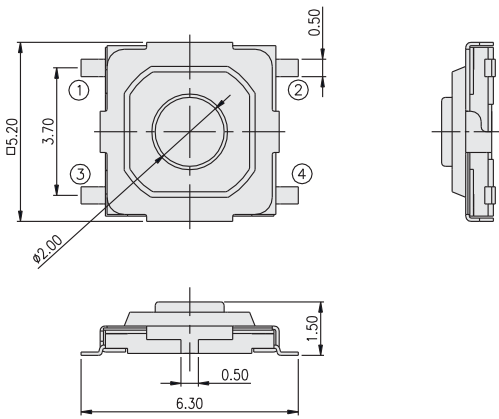


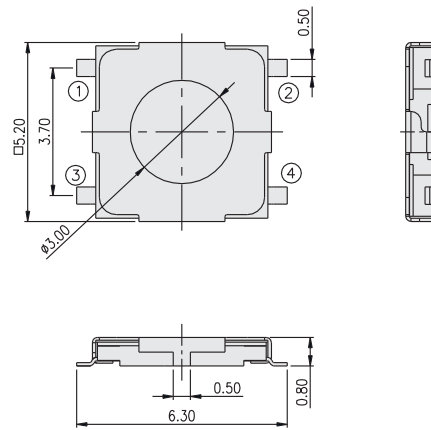
# Tactile Switches

## 5x5mm SMT Halogen-free Tactile Switches

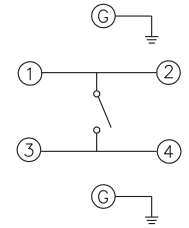
## TP89 Series



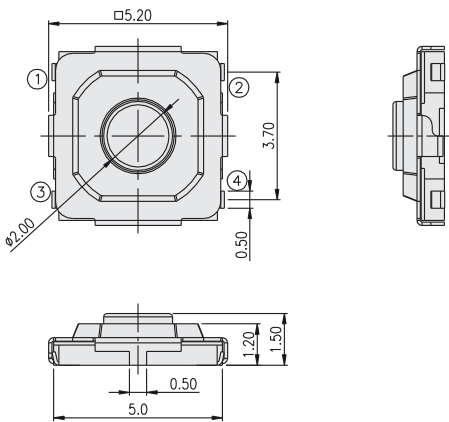
TP89SCN3



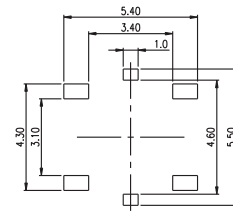
TP89SCN2



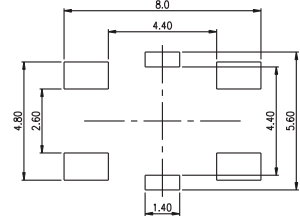
Circuit



TP89JCN3



PCB-Layout J-SMT



PCB-Layout Gull Wing SMT

### How to order:

TP89 1 2 3 4 5 6 7

- |   |  |
|---|--|
| <p><b>1 TYPE OF TERMINALS:</b><br/> <b>S</b> Gull Wing SMT Terminals<br/> <b>J</b> J Bend SMT Terminals</p> <p><b>2 GROUND TERMINALS:</b><br/> <b>C</b> With Ground Pin in Central</p> <p><b>3 MATERIAL OF COVER:</b><br/> <b>N</b> Nickel Silver (Standard)<br/> <b>S</b> Stainless Steel</p> <p><b>4 TOTAL HEIGHT:</b><br/> <b>2</b> 0.8 mm (no Stem)<br/> <b>3</b> 1.5 mm (Metal &amp; Plastic Stem)<br/> <b>4</b> 2.0 mm (Plastic Stem)<br/> <b>5</b> 3.1 mm (Plastic Stem)</p> | <p><b>5 OPERATING FORCE:</b><br/> <b>N</b> 70gf ± 50gf (only for stem type)<br/> <b>L</b> 100gf ± 50gf<br/> <b>S</b> 160gf ± 50gf<br/> <b>H</b> 260gf ± 50gf</p> <p><b>6 STEM COLOR:</b><br/> <b>blank</b> Metal<br/> <b>A</b> Black<br/> <b>B</b> White</p> <p><b>7 PACKAGING:</b><br/> <b>TR</b> Tape and Reel</p> |
|---|--|

### General Specifications:

#### MATERIALS

- » Halogen-free materials
- » Cover: Nickel Silver or stainless steel
- » Contact Disc: Stainless steel with silver cladding
- » Terminal: Brass with silver plated
- » Base: LCP High-temp Thermoplastic black
- » Plastic Stem: LCP High-temp Thermoplastic black
- » Tape: Teflon

#### MECHANICAL

- » Stroke: 0.25<sup>+0.1mm</sup>/<sub>0.2mm</sub>
- » Stop Strength: Max.3kgf vertical static load continuously for 15 seconds
- » Operation Temperature Range: -25°C to +70°C
- » Storage Temperature Range: -30°C to +80°C

#### ELECTRICAL

- » Electrical Life: 1,000,000 cycles min. for 70gf, 100gf & 160gf  
 200,000 cycles min. for 260gf
- » Rating: 50 mA, 12 VDC
- » Contact Resistance: 100mΩ max.
- » Insulation Resistance: 100mΩ min.at 500VDC
- » Dielectric Strength: 250VAC/ 1 minute
- » Contact Arrangement: 1 pole 1 throw

All specifications are restricted to QA test criteria.  
 DRW: D. L. JIN, CHK: D.F. LEE, APP: H.Z. QIU, DC: 2021-09-11, UPD: 2025-04-07.

General Tolerance: +/-0.2mm