

## PXGX UPS Card Firmware Enhancement History

This history applies to catalog number PXGXUPS (style number 103007974-5591) which first shipped with v1.6.0-ups firmware.

### Version 2.4.0.1-ups – October 2016

- Eaton PredictPulse service support updated.
- Fixed a bug that caused BACnet protocol to not deliver alarm information.
- SSL certificate regeneration has been fixed.
- SSL TLSv1.1 cyphers and all the previous versions have been disabled in PXGX UPS card.
- IPv6 support for SNMP and HTTPs connection fixed.
- Minor translation fixes.
- With this or newer firmware versions, it will not be possible to downgrade to pre 2.4. firmware versions.

### Version 2.3.6-ups – October 2015

- Newer version of the system software (Toolkit), bringing PXGX to the same feature level as the PXGMS.
- Added BACnet IP support.
- Added language support for Chinese, French and Spanish in addition to English.
- Added setup wizard for PredictPulse.
- Added support for 9395P UPS
- Fixed a bug that prevented IPM and IPP from getting values from the Environmental Monitoring Probe (EMP).
- Upgraded OpenSSL
- Added secure email capability (SMTP over SSL) which enables use of certain public SMTP servers like Gmail
- Added extraction of UPS internal log from 9395P, 9395, 9390, 9355 and 9155 UPS.
- Removed support for collective email.
- Various minor enhancements and fixes.

### Version 1.6.0.5a-ups – June 2014

Support of newer hardware revision of the card. Older firmware versions are not compatible with the new hardware.  
**Downgrading to pre-1.6.05a may damage the card!**

### Version 1.6.0.5-ups – September 2013

- Fixed an issue where the email client wasn't sending event emails.
- Fixed an issue where the email configuration web page didn't allow the entry of a :port number after the SMTP server name.
- The USB interface's IP address assignment of 192.168.200.101 no longer prevents the use of the card on the same 192.168.200.x subnet via the Ethernet port. The USB port is only active with this Ethernet address while it's being used for initial configuration. Once the cable has been removed, normal Ethernet communication is restored.
- Fixed an issue where the 9395 Shutdown Imminent alarm was not correctly supported in the XCP Get System Status data block.
- The web UI will now reject HTTPS sessions considered insufficiently secure. These include sessions using no cryptography at all or key lengths less than 128 bits. SSL v2, and DES and triple-DES encryption requests are also rejected.

- The web UI now allows the use of the hyphen ('-') character in the trusted host names list.
- The output current meter values and limits are now sourced exclusively from the XCP Meters (0x34) block for the BladeUPS and 9395 UPS only. This works around an issue with the BladeUPS f/w output ampere rating being wrong in the System Status (0x51) block.
- The web UI one-line support has been updated for the 9395 UPM "Ready" indicator. The "Input" line has also been moved to the upper device module for the 9395 UPS and SBM.
- Several minor web UI one-line and breaker/contactor updates were also made.
- The EMP (Environmental Monitoring Probe) name was changed from Powerware EMP to Eaton EMP.

#### **Version 1.6.0.3-ups – October 2011**

- A "Value" column is now included in the Modbus register map CSV files. This column shows the current value of all parameters.
- Added support for the new 9395 Ground Fault alarm.
- Demand Energy parameters were converted to Demand Watts.

#### **Version 1.6.0.2-ups – February 2011**

- Parameter descriptions are now included in the Modbus register map CSV files.
- The PXGX UPS now correctly provides temperature and humidity data from an installed EMP (Environmental Monitoring Probe) to 9390 and 9395 UPS systems if the UPS is configured to accept the data.
- Data logs are now available for inclusion with eNotify emails.
- The status of the Shutdown Imminent alarm is now correct for 9395 systems.
- A OneLine display problem associated with the 9355 HV UPS was corrected.

#### **Version 1.6.0-ups – November 2010**

- This was the original manufactured version of f/w for the PXGX UPS card.