USA 316L-17
Coated Electrode

U.S. ALLOY CO.
dba Washington Alloy
7010-G Reames Rd.
Charlotte, NC 28216
www.weldingwire.com

Quality Management System
in accordance with
ISO 9001
Cert # 05-R0925

American Welding Society
Sustaining Company Member

GAWDA
GASES AND WELDING DISTRIBUTORS ASSOCIATION

ALLOY DESCRIPTION AND APPLICATION;

USA 316L electrodes produce weld deposits similar to that of USA 316, but with a maximum 0.04% carbon. This extra low carbon content gives the weld deposit excellent resistance against intergranular corrosion caused by carbide precipitation. USA 316L electrodes are used for welding 18% Cr – 12% Ni – 2.5% Mo stainless steels where the corrosion resistant qualities of AISI 316L are required. This electrode has smooth spray arc transfer and produces a weld deposit with concave very fine bead appearance and exceptional self releasing slag. USA 316L electrodes are most commonly used in the textile, paper, cellulose, and chemical equipment industries for the fabrication of 316L, 318 and 319L stainless steel products. 316L-17 has a wider welding current range and may be used in all-position however with the slower freezing slag care should be used out of position.

TYPICAL WELDING PROCEDURES; DCEP & AC

Diameter	Amps	Diameter	Amps
3/32”	40-85	1/8”	65-120
5/32”	95-165	3/16”	130-210

Arc Length = short arc, Flat use 15°angle from 90°, Vertical up & Overhead use weaving techniques within puddle
(3/16” diameter Flat & Horizontal only)

Procedures may vary with change in position, base metals, filler metals, equipment and other changes.
When welding vertical reduce amperage 10-20%

TYPICAL CHEMISTRY (%) & WELD METAL PROPERTIES

Carbon	0.031	Molybdenum	2.24
Manganese	0.71	Phosphorus	0.034
Silicon	0.74	Sulfur	0.016
Chromium	18.25	Nickel	11.71
Iron	Balance	Copper	0.25

Elongation		45%
Yield Strength	(psi)	54,000
Tensile Strength	(psi)	78,000

AVAILABLE SIZES: TF316L-17 = 3/32”, 1/8”, 5/32”, 3/16”

SPECIFICATIONS; **ANSI/AWS** A5.4 E316L-17
ASME SFA 5.4 E316L-17

EAST COAST
7010-G Reames Rd
Charlotte, NC 28216
Tel (888) 522-8296
Fax (704)598-6673

GULF COAST
4755 Alpine Drive #100A
Stafford, TX 77477
Tel (877) 711-9274
Fax (281)313-6332

WEST COAST
8535 Utica Ave
Rancho Cucamonga, CA 91730
Tel(800)830-9033
Fax (909)291-4586

Warehouse Distribution Center – Dayton, Ohio
Head Office – Puyallup, Washington