osi1634 Series

0.5–2.5 kV; 7.5 W; high stability; low ripple



Product Introduction

The OSIMAI osi1634P/N series is a 7.5 W high-voltage DC supply of modular construction with maximum output voltage 2.5 kV and maximum current 3 mA. Features include low noise, high efficiency, compact encapsulation, low ripple and high stability. PCB surface-mount technology, DIP through-hole mounting and a potted metal enclosure are used. Positive or negative single-polarity output is available.

Product Features

- PCB surface-mount technology
- 7.5 W output power
- Voltage and current monitoring
- High stability
- Low ripple and noise
- Compact design

Specifications

Parameter	Description
Input voltage	+24 VDC ±2 VDC.
Input current	Maximum 1 A.
Output voltage	0.5–2.5 kV selectable; positive or negative single-polarity output.
Output polarity	Specify positive or negative when ordering.
Power	Maximum 7.5 W.
Voltage regulation	Line: better than 10 ppm at rated output voltage over specified input range. Load: <0.2% for full load change.
Ripple	Better than 1% peak-to-peak at rated output.
Stability	Less than 0.04% per 8 hours after 0.5-hour warm-up.
Protection	Overvoltage, overcurrent, arc and short-circuit protection.
Temperature coefficient	Voltage and current: better than 10 ppm/°C.
Ambient temperature	Operating: 0–40°C. Storage: −20–80°C.
Humidity	10–90% RH, non-condensing.
Cooling	Convection cooling.
Dimensions	W 64 × H 28.4 × D 74.6 mm.
Weight	240 g.
Interface connector	2.54-pitch pins.
Mounting	DIP through-hole mounting.

Power Supply Pin Signal Definitions

Pin	Signal	Description
1	Power ground	GND, also analog signal ground
2	24 V	+24 VDC, 1 A maximum
3	Current feedback	0–10 V = 0–100% rated output
4	Enable	Low = ON; TTL, CMOS, open collector
5	Voltage feedback	0–10 V = 0–100% rated output
6	Signal ground	Analog signal ground
7	Current setting (optional)	VCC option only: 0–10 V = 0–100% rated output ±2%; Zin = 10 MΩ
8	Voltage setting	0–10 V = 0–100% rated output ±2%; Zin = 10 MΩ
9	Reference voltage setting	+10 VDC
10	High-voltage output reference ground	GND, connected to earth
11	High-voltage output	Final power-supply output

Typical Applications

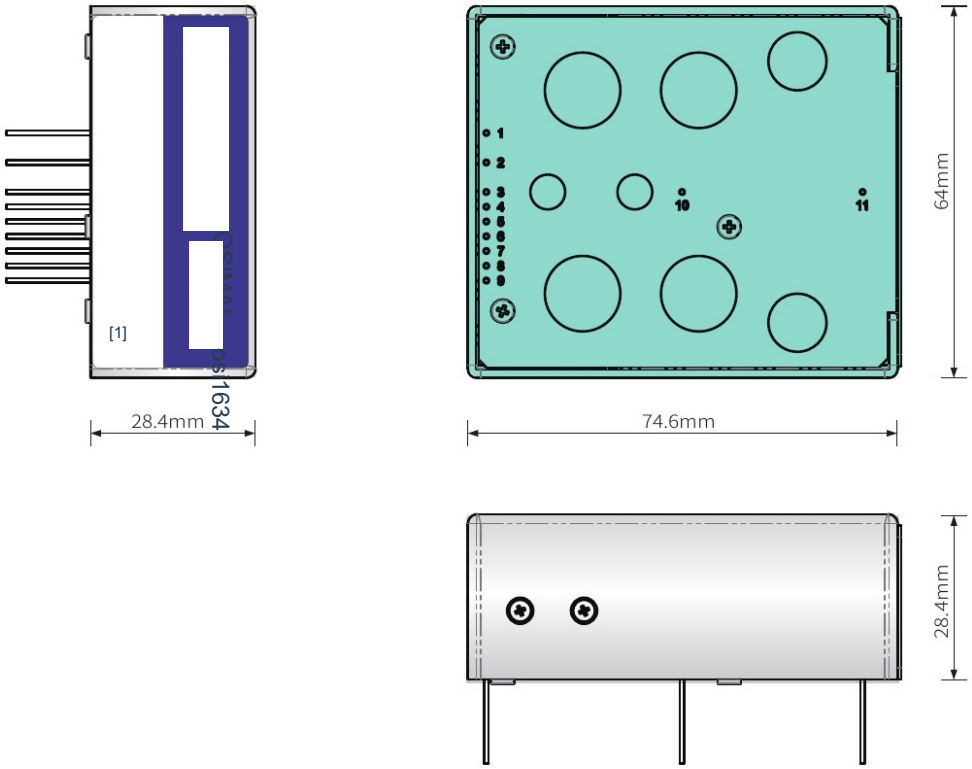
Photomultiplier tubes; electrostatic printing; electron and ion beams; electron-multiplier detectors; mass spectrometry; microchannel-plate detectors; electrostatic lenses; nuclear instrumentation.

Optional Features

Option	Function
VCC	Variable current control
HS	High stability

Special options must be ordered in advance.

Dimensions



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