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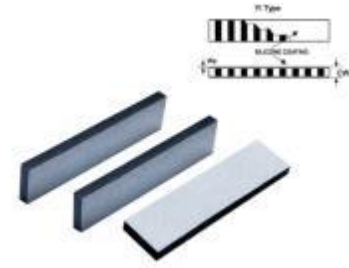

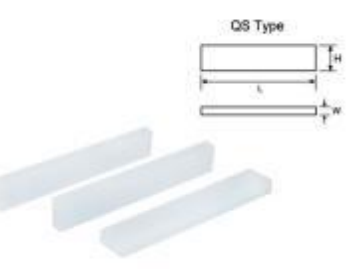
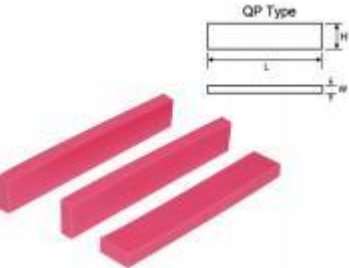
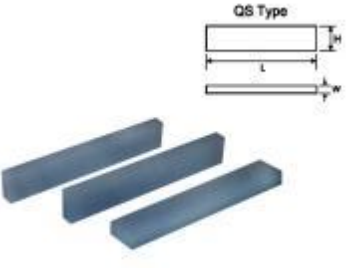


Rubber Connector Catalog

Material Composition

Type	Material	Portion
Conductive silicone	Vinylmethylsiloxane homopolymer	60%
	Acetylene black	40%
Insulated silicone	Vinylmethylsiloxane homopolymer	67%
	Silicon dioxide	32%
	Dicumyl peroxide	0.9%
	Titanium Dioxide	0.1%
Insulated Layer	Vinylmethylsiloxane homopolymer	82%
	Silicon dioxide	17.90%
	Dicumyl peroxide	0.10%

Type	Picture	Description
YL Type	<p>The diagram shows a cross-section of the YL Type rubber connector with alternating layers of conductive and insulating silicone rubber. The photo shows three black, rectangular rubber strips.</p>	<ol style="list-style-type: none"> 1. It is the compressive conductive rubber; 2. It is made up with alternative layers of conductive and insulating silicone rubber. 3. Widely use to LCD watches and clocks, connect PCB and EL, use for testing PCB and some conductive testing equipment.
YP Type	<p>The diagram shows a cross-section of the YP Type rubber connector with a central layer of sponge rubber between two layers of conductive silicone rubber. The photo shows three pink, rectangular rubber strips.</p>	<ol style="list-style-type: none"> 1. The sponge rubbers are with good insulation and vibration reducing; 2. Avoid the short circuit when use the metal shell; 3. The sponge rubber insulators are more compressible than YS Type products. 4. More suitable to use for connecting large sized LCD's to PCB's, the electronic products such as calculator, cars audio, and toy and so on.
YS Type	<p>The diagram shows a cross-section of the YS Type rubber connector with conductive and insulating silicone rubber layers on both sides of a central conductive layer. The photo shows three dark blue, rectangular rubber strips.</p>	<ol style="list-style-type: none"> 1. Consists of alternate layers of conductive and insulating silicone rubber; 2. The insulators are fitted on both sides which is soft; 3. YS type has translucent supportive solid rubber on the both sides. 4. Suitable for small or middle-sized displays, general LCD products such as Calculator, Electronic Toy, Telecommunication, Audio and Visual products, etc.

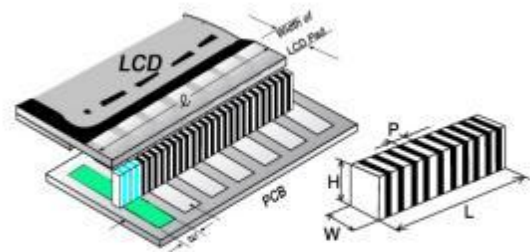
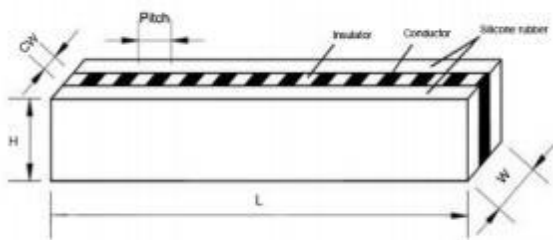
<p>BYS Type</p>		<ol style="list-style-type: none"> 1. Consists of alternate layers of conductive and insulating silicone rubber; 2. The insulators are fitted on both sides which is soft; 3. YS type has translucent supportive solid rubber on the both sides. 4. Suitable for small or middle-sized displays; General LCD products such as Calculator, Electronic Toy, Telecommunication, Audio and Visual products, etc.
<p>YI Type</p>		<ol style="list-style-type: none"> 1. Consists of alternate layers conductive and insulation silicone rubber; 2. This compression-type connector makes random connection possible with high reliability. 3. Applicable for the small-sized LCD display such as digital watch or camera.
<p>MG Type</p>		<ol style="list-style-type: none"> 1. It is designed to meet the ultra-low resistance requirement of customers; 2. The silver particles are added to the conductive layers to make the resistance very low. 3. Such as Chip-On-Glass type LCD & MIC Holder, Mobile Phone Screen, PCB to PCB, Flex Circuit to PCB etc.
<p>QS Type</p>		<ol style="list-style-type: none"> 1. As the spacer in combination with YP, YI & YS / BY5 type inter-connectors to balance LCD; 2. To ensure even distribution of weight When LCD design needs single-sided conductive pattern. 3. Supporting LCD with single-sided conductive pattern and protecting the glass surface & conductive lines from vibration Impact.
<p>QP Type</p>		<ol style="list-style-type: none"> 1. The same functions as QS Type; 2. More compressible than QS type due to the material features; 3. Supporting LCD with single-sided conductive pattern and protecting the glass surface & conductive lines from vibration Impact.
<p>QLType</p>		<ol style="list-style-type: none"> 1. The same functions as QS / QP Type; 2. Various colors and sizes are available. 3. Supporting LCD with single-sided conductive pattern and protecting the glass surface & conductive lines from vibration Impact.

Design principle of conductive rubber connector

Length (mm)	Height (mm)	Width (mm)	Pitch
The glass length reduce 0.5mm	The height between LCD and PCB \times (1.08~1.15) that is to say the impression ratio is 8%~15%, and the best impression ratio is 10%.	The edge width of LCD \times (0.9~0.95)	The ratio between each gold finger width of PCB and the conductive rubber connector must be more than 3~5, that is to say, each gold finger must touch 3~5 conducting layer to make sure good conductive.

Dimension and Tolerance

Item	Unit	0.05P	0.10P	0.18P
Pitch(P)	mm	0.05 \pm 0.015	0.10 \pm 0.03	0.18 \pm 0.04
Length(L)	mm	1.0~24.0 \pm 0.10 24.1~50.0 \pm 0.15 50.1~100.0 \pm 0.20 100.1~200.0 \pm 0.30		
Height (H)	mm	0.8~7.0 \pm 0.10 7.1~15.0 \pm 0.15		
Width(W)	mm	1.0~2.5 \pm 0.15 2.5~4.0 \pm 0.20		
Conduct width (TC)	mm	0.025 \pm 0.01	0.05 \pm 0.02	0.09 \pm 0.03
Insulator width (TI)	mm	0.025 \pm 0.01	0.05 \pm 0.02	0.09 \pm 0.03
Core width (CW)	mm	0.2~1.0 \pm 0.05 1.1~4.0 \pm 0.10		
Skewness		$\leq 2^\circ$		
Remark	In order to make the connectors work well, the compression limit for the height direction of the connectors must be between 8.0%~15%, and the best compression value is 10%, and the suitable touch pressure is bigger than 20g / mm \times length.			



Physical properties

Item	Units	Insulator	Conductor	Side Insulator
		YL/YP/YS/YI/SYS/BYS	YL/YP/YS/YI/SYS/BYS	YP/YS/YI/SYS/BYS
Specific Gravity	g/cm ³	0.6- 1.15	1.2	1.05
	25C			
Shore hardness A	ISO 7619 Shore	55-65	65-75	25-35
Volume Resistance	Ω	10 ¹²	2.5-6	10 ¹¹

Breakdown Voltage	KV/mm	20-25	20-25	20-25
Tensile Strength		70-80	50-60	20-40
Elongation	%	150-250	150-200	250-400
Compression set	%	15-20	15-20	15-20
Rated Current	MA/mm ²	1	1	1
Insulation Resistance (500VDC)	MΩ	1000	1000	1000
Operating temperature	C	-25~+100, +25C85%		
Store temperature	C	-40C~+120C		