



Nways Manager for HP-UX

Installation Guide

Version 2.0



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Note!

Before using this information and the product it supports, be sure to read the general information under "Chapter 7. Notices" on page 17.

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This edition applies to Version 2.0 of the Nways Manager for HP-UX.

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Chapter 1. Preface

About This Manual

This manual provides information that is needed to install IBM Nways Manager for HP-UX Version 2.0 on your network. It also provides instructions for configuring Nways Manager applications and the Asynchronous Transmission Mode.

Who Should Read This Manual

This manual is intended for use by network administrators, installation, and service personnel responsible for installing and configuring Nways Manager.

How This Manual is Organized

This manual contains the following sections:

- “Chapter 2. Introduction” on page 3 describes the components of IBM Nways Manager for HP-UX Version 2.0.
- “Chapter 3. Installing Nways Manager for HP-UX” on page 5 contains step-by-step instructions for installing IBM Nways Manager for HP-UX Version 2.0 on your network.
- “Chapter 4. Configuring Nways Manager Applications” on page 9 describes how to configure Nways Manager applications.
- “Chapter 5. Starting Nways Nways Element Manager for HP-UX” on page 13 describes how to start up the IBM Nways Element Management.
- “Chapter 6. Removing Nways Manager Applications” on page 15 describes how to remove IBM Nways Manager for HP-UX Version 2.0 from your network.

Chapter 2. Introduction

IBM Nways Manager for HP-UX Version 2.0 provides an effective way to manage heterogeneous networks (ATM, token-ring, Ethernet, FDDI), particularly medium to large local area networks with high-speed backbones.

Nways Manager consists of the following three components:

1. Element Manager
2. Remote Monitor
3. Asynchronous Transmission Mode Configuration (ATMC)

For the latest technical information, including prerequisites, visit the Nways Manager web page at:

<http://www.networking.ibm.com/netmgt>

Try Nways Manager for 60 Days

The CD-ROM that accompanies this book provides all the Nways Manager components. You can install the Nways Manager for HP-UX components and use them for a 60-day “demonstration” period. During (or after) this period, you can purchase any of the Nways Manager components. To assist you in ordering, the part numbers of these components are displayed when the installation program is complete.

When you purchase a Nways Manager component, you receive a Production License Use Certificate (software key) that unlocks the component and allows you to permanently use it. You do not have to reinstall the component or applications. To view the part numbers of the components previously loaded, begin the installation program and click the button labeled **Order** located on the second panel.

Hardware and Software Prerequisites

For the latest hardware and software prerequisites, visit the Nways Manager web page at:

<http://www.networking.ibm.com/netmgt>

Required Patches

This section lists required patches for applications used with Nways Manager for HP-UX

If you are using Network Node Manager Version 4.11, the following patches are necessary and can be downloaded from the HP Web site:

PHSS_16292

PHSS_16555

PHSS_16573

PHSS_17086

PHSS_17274

PHSS_17568

If you are using Network Node Manager Version 5.0, the following patches are necessary and can be downloaded from the HP Web site:

PHSS_17364

PHSS_17684

PHSS_17757

The required JDK 1.17.01 and its required patches are available at the HP Web site:

<http://www.hp.com/go/java>

PHSS_18012

PHSS_17225_a

PHSS_17534_a

PHSS_17544_a

PHSS_17566_a

PHSS_17872_a

PHSS_18012_a

PHCO_18018_a

_a indicates the patch is also required for HP-UX 10.20

The required patches for HP-UX 10.20 are also available at the HP Web site:

PHCO_18018

PHSS_17225

PHSS_17534

PHSS_17544

PHSS_17566

PHSS_17872

PHSS_18012

These patches are also required for JDK 1.17.01

Chapter 3. Installing Nways Manager for HP-UX

Note: Before beginning the installation process, make sure that you have access to the installation key code that is located in the liner notes of the CD-ROM jewel case.

To install Nways Manager for HP-UX Version 2.0, follow these steps:

1. Log in as the root user.
2. Make sure that you have stopped all the HP-OV daemons.
If you have previously installed Nways Remote Monitor, you must also stop the following processes:

```
/usr/LANReMon/rmoncommon/dcserver/bin/HP-UX/dcserver  
/usr/LANReMon/rmon/ls_dnslook
```

and delete these files:

```
/tmp/dcserver  
/tmp.lsvDNS
```

3. Insert the IBM Nways Manager for HP-UX Version 2.0 CD-ROM into the CD-ROM drive.
4. Using the following procedure, mount the CD-ROM to the mount directory:
 - a. Use the following command to start the pfsd_mount daemon:

```
/usr/sbin/pfs_mountd &
```

- b. Use the following command to start the pfsd daemon:

```
/usr/sbin/pfsd &
```

- c. Edit the file `/etc/pfs_fstab` to include the following line:

```
device_name mount_point pfs-iso9660 ro,suid 0 0
```

For example:

```
/dev/dsk/c1t2d0/cdrom pfs-iso9660 ro,suid 0 0
```

- d. Use the following command to mount the CD:

```
/usr/sbin/pfs_mount -t iso9660 -x no_version device_name/mount_point
```

For example:

```
/usr/sbins/pfs_mount -t iso9660 -x no_version /dev/dsk/ct2d0 /cdrom
```

- e. Use the following command to find the device name for your CD-ROM drive:

```
/usr/sbin/iocan -fn -C disk
```

5. Run the shell script to start the installation program by entering the command:

```
/cdrom/install.nways
```

The Welcome window for the installation program is displayed.

6. Follow the instruction prompts in the installation program to select and install Nways Manager for HP-UX Version 2.0.
7. If you are installing the “demonstration” version of this product, the part numbers of the components you installed are displayed when the installation is complete.

Important: Before you can remove a CD-ROM from the CD-ROM drive, you must first unmount the file system. To do so, enter the following command:

```
/usr/sbin/pfs_umount /cdrom
```

Installing and Using Acrobat Reader 3.0

Acrobat Reader 3.0 is provided on the CD-ROM. To install it:

1. Untar file aixreader.tar located in /cdrom/acrobat using the following command:

```
tar -xvf ar302hp_tar
```
2. Uncompress the resulting file.
3. Type **INSTALL** and follow the procedure.
4. When prompted, enter the Installation directory. By default it is

```
/usr/lpp/Acrobat3
```
5. Update your .profile with the Acrobat Reader installation directory:

```
export PATH=$PATH:/usr/lpp/Acrobat3/bin
```

To start Acrobat Reader 3.0 enter **acroread** then select the directory where the documentation you are looking for is stored.

Managing Licenses

If this is the first time you have installed Nways Manager for HP-UX Version 2.0, you will see the License panel that allows you to register your licensed products or elect to use a demonstration version of the installed Nways Manager components:

- To register a licensed product, enter your customer number and license key number when prompted.
- To install a 60-day demonstration version of the selected components, press **CTRL-C** to exit the License panel.

If you are installing the Element Management component or the Nways Manager Suite of components, you will be asked to select what version of these components you want to install and enter the number of nodes for which you have purchased a license.

If you have already installed some parts of the Element Manager component or the Nways Manager Suite, and have installed the correct license key, the installation program will complete automatically.

If you have not already installed an applicable license key, you will be taken to the License panel to install the key and complete installation.

Upgrading Your License

If you have purchased a license that allows you to upgrade from a demonstration version of a Nways Manager component, simply run the installation program again, select the component, and enter your customer number and license key number when prompted in the License panel.

This will install the license key, register the product, and save any of the accumulated data.

Increasing the Number of Licensed Nodes

If you have purchased a license allowing you to manage additional nodes using Nways Element Manager, use the following commands to update the node-count associated with your product release:

- If you have an Nways Element Manager license:

```
i4blt -U -v "IBM Corporation" -p "Nways Mgr HP-UX Element Mgr' 2.0" -T NUMNODES
```

where NUMNODES is the total number of nodes to support.

- If you have an Nways Manager Suite license:

```
i4blt -U -v "IBM Corporation" -p "Nways Mgr HP-UX Suite' 2.0.N" -T NUMNODES
```

where NUMNODES is the total number of nodes to support.

Determining What Nodes to Monitor

Nways Manager determines what nodes to monitor by the contents of the file `nwaysjma.ini`. To remove nodes that you do not want to monitor and thus increase the number of other nodes you can monitor with your current license, you can edit this file and remove their entries.

To add nodes that you do want to monitor, edit the file and create entries for them. To do this, you must know their SYSOID.

A copy of this file is created when Nways Manager is installed and named original.nwaysjma.ini. To revert to your original configuration, rename this file nwaysjma.ini.

Chapter 4. Configuring Nways Manager Applications

This section describes any additional configuration steps that you need to perform after installing Nways Manager for HP-UX.

Configuring ATMC

Step 1. To run Java Development Kit (JDK) 1.1.6, enter the following command to export the JAVA_HOME system variable:

```
export JAVA_HOME=/opt/java
```

Step 2. Install ObjectStore with the following patches:

```
PHSS_15391      PHSS_16585
```

If you are installing JDK 1.1.6, then you will also need the following patches:

```
PHSS_17331      PHSS_17155  
PHSS_17534      PHSS_17566
```

Step 3. Change the following environment settings:

a. Add the following lines to your /etc/profile file.

```
OS_ROOTDIR=/usr/local/ODI/OS5.1  
SHLIB_PATH=/usr/local/ODI/OS5.1  
JAVA_HOME=/opt/java
```

b. Add the following lines to your /.profile file:

```
PATH=$PATH:/usr/local/ODI/OS5.1  
SHLIB_PATH=/usr/local/ODI/OS5.1  
JAVA_HOME=/opt/java  
OS_CACHE_SIZE=5,000,000  
OS_ROOTDIR=/usr/local/ODI/OS5.1  
OS_COMMSEG=/usr/CML/OSTORE/CACHE  
OS_CACHE_DIR=/usr/CML/OSTORE/CACHE
```

c. Run the etc/environment file to make the changes effective.

Open View 5.0

If using Open View 5.0, install the following patches:

```
PHSS_17364  
PHSS_17684  
PHSS_17757
```

Open View 4.11

If using Open View 4.11, install the following patches:

PHSS_16292	PHSS_16555
PHSS_17086	PHSS_16573
PHSS_17274	PHSS_17568

Configuring Element Management

The Element Management component requires no additional configuration.

Remote Monitor

Before you can use Remote Monitor, you must set the RMONHOME environment variable to point to:

```
/usr/LANReMon/rmon
```

To set the RMONHOME environment variable in your .profile and add it to your default path, add the following lines to your .profile:

```
RMONHOME=/usr/LANReMon/rmon  
export RMONHOME  
PATH=$RMONHOME:$PATH  
export PATH
```

DB2 Universal Database

Performance management for these device managers uses a Java Database Connectivity (JDBC)-compliant database. For your convenience, IBM provides the Enterprise Edition of DB2™ Universal Database.

You will need to create a database instance that the device managers can access via JDBC. The concept is the same as if you were using another JDBC-compliant database, but you will need to refer to that database's instructions.

For information on configuring DB2 for use with Nways Manager, refer to *Using Nways Manager - Element Management*.

Using Web Servers

Before you can use the various web servers to configure Nways Manager, you must install the following web server settings. All web servers have to be configured to listen to the client on port 80 (which is the default port for most of the servers).

Apache Server

1. Add the following lines in the given order to the file:

```
/Server_root/cpnf/srm.conf.  
Alias /nways "/Nways_root/CML/JMA/java/websvr"  
Alias /cgi/code "/Nways_root/CML/JMA/java/websvr/code"  
ScriptAlias /cgi "/Nways_root/CML/JMA/java/websvr"
```

Server_root - The directory where the Apache Websvr is installed.

Nways_root - The directory where the Nways product is installed.

Netscape Server

1. Go to the server main page and check whether the server is ON.
2. Select **Programs** menu from the top of the page.
3. Select **CGI File Type**.
4. Select **Yes** for Activate CGI as a file type.
5. Select **Content Management** from the top menu.
6. Select **Additional Document Directories**, and add the following lines:

```
URL prefix: nways  
Map to directory: /Nways_root/CML/JMA/java/websvr
```

```
URL prefix: cgi  
Map to directory: /Nways_root/CML/JMA/java/websvr
```

Domino Web Server

1. Go to **http://Machine/Frntpage.html** (machine where you have installed the Domino Web Server).
2. Select **Configuration and Administration Forms**.

(http://Machine/admin-bin/Cfgin/initial)

3. Select **Request Routing**.

(http://Machine/admin-bin/Cfgin/mpfrule)

4. Add the following lines in the given order:

Action	Request Template	Replacement File Path
Pass	/nways/*	/Nways_root/CML/JMA/java/websvr/*
Exec	/cgi/CgiLauncher*	/Nways_root/CML/JMA/java/websvr/CgiLauncher*
Pass	/cgi/*	/Nways_root/CML/JMA/java/websvr/*

Chapter 5. Starting Nways Nways Element Manager for HP-UX

The first time you start an application, be sure that you log in as a root user. To start the Nways Manager applications that you have installed, enter the command:

```
/opt/OV/bin/ovw
```

The Network Node Manager root map is displayed, from which you can open Nways Manager applications.

To open a Java Device view:

1. Select a device by clicking on an icon in the Topology Map.
2. Select **Tools->IBM Nways Java: Open Java Device View** or select **Tools->IBM Nways Java: Open IBM 8260 Switching Module Series**

Starting ATMC

To open Nways Manager in the ATM configuration:

1. Click on the "ATM Campus" icon to display the ATM topology.
2. Click on the "VLANs" icon to use the LAN-Emulation function.

Starting Remote Monitor

You can start Remote Monitor in three different ways:

1. From the Java Management Application (JMA) of devices that support RMON.
2. From the OpenView Toolbar, select any of the options in the **Performance->Nways Manager-Remote Monitor->Menu**.
3. From the command line enter:

```
$RMONHOME/rmon
```

Accessing the README Files

The following README files are also installed:

Component	README File
Remote Monitor	/usr/lpp/lanReMon/lpp.README
Element Manager	/usr/CML/misc/README

Accessing Online Documentation

After starting Nways Manager, you can access online User's Guides for Nways Manager applications at the following web page:

<http://www.networking.ibm.com/netmgt>

Remote Monitor Online Documentation

Use the latest version of Acrobat Reader (3.0 or later) to access online documentation for Remote Monitor, available in these directories:

[/usr/LANReMon/doc/ecam.pdf](#)

[/usr/LANReMon/doc/lanremon.pdf](#)

Element Management Online Documentation

Use your HTML browser to access the file:

[/usr/CML/JMA/java/websvr/help/toc.html](#)

ATMC

- For the latest online documentation for the Element Management, visit the Nways Element Management web page at:

<http://www.networking.ibm.com/netmgt>

Chapter 6. Removing Nways Manager Applications

To remove Nways Manager applications, perform the following:

Removing Filesets

1. Make sure that you have root privileges.
2. At the command line, enter **/usr/sbin/swremove**
3. From the SD Remove panel, select:
 - nwaysmgr** - to remove Nways Element Manager
 - lanReMon** - to remove Nways Manager Remote Monitor
 - rmonCommon** - to remove Nways Manager Remote Monitor
 - ahm6000** - to remove ATMC

Note: Select **cml** only if you are uninstalling the entire product set.

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Easy to find	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Easy to understand	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Well organized	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Applicable to your tasks	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

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