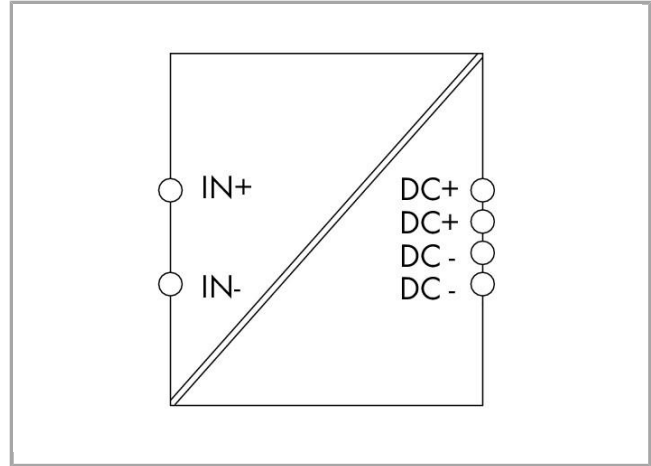


Data sheet | Item number: 787-1014/072-000

DC/DC Converter; EPSITRON® COMPACT Power; 72 VDC input voltage; 24 VDC output voltage; 2 A output current

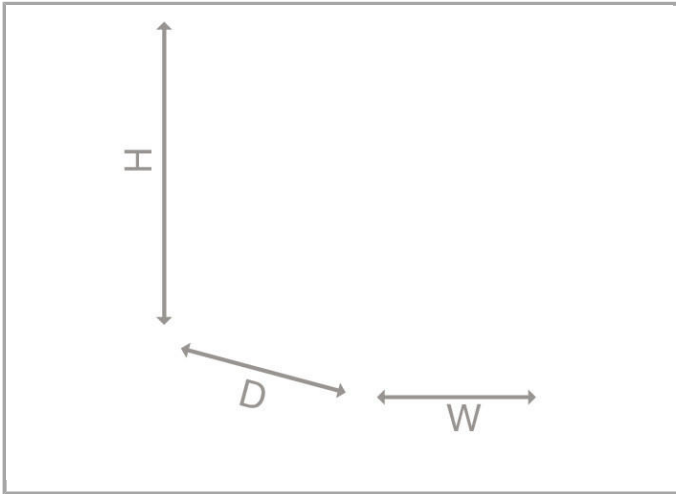


787-1014/072-000



RoHS Compliant

[BOMcheck.net](https://www.bomcheck.net)



Item description

Features:

- Switched-mode power supply
- Natural convection cooling when horizontally mounted
- Stepped profile, ideal for distribution boards or distribution boxes
- Suitable for both parallel and series operation
- Electrically isolated output voltage (SELV) per EN 60950-1/UL 60950-1
- Control deviation: $\pm 1\%$ ($\pm 10\%$ within the application range of EN 50121-3-2)
- Suitable for Railway Applications

Data

Technical Data

Input

Nominal input voltage $U_{i\text{nom}}$	DC 72 V
Input voltage range	DC 40 ... 90 V
Nominal mains frequency range	0 Hz
Input current I_i	≤ 0.79 A (72 VDC)
Discharge current	≤ 1 mA
Inrush current	≤ 30 A (NTC)
Mains failure hold-up time	≥ 8 ms (72 VDC)

Output

Nominal output voltage $U_{o\text{nom}}$	DC 24 V (SELV)
Factory preset	DC 24 V
	2 A (24 VDC); 1.6 A (in any mounting position)

Nominal output current $I_{o\text{ nom}}$

Nominal output power	48 W
Adjustment accuracy	$\leq 1 \%$
Residual ripple	$\leq 100 \text{ mV}$ (peak-to-peak)
Current limitation	$1.1 \times I_{o\text{ nom}}$ typ.
Overload behavior	Constant current

Signaling and communication

Signaling	1 x LED operation status indicator (green)
Operation status indicator	LED green (U_o)

Efficiency/Power losses:

Power loss P_v	$\leq 2 \text{ W}$ (72 VDC; no load); $\leq 9 \text{ W}$ (72 VDC; nominal load)
Max. power loss $P_{v\text{ max.}}$	10.5 W (40 VDC / 24 VDC; 2 A)
Efficiency	84 %

Fuse protection:

Internal fuse	T 4 A / 125 VDC
External fuse (recommended)	Circuit breakers 6 A, 10 A, characteristic: B or C

Safety and protection:

Insulation voltage (PRI-SEC)	4.242 kV DC
Protection class	II
Protection class	IP20 (per EN 60529)
Feedback voltage	$\leq \text{DC } 35 \text{ V}$
Overvoltage category	II
Transient protection, primary	Varistor
Overvoltage protection, secondary	Internal protection circuit $\leq 40 \text{ VDC}$ (in case of an error)
Short circuit protection	Yes
No-load proof	Yes
Parallel operation	Yes
Series connection	Yes
MTBF	$> 500,000 \text{ h}$ (per IEC 61709)

Connection data

Connection type (1)	Input/Output
Connection technology	CAGE CLAMP®



WAGO terminal	WAGO 740 Series
Solid conductor	0.08 ... 2.5 mm ² / 28 ... 12 AWG
Fine-stranded conductor	0.08 ... 2.5 mm ² / 28 ... 12 AWG
Strip length	6 ... 7 mm / 0.24 ... 0.28 inch

Geometrical Data

Width	72 mm / 2.835 inch
Height	89 mm / 3.504 inch
Depth	59 mm / 2.323 inch
Length from upper-edge of DIN-35 rail	55 mm / 2.165 inch

Mechanical data

Type of mounting	DIN-35 rail (EN 60715)
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Material Data

Flammability class per UL94	V0
Weight	250 g

Environmental Requirements

Surrounding air (operating) temperature	-40 ... 70 °C
Surrounding air (storage) temperature	-40 ... 85 °C
Relative humidity	5 ... 96 % (coated PCB)
Derating	-1.5 %/K (> 55 °C)
Pollution degree	2
Climatic category	3K3 (per EN 60721)
Shock and vibration resistance	Category 1, Class B (per EN 61373:2010)

Standards and specifications


Conformity marking	CE
Standards/specifications	EN 60950; EN 61204-3; EN 50121-3-2; EN 50125*; UL 60950*; UL 508*; DNV GL* (*pending)

Commercial data

Country of origin	DE
GTIN	4055143256544
Customs Tariff No.	85044082900

Compatible products


Marking accessories

	Item no.: 210-831 Marking strips; on reel; 2.3 mm wide; plain; Self-adhesive	210-831
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	Item no.: 210-832 Marking strips; on reel; 3 mm wide; plain; Self-adhesive	210-832
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ferrule

	Item no.: 216-201 Ferrule; Sleeve for 0.5 mm ² / 20 AWG; insulated; electro-tin plated	216-201
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	Item no.: 216-202 Ferrule; Sleeve for 0.75 mm ² / 18 AWG; insulated; electro-tin plated	216-202
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	Item no.: 216-203 Ferrule; Sleeve for 1 mm ² / AWG 18; insulated; electro-tin plated	216-203
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	Item no.: 216-221 Ferrule; Sleeve for 0.5 mm ² / 20 AWG; insulated; electro-tin plated	216-221
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	Item no.: 216-222 Ferrule; Sleeve for 0.75 mm ² / 18 AWG; insulated; electro-tin plated	216-222
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	Item no.: 216-223 Ferrule; Sleeve for 1 mm ² / AWG 18; insulated; electro-tin plated	216-223
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	Item no.: 216-241 Ferrule; Sleeve for 0.5 mm ² / 20 AWG; insulated; electro-tin plated; electrolytic copper; gastight crimped; acc. to DIN 46228, Part 4/09.90	216-241
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	Item no.: 216-242 Ferrule; Sleeve for 0.75 mm ² / 18 AWG; insulated; electro-tin plated; electrolytic copper; gastight crimped; acc. to DIN 46228, Part 4/09.90	216-242
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	Item no.: 216-243 Ferrule; Sleeve for 1 mm ² / AWG 18; insulated; electro-tin plated; electrolytic copper; gastight crimped; acc. to DIN 46228, Part 4/09.90	216-243
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	Item no.: 216-262 Ferrule; Sleeve for 0.75 mm ² / 18 AWG; insulated; electro-tin plated; electrolytic copper; gastight crimped; acc. to DIN 46228, Part 4/09.90	216-262
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	Item no.: 216-263 Ferrule; Sleeve for 1 mm ² / AWG 18; insulated; electro-tin plated; electrolytic copper; gastight crimped; acc. to DIN 46228, Part 4/09.90	216-263
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	Item no.: 216-301 Ferrule; Sleeve for 0.25 mm ² / AWG 24; insulated; electro-tin plated	216-301
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	Item no.: 216-302 Ferrule; Sleeve for 0.34 mm ² / 22 AWG; insulated; electro-tin plated	216-302
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	Item no.: 216-321 Ferrule; Sleeve for 0.25 mm ² / AWG 24; insulated; electro-tin plated	216-321
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Item no.: 216-322
 Ferrule; Sleeve for 0.34 mm² / 22 AWG; insulated; electro-tin plated

216-322

tools



Item no.: 210-720
 Operating tool with partially insulated shaft; Type 2, blade (3.5 x 0.5) mm

210-720

Downloads

Documentation

Bid Text

787-1014/072-000 Stromversorgung EPSITRON	Jan 14, 2016	doc 35.8 kB	Download
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Instruction Leaflet

EPSITRON COMPACT Switched-Mode Power Supply 72 VDC / 24 VDC, 2 A		pdf 221.8 kB	Download
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Additional Information

Disposal; Electrical and electronic equipment, Packaging	V 1.0.0	pdf 265.8 kB	Download
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CAD/CAE - Smart Data

CAD data

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Subject to changes.