Silver-flo™ 24 – Cadmium Free Silver Brazing Filler Metal

Silver-flo™ 24 is a high melting point cadmium free silver brazing filler metal. It has a high melting temperature (740 to 800°C) with a medium length melting range of 60°C providing medium flow properties when molten. The high brazing temperature of the filler metal makes it less easy to use than the high silver content alloys. This filler metal has been incorporated into aviation / aero industry standards and is consequently used in the manufacture of components for applications in this field. It is also used as the first alloy in a two-step silver brazing operation, where the second joint is made with Silver-flo™ 55 or Easy-flo™ No.2. This step brazing process is used by model engineers to manufacture boilers and components for model steam engines. Optimum joint gaps at brazing temperature are 0.075-0.2mm

**Composition:** 24%Ag, 43%Cu, 33%Zn
**Conforms to:** Proprietary JM Specification, MSRR 9500/93
**Melting range:** 740-800°C

### Uses for This Product

Silver-flo™ 24 is commonly used for joining mild steel components either to mild steel or copper. Silver-flo™ 24 can be used to join most common engineering metals - copper, copper alloys including, brasses, bronzes, gun metal, nickel silver, aluminium bronze, copper nickel, steels including, mild, carbon, tool steel, stainless steels, low alloy steel. This alloy is not normally recommended for brazing tungsten carbide and PCD segments where lower melting or nickel / manganese containing silver brazing filler metals are often preferred.

### Conditions for Use

Silver-flo™ 24 is designed for brazing in air with the use of a flux. Generally it is necessary to use a flux with a higher working range than Easy-flo™ flux, such as Tenacity™ No.4A, Tenacity™ No.5 or Tenacity™ 20. However on small components and with rapid heating cycles a general-purpose flux such as Easy-flo™ flux powder may be acceptable.

### Product Availability

- **Rods:** 1mm, 1.2mm, 1.5mm dia
- **Wire:** 1mm
- **Strip:** On request
- **Foil:** On request
- **Braze-pastes:** On request
- **Powder:** On request
- **Others:** Rings, Preformed Shapes

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