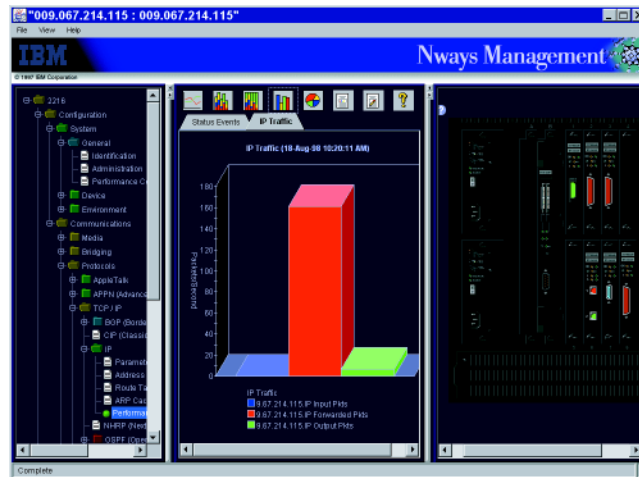


IBM Nways Manager for HP-UX Version 1.2

- **Reduces network ownership cost and improves network availability**
- **Easy-to-use, graphical network management including comprehensive device management**
- **Web-based management using Java™ technology**
- **Java-based performance management with Distributed Intelligent Agents**
- **Remote monitoring of your network's performance, through RMON and RMON2 support**
- **Manages switched virtual networks, including ATM Forum-compliant emulated LANs (ELANs)**
- **Enables you to view your network traffic from a protocol and application perspective**



IBM Nways® Manager for HP-UX is a family of network management products that bring reliable, state-of-the-art management to your networking infrastructure. Nways Manager includes different applications to satisfy your network management demands, with management at the LAN, segment, device or port level for Token-Ring, Ethernet, FDDI and ATM networks and support for virtual LANs (VLANs). And Nways Manager supports Web-based device and performance management using Java technology, allowing you to access any SNMP device in your network through the corporate intranet or Internet.



Product Overview

Nways Manager applications provide an easy-to-use, cost-effective, comprehensive network management solution for customers with IBM networking devices in medium-to-large Ethernet, FDDI, Token-Ring and ATM networks, including VLANs. It also supports APPN® networks and DLSw networks. Nways Manager for HP-UX consists of the following applications.

The Element Manager component is an easy-to-use, cost-effective, management solution for medium-to-large Ethernet, FDDI, ATM and Token-Ring networks. It provides graphical device management applications for various SNMP-enabled IBM networking devices.

With Java-based management support, you can manage your devices from your intranet, the Internet and from your local HP-UX workstation.

The Remote Monitor component is a remote monitoring (RMON) application that collects, monitors, analyzes and displays statistics from all RMON groups, some RMON2 groups (protocol directory, protocol distribution, address mapping and probe configuration) and IBM's Enterprise Communications Analysis Module (ECAM) groups. Nways Workgroup Remote Monitor also supports configuration of RMON, RMON2 and ECAM agents, providing a single applications for configuration.

Because IBM embeds RMON agents in its networking devices, if you also have Remote Monitor running, the Element Manager component can access the Remote Monitor information (RMON coupling) for the IBM networking devices that imbed RMON. RMON coupling allows the graphical management applications for these devices to seamlessly access and display the RMON, RMON2 and the ECAM data provided for these devices by Remote Monitor.

Reduces network ownership cost and improves network availability

Nways Manager for HP-UX provides integrated software applications that lower network operating costs. All the components of Nways Manager have a common look and feel, so your network operator training is reduced and your personnel are more productive. These network management applications enable you to find and resolve problems quickly, reducing network outages. With Nways Manager, your operators configure and manage the network and network devices remotely from a single network management workstation, reducing the number of operators and the amount of travel required. Performance information helps you to optimize your network.

Remote monitoring means that cost-savings and staff productivity go up as the number of RMON-managed LAN segments increases. Users are more productive as network operation and administration are reduced because problems are identified before they occur.

Provides easy-to-use, graphical network management

With Nways Manager for HP-UX you can set performance-thresholds, collect real-time and historical statistics and display the information your network operator needs to manage your networks and networking devices proactively.

You can also download code updates to specific devices.

To provide security you identify the level of access controls that you need. Nways Manager then uses the security features inherent in Network Node Manager V 5.01 and SNMP to control access to networking devices. Java technology also provides secure access through existing Web server security.

Provides comprehensive device management

Nways Manager for HP-UX offers management support for a limited set of IBM networking hardware. You can configure, reset, monitor, set performance thresholding capabilities for, collect real-time and historical statistics for, download microcode to and Telnet to devices in your network. Realistic, color-coded views of your network devices keep you apprised of the status of each device. Nways Manager provides a complete set of messages, traps and event notifications for devices in the network.

The graphical device management applications included with Element Manager are listed previously.

For the most current list of supported devices and microcode levels, go to the networking support Web page at www.networking.ibm.com/support/. From the networking support page, select Nways Manager for HP-UX, Tech Tips and look under general information.

The Remote Monitor component provides support for RMON-compliant probes.

Provides Web-based management using Java technology

Web-based management using Java technology enables you to manage your network not only from the Nways Manager workstation, but also over your intranet or the Internet through a JDK level-compliant Web browser. With Java technology, as the status of your network changes your Web browser is automatically updated with the latest information.

This management support includes real-time status of the device (complete with a graphical view of the supported IBM devices), the ability to configure the device through a user-friendly hierarchical navigation tree and the ability to do performance management of these devices.

Provides performance management

Performance management provides the ability to select and monitor specific MIB objects or collections of MIB objects. Creating collections of MIB objects allows you to create complex expressions that provide a better representation of performance information. For example, to identify the percent utilization of a LAN interface, you can specify: *(ifInOctets.* + ifOutOctets.*) * 8 / ifSpeed.* * 100*

You can specify objects or collections of objects to monitor, set thresholds for these objects, specify the action to occur when a threshold is exceeded, display the data graphically (for example pie charts, line graphs, bar charts) and store the data for report generation.

This performance information allows you to baseline, tune and to proactively manage your network.

Java-based Performance Management optionally requires a Java Database Connectivity (JDBC)-compliant database for historical and trend analysis.

Supports distributed intelligent agents

To support larger networks, the Element Manager component's performance functions use Java-enabled Distributed Intelligent Agents. These agents enable you to offload the polling of information from the manager workstation, freeing up the processor on the manager, and to place the polling close to the devices being polled, freeing up bandwidth across WAN links. These agents can be configured to notify Nways Manager when exceptions occur such as when a threshold is exceeded. The agents can be placed in any Java-enabled (Java virtual machine) workstations in the network.

Provides remote monitoring of your network's performance, through RMON and RMON2 support

RMON and RMON-2 are standards from the Internet Engineering Task Force (IETF) that advance the state-of-the-art in open network performance management and fault diagnosis.

RMON defines a standard set of MAC-layer statistics and the ability to filter and capture data packets for analysis. RMON-2 allows you to go beyond the previous RMON standard to full seven-layer data collection using ECAM support or via RMON-2-compliant probes, including segment, host and conversation statistics for the major protocols and application types.

Remote Monitor provides not only the RMON functions but also takes advantage of ECAM and RMON2 capabilities to provide address translation, protocol distribution and protocol-matrix analysis of Layer-3 or higher protocols within your network.

- Address translation - translates MAC addresses to network-layer addresses
- Protocol distribution - allows you to view the protocols and applications being used on the network
- Protocol matrix - provides information about who is talking to whom in the network and what protocols they are using

The Traffic Transmission Monitor Module (TTMM) is a fast, effective means of transmitting capture packets to specific segments or rings for stress-testing or network simulation. The captured data can also be loaded from other LAN analysis tools such as IBM DatagLANce Network Analyzer.

Use Remote Monitor to proactively manage your network performance:

- Watch for emerging problems and short-term trends

- Check network performance and utilization
- Set network service objectives
- Plan short-term and long-range network capacity
- Determine the busiest stations in your network
- Troubleshoot network problems and outages
- Capture and analyze network traffic based on definable filter criteria
- Analyze network traffic trends, including protocol distribution
- Associate MAC-layer addresses to network-layer addresses
- Configure RMON, RMON2 and ECAM agents

New features with Version 1.2

A new packaging and ordering process delivers all of the components of Nways Manager for HP-UX on each CD-ROM. These components are license-use enabled. Part number 04L6294, which contains both components and the try-and-buy license certificates on a CD-ROM, allows you to try Nways Manager for HP-UX for 60 days. The CD can also be ordered using publication number SK2T-0432.

When you order one of the components, you will receive a CD containing all of the components and the permanent license certificate for the component ordered. A 60-day try-and-buy certificate is included on the CD for the other component.

Installation of the Nways Manager for HP-UX components has been simplified with a user-friendly graphical installation process.

There are new Java-based features in the Element Manager component such as:

- Performance management
- Distributed Intelligent Agents
- Element Management for the following products:
 - IBM 2210 Nways Multiprotocol Router
 - IBM 2216 Multiaccess Connector
 - IBM 8210 Nways Multiprotocol Switched Services (MSS) Server
 - IBM 8260 Switching Module series (blades/modules in the 8260)
 - IBM 8273 Nways Ethernet RouteSwitch
 - IBM Ethernet and Token-Ring Adapters
- MSS Client Universal Feature Card (UFC) in:
 - IBM 8270 Nways LAN Switch
 - IBM 8272 LAN Switch modules (3-slot modules)
- MSS Domain Client UFC in:
 - IBM 8270 Nways LAN Switch
 - IBM 8271 and 8272 LAN Switch Modules (2 or 3 slot modules in the 8260)
 - IBM 8272 Nways Token-Ring LAN Switch model 216
- IBM 8239 Token-Ring Stackable Hub
- IBM 8245 10/100 Ethernet Stackable Hub
- IBM 8265 Nways ATM Switch (available at a future date)
- IBM 8271 Nways Ethernet LAN Switch Models 512, 612, 624, 712, E12, E24, F12, and F24

- IBM 8275 Nways Ethernet LAN Switch
- Network Utility

• And more! For more details see www.networking.ibm.com/netmgt

Also included in Nways Manager for HP-UX Version 1.2 is new RMON-2 support in the Remote Monitor component.

Year 2000 ready

The IBM Nways Manager for HP-UX Version 1.2 is Year 2000 ready when used in accordance with its associated documentation and is capable of correctly processing, providing and receiving data within and between the 20th and 21st centuries, provided that all other hardware, software and/or firmware used with the product properly exchange data with it.

Nways Manager Specifications

IBM Nways Manager for AIX

Program	Program Number	FC	PN
Nways Manager for HP-UX V1.2 Try and Buy Package	5697-D67	2580	04L6294
Nways Manager for HP-UX V1.2 Element Manager (Program Package)	5697-D67	2581	04L6295
Nways Manager for HP-UX V1.2 Remote Monitor (Program Package)	5697-D67	2587	04L6297

Supplementary Information

The following sales tools are available for Nways Manager product:

- Specification sheet:
IBM Nways Campus Managers for HP-UX, G224-4541
- The latest technical information, including prerequisites and supported Web browsers, are at:
www.networking.ibm.com/netmgt
- Availability of any new material is announced with ordering information on the INEWS/LANINFO and NETWORK categories. You can subscribe to stay current with news regarding IBM Nways Manager products.
Proactive Management Solutions for the Campus and Wide Area Network, G325-3521
Nways Campus Managers for HP-UX, G224-4541
Nways Workgroup Manager and Remote Monitor, G224-4527
Nways Manager for AIX, G224-4531