TS-307HM

Characteristics and Applications:

The weld metal of TS-307HM is fully nonmagnetic austenite structure. It is especially suitable for the military use (e.g. mine sweepers).

Pre-heating or post-weld heat treatment is not necessary. We strongly recommend to apply the product to 18%Cr-8%Ni stainless steel, 14% Mn steel and the steels with poor weld ability or root pass welding.

Notes on usage:

- 1. Clean up the contaminations on the base metal, groove and pass to pass with stainless steel brush.
- 2. Maintain short arc length. Moving range should be controlled within 2.5 times of the wire's dia when you are welding with weave method.
- 3. Dry the electrodes at 250~300°C for 60 minutes before using. Take out consumables for half day consumption and keep in the environment at 100~150°C during welding process.
- 4. Use lower current to prevent from cracking and minimize base metal dilution.

Typical chemical composition of weld metal (wt%):

	С	Mn	Si	Р	S	Cr	Ni
Typical value	0.08	5.50	0.40	0.038	0.010	18.60	9.10

Typical mechanical properties of weld metal:

	Tensile strength MPa(ksi)	Elongation %
Typical value	590(86)	42

Welding position:











Sizes and recommended current range (AC or DC<+>):

Diameter (mm)		2.6 3.2		4.0	4.8
Length (mm)		300	350	350	350
Amps	F	60-90	80-120	130-170	180-210
	V&OH	50-70	70-110	100-130	-

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