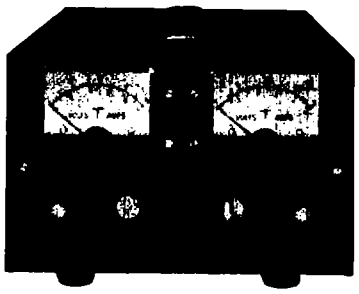
DL40-1 Dual Output Lab Series



DL40-1

Features

- Dual Outputs — Independently Adjustable
- Dual Ranges on Each Output
- Calibrated Adjustable Current Limiting
- Remote Voltage Programming
- Remote Sensing
- Series or Parallel Operation
- No Turn On/Turn Off Transients

Description

The Trygon DL40-1 Silicon Dual Lab power supply is a dual-output, dual-range unit designed for general laboratory applications. It consists of two separate internal power generating sections, each adjustable in voltage and with separate outputs on the front panel and rear barrier strip.

A variety of voltage and current outputs are available providing unexcelled operational versatility and flexibility. This output flexibility permits the user to have complete convenience in filling laboratory power supply requirements.

The Dual Lab power supply utilizes silicon semiconductors permitting operation at its maximum temperature rating without derating.

	Output		
Model	Volts	Amps	*Impedance DC-1 kHz
DL40-1	Dual 0-20	0-1	0.002
	0-20	0-2 (Parallel)	
	Dual 0-40	0-.5	
	0-40	0-1 (Parallel)	
	0-80	0-.5 (Series)	

*Nominal

This model is priced at $249.

Electrical Specifications

Input:	100-125/200-250 VAC, 47-420 Hz. (Internal Tap Change).
Output:	Dual, Floating; isolated from ground, 300 VDC max.
Regulation, Line:	0.01% or 2 mV*, for 100-125/200-250 VAC line change, at any output within specifications.
Regulation, Load:	0.01% or 3 mV*, no load to full load, at any output within specifications.
Ripple:	250 μV RMS, 2 mV p-p. (10 MHz) (20 mV p-p @ 420 Hz Input.)
Stability:	0.05% or 10 mV*, for 8 hours after warm-up. Measured at constant line voltage, load and ambient temperature.
Temperature Coefficient:	(0.02% + 400 μV)/°C.
Temperature Range:	0 to + 50°C.
Recovery Time:	25 microseconds to within 0.05% or 15 mV* of output voltage, for 100% step change in rated load.
Short Circuit Protection:	Automatic Calibrated Current Limiting.
AC Power Input Protection:	Fuse.
Remote Voltage Programming:	Over output voltage range. Scale factor approximately 1000 Ohms/volt.
Remote Sensing:	Maintains rated regulation directly at the load. Maximum line drop 0.5 volts per leg.
Voltage Adjustment Range:	Continuously adjustable, concentric vernier controls.

*Whichever is greater.

General and Physical Specifications

Design Principle:	Precision Series Pass Regulation.
Operational Mode:	Constant Voltage with automatic adjustable current limiting.
Controls:	
Voltage:	Coarse and Fine; 0 to rated output; front panel. Resolution 1 mV on fine control.
Current Limit/Voltage Range:	Front panel selector switches provide .75 or 1 amp for 0-20 V range or .05, .10, .25 or .50 amps for 0-40 V range.
Input Power:	Front panel switch and indicator, AC ON.
Metering:	Combination Volt/Ammeter with front panel selector switch for each supply.
Terminals:	
Front Panel:	Positive Output (+ V); Negative Output (— V); Ground (G). (For each supply).
Rear Panel:	(1) Negative Output — V; (2) Negative Sensing — S; (3-4-5) Remote Voltage Programming RVP; (6) Positive Sensing + S; (7) Positive Output + V; (8) Ground G. (For Each Supply).
Rack Mounting:	RPA-1 (single), RPA-2 (mounts two DL40-1 units).
Size:	7¾" W x 4⁵⁄₁₆" H x 14½" D
Weight:	17 lbs.

Detailed rack adapter data is on page 106.