



PULS ML60.242

Part Number: 32112-5



KEY FEATURES AND BENEFITS

- Wide operating temperature range for extreme and outdoor applications
- Compact DIN rail design
- 100-240V input range
- Adjustable output voltage
- Up to 90.4% efficiency
- NEC Class 2/LPS Compliant
- No load power consumption < 0.75W

PRODUCT DESCRIPTION

The PULS ML60.242 is a compact, industrial-class DIN rail power supply designed for harsh environments where inrush current limitation and wide temperature capabilities are required. The ML60.242 features high immunity against electrical disturbances and operates in an extended

temperature range to reliably function in even the most demanding environments. Standard features include low no-load losses, excellent partial load efficiency, and an operating temperature range compliant with the NEMA TS2 traffic standard.

SPECIFICATIONS

HARDWARE

Enclosure

UL Compliant Fully Isolated Plastic Housing

Enclosure Degree of Protection

IP20

Installation Method

DIN RAIL (35MM)

DIN Rail Mounting

TS35/7.5 or TS35/15

LED Indicators

Output Voltage Status

Dimensions (D x W X H)

3.58" x 1.77" x 2.95"

Product Weight

0.55 lb

INPUT SPECIFICATIONS

Connector Type

Screw Terminals

Wire Gauge

10-20AWG

Recommended Tightening Torque

9lb.in

AC Voltage Range

85 ~ 264VAC

Frequency Range

47 ~ 63Hz

AC Input Current

0.66A / 230VAC

1.05A / 120VAC

DC Voltage Range

88 ~ 375VDC

DC Input Current

0.22A / 300VDC

0.62A / 110VDC

Efficiency

90.4%

Cold Start Inrush Current (Max.)

8A

No Load Power Consumption

< 0.85W

Leakage Current

< 0.85mA

OUTPUT SPECIFICATIONS

Connector Type

Screw Terminals

Wire Gauge

10-20AWG

Recommended Tightening Torque

9lb.in

DC Voltage

24VDC

Voltage Adjustable Range

24 ~ 28VDC

Rated Current (Max.)

2.5A

Current Range

0 ~ 2.5A

Rated Power

60W

Output Load Derating

1.5W/°C from

60 to 70° C

Ripple and Noise (Max.)

50mVp-p,

20Hz ~ 20MHz

Line Regulation (Max.)

10mV

Load Regulation (Max.)

100mV

Turn-on Overshoot (Max.)

200mV

Start-up Delay

90ms / 230VAC

110ms / 120VAC

Rise Time

60ms / 230VAC

50ms / 110VAC

Hold-up Time

107ms / 230VAC at Full Load

24ms / 120VAC at Full Load

PROTECTION SPECIFICATIONS

Short Circuit/ Overload

Overload Protection Type

Electronically limited Output voltage dips during overload

Over Voltage

Rated Voltage 31 ~ 32.5VDC

Over Voltage Protection Type

Shutdown output voltage, re-power required to recover

Input Transient Protection

Metal Oxide Varistor (MOV)

Internal Input Fuse

3.15A / 250VAC

SAFETY AND DIELECTRIC STRENGTH SPECIFICATIONS

Input / Output Separation

SELV per IEC/EN

60950-1

PELV per IEC/EN

60204-1, EN 50178,

IEC 62103,

IEC60364-4-41

Isolation Resistance

> 5Mohm Input to output, 500VDC

Dielectric Withstanding Voltage

Input to Output 4000VAC

Input to Earth Ground 2500VAC

Output to Earth Ground 2000VAC

ENVIRONMENTAL SPECIFICATIONS

Air Temperature

System On -40 to 74°C

System Off -40 to 85°C

Operating Humidity

5% to 95% r.H.

Vibration

2 ~ 17.8Hz: ±1.6mm

17.8 ~ 500Hz: 2g

2 hours/ axis

Shock

15g 6ms, 10g 11ms

3 bumps / direction,

18 bumps in total

Altitude

0 to 6000m

Altitude De-rating

4W / 1000m or 5°C/1000m from

2000m to 6000m

MTBF (Mean Time Between Failures)

367.1 years

EXPORT INFORMATION

Packaged Shipping Weight

0.75 lb

Package Dimensions (L x H x W)

5.9" x 2.4" x 5.5"

UPC Code

8-75404-00160-9

ECCN

4A994

Schedule B Number

8504.40.6007

Warranty

3 Years

REGULATORY APPROVALS

Emissions

European Standard EN55011

European Standard EN55022

Class B Limit

AS/NZS CISPR11, CISPR 22

Class B Limit

FCC Part 15

Class B Limit

IEC 1000-3-2/EN61000-3-2: Harmonics

IEC 1000-3-2/EN61000-3-3: Limitation of Voltage Fluctuations and Flicker

Immunity

European Standard 61000-6-1

European Standard 61000-6-2

European Standard EN55024:

IEC 1000-4-2/EN61000-4-2: Electrostatic Discharge (ESD)

IEC 1000-4-3/EN61000-4-3: Radiated Radio-Frequency (RF)

IEC 1000-4-4/EN61000-4-4: Fast Transient/Burst

IEC 1000-4-5/EN61000-4-5: Surge

IEC 1000-4-6/EN61000-4-6: Conducted Disturbance

IEC 1000-4-11/EN61000-4-11: Dips and Voltage Variations

Safety

UL508

UL60950

Other

European Standard: RoHS 2 compliant under CE

Regulatory Approvals



Note: Unless otherwise specified, the specifications listed are typical or nominal values



Warranty Information

Control offers a 30-day satisfaction guarantee and 3-year limited warranty.

Sales Support

+1.763.957.6000
sales@comtrol.com

Technical Support

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