



# Smoothcor 71T-11

**Classification:**

E71T-11 per AWS A5.20, SFA 5.20.

**Description:**

**Smoothcor 71T-11** is a carbon steel, flux cored wire for use without external gas shielding. This flux cored wire is intended for semi-automatic and automatic welding of carbon steel in single pass and limited multiple pass applications. **Smoothcor 71T-11** is designed to operate on straight polarity (DCEN).

**Characteristics:**

**Smoothcor 71T-11** operates with no external shielding gas. The arc transfer is quite smooth and exceptionally low in spatter. The soft arc minimizes burn through on thin materials and in instances of poor fit up. A fast freezing slag facilitates welding in all positions.

**Applications:**

**Smoothcor 71T-11** is ideal for those applications where the use of shielding gas is inappropriate and where charpy v-notch toughness is not of prime concern. This flux cored wire is well suited for butt, lap, and fillet welds on steels from 16 gauge through 1/2". When welding on steels from 3/8" to 1/2" thick, a preheat of 325-375° F is strongly recommended. The .045" flux cored wire is not usually welded on steels greater than 3/8" thick, normally the 1/16" diameter electrode (or larger) is selected for these applications. The versatility of **Smoothcor 71T-11** makes it an excellent selection for assembly and maintenance welding in all positions.

**Typical Mechanical Properties:**

<b>Ultimate Tensile Strength (psi)</b>	89,400
<b>Yield Strength (psi)</b>	66,600
<b>Percent Elongation</b>	23.5

**Typical Deposit Composition:**

Wt%	C	Mn	Si	P	S	Al
	0.21	0.30	0.15	0.010	0.010	1.50

**Recommended Welding Parameters (use DCEN):****Optimum**

Diam (in)	Welding Position	Amps	Wire Feed Speed	Volts	ESO (in)
.045	V-up, OH	170	155	17	3/8-3/4
.045	Flat, Hor.	200	190	17	3/8-3/4
1/16	V-up, OH	170	90	16	1/2-3/4
1/16	Flat, Hor.	250	110	18	1/2-3/4
5/64	Flat, Hor.	300	75	18	3/4-1
3/32	Flat, Hor.	325	65	19	3/4-1

Notice: The results reported are based upon testing of the product under controlled laboratory conditions in accordance with American Welding Society Standards. Actual use of the product may produce different results due to varying conditions. An example of such conditions would be electrode size, plate chemistry, environment, weldment design, fabrication methods, welding procedure and service requirements. Thus the results are not guarantees for use in the field. The manufacturer disclaims any warranty of merchantability or fitness for any particular purpose with respect to its products.