PDUeX

KWX-ATS32A2C19-H4 **ATS4**

KWX-ATS32A2C19-H4 - 1U 32Amp (A & B Input), 2 port (2 x IEC-C19). Provides, Individual Outlet Level Monitoring and Switching. 19" rack   mountable intelligent automatic transfer switch.

PDU eXperts KWX Automatic Transfer Switches (ATS) seamlessly switch loads between primary and backup power sources, this combined with real time power monitoring and built in environmental monitoring makes it one of the most advanced transfer switches on the market.

Humidity | Water Logging | Each Port on/off | Door Alarm | Temperature | Smoke Alarm

Current Display | Energy Display | Voltage Display | E-mail Alarm | Web Browsing | Protocol

Daisy Chain | RS 485 | Dry Connector | 19" or Vertical

Dimensions: 440mm x 45mm x 330mm (W x D x L)

Mounting length: 483mm

Key Features

- Total Power Monitoring, Individual outlet monitoring & switching (on/off)
- Adjustable sequential powering (on)
- 8 millisecond Switch over
- Total current monitoring
- Total voltage input & output monitoring
- Total kWh used
- Power factor recognition
- Up to 55°C Hot aisle operating capacity
- SMS, SNMP & Email
- Built in environmental monitoring as standard
  - o Temperature & humidity alarm sensor
  - o Water logging alarm sensor
  - o Rack door tamper sensor
  - o Infrared sensor
  - o Smoke detector
- Automated alarm notifications
- Up to 8 plug and play sensors
- Lockable IEC C13 sockets as standard
- Blade server ready
- Intelligent outlet type and recognition
- 24v & 48v DC, Single phase 120v & 240v & 3 phase 400v
- Effortless user friendly PDU management interface
- Control up to 3 KWX-ATS slaves from a master KWX-ATS
- 2x IP44 32A Commando inputs
- 2x IEC C19 outputs

CE RoHS COMPLIANT

KWX-ATS series

Intelligent Automatic Transfer Switches

In the event where the primary power source becomes unavailable, the KWX ATS will flawlessly source power from the secondary source without interrupting sensitive equipment, the switching occurs in just 8ms safely between the two input sources regardless of their phase.

8ms

PDU eXperts intelligent KWX-ATS management software enables the administrator to give designated users predetermined control over whole ATS units or even single outlets over a range of ATS units. Users have the ability to monitor and control directly through the ATS units network module on site, or remotely using our embedded multithreading inner core "Real time operating systems" (RTOS) software.

The management software is accessible within the data centres secure hardwired network, supporting various TCIP/IP protocols, including HTTP, HTTPS, SSL, SNMP versions 1,2 & 3, TELNET, SSH, SMTP and NTP from any network PC or laptop.

KWY Automatic Transfer Switches are available in a range 19" horizontal rack mounted options, with a variety of outlets including slide lock IEC C13 as standard, IEC C19, UK BS1363, NEMA (5-15), SCHUKO (EEC 7/4). Input/load connectors options include single phase 16A / 32A and 3 Phase IP44 Commandos.
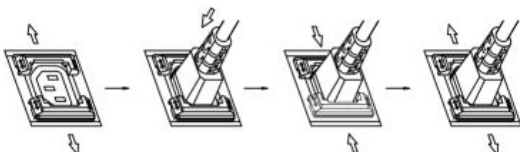
N1 – ATS total power monitoring – Provides real time power consumption (current / voltage), total power (kW) used, apparent power and power factor.

N2 – Individual port power monitoring – Provides real time ATS power consumption & the current on individual ports, total power (kW) used, apparent power and power factor.

N3 – ATS monitoring & individual port switching – Provides real time power consumption, total power (kW) used, apparent power and power factor. Each individual port/outlet is also switchable (ON / OFF)

N4 – ATS and per port power monitoring and switching – Complete power monitoring and switching (ON / OFF) of the ATS and each individual port, total power (kW) used, apparent power and power factor.

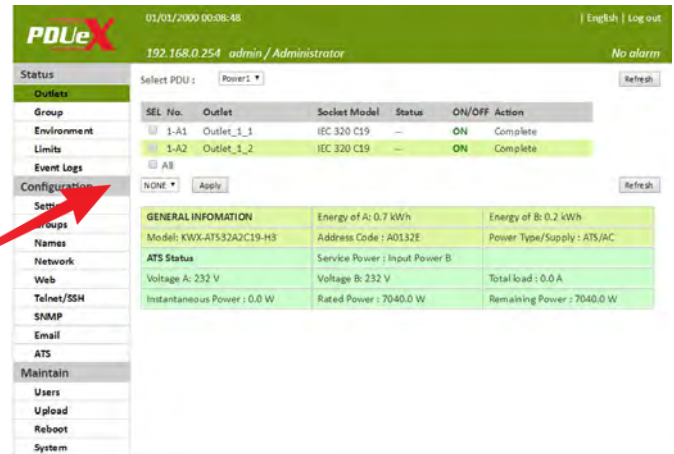| Feature		Function	N1	N2	N3	N4
Monitor functions	LED Display	Total & individual port current load	✔	✔	✔	✔
		Overload flashing LED alarm	✔	✔	✔	✔
		ATS IP address, version number	✔	✔	✔	✔
	Management software / Hyper terminal	Total current load	✔	✔	✔	✔
		Monitors current load per port	✘	✔	✘	✔
		Input voltage	✔	✔	✔	✔
		Configure low/high voltage limits	✔	✔	✔	✔
		Configure low/high Current limits	✔	✔	✔	✔
		Sensor(s) state (optional)	✔	✔	✔	✔
Control functions	PC Control	Power ON/OFF individual ports	✘	✘	✔	✔
		Power ON/OFF ATS	✘	✘	✔	✔
		Set Primary Power source	✔	✔	✔	✔
		Intelligent setup memory on restart	✘	✘	✔	✔
Access methods		RS 485 port	✔	✔	✔	✔
Daisy chain connections		Serial connection	✔	✔	✔	✔
		Radial connection	✔	✔	✔	✔

Slide locking IEC C13 outlets
All KWX-ATS units come with lockable IEC C13 outlets as standard.
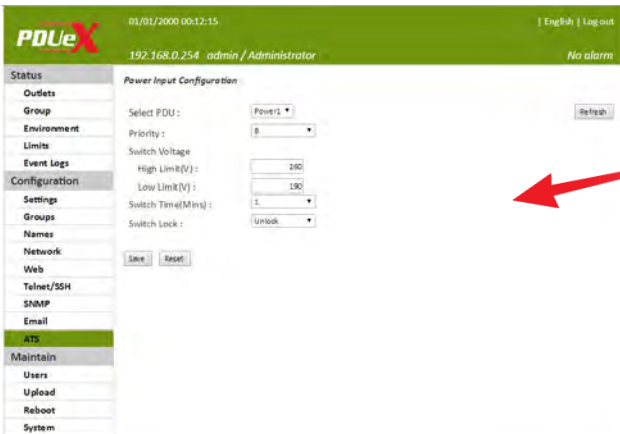
KWX-ATS Series Interface

The KWX-ATS management software has an effortless interface giving easy access to the master ATS unit and any of its slaves (up to 3 KWX-ATS units). The interface allows multiple users to not only monitor the power usage, but also set input/output thresholds (depending on version), if these parameters are exceeded KWX-ATS units engage both visual and audible alarms, these alarms can also be configured to be sent via SMS or Email to designated users.

Each KWX-ATS is given a default IP address which can be changed by the administrators to meet your networks requirements and can be accessed via most popular browsers such as Internet Explorer, Google Chrome, Edge, Fire fox etc.
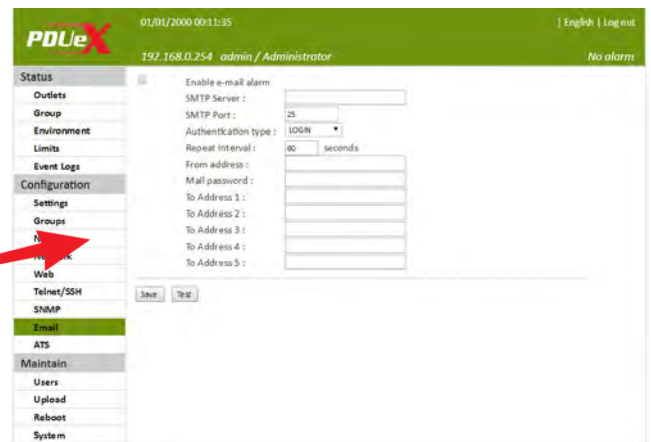
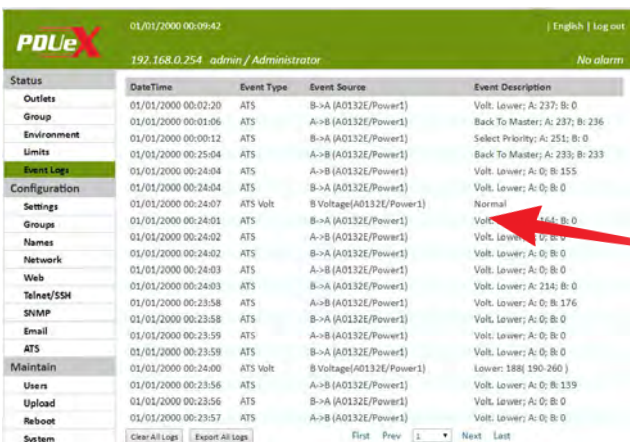Real time Power usage & outlet monitoring

Configure power thresholds

Configure user accounts and email alarm notifications

Real time event log including alerts, user logins and reboots.

KWX-ATS Series environmental monitoring.

PDU eXperts KWX-ATS series is complete with built in environmental monitoring software, with up to 8 'plug n play' sensors (optional) to monitor the server rack or data centers direct environment conditions (temperature & humidity sensor, smoke detector or water logging sensor) or add additional security (door tamper sensor or infrared sensor).

The environmental monitoring is accessible via the management software and includes individual user permissions, threshold settings and alarm notifications. It is an ideal system for small data centers, although often used as an addition to pre-installed systems in larger data centers.

Temperature/
Humidity Sensor

Water Logging
Sensor

Infrared Sensor

Smoke Sensor

Door Sensor

Cascade up to 8 plug 'n' play
environmental sensors to
security and peace of mind

1 2 3 4 5 6 7 8

KWX-ATS Specifications

Feature		Description	Function / Parameter	Note
Working Voltage		Normal conditions	90V~250V AC	
Input/output current		Max input/output current	10A / 16A	
Working frequency		Normal conditions	47Hz~60Hz	
Access ports	Network	Network port WAN or LAN access	10/100Mb adaptive networking	
	Serial	Serial port	RS485 port	
	Sensors	Sensor ports	RS485 port	
Data / management access	HTTP/HTTPS	Web browser access	Internet Explorer, Google Chrome, Edge, Fire fox etc.	
	Telnet	Simple command line	/	
	SSH	Encryption command	SSH v2 supported	
	SNMP	SNMP centralised monitoring	SNMP v1, v2, & v3	
System capability		Supported by various popular operating systems	Windows 7 /8 /8.1 /10 & Linux etc.	
		System integration	TELNET / SSH protocol	
		RS485 connection	Customized protocol	
Software/Firmware Update / Upgrade		Software / firm ware updates	Via web site / Support technician	
		BIOS Firmware updates (if necessary)	Support technician	
Alarm setting thresholds		Total current limits (low / high)	Automatic detection & automated SMS / Email notifications	
		Temperature limits +/-		
		Humidity limit		
LED indicators / Display		Outlet led indicators	LED indicator per outlet	Optional
		6 digit /7 segment display	Nixie tube Display shows: current / voltage. Product information. Alarm information	
Network module features		Provides ATS information	Displays ATS serial number and working voltage, current power usage and alarm information	
		Audio sound alerts	Sounds when ATS is powered ON/OFF	
Management software		User/Administrator account settings	Set access permissions for multiple users over multiple ATS \ outlets	
		Outlet settings	Set thresholds per port or group of ports	
		Alarm notifications	Configure SMS and Email notifications when thresholds are exceeded	
		Control / monitor multiple ATSs from master ATS	Up to 3 slave ATS can be controlled and monitored via a single master ATS	
		Event log	Real time event record (displays exceeded thresholds, user logins and activities)	
Outlet features		Sequential power ON / OFF	Adjustable sequential power on intervals are 1~250 seconds, power off is 0.5 seconds	N3/N4 only
		Intelligent status holding	Power ATS settings are retained after a restart	N3/N4 only
		Surge protection	Circuit breaker added whole ATS	Optional

Feature	Description	Function / Parameter	Note
Monitoring abilities	Input voltage	Scale: 1V Accuracy: ± 1% + 1 digit Meter range: 90V~350V	
	Total current	Scale: 0.1A Accuracy: ± 1% + 1 digit Meter range:	
	Total kWh usage	Scale: 0.1 kWh Accuracy:1 grade	
	Environment temperature	Resolution: 1ºC Accuracy: ± 1% + 1 digit Meter range: -30ºC ~ 100ºC	Optional
	Environment humidity	Scale: 1% Accuracy: ± 1% + 1 digit Meter range: 1%~99%	Optional
	Smoke detector	Up to 25m^2 range	Optional
	Infrared sensor	16m range	Optional
	Water logging sensor	Water logging / drop monitor	Optional
	Door tamper sensor	5mm leeway	Optional
	Surge protection failure	Automated notification	Optional
Outlet / port & sensor alarms	Fuse failure	Sound alarm (buzzer) Remote alarm: Email, SMS, SNMP TRAP & management software	Optional
	Current threshold		Optional
	Temperature threshold		Optional
	Humidity threshold		Optional
	Smoke detector		Optional
	Door tamper sensor (open)	Remote alarm: Email, SMS, SNMP TRAP & management software	Optional
	Surge protection failure		Optional
	Infrared sensor		Optional
Hardware protection	Surge protection	Difference mode: ±2kV Common mode: ±2kV Flux: 3kA Discharge current: 5kA (max)	Optional
	Each port fused	Breaking capacity: 1500A Main line break protection Fuse range: 0.1A ~ 16A/32A (depending on model)	Optional
	Circuit breaker	Breaking capacity 6000A	Optional
Intelligent recognition	Outlets / Ports	Automatic outlet type & port number recognition	
	Environment sensors	Automatic sensor type and port recognition	
	Power thresholds	Auto detect when threshold are exceeded	
	Current and total power usage	Real time record of current and total power usage	
	Power factor	Real time power factor usage	
Sensor modules (option)	Up to 6 plug 'n' play sensor modules	Flexibility of sensor choice	Optional
Multiple ATS cascading	Up to 3 slave ATS can be controlled and monitored via a single master ATS	Connect via network cable (RJ485 ports)	