

4.5 x 4.5mm Compact Tactile Switch

Features

Optimized Mechanical Features

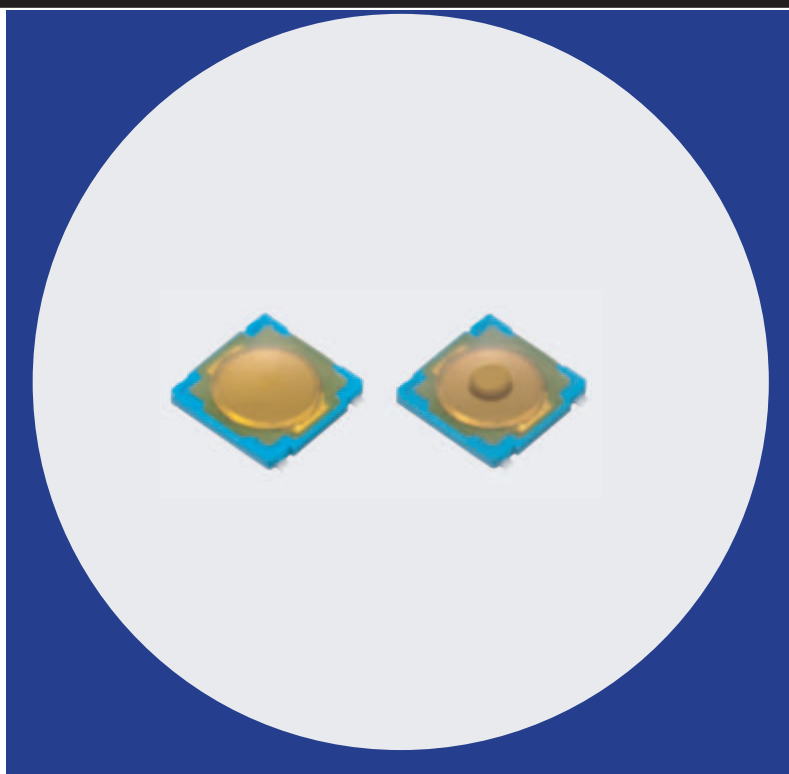
- Surface mount gull-wing terminal configuration
- Compatible with IR reflow and manual soldering
- Variety of operating force & actuator height options

Optimized Contact System

- Excellent tactile feedback

Materials

- Silver coated terminals for better solderability
- High temperature materials (UL94V-0)
- RoHS compliant



Electrical and Mechanical Specifications

Switch Contact Resistance

100 milliohms maximum

Insulation Resistance

100 Megohms minimum between terminals

Maximum Rating

50mA, 12 VDC

Dielectric Strength

250 VAC for 1 minute between adjacent terminals

Operating Force

100, 160 gf or 260 gf

Travel

0.2 $^{+0.15}_{-0.1}$ mm

Operating Temperature

- 40°C to +85°C

Storage Temperature

- 40°C to +85°C

Actuator Strength

3 Kgf maximum

Actuation Life

100 gf: 1,000,000 cycles (flat surface), 500,000 cycles (button)
160 gf: 1,000,000 cycles (flat surface), 500,000 cycles (button)
260 gf: 200,000 cycles

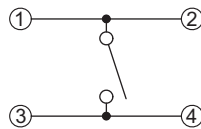
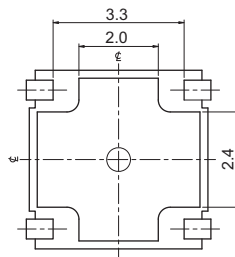
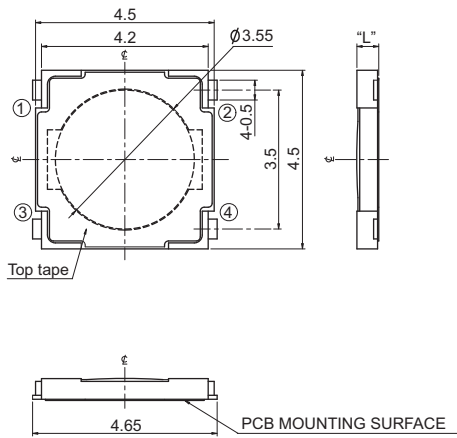
Allowable Solder Time

IR Reflow: Up to 5 seconds at 260°C.
Manual soldering: Up to 3 seconds at 350°C

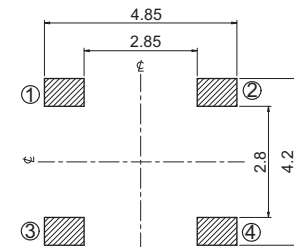
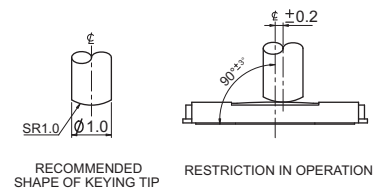
Packaging

Standard : Tape and reel packaging with
330mm diameter reel and 12mm wide plastic tape

CTS SERIES 223BM1VA... - Surface Mount Gull Wing Type 1, Flat Surface



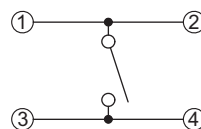
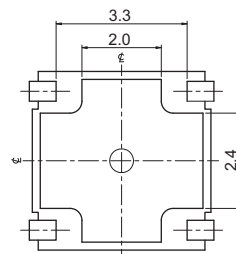
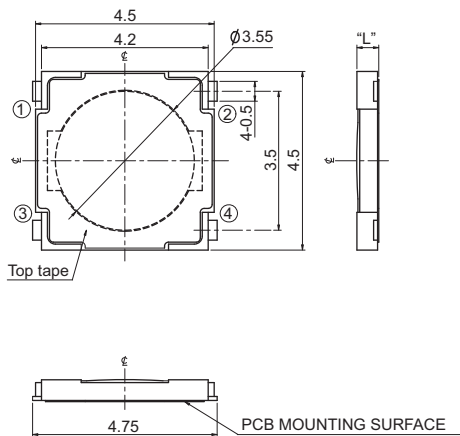
CIRCUIT DIAGRAM



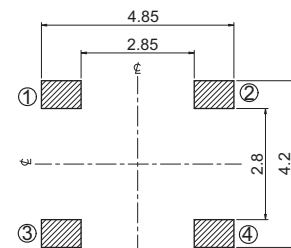
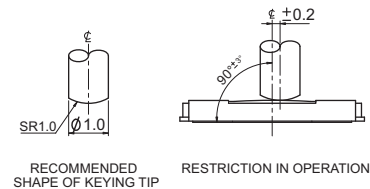
PCB LAYOUT

DIMENSION : mm
STANDARD TOLERANCE :
X (1 PLACE) : ± 0.30

CTS SERIES 223BM2VA... - Surface Mount Gull Wing Type 2, Flat Surface



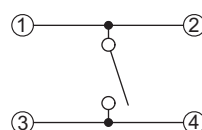
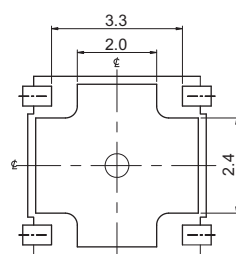
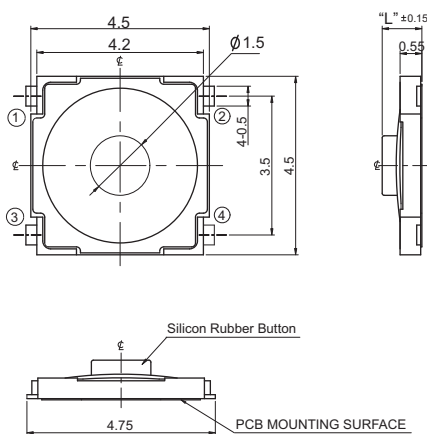
CIRCUIT DIAGRAM



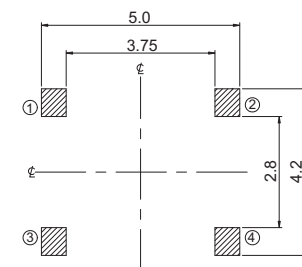
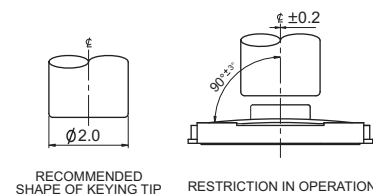
PCB LAYOUT

DIMENSION : mm
STANDARD TOLERANCE :
X (1 PLACE) : ± 0.30

CTS SERIES 223BM2VB... - Surface Mount Gull Wing Type 2, With Button



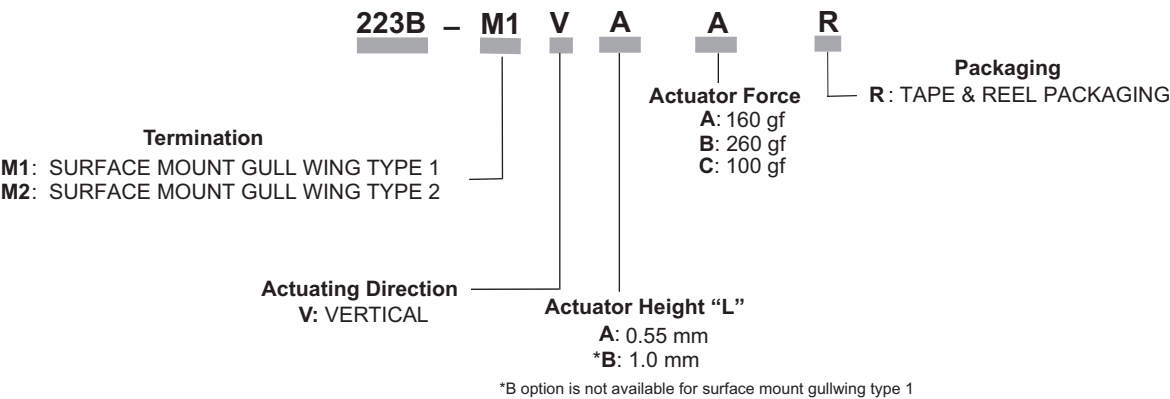
CIRCUIT DIAGRAM



PCB LAYOUT

DIMENSION : mm
STANDARD TOLERANCE :
X (1 PLACE) : ± 0.30

Ordering Information



Note:
Consult CTS for other common features not listed.