

- Ideal for protective coating, joining and cladding applications
- The deposit is easy to machine with standard cutting tools
- Porosity free deposits
- Ideal for protection against metal-to-metal friction

Eutalloy® 1205

Eutectic 1205 is a nickel-based, self-fluxing, alloy with properties which make it ideal for protective coating, joining and cladding applications on a variety of base metals. The deposit is easy to machine, with standard cutting tools, and is a mid-range hardness alloy with excellent puddle control with a good combination of wear resistant properties.

Eutectic 1205 is manufactured by a process of atomization, designed to ensure both optimum spheroidization and controlled granulometry. This in turn ensures trouble-free fusion of the alloy using our SuperJet-S® Eutalloy® torch. Eutectic 1205, applied with a Eutalloy system, produces smooth and uniform quality coatings.

This maintenance-engineered coating technology increases the value and reliability of parts treated, with results far superior to conventional repair processes, and savings in costs including those of machining.

TECHNICAL DATA

Typical Values	
Hardness:	20 - 27 HRC
Max. Service Temperature:	1000°F (538°C)
Machinibility:	Excellent, with normal cutting tools
Torch:	SuperJet S

PROCEDURE FOR USE

Preparation: All surfaces to be coated should be thoroughly cleaned, removing all contaminants, oxides and grease. Thin surfaces and edges require no preheating. However, large, heavy and cast iron parts of all thicknesses should be heated to approx. 575°F (approx. 302°C) (blue hot).

Coating Instructions: For coating operations the flame of the Eutalloy B or SuperJet S torch should be adjusted to neutral with the powder feed on. To prevent oxidation of the base material we recommend spraying a thin coat of Eutectic 1205. A second coat is delivered in the following manner: preheat locally to fusion point (when the first coat becomes glazed in appearance), then spray and fuse the second coat simultaneously. Move progressively along, spraying and fusing, until the entire surface is covered. Distance between the cone of the flame and the piece should be .25 - .75 inch. Leave the part to cool slowly and away from air currents. Where possible, place it in vermiculite or cover with a thermal blanket.

TYPICAL APPLICATIONS

Recommended for use on glass mold necks, mold edges and corners, bottom plates and quide rings. Other uses include gearwheels and exhaust manifolds, repair of casting and machining defects and for repair of worn areas of deep-drawing dies.

Observe normal spraying practices, respiratory protection and proper air flow pattern advised. For general spray practices, see AWS Publications AWS C2. 1-73, "Recommended Safe Practices for Thermal Spraying and AWS TSS-85, "Thermal Spraying, Practice, Theory and Application." Thermal spraying is a completely safe process when performed in accordance with proper safety measures. Become familiar with local safety regulations before starting spray operations.DO NOT operate your spraying equipment or use the spray material supplied, before you have thoroughly read the equipment instruction manual. Refer to the Eutectic website for Material Safety Data Sheet (MSDS) information. DISREGARDING THESE INSTRUCTIONS MAY BE HAZARDOUS TO YOUR HEALTH.

