

CPS System E L i T - C_{lassic}

Central battery system (CPS) for the supply of safety and emergency sign lamps 230V AC/DC according to VDE0108-100, DIN EN 50171 and DIN EN 50272.

Classic version with contactor switching groups and downstream fuses. Switching devices freely programmable for continuous or standby switching

The CPS system has the following standard equipment and features:

- 7 Inch Touchscreen-Display
- Intuitive operation via Touch-Display
- Max 66 circuits - fuse 10A
For charger >4.2A or more than 4 switching devices max. 40 circuits
- Up to 8 switching devices – DS or BS freely selectable
- 8 switching inputs freely programmable (potential free)
- 8 relay outputs freely programmable
- 24VDC for mimic panel
- Bus connection for external modules
- USB interface for keyboard, mouse or USB memory stick
- TCP / IP interface for networking or visualization
- Easy commissioning of the system via menu navigation
- Automatic test equipment and integrated test book
- Central Monitoring for up to 253 systems for visualization and Control
- Charger with IU characteristic with separate charging controller and control of redundant charging modules
- Charging modules with high efficiency
- Temperature-controlled charging characteristic
- Combi housing with battery compartment -
Type of protection: IP 20 colour RAL 7035
Door stop right, cable entry from top
Dimension (HxWxD): 1800mm x 800mm x 600mm
battery comp.: 3 x (HxWxD): 300mm x 795mm x 562mm
- for the installation of batteries max: 110Ah





Signaling and remote Control Panel according DIN EN 50172 (VDE 0108-100)
for displaying ready, battery operation and fault as well as a key switch.

Technical data

Supply voltage: 24 VDC
 Connection: 6pol cable
 Color: pure white (similar to RAL-No.: 9010)
 Dimension (HxWxD): 60x60x44,5mm
 (Suitable for Surface mounting and flush mounting)



Signaling and remote Control Panel according DIN EN 50172 (VDE 0108-100)
for displaying ready, battery operation and fault as well as a key switch.

Supply voltage: 24 VDC
 Connection: 6pol cable
 Color: pure white (similar to RAL-No.: 9010)
 Surface mounting Dimension
 Dimension (HxWxD): 83x83x52mm
 Flush mounting
 Dimension (HxWxD): 83x83x35mm



BMT - Bus-compatible signaling and remote Control Panel
according DIN EN 50172 (VDE 0108-100)

Never lose a key again! The panel is operated via buttons that are protected against unauthorized switching by a security code.

The signal reading is connected via the 4-wire RS485 bus
 Up to 5 BMT can be operated in parallel on one system

LED indicator: emergency light blocked, system ready, fault, battery operation, DS On
 Keys for: emergency light blocked, permanent lights On/Off, Alarm Off, Code Input
 Acoustic message: In case of fault (can be switched off)

Typ: BMT - AP Surface mounting

Specifications

Connection: 1Y(St)Y 2x2x0,8mm²
 Bus interfaces: RS 485
 Dimension (HxWxD): 83x83x52mm



Typ: BMT - UP Flush mounting

Specifications

Connection: 1Y(St)Y 2x2x0,8mm²
 Bus interfaces: RS 485
 Dimension (HxWxD): 83x83x28mm



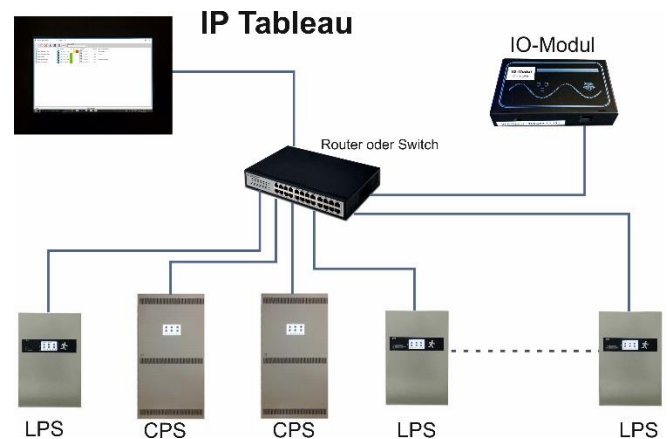


CPS-LPS Manager software for networking and visualization of up to 253 LPS and CPS devices

- Remote control of the systems
- Display of system status, error messages and all relevant operating data
- Programming of the systems
- Automatic programming and installation
- Optional email dispatch in case of malfunctions
- Optional acoustic message in case of faults
- Notification on background operation (Notify)
- Connection via LAN or WLAN
- Networking via existing LAN network or simple networking via switch
- Easy installation through automatic Scan of all connected devices
- Direct access to any device
- Connection to any device possible via the integrated Visu software
- High security - data exchange only via password protected port (SSH)
- Sorting of the list according to all fields possible
- Option: Connection of IO module

IP panel for networking and visualization of up to 253 LPS and CPS devices

- 10,1" Touchscreen Display
- Ultra-thin steel-sheet housing
- Networking of up to 253 systems
- Remote control of systems
- Display of the system status, error messages and all important operating datas
- Programming of the LPS systems
- Reading the memory of each system
- Reading the test books of each system
- Automatic programming and installation
- Email in case of errors
- Notification for background operation
- Connection via LAN or WLAN
- Networking via existing LAN network or simple networking via switch
- Simple installation by automatic scanning of all connected devices with designation
- Direct access to every system
- High security – data exchange only via password-protected port (SSH)
- Also available as software for a Windows Computer



Technical data

Connection: LAN / WLAN
Color: black
Housing: steel housing
Dimension (HxWxD): 330mm x 215mm x 15mm

IOe 230

Input - output module for external connection to CPS systems via RS485 bus.

Each of the 8 inputs can monitor 230V mains voltage or be configured as light switch. The IOe230 still has 3 outputs with potential-free contacts. The outputs are freely configurable in the CPS system.

Technical data:

Supply voltage:	24 V DC (7 – 28 V)
Protection:	IP 20
Protection class:	II
Temperature range:	-40°C to +85°C
Inputs:	8 x 230V AC potential separated
Outputs:	3 Relay contacts
Bus:	RS485
Address range:	1 – 59
Dimensions (W x H x D):	52,5 mm(+1,5 mm) x 90 mm x 71 mm
Weight:	0,17 kg
Mounting:	DIN rail



IOe 24

Input - output module for external connection to CPS systems via RS485 bus.

Each of the 8 inputs can be switched via a potential-free control contact. Each input can be inverted or configured with a current loop function via the configuration. The IOe24 also has 3 digital outputs with potential-free changer contacts. The outputs are freely configurable in the CPS system.

Technical data:

Supply voltage:	24 V DC (7 – 28 V)
Protection:	IP 20
Protection class:	II
Temperature range:	-40°C to +85°C
Input:	8 x 230V AC potential free
Output:	3 Relay contacts
Bus:	RS485
Address range:	1 – 59
Dimensions (W x H x D):	52,5 mm(+1,5 mm) x 90 mm x 71 mm
Weight:	0,17 kg
Mounting:	DIN rail



Bus-mains-monitoring BNW

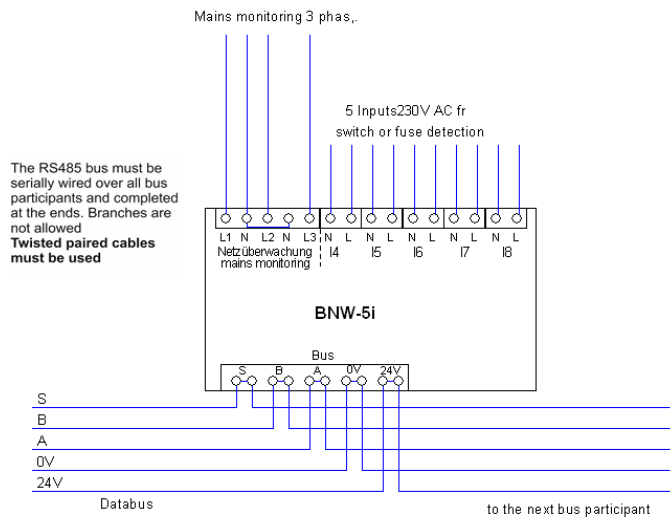
Three-phase bus-mains-monitoring for connection to CPS systems.
For monitoring up to 3 phases against N.
The corresponding LED on the front lights up when the Phase voltage is greater than 184 V.



Bus-mains-monitoring BNW-5i

For connection and monitoring of the 3 phases with N. The corresponding LED on the front lights up when the phase voltage is applied is greater than 184 V.

The additional 5 inputs (I4 - I8) can be used for light switch or fuse detection.



Specifications:

Supply voltage:	24 V DC (7 – 28 V)
Current consumption:	0.01 A @ 24 V
Power dissipation maximum	1 W
Protection class:	IP 20
Protection class:	II
Temperature range:	-40°C to +85°C
Inputs:	3/N AC 230 V 50Hz for mains monitoring 5 x AC 230V 50Hz for switch query
Switching threshold on:	> 184 V
Switching threshold off:	< 138 V
Bus:	RS485
Address range:	1 – 56
Connectivity	
Inputs:	Screw terminals 2.5 mm ²
Bus connection:	Connector with Push-in spring connection 0.2 – 1.5 mm ²
Dimensions (W x H x D):	87 mm x 90 mm x 65 mm
Weight:	0.075 kg
Mounting:	DIN rail

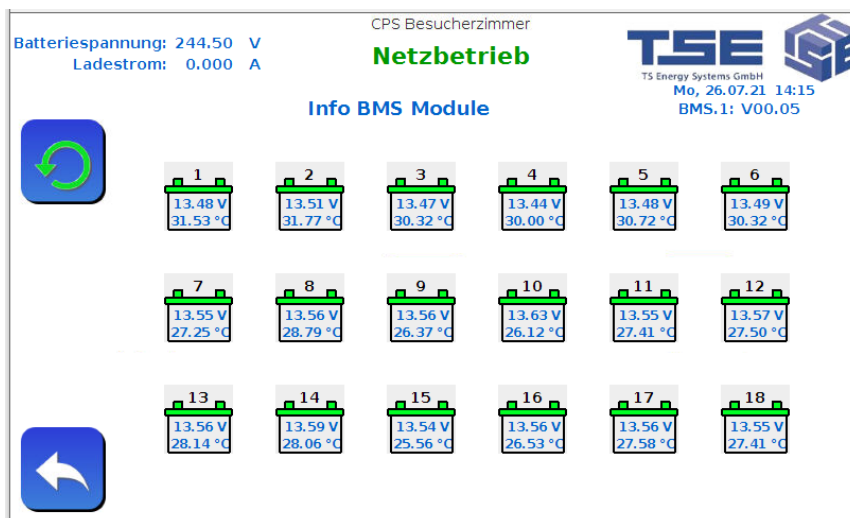
BMS - Battery Monitoring System

According to DIN EN 50171:2001, the total voltage, charging current and ambient temperature of the battery pack must be monitored. However, since these values are not sufficient to determine the condition of the battery, DIN EN 62034:2013 requires an annual endurance test to check the battery capacity over the entire service life, in which the block voltages of the individual battery blocks are to be measured. However, since this test only takes place once a year, there is a risk that the batteries have been damaged in the meantime.

In the draft of E DIN EN 50171:2013, the requirements for optional automatic single-block monitoring were therefore included and specified. This monitoring system shall meet the following conditions:

- Periodic monitoring of battery block voltages (6.11.3. a)
- Error message in case of battery block voltage deviation (6.11.3. b)
- Manually reset the error message (6.11.3. d)
- Recording of battery block voltages in endurance tests with an interval of 5 minutes (6.11.3. f)
- Battery temperature monitoring (6.11.)
- Our new BMS system meets all these requirements

The data of all 18 or 36 blocks can be clearly displayed at any time.



The data is also permanently recorded and can be read out on a USB stick for further processing.

During a capacity test, the battery data (voltages and temperatures of the individual blocks) are stored every 5 minutes.

The BMS system consists of a BMSC: Battery Monitoring System Controller and up to 36 BMSM: Battery Monitoring System module.

