

Tigrod ER90S-B3

Tigrod ER90S-B3 is a Chrome-Moly TIG rod used for joining 2.5% Cr - 1% Mo creep resistant steels. These non-copper-coated rods are primarily used to fabricate and repair power piping, pressure vessels, heat exchangers and boilers in the power generation industry.

Classifications	AWS A5.28 : ER90S-B3 ASME SFA 5.28
Industry	Petrochemical Power Generation Process

Typical Tensile Properties

Condition	Yield Strength	Tensile Strength	Elongation
Stress Relieved 1hr 690°C (1275°F)	545 MPa (79 ksi)	649 MPa (94 ksi)	27 %
Stress Relieved 1hr 705°C (1300°F)	524 MPa (76 ksi)	642 MPa (93 ksi)	25 %

Typical Wire Composition %

C	Mn	Si	S	P	Ni	Cr	Mo	V	Cu
0.07-0.12	0.40-0.70	0.40-0.70	max 0.025	max 0.012	max 0.20	2.30-2.70	0.90-1.20	max 0.03	max 0.20

Typical Wire Composition %

X-bar
max 12

Typical Weld Metal Analysis %

C	Mn	Si	S	P	Cr	Mo	X-bar
0.08	0.60	0.50	0.009	0.009	2.40	0.90	< 15