

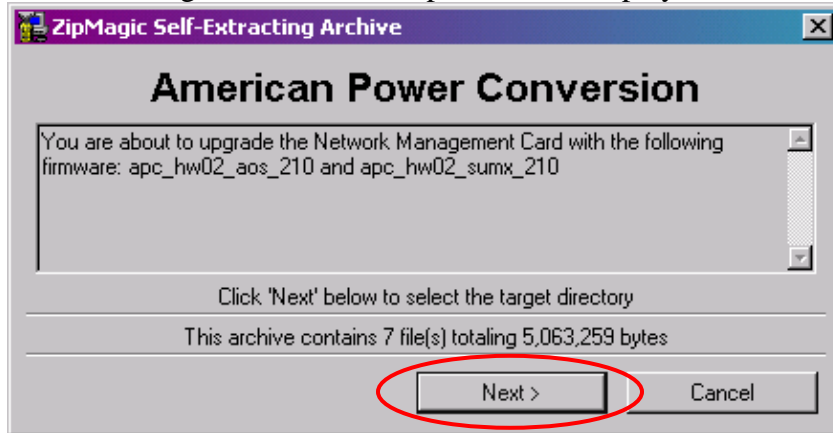
To upgrade multiple Network Management Cards

Part 1: Installing the NMC Upgrade Utility

1. Download, and save the proper NMC upgrade firmware to the Windows computer you will be performing the firmware upgrade from. Each of the NMC upgrade tools is a self-extracting executable file represented by an icon similar to what is shown here:



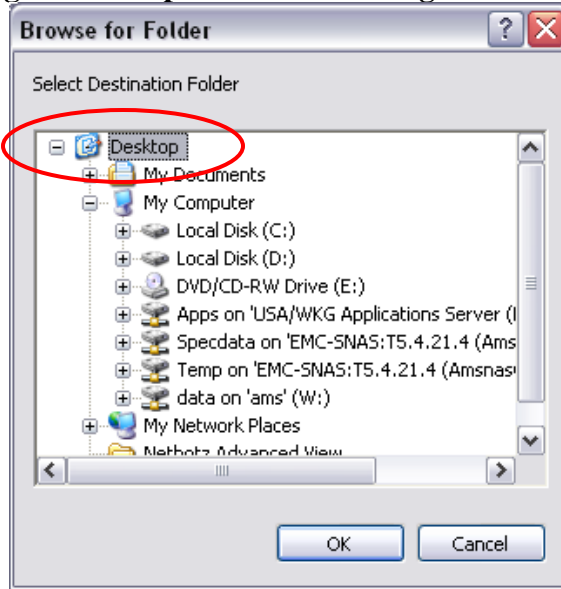
2. Double clicking this icon will begin the installation process and display the following:



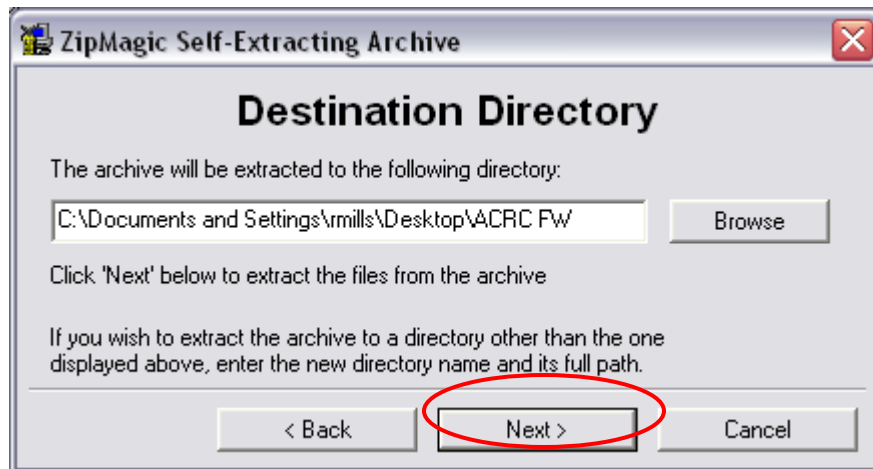
3. Press, “Browse” and select Desktop to put the file on your desktop.



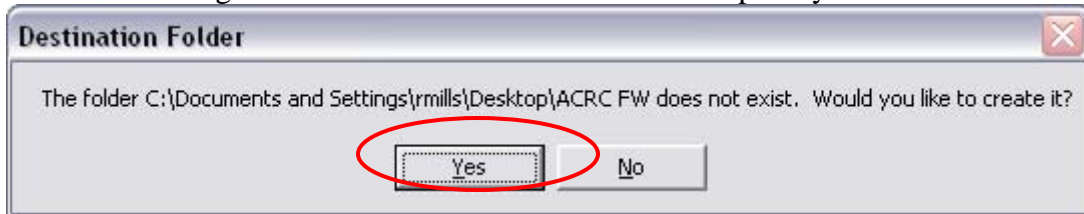
To upgrade multiple Network Management Cards



4. In the directory you will see something similar to “C:\Documents and Settings\rmills\Desktop.” Add the text “\ACRC FW” so it looks similar to what is below, then press “Next” to continue the installation process.

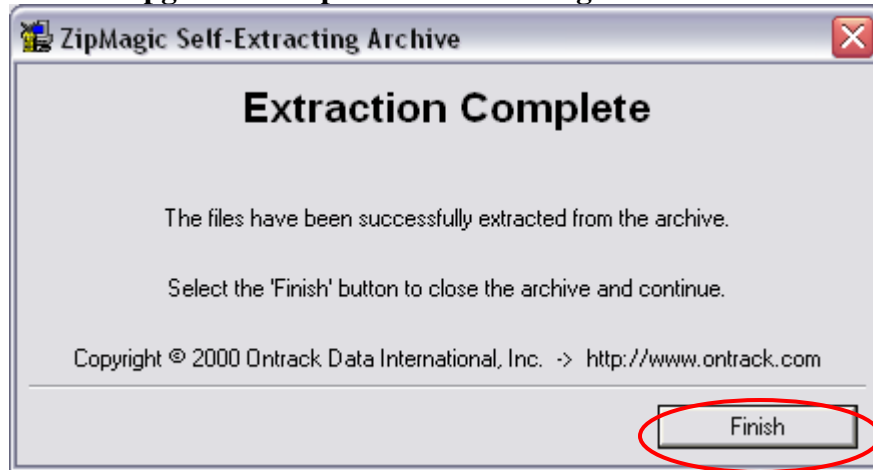


6. You will receive a message that this folder does not exist. Please press yes to create it.

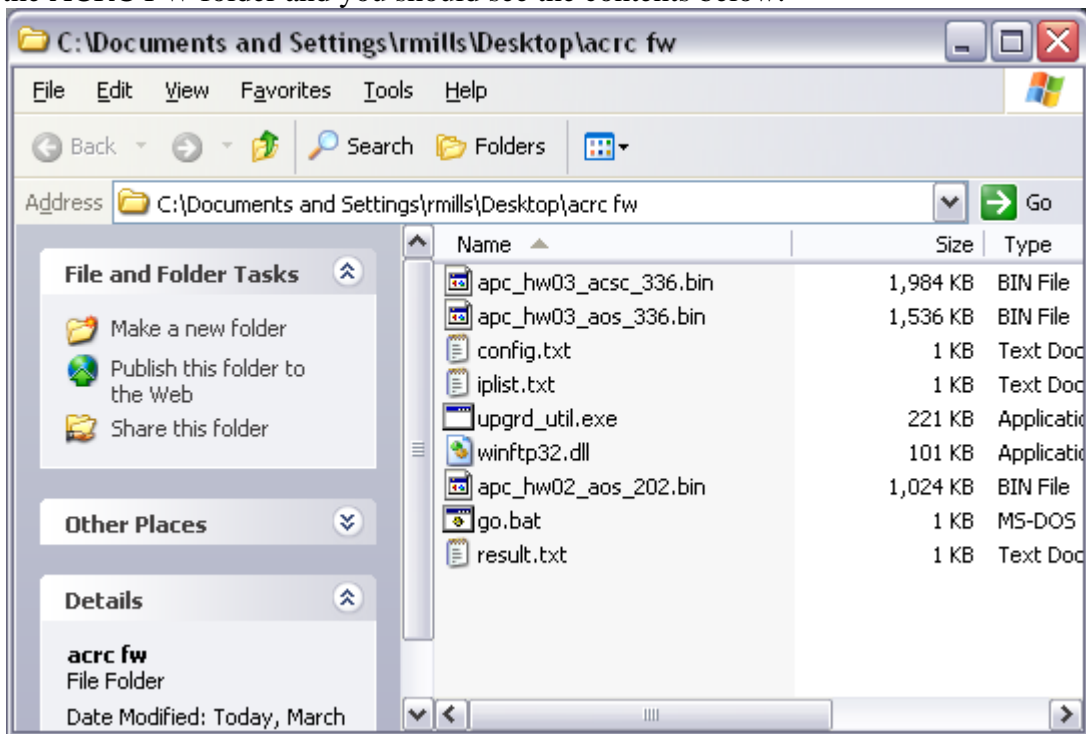


7. Once the install is set you will see the Extraction Complete screen.

To upgrade multiple Network Management Cards

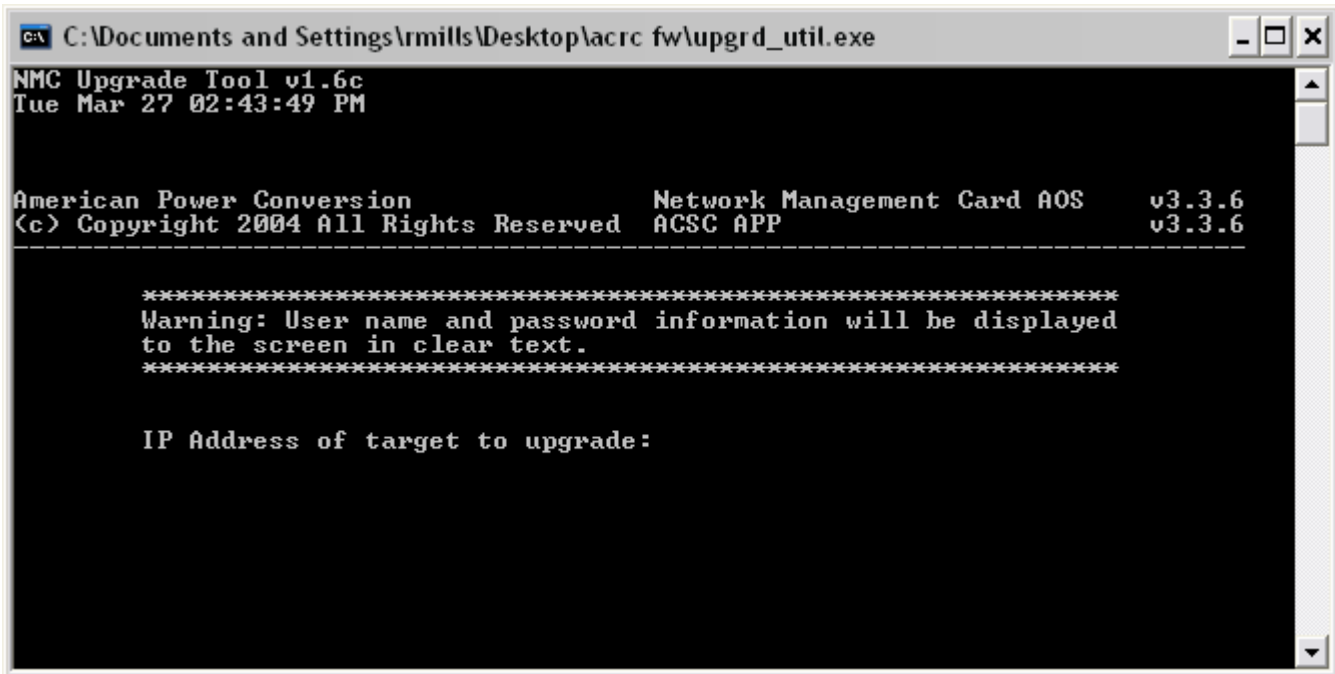


8. Press, "Finish" to close the extracted file and there will be 7 files unpacked in the destination directory previously specified.
9. Open the ACRC FW folder and you should see the contents below:



To upgrade multiple Network Management Cards

*NOTE: A command prompt window will open automatically. This window can be closed.



```
C:\Documents and Settings\rmills\Desktop\acrc fw\upgrd_util.exe
NMC Upgrade Tool v1.6c
Tue Mar 27 02:43:49 PM

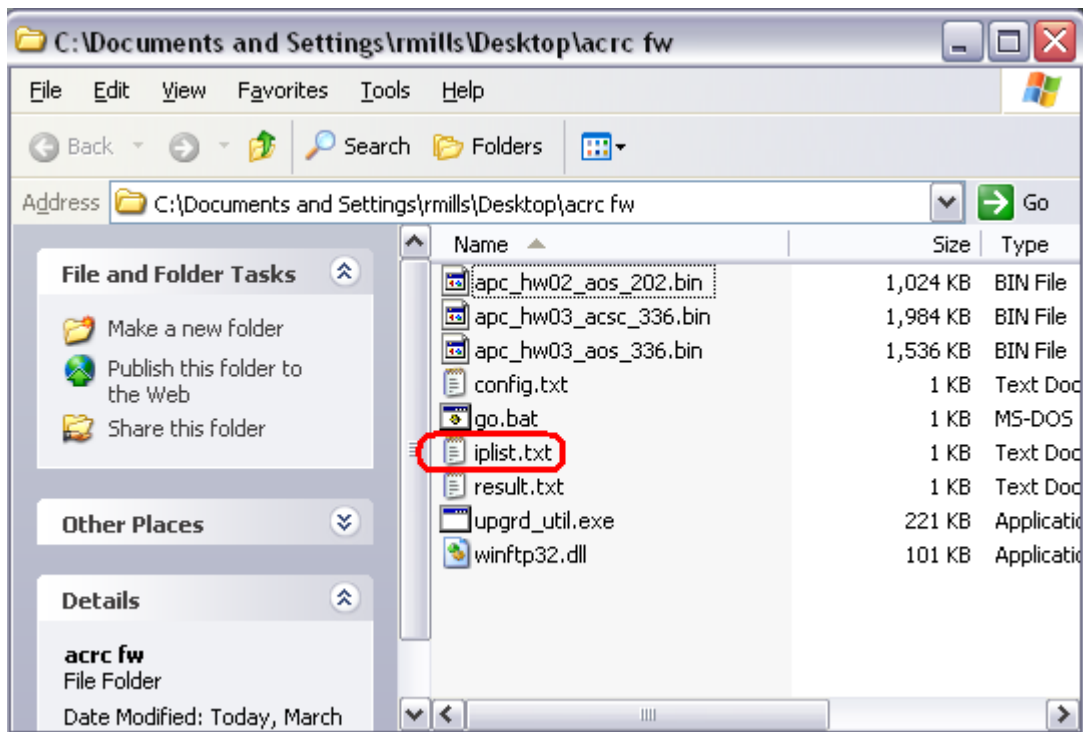
American Power Conversion      Network Management Card AOS    v3.3.6
(c) Copyright 2004 All Rights Reserved  ACSC APP                      v3.3.6

*****
Warning: User name and password information will be displayed
to the screen in clear text.
*****

IP Address of target to upgrade:
```

Part 2: Executing the NMC Upgrade Utility

1. Go to the directory that contains the upgrade utility. In this example it would be “C:\Documents and Settings\rmills\Desktop\ACRC FW”



2. Open the file iplist.txt by double clicking on the file.

To upgrade multiple Network Management Cards

3. Edit the file iplist.txt so it contains the IP addresses, administrator user names, and administrator passwords of all the Management Cards to upgrade. The following example shows three NMCs to be upgraded:

NOTE:

- a. Remove all semicolons at the start of each line (if present). (The semicolon indicates that the line is a comment only.)
- b. Copy the line block of text as many times as necessary, into 1 block of text (similar to that below) for each NMC or unit. Any blank line that you include as spacing will be ignored by the .ini file utility.
- c. Customize each text block with the IP address of each NMC to be upgraded with your system user name and password (i.e. apc)

SystemIP=159.215.4.86

SystemUserName=apc

SystemPassword= apc

SystemIP=159.215.4.87

SystemUserName= apc

SystemPassword= apc

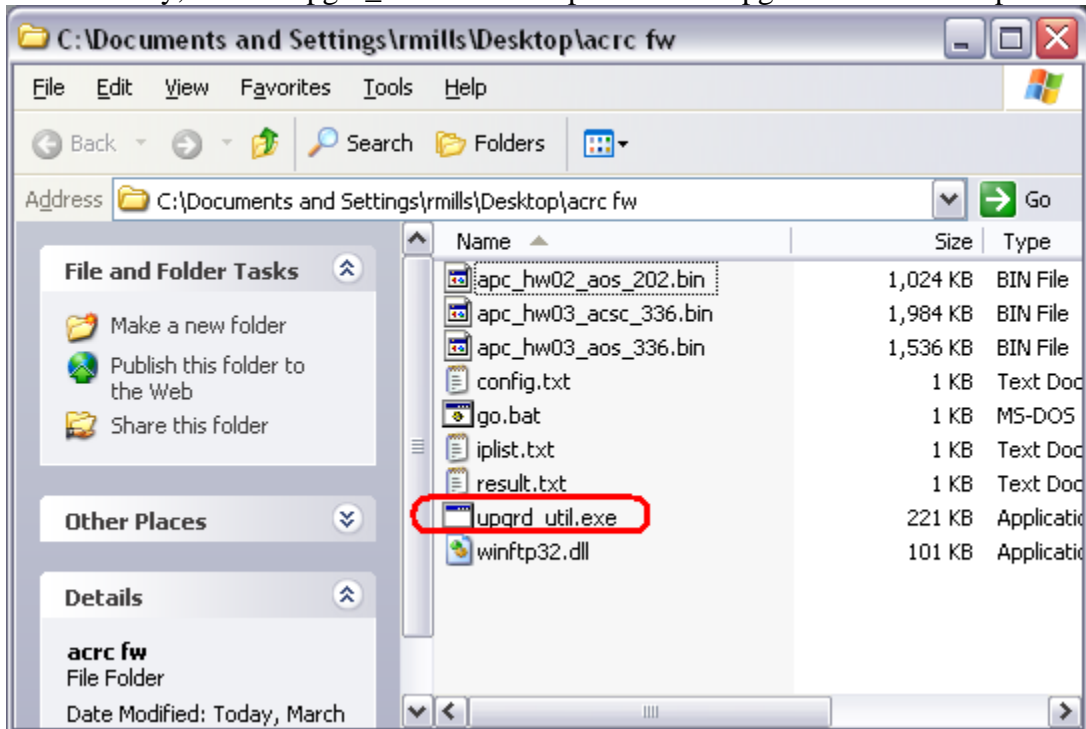
SystemIP=159.215.4.88

SystemUserName= apc

SystemPassword= apc

4. IMPORTANT: Save the new iplist.txt file. Do not change extension or file name.

5. From the same directory, run the upgrd_util.exe file to perform the upgrade and select Option 1.



To upgrade multiple Network Management Cards

```
C:\Documents and Settings\rmills\Desktop\acrc fw\upgrd_util.exe
NMC Upgrade Tool v1.6c
Tue Mar 27 03:15:01 PM

American Power Conversion      Network Management Card AOS    v3.3.6
(c) Copyright 2004 All Rights Reserved  ACSC APP                      v3.3.6
-----
Configuration detected ( iplist.txt ).
Found 1 upgrade configuration(s)

1: Use parameters in configuration file
2: Enter parameters for single upgrade
3: Exit Firmware upgrade tool
Action: 1
```

6. You will be given another set of options to choose from – please press Option 1.

```
C:\Documents and Settings\rmills\Desktop\acrc fw\upgrd_util.exe
NMC Upgrade Tool v1.6c
Tue Mar 27 03:15:01 PM

American Power Conversion      Network Management Card AOS    v3.3.6
(c) Copyright 2004 All Rights Reserved  ACSC APP                      v3.3.6
-----
Configuration detected ( iplist.txt ).
Found 1 upgrade configuration(s)

1: Use parameters in configuration file
2: Enter parameters for single upgrade
3: Exit Firmware upgrade tool
Action: 1
*****
Warning: There is a known issue with Windows XP when
upgrading devices running pre apc_hw02_aos_211.bin firmware.
If you are running Windows XP you should stop this upgrade and
run it from a pre-XP Windows machine.

1: Continue with upgrade
2: Enter parameters for single upgrade
3: Exit Firmware upgrade tool
Action: 1_
```

7. Verify on the computer screen that the NMC IP addresses were upgraded as the upgrade loads the OS.

To upgrade multiple Network Management Cards

```
C:\Documents and Settings\labadmin\Desktop\upgrd_util.exe
NMC Upgrade Tool v1.6c
Mon Mar 19 03:59:57 PM

American Power Conversion          Network Management Card AOS    v3.3.6
(c) Copyright 2004 All Rights Reserved ACSC APP                      v3.3.6
-----

Configuration detected < iplist.txt >.
Found 1 upgrade configuration(s)

1: Use parameters in configuration file
2: Enter parameters for single upgrade
3: Exit Firmware upgrade tool
Action: 1
*****
Warning: There is a known issue with Windows XP when
upgrading devices running pre apc_hw02_aos_211.bin firmware.
If you are running Windows XP you should stop this upgrade and
run it from a pre-XP Windows machine.

1: Continue with upgrade
2: Enter parameters for single upgrade
3: Exit Firmware upgrade tool
Action: 1

*****
Starting Upgrade to 159.215.4.86.
Checking network connection ...      OK
Testing login ...                    OK
Saving log files                     OK
Checking version information ...     OK
Attempting to log in ...             OK
Loading OS, please wait ...
```

8. Generally requires 4-5 min. per card.

```
C:\Documents and Settings\labadmin\Desktop\upgrd_util.exe
NMC Upgrade Tool v1.6c
Mon Mar 19 03:44:56 PM

American Power Conversion          Network Management Card AOS    v3.3.6
(c) Copyright 2004 All Rights Reserved ACSC APP                      v3.3.6
-----

Configuration detected < iplist.txt >.
Found 1 upgrade configuration(s)

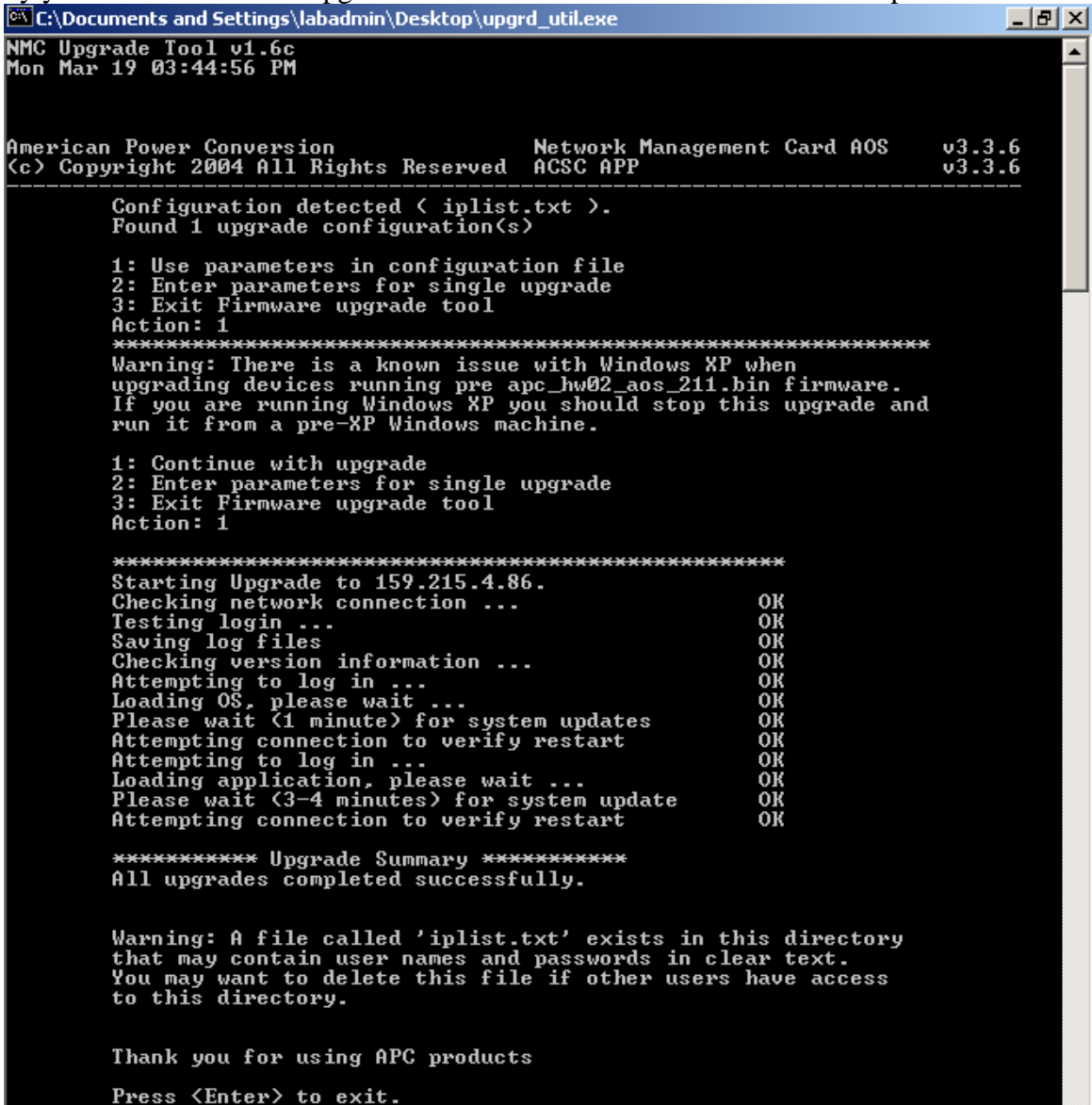
1: Use parameters in configuration file
2: Enter parameters for single upgrade
3: Exit Firmware upgrade tool
Action: 1
*****
Warning: There is a known issue with Windows XP when
upgrading devices running pre apc_hw02_aos_211.bin firmware.
If you are running Windows XP you should stop this upgrade and
run it from a pre-XP Windows machine.

1: Continue with upgrade
2: Enter parameters for single upgrade
3: Exit Firmware upgrade tool
Action: 1

*****
Starting Upgrade to 159.215.4.86.
Checking network connection ...      OK
Testing login ...                    OK
Saving log files                     OK
Checking version information ...     OK
Attempting to log in ...             OK
Loading OS, please wait ...          OK
Please wait <1 minute> for system updates OK
Attempting connection to verify restart OK
Attempting to log in ...            OK
Loading application, please wait ... OK
Please wait <3-4 minutes> for system update /
```

To upgrade multiple Network Management Cards

9. After running the system will take a moment to restart. You should see the NMC LEDs flashing as the card tries to verify your connections and upgrade. You will be informed once this is completed.



```
C:\Documents and Settings\labadmin\Desktop\upgrd_util.exe
NMC Upgrade Tool v1.6c
Mon Mar 19 03:44:56 PM

American Power Conversion          Network Management Card AOS      v3.3.6
(c) Copyright 2004 All Rights Reserved ACSC APP      v3.3.6
-----
Configuration detected < iplist.txt >.
Found 1 upgrade configuration(s)

1: Use parameters in configuration file
2: Enter parameters for single upgrade
3: Exit Firmware upgrade tool
Action: 1
*****
Warning: There is a known issue with Windows XP when
upgrading devices running pre apc_hw02_aos_211.bin firmware.
If you are running Windows XP you should stop this upgrade and
run it from a pre-XP Windows machine.

1: Continue with upgrade
2: Enter parameters for single upgrade
3: Exit Firmware upgrade tool
Action: 1

*****
Starting Upgrade to 159.215.4.86.
Checking network connection ...           OK
Testing login ...                         OK
Saving log files                          OK
Checking version information ...          OK
Attempting to log in ...                  OK
Loading OS, please wait ...               OK
Please wait (1 minute) for system updates OK
Attempting connection to verify restart  OK
Attempting to log in ...                  OK
Loading application, please wait ...      OK
Please wait (3-4 minutes) for system update OK
Attempting connection to verify restart  OK

***** Upgrade Summary *****
All upgrades completed successfully.

Warning: A file called 'iplist.txt' exists in this directory
that may contain user names and passwords in clear text.
You may want to delete this file if other users have access
to this directory.

Thank you for using APC products

Press <Enter> to exit.
```

10. Verify from the result.txt file that the Network Management Cards at the specified IP addresses were upgraded.

11. Review the log.txt file after the upgrade to verify and review upgrades.

Please not after hitting enter to start installation you MUST allow the installation to complete.

Raymond Mills creator
Rob Sutherland editor
Rev. Date - 27-Mar-07