Quick Start Instructions



Package Contents

- Power Xpert Gateway (PXGX) UPS Card
- USB Cable
- Quick Start Instructions



Help Desk Numbers

NOTE: On the Web site op	ening page, click Support and select the
Web Site	www.eaton.com/pxgx
All Other Countries	Call your local service representative
Canada	1-800-461-9166 ext 260
United States	1-800-356-5737 or 1-800-843-9433

Customer Service link for more information.

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Section 1 Installation Checklist

- 1. Verify that the following items are available:
 - Power Xpert Gateway (PXGX) UPS Card package contents (card, cable, Quick Start Instructions)
 - Phillips[®] screwdriver
 - □ Available USB port on a computer running Microsoft[®] Windows[®]
 - ❑ Web browser (Microsoft Internet Explorer[®] version 8.0 and higher, Mozilla[®] Firefox[®], or Google Chrome[™] are recommended)
- If you are going to use Dynamic Host Configuration Protocol (DHCP), provide your local network administrator with the card's MAC address. The MAC address is located on either the shipping box label or the label on this card.

MAC Address

3. If you are not going to use DHCP to provide any of the settings listed below, contact your local network administrator for the settings.

In the table below, check the **DHCP** check box or enter the values for manual configuration. You will reference this data later in the procedure.

ltem	DHCP*	Manual Configuration
IPv4		Card IP Address: Netmask: Gateway:
DNS – Name Servers		Name Server #1: Name Server #2: Name Server #3:
DNS – Domain		Domain:

* The network administrator normally sets up the DHCP server to provide a static IP address each time the card makes a DHCP request.

- If you need e-mail functionality, obtain the SMTP IP address or host name. If using the SMTP host name, verify that you also have the Name Server IP address (see Step 3).
 - SMTP (mail server) IP Address or Host Name

Section 2 Install the Card

Note: The hot-swappable PXGX UPS card can be installed without turning off the UPS or disconnecting the load.

To install the PXGX UPS card:

1. Verify that all six DIP switches on the card are in the OFF position (see Figure 1).



Figure 1. Verify DIP Switches are OFF

- 2. If not already done, record the MAC address for future reference (see the "Installation Checklist" on page 2).
- 3. Remove the X-slot® cover from the UPS. Retain the screws.
- **Note:** If another card is already installed with an attached communication cable, disconnect the cable and then remove the card.
- 4. To prevent electrostatic discharge (ESD), place one hand on a metal surface, such as the UPS panel.

5. Slide the card into the open slot and secure with the screws removed in Step 2 (see Figure 2).



Figure 2. Secure the PXGX UPS Card

- 6. From your laptop, go to **www.eaton.com/pxgx**.
- 7. On the Features tab, click the **Download Configuration File** link to download the configuration file.
- 8. Save the driver configuration file (powerxpert.inf) to the C: drive using the default location or a folder you select. Note the path of the downloaded file on your computer. (Never download the file to your desktop.)

Section 3 Connect the Card to the Computer

To connect the card to the computer:

1. Plug the small connector at the end of the supplied USB configuration cable into the setup port on the card (see Figure 3).



Figure 3. Install the USB Cable

- 2. Plug the other end of the USB cable into the USB port on the computer. The Windows operating system detects new hardware.
- **Note:** If a message indicates that the device driver software was not successfully installed, click **Ignore**.
- **Note:** You may see a pop-up message window that shows "Found new hardware." This indicates that the hardware installed successfully.

- 3. Connect an active Ethernet cable (not supplied) to the Upstream Ethernet connector on the PXGX UPS card (see Figure 4).
- 4. If you are connecting to another PXGX UPS card or other Ethernet device, connect an Ethernet cable (not supplied) to the Downstream Ethernet connector on the PXGX UPS card.



Figure 4. Install the Ethernet Cable

- 5. Wait for the power light and status light on the installed card to illuminate. This takes about two minutes.
- 6. Open a Web browser and type the default IP address (192.168.200.101).

- 7. Did the Power Xpert Gateway software open to the PXGX UPS card page?
 - If yes, the driver has already been installed automatically. Either verify the IP address assigned through DHCP or manually enter a static (fixed) IP address for the card's network connection:
 - a.To verify the DHCP-assigned IP address, go to page 13.
 - b.To manually enter a fixed IP address, go to page 16.
 - If no, the driver has not been installed. Go to the next section, "Install the Driver Software" on page 8 in order to confirm that you have the most current USB Driver software. If not, you need to install or update the USB Driver software.

Section 4 Install the Driver Software

The steps you use to install the driver software depend on your operating system (OS). This procedure provides instructions for installing driver software on a Windows 7 OS.

- **Note:** Windows 8 steps are basically the same as Windows 7, although the dialog displays may differ somewhat.
- Note: The PXGX UPS and PXGMS cards use the same driver.
- **Note:** You can use either the Device Manager path or the Devices and Printers path to browse for the driver software and install it. This procedure uses the Device Manager.

To install the driver from the **Device Manager**:

- 1. Click **Start** in the Start bar. Type Device in the search box.
- 2. Select **Device Manager** from the list above the search box. The Device Manager opens.
- 3. Locate **RNDIS/Ethernet Gadget** under either **Other Devices** or **Network Adapters** (see Figure 5).
 - If you do not see RNDIS/Ethernet Gadget in either list, you do not have a cable connected to the card. Connect the computer to the card. Go back to Step 1.
 - If RNDIS/Ethernet Gadget is listed under Other Devices, the driver is not installed. Go to Step 4.
 - If RNDIS/Ethernet Gadget is listed under Network Adapters, a driver is installed already, but it may not be the most up-to-date driver. Go to Step 4. and continue this procedure to ensure the most current driver is installed.

🚔 Device Manager		- • ×
<u>File Action View H</u> elp		
	K 🕅 🙀 🙀 K	
BIM-PC Display adapters Displ	es ntrollers nting devices Update Driver Software Disable Uninstall	
	Scan for hardware changes	
	Properties	
J		

Figure 5. Update RNDIS/Ethernet Gadget Driver from Other Devices

- 4. Right-click **RNDIS/Ethernet Gadget** to display the menu and select **Update Driver Software**.
 - If a pop-up message displays, "The best driver is already installed," click **Close** and go to Step 10.
 - Otherwise, go to Step 5.
- 5. Select **Browse my computer for driver software** (see Figure 6). Click **Next**. The next page displays.



Figure 6. Update Driver Software Window – Search Method

- Click Browse. The "Browse for Folder" dialog displays. Select the folder that contains drivers for your hardware. Click OK. The "Browse for driver software on your computer" page displays.
- 7. The path to the powerxpert.inf file displays in the **Search for driver software in this location** box. Click **Browse** and navigate to the powerxpert.inf file you already downloaded. Select the file and click **Next** (see Figure 7).
 - If a pop-up message displays, "The best driver is already installed," click **Close** and go to Step 10.
 - Otherwise, the software begins to install.

🚱 🗕 Update Driver Software - RNDIS/Ethernet Gadget	×
Browse for driver software on your computer	
Search for driver software in this location:	
 Include subfolders Let me pick from a list of device drivers on my computer This list will show installed driver software compatible with the device, and all driver software in the same category as the device. 	
Next	incel

Figure 7. Update Driver Software Window - Browse for Driver Software

Note: If the message "Windows can't verify the publisher of this driver software" displays, select **Install this driver software anyway** (see Figure 8).



Figure 8. Windows Security Message

8. When the driver software is updated successfully, the message "Windows has successfully updated your driver software" displays (see Figure 9).



Figure 9. Update Driver Software Window – Update Successful

- 9. Click Close.
- Either obtain the DHCP-assigned IP address or manually enter a fixed IP address:
 - To obtain the IP address assigned through DHCP, continue to "Obtain a DHCP-Assigned IP Address" on page 13.
 - To manually enter a static (fixed) IP address for the card's network connection, continue to "Assign an IP Address Manually" on page 16.
- **Note:** By default, the PXGX UPS card requests an IP address through DHCP when connected to a network.

Section 5 Obtain a DHCP-Assigned IP Address

To obtain the IP address through DHCP:

- 1. Ensure the PXGX UPS card is still connected to the computer over the USB cable. Also ensure that the network cable is connected from the PXGX UPS card Ethernet port to the network connection.
- 2. If your Web browser already open to the default IP address, go to Step 3. Otherwise, perform the following:
 - Open your Web browser.
 - Enter: 192.168.200.101.
 - Log on as administrator. The default username and default password are "admin." The PXGX UPS card Web page displays.
- **Note:** If the system is unresponsive and you cannot make any selections, the browser may be running in compatibility mode. To disable compatibility mode, go to "Disable Browser Compatibility Mode" on page 19.
- 3. Select **Network** from the Configuration menu. The **Network** page displays (see Figure 10).
- 4. Under **IPv4**, the **Automatic Configuration: DHCP Enabled** setting checkbox should be enabled by default. Make sure the checkbox is checked (enabled) before continuing.
- 5. Scroll down to **Name Service** and expand the selection to update the next two DHCP settings (see Figure 10):
 - Check the checkbox (enable) for Use DHCP (when enabled) to get name services.
 - Check the checkbox (enable) for Use DHCP (when enabled) to get domain name.

6. Click Apply.

Power Xpert [®]	07/30/2015 13: 07/30/2015 09: CEC 9395 550	33:54 UTC 33:54 EDT middle unit
Menu	address. The connection tests allow you to test for fill	rewall or other connectivity issues.
Device Data -		
Power Xpert Gateway Card	System Information	
UPM 1	System location:	Your Facility
UPM 2	System contact:	John Smith
Open Alarms +		
Logs +	Network	
Configuration (1) +	MAC:	XX:XX:XX:XX:XX:XX
Documentation +	■ IPv4	
	Automatic Configuration:	DHCP Enabled:
	Manual Configuration	
	IP Address:	
	Netmask:	
	Gateway:	
	- IPv6	
	Name Service Settings	
	Use DHCP (when enabled) to get name servers:	
	Name Server #1:	
	Name Server #2:	
	Name Server #3	
	Line DHCR (when enabled) to get demois server	
	Use DHCP (when enabled) to get domain name:	
	Domain:	t
	Hostname:	

Figure 10. Name Service Settings

- 7. Select Yes for the message, "Do you want to save the Network Configuration?"
- 8. Wait for approximately two minutes for the card to reboot. Initially, all lights will be lit. You will know the card has finished rebooting when only the top light (Status) and the bottom light (Power) remain lit.
- 9. Open a browser and enter the default IP address (192.168.200.101).
- 10. When prompted, log on as administrator. The default username and default password are "admin." The PXGX UPS card Web page displays.

- 11. Click Network in the menu list.
- 12. Does the IP address display?
 - If yes, uncheck (disable) the DHCP Enabled box and select Apply.
- Note: At this point, the DHCP address is saved as a static IP address.
 - If no, go to "Assign an IP Address Manually" on page 16 to manually obtain a static IP address for the PXGX UPS card.
- **Note:** For detailed information, refer to the *Eaton Power Xpert Gateway* (*PXGX*) *UPS User's Guide*, which is available through a link on the Documentation tab on the PXGX UPS product Web page.

Section 6 Assign an IP Address Manually

To manually assign a static (fixed) IP address for the card:

- 1. Ensure the PXGX UPS card is still connected over the USB cable and the network cable is connected from the PXGX UPS card Ethernet port to the network connection.
- 2. If your Web browser already open, go to Step 3. Otherwise, perform the following:
 - Open your Web browser.
 - Enter: **192.168.200.101.**
 - Log on as administrator. The default username and default password are "admin." The PXGX UPS card Web page displays.
 - Go to Step 3.
- **Note:** If the system is unresponsive and you cannot make any selections, the browser may be running in compatibility mode. To disable compatibility mode, go to "Disable Browser Compatibility Mode" on page 19.
- 3. Select **Network** from the Configuration menu. The Network page displays.

Power Xpert®	07/30/2015 13 07/30/2015 09 CEC 9395 550	::34:23 UTC ::34:23 EDT D middle unit
Menu	Overview	
Device Data		
Power Xpert Gateway Card Power Xpert	Network This page may be used to change various network Apply. Click Discard to cancel any unsaved change changes will take effect immediately, so if the IP ad address. The connection tests allow you to test for System Information	configuration items on the gateway. To save the ch. s and revert to the values stored in the gateway. Any diress changes you'll need to connect your browser firewall or other connectivity issues.
Documentation +	Custom Insection:	Marine The office
	System location:	Your Facility
	System contact:	John Smith
	Network	
	MAC: IPv4 Automatic Configuration: IP Address: Netmask: Gateway: IPv6 Name Service Settings Actions	DHCP Enabled:
	Ping Test:	Test

Figure 11. Disable DHCP Setting

- 4. Uncheck the **DHCP Enabled** checkbox to disable DHCP and allow you to manually configure the IP address (see Figure 11).
- Refer to the "Installation Checklist" on page 2 in this book. Enter the IP address, Netmask, and Gateway addresses in the IPv4 > Manual Configuration section.
- 6. Click **Apply**, then click **OK** to confirm.
- 7. **Optional.** If you are using a host name, or host names, for controlling access to the card:
 - Type the server IP address in the Name Server box. (Up to three IP addresses can be entered.)
 - Click Apply. Click OK to confirm.

- 8. Open a browser and enter the fixed (static) IP address.
- 9. Log on as administrator. The default username and default password are "admin." When the PXGX UPS card Web page displays, you know the fixed IP Address is working.
- **Note:** For detailed information, refer to the *Eaton Power Xpert Gateway* (*PXGX*) *UPS User's Guide*, which is available through a link on the Documentation tab on the PXGX UPS product Web page.

Section 7 Disable Browser Compatibility Mode

Browser compatibility allows Web pages designed for older versions to display properly. If data does not display properly on your PXGX UPS card Web page, the browser compatibility mode should be disabled.

To disable the compatibility mode:

- 1. Open your Web browser.
- In the Menu bar select Tools > Compatibility View Settings. The Compatibility View Settings window opens (see Figure 12).

Compatibility View Settings		×
Change Compatibility View Settings		
Add this website:		
	Add	
Websites you've added to Compatibility View:		
	Remove	
		_
I Display intranet sites in Compatibility View		
Use Microsoft compatibility lists		
Learn more by reading the <u>internet Explorer privacy s</u>	statement	
	Class	
	Close	

Figure 12. Compatibility View Settings Window

- 3. Uncheck (disable) the **Display all websites in Compatibility View** checkbox to disable compatibility mode and click **Close**.
- 4. Close and re-open your browser so that the changes take effect.

Section 8 Register a PredictPulse Subscription

PredictPulse is a remote monitoring and management subscription service that collects and analyzes data from connected power infrastructure devices, providing Eaton with the insight needed to make recommendations and take action on your behalf. This service has limited availability outside of the United States. For more information go to **www.eaton.com/predictpulse**.

Note: Contact your Eaton service representative for availability of PredictPulse in your region.

Use either the universal PredictPulse Subscription Wizard or the PXGX UPS PredictPulse setup feature to configure your profile and register the Eaton UPS devices monitored by PredictPulse.

The universal PredictPulse Wizard can be downloaded from the PredictPulse web site to begin your subscription registration. Using this method, you can register devices individually or as a group.

However, the latest firmware for the PXGX UPS and PXGMS cards contain a PredictPulse activation set-up feature. As long as these cards are on your network, you can quickly activate subscriptions without the wizard and save time.

To begin registering with the set-up feature, follow this procedure. An e-mail with additional instructions to finish registering and configuring your card is automatically sent to the provided e-mail address.

To register an installed PXGX UPS card for PredictPulse:

- 1. Locate the PredictPulse selection under the Configuration menu on the Power Xpert Gateway window.
- **Note:** If there isn't a PredictPulse selection, either update your firmware or download the universal PredictPulse Wizard from **www.eaton.com/predictpulse** and follow the instructions in the Wizard and subsequent e-mail messages.
- **Note:** Refer to the *Eaton Power Xpert Gateway (PXGX) UPS User's Guide* for more information.

 On the Power Xpert Gateway window, select Configuration > PredictPulse (see Figure 13).

Power Xpert®	F:T•N	04/27/2015 20: 04/27/2015 16: CEC 93PM, RI
Menu	Overview	
Device Data	PredictPulse	
Power Xpert Mini-Slot card EATON 93PM UPM 1	Eaton's PredictPulse is a monitoring and manag recommendations and take action on your beha	ement subscription service that lf. Contact Eaton in US at 800/8
UPM 2	PredictPulse	
- U Environmental Monitoring Probe	Enable PredictPulse:	
	Contact Email:	johnsmith@yourcompany.co
nn	Confirm Email:	johnsmith@yourcompany.co
Open Alarms (15)	Contact Name:	John Smith
Logs 🔹	Country:	United States
Configuration Sessential Configuration Tasks Access Control	Apply Discard	
Network		
Connections		
OpenVPN Alignment		
PredictPulse		
Environmental Monitoring Prob		

Figure 13. Registering a PredictPulse Subscription

- 3. Confirm that the checkbox for "Enable PredictPulse" is checked (enabled).
- 4. Complete the following fields:
 - Contact Name: First and last name of the contact person.
 - Contact Email: E-mail address of the contact person for event data.
 - **Confirm Email**: E-mail address again for confirmation.
 - Country: Country where the main contact resides.
- 5. Click **Apply** to save.
- 6. Click **OK** in response to the message, "Are you sure you want to apply settings and send registration email?"

7. A progress message box informs you that registration is in progress. When the first step in registration completes successfully, the contact person identified on the PredictPulse settings page will receive an e-mail with additional instructions (see Figure 14). Registration should be completed on the Eaton portal by this contact person.

Informat	ion 🛛
1	Congratulations on completing the first step in registering for PredictPulse.You should receive an email from Eaton within the next 15 minutes with a link to the Eaton portal to complete the registration process.For any issues please call 800-843-9433.
	OK

Figure 14. Confirmation Message



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