

BW-81T

For 550N/mm² class high tensile strength steel

AWS A5.29 E81T-1-Ni1M

Applications & Features

For butt & fillet welding of 550N/mm² high tensile strength steels of structures such as ships, bridges, building and storage tanks etc.

Characteristics

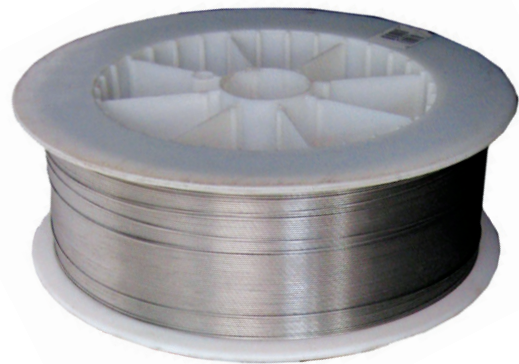
- (1) BW-81T is a titania type flux cored wire designed for all positional single & multi pass welding with Argon/CO₂ mixed shielding gas.
- (2) It provides excellent usability with a stable arc, less spatter, good bead appearance, excellent slag removal and minimal welding fumes as compared to solid wire.
- (3) Provides excellent welding efficiency due to high deposition rates.

Notes on Usage

- (1) The optimum flow for shielding gas is 20~25ℓ/min.
- (2) The distance between tip & base material is to be 20~25mm.
- (3) Protect the weld with a screen to prevent blowholes caused by wind where the wind velocity is 2m/sec and more.
- (4) Thick heavy plate should be welded under proper preheating & interpass temperatures.

Approvals:

ABS



Typical chemical composition of weld metal (%) (Shielding Gas: Argon/CO₂ mix)

C	Mn	Si	P	S	Ni
0.05	1.30	0.40	0.013	0.011	0.95

Typical mechanical properties of weld metal (Shielding Gas: Argon/CO₂ mix)

YP N/mm ² (MPa)	TS N/mm ² (MPa)	EL %	IV (J)	
			-20°C	-30°C
538	605	29.4	124	81

Size & recommended current range (DC+)

Amp	Dia. mm (in)	1.2 (0.045)	1.4 (0.052)	1.6 (0.062)
	FLAT, H-FILLET	180~340	200~360	200~400
	V-UP	120~220	140~260	160~260
	V-DOWN	120~240	140~260	160~280
	O, H	120~220	140~260	160~260