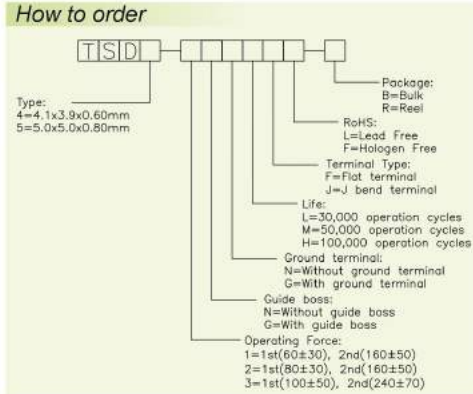
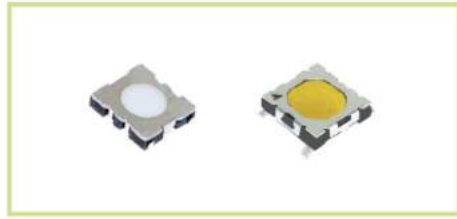


Multi-Function Switch



TSD Series

4.1×3.9 / 5.0×5.0 Double Action Type Multi-Function Switch

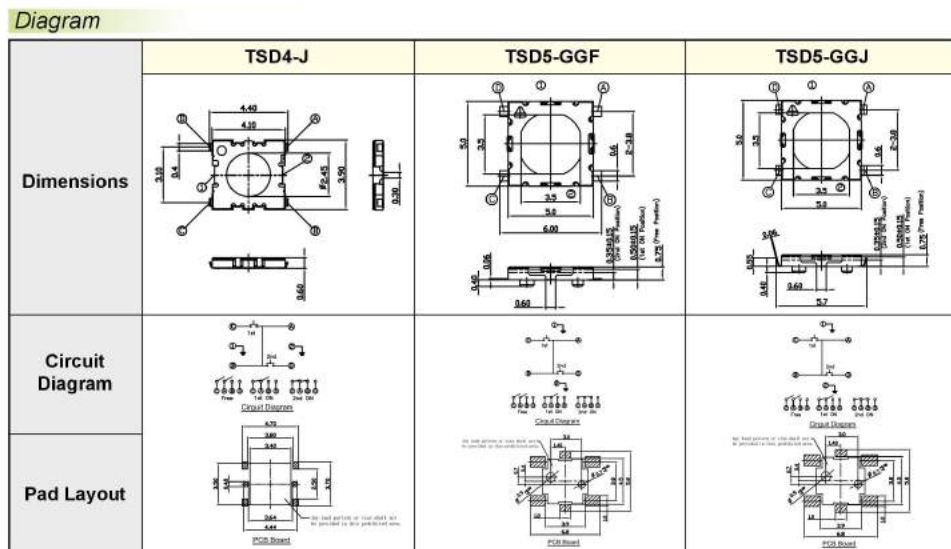


- Features**
- These surface-mounting type keyboard switches are ideal for high density mounting.
 - A single-pole-double-throw type offers a double action, turning on the first contact with the first push and the second step by pushing again.
 - Reflow solderable.
 - Packaged with a 12mm wide embossed taping.

- Applications**
- Operating switches in all types of electronic equipment such as audio apparatus, office equipment, communications apparatus, measuring instruments, TV sets, VCRs, etc.

Specification

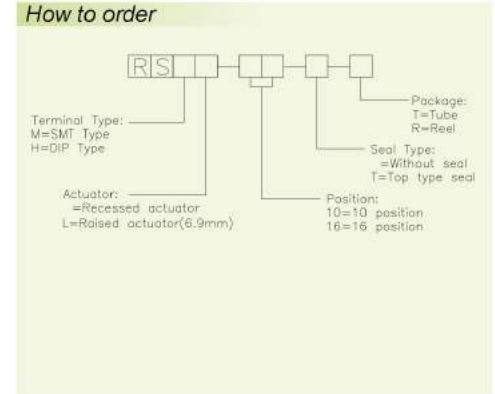
Items	Standard (TSD4)	Standard (TSD5)
Operating Temperature Range	-20°C to +70°C	-20°C to +70°C
Electrical performance	Rating	50mA 12V DC
	Insulation Resistance	100MΩ Min. 100V DC
	Dielectric Strength	250V AC for 1 min (50Hz or 60Hz)
	Contact Resistance	1st: 200 mΩ Max. ; 2nd: 200 mΩ Max.
Durability	Operating Life	30,000 cycles, 50,000 cycles, 100,000 Cycles
Mechanical performance	Operating Force	1: 1st 80±30gf, 2nd 160±50gf ; 2: 1st 80±30gf, 2nd 160±50gf
	Travel	1st: 0.15±0.1mm, 2nd 0.25±0.15mm ; 1st: 0.25±0.10mm, 2nd 0.40±0.15mm



* Please follow drawing of Approved Sheet that catalog drawing only for reference.

RSM Series

10.0×10.0 Rotary Type

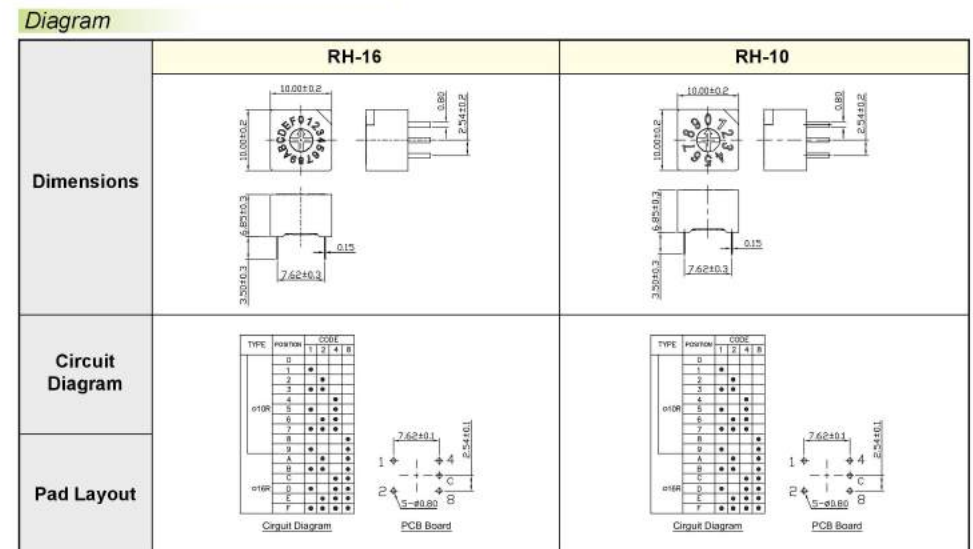


- Features**
- Reliable contact and long-term stability.
 - Binary decimal (8 or 10 positions), real and complementary codes available.
 - Pin-out is compatible with most of current equivalents.
 - Gold plated contact to ensure low contact resistance.

- Applications**
- Audio devices, cameras, MP3 / MP4

Specification

Items	Standard	
Environmental	Operating Temperature Range	-20°C to +70°C
	Storage Temperature Range	-40°C to +85°C
Electrical performance	Electrical Life	2,000 Steps
	Non-Switching Rating	100mA ,50VDC
	Switching Rating	25mA ,24VDC
Mechanical performance	Operating Force	500gf Max.



* Please follow drawing of Approved Sheet that catalog drawing only for reference.

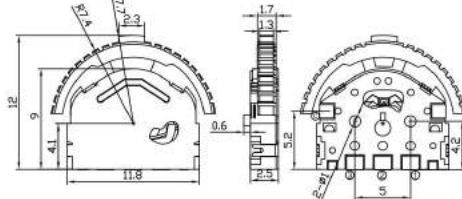


LS3A

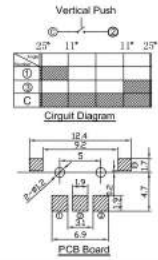


- Rating:10mA, 5V DC
- Lever portion:80±30gf
- Push portion:180±50gf

Dimensions



Circuit Diagram / Pad Layout

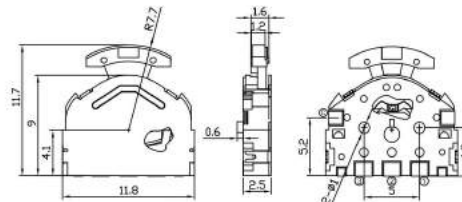


LS3B

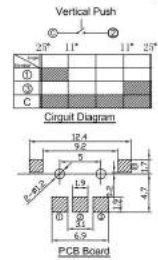


- Rating:10mA, 5V DC
- Lever portion:80±30gf
- Push portion:180±50gf

Dimensions



Circuit Diagram / Pad Layout

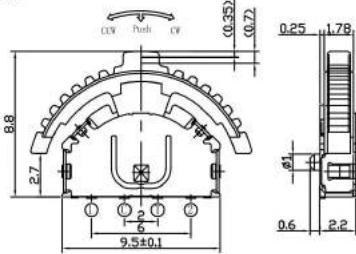


LS3C

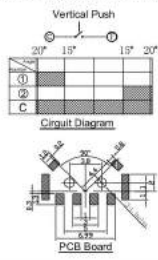


- Rating:10mA, 5V DC
- Lever portion:65±30gf
- Push portion:200±50gf

Dimensions



Circuit Diagram / Pad Layout

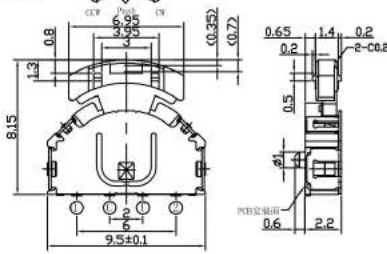


LS3D

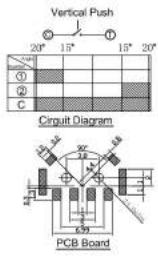


- Rating:10mA, 5V DC
- Lever portion:65±30gf
- Push portion:200±50gf

Dimensions



Circuit Diagram / Pad Layout

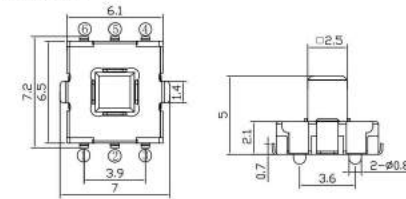


TS5A

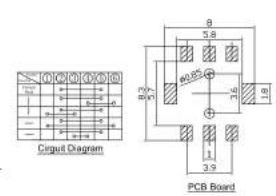


- Rating:50mA, 12V DC
- 4 direction:150±80gf
- Center push:280±100gf

Dimensions



Circuit Diagram / Pad Layout

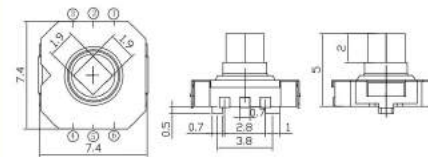


TS5B

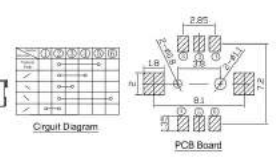


- Rating:50mA, 12V DC
- 4 direction:125±70gf
- Center push:240±70gf

Dimensions



Circuit Diagram / Pad Layout

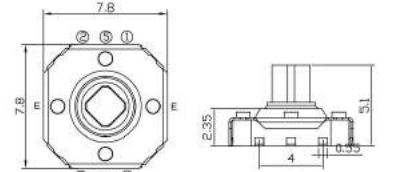


TS5C

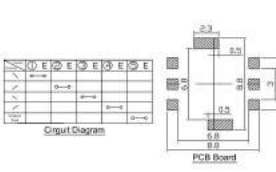


- Rating:20mA, 12V DC
- 4 direction:125±70gf
- Center push:240±70gf

Dimensions



Circuit Diagram / Pad Layout

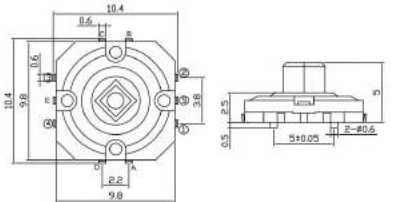


TS5D

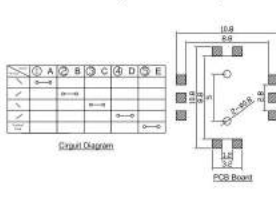


- Rating:20mA, 12V DC
- 4 direction:125±70gf
- Center push:240±70gf

Dimensions



Circuit Diagram / Pad Layout

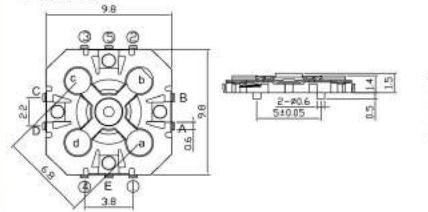


TS5E

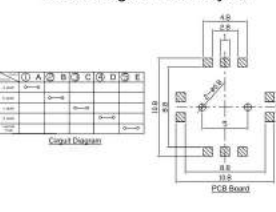


- Rating:20mA, 12V DC
- 4 direction:125±70gf
- Center push:240±70gf

Dimensions



Circuit Diagram / Pad Layout



HSP Series

Lock/Unlock DC Push Switch



PS Series

Lock/Unlock DC Side Push Switch

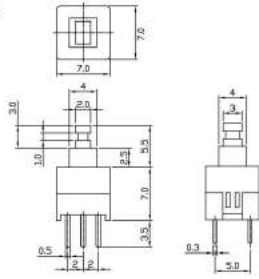


HSP2261

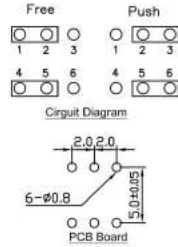


- Rating: 200mA, 30V DC
- Operating Force: 190 ± 70gf

Dimensions



Circuit Diagram / Pad Layout

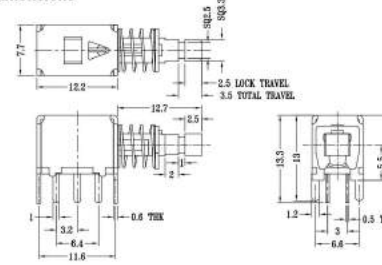


PS-22F02

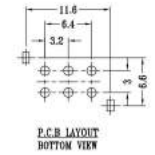


- Rating: 2mA, 12V DC
- Operating Force: 400 ± 150gf

Dimensions



Circuit Diagram / Pad Layout

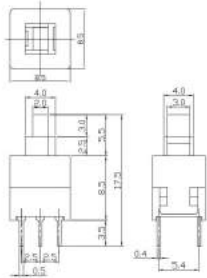


HSP2262

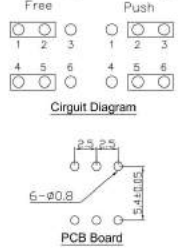


- Rating: 200mA, 30V DC
- Operating Force: 170 ± 50gf

Dimensions



Circuit Diagram / Pad Layout

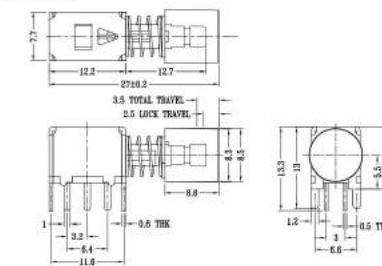


PS-22F02A

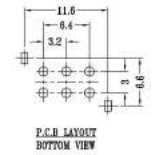


- Rating: 2mA, 12V DC
- Operating Force: 400 ± 150gf

Dimensions



Circuit Diagram / Pad Layout

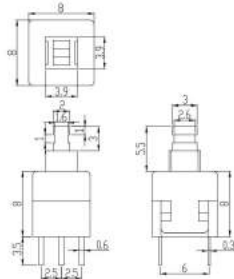


HSP2263

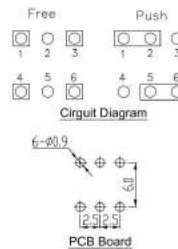


- Rating: 200mA, 30V DC
- Operating Force: 160 ± 80gf

Dimensions



Circuit Diagram / Pad Layout

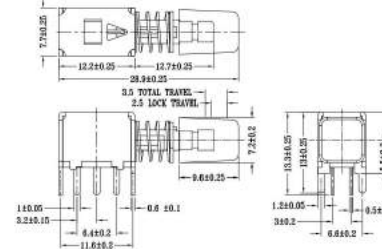


PS-22F02B

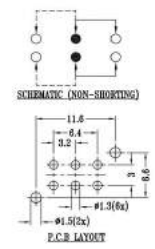


- Rating: 2mA, 12V DC
- Operating Force: 400 ± 150gf

Dimensions



Circuit Diagram / Pad Layout

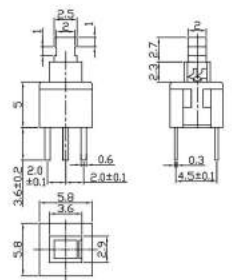


HSP2266

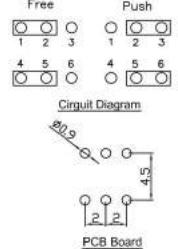


- Rating: 200mA, 30V DC
- Operating Force: 150 ± 80gf

Dimensions



Circuit Diagram / Pad Layout



Push Switch

Push Switch

TSMD Series

6.2×6.2 Mouse Key switch

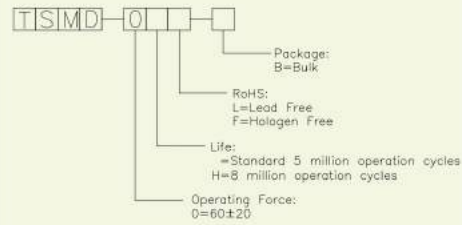


MS Series

9.4×4.5 / 8.6×4.8 Mouse Key Switch



How to order



Features

- Minitype size, small contact gap, quick action, high sensitivity and small operating travel.
- Long life (many times operating cycles), high reliability

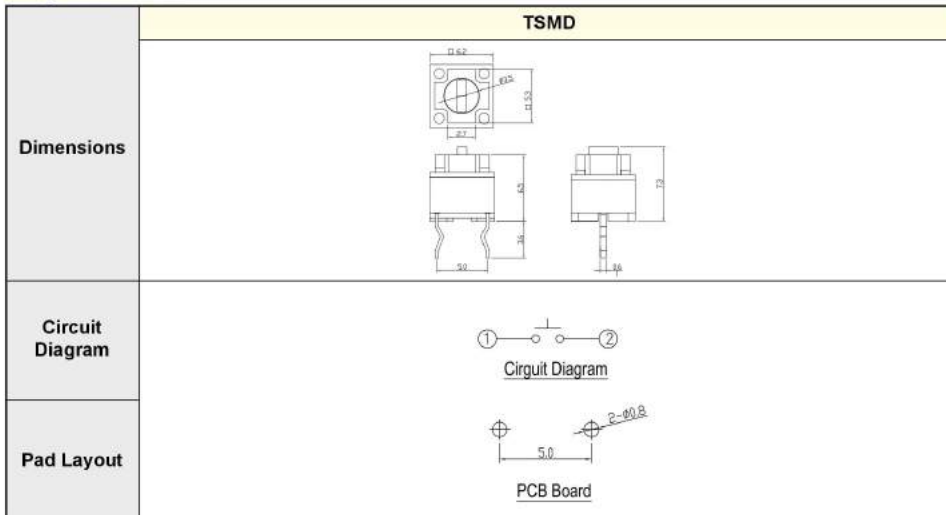
Applications

- Widely used in all kind mouse.

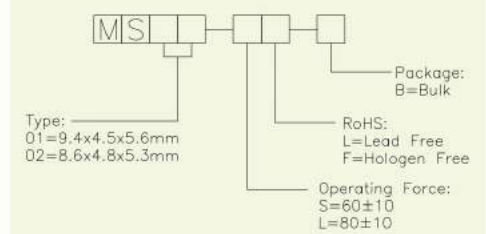
Specification

Items		Standard
Operating Temperature Range		-20°C to +70°C
Electrical performance	Rating	50mA 12V DC
	Insulation Resistance	100MΩ Min. 100V DC
	Dielectric Strength	250V AC for 1 min (50Hz or 60Hz)
	Contact Resistance	100 mΩ Max.
Durability	Operating Life	5,000,000 Cycles; 8,000,000 Cycles
Mechanical performance	Operating Force	0: 60±20gf
	Travel	0.25±0.1 mm

Diagram



How to order



Features

- Minitype size, small contact gap, quick action, high sensitivity and small operating travel.
- Long life (many times operating cycles), high reliability
- Low-profile

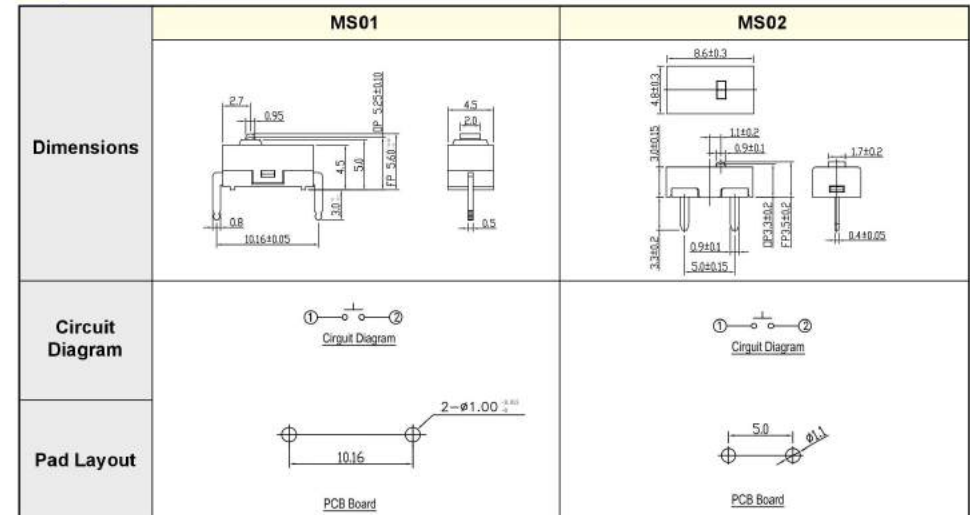
Applications

- Widely used in all kind mouse.

Specification

Items		Standard
Operating Temperature Range		-20°C to +70°C
Electrical performance	Rating	50mA 12V DC
	Insulation Resistance	100MΩ Min. 100V DC
	Dielectric Strength	500V AC for 1 min (50Hz or 60Hz)
	Contact Resistance	100 mΩ Max.
Durability	Operating Life	1,000,000 Cycles; 3,000,000 Cycles
Mechanical performance	Operating Force	S: 60±10gf ; L: 80±10gf
	Travel	0.25-0.50 mm

Diagram



* Please follow drawing of Approved Sheet that catalog drawing only for reference.

* Please follow drawing of Approved Sheet that catalog drawing only for reference.

DMC Series

12.8×5.8 Mouse Key Switch



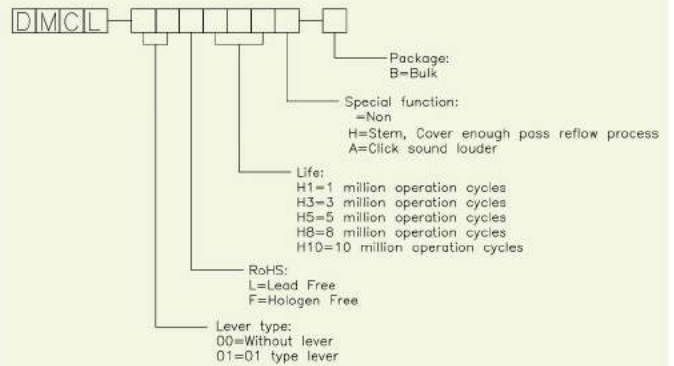
Features

- Minitype size, small contact gap, quick action, high sensitivity and small operating travel.
- Long life (many times operating cycles), high reliability.

Applications

- Widely used in all kind mouse.

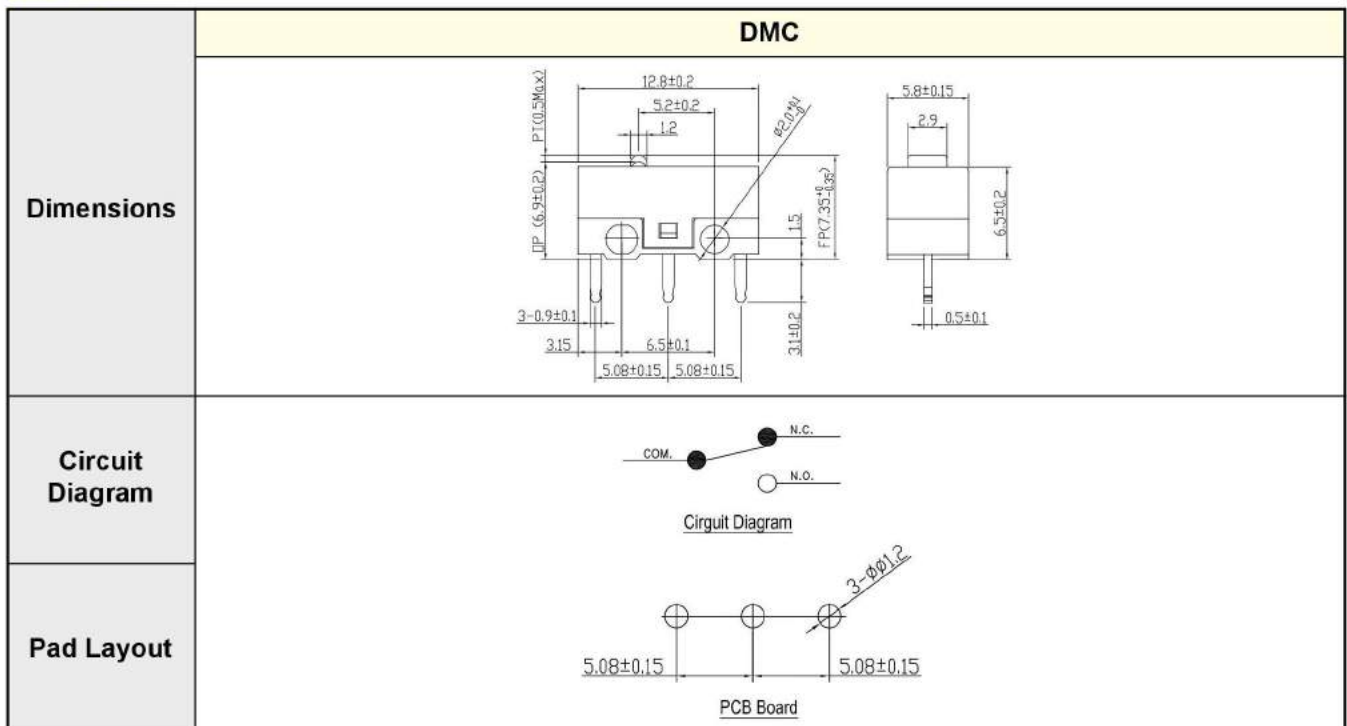
How to order



Specification

Items		Standard
Operating Temperature Range		-20°C to +70°C
Electrical performance	Rating	50mA 30V DC
	Insulation Resistance	100MΩ Min. 100V DC
	Dielectric Strength	500V AC for 1 min (50Hz or 60Hz)
	Contact Resistance	100 mΩ Max.
Durability	Operating Life	1,000,000 Cycles; 3,000,000 Cycles; 5,000,000 Cycles...
Mechanical performance	Operating Force	60±15 gf
	Travel	0.25~0.50 mm

Diagram



* Please follow drawing of Approved Sheet that catalog drawing only for reference.