

DY040 SERIES

45 Watts For Medical & Industrial Applications

60 Watts Peak Current



GENERAL SPECIFICATIONS

Input Voltage.....	90VAC to 264VAC
Input Frequency.....	47Hz to 63Hz
Inrush Current (cold).....	Less than 30A at 115VAC, 25°C
Operating Temperature.....	0 to 70°C de-rated 2.5%/°C >50°C
Storage Temperature.....	-40°C to 85°C
Cooling.....	Free Air Convection
Efficiency.....	75% to 87%
Holdup Time.....	>16ms at 115VAC
Oversvoltage Type.....	Latch Off
Overload Protection.....	Auto recovery
Short Circuit Protection.....	Auto recovery
Earth Leakage.....	300µA Max @ 240VAC
Designed in full compliance with	UL 60950-1, UL60601-1 CSA 22.2 #60950-1,60601-1 EN60950-1,EN60601-1
EMI	EN55022 "B", EN55011 "B" FCC docket class "B"
EMS.....	EN61000-4-2,-3,-4,-5,-6,-8,-11

DESCRIPTION

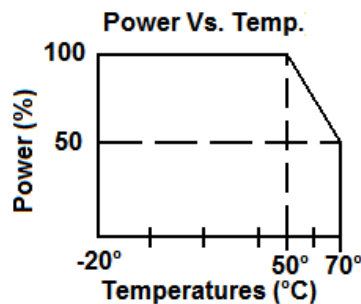
DY040 series is a universal input multiple output power supply. The series is a 45 Watt power supply in the size of 2" x 4" with a wattage density of 4.4W/in³. The efficiency can reach up to 76-87% depending on model.

FEATURES

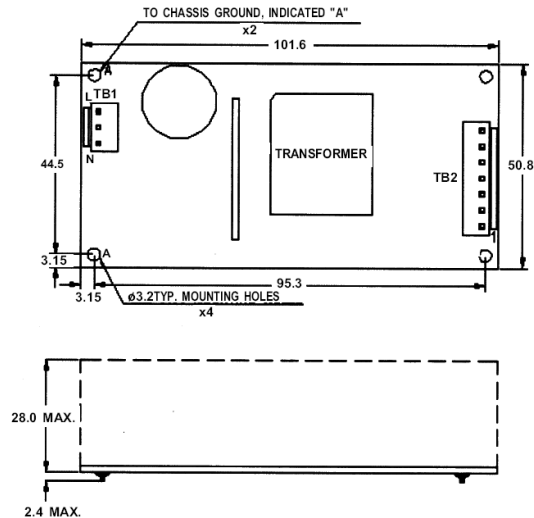
- EMI FCC Class B
- No Minimum Load Required
- Single and Multiple Output
- Universal input 90VAC to 264VAC
- Low Leakage Current
- Double Fused

APPLICATIONS

- Computer Peripherals
- Telecommunications
- Tape Drives
- Test Instrumentation Product
- Data Acquisition
- Medical & Dental



MECHANICAL SPECIFICATIONS



Connector: TB1—AC input : JST B2P3-VH or equivalent
 TB2—DC output : JST B4P-VH or equivalent (Single Output)
 JST B6P-VH or equivalent (Multiple Output)
 (DY040-7: JST B5P-VH or equivalent)

Size: 50.8mm X 101.6mm X 32.4mm, 2.0" X 4.0" X 1.2"

Mounting Holes: 44.5mm X 95.3, 1.75" X 3.75"

OUTPUT SPECIFICATIONS

Model	Watts	Voltage (Vdc)	Load (A)				Voltage Tolerance ±	Ripple & Noise Pk to Pk	Regulation	
			Min.	Rate	Max	Peak			Line	Load
DY040-2	45	+5V	0	3	4	5	±2%	1%	±1%	±3%
		+12	0	2	3	4	±5%	1%	±1%	±3%
		-12	0	0.3		-	±5%	1%	±1%	±5%
DY040-3	45	+5V	0	3	4	5	±2%	1%	±1%	±3%
		+12	0	2.3	3.3	4	±5%	1%	±1%	±3%
DY040-11	45	+5V	0	3	4	6	±1%	1%	±1%	±3%
		+24V	0	1	1.5	2.4	±5%	1%	±1%	±3%
		+12V	0	0.3		-	±5%	1%	±1%	±5%
DY040-6	45	+5V	0	7		10	±2%	1%	±1%	±3%
DY040-7	45	+12V	0	3.3		5	±1%	1%	±1%	±1%
		+5V	0	0.5		-	±5%	1%	±1%	±1%
DY040-7-1	45	+12V	0	3.3		5	1%	1%	±1%	±1%
DY040-8	45	+15V	0	2.6		4	±1%	1%	±1%	±1%
		+5V	0	0.5			±5%	1%	±1%	±1%
DY040-8-1	45	+15V	0	3.0		4	±1%	1%	±1%	±1%
DY040-9	45	+24V	0	1.7		2.5	±1%	1%	±1%	±1%
		+5V	0	0.5		-	±5%	1%	±1%	±1%
DY040-9-1	45	+24V	0	1.9		2.5	±1%	1%	±1%	±1%
DY040-14	45	+48V	0	1		1.35	±1%	1%	±1%	±1%
DY040-D	45	+3.3V	0	4		5	±2%	1%	±1%	±3%
		+5V	0	3		4	±5%	1%	±1%	±3%
		+12	0	0.3		-	±5%	1%	±1%	±5%

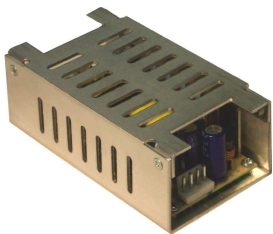
Note: Contact factory for Safety Agency Approved status.

1. Each output can provide up to peak load temporarily. Continuous operation at greater than rated load is not allowed.
2. At factory, in 60% rated load condition, each output is checked to be within voltage accuracy.
3. Line regulation is defined by changing ±10% of input voltage from nominal line at rated load.
4. Load regulation is defined by changing ±40% of measured output load from 60% rated load.
5. The ripple and noise is measured by using 15MHz bandwidth limited oscilloscope. Each output is terminated with a 0.47 µF capacitor at rated load and nominal line.
6. Hold up time is measured from the end of the last charging pulse to the time when the main output drops down to 95% output voltage at rated load and nominal line.
7. Efficiency is measured at rated load.

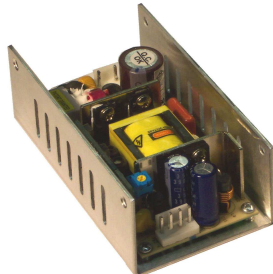
DY040 SERIES 45 WATT— PIN ASSIGNMENT

Model \ Pin	1	2	3	4	5	6
DY040-2	+5V	+5V	GND	GND	+12V	-12V
DY040-3	+5V	+5V	GND	GND	+12V	NC
DY040-11	+5V	+5V	GND	GND	+24V	+12V
DY040-6	+5V	+5V	GND	GND		
DY040-7	+12V	+12V	GND	GND	+5V	
DY040-7-1	+12V	+12V	GND	GND		
DY040-8	+15V	+15V	GND	GND	+5V	NC
DY040-8-1	+15V	+15V	GND	GND		
DY040-9	+24V	+24V	GND	GND	+5V	NC
DY040-9-1	+24V	+24V	GND	GND		
DY040-14	+48V	+48V	GND	GND		
DY040-D	+3.3V	+3.3V	GND	GND	+5V	+12V

ENCLOSURES (optional)



ECS



EUS

All Dimensions in Inches (mm)

Case Size:

4.25" x 2.38" x 1.5"
 108 x 60.5 x 38.1 mm

Mounting Holes:

1.38" x 2.75"
 35.1 x 69.9 mm

Our Standard power supplies, the DZ040 Series can be installed into a fully enclosed chassis or in a 'U' shape chassis as an option. These options offer two mounting planes. The fully enclosed option helps to reduce radiated noise.

Example Part Number:
 DY040-3ECS or DY040-3EUS

Dimension Table:

Figure	Inches	(mm)
A	4.25	108
B	2.38	60.5
C	1.50	38.1
D	2.75	69.9
E	1.38	35.1
F	0.50	12.7
G	0.75	19.1

