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IABCO C27

MIG/GMAW and TIG/GTAW copper base wire

Product name	IABCO C27
Classification EN ISO	24373: Cu5410 (CuSn12P)
Material No.	2.1056
Classification BS	2901 pt 3: C27 (obsolete specification)
Applications	A tin bronze (phosphor bronze) wire with approximately 12% tin. The IABCO C27 wire can be used for welding a wide range of copper alloys ranging from phosphor bronze, brass, manganese bronze and gunmetal. The wire can also be used for surfacing. Because of its strength and hardness, 12% tin bronze is widely used for gears and bearings.
Base materials	Used for welding tin bronze (phosphor bronze) alloys, eg: C90800. CuSn10, CuSn12. 2.1050, 2.1052.
Typical analysis of wire, weight %	Cu: Balance Sn: 12.5 P: 0.2
Typical heat treatment (1)	Preheat: A preheat of 200°C may be required particularly with thicker section material. Interpass: Should be kept to 200°C.
Typical mechanical properties of weld (2)	0.2% proof stress Rp0.2%: 150MPa Tensile strength Rm: 300MPa Elongation 5d: 15%
Other products	-

Notes (1) Application codes and project specifications should always be referred to for specific requirements. (2) Actual mechanical properties will be dependent on specific welding procedure (including shielding gas, flux, PWHT etc) and should always be confirmed by approval of an appropriate welding procedure.

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