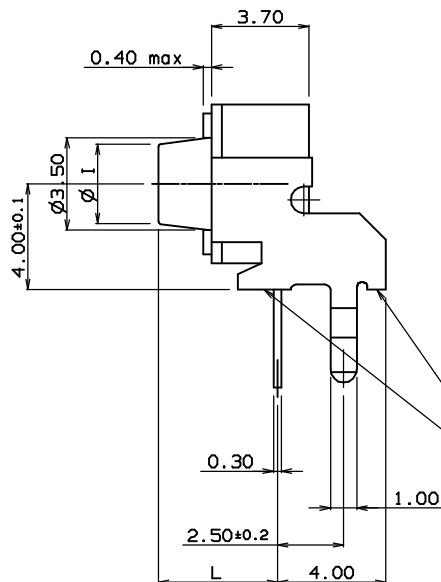
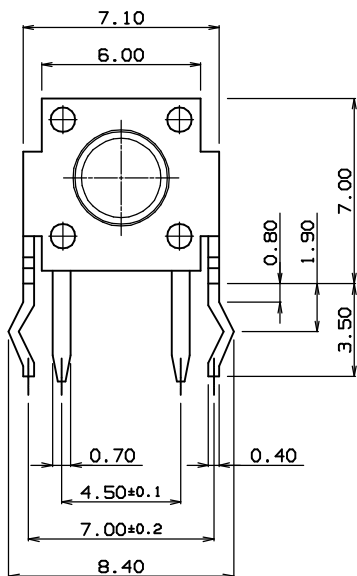
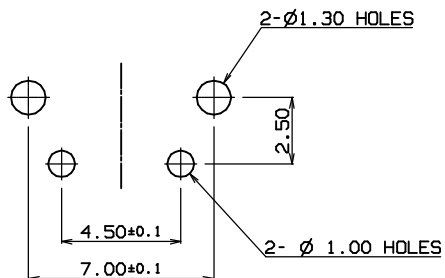


NOTE

1. TRAVEL : $0.25 +0.2/-0.1$ mm
2. CONTACT RESISTANCE : $50\text{m}\Omega$ Max
3. GENERAL TOLERANCE : ± 0.3
4. MANUFACTURING SPECIFICATION WOULD BE ACCORDANCE WITH JT0102LF



P.C.B MOUNTING FACE

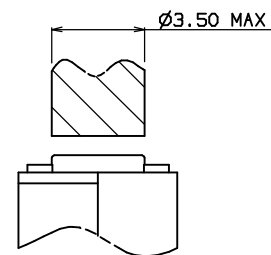


P.C.B MOUNTING HOLE DIMENSION

CIRCUIT DIAGRAM



MODEL	CODE No	L	I	STEM COLOR	O/FORCE
1136	12063000	3.15	3.50	BLACK	160±50gf
1136A	12064000	3.85	3.50		
1136B	12065000	8.35	3.10		
1136C	12066000	6.85	3.20		
1136D	12067000	11.85	2.87		
1136E	12068000	6.15	3.25		
1136F	12069000	5.85	3.30		
1136P	12080000	7.35	3.09	BROWN	100±30gf
1136L	12079000	15.85	2.80		
1136H	12070000	3.15	3.50		
1136HA	12071000	3.85	3.50		
1136HB	12072000	8.35	3.10		
1136HC	12073000	6.85	3.20		
1136HD	12074000	11.85	2.87		
1136HE	12075000	6.15	3.25		
1136HF	12076000	5.85	3.30	NATURAL	260±50gf
1136HP	12078000	7.35	3.09		
1136HL	12077000	15.85	2.80		
1136W	12081000	3.15	3.50		
1136WA	12082000	3.85	3.50		
1136WB	12083000	8.35	3.10		
1136WC	12084000	6.85	3.20		
1136WD	12085000	11.85	2.87		
1136WE	12086000	6.15	3.25		
1136WF	12087000	5.85	3.30		
1136WP	12089000	7.35	3.09		
1136WL	12088000	15.85	2.80		



SET MAKER KNOB SIZE (L:3.15mm ONLY)

No.	PART NAME	Q'TY	MATERIAL	UNIT	SCALE	MODEL	TREAT.	REMARKS
5				3RD ANGLE PROJECTION	SCALE 5	JTP 1136 SERIES		
4				APPROVED	DESIGNED	DWG. NAME		
3				CHECKED		ASS'Y DIAGRAM		
2						DWG. NO.		
1						CODE NO		
NO.	DATE	NOTE	SIGN					

	SPECIFICATION	PAGE
	TACT SWITCH	1 / 4

1. GENERAL

1.1 Application : This specification is applied to low current circuit tactile switch for electronic equipment.

1.2 Operating temperature range : - 20 ~ 70℃, 45 ~ 85% RH

1.3 Storage temperature range : - 30 ~ 80℃. However, 96 hours maximum for continuous storage over a range - 20 ~ - 30℃ and a range 70 ~ 80℃.




1.4 Test conditions : The standard test conditions shall be 5 ~ 35℃ in temperature, 45 ~ 85% RH and 860 ~ 1060mbar in atmospheric pressure.
Should any doubt arise in judgement, tests shall be conducted at 20±2℃, 65±5% RH and 860 ~ 1060mbar.

2. RATED VOLTAGE AND CURRENT.

DC 12V 50mA

3. ELECTRICAL PERFORMANCE

	PROPERTY	TEST CONDITIONS	PERFORMANCE
3.1	Contact arrangement		* 1 pole, 1 throw.
3.2	Contact resistance	Measured at DC 5V 100mA or by ohmmeter allowing a small current at 1kHz with a load of twice of the Actuating force.	* less than 50mΩ.
3.3	Insulation resistance	DC 100V is applied between terminals and between terminals and cover for 1minute ±5seconds.	* greater than 100MΩ.
3.4	Dielectric strength	AC 250V (50 ~ 60Hz) is applied between terminals and between terminals and cover for 1 minute.	* No insulation defect shall be observed.
3.5	Bounce	Measured by lightly striking the center of the button stem at a rate of 3 operations/sec...	* less than 5 msec.

						APPD	CHKD	DSGN	TITLE
									
ZONE	SYMB	DATE	APPD	CHKD	DSGD				DOCUMENT NO. JT 0102LF




	SPECIFICATION	PAGE
	TACT SWITCH	2 / 4

4. MECHANICAL PERFORMANCE

	PROPERTY	TEST CONDITIONS	PERFORMANCE
4.1	Actuating force	A gradually increasing load is applied to the center of the button stem.	* As per individual manufactured drawing.
4.2	Return force	After actuating, the load is gradually decreased until the stem returns to its free position.	* 160gf, 260gf : greater than 40gf. * 100gf, 130gf : greater than 30gf.
4.3	Stop strength	A static force of 3Kgf shall be applied to the direction of operation for 3 seconds.	* Shall be free from mechanical and electrical abnormalities.
4.4	Stem withdrawal force	A static load of 500gf is applied to the direction of pulling for 3 seconds.	* Shall be free from mechanical and electrical degradation.
4.5	Travel		* 0.25 ^{+0.2} _{-0.1} mm
4.6	Arrangement of action		* Tactile feed- back.
4.7	Solderability	Test sample switch under the following conditions. 1) Solder bath temperature $240 \pm 5^{\circ}\text{C}$ 2) Dipping time 3 ± 0.5 sec.	*95% or more of immersion area shall be covered with new solder.

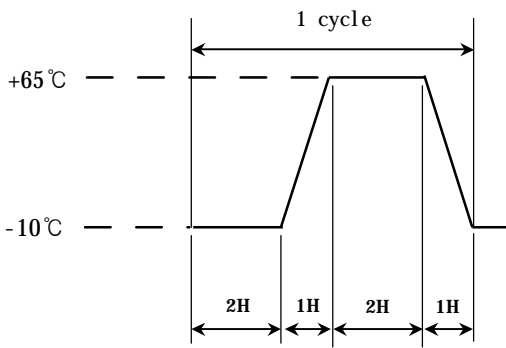
5. DURABILITY




	PROPERTY	TEST CONDITIONS	PERFORMANCE
5.1	Operating life	100,000cycles operation with a load of 150% of Actuating force at a rate of 2cycles/sec. With a resistive load supplying DC 12V 50mA.	* Contact resistance : $200\text{m}\Omega$ max. * Bounce : 20msec max. * Actuating force : within $\pm 30\%$ of the initial value.

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									DOCUMENT NO.
ZONE	SYMB	DATE	APPD	CHKD	DSGD				JT 0102LF

	SPECIFICATION	PAGE
	TACT SWITCH	3 / 4

6. WEATHER PROOF

	PROPERTY	TEST CONDITIONS	PERFORMANCE
6.1	Cold heat proof	After testing at - 30℃ for 96hours, the sample is allowed to stand under normal temperature and humidity conditions for 1hour and measurement is performed within 1hour after that. Water drops should be wiped off.	* The requirement in item 3 and 4 shall be satisfied.
6.2	Dry heat proof	After testing at 85℃ for 96hours, the sample is allowed to stand under normal temperature for 1hour and measurement is performed within 1hour after that.	
6.3	Damp heat proof	After test at 60±2℃ and 90 ~ 95% in relative humidity for 96hours, the sample is allowed to stand under normal temperature and humidity conditions for 1hour, and measurement is performed within 1hour after that. Water drops should be wiped off.	* Insulation resistance : 10MΩ minimum. * Dielectric strength : same as item 3.4. * Contact resistance : same as item 3.2.
6.4	Thermal cycling	 <p>; After the test conducted under 5 cycles the sample is allowed to stand under normal temperature and humidity conditions for 1hour, and the measurement is performed within 1hour.</p>	* The requirement in item 3 and 4 shall be met.

						APPD	CHKD	DSGN	TITLE
									
ZONE	SYMB	DATE	APPD	CHKD	DSGD				DOCUMENT NO. JT 0102LF

	SPECIFICATION	PAGE
	TACT SWITCH	4 / 4

7. SOLDERING CONDITIONS

7.1 Manual soldering

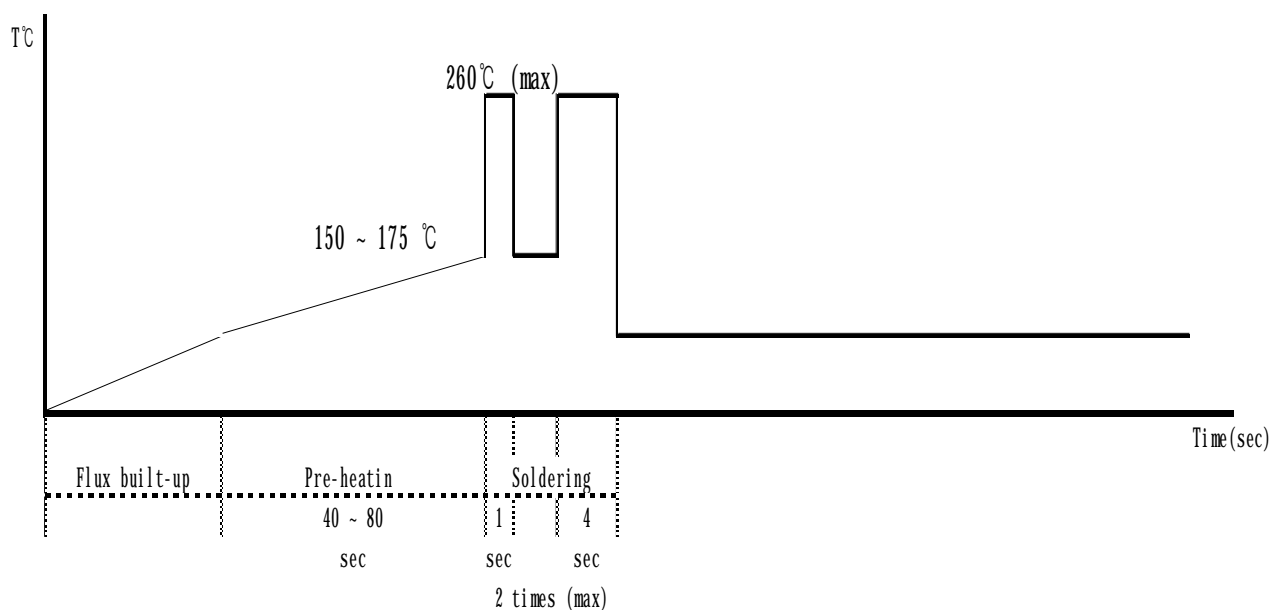
7.1.1 Soldering temperature : less than 400℃.

7.1.2 Soldering time : Within 4 seconds

8. AUTOMATIC SOLDERING CONDITIONS

(In case the automatic flow soldering is to be used)

- 1) Preheat ----- 150℃ ~ 175℃, 40 ~ 80 (sec)
- 2) Peak temperature ----- 260℃ max.
- 3) Soldering area temperature ----- 260℃, 1 ~ 4 (sec), 2 times max.



< Temperature profile >

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ZONE	SYMB	DATE	APPD	CHKD	DSGD				DOCUMENT NO. JT 0102LF