

# TECH-ROD 410NiMo

I. **DESCRIPTION:** Tech-Rod 410NiMo is designed to weld materials of similar chemical composition in cast and wrought forms. Preheat and interpass temperatures of not less than 300°F (150°C) are recommended during welding. Post-weld heat treatment should not exceed 1150°F (620°C), as higher temperatures may result in hardening.

**Note:** Mechanical properties listed below reflect utilization of a post-weld heat treatment between 1100°F and 1150°F for one hour.

II. **APPROVALS:** Manufactured under Quality System approved by ASME, ISO9001. Meets AWS 5.4 Class E410NiMo-16.

III. **CHEMICAL COMPOSITION**

Carbon	.03
Manganese	.52
Silicon	.45
Chromium	12.1
Nickel	4.55
Molybdenum	.52
Sulfur	.019
Phosphorus	.018
Iron	Balance

**MECHANICAL PROPERTIES**

<b>Tensile Strength</b>	
110,500 PSI	800 MPA
<b>Yield Strength</b>	
91,000 PSI	630 MPA
<b>Elongation:</b>	17%

IV. **WELDING PARAMETERS**

Direct Current  
Electrode + Ve

**AMPERAGES:**

3/32"	65-75
1/8"	90-105
5/32"	120-135
3/16"	135-155

(For vertical welding amperages are to be reduced by 10 to 15 amps)

V. **PACKAGES AVAILABLE:**

3/16"-10# can, 5/32"-10# can, 1/8"-10# Can, 3/32"-8# can