

ES NiCrFe-3

Type Basic

SMAW

ENiCrFe-3

ESWECO
The Art of Welding

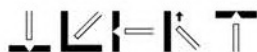
Description

ES NiCrFe-3 a nickel-based electrode for welding nickel alloys such as Inconel 600 and similar Inconel alloys, cryogenic steels, martensitic to austenitic steels, dissimilar steels, heat-resistant steels and castings with limited weldability.

High creep resistance up to 815°C, High resistance to embrittlement, High toughness also at low temperature (-196°C), High resistance to carburization and extra alloyed with ~6% Mn to provide hot cracking resistance.

Current

DC+



Classifications

SFA/AWS A5.11	ENiCrFe-3
EN ISO 14172	E Ni 6182 (NiCr15Fe6Mn)

Typical all weld metal composition, %

C	Si	Mn	Cr	Ni	Ti	Nb	Fe	Cu
0.03	0.5	6.6	15.8	67.0	<0.5	1.7	8.8	<0.5

Typical mech. Properties all weld metal

Yield stress, MPa	410
Tensile strength, MPa	640
Elongation, A4 %	40

Charpy V

Test temps, °C	Impact values, J
+20	100
-196	80

Welding parameters

Diameter, mm	Length, mm	Welding current, A	Arc voltage, V
2.5	350	45-70	22
3.2	350	70-105	23
4.0	350	90-130	24
5.0	350	120-170	25