

# TOMAHAWK® 1538

## Air Plasma Cutting System



### KEY FEATURES

The Tomahawk 1538 Plasma cutting power sources are built to handle harsh environmental conditions using Lincoln tunnel technology to separate the PCB's and sensitive parts from the contaminating cooling airflow. The improved mains voltage tolerances and robust metal case with large protective rubber corners also make these machines suitable for operation on site with a generator or within a workshop environment.

The new Lincoln Plasma torches are designed to focus on three elements. Starting: using an innovative striking system without HF to save and extend the lifetime of the electrodes. Performance: using a circular airstream at very high speed, coupled with special electrode and nozzle designs which concentrates the plasma stream. The extremely concentrated plasma stream increases the travel speed and cutting performance to best in class. Lifetime: the enhanced airstream cools the electrode and nozzle that extends the lifetime.

### ADVANTAGE

- » **Flexible**  
multiple torch configuration, delivered with mechanised and handheld torch
- » **Faster**  
higher cutting speeds and larger plate thickness
- » **Complete**  
Moisture separator and pressure reducer included
- » **Concentrated plasma stream**  
Less heat input, less distortion
- » **Variety of materials**  
Steel, Stainless, Aluminium and more

## OPERATING DATA

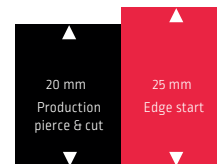
	Thickness mm	ArcVoltage (V)	TravelSpeed (mm/min)	CuttingHeight (mm)
<b>100A MILD STEEL</b>				
	6	127	3810	2,4
	10	128	2235	2,4
	12	130	1524	2,4
	15	134	1041	2,4
	20	138	812	2,4
	25	150	482	Edge Start
<b>80A MILD STEEL</b>				
	6	127	3098	2
	10	127	1676	2
	12	132	1066	2
	15	135	812	2
	20	139	559	2
	25	144	432	Edge Start
<b>60A MILD STEEL</b>				
	6	136	2286	2
	10	145	1092	2
	12	148	711	2
	15	143	584	2
	20	148	381	Edge Start
<b>40A MILD STEEL</b>				
	0,5	131	8890	2
	0,7	131	8890	2
	1,2	132	8890	2
	1,5	133	8890	2
	2	134	6858	2
	3	138	2540	2
	5	140	1727	2
	6	142	1220	2

## BENEFITS

- Extremely energy efficient inverter design that significantly lowers energy consumption
- Pierce and production cut 20 mm mild steel - maximum
- Patented Impulse Start Technology - Utilizes advanced starting circuit for increase consumable life and cut quality improvement over the life of the electrode and nozzle
- Universal Voltage Input eliminates the need for additional power conversion, therefore minimizing the up front costs
- CNC Interface allows easy integration for mechanised applications
- Quick Change Torch Leads save time
- Engineered for mechanised cutting applications
- Voltage divider board is available as an option for use of Tomahawk 1538 with a torch height control system
- Extremely robust design components and testing standards achieve high product reliability. Rigorous manufacturing and testing standards deliver a robust system and maximize uptime

## TH 1538

Production pierce and cut to 20mm mild steel (edge start 25mm)



## TECHNICAL SPECIFICATIONS

Tomahawk TH 1538	
Primary Voltage	400 V 3ph (+/-15%) 50-60 Hz
Fuse Size	32A (slow)
Weight	34 kg
Dimensions	455 mm x 301 mm x 640 mm
Protection Class	IP23
Insulation Class	H
Compliance	EN60529; EN 60974-1 EN60974-7; EN 60974-10

Current Range	20 - 100A
Required Inlet Pressure	6,0 - 7,5bar
Rated Input	13,7kW @ 40% 7,1kW @ 100%
Rated Output (40°C)	100A @ 40% 80A @ 100%
Flow Rate	180 +/- 20% l/min @ 5,5bar
Torch	LC105M Length 7,5m / 15m

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