# SPIRIT<sup>®</sup> II 400

# FINELINE<sup>™</sup> HIGH DEFINITION PLASMA CUTTING TECHNOLOGY



## **KEY FEATURES**

The Spirit<sup>®</sup> II series plasma cutting power sources with FineLine<sup>™</sup> High Definition Plasma Cutting Technology delivers the best cut quality in the industry. Our combination of patented processes, torch and consumable design ensures a precise gas flow that creates a consistent shape in the plasma arc.

- Exceptional pierce, cut and marking capabilities, virtually dross free, with high definition edge quality of 2 degrees or less of a cut edge bevel
- Designed to use up to 78% less plasma gas than the competition for lower operating costs
- Robust design components with rigorous manufacturing and testing standards for exceptional product reliability and productivity.

Processes » Plasma Cutting and Marking

**Output »** 400A DC @ 100% Duty Cycle

**Product Number »** See literature E15.17

Cutting Capacity					
Туре	Production Pierce	Max. Thickness Edge Start, No Dross			
Mild Steel	2.0 (50 mm)	3.0 in. (75 mm)			

# **OPERATING DATA**

1-1/2 (38.0)

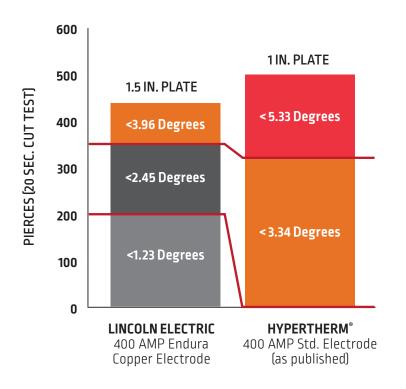
35 (0.895)

Mild Steel				Stainless Steel				
Amp	Thickness in. (mm)	Speed ipm (m/min.)	Gas	Атр	Thickness in. (mm)	Speed ipm (m/min.)	Gas	
30	0.036 (1.0) 0.075 (2.0) 0.135 (3.0)	105 (2.615) 65 (1.615) 40 (1.285)	O <sub>2</sub> Plasma O <sub>2</sub> Shield	50	0.075 (2.5) 0.120 (3.0) 1/4 (6.0)	105 (2.565) 65 (1.685) 40 (1.075)		
50	0.075 (2.5) 0.125 (3.0) 1/4 (6.0)	200 (4.885) 180 (4.660) 75 (2.075)	O, Plasma Air Shield	70	0.135 (3.0) 3/8 (6.0)	120 (3.210) 50 (2.050)	Air Plasma N <sub>2</sub> Shield	
	0.125 (3.0)	190 (4.995)		100	3/8 (10.0) 1/2 (12.0)	80 (1.935) 55 (1.540)		
70	1/4 (5.0) 3/8 (6.0)	120 (3.265) 75 (3.105)		150	1/4 (6.0) 1/2 (12.0) 3/4 (20.0)	150 (3.910) 85 (2.330) 45 (1.030)		
100	1/4 (6.0) 1/2 (12.0) 3/4 (20.0)	150 (3.950) 65 (1.850) 35 (0.800)		200	1/4 (6.0) 5/8 (16.0) 1 (25.0)	200 (5.220) 75 (1.890) 40 (1.050)	H17 Plasma N <sub>2</sub> Shield	
150	1/4 (6.0) 1/2 (12.0) 1 (25.0)	165 (4.305) 90 (2.485) 40 (1.040)		275	1/2 (12.0) 3/4 (20.0) 1 (25.0)	120 (3.220) 80 (1.940) 55 (1.435)		
200	1/4 (6.0) 1/2 (12.0) 3/4 (20.0) 1 (25.0)	230 (6.100) 120 (3.160) 75 (1.810) 50 (1.310)		400	1/2 (12.0) 1 (25.0) 1-1/2 (38.0) 2 (50.0)*	105 (3.415) 50 (1.690) 30 (0.895) 18 (0.410)		
	1/2 (12.0) 3/4 (20.0)	125 (3.290) 90 (2.190)		70	3/16 (5.0)	80 (2.030)	-	
275	1 (25.0) 1-1/4 (32.0)	65 (1.690) 45 (1.120)		100	1/4 (6.0)	100 (2.625)		
	1/2 [12.0] 3/4 [20.0]	160 (4.205) 110 (2.700)		150	1/2 (12.0) 3/4 (20.0)	60 (1.610) 40 (0.940)		
400	1 (25.0) 1-1/2 (38.0) 2 (50.0) 2-1/2 (65.0)*	85 (2.200) 50 (1.275) 33 (0.860) 15 (0.381)		200	3/8 (10.0) 5/8 (16.0) 1 (25.0) 3/8 (10.0)	80 (2.010) 60 (1.515) 35 (0.915) 85 (2.140)	H17 Plasma N <sub>2</sub> Shield	
3 (75.0)* 8 (0.203) Aluminum				260	3/4 (20.0) 1 (25.0)	55 (1.315) 33 (0.875)		
50	0.080 (2.0)	90 (2.360)	Air Plasma N <sub>2</sub> Shield		1/2 (12.0)	105 (2.750)		
70	0.080 (2.0) 3/16 (5.0) 1/2 (12.0)	250 (6.400) 80 (1.920) 30 (0.820)		400	1 (25.0) 1-1/2 (38.0) 2 (50.0)*	50 (1.310) 30 (0.7765) 18 (0.470)		
100	1/4 (6.0) 3/8 (10.0) 1/2 (12.0)	105 (2.710) 90 (2.210) 70 (1.890)		* Requires edge sta	art or moving pierce			
150	1/4 (6.0) 1/2 (12.0) 3/4 (20.0)	145 (3.770) 90 (2.430) 45 (0.990)						
200	1/4 (6.0) 1/2 (12.0) 3/4 (20.0)	190 (4.995) 110 (2.995) 65 (1.575)						
275	3/8 (10.0) 1/2 (12.0) 3/4 (20.0)	160 (3.930) 125 (3.375) 85 (2.055)						
400	1/2 (12.0) 1 (25.0) 1-1/2 (38.0)	150 (3.950) 75 (1.945) 35 (0.895)						

### **CUT QUALITY OVER CONSUMABLE LIFE**



#### Spirit II 400 » 400A, 1.5 in. (38.1 mm) Mild Steel Based on testing performed in lab conditions in 2012





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