

S-316.16N

TYPE : Rutile

AWS A5.4 / ASME SFA5.4 E316-16
JIS Z3221 ES316-16
EN 1600 - E 19 12 3 R

Applications

Welding of 18%Cr-12%Ni-3%Mo stainless steel, 13%Cr steel, 17%Cr steel and high toughness steel when postheating is not recommended use for welding between dissimilar metal like carbon steel and stainless steel.

Characteristics on Usage

S-316.16N is a lime-titania type electrode provided with a good usability and weldability. As the all-weld metal has an austenite structure including Mo., the corrosion resistance against sulfide acid, phosphoric acid and acetic acid is excellent and heat resistance is also much better than that of 18%Cr-8%Ni stainless steel welds.

Notes on Usage

- ① Dry the electrodes at 350°C(662°F) for 60 minutes before use.
- ② Keep the arc as short as possible.

Welding Position



1G (PA) 2F (PB) 3G (PF) 4G (PE)

Current

AC or DC +

Typical Chemical Composition of All-Weld Metal (%)

C	Si	Mn	P	S	Cr	Ni	Mo
0.03	0.77	0.90	0.030	0.029	18.7	12.3	2.5

Typical Mechanical Properties of All-Weld Metal

TS MPa(lbs/in ²)	EL (%)
572 (83,100)	40.8

Approval

KR, ABS, BV, DNV

Packing

Packet 2.5 kg (5.5 lbs)
Carton 2.5 kg (5.5 lbs) × 4 : 10kg(22 lbs)

Sizes Available and Recommended Currents (Amp.)

Size mm (in)	2.0 (5/64)	2.6 (3/32)	3.2 (1/8)	4.0 (5/32)	5.0 (3/16)
Length mm(in)	300 (12)	300 (12)	350 (14)	350 (14)	350 (14)
F	25~55	50~85	70~115	95~150	135~180
V-up, OH	20~50	45~80	65~110	85~135	-