FELDER seit 1979 LÖTTECHNIK

Product Information

FELDER-Special Soft Solder 70° C

Bi-Pb-Sn-Cd special alloy
(not standardised)

Item no. 1315....

Application

FELDER-Special soft solder 70° C is mainly applied as fuse for automatic extinguishing equipment, warning devices and other security devices.
Further examples for applications are the manufacturing of model-casts, the bending of thin-walled pipes without cross-section impairment and the use as second-step-solder.

FELDER-Special soft solder 70° C has excellent flowing properties on copper, brass and steel, using the appropriate fluxes. The application requires fluxes with a minimum working temperature of 110° C.

Properties

FELDER-Special soft solder 70° C is an eutectic 4-element-alloy made of bismuth and lead, tin and cadmium.
High bismuth containing solders freeze to coarse crystal and only with slow deformation they are ductile, with fast deformation the material becomes brittle.
Due to the very low melting point it begins to creep even at room temperatures, therefore it may only be stressed a little. Alloys based on bismuth can expand a little after solidification.

Alloy components:	bismuth, lead, tin, cadmium
Melting temperature:	70° C (eutectic)
Density:	9,5 g/cm^3
Tensile strength:	19 - 40 MPa
Permanent creep strength:	2,1 MPa
Hardness (HB):	8
Electrical conductance:	2,1*10^6 S/m^2
Coefficient of expansion:	13,4 μm/m·K

Advices

The alloy should not be heated more than required for the solder joint since cadmium vaporises easily. Remaining solder has to be disposed of as hazardous waste.

Delivery Form

Triangular rods and wire (massive).
Other rod dimensions and blocks are deliverable on demand.

FELDER GMBH
Im Lipperfeld 11
D-46047 Oberhausen
Fon +49 (0) 208 8 50 35 0
Fax +49 (0) 208 2 60 80
Web www.felder.de
Mail info@felder.de