

**AWS CLASSIFICATION** A5.22-95 E316LT0-X

**DESCRIPTION**

Stoody<sup>®</sup> FH stainless steel, flux cored wires are designed for flat and horizontal welding applications, using either 100% CO<sub>2</sub> (X=1) or Argon / CO<sub>2</sub> (X=4) gas mixtures. These wires exhibit a spray like arc transfer with very low levels of spatter, a slag system that is essentially self-releasing, a smooth evenly rippled bead appearance, and deposition rates which are obtained at lower levels of heat input than competitive products.

Stoody<sup>®</sup> 316LT-1 FH wires can be used to join AISI 316 and 316L commonly used in the rubber, chemical, petrochemical and dye industries.

**TYPICAL DEPOSIT CHEMISTRY (wt%)**

GAS	75 Ar / 25 CO <sub>2</sub>	100% CO <sub>2</sub>
Carbon	0.030	0.026
Manganese	1.5	1.4
Silicon	0.7	0.7
Chromium	19.2	18.9
Nickel	12.3	12.3
Molybdenum	2.5	2.5
Ferrite Number	9	8

**NOTES:**

- Chemical composition values are typical and were developed using in accordance with AWS A5.22-95 procedures. Actual test results may vary depending on welding parameters and base metal composition.
- Ferrite values were determined with the Magne Gage.
- Ferrite values may vary depending on specific operating parameters.

**STANDARD SIZES & PACKAGING**

Diameter	Packaging	Part #
.035" (0.9mm)	25# WB, Can Pack	11919700
.045" (1.2mm)	33# WB, Can Pack	11910500
1/16" (1.6mm)	33# WB, Can Pack	11910200

**OPERATIONAL CHARACTERISTICS / WELDING PARAMETERS (DCEP)**

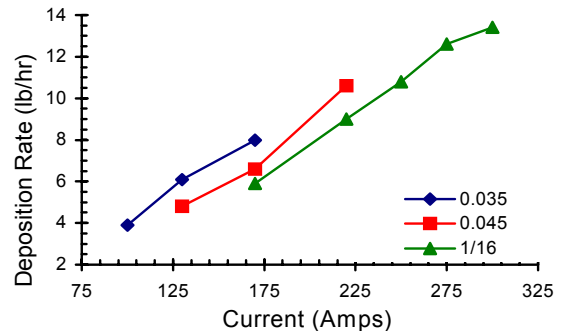
	Low	Optimum	High
<b>.035" (0.9mm)</b>			
Amps	120	150	180
Volts	24	25 / 26	28
WFS, in/min	375	460	550
(m/min)	(9.5)	(11.7)	(14.0)
<b>.045" (1.2mm)</b>			
Amps	135	200	250
Volts	23	26	31
WFS in/min	200	350	450
(m/min)	(5.0)	(8.9)	(11.4)
<b>1/16" (1.6mm)</b>			
Amps	200	250	300
Volts	24 / 26	26 / 28	28 / 30
WFS in/min	175	250	325
(m/min)	(4.5)	(6.4)	(8.3)

**NOTES:**

- 3/8" - 1/2" (10-12mm) electrical stickout.
- When using Argon / Carbon Dioxide mixtures, voltage may be reduced by up one volt to improve weldability and bead appearance.

**TYPICAL DEPOSIT CHARACTERISTICS**

GAS	75 Ar / 25 CO <sub>2</sub>	100% CO <sub>2</sub>
Tensile Strength, Ksi (MPa)	88 (610)	82 (570)
Elongation (%)	35	36
Yield Strength, Ksi (MPa)	65 (450)	60 (415)



**Stoody Company**

5557 Nashville Road • Bowling Green, KY 42101  
1-800-227-9333

PDS-SS-W-007  
Revision 3  
04/18/03

Notice: The information contained or otherwise referenced herein is presented only as "typical", without guarantee or warranty. Stoody expressly disclaims any liability from any reliance thereon. Typical data are those obtained when welded and tested in accordance with Stoody's internal procedures. Other tests and procedures may produce different results. No data is to be construed as a recommendation for any welding condition or technique not controlled by Stoody.