INTEVIO EMERGENCY POWER SUPPLY PSU 24V-1

Honeywell's INTEVIO Public Address and Voice Alarm system is the ideal solution for operators of small and mid-sized buildings.



It offers a cost effective, integrated system providing a stabile, flexible and easy to use PA/VA solution..

APPLICATION PSU 24V-1

The power supply is designed to work with the INTEVIO PA/VA System. It acts as a battery charger and control device for 24V DC external back up batteries in accordance with EN 54-4+A1+A2 standards. The front panel includes LED indicators, control push button and USB socket, allowing control and test of power supply operating parameters. All connections are located at the rear of the unit, which has two configuration options: all 6 outputs providing the same current or 2 of the 6 with increased current-carrying capacity. The power supply meets all requirements of the Regulation of the European Parliament and of the Council of Europe No. 305/2011 of 9 March 2011 [CPR]. It holds certificate of constancy of parameters CNBOP No. 1438-CPR-0496.



FEATURES

- High power backup power supply for 19" rack
- High output current, up to 200 A @ 24 VDC
- Management of one battery circuit
- Max. capacity of batteries 270 Ah
- Battery circuits resistance tests
- Balancing voltage level of batteries in series
- Temperature compensation of bulk charging and floating voltage
- Advanced diagnostic and status indication
- Built-in DC power distribution panel and low voltage disconnect device LVDD

- Option to start system with only battery power,
 w/o mains source present so called cold start
- Built-in gauge of battery circuit resistance
- UI characteristics of battery charging
- Ability to work in floating mode or with discontinuous battery charging
- Single phase power with PFC
- Microprocessor controlled
- Digital communication via USB connector
- Operation with various acid batteries



FUNCTIONS OF THE POWER SUPPLY

- Temperature dependence of floating voltage and charging voltage
- Charging mode with current limitation depending on chosen battery capacity
- Operation in charging modes: bulk, balancing and supplementary charging
- Monitoring of low and high battery voltage
- Monitoring battery circuits continuity as well as measurement of battery circuits resistance
- Battery bank over-charge protection
- Monitoring the output fuses
- Monitoring operation of the charger
- Measurement of internal temperature
- Digital measurement of voltages, current and temperature
- Optical and remote indication of faults
- Option to accept and manage the external fault signal
- Option to set up the initial capacity of cooperating battery by DIP switch on the back panel
- Option to set up the level of maximum battery circuit resistance by DIP switch on the back panel

STANDARD EQUIPMENT

- 4 LEDs indication of the power supply's operation
- Push button to choose cold start and reset faults
- USB connector on the front panel
- Screw terminals M8 for battery connection
- Four standard outputs to power amplifiers
- Two outputs with increased currentcarrying capacity to power amplifiers
- Six additional outputs of uninterruptible voltage
- Standard blade fuses (car style) on all outputs
- Internal device to disconnect battery low voltage disconnects device (LVDD)
- Terminals for remote indication (three contacts for each signal): general fault, battery fault and mains failure
- Connector for input of external fault signal (active state is when open, referenced to the common negative bus of the power supply)
- Socket for external temperature probe (included)
- IEC terminal for mains connection
- Internal fans, activated by the controller

TECHNICAL SPECIFICATIONS

Mains power	230V, 50/60Hz, max 2.7A, PF 0.9	
OUTPUT'S PARAMETERS		
Current-carrying capacity of standard outputs to amplifiers	4 x 40A	
Current-carrying capacity of outputs with increased current	2 x 60A	
Current-carrying capacity of auxiliary outputs *1)	4 x 5 A	
Auxiliary outputs current available at mains power Imax a *1)	16A max	
Total battery current sourced from all outputs when mains power	200 A max	
is not present		
BATTERY OPERATION		
Floating voltage at 25°C	27.1V	
Maximum capacity of the external battery bank *1)	270Ah	
Charging current *2)	416A	
Maximum resistance value of battery circuit resistance *3)	1550mO	
OTHER		
Dimensions	(H*W*D) 43mm (1U) x 483mm (19") x 330mm	
Weight	4.9kg	
Operational temperature / cooling method	-5 °C45 °C / forced by fan	

CERTIFICATIONS AND APPROVAL

Electric safety	EN 60950-1 + A1 Klasse I
EN 60950-1 + A1 class I	
Electromagnetic interferences	EN 55022 level B
EMC immunity	EN 50130-4 + A1
Functionality	EN 54-4 + A1 + A2, EN 12101-10 class 1, ISO 7240-4

ORDERING INFORMATION

INTEVIO Emergency Power Supply	581726
Mounting Bracket (5 pcs.)	584927
Disconnector 1U and Cableset	583415
Cable set INTEVIO System	RK-Cableset1



^{* 1)} Current sourced from auxiliary outputs has impact on accessible capacity of batteries
* 2) Maximum value of charging current depends on capacity of connected batteries
* 3) Required value within the given range can be set up by DIP switch accessible for a user
* 4) To comply with the standard EN54-16 the power supplies have to be mounted in 19" rack cabinets of IP30 Ingress protection code