SIEMENS

Data sheet 6EP1931-2DC31



SITOP DC UPS Module/24VDC/6A/Serial

SITOP DC UPS module 24 V/6 A uninterruptible power supply with serial interface input: 24 V DC/6.85 A output: 24 V DC/6 A *Ex approval no longer available*

input				
supply voltage at DC rated value	24 V			
input voltage	DC 22 29 V			
adjustable response value voltage for buffer connection preset	22.5 V			
adjustable response value voltage for buffer connection	22 25.5 V; Adjustable in 0.5 V increments			
input current at rated input voltage 24 V rated value	6 A; + approx. 0.6 A with empty battery			
memory				
type of energy storage	with batteries			
design of the mains power cut bridging-connection	Dependent on connected battery and load current, see selection table battery module and mains buffering times as well as the relevant important information notes!			
output				
output voltage				
 in normal operation at DC rated value 	24 V			
in buffering mode at DC rated value	24 V			
formula for output voltage	Vin - approx. 0.5 V			
startup delay time typical	1 s			
voltage increase time of the output voltage typical	60 ms			
output voltage in buffering mode at DC	19 28.5 V			
output current				
rated value	6 A			
• in normal operation	0 6 A			
• in buffering mode	0 6 A			
peak current	6.3 A			
property of the output short-circuit proof	Yes			
charging current	0.2 A, 0.4 A; factory setting approx. 0.4 A			
power loss				
efficiency in percent				
 at rated output voltage for rated value of the output current typical 	95 %			
in case of operation on rechargeable battery typical	94.5 %			
power loss [W]				
 at rated output voltage for rated value of the output current typical 	7 W			
in case of operation on rechargeable battery typical	8 W			
supplied active power typical	144 W			
protection and monitoring				
product function				
 reverse polarity protection against energy storage unit polarity reversal 	Yes			
 reverse polarity protection against input voltage polarity reversal 	Yes			

display version				
● for normal operation	Normal operation: LED green (OK), floating changeover contact "Bat/OK" to setting "OK" ("OK" means: Voltage of the supplying power supply unit is greater than cut-in threshold set at the DC UPS module); Lack of buffer standby: LED red (alarm), floating changeover contact "Alarm/Bat" to setting "Alarm"; Battery replacement required: LED red (alarm) flashing with approx. 0.25 Hz, floating changeover contact "Alarm/Bat" switching with approx. 0.25 Hz; Energy storage > 85%: LED green (Bat > 85%), floating NO contact "Bat > 85" closed; Permissible contact current capacity: DC 60 V/1 A or AC 30 V /1 A			
• in buffering mode	Buffered mode: LED yellow (Bat), floating changeover contact "OK/Bat" to setting "Bat"; Prewarning battery voltage < 20.4 VDC: LED red (alarm), floating changeover contact "Alarm/Bat" to setting "Alarm"; Energy storage > 85%: LED green (Bat > 85%), floating NO contact "Bat > 85" closed			
interfaces	g. co. (_a. co.),ag			
product component PC interface	Yes			
product function communication function	No			
design of the interface	serial			
safety				
galvanic isolation between input and output	No			
operating resource protection class	Class III			
protection class IP	IP20			
standard				
for emitted interference	EN 55022 Class B			
 for interference immunity 	EN 61000-6-2			
standards, specifications, approvals				
certificate of suitability				
CE marking	Yes			
UL approval	Yes; cULus-Listed (UL 508, CSA C22.2 No. 107.1), File E197259			
EAC approval	Yes			
MTBF at 40 °C	966 183 h			
standards, specifications, approvals marine classification				
shipbuilding approval	Yes			
Marine classification association				
 American Bureau of Shipping Europe Ltd. (ABS) 	Yes			
Det Norske Veritas (DNV)	Yes			
standards, specifications, approvals Environmental Product Declaration				
Environmental Product Declaration	Yes			
Global Warming Potential [CO2 eq]				
• total	271.6 kg			
 during manufacturing 	20.9 kg			
 during operation 	250.4 kg			
after end of life	0.33 kg			
ambient conditions				
ambient temperature				
during operation	-25 +60 °C; with natural convection			
during transport	-40 +85 °C			
during storage anytropmortal enterprises and IEC 60721	-40 +85 °C			
environmental category according to IEC 60721	Climate class 3K3, 5 95% no condensation			
mechanical data	corou tuno tarminale			
type of electrical connection	screw-type terminals			
• at input	24 V DC: 2 screw terminals for 1 4 mm²/17 11 AWG 24 V DC: 4 screw terminals for 1 4 mm²/17 11 AWG			
at output for rechargeable battery module	24 V DC: 4 screw terminals for 1 4 mm ^{-/} 17 11 AWG 24 V DC: 2 screw terminals for 1 4 mm ^{-/} 17 11 AWG			
for rechargeable battery module for control circuit and status message	10 screw terminals for 0.5 2.5 mm²/20 13 AWG			
for control circuit and status message design, dimensions and weights	TO SOLEW (CITIIII als TOLOUS 2.3 HIIII /20 TO AVVO			
width × height × depth of the enclosure	50 × 125 × 125 mm			
	50 × 125 × 125 mm			
installation width × mounting height	50 ·· 220 IIIII			
required spacing	50 mm			
top bottom	50 mm			
left	0 mm			
• right	0 mm			
fastening method	Snaps onto DIN rail EN 60715 35x7.5/15			
rasterning metriod	Onapo onto Dire fall Ere out to John John			

standard rail mounting
S7 rail mounting
wall mounting
housing can be lined up
ret weight
Yes
0.45 kg

https://mall.industry.siemens.com

http://www.siemens.com/simatic-net

https://support.industry.siemens.com

https://siemens.com/tst

otherwise specified)

accessories

electrical accessories Battery module

urther information internet links

internet link

to website: Industry Mall

• to web page: selection aid TIA Selection Tool

to website: Industrial communication

• to website: CAx-Download-Manager

• to website: Industry Online Support

additional information

other information

Specifications at rated input voltage and ambient temperature +25 °C (unless

security information

security information

Siemens provides products and solutions with industrial security functions that support the secure operation of plants, systems, machines and networks. In order to protect plants, systems, machines and networks against cyber threats, it is necessary to implement – and continuously maintain – a holistic, state-of-the-art industrial security concept. Siemens' products and solutions constitute one element of such a concept. Customers are responsible for preventing unauthorized access to their plants, systems, machines and networks. Such systems, machines and components should only be connected to an enterprise network or the internet if and to the extent such a connection is necessary and only when appropriate security measures (e.g. firewalls and/or network segmentation) are in place. For additional information on industrial security measures that may be implemented, please visit https://www.siemens.com/industrialsecurity. Siemens' products and solutions undergo continuous development to make them more secure. Siemens strongly recommends that product updates are applied as soon as they are available and that the latest product versions are used. Use of product versions that are

undergo continuous development to make them more secure. Siemens strongly recommends that product updates are applied as soon as they are available and that the latest product versions are used. Use of product versions that are no longer supported, and failure to apply the latest updates may increase customer's exposure to cyber threats. To stay informed about product updates, subscribe to the Siemens Industrial Security RSS Feed under https://www.siemens.com/cert. (V4.6)

Classifications

	Version	Classification
eClass	12	27-04-07-05
eClass	9.1	27-04-07-05
eClass	9	27-04-07-05
eClass	8	27-04-06-90
eClass	7.1	27-04-06-90
eClass	6	27-04-06-90
ETIM	9	EC000382
ETIM	8	EC000382
ETIM	7	EC000382
IDEA	4	4149
UNSPSC	15	39-12-10-11

Approvals Certificates

General Product Approval



Manufacturer Declaration Declaration of Conformity





<u>Miscellaneous</u>

For use in hazardous locations

Marine / Shipping







last modified: 12/20/2023 🖸