



Elgatic 184CR

GTAW - TIG
Low-alloyed

Date: 2008-03-19
Revision: 9

Description:

Elgatic 184CR is a 2.4% Cr/1.0% Mo alloyed wire intended for TIG welding creep resisting steels of similar composition, used in steam generation plant operating at temperatures up to 600°C, e.g. DIN 10 CrMo 9 10, GS-18 CrMo 9 10, GS-17 CrMo V 5 11, BS 3604 Grades 622 etc. Also suitable for use in the chemical and petrochemical industries where resistance to hydrogen attack, corrosion from sulphur bearing crude oil, and stress corrosion cracking in sour environments is required. Preheat and interpass temperature of 200-250°C is recommended. Post-weld heat treat at 700°C.

Welding current:

DC-

Wire composition, wt.%

	C	Si	Mn	P	S	Cr	Mo
Min	0,05	0,50	0,80			2,3	0,90
Typical	0,08	0,60	1,0	0,01	0,01	2,4	1,00
Max	0,12	0,80	1,20	0,020	0,020	3,0	1,20

Shielding gas:

I1, Argon, 7-10 l/min

Stamping

F CrMo2

Chemical composition, wt.%

	C	Si	Mn	Cr	Mo
Min					
Typical	0,08	0,6	1,0	2,3	0,95
Max					

Mechanical properties

	<u>Specified</u>	<u>Typical</u>	<u>PWHT Typical</u>
Yield strength, Re:	≥ 400 MPa		460 MPa
Tensile Strength, Rm:	≥ 500 MPa		600 MPa
Elongation, A5	≥ 18%		22%
Impact energy, CV:	20°C • >47 J		20°C • 80 J

Classification:

EN ISO 21952 W CrMo2Si
AWS A5.28 ER90S-G

Approvals:

Product data:

Diam.mm	Length mm	Product code
1,6	1000	9720-1016
2,0	1000	9720-1020
2,4	1000	9720-1024
3,0	1000	9720-1030

Note

PWHT: 620°C, 1h