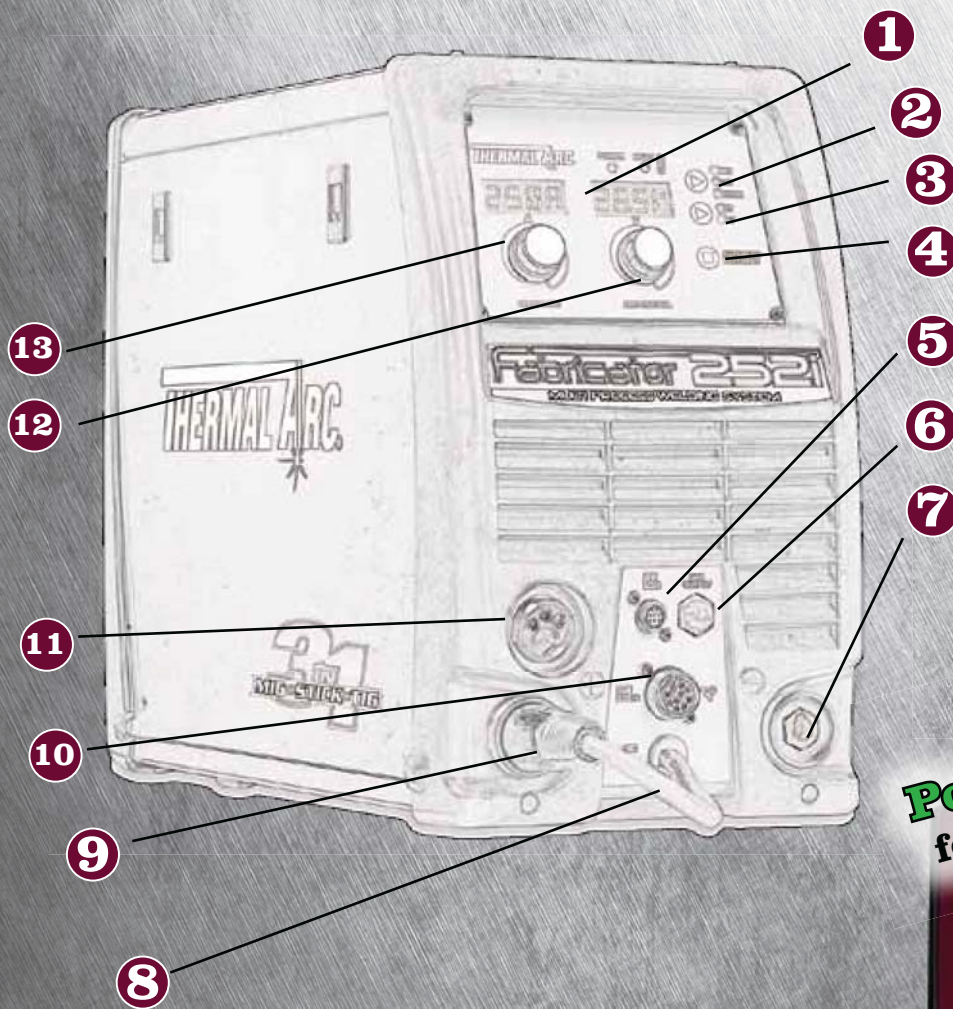


252i INVERTER

MULTIPROCESS WELDING SYSTEM



- 1) Digital Meters
- 2) Process Selection
- 3) Trigger Latch Function
- 4) Advanced Features
- 5) 8 pin Receptacle
- 6) Gas Outlet for TIG Torch
- 7) Negative Weld Output 50 mm Dinse Terminal

**Featuring
Power Factor Correction**
for more efficient operation



- 8) MIG Torch Polarity Cable
- 9) Positive Weld Output 50mm Dinse Terminal
- 10) 10 pin Receptacle for Spool Gun
- 11) MIG Torch Euro Connector
- 12) MIG Voltage Control
- 13) Wirespeed / Amperage Control

Fabricator 252i
MULTI PROCESS WELDING SYSTEM

DC

**300
AMP**

**230
V**

**1
PHASE**

**CC
CV**



Fabricator 252i

MULTI PROCESS WELDING SYSTEM

The Thermal Arc Fabricator 252i is a full multi process, digital control, DC, CC/CV, MIG/Stick/Lift TIG inverter power supply. This is the ultimate unit designed for precision MIG, DC TIG and Stick welding.

MACHINE FEATURES:



Comprehensive Welding Setup Chart for welding process parameters

Metal 2 Roll wire drive system with quick change drive rolls and single tension arm

Three Process Capability:

MIG (GMAW/FCAW), **STICK** (SMAW), **TIG** (GTAW).

MIG:

- * **Infinite Voltage Control** with optimized starting performance.
- * **Inductance Control** for arc stability and spatter control.
- * **Tweco MIG Gun** with 3m cable and industry standard Euro connection.
- * **Durable Metal Feed Plate** features 2 roll drive system, quick change reversible drive rolls and easy-to-set single scaled wire tension knob.
- * **100, 200, or 300mm Spool Capacity** allows easy installation of wire spool sizes.
- * **Spool Gun** ready.

STICK:

- * **Adjustable Arc Force Control** for optimum STICK electrode performance.

TIG:

- * **Lift TIG Start:** Provides TIG arc starting without use of high frequency.

Other Features:

- * **PFC Power Factor Correction:** Up to 40% more electrically efficient than conventional MIG Welders.
- * **Digital Meters:** Voltage and Amperage; Preview and Hold capability.
- * **Excellent Portability:** Lightweight, less than 30kg.
- * **Comprehensive Setup Chart:** Weld set up guide for optimum welding performance over a wide range of materials and shielding gases.
- * **Trigger Control:** 4T (Latch) eliminates operator fatigue.
- * **Remote Receptacle:** Enables connection of remote control devices and Spool Gun.
- * **Quick Change Polarity:** Simple quick change polarity (no tools required) from the front of the power source.
- * **Overload Protection:** Shuts down the power source to protect the internal electrical components from overheating.
- * **IP23S:** Suitable for outdoor use.
- * **Advanced Features:** Includes Pre & Post Flow, Down Slope, Hot Start, Spot, Stitch, Burn Back, Wire Sharp, Arc Hour Runtime, Run-In Speed.

CONTROL PANEL

Power Indicator

The Green power indicator illuminates in the presence of power on the control circuitry

Digital Meters WFS / AMPS and Volts

Left Knob

Adjust weld Process value

- MIG - Wirefeed speed
- TIG - Amperage
- STICK - Amperage

Right Knob

Primary function to set MIG volts

- MIG - Push (1 sec) for Inductance
- STICK - Push (1 sec) for Arc Force or Dig feature



Fault Indicator

The Fault will illuminate yellow when any of the faults are detected

Process Mode Button

Depress to change process:

- MIG (GMAW/FCAW)
- TIG (GTAW)
- STICK (SMAW)

Trigger Latch Button

Depress to change Trigger Fn:

- 2T (On/Off)
- 4T (Trigger Hold)
 - Once the weld arc has started, release the trigger and continue welding
 - Activate the trigger again or brake the welding arc to finish welding

Advanced Feature Button

Depress & Release to enter or exit

Depress & Hold to purge shielding gas

ADVANCED FEATURES

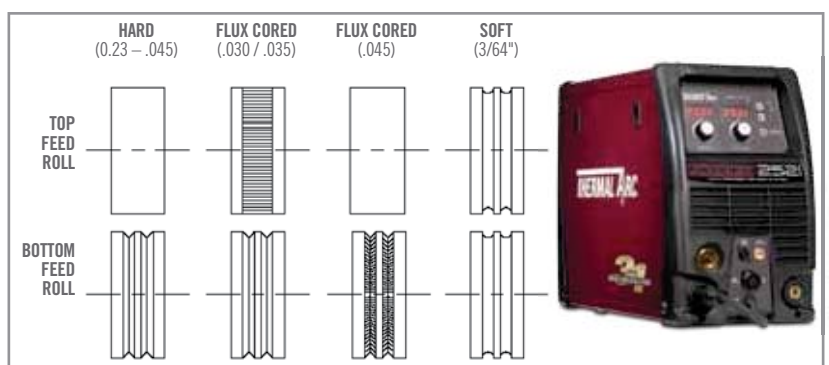
The Fabricator® 252i welding characteristics are optimized to supply the best welding performance whether in the MIG, TIG or Stick modes. In those situations when you need more control for special weld applications or productivity enhancements go to the Advanced Features if required.

FUNCTION	MIG	TIG	STICK	DESCRIPTION
Operator Controls	Local / Remote	Local / Remote	Local / Remote	Determines whether the control is at the machine or from a remote device
Preflow Time	0 - 5.0 sec.	0 - 5.0 sec.		The time shielding gas is turned on before the arc is initiated
Hot Start	-	-	On/Off - Time - Amps	Higher burst of amps to help initiate the stick electrode arc
Run-In	30 - 150%	-	-	Slower or higher percentage of the set wire feed speed before the arc is initiated to optimize arc starting
Spot Weld	On/Off - Time	-	-	Enables Spot Welding
Stitch Weld	On/Off - Time (Stitch/Dwell)	-	-	Enables Stitch or Skip Welding
Down Slope	-	0 - 30.0 sec.	-	Eliminates the crater that can form at the end of the weld
Burnback	0 - 1.0 sec	-	-	Eliminates the wire from sticking in the weld puddle
Wire Sharp	OFF / ON	-	-	Sharpens the wire ensuring good arc start repeatability
Postflow Time	0 - 30.0 sec.	0 - 30.0 sec.	-	The time shielding gas remains on after arc is turned off
Wire Feed Speed Units	IPM / mpm	-	-	Can be set to "Inches per Minute" or "Meters per Minute"
Arc Hour Accumulated Run Time	0 - 10,000 hrs.	0 - 10,000 hrs.	0 - 10,000 hrs.	Records welding arc time
Restore Factory Defaults	No / Yes	No / Yes	No / Yes	Returns power source to the original factory settings

In addition, the Advanced Features Button can be used to initiate a 30 second gas line purge function to facilitate gas tank connection and setup. Simply press and hold the button for approximately (2) seconds, gas will purge for (30) seconds. It will stop if pressed again.

DRIVE ROLLS & OUTLET GUIDES

DRIVE ROLLS			
Wire Size	Wire Type	Top Feed Roll	Bottom Feed Roll
.023" (0.6 mm)	HARD	407002-001	407002-002
.030" (0.8 mm)	HARD	407002-001	407002-002
.035" (0.9 mm)	HARD	407002-001	407002-002
.045" (1.2 mm)	HARD	407002-001	171115-003
.030" (0.8 mm)	FLUX CORED	375832	407002-002
.035" (0.9 mm)	FLUX CORED	375832	407002-002
.045" (1.2 mm)	FLUX CORED	407002-001	170924-010
3/64" (1.2 mm)	SOFT	408023-002	408023-002
OUTLET GUIDES			
Outlet Guide, .030" - .045" (0.8 mm - 1.2 mm)			872606
Outlet Guide, .023" (0.6 mm)			872605



WELDING DC	
Maximum Output	300 Amps
MIG (GMAW/FCAW) Welding Output @ 40°C	250A / 26.5V @ 40% Duty Cycle 200A / 24V @ 60% Duty cycle 150A / 21.5V @ 100% Duty Cycle
STICK (SMAW) Welding Output @ 40°C	230A / 29.2V @ 40% Duty Cycle 200A / 28V @ 60% Duty cycle 150A / 26V @ 100% Duty Cycle
TIG (GMAW) Welding Output @ 40°C	250A / 20V @ 40% Duty Cycle 200A / 18V @ 60% Duty cycle 150A / 16V @ 100% Duty Cycle
Current Range	5-300 A
MIG Welding Voltage Range	14-30 V
Wirefeed Speed Range	1.7 – 17.8 m/min
Maximum Plate Thickness	12.7 mm
Wire Diameter Range	
Mild Steel:	0.6 - 1.2 mm
Stainless Steel:	0.6 - 0.9 mm
Aluminum: (with Spool Gun)	0.8 - 1.2 mm
Flux cored:	0.8 - 1.2 mm
Fitted Feedroll Suits MIG Wire	0.9 - 1.2 mm
Warranty Period	2 Years
Approvals	IEC 60974-1 (CE)
Protection Class	IP23S

DIMENSIONS AND WEIGHT	
Dimensions H x W x D	440 mm x 260 mm x 600 mm
Weight	29.6 kg
PRIMARY POWER	
Primary Voltage	Nominal 230 VAC
Supply Voltage Range	187-276 VAC
Number of Phases	Single Phase
Supply Frequency	50/60 Hz
Rated kVA @ 250 Amps	8.2 kVA
Lead Cord Length	2.7 m
Input Current	22.4 Amps

System Contents (W1004408)

- * Fabricator 252i Power Supply
- * 3m Tweco® TWE2
250 Amp MIG Gun
- * Tweco WeldSkill® 200 Amp
electrode holder with 4m lead
- * Tweco WeldSkill 200 Amp
ground clamp with 3 m lead
- * Drive Rolls:
 - 1.0 / 1.2mm V Groove Lower & Flat Upper (Fitted)
 - 0.6 / 0.8mm V Groove
- * Operator's Manual
- * 2.7 m Mains Lead
- * 0.6 mm Outlet Guide

Ordering Information

Fabricator 252i system package with 3m TWE2 MIG Torch	W1004408
Tweco TWE2 250A MIG Torch with 3m cable	161.550.307
26 Style TIG Torch and Accessories	W4013600
Spool Gun (required for aluminium welding)	SG200TA-25-3545
Basic Cart	W4014700
Single Cylinder Professional Cart	W4015001
Dual Cylinder Professional Cart	W4015002
Roll Cage	W4015101
Remote Foot Control, 7.6m	10-4016
Remote Hand Control, 7.6m	10-4014



Single Cylinder Cart



Dual Cylinder Cart



Basic Cart



Fabricator 252i shown on Single Cylinder Professional Cart

Consumables Storage

Accessory Drawer