GWELD
SEAL OF TRUST

GRINOX 18

IDENTIFICATION
GRINOX 18 E318-16

CLASSIFICATION
AWS/SFA 5.4: E 318 – 16 IS: E 19.12.2 Nb R 26

DESCRIPTION
An extruded, rutile based heavy coated all position electrode for welding 18/8/2 Chromium Nickel Molybdenum stabilised Stainless Steel.
Weldable in all positions. Arc striking and re-striking properties are excellent. Arc is soft & stable. The spatter is very low and the slag is easy to remove. The weld deposit is free from cracks & porosity. The weld bead is finely-ripple, smooth and regular. Due to stabilisation with Columbium, the weld deposit has increased resistance against Intergranular Corrosion and excellent creep strength upto 850°C.

WELD METAL ANALYSIS (RANGE) %

C	Mn	Si	S	P	Cr	Ni	Cb	Mo
0.08 max	1.0 - 2.5	0.9 max	0.03 max	0.03 max	17.0 - 20.0	11.0 - 14.0	0.3 - 0.8	2.0 - 3.0

MECHANICAL PROPERTIES (RANGE)

UTS (MPa)	YS (MPa)	EL (%) (L=4D)	CVN Impact Value	
			Temp	Joules
550 - 640	-	30 - 40	27°C	70 - 98

TYPICAL APPLICATIONS
- For joining the above steels and also for surfacing unalloyed, low alloy and cast steels.
- Food stuffs, Dairy, Chemical and Aircraft Industries, Household Appliances, pipeline fitting, Hospital

apparatus, dyeing equipment, paper mills, bakeries, pickling plants and heat resistant castings.
- Corrosion - resistant stabilised Stainless Steel containing about 18% Cr, 9% Ni & 3% Mo and ferritic Chromium Steels.
- Also for stainless steel types AISI grades 317 & 318 LC-quality.

WELDING PROCEDURE
The base metal should be free from oil, Grease or Dirt before welding. Keep a short arc - length. The weld bead should be cleaned with stainless steel brush.

WELDING POSITION :

PACKING PARAMETERS

Size (mm)	Length (mm)	AMPS AC / DC (+)	Packing / Box (kg)	Packing / Box (Pcs)
2.5	350	55 - 75	2 x 5 = 10	94 x 5 = 470
3.15 / 3.20	350	85 - 110	2 x 5 = 10	60 x 5 = 300
4	350	110 - 140	2 x 5 = 10	38 x 5 = 190
5	350	140 - 180	2 x 5 = 10	24 x 5 = 120