

**Technical  
data sheet**

011121MBA

**Cored welding wire****TETRA V 316XL-G****CLASSIFICATION**

ASME IIC SFA 5.22 / AWS A 5.22:	E316LT1-4
EN ISO 17633-A:	T 19 12 3 L P M21 1
EN ISO 17633-B :	TS316L-F M21 1
Equivalent Material number:	1.4430
ASME IX Qualification	QW432 F-N° 6 QW442 A-N° 8

**DESCRIPTION**

- Rutile flux cored stainless steel wire for gas shielded arc welding
- 19% chromium - 12% nickel - 3% molybdenum - low carbon deposit; with controlled ferrite number for optimum toughness
- Attractive bead appearance, very good penetration and high productivity
- Excellent X-ray soundness
- Specifically designed for out-of-position welding
- Maximum productivity for completion of vertical welds
- Welded with classical economic Ar-CO<sub>2</sub> mixtures

**APPLICATIONS**

TETRA V 316XL-G is suitable for welding 316L stainless steels type and is specifically dedicated for cryogenic application and LNG (thanks to the controlled ferrite)

**Examples:**

AISI	UNS	Material number	EN Symbol
316	S31600	1.4401	X5 CrNiMo 17-12-2
316L	S31603	1.4404	X2 CrNiMo 17-13-2
316LN	S31653	1.4406	X2 CrNiMoN 17-12-2
316Ti	S31635	1.4571	X6 CrNiMoTi 17-12-2
318	S31640	1.4583	X10CrNiMoNb 18-12

**TYPICAL ALL-WELD METAL ANALYSIS**

C	Mn	Si	Cr	Ni	Mo	S	P
0.03	1.52	0.40	19	12	2.7	0.008	0.02

Typical ferrite level: 4 FN

**MINIMUM ALL-WELD METAL MECHANICAL PROPERTIES**

Rm [MPa]	Rp0.2% [MPa]	A <sub>5</sub> [%]	CVN [J]
510	320	30	-196°C: 27

**TYPICAL ALL-WELD METAL MECHANICAL PROPERTIES**

Rm [MPa]	Rp0.2% [MPa]	A <sub>5</sub> [%]	CVN [J]
600	490	35	-196°C: 32

**SHIELDING GAS**

EN ISO 14175: M21 (Ar + 15 - 25% CO<sub>2</sub>)

**OPERATING CONDITIONS**

Diameter [mm]	Current type	Current [A]	Voltage [V]	Stick-out [mm]	Gas flow
1.0	DC (+)	100 - 250	20 - 32	12 - 20	10 - 20 l/min.
1.2	DC (+)	130 - 270	22 - 35	12 - 25	10 - 20 l/min.

**WELDING POSITIONS**

All positions

**PACKAGING**

Diameter	1.0 mm		1.2 mm	
	EN ISO 544 – ASME IIC SFA-5.2 M			
Spool type	S200	BS300	S200	BS300
Weight	5 kg	15 kg	5 kg	15 kg

Other packaging and other diameters: please consult us