

PowerPanel[®] Business Edition Installation Guide

For

UPS with Remote Management Card

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Introduction

A UPS with a remote management card (RMCARD) can provide access to the UPS directly via the network. It provides a service to monitor the status and configure the UPS through the network. It also logs the UPS status and power events.

The PowerPanel[®] Business Edition Client running on the host can communicate with the UPS via the network. In the event of power failure, the Client will be informed of this condition from the RMCARD and request the hosted computer to shut down completely before the UPS stops supplying power due to the battery power being exhausted. It can be installed on various platforms to initiate a shutdown during a power outage including Windows, Linux, Citrix XenServer and VMware ESX/ESXi. The following sections describe installation on the various platforms.



The UPS can establish communication with the PowerPanel[®] Business Edition Center via the network. The Center serves to simultaneously monitor and manage multiple UPS units. When the UPS stops supplying power, any computers running the PowerPanel[®] Business Edition Client, are shut down in advance to avoid a system crash or data loss.

Hardware Installation

Before installing the PowerPanel Business Edition software, make sure that the following hardware installations are configured properly:

- Verify the computer's power is connected to the UPS outlet properly.
- Verify the computer's network is connected.
- Verify the RMCARD's network is connected.

Please refer to the Remote Management Card User's Manual for a proper hardware installation.



Installing PowerPanel[®] Business Edition Software

Installation on Windows

A popup window will be displayed automatically when inserting the PowerPanel[®] Business Edition installation CD. Users can click the **Install PowerPanel Business Edition software** shortcut on the window to initiate the installation procedure. If the popup window is not displayed when inserting the CD, browse to the CD drive and open the folder which locates at **/Software/Windows** then double click the file named **Setup.exe** to start the installation procedure. To install follow these steps:

• Click the **Next** button to start the installation.

Setup - CyberPower Po	werPanel Business Edition
	Welcome to the CyberPower PowerPanel Business Edition Setup Wizard
	This will install CyberPower PowerPanel Business Edition on your computer.
	It is recommended that you close all other applications before continuing.
	Click Next to continue, or Cancel to exit Setup.
	Next > Cancel

• Accept the license agreement.

👂 Setup - CyberPower PowerPanel Business Edition 📃 🗖 🔀
License Agreement Please read the following important information before continuing.
Please read the following License Agreement. You must accept the terms of this agreement before continuing with the installation.
ELECTRONIC END USER LICENSE AGREEMENT FOR POWERPANEL BUSINESS EDITION
NOTICE TO USER:
THIS IS A CONTRACT. BY INSTALLING THIS SOFTWARE YOU ACCEPT ALL THE TERMS AND CONDITIONS OF THIS AGREEMENT. The End User License Agreement and copyright of PowerPanel(r) Business Edition product and related explanatory materials ("Software") are owned by its originated company. The term "Software" also shall include any upgrades, modified versions or updates of the Software licensed to you by
I accept the agreement
O I do not accept the agreement
< Back Next > Cancel



• Choose the component. In order to monitor multiple UPS units simultaneously, Center should be

installed. If one single computer is powered by the UPS with an RMCARD installed, Client should be installed.

Setup - CyberPower PowerPanel Business Edition	
Select Components Which components should be installed?	
Select the components you want to install; clear the components you do not want Click Next when you are ready to continue.	nt to install.
Next >	Cancel

• Choose the destination directory.

👂 Setup - CyberPower PowerPanel Business Edition 📃 🗖 🔀
Select Destination Directory Where should CyberPower PowerPanel Business Edition be installed?
Select the folder where you would like CyberPower PowerPanel Business Edition to be installed, then click Next.
Destination directory C:\Program Files\CyberPower PowerPanel Business Edition Browse
Required disk space: 92.4 MB
Free disk space: 2,160 MB
< Back Next > Cancel

• Choose the start menu folder.

CyberPower* Reliability, Quality, Value,

Setup - CyberPower PowerPanel Business Edition	
Select Start Menu Folder Where should Setup place the program's shortcuts?	
Select the Start Menu folder in which you would like Setup to create the program's shortcuts, then click Next.	
<pre></pre>	Cancel

• Click the **Finish** button to complete the installation.

🕑 Setup - CyberPower PowerPanel Business Edition 📃 🗖 🗙	
	Completing the CyberPower PowerPanel Business Edition Setup Wizard
	Setup has finished installing CyberPower PowerPanel Business Edition on your computer. The application may be launched by selecting the installed icons.
	Click Finish to exit Setup.
	Login CyberPower PowerPanel Business Edition
	Default username and password is "admin".
	CyberPower PowerPanel Business Edition has configured Windows Firewall settings.
	Finish

Installation on Linux

The installer is used to install the Client and requires root permission. The installation wizard will guide users to complete the installation. Browse the CD and find the installer in the **/Software/Linux** folder. Initiate an installation wizard by running the **./ppbe210-linux-x86.sh** command or double clicking **ppbe210-linux-x86.sh** from desktop on 32-bit Linux systems. Initiate an installation wizard by running the **./ppbe210-linux** systems. Initiate an installation wizard by running the **./ppbe210-linux-x86_64.sh** from desktop on 64-bit systems.

Note: On Linux systems, users may mount the CD by using the mount command. Run **mount –t iso9660** /dev/cdrom /mnt/cdrom as a root user. /dev/cdrom is the CD drive and /mnt/cdrom will be the mount point.



To install follow these steps:

• Click the **Next** button to start an installation.



• Accept the license agreement.

 Setup - CyberPower PowerPanel Business Edition 	on 💶 🗙
License Agreement Please read the following important information before continuing.	
Please read the following License Agreement. You must ad terms of this agreement before continuing with the install	ccept the ation.
ELECTRONIC END USER LICENSE AGREEMENT FOR CYBER POWERPANEL BUSINESS EDITION	POWER
NOTICE TO USER:	
THIS IS A CONTRACT. BY INSTALLING THIS SOFTWARE YOU ACCEPT ALL THE TERMS AND CONDITIONS OF THIS	, ,
O I accept the agreement	
○ I do not accept the agreement	
< Back Nex	t > Cancel

• Choose the component. In order to simultaneous monitor multiple UPS, Center should be installed. If one single computer which is powered by the UPS requiring protection, Client should be installed.

CyberPower® Reliability. Quality. Value.

 Setup - CyberPower PowerPanel Business Edition 	. ×
Select Components Which components should be installed?	
Select the components you want to install; clear the components you do not want to install. Click Next when you are ready to continue	э.
Center 🞯 Client 🞯 R Agent 🞯	
Next > Ca	ncel

• Choose the destination directory.

💿 Setup - CyberPower PowerPanel Business Edition 📃 🗙
Select Destination Directory Where should CyberPower PowerPanel Business Edition be installed?
Select the folder where you would like CyberPower PowerPanel Business Edition to be installed, then click Next. Destination directory /usr/local/ppbe
Required disk space: 62.1 MB Free disk space: 6,176 MB
< Back Next > Cancel

• The daemon **ppbed** will start during installation.

CyberPower® Reliability. Quality. Value.



• Click the **Finish** button to complete the installation.

 Setup - CyberPov 	ver PowerPanel Business Edition 📃 🗙
	Completing the CyberPower PowerPanel Business Edition Setup Wizard
	Setup has finished installing CyberPower PowerPanel Business Edition on your computer. The application may be launched by executing the installed start scripts.
	Click Finish to exit Setup.
	🛿 Login CyberPower PowerPanel Business Edi
	Default username and password is "admin".
	Finish

Note: If the Linux installation needs to be initiated in the terminal, use the **./ppbe210-linux-x86.sh -c** command on 32-bit systems or **/ppbe210-linux-x86_64.sh –c** command on 64-bit systems. The detailed installation steps are described in the **Installation on Citrix XenServer and VMware ESX/ESXi** section.

Installation on Citrix XenServer and VMware ESX/ESXi

The installer is used to install the Client and requires root permission. The installation wizard will guide users to complete the installation. Browse the CD drive and find the installer in the **/Software/Linux** folder. Initiate an installation procedure by executing the **./ppbe210-linux-x86.sh** command in the **Server Console** on Citrix XenServer or executing the **./ppbe210-linux-x86_64.sh** command in the **Service Console** on VMware ESX and vMA on ESXi.



Installation for ESX server must be launched on the Service Console (aka Console Operation System); installation for ESXi server must be launched on the vMA (vSphere Management Assistant) installed on the VMware ESXi host computer.

Note: On Citrix XenServer and VMware ESX/ESXi, users may mount CD by using the mount command. Run *mount /dev/cdrom /mnt/cdrom* as a root user. /dev/cdrom is the CD drive and /mnt/cdrom will be the mount point.

Note: On VMware ESXi, users can also upload the installer to vMA by using **vSphere Client** tool. Visit VMware website to download **vSphere Client** tool and refer to FAQ chapter of PowerPanel Business Edition User's Manual to know how to upload installer by using **vSphere Client** tool.

Note: Users can deploy vMA on VMware ESXi. Visit the <u>VMware</u> website for vSphere Management Assistant Guide documentation about vMA deployment on VMware ESXi.

The installation procedure will be initiated as following steps:

• Press Enter to start an installation.

```
Starting Installer ...
This will install CyberPower PowerPanel Business Edition on your computer.
OK [o, Enter], Cancel [c]
```

• Accept the license agreement.

```
YOUR ACCEPTANCE OF THE FOREGOING AGREEMENT WAS INDICATED DURING
INSTALLATION.
I accept the agreement
Yes [1], No [2]
```

• Choose the component. In order to monitor multiple UPS units simultaneously, Center should be installed. If one single computer is powered by the UPS, Client should be installed.

```
Which components should be installed?
1: Center
2: Client
3: Agent
Please enter a comma-separated list of the selected values or [Enter] for the de
fault selection:
```

• Choose the destination directory.

```
Where should CyberPower PowerPanel Business Edition be installed?
[/usr/local/ppbe]
```

• Installation procedure starts and once finished. It will end automatically.

```
Please wait for CyberPower PowerPanel Business Edition configuring
Default username and password is "admin".
CyberPower PowerPanel Business Edition may not do hibernation.
Finishing installation...
```



Access PowerPanel[®] Business Edition Software Interface

To access the PowerPanel Business Edition interface in Windows, go to Start > All Programs > CyberPower PowerPanel Business Edition > PowerPanel Business Edition Client (or PowerPanel Business Edition Client), which will take you to the login page.

On Linux, user can also enter the URL as http://127.0.0.1:3052/ in the address of the web browser to access to the interface. User can also enter the URL, http://hosted_computer_ip_address:3052/, in the address of the web browser to access the interface from a remote computer. hosted_computer_ip_address is the IP address of the host computer which has the PowerPanel[®] Business Edition installed. For vMA on the ESX or ESXi, hosted_computer_ip_address is the IP address of the host computer on ESX.).

The default username is **admin** and the default password is **admin**. For security purposes, it is recommended you change the login username and password after the initial login.

Configure Power Protection for Computers

In order to ensure the computers which are connected to the UPS have sufficient time to complete the shutdown prior to turning off outlets, Client should be installed. The Client will establish communication with the UPS and receive commands from the UPS for a complete shutdown to avoid data loss or a system crash. Refer the **Install PowerPanel[®] Business Edition Software** chapter for installing the Client.

Assign IP Address of UPS Units and Connected Outlet

Communication can be established through the network by assigning the IP address of the UPS **RMCARD** and outlet assignment on the **Power/Configuration** page in the Client. In order to ensure the UPS RMCARD can respond to the Client normally, the community configuration must be setup properly.

Assign the IP address of the UPS RMCARD at the *Address* field or pick an address from the device list which shows all devices on the local network. Users have to assign the UPS output outlet which supplies power to the Client computer according to the actual connection. Click the **Apply** button for Client to establish the communication between Client and UPS.

Setup Necessary Shutdown Time

Each computer running the Client requires sufficient time to be shut down completely before the UPS stops supplying power. Therefore users should set up this sufficient time at the *Necessary shutdown time* option on the **Event Action/Settings** page in the Client.

Configure Shutdown Action for VMware ESXi

In order to ensure the ESXi host and all virtual machines can be shut down correctly in case of power events, users have to configure the host address, account and password of the root user for the host shutdown from

vMA. Fill in the *Host Address, Account* and *Password* fields with actual username and password for ESXi host on the **Event Action/Settings** page.

Note: Host Address is the IP address of the ESXi host computer on which vMA is operating but not the IP address of vMA.

Shutdown	
Necessary shutdown time	3 🗸 minutes
Shutdown type	Shutdown 👻
VM Host	
Host Address	192.168.100.200
Account	root
Password	•••••
	Apply

Note: In order to allow the interactions between physical and virtual machines, VMware tools must be installed on each virtual machine. Refer to VMware ESX/ESXi Server documentation for further information about VMware Tools.

Configure Shutdown Action for Citrix XenServer

In order to ensure the XenServer host and all virtual machines can be shut down correctly, users have to configure the account and password of root user for host shutdown. Fill in the *Account* and *Password* fields with actual username and password for shutdown action on the **Event Action/Settings** page.

Shutdown		
Necessary shutdown time	3 🚽 minutes	
Shutdown type	Shutdown 👻	
VM Host		
Account	root	
Password	••••	
	Apply	

Configure Startup and Shutdown of Virtual Machines on VMware ESX/ESXi

In order to ensure that all virtual machines and VMware ESX/ESXi server host can be shut down and restart gracefully.



• Select the topmost VMware ESX/ESXi server host from the tree hierarchy on the left side. Go to

Configuration → Virtual Machine Startup/Shutdown menu → Properties of the vSphere Client.

localhost.cyberpowersystems.com VMware ESXi, 4.0.0, 208167							
Getting Started Summary Virtual Machines Resource Allocation Performance Configuration Users & Groups Events Permission 4							
Hardware	Virtual	Mach	nine Startup and Sh	utdown			Properties
Health Status Processors Memory	Start and Stop Virtual Machines with the system Enabled Default Startup Delay 2 minutes Default Shutdown Delay 2 minutes						
Storage Networking	Order	Virtu	al Machine	Startup	Startup Delay	Shutdown	Shutdown Delay
Networking Storage Adapters Network Adapters Advanced Settings Software Licensed Features Time Configuration DNS and Routing Virtual Machine Startup/Shutdown Virtual Machine Swapfile Location Security Profile System Resource Allocation	Autom 1 2	atic S	tartup XP SP3 vSphere Managem	Enabled	10 seconds 120 seconds	Suspend Shut do	30 seconds 120 seconds

• Enable the Allow virtual machines to start and stop automatically with the system option.

Virtual Machine Startup and Shutdown								
System Settings								
Allow virtual machines to start and stop automatically with the system								
Default Startup Delay	Default Shutdown Delay							
For each virtual machine, delay startup for:	For each virtual machine, delay shutdown for:							
120 seconds	120 seconds							
Continue immediately if the VMware Tools start	Shutdown Action: Suspend							
Startup Order Power on the specified virtual machines when the system starts. During shutdown, they will be stopped in the opposite order.								
Order Virtual Machine Startup Startup Delay	Shutdown Shutdown Delay							
Automatic Startup	Move Up							
1 m XP SP3 Enabled 10 seconds	Suspend 30 seconds							
2 Managem Enabled 120 seconds	Shut do 120 seconds							
	Edit							
	OK Cancel Help							

Manage UPS Units in Center

If the administrator requires monitoring multiple UPS units on the local network at one time, PowerPanel[®] Business Edition Center should be installed. The Center can gather the state and events from the monitored UPS units and the monitored UPS units can also accept commands from the Center for shutting off or restarting. Computers running Client can be ordered to initiate a graceful shutdown. Refer to <u>Installing</u> <u>PowerPanel[®] Business Edition Software</u> chapter for further details about Center installation.



The Center can also establish communication with multiple UPS units. Monitored UPS units will relay the state to the Center and notify Center when and what power event occurs.



Add UPS Units

Users can monitor and control multiple UPS on the **Management/Power Equipment** page by accessing the *Add Device* window to add UPS to Center as below:

The *Add Device* window can be accessed by clicking the *Add Device* button of the toolbar or selecting the *Add Device* in the context menu of any one group node.

Management Power Equipment	Power Equipment Management					
IT Equipment						
System Logs	层 Block A					
Security Login	▷ 🧮 On Maintain					
Authentication	RMCAR201	🧿 Normal.				
Network Help	RMCARD202	🧿 Normal.				
Content						
About Logout						

Either enter the IP address of the UPS RMCARD on the *Device Address* field or click the **Browse** button to display the device list and select the IP address from the list. Click **OK** to proceed to add the selected UPS.

Note: If users require adding multiple UPS units to Center, repeat the aforementioned steps.

Note: Please refer to **PowerPanel Business Edition User's Manual** about further details of more functions about Center.