

# Big Blue® 251D

Issued December 2002 • Index No. ED/5.2

**Engine-Driven  
Welder/Generator** 

## Quick Specs

### Industrial Applications

Structural Work  
Mining  
Maintenance and Repair  
Piping

### Processes

DC Stick (SMAW)  
Air Carbon Arc (CAC-A)  
Cutting and Gouging  
thru 1/4 in (6 mm)  
DC TIG (GTAW)  
Flux Cored (FCAW)

**Rated Output at 104°F (40°C)** 300 Amps at 32 VDC, 100% Duty Cycle

**Amperage Range** 40–400

**Generator Power** 3 kVA, 120/240 VAC, 26/13 A, 60 Hz while welding

**Weight** Net: 1475 lb (670 kg) Ship: 1510 lb (685 kg)

## The Power of Blue.®

**3-phase, 4-pole revolving field technology** provides efficient welding current with less horsepower than DC generator technology—less horsepower per welding amp saves fuel—as much as 20 to 30 percent. Easily connects in parallel with no special kits for heavy gouging or stud welding applications.

**Extra output** of 400 amps at 40% duty cycle to run large 1/4 in stick rod or 5/16 in air carbon arc.

**Compact and lightweight**, this low-speed diesel measures in at 24.6 x 36.5 x 56 in.

**Remote control facility** allows precise adjustment of amperage without walking back to the machine.

**Rugged controls** with no printed circuit boards.



**Five welding ranges** provide overlapping ranges and fine current control in each range for easy set-up and control of welding amperage.

**Deutz diesel engine** F3L1011, 3 cylinder diesel—29 HP at 1850 RPM. Single side service. Direct fuel injection for fuel economy and easy starts. Air/oil double-cooled diesel for maximum reliability in all environments.

**3 kW/kVA auxiliary power while welding** that is available from two 120 VAC duplex receptacles that are circuit breaker protected. Optional 240 VAC and GFCI receptacles available.



Parts and labor warranted for three years. Engine is warranted by Deutz for three years.

## Specifications (Subject to change without notice.)



Rated Output	DC Amperage Range	Max. Open-Circuit Voltage DC (Nominal)	Generator Power	Dimensions	Net Weight
250 A at 40 VDC, 100 % Duty Cycle	40–400	95 (90)	3 kVA, 120/240 VAC, 26/13 A, 60 Hz while welding	H: 36 in (927 mm)* W: 24-5/8 in (625 mm) D: 56 in (1422 mm)	Net: 1475 lb (670 kg) Ship: 1510 lb (685 kg)
300 A at 32 VDC, 100% Duty Cycle,**					

\* Height is 40-1/2 in (1029 mm) with muffler. \*\*NEMA output rating.

## Engine Specifications (Subject to change without notice.)

Engine Brand	Horsepower (HP)	Type	Weld Speed	Idle Speed (optional)	Fuel Capacity	Oil Capacity
Deutz F3L1011	29 at 1850 RPM	Three-cylinder, industrial, air/oil-cooled diesel	1800 RPM	1200 RPM	11.3 gal (43 L)	6 qt (5.5 L)



**Miller Electric Mfg. Co.**  
An Illinois Tool Works Company  
1635 West Spencer Street  
Appleton, WI 54914 USA

**International Headquarters**  
Phone: 920-735-4505  
USA FAX: 920-735-4134  
Canadian FAX: 920-735-4169  
International FAX: 920-735-4125

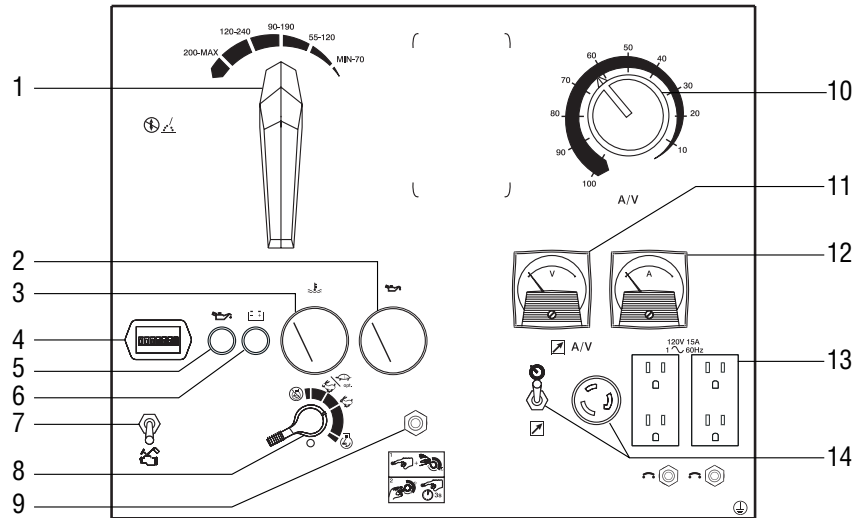
**Web Site**  
www.MillerWelds.com



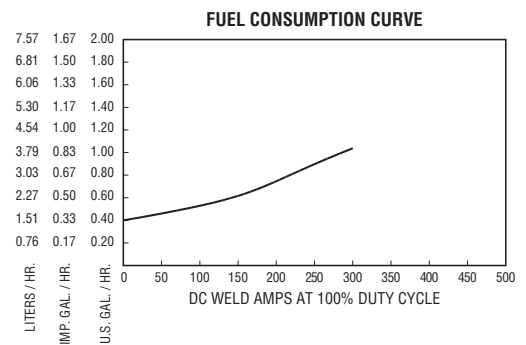
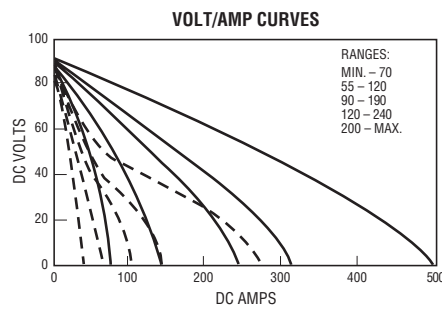
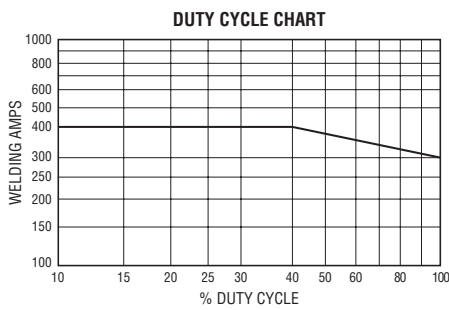
# Control Panel

1. Amp Range Switch
2. Oil Pressure Gauge/Switch\*
3. Oil Temperature Gauge/Switch\*
4. Engine Hour Meter
5. Oil Pressure Warning Light
6. Battery Charging Warning Light
7. Ether Starting Aid Switch\*
8. Engine Control Switch  
(Start, Run, Idle\*, Off)
9. Automatic Shutdown Switch\*
10. Amperage/Voltage Control
11. DC Voltmeter\*
12. DC Ammeter\*
13. 120 VAC Duplex Receptacles  
and Circuit Breakers
14. Remote A/V Switch and Receptacle

\*Optional



# Performance Data



# Genuine Miller Accessories

## Weld Ammeter and Voltmeter

#041 567 Field

Monitors weld output. Installs on welder control panel.

## Automatic Idle Kit

#043 089 Field

Extends the service life, improves fuel efficiency and reduces noise by reducing the no load engine running speed to 1200 RPM.

Note: Field kit only for units manufactured after serial number KF846842.

## Spark Arrestor (Muffler) Kit

#042 317 Field only

Mandatory when operating on California grasslands, brush, or forest-covered land, and all National Forests. For other areas, check your state and local laws.

## FA-1D Lockable Flame Arrestor Fuel Cap

#042 726 Field only

## 120 Volt GFCI Receptacle Kit

#043 097 Field

120 V duplex receptacle is ground fault protected.

## 240 Volt Auxiliary Power Receptacle Kit

#042 594 Field

240 VAC duplex receptacle is convenient and easy to install (replaces one of the standard 120 V duplex receptacles). Capable of 3 kVA at 240 VAC while welding.

## CC-10 Canvas Cover #042 596

Attractive, blue, heavy-duty, waterproof and mildew-resistant cover protects the finish of your welder.

## Genuine Miller Accessories (Continued)

**Cold Weather Starting Aid Kit**  
**#043 827** Field  
 12-volt intake manifold heater.

### Remote Controls



**RHC-3GD34A Remote Hand Control**  
**#041 122**  
 Includes 20 ft (6 m) cord.

### Trailers and Hitches



**HWY-224 Trailer #043 805**  
 A 2650 lb (1202 kg) capacity highway trailer. Welded steel tubing frame, heavy-duty axle with roller bearing hubs and leaf-spring suspension. The HWY-224 comes with jack stand, 2 in (50 mm) ball hitch, fenders and lights.

**OFR-224 Trailer #043 802**  
 A 2650 lb (1202 kg) capacity off road trailer. Welded steel tubing frame, heavy-duty axle with roller bearing hubs and leaf spring suspension. The OFR-224 comes with jack stand and 2 in (50 mm) ball hitch.

**Lunette Eye 2-1/2 in (64 mm) #043 824**  
 For use with both 224 trailers.

**Cable Tree #043 826**  
 Provides an area to conveniently wrap weld cables and extension cords. Works on all 224 and 430 trailers.

### Trailer Specifications (Subject to change without notice.)

Model	Gross Axle Weight Rating	Gross Vehicle Weight Rating	Net Payload	Height of Bed	Road Clearance	Track (Center to center of tires)	Standard Tires (Standard rating or P-size rating)	Dimensions	Net Weight
HWY-224 OFR-224	3500 lb (1588 kg)	2960 lb (1343 kg)	2650 lb (1202 kg)	18-1/2 in (470 mm)	7-1/2 in (191 mm)	52 in (1321 mm)	B78-13C	Length: 122-1/2 in (3112 mm) Width: HWY- 61 in (1549 mm)* OFR-58-1/2 in (1486 mm)	355 lb (161 kg)

\* Width at outside of fenders.

# Ordering Information

Power Source and Options	Stock No.	Description	Qty.	Price
<b>Big Blue 251D CC</b>	<b>#903 162</b> <b>#903 162-01-23</b>	Standard Package Engine Protection Package includes engine shutdown, engine gauges and auto idle		
<b>Accessories</b>				
Weld Ammeter and Voltmeter	<b>#041 567</b>	Field		
Automatic Idle Kit	<b>#043 089</b>	Field		
Spark Arrestor (Muffler) Kit	<b>#042 317</b>	Field		
FA-1D Lockable Flame Arrestor Fuel Cap	<b>#042 726</b>	Field		
120 Volt GFCI Receptacle Kit	<b>#043 097</b>	Field		
240 Volt Auxiliary Power Receptacle Kit	<b>#042 594</b>	Field		
CC-10 Canvas Cover	<b>#042 596</b>			
Cold Weather Starting Aid Kit	<b>#043 827</b>	Field		
<b>Remote Controls</b>				
RHC-3GD34A	<b>#041 122</b>	Hand control		
<b>Trailers and Hitches</b>				
HWY-224 Trailer	<b>#043 805</b>			
OFR-224 Trailer	<b>#043 802</b>			
Lunette Eye 2-1/2 in (64 mm)	<b>#043 824</b>	For use with both 224 trailers.		
Cable Tree	<b>#043 826</b>	Works on all 224 and 430 trailers.		

Date:

Total Quoted Price:



Distributed by: