

TIG Rods C-Mn steels and low-alloy steels

CARBOROD W 225V is a copper coated ER90S-G type solid TIG welding rod depositing a 2¼Cr 1MoV weld metal for the welding of creep resistant steels. Suitable for use with Ar shielding gas.

CARBOROD W 225V is used for welding of 2¼CrMoV (P22V) steels. Used in the petrochemical industry for hydrocrackers and heavy wall pressure vessels for hydrogen service.

CARBOROD W 225V has a very low impurity deposit. For very heavy wall-thickness in P22V it could be necessary to apply intermediate stress relieving treatments to reduce the overall stress level.

Classification	
AWS	A5.28: ER 90S-G

Chemical analysis (Typical values in %)

C	Mn	Si	Cr	Mo	Nb	V
≤ 0.13	≤ 1	≤ 0.2	2.5	1	0.02	0.25

All-weld metal Mechanical Properties

Heat Treatment	Yield Strength (MPa)	Tensile Strength (MPa)	Elongation A5 (%)	Impact Energy ISO - V (J)
				-29 °C
710 °C x 8h	≥ 500	≥ 680	≥ 18	≥ 100

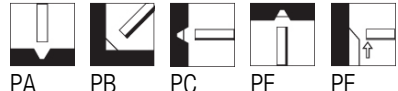
Gas test: 100% Ar

Shielding Gas - EN ISO 14175 : I1

Materials

ASTM541 Gr22V - SA336 F22V - SA832 Gr21V
12 Cr Mo V 910

Storage
Keep dry and avoid condensation

Current condition and welding position
DC-


Packaging data

Diam. (mm)	Packaging Type	Weight (kg)	Code
1.6	TUB	5	●
2.0	TUB	5	●
2.4	TUB	5	●