



CEWELD 4455 Ti

TYPE SMAW electrode for welding Cr-Ni-Mo steels.

APPLICATIONS The electrode is suitable for welding corrosion-resistant Cr-Ni-Mo steels, austenitic steels, non-magnetic, cast steels and cold tough steels. Particularly suited to corrosion conditions in urea synthesis plants and for joining and surfacing applications with matching austenitic CrNi(N) and CrNiMo(Mn,N) steels and cast steel grades.

PROPERTIES Extreme stable arc on both AC and DC+ with no spatter losses. The slag is self lifting and leaves a fine rippled shiny surface. Max. service temperature 350°C. Corrosion resistance similar to low carbon CrNiMo(Mn,N)-steels. Seawater resistant and good resistance to nitric acid.

CLASSIFICATION

AWS	A 5.4: E 316LMn
EN ISO	3581-A: E 20 16 3 Mn N L
W.Nr.	1.4455
F-nr	4
FM	5

SUITABLE FOR 1.3941(G)X4CrNi18-3, 1.3945 X2CrNi18-13, 1.3948 X4CrNiMnMoN19-13-8, 1.3952 (G)X2CrNiMo18-14-3, 1.3953 (G)X2CrNiMo18-15, 1.3955 GX12Cr18-11, 1.3965 X8CrMnNi18-8, 1.4315 X5CrNi19-9, 1.4429 X2CrNiMoN17-13-3, 1.4435 X2CrNiMo18-14-3, 1.4561 X1CrNiMoTi18-13-2, 1.6903 10CrNiTi18-10 Cryogenic 3.5 – 5% Ni-steels UNS S31603, S31653 AISI 316L, 316LN

APPROVALS

WELDING POSITIONS



TYPICAL CHEMICAL ANALYSIS OF WELD METAL (%)

C	Si	Mn	Cr	Ni	Mo
0.02	0.45	4	19	16	2.8

MECHANICAL PROPERTIES

Heat Treatment	R _{p0.2} (MPa)	R _m (MPa)	A ₅ (%)	Hardness
As Welded	440	640	35	HRc

REDRYING 300°C / 2 hr

GAS ACC. EN ISO 14175