



SIVACON 8PS BUSBAR TRUNKING SYSTEM – LData

Energy data and energy for data centers – now and in the future

LData: Rely on your power supply

A reliable, continuous power supply is a substantial cost factor for data centers which continues beyond the procurement stage. Retrofits and upgrades of the power distribution system should also be possible without interrupting operations. The LData system from the SIVACON 8PS portfolio supports this with easy planning and rapid installation.

LData: Flexible and economical

With a current of up to 2,500 A, LData is a solution that already meets your future needs today. Its design is especially flexible: The compact and modular tap-off units can be plugged on along the entire length of the busbar run without a fixed grid, for example every 60 cm, to suit the width of your server racks. In addition, the use of powerline technology means LData gives you the opportunity to make your energy consumption transparent and continuously optimize it.

LData: Your benefits at a glance

- Highly available and flexible – a busbar trunking system especially for data centers
- Larger cross-sections reduce power losses, and with currents of up to 2,500 A, the system is ready right now for the needs of the future
- Cost-efficient thanks to a space-saving, modular design and power pick-up throughout the complete system
- Especially safe installation of tap-off units with two independent work operations
- Future-oriented thanks to powerline technology and integration in higher-level or cloud-based solutions
- Flexible, end-to-end support with comprehensive Siemens solutions saves costs throughout the entire lifecycle

[siemens.com/LData-system](https://www.siemens.com/LData-system)

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LData: System-based advantages



Cubic tap-off unit



L-shaped tap-off unit



Mounting above the server racks



Mounting above or below the server racks

LData components

- Incoming cable connection units
- Straight trunking units from 1 to 3 m
- Cubic tap-off units
- L-shaped tap-off units
- System accessories (end caps, fixings)

Adaptations to other SIVACON 8PS systems are possible on request

More flexibility thanks to new tap-off units

The newly designed tap-off unit makes the LData system especially versatile to use, which is an important aspect when considering future expansions or changes to your data center's infrastructure. Tap-off units can be connected at any location of the busbar run except the terminal connection point.

Especially safe mounting

The tap-off units can be selected in a variety of ways: whether as a classic cubic tap-off unit or as a new kind of L-shaped tap-off unit, with components installed at the side of the busbar run. And optionally with shiftable contacts that ensure a particularly safe mechanical fastening and electrical connection in two independent operations. When selecting the components to be installed, we address our customer's requirements – with or without powerline technology.

Standard for energy efficiency – now and in the future

The LData system was designed for high-performance data centers with a high power density and a power requirement of 1,000 A or more. LData lets you decide whether the system will offer only the admissible power loss values in accordance with the standard, or whether those values will be significantly lower. The latter option is more environmentally friendly and reduces your operating costs, since the lower power loss reduces both your power consumption and your need for cooling power.

Smart systems let you plan reliably

You can record your energy data via the LData tap-off units with communication-capable measuring and switching devices. The data transmission via powerline technology over the busbar is especially cost-efficient and easy, with no need for additional wiring. This allows you to install a state-of-the-art energy management system in accordance with ISO 50001 in an easy and cost-efficient way, and to meet the latest requirements on greater energy transparency at the same time.

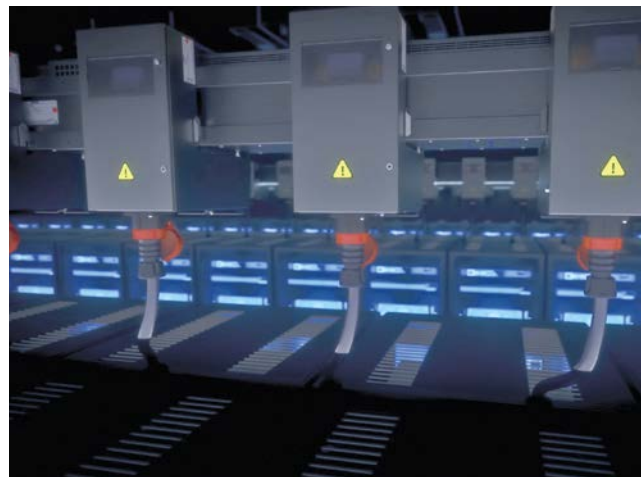
Technical data – system

Rated operational voltage U_e	[V AC]	600					
Rated frequency	[Hz]	50					
Ambient temperature min/max/ 24-hour mean	[°C]	-5/40/35					
Standards and regulations		IEC 61439-1 /-6					
Degree of protection		IP21					
Color		RAL 9005 (black)					
Rated current I_{nA} horizontal	[A]	1000	1250	1600	2000	2250	2500
Rated peak withstand current I_{pk}	[kA]	84	84	84	84	84	*)
Rated short-time withstand current I_{cw} (1 s)	[kA]	40	40	40	40	40	*)
Fire load	[kWh/m]	3.65	3.60	3.79	4.12	4.38	*)
Maximum fixing distance	[m]	3	3	3	3	3	*)
Conductor material		Aluminum	Aluminum	Aluminum	Aluminum	Aluminum	Aluminum
Conductor cross-section (phases, N, PE)	[mm ²]	524	524	698	1014	1203	*)
Housing dimensions H x W	[mm]	180 x 220	220 x 220	220 x 220	220 x 220	220 x 220	*)
Weight	[kg/m]	20	20	23	27	31	*)

*) On request

Technical data – tap-off units

	Cubic	L-shaped
Rated current I_{nc}	up to 250 A	up to 125 A
Rated operational voltage U_e	415 V	415 V
Miniature circuit breaker		
Operational current up to 32 A	•	•
Switched poles 1/3/4 poles	•	•
Molded case circuit breaker		
Switched poles 3/4 poles	•	•
Switched poles 16 A ... 125 A 160 A ... 250 A	• •	• •
Rated short-time withstand current I_{cw} (1 s) 25 kA/36 kA/55 kA	•	•
Customer connection Direct connection CEE socket outlet Cable + CEE coupling	• • •	• • •
Data transmission powerline technology Conventionally wired	• •	• •



LData: Type designations

For lengths (L, E), cable power feeds (C)
and accessories (Z)

	[NNN]	[NB]	[NN]	[B]	[B(B)]	[N(NNN)]
LData	-	...	5H	-	21	- . . - ...
Current (A)						
For L/C	Four figures					
For Z	Optional					
Conductor configuration						
For L/E/C	5 TN-S system					
	H 100% N / 100% PE					
For Z	Optional					
Degree of protection						
For L/E/C	2 Dust protection IP2X					
	1 Water protection IPX1					
For Z	Optional					
Type identification						
	L Trunking unit					
	E Trunking unit with expansion compensation					
	C Incoming cable connection unit					
	Z Accessories					
Specification for type identification (optional)						
For L/E	U Tap-off points downwards					
	F Fixed point					
For Z	E End cap					
	B Fixing					
Specification						
For L/E	Length in mm					
For C	Version number (single-digit increments)					
For Z	Version number (single-digit increments)					

Examples

Length 3000 mm	LDATA-12505H-21-LU-3000
Incoming cable connection unit	LDATA-10005H-21-C-1
End cap	LDATA-21-ZE-1

Valid for tap-off units (T)

	[NNN]	[NB]	[NN]	[B]	[NNN]
LData	-	T-	...	5H	- .1 - . - ...
Tap-off unit					
Max. current (A)					
Conductor configuration					
	5 TN-S system				
	H 100% N / 100% PE				
Degree of protection					
	2 Dust protection IP2X				
	4 Dust protection IP4X				
	1 Water protection IPX1				
Design					
	L L-shaped unit				
	C Cubic unit				
	B Basic version				
	P Premium version				
Specification					
	Version number (three-digit increments)				
Example					
Tap-off unit	LDATA-T-0635H-41-LP-001				

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