

## **P♦MET 885** Arc Spray Wire

### DESCRIPTION

**P♦Met 885** is a solid wire specifically designed for arc spray systems. It is self-bonding to most materials and requires minimal surface preparation. Bond strengths in excess of 9000 psi can be achieved on clean smooth surfaces. Roughening of the surface by machining, grit blasting or grinding can increase the bond strength up to 9800 psi. **P♦Met 885** exhibits good resistance to high temperature oxidation and abrasion, and excellent resistance to impact and bending. **P♦Met 885** can be machined and ground to a finish of 5 micro inches. It is a self-bonding, one step material and is also suitable for the build-up and dimensional restoration of nickel based alloys. **P♦Met 885** is widely used as a bond coat for subsequent thermal spray topcoats and as a one step build up material for dimensional restoration of aircraft engines.

### TYPICAL DEPOSIT CHARACTERISTICS:

- Typical Hardness                      HRB 75
- Bond Strength                            9500 psi
- Deposit Rate                              10 lbs /hr/100A
- Deposit Efficiency                        70%
- Wire Coverage                            0.9 oz/ft<sup>2</sup> / m
- Surface Texture                          \*Variable
- Machineability                            Good

\* Depends on air pressure used.

Surface should be clean, white metal, with no oxides (rust), dirt, grease, or oil on the surface to be coated. **Note:** It is best not to handle surfaces after cleaning.

Recommended method of preparation is, to grit blast with 24 mesh aluminum oxide, rough grind, or rough machine in a lathe.

### APPLICATION:

- Bond Coat
- Dimensional Restoration

### SPECIFICATION:

95Ni 5Al  
PWA-36937, GE Standard Practice Manual 70-49-38 (Ref: GE B50TF56).

### SURFACE PREPARATION:

### NOMINAL CHEMICAL COMPOSITION (wt%):

<b>Al</b>	<b>Ni</b>
5.0	Bal

### RECOMMENDED SPRAY PARAMETERS:

Diameter	Air Pressure	Voltage	Amperage	Standoff
1/16" (1.6mm)	*50 - 60 psi	*29 - 32	*100 - 200	*4 - 8 in (10 - 20cm)

\* Parameters are typical and may vary depending on equipment used. Contact your equipment manufacture for optimum spray parameters.

### STANDARD SIZES & PACKAGING:

<b>Diameter</b>	<b>Packaging</b>	<b>Part Number</b>
1/16 (1.6mm)	25# LLWS	885062LWS01

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