※Selection Reference of Electric Contacts:

The adopting of material and dimensions of contact rivets normally bases on the accumulated experience from tests depending on different switching design and developed material. It is hard to build a rule for adopting.

額定電流 (Rated current)	一般開關用(溫升較低) General Switch Application (Lower Temperature Rising)		耐熔著開關用(溫升較高) High Anti-welding Switch (Higher Temperature Rising)	
	交流 AC	直流 DC	交流 AC	直流 DC
10A 以下 (10A or less)	Ag-1	Ag-1	B-12 N-10	N-10 U-25
10A ~20A	B-12 N-10 L-10	N-10 U-25 L-10	B-16 E-10	B-16 L-10 E-10
20A 以上 (20A or more)	B-16 E-10	E-10 B-16	X-2 焊接鉚釘 (Brazed Rivet)	F-11 焊接鉚釘 (Brazed Rivet)

※ The General Design and Tolerance of Electric Contact Rivets:

The dimensional tolerance of an electric contact rivet is properly set as following:

(1) **D ±0.1** The tolerance for the head diameter of electric contact to be set a little larger. An exceeding small tolerance will shorten the life of riveting die since it is liable to be slightly worn out, both manufacturing cost and price of rivet will be increased.

(2) **T +0.1 (A)** After the riveting procedure, the thickness of an electric contact rivet head -0T will become thinner, thus the lower limit of the tolerance is set at zero.
The electric contact rivet head will be reduced by 0.05- 0.10mm of its thickness after riveting, which brings it near to reach the specified value T.

(B) The cavity depth of riveting die T' is set to equal the value of t -0.1mm.
Accordingly, if T is 0.05-0.1mm thicker than T', then the support plate & the rivet head will be riveted closely, no gap existed.

(3) **d + 0** For a shank of electric contact rivet, the upper limit of its tolerance to be set - 0.1 at zero to prevent electric contact rivets from being unable to be inserted into the corresponding hole in the support plate when the hole is formed with the smallest allowable hole diameter.

(4) **L+0.15** The length of an electric contact rivet shank used to be made slightly longer in **-0** order to cope with situation, in which the hole in the support plate has a largest allowable diameter. By doing this, the shank electric contact rivet portion extending out of the support plate may have a bulk sufficient to allow the rivet to be tightly

attached on the support plate after the rivet shank is impacted by external force.
About 0.8-1.5mm thicker than the support riveted plate (depending on the thickness of the support plate and the tolerance of the hole punched in the support plate; the hole diameter is generally of d+0.1/-0mm.)

(5) t±0.1 The silver layer is well configured to have a relatively thicker central portion with a relatively thinner peripheral margin. The thicker central portion is directly opposite to the rivet shank, thus it will be flattened when an impact force applied on the rivet shank of electric contact rivet during a riveting operation.
The optimum state is 50% (min. 25%, max. 65%) of the head thickness (T)