

# Supporting UPS

Doberman Security & Automation

Version 3.0

© 2000-2004, Golden Crater Software

---

Beginning in version 3.0, Doberman supports UPS systems under Windows XP, and depending on the OEM configuration, other version of Microsoft Windows.

In order for Doberman to support a UPS, it must meet either of these conditions:

- The operating detects the UPS as a battery and behaves as a laptop would (a Power item will appear on the Control Panel.)
- The computer is a laptop that contains a functional battery
- APC PowerChute Personal Edition is installed.

Windows XP will see and handle most USB power supplies without installing drivers. The operating system, will switch to power-saving mode (as a laptop would) and eventually shutdown on low power. Applications are notified as soon as power conditions change.

Installing drivers for Windows XP may change the way the UPS is handled by the operating system.

Installing APC PowerChute Personal Edition is a less accurate solution in that it does not notify applications when power conditions change. Doberman must watch for the tooltip to appear on the Desktop. This takes several seconds until the tooltip is shown, and will not display during short power 'bumps'. Since Doberman does not know about these 'bumps', device status may not be reset.

## ***Configuring Doberman to work with your UPS***

If either of the above conditions is met, Doberman will begin power recovery operation upon the next restart.

## ***How Doberman Power Recovery works***

Upon startup, Doberman asks the operating system if it has a battery, if so, Doberman watches for power state changes.

If Doberman cannot locate power services, it will search for a window specific to APC PowerChute Personal Edition (the tooltip.) If the window is located, Doberman watches for that window to be shown or hidden, and watches the specific text in that window.

When Doberman detects a power-loss condition, the last-known status of any protected devices is stored. When normal power resumes, Doberman waits until the device has completed its power-on cycle, and then resets the status to the last known state. Any macros that may have changed the state of these devices will be reflected in the update. All input from protected devices is ignored until power recovery is complete.

Furthermore, Doberman will change the status of the Alert Zone, to reflect the status change so that your macros may also take appropriate action.

As a safety feature, only certain devices are protected from power failure, currently the list includes:

- Aprilaire Thermostat/Humidistats
- RCS serial based Thermostats

Of course, your Action Spiders and Macros may protect any other devices you deem safe to restart after a power failure. Please remember that your home may be unoccupied at this time, and some devices may not reliably transmit their state change to Doberman.