

# IDEALARC® DC600



Shown:  
K1288-17

## INDUSTRIAL DC MULTI-PROCESS WELDERS

Rugged construction, simple controls and a 100% duty cycle output rating make these machines a sound investment for heavy duty shop applications. Add the outstanding traditional SCR rectifier arc action delivering high quality, attractive welds and your operators will agree – it's hard to go wrong with an Idealarc® DC600.



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

### Processes »

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

### Applications »

Metal Fabrication, Maintenance  
and Repair

### Output »



### Input »



### Product Numbers »

|          |                                       |
|----------|---------------------------------------|
| K1288-17 | 230/460V                              |
| K1288-18 | 230/460V with Multi-Process<br>Switch |
| K1288-22 | 230/460/575V                          |
| K1288-28 | 230/460/575V with VRD™                |
| K1365-23 | 220/380/440V                          |
| K1365-24 | 380/500V                              |
| K1365-28 | 380-415V with VRD™                    |

## FEATURES

- **Full range output voltage control** for easy operation and precise control.
- **Standard analog ammeter and voltmeter.**
- **VRD™ (Voltage Reduction Device™)** reduces OCV (open circuit voltage) when not welding for added safety (select models).
- **Mode switch** for selecting desired output characteristics.
- **115V, 15 amps, duplex auxiliary power receptacle** (60 Hz models) makes it easy to power lights, grinders and other shop tools at your work station.
- **Flat-top case** with a small footprint can be placed under a workbench or stacked up to 3 high on top of each other.
- **Windings and rectifiers** are protected against moisture and corrosive environments.
- **Seven-year warranty** on power rectifier.

## WHAT IS VRD™?

The VRD™ (Voltage Reduction Device™) provides an additional measure of safety, especially when working in an environment with a higher risk of electrical shock such as wet areas and hot, humid, sweaty conditions. The VRD™ reduces the OCV (open circuit voltage) at the welding output terminals while not welding to less than 2 volts DC. Indicator lights will also signal when output voltage during welding is above or below 30 volts DC.

Use of VRD™ does not degrade the DC600 machine rating or the ability to drive current through cables up to 200 ft. (61 m). No new welding techniques are required. The internal system does not require separate modules to operate (available on select models).

## KEY CONTROLS

1. Local/Remote Switch
2. Output Control
3. Welding Mode Switch
4. Circuit Breakers
5. Weld Terminals On or Remotely Controlled
6. On/Off Switch
7. Power Source Pilot Light
8. Ammeter/Voltmeter
9. VRD™ (select models)



## RECOMMENDED ACCESSORIES

### GENERAL OPTIONS



#### Multi-Process Switch

3-position switch allows quick and easy change from electrode positive or negative semiautomatic/automatic wire feed welding to stick or air carbon arc gouging.

Order K804-1



#### Undercarriage

Platform undercarriage with mountings for two gas cylinders at rear of welder.

Order K842



#### All-Terrain Undercarriage

For moving by hand at construction sites. Maneuvers over obstacles. Heavy-duty puncture-resistant tires.

Order K1737-3 - Flat-Free Tires

Order K1737-4 - Pneumatic Tires



#### Paralleling Kit

Permits paralleling of two power sources. (Cannot be used with VRD™ models)

Order K1611-1 for Idealarc®

DC600 above code 10500

Order K1897-1 for Idealarc®

DC600 below code 10500



#### Welding Fume Extractors

Lincoln offers a wide variety of welding fume extraction environmental system solutions, ranging from portable systems easily wheeled around the shop to shop-wide central systems servicing many dedicated welding stations.

Request Publication E13.40



#### Adapter Cable

Male 14-pin control cable to terminal strip of power source.

Order K1798



#### Accessory Kit

For stick welding. Includes 35 ft. (10.7 m) 2/0 electrode cable with lug, 30 ft. (9.1 m) 2/0 work cable with lugs, headshield, filter plate, cover plate, work clamp and electrode holder. 400 amp capacity.

Order K704



#### Remote Output Control

Provides 25 ft. or 100 ft.

(7.6 m or 30 m) of remote output control (6-pin plug connection).

Requires K864 Control Cable Adapter.

Order K857-25 ft. (7.6 m)

Order K857-1100 ft. (30 m)



#### Remote Control Adapter

Y connection adapter for connecting K857 Remote Output Control (6-pin plug connection) and wire feeder input cable (14-pin plug connection) to DC600 14-pin receptacle.

Order K864



#### TIG Module

Supplies high frequency for superior starting, contactor control, remote control capability and a gas valve for TIG welding. (Cannot be used with VRD™ models).

Order K930-2



#### Control Cable

Connects TIG Module to power source.

Order K936-1 for 9-pin to 14-pin



#### Control Cable Extension

Allows the TIG Module to be operated at distances up to 200 ft. (61 m) from the power source. Available in 45 ft. (13.7 m) sections.

Order K937-45



#### Docking Kit

Allows you to "dock" the TIG Module on top of a flat-roofed power source, or any other flat surface measuring at least 10 x 15 in. (254 x 381 mm). Includes a latch and provisions for a user-supplied padlock to lock the TIG Module in place.

Order K939-1



#### Foot Ampctrl™

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

Order K870



#### Ampctrl™ Adapter Kit

Adapts Ampctrl's 6-pin MS-type plug connection to terminal strip on power source.

Order K843



#### Deluxe Adjustable Gas

Regulator & Hose Kit Accommodates CO<sub>2</sub>, 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

| Product Name                              | Product Number | Input Power         | Rated Output Current/Voltage/Duty Cycle | Input Current @ Rated Output 100% | Output Range              | H x W x D inches (mm)                     | Net Weight lbs. (kg) |
|-------------------------------------------|----------------|---------------------|-----------------------------------------|-----------------------------------|---------------------------|-------------------------------------------|----------------------|
| Idealarc® DC600                           | K1288-17       | 230/460/3/60        | 600A/44V/100%<br>680A/44V/60%           | 108/54A                           | CV:<br>70A/13V - 780A/44V | 30.75 x 22.25 x 39.0<br>(781 x 567 x 988) | 522<br>(237)         |
| Idealarc® DC600 with Multi-Process Switch | K1288-18       |                     |                                         |                                   |                           |                                           |                      |
| Idealarc® DC600                           | K1288-22       | 230/460/575/3/60    |                                         | 108/54/43A                        | CC:<br>90A/24V - 780A/44V |                                           |                      |
| Idealarc® DC600 with VRD™                 | K1288-28       |                     |                                         |                                   |                           |                                           |                      |
| Idealarc® DC600                           | K1365-23       | 220/380/440/3/50/60 | 220/380/440/3/50/60<br>380/500/3/50/60  | 116/67/58A                        |                           |                                           |                      |
| Idealarc® DC600                           | K1365-24       | 380/500/3/50/60     |                                         | 67/51A                            |                           |                                           |                      |
| Idealarc® DC600 with VRD™                 | K1365-28       | 380-415/3/50/60     |                                         | 67-62A                            |                           |                                           |                      |

For best welding results with Lincoln Electric® equipment, always use Lincoln Electric consumables. Visit [www.lincolnelectric.com](http://www.lincolnelectric.com) for more details.

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