Flextec[™] 450

Processes

Stick, DC TIG, MIG, Flux-Cored, Arc Gouging

Product Number K2882-1

See back for complete specs

Input Voltage 380/460/575/3/50/60

Input Current at Rated Output 3 Ph / 60% Duty Cycle: 37/27/22A

Rated Output 450A/38V/60% Output Range 10 - 500 Amps Weight/Dimensions (H x W x D) 125 lbs. (56.8 Kg) 18.8 x 14 x 26.5 in. (477 x 356 x 673 mm)

FLEXible TEChnology.

This multi-process welder delivers up to 500 amps of welding power for a variety of applications, including construction and fabrication. It features an IP23 rating for outdoor operation and storage, and the latest inverter technology will save you real dollars on the utility costs associated with your welding operations.

FEATURES

- Flexible Multi-Process Capability Including stick, Touch Start TIG® (DC), MIG, flux-cored welding and carbon arc gouging with up to a 3/8 in. (9.5 mm) carbon.
- The Future is Nowsm You no longer have to pay a price premium to gain the advantages of inverter technology over conventional welders.
 - Faster Arc Response means smoother arc action and more consistent bead appearance.
 - Low Power Consumption results in daily operational cost savings.
 - Enhanced Portability Typically 50% less weight, size and footprint.
- ▶ Simple Operation The user interface is designed with the operator in mind. Set up is easy for even the most novice welder.
- Bright Digital Amp and Volt Meters Easy to monitor, even in sunlight, and presettable for precise procedure control.
- Compact, Durable Case Tough IP23 enclosure rating ensures the Flextec™ 450 will withstand extreme field environments.
- Selectable Hot Start Turn it off for thin material or flip it on to get the extra starting amperage you need for thick, rusty or dirty material.

APPLICATIONS

- **▶** Construction
- Fabrication
- Automotive
- Production
- Education



WHAT'S INCLUDED

K2882-1 Base Unit Includes:

Power Source

RECOMMENDED WIRE FEEDERS

- ▶ LF-72, LF-74
- ▶ LN-10. DH-10
- ▶ LN-15
- LN-25 PRO, LN-25 PRO Dual Power
- LN-25 Pipe
- 115 volt input wire feeders are not supported.

FEATURES CONT'D

- Variable Arc Control In stick mode, vary the arc force to obtain the "soft" or "crisp" arc you want as conditions require. In CV modes, vary the pinch or inductance to control spatter, fluidity and bead appearance.
- Full-Featured Remote Control Capability Use a foot pedal or hand control to remotely vary output up to 100 ft. (30.5 m) away.
- Desert Duty[™] Rated Welding outputs are rated for extreme temperature operation up to 55°C.

INPUT









Two Year Extended Warranty Available in U.S.A. and Canada

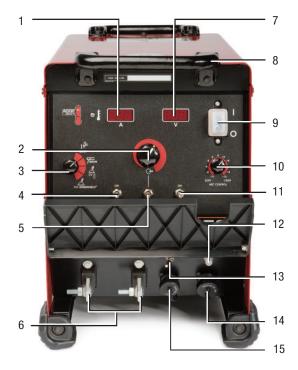








- 1. Digital Amp Meter
- 2. Output Control
- 3. Welding Process Mode
- 4. Hot Start Control
- 5. Local/Remote
- 6. Weld Output Terminal
- 7. Digital Volt Meter
- 8. Reversible Handles (Patent Pending)
- 9. Power On/Off
- 10. Arc Control
- 11. Weld Terminal On/Off Control
- 12. Circuit Breaker
- 13. Feeder Meter Polarity Switch
- 14. 14 pin Feeder Control Connection
- 15. 6 pin Remote Control Connection



SYSTEM SELECTION

One-Pak® Packages can be ordered using a single Product Number (K#). Package is not assembled. Welding wire and shielding gas must be ordered separately.

Flextec™ 450 / LF-72 Heavy Duty Wire Feeder, Includes:

- Flextec[™] 450 (K2882-1)
- LF-72 Bench Model, Heavy Duty (K2327-6)
 - · Heavy Duty Wire Reel Stand
 - Drive Roll and Wire Guide Kit .035-.045
 - Magnum® PRO 350 Gun and Cable Assembly (K2652-2-10-45)
 - Control Cable 10 ft. (3 m)
- 3/0 Welding Cable (K1842-10)
- Work Lead Package (K2149-1)
- Harris® Flowmeter Regulator and Hose (3100211)
- Heavy Duty Inverter and Wire Feeder Cart (K1764-1)

Order K2959-1

Flextec™ 450 / LF-72 Standard Duty Wire Feeder, Includes:

- Flextec[™] 450 (K2882-1)
- LF-72 Bench Model, Standard Duty (K2327-5)
 - · Standard Duty Wire Reel Stand
 - Drive Roll and Wire Guide Kit .035-.045
 - Magnum® PRO 350 Gun and Cable Assembly (K2652-2-10-45)
 - Control Cable 10 ft. (3 m)
- 3/0 Welding Cable (K1842-10)
- Work Lead Package (K2149-1)
- Harris® Flowmeter Regulator and Hose (3100211)

Order K2960-1

Flextec[™] 450 / LF-74 Heavy Duty Wire Feeder, Includes:

- Flextec[™] 450 (K2882-1)
- LF-74 Bench Model, Heavy Duty (K2426-5)
 - · Heavy Duty Wire Reel Stand
 - Drive Roll and Wire Guide Kit .035-.045
 - . Control Cable 10 ft. (3 m)
- Magnum® PRO 350 Gun and Cable Assembly (K2652-2-10-45)
- 3/0 Welding Cable (K1842-10)
- Work Lead Package (K2149-1)
- Harris® Flowmeter Regulator and Hose (3100211)
- Heavy Duty Inverter and Wire Feeder Cart (K1764-1)

Order K3033-1

Flextec™ 450 Racks

Available in a 4-Pack Rack or 6-Pack Rack

- 4-Pack Rack, Order K2956-1
- 6-Pack Rack, Order K2957-1

See Lincoln Electric bulletin E5.92 for more detailed rack information.



Shown K2957-1



Shown K2956-1



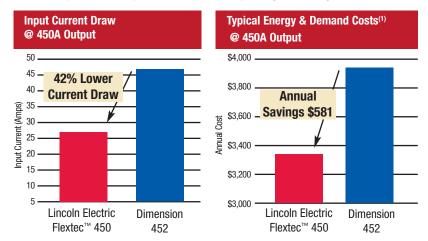
The inverter technology of the Flextec™ 450 yields a higher efficiency and power factor compared to similar conventional power sources.

FLEXTEC ENERGY SAVINGS		
	Lincoln Electric Flextec™ 450	Miller Electric Dimension 452
Efficiency (@450A Output)	87%	74%
Power Factor (@450A Output)	.95	.59

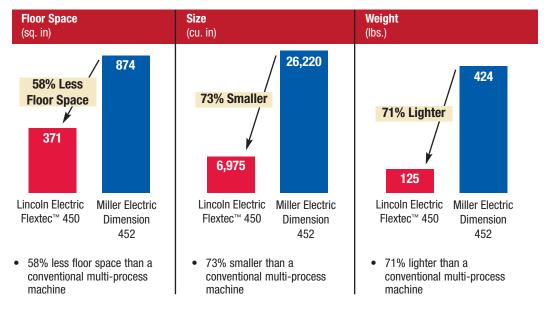


The Result is:

- Lower input current at the same output saves on input cable and fuse costs.
- · Lower power consumption results in annual operating cost savings.



 Based on: Two shifts, 8 hrs/day 5 days/week, 50 weeks/yr, 30% Operating Factor. Electric Rates of \$0.07/KWH and a demand charge of \$8/KW.



The trademarks Miller Electric® and Dimension™ are the property of Illinois Tool Works Inc. Competitive dimension data was based on published literature available at the time of printing. Actual input power and input current draw product testing was completed by Lincoln Electric personnel in Cleveland, Ohio in March, 2010. Testing results were complete and accurate at the time of posting on www.lincolnelectric.com in April, 2010.

QUALITY AND RELIABILITY

Tough PC Boards - Encapsulated components and protective trays provide best-in-class environmental protection from dust and humidity.

Fan-As-Needed™ - Reduces power consumption, dirt intake and damaging thermal cycling.

Protected Electrical Connections - Help ensure long-term reliability in unforgiving environments.

Temperature and Dirt Resistant - Double insulation and varnish on all primary components. **Repeated Life and Reliability Testing** - Salt, rain, humidity, drop, jerk, vibration, impact and others.

IP23 Rated – While the fan is operating, the machine is subjected to a rain shower that directs water 60 degrees from vertical. While the machine is still wet, it must withstand a high voltage dielectric test and an insulation resistance test.



Among other tests, the Flextec™ 450 was subjected to extreme temperature environmental testing, including heat, cold, humidity, rain and dust.



RECOMMENDED ACCESSORIES TO EXPAND MACHINE CAPABILITIES



GENERAL OPTIONS

Deluxe Adjustable Gas Regulator & Hose Kit

Accommodates CO2, Argon, or Argon-blend gas cylinders. Includes a cylinder pressure gauge, dual scale flow gauge and 4.3 ft. (1.3 m) gas hose.

Order K586-1



Harris® Argon Flowmeter/ Regulator and Hose Kit Order 3100211

Inverter and Wire Feeder Cart

Rear-wheeled cart includes front casters and no-lift gas bottle platform. Convenient handles allow for easy cable storage while full length side trays store parts and tools. Shipped fully assembled. Small footprint fits through 30 in. (762 mm) door

For stick welding, Includes 35 ft.

(10.7 m) 2/0 electrode cable with

lug 30 ft (9 1 m) 2/0 work cable

Order K1764-1

STICK OPTIONS

Accessory Kit



Accessory Kit

For stick welding. Includes 20 ft. (6.1 m) #6 electrode cable with lug, 15 ft. (4.6 m) #6 work cable with lugs, headshield, work clamp, electrode holder and sample pack of mild steel electrode. 150 amp capacity.

Order K875



Remote Output Control

Consists of a control box with choice of two cable lengths. Permits remote adjustment of output. Order K857 for 25 ft. (7.6 m)

Order K857-1 for 100 ft. (30 m)



TIG OPTIONS

Pro-Torch™ TIG Torches

A full line of air-cooled and water-cooled torches available Request Lincoln publication E12.150



Hand Amptrol™

Provides 25 ft. (7.6 m) of remote current control for TIG welding. (6-pin plug connection) Order K963-3



Foot Amptrol™

Provides 25 ft. (7.6 m) of remote current control for TIG welding. (6-pin plug connection). Order K870



Arc Start Switch

May be used in place of the Foot or Hand Amptrol™. Comes with a 25 ft. (7.6 m) cable. Attaches to the TIG torch for convenient finger control to start and stop the weld cycle at the current set on the machine.

Order K814



PRODUCT SPECIFICATIONS Net **Product Product Rated Output** Output HxWxD Weight Input **Input Current** Name Number Power Current/Voltage/Duty Cycle Range inches (mm) lbs. (kg) @ Rated Output Flextec™ 450 380/460/575/3/50/60 450/38V/60% K2882-1 37/27/22 5 - 500 Amps 18.8 x 14 x 26.5 125 (56.8)

400A/36V/100% 29/21/17 (477 x 356 x 673) K2956-1 4-Pack Rack 103/75/61A 70.25 x 37.5 x 33.0 800 (363) Flextec™ 450 (1784 x 952 x 838) 6-Pack Rack K2957-1 138/100/81A 70.25 x 49.5 x 33.0 1,100 (499) Flextec™ 450 (1784 x 1257 x 838)

> For best welding results with Lincoln Electric equipment, always use Lincoln Electric consumables. Visit www.lincolnelectric.com for more details.

CUSTOMER ASSISTANCE POLICY

The business of The Lincoln Electric Company is manufacturing and selling high quality welding equipment, consumables, and cutting equipment. Our challenge is to meet the needs of our customers and to exceed their expectations. On occasion, purchasers may ask Lincoln Electric for information or advice about their use of our products. Our employees respond to inquiries to the best of their ability based on information provided to them by the customers and the knowledge they may have concerning the application. Our employees, however, are not in a position to verify the information provided or to evaluate the engineering requirements for the particular weldment. Accordingly, Lincoln Electric does not warrant or guarantee or assume any liability with respect to such information or advice. Moreover, the provision of such information or advice does not create, expand, or after any warranty on our products. Any express or implied warranty that might arise from the information or advice, including any implied warranty of merchantability or any warranty of fitness for any customers' particular purpose is specifically disclaimed

Lincoln Electric is a responsive manufacturer, but the selection and use of specific products sold by Lincoln Electric is solely within the control of, and remains the sole responsibility of the customer. Many variables beyond the control of Lincoln Electric affect the results obtained in applying these types of fabrication methods and service requirements.

Subject to Change - This information is accurate to the best of our knowledge at the time of printing. Please refer to www.lincolnelectric.com for any updated information.

