



- Versions: modular and 35mm DIN rail mount
- Output voltage adjustment by front potentiometer
- Output short-circuit protection
- Built-in input voltage surge suppressor
- Used as power supply for DC electromechanical and electronic equipment
- Redundancy modules

Modular DIN rail mount switching power supplies

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Compact DIN rail mount switching power supplies with cULus

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DIN rail mount switching power supplies with maximum functionality with cULus

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MODULAR DIN RAIL MOUNT SWITCHING POWER SUPPLIES

- Single-phase
- Output voltage: 12 or 24VDC
- Output power: 10...100W.



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COMPACT DIN RAIL MOUNT SWITCHING POWER SUPPLIES

- Single-phase
- Output voltage: 24VDC
- Output power: 30...480W.



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DIN RAIL MOUNT SWITCHING POWER SUPPLIES

- Single, two and three-phase
- Output voltage: 24 or 48VDC
- Output power: 5...960W.



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REDUNDANCY MODULES

- Modular and 35mm DIN rail mount
- Output voltage: 12 or 24VDC
- Output current: 10 or 20A.

MODULAR DIN RAIL MOUNT SWITCHING POWER SUPPLIES



	PSN	PSL
Input type	Single-phase 100...240VAC	Single-phase 100...240VAC
Output type	12VDC or 24VDC	12VDC or 24VDC
Output power	12VDC: 24, 54, 90W 24VDC: 36, 60, 100W	12VDC: 10, 24, 33, 54, 72W 24VDC: 10, 24, 36, 60, 100W
Dimensions	Ultra compact	Standard
Operating temperature	-40...+70°C	-40...+71°C
Derating (typical)	Over 45°C	Over 60°C
Power on LED	●	●
Low voltage LED	—	●
Type of short circuit protection	Hiccup	Hiccup up to size 24W Fold forward for bigger sizes
cULus	—	●

DIN RAIL MOUNT SWITCHING POWER SUPPLIES



	PSN	PSE	PSL
Input type	Single-phase 100...240VAC	Single-phase 100...240VAC	Single-phase 100...240VAC (PSL1...) Two-phase 400...500VAC (PSL2...) Three-phase 400...500VAC (PSL3...)
Output type	24VDC	24VDC	24VDC or 48VDC (single-phase only)
Output power	120, 240, 480W	30, 50, 72, 100, 120W	Single-phase: 5...480W (24VDC), 30...480W (48VDC) Two-phase: 100W Three-phase: 120...690W
Dimensions	Ultra compact	Compact	Standard
Operating temperature (typical)	-40...+70°C (-20...+60°C for PSN112024L)	-25...+71°C	-35...+71°C
Derating (typical)	Over +50°C and under -25°C	Over 50°C	Over 60°C
Power on LED	●	●	●
Low voltage LED	—	—	●
DC OK output for available voltage	● (PSN112024 and PSN148024)	—	● (sizes ≥30W)
PFC	● (excluded PSN112024L)	—	● (sizes ≥120W)
Type of short circuit protection	Hiccup	Hiccup	Single-phase: fold forward (hiccup for sizes ≤18W) Two and three-phase: hiccup (fold forward for 480W)
cULus	●	●	●

Modular compact power supplies with standard functionality PSN series



PSN1M03624

new

Order code	Rated output voltage	Rated output current	Output power	Qty per pkg	Wt
	[V]	[A]	[W]	n°	[kg]
Single-phase.					
PSN1M02412	12VDC	2	24	1	0.115
PSN1M05412		4.5	54	1	0.175
PSN1M09012		7.5	90	1	0.235
PSN1M03624	24VDC	1.5	36	1	0.115
PSN1M06024		2.5	60	1	0.175
PSN1M10024		4.2	100	1	0.235

General characteristics

The switching power supplies PSN series are suitable for installation in modular switchboards, used in both civil and industrial applications. The main selling point of this series is the extremely compact dimensions.

Protections:

- Output short circuit
- Output overvoltage
- Overload
- Input voltage peaks.

Indications:

- LED indicator for power on.

Operational characteristics

- Rated supply voltage: 100...240VAC
- Mains frequency: 50/60Hz
- Rated output voltage: 12VDC (PSN1M...12) / 24VDC (PSN1M...24)
- Output voltage adjustment by front potentiometer
- High efficiency up to 90%
- 35mm DIN rail (IEC/EN/BS 60715) mounting
- Screw terminals
- Modular DIN 43880 housing; number of modules:
 - 2 for PSN1M02412 and PSN1M03624
 - 3 for PSN1M05412 and PSN1M06024
 - 4 for PSN1M09012 and PSN1M10024
- IEC degree of protection: IP20 on terminals.

Compliance

Compliant with standards: IEC/EN/BS 62368-1, EN/BS 61558-1, EN/BS 55032, IEC/EN/BS 61000-4-2, IEC/EN/BS 61000-4-3, IEC/EN/BS 61000-4-4, IEC/EN/BS 61000-4-5, IEC/EN/BS 61000-4-6, IEC/EN/BS 61000-4-11.

Modular power supplies with maximum functionality and cULus PSL series



PSL1M010...



PSL1M03312
PSL1M03624

Order code	Rated output voltage	Rated output current	Output power	Qty per pkg	Wt
	[V]	[A]	[W]	n°	[kg]
Single-phase.					
PSL1M01012	12VDC	0.83	10	1	0.065
PSL1M02412		2	24	1	0.130
PSL1M03312		2.75	33	1	0.190
PSL1M05412		4.5	54	1	0.250
PSL1M07212		6	72	1	0.380
PSL1M01024	24VDC	0.42	10	1	0.065
PSL1M02424		1	24	1	0.130
PSL1M03624		1.5	36	1	0.190
PSL1M06024		2.5	60	1	0.250
PSL1M10024		4.2	100	1	0.380

General characteristics

Switching power supplies transform an AC input voltage into a DC output one. This type of equipment is used in industrial and domestic automation fields. The power supplies are equipped with switching technology offering very high efficiency in an extremely compact size. Dimensions are compatible with modular consumer panels and its plastic housing is suitable for building automation installations as well as industrial automation applications. The wide range of power supply voltages and the choice of current outputs provide for the best adaptability to supply voltage needs of the most common electronic and electromechanical devices.

Protections:

- Output short circuit
- Output overvoltage
- Overload
- Input voltage peaks.

Indications:

- LED indicator for power on
- LED indicator for low voltage.

Operational characteristics

- Rated supply voltage: 100...240VAC
- Mains frequency: 50/60Hz
- Rated output voltage: 12VDC for PSL1M...12 types; 24VDC for PSL1M...24 types
- Output voltage adjustment by front potentiometer (except for PSL1M010...)
- High efficiency up to 89%
- 35mm DIN rail (IEC/EN/BS 60715) mounting
- Screw terminals
- Modular DIN 43880 housing; number of modules:
 - 1 for PSL1M010...
 - 2 for PSL1M024...
 - 3 for PSL1M03312 and PSL1M03624
 - 4 for PSL1M05412 and PSL1M06024
 - 5 for PSL1M07212 and PSL1M10024
- IEC degree of protection: IP20 on terminals.

Certifications and compliance

Certifications obtained: UL Listed for USA and Canada (cULus-File E318016) as Power Supplies in power circuit and motor-mounted apparatus category; EAC, RCM. Compliant with standards: IEC/EN/BS 62368-1, IEC/EN/BS 61000-6-2, IEC/EN/BS 61000-6-3, UL508, CSA C22.2 n° 107-1.

Compact DIN rail mount power supplies with standard functionality PSN series



PSN112024

new

Order code	Rated output voltage [V]	Rated output current [A]	Output power [W]	Qty per pkg n°	Wt [kg]
Single-phase.					
PSN112024L	24VDC	5	120	1	0.410
PSN112024		5	120	1	0.490
PSN124024		10	240	1	0.600
PSN148024		20	480	1	0.980

ⓘ Version without active PFC.

General characteristics

PSN are switching power supplies for DIN rail mounting characterized by extremely compact dimensions. Available in versions with output power from 120W to 480W.

Protections:

- Output short circuit
- Output overvoltage
- Overload
- Input voltage peaks
- Overheating.

Indications:

- LED indicator for power on.

Operational characteristics

- Rated supply voltage: 100...240VAC
- Mains frequency: 50/60Hz
- Rated output voltage: 24VDC
- Output voltage adjustment by front potentiometer
- High efficiency up to 94%
- Active PFC function (except PSN112024L)
- Relay output for available voltage signaling (Rdy) on types PSN112024 and PSN148024
- 35mm DIN rail (IEC/EN/BS 60715) mounting
- Screw terminals
- IEC degree of protection: IP20 on terminals.

Certifications and compliance

Certifications obtained: cULus
 Compliant with standards: IEC/EN/BS 62368-1, EN/BS 55032, IEC/EN/BS 61000-3-2, IEC/EN/BS 61000-4-2, IEC/EN/BS 61000-4-3, IEC/EN/BS 61000-4-4, IEC/EN/BS 61000-4-5, IEC/EN/BS 61000-4-6, IEC/EN/BS 61000-4-11, UL61010-1, UL61010-2-201.

Compact DIN rail mount power supplies with basic functionality PSE series



PSE105024

Order code	Rated output voltage [V]	Rated output current [A]	Output power [W]	Qty per pkg n°	Wt [kg]
Single-phase.					
PSE103024	24VDC	1.25	30	1	0.140
PSE105024		2.1	50	1	0.200
PSE107224		3	72	1	0.250
PSE110024		4.2	100	1	0.350
PSE112024		5	120	1	0.610

General characteristics

The PSE power supplies have compact dimensions and are DIN rail mountable. They are used to supply electromechanical and electronic devices with DC control, such as contactors, time relays, sensors, PLCs, DC motors, displays, SSRs and other equipment normally found in automation systems.

Versions with output power from 30W to 120W available.

Protections:

- Output short circuit
- Output overvoltage
- Overload
- Input voltage peaks.

Indications:

- LED indicator for power on.

Operational characteristics

- Rated supply voltage: 100...240VAC
- Mains frequency: 50/60Hz
- Rated output voltage: 24VDC
- Output voltage adjustment by front potentiometer
- High efficiency up to 89%
- 35mm DIN rail (IEC/EN/BS 60715) mounting
- Screw terminals
- IEC degree of protection: IP20 on terminals.

Certifications and compliance

Certifications obtained: cULus, EAC, RCM.
 Compliant with standards: IEC/EN/BS 62368-1, IEC/EN/BS 61000-6-2, IEC/EN/BS 61000-6-3, UL508, CSA C22.2 No. 107.1.

DIN Rail mount power supplies with maximum functionality PSL series



PSL100524
PSL101024
PSL101824

PSL1030...
PSL1060...

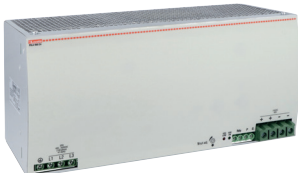


PSL1100...

PSL1240...
PSL130024



PSL148024
PSL148048



PSL396024

Redundancy modules



PSLRM1024



PSLR2024

Order code	Rated output voltage [V]	Rated output current [A]	Output power [W]	Qty per pkg n°	Wt [kg]
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Single-phase.

PSL100524	24VDC	0.21	5	1	0.120
PSL101024		0.42	10	1	0.120
PSL101824		0.75	18	1	0.150
PSL103024		1.25	30	1	0.270
PSL106024		2.5	60	1	0.340
PSL110024		4.2	100	1	0.430
PSL112024		5	120	1	0.920
PSL124024		10	240	1	1.380
PSL130024		12.5	300	1	1.400
PSL148024		20	480	1	1.920
PSL103048	48VDC	0.625	30	1	0.270
PSL106048		1.25	60	1	0.340
PSL110048		2.1	100	1	0.430
PSL112048		2.5	120	1	0.920
PSL124048		5	240	1	1.380
PSL148048		10	480	1	1.920
PSL210024		24VDC	4.2	100	1

Two-phase.

PSL312024	24VDC	5	120	1	0.800
PSL324024		10	240	1	1.100
PSL348024		20	480	1	1.720
PSL396024		40	960	1	3.400

① Two-phase connection is admissible with a 25% output power derating.

Order code	Rated voltage [V]	Rated output current [A]	Qty per pkg n°	Wt [kg]
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Modular version DIN rail mount version.

PSLRM1024	12...24VDC	10	1	0.075
PSLR2024	24VDC	20	1	0.210

DIN rail mount version.

Input voltage A	Input voltage B	LED A	LED B	Relay A	Relay B
Within limits	Within limits	ON	ON	Energ.	Energ.
Within limits	<MIN or >MAX	ON	OFF	Energ.	De-energ.
<MIN or >MAX	Within limits	OFF	ON	De-energ.	Energ.
<MIN or >MAX	<MIN or >MAX	OFF	OFF	De-energ.	De-energ.

Indications (PSLR2024)

General characteristics

Power supplies PSL... series are used to supply electromechanical and electronic devices with DC control, such as contactors, time relays, sensors, PLCs, DC motors, displays, SSRs and other equipment normally found in automation systems and networks.

Protections:

- Output short circuit
- Output overvoltage
- Overload
- Input voltage peaks.

Indications:

- LED indicator for power on
- LED indicator for low voltage.

Operational characteristics

- Rated supply voltage: 100...240VAC (PSL1005...PSL1100...) 115/230VAC self-configurable (PSL1120...PSL1480...) 400...500VAC (PSL2... and PSL3...①)
- Mains frequency: 50/60Hz
- Rated output voltage: 24VDC (PSL...24) / 48VDC (PSL...48)
- Output voltage adjustment by front potentiometer
- PFC function for types: PSL112024...PSL396024 PSL112048...PSL148048
- Parallel connection for types: PSL1100...PSL396024 (except for PSL312024)
- High efficiency up to 92%
- 35mm DIN rail (IEC/EN/BS 60715) mounting
- Screw terminals
- Plastic or metal housing depending on type
- IEC degree of protection: IP20 on terminals.

Certifications and compliance

Certifications obtained: UL Listed for USA and Canada (cULus-File E318016) as Power Supplies in power circuit and motor-mounted apparatus category; EAC, RCM. Compliant with standards: IEC/EN/BS 62368-1, IEC/EN/BS 61000-6-2, IEC/EN/BS 61000-6-3, UL508, CSA C22.2 n° 107.1.

General characteristics

They are used for the redundancy connection of two or more power supplies to enhance the reliability of the DC supply. The redundancy modules ensure a perfect insulation between the power supplies connected.

Indications (only for PSLR2024):

- LED indicator for DC voltage within limit
- Alarm relay.

Operational characteristics

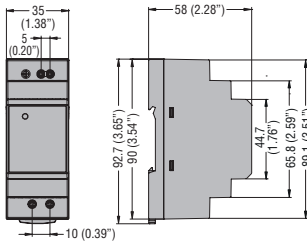
- Rated input voltage: 12...24VDC (PSLRM1024) 24VDC (PSLR2024)
- Rated input current: 10A (PSLRM1024) 20A (PSLR2024)
- Rated output current: 10A (PSLRM1024) 20A (PSLR2024)
- Maximum output current: 16A for 300s (PSLRM1024) 30A for 300s (PSLR2024)
- Modular housing DIN 43880 2 modules (PSLRM1024)
- 35mm DIN rail (IEC/EN/BS 60715) mounting
- Screw terminals
- Plastic housing
- IEC degree of protection: IP20 on terminals.

Certifications and compliance

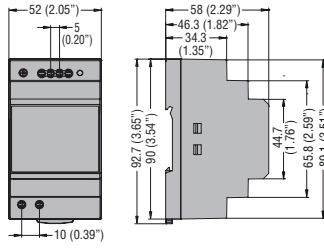
Certifications obtained: cULus (only for PSLR2024), EAC, RCM. Compliant with standards: IEC/EN/BS 60950-1 (only for PSLRM1024), IEC/EN/BS 62368-1 (only for PSLR2024), IEC/EN/BS 61000-6-2, IEC/EN/BS 61000-6-3, UL508 (only for PSLR2024), CSA C22.2 n°107.1 (only for PSLR2024).

MODULAR COMPACT DIN RAIL MOUNT SWITCHING POWER SUPPLIES WITH STANDARD FUNCTIONALITY PSN SERIES

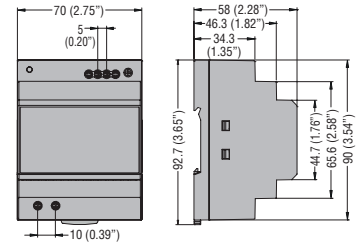
PSN1M02412 - PSN1M03624



PSN1M05412 - PSN1M06024

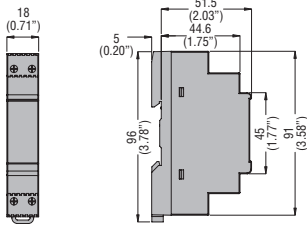


PSN1M09012 - PSN1M10024

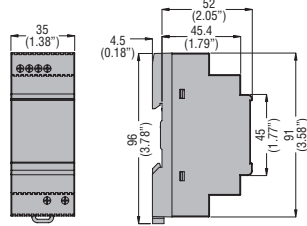


MODULAR DIN RAIL MOUNT SWITCHING POWER SUPPLIES WITH MAXIMUM FUNCTIONALITY PSL SERIES

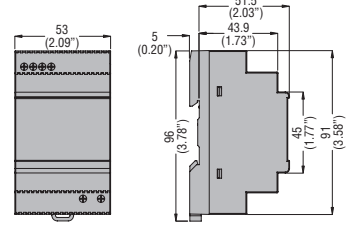
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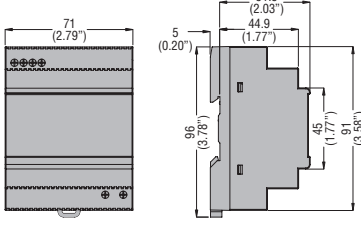
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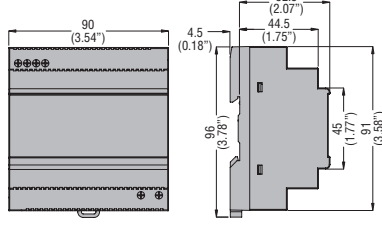
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PSL1M05412 - PSL1M06024

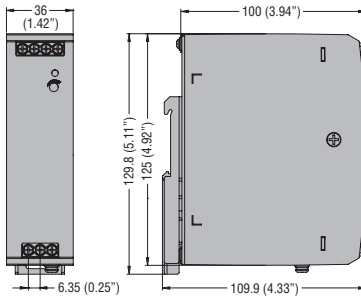


PSL1M07212 - PSL1M10024

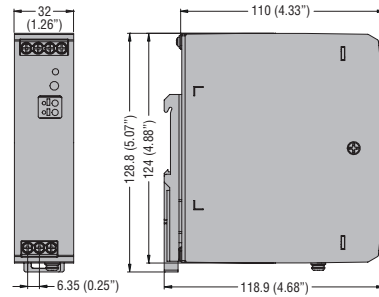


COMPACT DIN RAIL MOUNT SWITCHING POWER SUPPLIES WITH STANDARD FUNCTIONALITY PSN SERIES

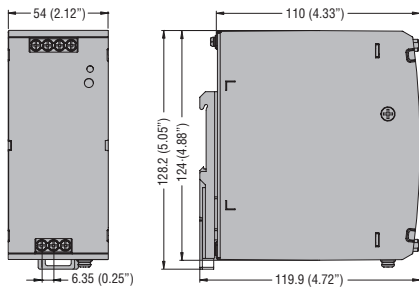
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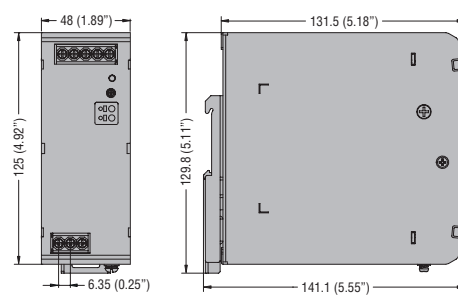
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PSN124024

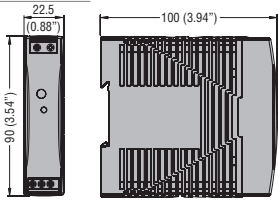


PSN148024

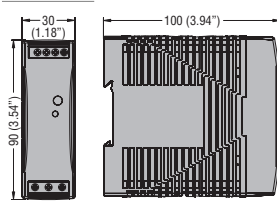


COMPACT DIN RAIL MOUNT SWITCHING POWER SUPPLIES WITH BASIC FUNCTIONALITY PSE SERIES

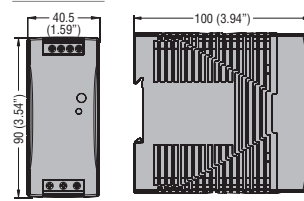
PSE103024



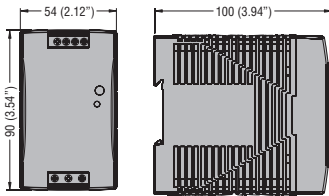
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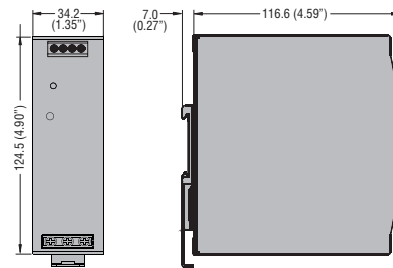
PSE107224



PSE110024

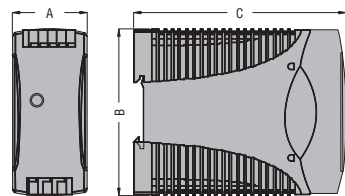


PSE112024



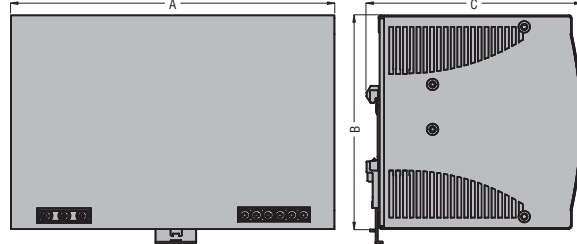
DIN RAIL MOUNT SWITCHING POWER SUPPLIES WITH MAXIMUM FUNCTIONALITY PSL SERIES

PSL100524...PSL110048 PSL210024



TYPE	A	B	C
PSL100524	22.5 (0.88")	90 (3.54")	115 (4.53")
PSL101024	22.5 (0.88")	90 (3.54")	115 (4.53")
PSL101824	22.5 (0.88")	90 (3.54")	115 (4.53")
PSL1030...	40.5 (1.59")	90 (3.54")	115 (4.53")
PSL1060...	40.5 (1.59")	90 (3.54")	115 (4.53")
PSL1100...	54 (2.12")	90 (3.54")	115 (4.53")
PSL210024	54 (2.12")	90 (3.54")	115 (4.53")

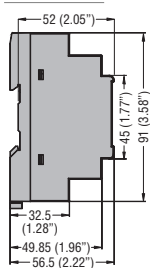
PSL112024...PSL148024 PSL312024...PSL396024



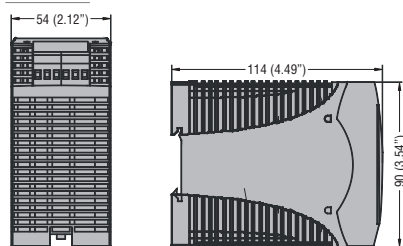
TYPE	A	B	C
PSL1120...	64 (2.52")	124.5 (4.90")	123.6 (4.87")
PSL1240...	83.5 (3.29")	124.5 (4.90")	123.6 (4.87")
PSL130024	83.5 (3.29")	124.5 (4.90")	123.6 (4.87")
PSL1480...	175.5 (6.91")	124.5 (4.90")	125 (4.92")
PSL312024	74.3 (2.92")	124 (4.88")	118.8 (4.68")
PSL324024	89 (3.50")	124 (4.88")	118.8 (4.68")
PSL348024	150 (5.90")	124 (4.88")	118.8 (4.68")
PSL396024	275.8 (10.86")	125.9 (4.96")	120.9 (4.76")

REDUNDANCY MODULES

PSLRM1024



PSLR2024

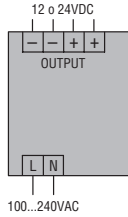


MODULAR COMPACT DIN RAIL MOUNT SWITCHING POWER SUPPLIES WITH STANDARD FUNCTIONALITY PSN SERIES

PSN1M02412
PSN1M03624

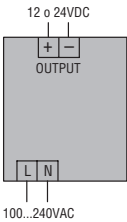


PSN1M05412 - PSN1M06024
PSN1M09012 - PSN1M10024

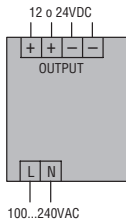


MODULAR DIN RAIL MOUNT SWITCHING POWER SUPPLIES WITH MAXIMUM FUNCTIONALITY PSL SERIES

PSL1M01012
PSL1M01024

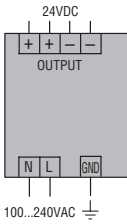


PSL1M02412 - PSL1M02424
PSL1M03312 - PSL1M03624
PSL1M05412 - PSL1M06024
PSL1M07212 - PSL1M10024

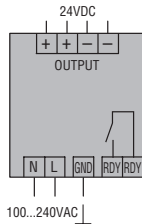


COMPACT DIN RAIL MOUNT SWITCHING POWER SUPPLIES WITH STANDARD FUNCTIONALITY PSN SERIES

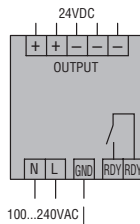
PSN112024L
PSN124024



PSN112024

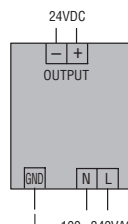


PSN148024

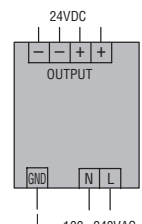


COMPACT DIN RAIL MOUNT SWITCHING POWER SUPPLIES WITH BASIC FUNCTIONALITY PSE SERIES

PSE103024

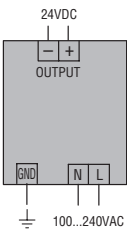


PSE105024 - PSE107224
PSE110024 - PSE112024

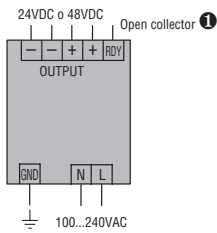


DIN RAIL MOUNT SWITCHING POWER SUPPLIES WITH MAXIMUM FUNCTIONALITY PSL SERIES

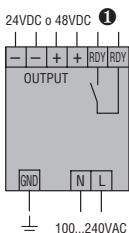
PSL100524
PSL101024
PSL101824



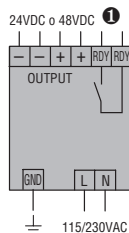
PSL1030...
PSL1060...



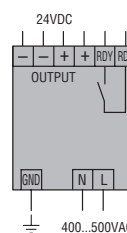
PSL1100...



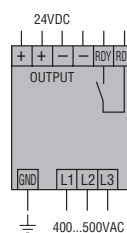
PSL1120...
PSL1240... - PSL130024
PSL1480...



PSL210024



PSL312024 - PSL324024
PSL348024 - PSL396024

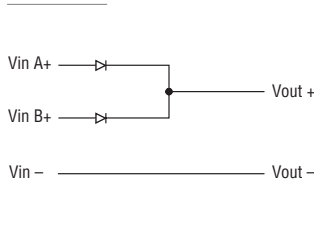


① Only for PSL1...24.

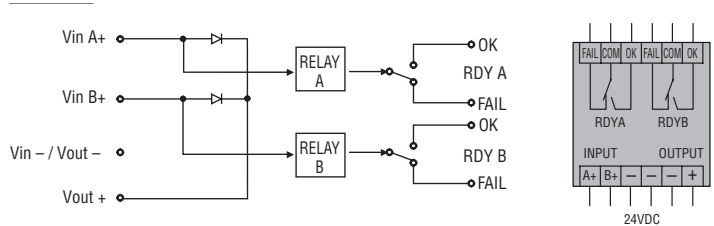
② Two-phase connection is permissible with a 25% output power derating.

REDUNDANCY MODULES

PSLRM1024



PSLR2024



MODULAR COMPACT DIN RAIL MOUNT SWITCHING POWER SUPPLIES WITH STANDARD FUNCTIONALITY PSN SERIES

TYPE	Single-phase	PSN1M02412 PSN1M03624	PSN1M05412 PSN1M06024	PSN1M09012 PSN1M10024
INPUT CHARACTERISTICS				
Rated supply voltage	Multivoltage 100...240VAC			
Operating range	85...264VAC / 120...370VDC			
Consumption (max)	900mA (115VAC) 500mA (230VAC)	1.2A (115VAC) 800mA (230VAC)	3A (115VAC) 1.6A (230VAC)	
Frequency range	47...63Hz			
PFC	-			
Insulation voltage Input/output	4000VAC			
Internal fuse ❶	T3.15A 250VAC	T3.15A 250VAC	T6.3A 250VAC	
OUTPUT CHARACTERISTICS				
Voltage	12VDC (PSN1M...12); 24VDC (PSN1M...24)			
Voltage trimming (potentiometer)	10.8...13.8VDC (PSN1M02412) 21.6...29.0VDC (PSN1M03624)	10.8...13.8VDC (PSN1M05412) 21.6...29.0VDC (PSN1M06024)	12...13.8VDC (PSN1M09012) 21.6...29.0VDC (PSN1M10024)	
Rated current	2A (PSN1M02412) 1.5A (PSN1M03624)	4.5A (PSN1M05412) 2.5A (PSN1M06024)	7.5A (PSN1M09012) 4.2A (PSN1M10024)	
Temperature coefficient	±0.02%/°C		±0.03%/°C	
Line adjustment	±0.5%			
Load adjustment	±1.5%			
Efficiency	88% (PSN1M02412) 88% (PSN1M03624)	88% (PSN1M05412) 90% (PSN1M06024)	88% (PSN1M09012) 90% (PSN1M10024)	
Overload protection	120%		110...200%	
Output short-circuit protection	Hiccup			
Output overvoltage protection	≤ 16.5VDC (PSN1M...12) ≤ 36VDC (PSN1M...24)		≤ 20VDC (PSN1M...12) ≤ 35VDC (PSN1M...24)	
Ripple and noise	120mV (PSN1M...12); 150mV (PSN1M...24)			
Parallel connection (n° of units)❷	-			
INDICATIONS				
LED for power on	Yes			
LED for low voltage	No			
Output for available voltage signaling (Rdy)	No			
AMBIENT CONDITIONS				
Operating temperature ❸	-40...+70°C			
Derating of the output power	❹			
Storage temperature	-40...+85°C			
HOUSING				
Material	Plastic			

❶ No replacement by user.

❷ Minimum load of 150mA.

❸ Maximum surrounding temperature of 50°C for use according to UL508.

❹ See the derating tables in the technical manual.

MODULAR DIN RAIL MOUNT SWITCHING POWER SUPPLIES WITH MAXIMUM FUNCTIONALITY PSL SERIES

PSL1M01012 - PSL1M01024	PSL1M02412 - PSL1M02424	PSL1M03312 - PSL1M03624	PSL1M05412 - PSL1M06024	PSL1M07212 - PSL1M10024
Multivoltage 100...240VAC				
90...264VAC / 120...375VDC				
300mA	600mA	900mA	1.5A	1.7/2.2A
47...63Hz				
—				
3000VAC (4242VDC)				
T1A 250VAC	T2A 250VAC			T3.15A 250VAC
12VDC (PSL1M...12); 24VDC (PSL1M...24)				
—	12...14VDC (PSL1M...12) 24...28VDC (PSL1M...24)			
0.83A (PSL1M...12) 0.42A (PSL1M...24)	2A (PSL1M...12) 1A (PSL1M...24)	2.75A (PSL1M...12) 1.5A (PSL1M...24)	4.5A (PSL1M...12) 2.5A (PSL1M...24)	6A (PSL1M...12) 4.2A (PSL1M...24)
±0.03%/°C				
±1%				
±1%				
79% (PSL1M...12) 80% (PSL1M...24)	84% (PSL1M...12) 85% (PSL1M...24)	83% (PSL1M...12) 84% (PSL1M...24)	84% (PSL1M...12) 86% (PSL1M...24)	86% (PSL1M...12) 89% (PSL1M...24)
125...185%	120...160%	110...150%		
Hiccup		Fold forward		
15...16.5VDC (PSL1M...12) 30...33VDC (PSL1M...24)				
50mV				
—				
Yes				
Yes				
No				
-40...+71°C				
from +61°C to +71°C by 2.5%/°C	from +56°C to +71°C by 2.5%/°C			from +61°C to +71°C by 2.5%/°C
-40...+85°C				
Plastic				

COMPACT DIN RAIL MOUNT SWITCHING POWER SUPPLIES WITH STANDARD FUNCTIONALITY **PSN** SERIES

TYPE	Single-phase	PSN112024L	PSN112024	PSN124024	PSN148024
INPUT CHARACTERISTICS					
Rated supply voltage	Multivoltage 100...240VAC				
Operating range	90...264VAC / 120...370VDC	85...264VAC / 120...370VDC			
Consumption (max)	3A (115VAC) 1.6A (230VAC)	1.5A (115VAC) 750mA (230VAC)	3A (115VAC) 1.5A (230VAC)	5.5A (115VAC) 2.5A (230VAC)	
Frequency range	47...63Hz				
PFC	No	0.98 (115VAC), 0.94 (230VAC)	0.98 (115VAC), 0.95 (230VAC)	0.99 (115VAC), 0.99 (230VAC)	
Insulation voltage Input/output	4000VAC		3000VAC		
Internal fuse ❶	T3.15A 250VAC	T4A 250VAC	T8A 250VAC	T8A 250VAC	
OUTPUT CHARACTERISTICS					
Voltage	24VDC				
Voltage trimming (potentiometer)	24...28VDC				
Rated current	5A	5A	10A	20A	
Temperature coefficient	±0.03%°C				
Line adjustment	±0.5%				
Load adjustment	±1%				
Efficiency	88%	94%	94%	94.5%	
Overload protection	105...150%	105...200%	110...200%	150%	
Output short-circuit protection	Hiccup				
Output overvoltage protection	≤ 33VDC	≤ 35VDC			29...35VDC
Ripple and noise	120mV	100mV	150mV	50mV	
Parallel connection (n° of units)❷	-				
INDICATIONS					
LED for power on	Yes				
LED for low voltage	No				
Output for available voltage signaling (Rdy)	No	Yes	No	Yes	
AMBIENT CONDITIONS					
Operating temperature ❸	-20...+60°C	-40...+70°C			
Derating of the output power	❹				
Storage temperature	-40...+85°C				
HOUSING					
Material	Metallic				

❶ No replacement by user.

❷ Minimum load of 150mA.

❸ Maximum surrounding temperature of 50°C for use according to UL508.

❹ See the derating tables in the technical manual.

COMPACT DIN RAIL MOUNT SWITCHING POWER SUPPLIES WITH BASIC FUNCTIONALITY PSE SERIES

	PSE103024	PSE105024	PSE107224	PSE110024	PSE112024
	Multivoltage 100...240VAC				
	85...264VAC / 120...375VDC				
	750mA	1.3A	1.7A	2.3A	2.9A
	47...63Hz				
	-				
	3000VAC (4242VDC)				
	T2A 250VAC		T3.15A 250VAC		
	24VDC				
	22.5...28.5VDC				
	1.25A	2.1A	3A	4.2A	5A
	$\pm 0.03\% ^\circ\text{C}$				
	$\pm 1\%$				
	$\pm 1\%$				
	Up to 86%	Up to 87%	Up to 89%	Up to 88%	Up to 89%
	140%		130%		140%
	Hiccup				
	28.8...32.4VDC				
	100mV				
	-				
	Yes				
	No				
	No				
	-25...+71°C				
	from +51°C (+46°C for PSE110024) to +71°C by 2.5%/°C				
	-40...+85°C				
	Plastic				Metallic

DIN RAIL MOUNT SWITCHING POWER SUPPLIES WITH MAXIMUM FUNCTIONALITY PSL SERIES

TYPE	Single-phase	PSL100524	PSL101024	PSL101824	PSL103024 PSL103048	PSL106024 PSL106048	PSL110024 PSL110048	
	Two-phase	—	—	—	—	—	—	
	Three-phase	—	—	—	—	—	—	
INPUT CHARACTERISTICS								
Rated supply voltage	Multivoltage 100...240VAC							
Operating range	90...264VAC / 120...375VDC			85...264VAC / 90...375VDC			90...264VAC / 120...375VDC	
Consumption (max)	200mA	300mA	500mA	800mA	1.5A	2.4A		
Frequency range	47...63Hz							
PFC	—							
Insulation voltage Input/output	3000VAC (4242VDC)							
Internal fuse ❶	T2A 250VAC						T3.15A 250VAC	
OUTPUT CHARACTERISTICS								
Voltage	24VDC (PSL...24); 48VDC (PSL...48)							
Voltage trimming (potentiometer)	21.6...28.8VDC			24...28VDC / 48...55VDC			22.5...28.5VDC / 47...56VDC	
Rated current	0.21A	0.42A	0.75A	1.25A / 0.625A	2.5A / 1.25A	4.2A / 2.1A		
Temperature coefficient	±0.03%/°C							
Line adjustment	±1%			±0.5%			±1%	
Load adjustment	±2%			±0.5%			±1%	
Efficiency	72%	76%	77%	86%	89%	86% / 88%		
Overload protection	110...165%			110...150%			110...140%	
Output short-circuit protection	Hiccup			Fold forward				
Output overvoltage protection	30...34.8VDC			30...33VDC				
Ripple & noise	50mV							
Parallel connection (n° of units)❷	—						3	
INDICATIONS								
LED for power on	Yes							
LED for low voltage	Yes			No			Yes	
Output for available voltage signaling (Rdy)	No			only on types PSL1...24				
AMBIENT CONDITIONS								
Operating temperature ❸	-20...+71°C			-40...+71°C			-35...+71°C	
Storage temperature	-25...+85°C			-40...+85°C				
Derating of the output power	from +61°C to +71°C by 2.5%/°C							
HOUSING								
Material	Plastic							

❶ No replacement by user.

❷ Two-phase connection is possible with 25% power derating, except types PSL2100... and PSL312024.

❸ Minimum load of 150mA.

❹ Maximum surrounding temperature of 50°C for use according to UL508.

PSL112024 PSL112048	PSL124024 PSL124048	PSL130024	PSL148024 PSL148048	—	—	—	—	—
—	—	—	—	PSL210024	—	—	—	—
—	—	—	—	—	PSL312024	PSL324024	PSL348024	PSL396024
Self-configurable 115/230VAC				400...500VAC Ⓢ				
90...132VAC / 180...264VAC 210...375VDC			90...264VAC 120...375VDC	340...575VAC 480...820VDC				
2.8A	5.4A	6A	7A	750mA	500mA	850mA	1.4A	2.4A
47...63Hz								
0.7	0.75		0.97	0.55			0.65	0.8
3000VAC (4242VDC)								
T3.15A 250VAC	T6.3A 250VAC	T8A 250VAC	T10A 250VAC	T2A 600VAC			T3.15A 500VAC	T5A 500VAC
24VDC (PSL...24); 48VDC (PSL...48)				24VDC				
22.5...28.5VDC 47...56VDC		22.5...28.5VDC	22.5...28.5VDC 47...56VDC	22.5...28.5VDC				
5A 2.5A	10A 5A	12.5A	20A 10A	4.2A	5A	10A	20A	40A
0.03%/°C								
±0.5%				±1%				
±1%								
86% 87%	89% 90%	89%	89% 90%	87%	89%	90%	90%	92%
110...145%	120...145%		110...140%	115...135%		120...140%	110...135%	
Fold forward				Hiccup			Fold forward	Hiccup
30...33VDC (PSL...24) 60...66VDC (PSL...48)		30...33VDC	30...33VDC (PSL...24) 60...66VDC (PSL...48)	30...33VDC				
50mV	100mV			50mV	100mV			80mV
3				2	—	2	2	3
Yes								
Yes								
only on types PSL1...24				Yes				
-35...+71°C	-40...+71°C	-30...+71°C	-40...+71°C			-30...+71°C	-40...+71°C	
-40...+85°C								
from +61°C to +71°C by 2.5%/°C		from +56°C to +71°C by 2.5%/°C		from +61°C to +71°C by 2.5%/°C			3.5%/°C (>60°C)	
Metal				Plastic	Metal			

REDUNDANCY MODULES PSLR...

TYPE	PSLRM1024	PSLR2024
INPUTS CHARACTERISTICS		
Rated input voltage	12-24VDC	24VDC
Operating range	9...35VDC	21...28VDC
Number of input	2	2
Rated input current	10A	20A
OUTPUTS CHARACTERISTICS		
Output voltage drop	0.5V	0.5V
Corrente di uscita nominale	10A	20A
Rated output current	35V	30V
Maximum output current	16A for 300s	30A for 300s
INDICATIONS		
DC ON indicator for input A	No	Yes
DC ON indicator for input B	No	Yes
Power Rdy (Ready) output	No	Ok if input >20V (±5%) or <30V(±5%) Fail if input <20V (±5%) or >30V(±5%) Rating 1A 30VDC
AMBIENT CONDITIONS		
Operating temperature / Storage temperature	-40...+71°C / -40...+85°C	
HOUSING		
Material	Plastic	