

Title (en)  
ELECTRICAL CLAMPS

Title (de)  
ELEKTROKLEMMEN

Title (fr)  
BORNES ÉLECTRIQUES

Publication  
**EP 3198048 A1 20170802 (DE)**

Application  
**EP 15756842 A 20150829**

Priority  
• DE 102014014239 A 20140925  
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Abstract (en)  
[origin: WO2016045770A1] Electrical connection element containing a copper-zinc alloy. The copper-zinc alloy comprises (in percent by weight): 28.0 to 36.0 % Zn, 0.5 to 1.5 % Si, 1.5 to 2.5 % Mn, 0.2 to 1.0 % Ni, 0.5 to 1.5 % Al, 0.1 to 1.0 % Fe, optionally also up to a maximum of 0.1 % Pb, optionally also up to a maximum of 0.1 % P, optionally up to a maximum of 0.08 % S, the remainder being Cu and inevitable impurities. According to the invention, mixed silicides containing iron, nickel and manganese are incorporated in the matrix. The structure comprises an  $\alpha$ -matrix, which contains inclusions of  $\beta$ -phase from 5 up to 45 percent by volume and of mixed silicides containing iron, nickel and manganese up to 20 percent by volume. The structure further comprises mixed silicides containing iron, nickel and manganese having a stemmed shape and iron and nickel enriched mixed silicides having a globular shape.

IPC 8 full level  
**C22F 1/08** (2006.01); **C22C 9/04** (2006.01)

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