

# CUPRO B2

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Chemical Composition (%)	Be	Ni	Co	Fe	Others	Cu
	1.8-2.1	max 0.3	max 0.3	max 0.2	max 0.5	rest

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Code DIN: 2.1247, EN: CW101C, UNS No: C17200

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**Material Properties** Hard copper alloy with the highest hardness. Very high mechanical properties with a reasonably good thermal and electrical conductivity. Optionally delivered in hardened or solution treated (220-240 HB).

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**Application Area** Flash welding dies, rim and chain welding, In the plastic moulds as chill plates and insert in the moulds, cooling pins and neck rings or bottom plates for blow moulds of plastic bottles, parts for electrical components, safety tools due to non-sparking, non-magnetic and corrosion resistant features.

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**Heat Treatment** Delivered in heat treated condition.

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Mechanical Properties	Hardness	HB	340-390
	Tensile strength	N/mm <sup>2</sup>	1100-1300
	Yield strength	N/mm <sup>2</sup>	900-1100
	Elongation L=5D	%	4-9
	Modulus of elasticity (20 °C)	GPa	128

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Physical Properties	Electrical conductivity	MS/m	15
	Coefficient of thermal expansion (273 - 573 K)	10 <sup>-6</sup> /K	17.5
	Thermal conductivity (20 °C)	(W/mK)	106
	Density	(g/cm <sup>3</sup> )	8.3

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