

AURORA[®]

Photovoltaic Inverters



General Specification

Aurora Easy Control

PVI-AEC-PRO

PVI-AEC-BASIC

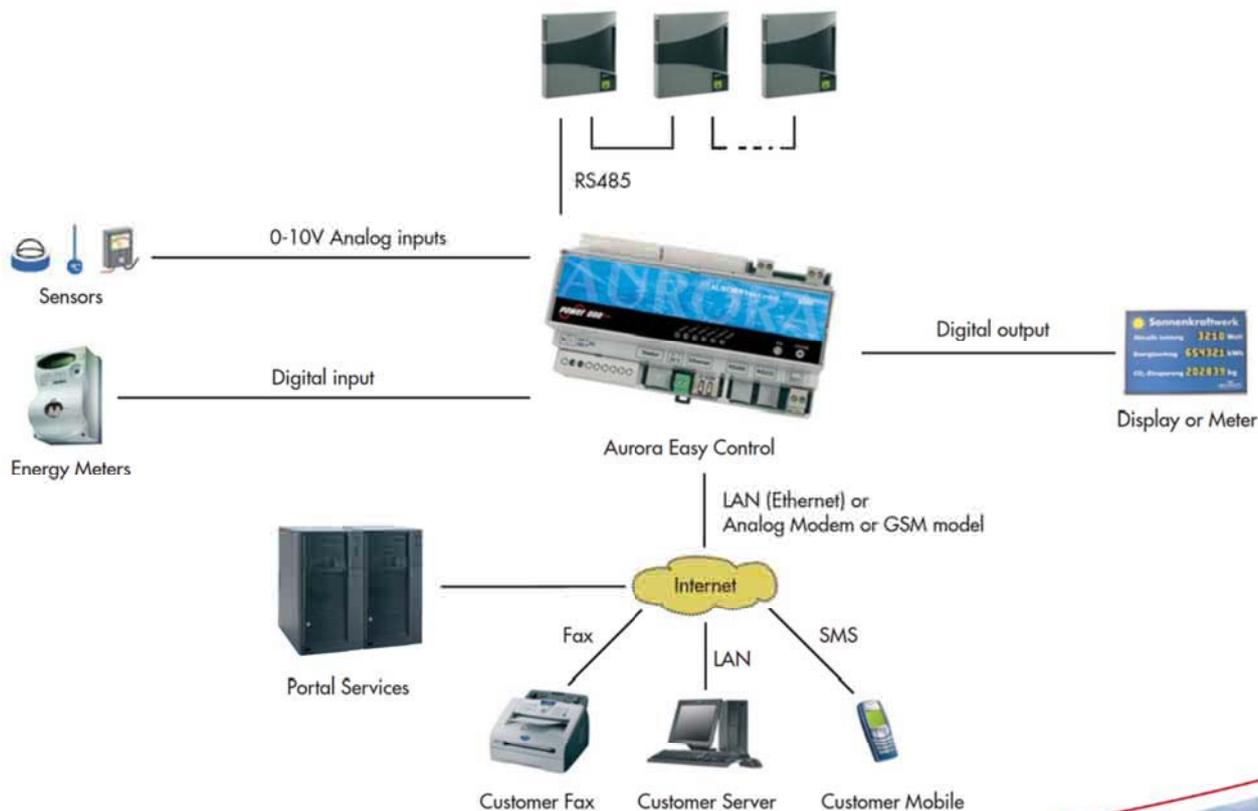
PVI-AEC-LIGHT



AURORA EASY CONTROL BENEFITS

- Remote monitoring of PV plants through Ethernet, analogue Modem, ISDN,DSL or GSM
- Performance/operational data available: energy yield, power, array voltages, array currents, AC parameters, temperatures, for each inverter.
- Analogue inputs for sensors (irradiance, ambient/cell temperature, wind speed, etc...)
- Active alarm management with automatic delivery of SMS, e-mail or fax alarm message in case of malfunction
- Configurable digital output to drive impulse energy meters or large displays
- Power One offers also the exclusive advantages of a web portal service (optional) to enhance the monitoring functions through internet. The advantages of Aurora web portal includes:
 - Easy connection also in case Aurora Easy Control is linked to local networks protected by firewalls
 - Access from any computer connected to Internet
 - Performance and alarm reports editing in various formats (CSV, HTML, PDF)

BLOCK DIAGRAM



CHARACTERISTICS	PVI-AEC-PRO	PVI-AEC-BASIC	PVI-AEC-LIGHT
General			
Operating temperature range:	0°C...+55°C		
Non operating (storage) temperature range:	-20°C...+65°C		
Environmental protection class:	IP 20		
Mounting system:	DIN top hat rail		
Dimensions:	160(Width) x 90(Height) x 73(Length) mm - (9 modules)		
Weight:	360g		
Functions			
Memory:	32MB CF Memory Card		
Display:	2 rows, with backlight	-	-
Inputs:	4 x analog / 4 x digital	1 x analog / 1 x digital	1 x analog / 1 x digital
DC supply output 24Vdc:	To power external sensors or signal converters (230mA max.)		
Digital output:	Configurable output: "impulse" for large display or "status" for alarm activation		
Connection interface 1:	Dial-up modem, ISDN, DSL, or GSM	Dial-up modem, ISDN, DSL	Dial-up modem
Connection interface 2:	Ethernet		
Interface to inverters:	RS-485 serial link		
Limitations:	max. 31 inverters	max. 31 inverters	up to 5 inverters, 20kWp max.
Electrical			
Analog inputs (configurable):	0...10Vdc max. overload: 12Vdc 0...20mA max. overload: 40mA / 3Vdc Temperature input PT-1000 Status input: Low < 1,5Vdc High > 2,5Vdc (max. overload 7Vdc)		
Digital inputs:	Impulse (meter) input: Low = 0Vdc to 7Vdc High = 9Vdc to 24Vdc (max. overload!) (24Vdc supply available from the unit!)		
Digital output (configurable):	Opto-isolated, max. overload: 70Vdc / 50mA (check polarity!)		
Supply input:	230Vac (85Vac...260Vac), 50/60Hz		
Consumption:	< 7.5W (during measurement or sensor activation)		
Battery for integrated clock:	Lithium type Li2032		
Accuracy			
Voltage:	0,5% full scale		
Current:	1% full scale		

ACCESSORIES	Description
PVI-AEC-BOX	Outdoor wall cabinet for Aurora Easy Control
PVI-AEC-EXP-A14-D14	Input expansion module: 4 x analog / 4 x digital
Irradiance sensors	
PVI-AEC-IRR	Irradiance sensor 0-10V
PVI-AEC-IRR-T	Combined irradiance & module temp. sensor 0-10V
Module temperature sensors (backside cell temperature) and signal converters	
PVI-AEC-T100-ADH	PT-100 self-adhesive sensor
PVI-AEC-CONV-T100-24V	PT 100 signal converter (24V supply)
PVI-AEC-T1000-ADH	PT-1000 self-adhesive sensor
PVI-AEC-CONV-T1000-24V	PT-1000 signal converter (24V supply)
Cased temperature sensors (ambient temperature)	
PVI-AEC-T100-BOX	PT-100 temperature sensor in case
PVI-AEC-T1000-BOX	PT-1000 temperature sensor in case
PVI-AEC-T1000-INTEGR	PT-1000 sensor in case, with integrated converter
Wind sensors	
PVI-AEC-WIND	Wind speed sensor (anemometer)
PVI-AEC-WIND-COMPACT	Compact wind speed sensor
PVI-AEC-WIND-DIR	Compact wind direction sensor
Energy meters	
PVI-AEC-EMTR-1	Energy meter, single-phase, for top hat rail
PVI-AEC-EMTR-3	Energy meter, three-phase, for top hat rail

Data-Logger Models	Connection interface 1 (modem)				Connection interface 2
	Analog	ISDN	DSL	GSM	Ethernet
PVI-AEC-LIGHT-Analog	x	-	-	-	x
PVI-AEC-LIGHT-Ethernet	-	-	-	-	x
PVI-AEC-BASIC-Analog	x	-	-	-	x
PVI-AEC-BASIC-ISDN	-	x	-	-	x
PVI-AEC-BASIC-DSL	-	-	x	-	x
PVI-AEC-BASIC-Ethernet	-	-	-	-	x
PVI-AEC-PRO-Analog	x	-	-	-	x
PVI-AEC-PRO-ISDN	-	x	-	-	x
PVI-AEC-PRO-DSL	-	-	x	-	x
PVI-AEC-PRO-GSM	-	-	-	x	x
PVI-AEC-PRO-Ethernet	-	-	-	-	x

