
SM SWITCH CO., LTD.						



MINI ROTARY DIP SWITCH SPECIFICATION

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1. Style:

This specification describes "Rotary Switch" mainly used as signal switch of electric devices with the general requirements of mechanical and electrical characteristics.

1.1 Operating / Storage Temperature Range : -40°C ~ +85°C

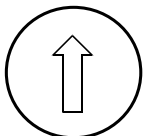
2. Current Range:

2.1 None-Switching : 400 mA, 42V

2.2 Switching : 150 mA, 42V

3. Type of Actuation : Rotating

4. Test Sequence :

ELECTRICAL PERFORMANCE	ITEM	DESCRIPTION	TEST CONDITIONS	REQUIREMENTS
	1	Visual Examination	By visual examination check without any out pressure & testing.	There shall be no defects that affect the serviceability of the product
	2	Contact Resistance	① To be measured between the two terminals associated with each switch pole ② Measurements shall be made with a 1kHz shall current contact resistance meter	80mΩ max.(initial)
	3	Insulation Resistance	250V DC, 1minute ±5seconds	100MΩ min
	4	Dielectric withstanding Volotage	250V AC(50Hz or 60Hz)shall be applied between all the adjacent terminal and between the terminal and the frame For 1 minute	There shall be no breakdown or flashover
5	Operation Force	Applied in the direction of operation 	120gf ±30gf	



MINI ROTARY DIP SWITCH SPECIFICATION

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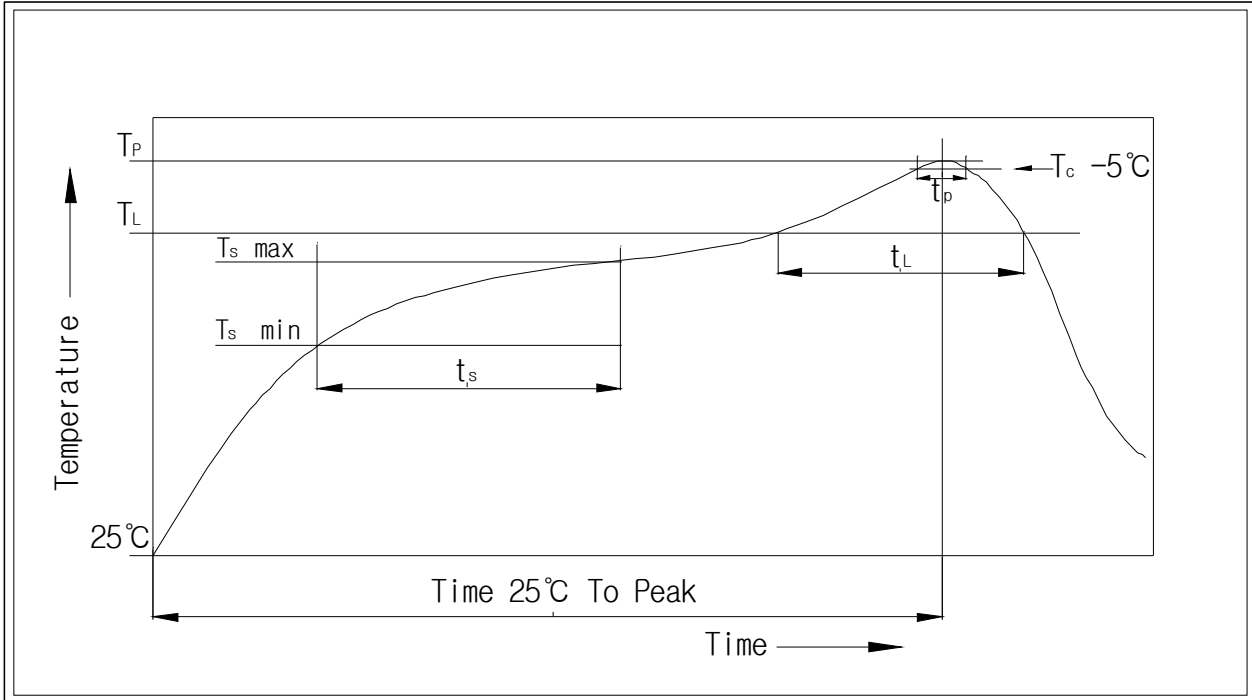
M A C H I N P E R F O R M A N C E	6	Operation Life	<p>Measurements shall be made following the test set forth below:</p> <p>1)100mA, 42V DC resistive load 2)Rate of operation: 15~20 cycles/ minute 3)Step of operation: 25,000 steps</p>	<p>1)As shown in item 3,4 2)Contact Resistance: 200mΩ max 3)Final-after test</p>
	7	Resistance Low Temperature	<p>Following the test set forth below the sample shall be left in normal temperature and humidity conditions for an hour before measurements are made:</p> <p>1)Temperature: -60℃ ±3℃ 2)Time: 96 hours</p>	As shown in item 2~5
	8	Resistance High Temperature	<p>Following the test set forth below the sample shall be left in normal temperature and humidity conditions for an hour before measurements are made:</p> <p>1)Temperature: 125℃ ±2℃ 2)Time: 96 hours</p>	<p>1)As shown in item 3~5 2)Contact Resistance: 200mΩ max</p>
	9	Resistance Humidity	<p>Following the test set forth below the sample shall be left in normal temperature and humidity conditions for an hour before measurements are made:</p> <p>1)Temperature: 40℃ ±2℃ 2)Relative humidity: 90~95% 3)Time: 96 hours</p>	<p>1)As shown in item 4 2)Contact Resistance: 200mΩ max 3)Insulation Resistance: 10MΩ min</p>
	10	Solder Condition	<p>1. Iron Soldering 3s / 350℃ 2. Wave Soldering 5s / 280℃ 3. Reflow Soldering 10s / 260℃</p>	



MINI ROTARY DIP SWITCH SPECIFICATION

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5. Reflow Soldering Conditions:



1) Classification Reflow Profiles

Profile Feature	Pb-Free Assembly
Average Ramp-UP Rate(Ts max to Tp)	3°C/second max
Preheat - Temperature Min(Ts min) - Temperature Max(Ts max) - Time (ts min to ts max)	150°C 200°C 60-180seconds
Time maintained above: - Temperature (TL) - Time (tL)	217°C 60-150seconds
Peak/Classification Temperature(Tp)	260°C +0°C/ -5°C
Time within 5°C of actual Peak Temperature(Tp)	min 30 seconds
Ramp-Down Rate	6°C/sec max
Time 25°C to Peak Temperature	8 minutes max

6. This item is "ROHS" Compliant



MINI ROTARY DIP SWITCH SPECIFICATION

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7. Part List

NO	Part Name	Q'ty	Materials	Treatment	Remark
1	Cover	1	Stainless Steel		Laser
2	Spring Plate	1	Stainless Steel		
3	Guide Plate	1	Stainless Steel		
4	Contact	1	Phosphor Bronze	Plating: Gold	Au 0.03 μ m Min Ni 0.1 μ m Min
5	Terminal	1	Phosphor Bronze	Plating: Gold	Au 0.03 μ m Min Ni 0.3 μ m Min
6	Rotor	1	LCP		
7	Base	1	LCP		
8	O-Ring	1	Silicone		