



GB/T 13814 —

AWS A5.14 ERNiMo-8

EN ISO 14172 —

AK ERNiMo-8

Description: ERNiMo-8 is a nickel-based welding wire classified under AWS A5.14, primarily designed for welding 9% nickel steels. It offers excellent toughness at cryogenic temperatures, reliable strength across a wide temperature range, and stable arc performance for producing sound, smooth welds in demanding low-temperature service.

Application: ERNiMo-8 is mainly used for welding 9% Ni steel in LNG storage tanks, cryogenic vessels, FPSO structures, and other low-temperature equipment requiring high impact toughness and dependable weld integrity. It is commonly applied in GTAW and SAW processes for critical cryogenic fabrication and repair work.

Typical Chemical Composition(%):

	C	Mn	Fe	P	S	Si	Cu	Ni	Co
Requirement	0.10	1.0	10.0	0.015	0.015	0.50	0.50	≥60	---
Actual Result	0.03	0.60	6.30	0.001	0.002	0.10	0.10	65.20	---
	Al	Ti	Cr	Nb+Ta	Mo	V	W	Zr	B
Requirement	---	---	0.50-3.50	---	18.0-21.0	---	2.0-4.0	---	---
Actual Result	---	---	2.50	---	19.69	---	2.36	---	---

Typical Mechanical Properties:

	Tensile Strength (MPa)	Yield Stress (MPa)	Elongation (%)	Impact Values (J)
Requirement	≥660			
Actual Result	710			