



UNIBRAZE 82T-1

Specification: AWS A5.34 /ASME SFA5.34 Class ENiCr3T1-1 ENiCr3T1-4 UNS W86082
ISO TNi6082-xy

Description: Unibraze 82T-1 is an all position, gas-shielded, flux cored, nickel-based electrode. It is used to weld alloys 600, 601, 800 to themselves, to the clad side of joints in steel clad with Ni-Cr-Fe alloys and dissimilar welding of nickel alloys. It is also used to joining carbon steels to nickel alloys and for the surfacing of carbon steels. Unibraze 82T-1 has excellent resistance to pitting and stress corrosion cracking in chloride contaminated environments. It is recommended for use in cryogenic and elevated temperatures up to 1450°F.

Shielding Gases: 100% CO₂, 75/80% Ar/ CO₂ balance, 40-55 cfh

Typical Deposit Chemistry (75% Ar/25% CO₂)

C	Mn	P	S	Cr	Ni	Fe	Nb
.03	2.80	.001	.002	19.0	Bal	1.05	2.60

Typical Mechanical Properties (75% Ar/25% CO₂)

Tensile Strength	95,000 psi
Yield Strength	54,000 psi
Elongation	43%

Optimum Welding Parameters (75% Ar/25% CO₂)

Diameter	Position	Amps	Volts	WPS
.045"	Flat	190	27	400
	Overhead	155	24	320
	Vertical up	155	24	320
1/16"	Flat	190	26	225
	Overhead	175	24	175
	Vertical Up	175	24	175

(1/2 - 5/8" contact tip to work distance)