This CD-ROM contains programs provided by IBM and other program suppliers. Each program is licensed under the terms and conditions of that specific program. These terms and conditions may vary depending on the specific program or the program supplier. Specific information on the content of this media or the terms and conditions under which these programs are licensed are contained in a readme file on Volume 1 of the media.

To obtain the Content and Terms and Conditions Information, do the following:

1. Log in as the root user.
2. Insert the Volume 1 CD-ROM into the CD-ROM drive. If your CD-ROM drive is not /dev/cd0, substitute the correct device name and type the following mount command:

   ```
   mount -v cdrfs -o ro /dev/cd0 /mnt
   cp /mnt/README* /tmp
   unmount /mnt
   ```

   The /tmp/README and /tmp/README.html files contain the content of this media or the terms and conditions under which these programs are licensed. View this information using your Web browser or the more or pg commands as in the following examples:

   ```
   more /tmp/README
   ```

   or

   ```
   netscape /tmp/README.html
   ```
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Chapter 1. AIX 5L Version 5.2 Bonus Pack and Expansion Pack

Note: To view the most current version of the Release Notes, go to the following Web site:

Where to find AIX 5L Version 5.2 Bonus Pack and Expansion Pack Documentation

The AIX 5L Version 5.2 Bonus Pack and Expansion Pack is shipped with AIX 5L Version 5.2 as a vehicle for delivering new IBM and non-IBM products. Most Bonus Pack and Expansion Pack products are installed using normal installation methods. Because some Bonus Pack and Expansion Pack products cannot be installed using normal installation methods, their installation procedures are provided under their product descriptions.

The AIX 5L Version 5.2 Bonus Pack and Expansion Pack may include products that contain a cryptographic function that is subject to special export-licensing requirements by the U.S. Department of Commerce. Import restrictions may also apply to certain countries. Different packages of the AIX 5L Version 5.2 Bonus Pack and Expansion Pack accommodate varying country export or import restrictions. Refer to Ordering Information located in the Bonus Pack announcement to determine which package is appropriate for you. Contact your IBM representative or IBM Business Partner to determine what encryption you are entitled to receive.

The contents of the Bonus Pack and Expansion Pack vary over time. New software products can be added, changes to existing software products can occur, or products can be removed. Changes to the content of the AIX 5L Version 5.2 Bonus Pack and Expansion Pack will be announced either as part of an AIX 5L announcement or independently.

Softcopy documentation for each product is included with the product. This Release Notes document supplements the product documentation by outlining the steps for getting started and pointing you to additional product information.

Unless otherwise indicated, products can be installed from the CD using the Web-based System Manager or SMIT. For detailed instructions, see the AIX 5L Version 5.2 Installation Guide and Reference, available through the Information Center.

Information Center

The @server pSeries Information Center is an information portal for AIX and pSeries customers. From this site, you can access the following:

- AIX Version 4.3, AIX 5L Version 5.1 for POWER, and AIX 5L Version 5.2 documentation
- Hardware documentation
- Message database for 7-digit error codes, LEDs, and error identifiers
- How-to's for users and system administrators
- FAQs
- Links to Redbooks, White Papers, and related products

To access the Information Center, go to the following Web site:
AIX 5L Version 5.2 Documentation on CD
AIX documentation is also contained on the AIX documentation CD. The documentation is made accessible by loading the documentation CD onto the hard disk or by mounting the CD in the CD-ROM drive.

**Note:** The documentation contained on the CD may not be as current as the documentation on the Information Center.

The following publications describe AIX 5L Version 5.2 installation:
- *AIX 5L Version 5.2 Operating System Installation: Getting Started*, order number SC23-4388
- *AIX 5L Version 5.2 Installation Guide and Reference*, order number SC23-4389

Both installation guides are available online and in hardcopy.

To order these installation guides, contact your point of sale, or in the U.S., call IBM Customer Publication Support at 1-800-879-2755. Specify the order number of the publication you want.

---

**To List and Preview Installation Software**

You can list the available software products, packages, and filesets on AIX media. This media can be a CD-ROM, tape, diskette, or directory. The output lists the available packages and filesets on the media. The descriptions are provided at the fileset level.

You can choose to do a preview installation before doing the actual installation. A preview installation provides the preinstallation information that occurs during a regular installation, except that no software will be installed.

When you select a package or fileset to be installed with the preview installation process, you will see a list that contains all the requisite packages and filesets needed by the selected package or fileset to be successfully installed.

The other information generated during the preinstallation process concerns file system-size checking. The file systems are checked to make sure there is enough free space available to install the selected package or fileset.

You can run the list software and previewing software functions from the command line, the SMIT interface, or the Web-based System Manager interface.

**To List and Preview Software from the Command Line**

1. Log in as the root user.
2. List the available software on the media using the `installp -lddevice` command. For example, to list the software on the first CD of the base media, insert the Volume 1 CD in the first CD drive. Then type:

   ```
   installp -ld/dev/cd0 | pg
   ```

   The following displays:

<table>
<thead>
<tr>
<th>Fileset Name</th>
<th>Level</th>
</tr>
</thead>
<tbody>
<tr>
<td>IMNSearch.bld.DBCS</td>
<td>2.3.1.0</td>
</tr>
<tr>
<td># NetQuestion DBCS Buildtime Modules</td>
<td></td>
</tr>
<tr>
<td>IMNSearch.bld.SBCS</td>
<td>2.3.1.0</td>
</tr>
<tr>
<td># NetQuestion SBCS Buildtime Modules</td>
<td></td>
</tr>
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</table>
   ```
3. To do a preview installation at the command line, use the -p flag with the `installp` command. For example, to preview the installation of the `IMNSearch.bld.DBCS` fileset, enter:

```
installp -aXgq -p -d/dev/cd0 IMNSearch.bld.DBCS
```

The preview option shows the filesets selected to be installed, the filesets that are pulled in by requisites, and the system resources that are used by this `installp` operation.

**To List and Preview Software from the ASCII SMIT Interface**

1. Log in as the root user.
2. List available software on media using the `smitty install_update` fast path.
3. Select `Install Software`.
4. Press the F4 key to list the available input devices and select the appropriate one, or type the input device name in the blank field. Press Enter to continue.
5. To list all available software on the selected media, press the F4 key at the **SOFTWARE to Install** field.
6. Scroll through the list of software by using the arrow keys or the Page Up or Page Down keys.

   **Note:** The software shown in this listing are the available packages and filesets for that software product. For example, in the following output example, the software product is IMNSearch.

   ```
   IMNSearch.bld
   + 2.3.1.0  NetQuestion DBCS Buildtime Modules
   + 2.3.1.0  NetQuestion SBCS Buildtime Modules
   IMNSearch.rte.httpdlite
   @ 2.0.0.2  Lite NetQuestion Local Web Server
   ```

   The two packages are IMNSearch.bld and IMNSearch.rte.httpdlite. The filesets in the IMNSearch.bld package are the NetQuestion DBCS Buildtime Modules fileset and the NetQuestion SBCS Buildtime Modules fileset. Both filesets are at the 2.3.1.0 level. Notice that the descriptions for the software product are described at the fileset level.

   If the fileset is preceded by a plus sign (+), then it is available to be installed. If the fileset is preceded by an at sign (@), then the fileset is already installed.

7. Select the package or fileset you want to install by scrolling to that package or fileset and press the F7 key to make the selection. Press Enter to continue.
8. To preview the installation of the package or fileset that you selected, press the Tab key to select yes in the **PREVIEW only?** field. Press Enter.

   **Note:** To obtain detailed information about the installation, select yes in the **DETAILED output?** field. The filesets being installed are displayed in parentheses.

**To List and Preview Software Using the Web-based System Manager Interface**

1. Log in as the root user.
2. To initialize the environment, type `wsm &` at the command prompt.
3. In the **Navigation Area**, click on the plus sign (+) to the left of the client you want to manage.
4. Select the **Software** icon by clicking once on the plus sign (+) to the left of the **Software** icon. This action expands the **Software** tree.
5. Click the **Installed Software** icon.
6. At the top of the Web-based System Manager window in the menu bar, click **Software** to display the Software menu.
7. Click **New Software (Install/Update).**
8. Click **Install Additional Software**.

9. Click **Advanced Method**.

10. Specify or select a software source.

11. To list available software, click **Browse** to display a tree view of all the software on the media. The tree can be expanded by clicking the plus sign (+) to the left of the icon.

   **Note:** If the software is already installed, you will see a small checkmark to the left of the fileset description.

12. Select the package or fileset you want to install by clicking the package or fileset.

   **Note:** You can select multiple packages or filesets by holding down the left mouse button while on one selection and dragging the mouse pointer up or down.

   You can also use the Ctrl key or the Shift key to select multiple items. To choose nonconsecutive selections, hold the Ctrl key while making your selections with the left mouse button. To choose consecutive selections, hold the Shift key while making your selections with the left mouse button.

13. To preview the installation of the selected package or fileset, press the **Preview** button.

Additional information about AIX-supported products is available from the following Web site:

Chapter 2. AIX 5L Version 5.2 Bonus Pack

IBM 32-bit SDK for AIX, Java™ 2 Technology Edition, Version 1.4.1

IBM 32-bit SDK for AIX, Java™ 2 Technology Edition, Version 1.4.1 is released in Java14.* filesets. The code on the Bonus Pack corresponds to the GA code that was released in May, 2003. To see if a more recent service refresh is available, click the How and where to get fixes link from the Java 1.4.1 download page (click on the Download link at http://www.ibm.com/developerworks/java/jdk/aix; then click the 1.4.1 32-bit link).

IBM 64-bit SDK for AIX, Java™ 2 Technology Edition, Version 1.4.1

IBM 64-bit SDK for AIX, Java™ 2 Technology Edition, Version 1.4.1 is released in Java14_64.* filesets. The code on the Bonus Pack corresponds to the GA code that was released in May, 2003. To see if a more recent service refresh is available, click the How and where to get fixes link from the Java 1.4.1 download page (click on the Download link at http://www.ibm.com/developerworks/java/jdk/aix; then click the 1.4.1 64-bit link).

AIX iSCSI SW (Ethernet SAN) Initiator

The iSCSI SW Initiator is a protocol mapping of SCSI over the TCP protocol. The iSCSI SW Initiator is an early release (Technology Preview) based on the iSCSI IETF draft version-20. The iSCSI SW Initiator can be installed using SMIT. The fileset name is iscsi_sw*, and it requires AIX 5L Version 5.2 with the 5200-01 Recommended Maintenance package. Any previous versions must be completely uninstalled prior to installing this version.

After installation, the iSCSI Software Solution readme file can be found in the /etc/iscsi/README file.

Note: The AIX iSCSI SW Initiator uses the AIX electronic license feature. When installing through SMIT, you will need to view and accept the license text provided with AIX iSCSI SW Initiator.

Adobe Acrobat Reader 5.0.6 and Asian Font Packs

Adobe Acrobat Reader 5.0.6 is part of the Adobe Acrobat family of software, which lets you view, navigate, browse, and print documents in Portable Document Format (PDF).

Using the fonts installed with the Asian Font Packs, Adobe Acrobat Reader 5.0.6 can be used to display PDF files that contain text in Chinese Simplified, Chinese Traditional, and Korean.

To install Adobe Acrobat Reader 5.0.6 or any of the Asian Font Packs, you must first create a CD-ROM file system and mount the Bonus Pack CD-ROM using the following steps:

1. Log in as root user.
2. Insert the Bonus Pack CD-ROM into the CD-ROM drive, and type the following command:

   mount -v cdrfs -o ro /dev/cd0 /mnt

   When the mount command completes, go to the /mnt/other/Adobe/AIX_ReadMe_for_Acrobat_Reader file for the Adobe Acrobat Reader 5.0.6 installation instructions.

   Before you can install any of the Asian Font Packs, you must install Adobe Acrobat Reader 5.0.6 from this CD-ROM or from some other media (for example, download the reader from the Adobe Web site). After...
Adobe Acrobat Reader 5.0.6 is installed, go to the /mnt/other/Adobe/AIX_ReadMe_for_Asian_Font_Packs file for the Asian Font Packs installation instructions.

You can copy the following readme files from the CD-ROM to your system. To copy these files to the Adobe Acrobat Reader default installation directory, type the following commands:

```
cp /mnt/other/Adobe/AIX_ReadMe_for_Acrobat_Reader /usr/lpp/Acrobat5
cp /mnt/other/Adobe/AIX_ReadMe_for_Asian_Font_Packs /usr/lpp/Acrobat5
```

Japanese fonts can be downloaded from the following Web site:


**Additional Information**

For information about the Asian Font Packs, see the following Web site:


For support information, see the following Web site:

http://www.adobe.com/support/main.html

For newer versions of the products that may be available for downloading, see the following Web site:


---

**Geodesic Systems Great Circle 6.0.1.5**

Geodesic Systems Great Circle 6.0.1.5 is an advanced testing and diagnostic tool that allows software engineers to identify and resolve performance and reliability problems in C and C++ application software.

Additional product information can be found at:

http://www.geodesic.com/products/greatcircle.html

To install Geodesic Systems Great Circle 6.0.1.5 for AIX 5.2, you must first create a CD-ROM file system and mount the Bonus Pack CD-ROM using the following steps:

1. Log in as the root user.
2. Insert the Bonus Pack CD-ROM into the CD-ROM drive, and type the following command:

```
Note: If your CD-ROM drive is not /dev/cd0, substitute the correct device name in the above command.

mount -v cdrfs -o ro /dev/cd0 /mnt
```

When the `mount` command completes, go to the /mnt/other/greatcircle/readme.txt file for installation instructions.

Copy the following files from the CD-ROM to your system. To copy these files to the default installation directory, type the following commands:

```
cp /mnt/other/greatcircle/readme.txt /usr/greatcircle/readme.txt
cp /mnt/other/greatcircle/greatcircle.tar.Z /usr/greatcircle/greatcircle.tar.Z
```

The following files on the CD will give you more information about Great Circle before you extract the product. These files are all contained in the `greatcircle.tar.Z` file:

- **license.txt**: Great Circle license information
- **greatcircle.pdf**: Great Circle documentation
IBM Directory (LDAP)

To access the latest IBM Directory Version 5.1.0.0 product information, go to the following Web site:
http://www.software.ibm.com/network/directory

Installation and Configuration

For information specific to IBM Directory installation and configuration, go to the following Web site:

From this Web site, read the following documents:
- IBM Directory Version 5.1.0.0 for AIX Installation and Configuration Guide
- IBM Directory Version 5.1.0.0 Server Readme
- IBM Directory Version 5.1.0.0 Client Readme
- IBM Directory Version 5.1.0.0 Readme Addendum

If you are using DB2 7.2, verify that the following links exist before starting ldapxcfg:
/usr/ldap/db2 -> /usr/lpp/db2_07_01
/usr/ldap/lib/libdb2.a -> /usr/lpp/db2_07_01/lib/libdb2.a

If you are using DB2 8.1, you must enable asynchronous IO before you begin the configuration. To enable asynchronous IO, type the following at the command prompt:
smitty aio

There is a size underestimation with ldap.server.com. This underestimation is less than 1MB, but it can cause the installation to fail if enough space is not allocated.

If these links are not present, create the links as follows:
ln -s -f /usr/lpp/db2_07_01/lib/libdb2.a /usr/ldap/lib/libdb2.a
ln -s -f /usr/lpp/db2_07_01 /usr/ldap/db2

Installing DB2 UDB7.2

If you are reinstalling, force installing, or installing an update to the DB2 UDB 7.2 fileset db2_07_01.msg.ja_JP, you should first remove the db2_07_01.msg.Ja_JP and db2_07_01.msg.ja_JP filesets.

Administration

After installation of the ldap.client package, create the following link:
ln -s -f /usr/ldap/lib/aix5/libldapiconv64.a /usr/lib/libldapiconv64.a

IBM Directory with Ja_JP Locale

In Japanese environment, it is strongly recommended that you use the IBM Directory in the Ja_JP locale. In other Japanese locales, the Server Administration GUI does not work properly.

Open Secure Shell (OpenSSH) 3.6.1.5200

OpenSSH requires Open Secure Sockets Layer (OpenSSL) Version 0.9.6e for encryption. The OpenSSL package is available on the AIX Toolbox for Linux Applications CD. The package, name is openssl-0.9.6g-3.aix4.3.ppc.rpm, and can be installed using SMIT. OpenSSL must be installed prior to installing OpenSSH.

After installation, the OpenSSH readme can be found in the /usr/openssh/README file.
**Note:** OpenSSH installation uses the AIX electronic license feature. When installing through SMIT, you will need to view and accept the license text provided with OpenSSH.

---

**IBM Tivoli Storage Manager Version 5.2.0 Evaluation Software**

IBM Tivoli Storage Manager (TSM) publications, including installation instructions, can be found at the following Web site:

http://publib.boulder.ibm.com/tividd/td/tdprodlist.html

Visit the following Web site to select a participating and authorized TSM business partner for free assistance with installation and configuration:


TSM server for AIX supports both 32-bit and 64-bit environments for AIX 5.1 and later. If your system is using the 32-bit kernel, you must install the 32-bit version of the TSM server (the tivoli.tsm.server.rte fileset). If your system is using the 64-bit kernel, you must install the 64-bit version of the TSM server (the tivoli.tsm.server.aix5.rte64 fileset).

**Note:** In either case, you must install the common functions and samples delivered in the tivoli.tsm.server.com fileset. If you decide to switch environments, you must uninstall TSM and reinstall it to the correct version for your new environment.

When installing the clients in a non-English locale, you must install the corresponding locale message filesets with the clients from the Install and Update from ALL Available Software menu option. See the product readme for additional information. During the installation of locale-specific versions, an Unable to open message file message might be displayed. This message is informational only and notes that the English message file will be used.

TSM does not support installation on Diskless and Dataless AIX machines.

TSM client error logging file permission defaults allow read and write access to all system users. To avoid potential security problems, modify the file permission to rwxrwx--- (755).

Some of the TSM server configuration scripts in the liblpp.a fileset archive have permission default settings that allow read and write access to all system users as shown in the following:

- rw-rwxrwx /usr/lpp/tivoli.tsm.server.rte/inst_root/tivoli.tsm.server.rte.config
- rw-rwxrwx /usr/lpp/tivoli.tsm.server.rte/inst_root/tivoli.tsm.server.rte.unconfig
- rw-rwxrwx /usr/lpp/tivoli.tsm.server.rte/productid
- rw-rwxrwx /usr/lpp/tivoli.tsm.server.rte/tivoli.tsm.server.rte.config
- rw-rwxrwx /usr/lpp/tivoli.tsm.server.rte/tivoli.tsm.server.rte.copyright
- rw-rwxrwx /usr/lpp/tivoli.tsm.server.rte/tivoli.tsm.server.rte.namelist
- rw-rwxrwx /usr/lpp/tivoli.tsm.server.rte/tivoli.tsm.server.rte.pre_rm
- rw-rwxrwx /usr/lpp/tivoli.tsm.server.rte/tivoli.tsm.server.rte.rm_inv
- rw-rwxrwx /usr/lpp/tivoli.tsm.server.rte/tivoli.tsm.server.rte.unconfig

To avoid potential security problems, alter the setting to rwxrwx--- (770).

During TSM Hierarchical Storage Manager (HSM) client installation, a log file is created with default settings that allow read and write access to all system users as shown in the following example fileset:

- rw-rw-rw- /usr/lpp/tivoli.tsm.client.hsm.jfs.64bit/inst_root/dsmerror.log

To avoid potential security problems, alter the setting to rwxrwx--- (770).

The TSM Version 5.2.0 HSM client for JFS can, under rare circumstances, cause a system crash with JFS2 file systems. The TSM Version 5.2.0 Backup/Archive client can backup both JFS and JFS2 file
systems, but the HSM Version 5.2.0 client can only manage JFS file systems. In rare cases, the HSM Version 5.2.0 client causes a system crash if only JFS2 file systems are present on the machine. This problem is documented by APAR IC36034.

If you plan to install and try TSM HSM on your system, make sure that no JFS2 file systems are present. If you already have JFS2 file systems on your system, make sure that you have mounted at least one JFS file system on your system.

**WebSphere Application Server Version 5, Trial Program**

**Installation of IBM WebSphere Application Server on AIX 5L**

**Note:** Instructions on how to install WebSphere can be found in the README.TXT readme. The README.TXT readme is located in the /other/IBMWebAS directory.

After IBM WebSphere Application Server on AIX 5L or later is installed, there are several errors returned when the lppchk command is run on an AIX system. These errors are inconsequential to the system and can be cleaned up by copying the /other/IBMWebAS/clean_up_was script to the system and then running it when you are logged in as the root user. Running this script will clean up the majority of the error messages from the lppchk command.

**Note:** If you install WebSphere Application Server, fixpack2 you do not need to run the above script.

No-charge Trial Program support is available for 60 days. For more information, go to the following Web site:

http://www.software.ibm.com/wsdd/downloads/WASsupport.html#support

In order to maximize your trial experience, if your AIX system runs with Trusted Computing Base (TCB) disabled, it is recommended that you install Fix Pack 2 and take advantage of the no-charge Trial Program support. Fix Pack 2 can be obtained from the following Web site:

http://www.ibm.com/support/all_download_drivers.html

At the Web site, do the following:

1. Enter websphere application server in the box marked enter search terms.
2. Select -Updates (code fixes) in the box marked Select the download type.
3. On the results screen, type AIX in the box marked Limit by platform or operating system.
4. Type 5.0.2 in the box marked Limit by version.

For additional information on supported configurations, go to the following Web site:


**IBM Text-to-Speech Version 6.7.2.0**

IBM Text-to-Speech (TTS) is a speech engine that allows applications to produce speech.

**Hardware Requirements:**
- Audio card

Software Requirements:
- AIX 5L for POWER Version 5.1 with the 5100-04 Recommended Maintenance package (APAR IY39794)
- xlC.rte 5.0.2.1 or later
- xlC.aix50.rte 5.0.2.5 or later
TTS includes the following `installp` packages:

- **tts_access.base**
  IBM TTS runtime base

- **tts_access.base.en_US**
  IBM TTS runtime (U.S. English)

**Note:** Both of the above packages need to be installed. Selecting the `tts_access.base` package will automatically install the `tts_access.base.en_US` package

TTS is installed into the `/usr/opt/ibmtts` directory.

For more information, see the `/usr/opt/ibmtts/docs/readme.htm` file or the `/usr/opt/ibmtts/docs/readme.txt` file.
Chapter 3. AIX 5L Version 5.2 Expansion Pack

IBM HTTP Server for AIX, Version 1.3.19.4

This section provides a brief product overview and information about installing the IBM HTTP Server (IHS) and its documentation.

Product Overview

IBM HTTP Server is a Web server. It is based on the Apache Web server developed by the Apache Group. IBM HTTP Server Version 1.3.19.4 is similar to Apache, but the IBM version contains additional patches from the Apache development tree.

IBM HTTP Server includes support for SSL secure connections, which is not available in the Apache Web server developed by the Apache Group. The addition of this feature required modifications to several of the base Apache source code files. Therefore, it is not possible to rebuild the entire IBM binary distribution with the given source due to legal restrictions on the SSL technology. However, the Apache source (from which the IBM HTTP Server is based) is included, and an Apache module can be written to run with the IBM HTTP Server.

Limitations

The license restriction for IBM HTTP Server Version 1.3.19.4 states that when used outside of WebSpere Application Server (WAS), IHS can only be used in conjunction with AIX Web-based System Manager and Documentation Library (DocSearch) in order to receive support.

IBM HTTP Server Version 1.3.19.4 does not support the Fast Response Cache Accelerator function on AIX 5L Version 5.2. However, there may be other Web servers that support the Fast Response Cache Accelerator function on AIX 5L Version 5.2.

Documentation

The IBM HTTP Server product Web site contains the latest version of the documentation and installation instructions. Visit the following Web site frequently to get the most up-to-date information:


From this Web site, click on User Assistance for the IBM HTTP Server documentation and other information.

Documentation is also available in the /usr/HTTPServer/htdocs/locale/manual/ibm/ directory, where locale is your country locale.

Installation Instructions

Due to the license restrictions for IHS 1.3.19.4, when used outside a WAS environment, the following installation instructions pertain only to the use of IHS with Web-based System Manager and DocSearch.

1. Back up your Web server configuration files in the conf directories, and back up the Web site created under thehtdocs directory.
2. Uninstall any previous versions of the server by doing the following:
   a. Log in as the root user.
   b. Stop the server by changing the directory to /usr/HTTPServer/bin, and then type the following:
      ./apachectl stop
   c. Type smitty.
   d. Select Software Installation and Maintenance.
   e. Select Software Maintenance and Utilities.
f. Select Remove Installed Software.
g. Click List under Software Name.
h. Select the following filesets from the list:
   - http_server.admin
   - http_server.base.rte
   - http_server.base.source
   - http_server.frca
   - http_server.html.en_US
   - http_server.modules.fcgi
   - http_server.modules.ldap
   - http_server.modules.ldap.128
   - http_server.modules.mt
   - http_server.modules.snmp
   - http_server.msg.xx_XX.admin
   - http_server.html.xx
   - http_server.msg.xx.ssl.core
   - http_server.base.source
   - server.en_US.SSL.core
   - server.ssl.128.source

   Note: The variable xx_XX is the country that was installed.
i. Click OK.
j. Change the Preview only option to No.
k. Click OK.

3. Web-based System Manager and DocSearch only require two filesets from IHS 1.3.19.4 in order to provide remote document and file service. They are:
   - http_server.base.rte (HTTP Server Base Run-Time)
   - http_server.base.source (HTTPServer Source Code)

4. Log in as the root user.
5. Type smitty.
7. Select Install and Update Software.
8. Select Install Software Bundle.
9. At the INPUT device/directory for software field, click List and select the CD-ROM or DVD-RAM drive (per the system configuration).
10. In the Select a Fileset Bundle list, choose the wsm_remote bundle and press Enter.
11. Press Enter twice again to complete the installation and the remote configuration for Web-based System Manager and the Documentation and Search Server. Additional message filesets for the supported country codes are available on the media.
   The /usr/HTTPServer path is used as the base directory. Documents and files are served from the /usr/HTTPServer/htdocs directory.
12. Click OK.
13. Answer yes to the confirmation messages. The /usr/HTTPServer path is used as the base directory.
14. To start the IBM HTTP Server, either reboot the system so that the HTTP Server will be automatically started through the system’s /etc/inittab file, or type the following from the AIX command line:
   /usr/HTTPServer/bin/httpd > /dev/console 2>&1
Third-Party License Terms and Conditions, Notices and Information

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Netscape Communicator Version 4.8.0.10

The Expansion Pack includes the Netscape Communicator Web browser product, Version 4.8.0.10. It includes the following features:

- Navigator, Messenger, Composer, and Newsgroups
- Message and help filesets for Brazilian Portuguese, Catalan, Czech, English, French, German, Hungarian, Italian, Japanese, Korean, Polish, Russian, Slovakian, Spanish, Simplified Chinese, and Traditional Chinese
- Initial unicode (UTF-8) implementation for all languages listed above for AIX Version 4.3.3 and later
- Bidirectional support for Hebrew and Arabic locales
- Java support, JVM 1.1.5 and AWT 1.1

Installation Information

The Expansion Pack CD contains the 128-bit encrypted version of Netscape Communicator (the U.S. package). The filesets are the following:

- Netscape.communicator.com 4.8.0.10
- Netscape.communicator.us 4.8.0.0
- Netscape.msg.nn_NN.communicator.rte 4.8.0.0
- Netscape.help.nn_NN.communicator.rte 4.8.0.0

Netscape Communicator 4.8.0.10 runs on the following:

- AIX 5L for POWER Version 5.1 with the 5100-04 Recommended Maintenance package (APAR IY39794). It is specifically required if APAR IY43971 (the bos.rte.libc 5.1.0.52 fileset) is installed.
- AIX 5L Version 5.2 with the 5200-01 Recommended Maintenance package

Migration Information

If you are planning to migrate your AIX system to either AIX 5.1 or 5.2, you must install Netscape Communicator 4.8.0.10 prior to migrating AIX. Previous versions of Netscape Communicator will not run on either AIX 5.1 or 5.2.

AIX Web Browsers Site

For information about Web browsers on AIX, see Web Browsers for AIX at the following Web site:

http://www.ibm.com/servers/aix/browsers/

This Web site provides downloads for the latest Netscape Communicator and Mozilla for AIX the installp images.

In addition, Mozilla Version 1.4 for AIX is available on the Mozilla for AIX Web Browser and Application Suite CD which can be ordered through feature 0976 of the AIX System Program Order (SPO).

For the latest Netscape Communicator fixes, see the following Web site:

http://aix.software.ibm.com/aix/efixes/netscape
IBM Network Authentication Service Version 1.3 for AIX

IBM Network Authentication Service Version 1.3 for AIX is a network-authentication protocol based on the IETF RFC 1510 standards protocol for the Kerberos V5 IBM Network Authentication Service. It includes the Generic Security Service Application Programming Interface (GSS-API), the key distribution center server (KDC), and the server. IBM Network Authentication Service allows AIX middleware and external application writers to use authenticated and optionally-encrypted message flow between their respective components.

Documentation

Read the README.lang file for IBM Network Authentication Service Version 1.3 before configuring or using the program, where lang specifies one of the following language locales:

- Chinese (Simplified)
- Chinese (Traditional)
- English
- French
- Korean
- Portuguese (Brazilian)
- Spanish

The README.lang file for AIX is in the /usr/lpp/krb5 directory after the krb5.client rte fileset is installed from the krb5.client client installation package. The README.lang file can also be viewed using the SMIT list_media_info command to list supplemental fileset information on the installation media for the krb5.client rte fileset.

Documentation for IBM Network Authentication Service is available in the krb5.doc.lang installation packages, where lang specifies one of the following language locales:

- en_US (U.S. English)
- Ja_JP (Japanese)
- es_ES (Spanish)
- fr_FR (French)
- ko_KR (Korean)
- zh_CN (Simplified Chinese)

The documentation is in both HTML and PDF formats. Install the krb5.doc.lang.html fileset for HTML and the krb5.doc.lang.pdf fileset for PDF.

The IBM Network Authentication Service Version 1.3 Administrator’s and User’s Guide is installed in the following directories:

- HTML
  /usr/lpp/krb5/doc/html/lang/ADMINGD
- PDF
  /usr/lpp/krb5/doc/pdf/lang/ADMINGD
The *IBM Network Authentication Service Version 1.3 Application Development Reference* is installed in the following directories:

- HTML
  `/usr/lpp/krb5/doc/html/lang/APDEVREF`
- PDF
  `/usr/lpp/krb5/doc/pdf/lang/APDEVREF`

**Installation and Configuration**

The *IBM Network Authentication Service Version 1.3 Administrator’s and User’s Guide* explains how to install and configure the product.

**DES Encryption Kernel Extension 64-bit Support**

The DES encryption kernel extension, `nfs_kdes_full.ext`, now includes support for 64-bit kernels. This extension is used to enable Secure NFS by encrypting time stamps sent between the client and the server that allow each RPC message to be authenticated. For more details see the [Network File Systems (NFS) Security](#) article in the *AIX 5L Version 5.2 Security Guide*.

The DES encryption kernel extension is available from the `des` fileset on the AIX Expansion Pack.

**Certificate Authentication Services (CAS) 5.2.0.10**

**Migrating Database Tables**

This section describes the steps needed to migrate the database tables used by cas.server.rte version 5.2.0.10.

You may need to run a migration script to migrate the database tables used by CAS server (JavaPKI) after you have done a migration installation of cas.server.rte version 5.2.0.10 over an earlier version of cas.server.rte.

In some cases, you have to do the migration steps manually. The migration script is `#/usr/cas/server/bin/MigrateData.sh`.

You must run the database migration script if the following conditions are true:

- You have performed a cas.server.rte version 5.2.0.10 migration installation over a previous version of cas.server.rte (version number is less than 5.2.0.10).
- You have configured the old CAS server correctly.
- The old CAS server has been running and there is data in the database tables used by the old CAS server.

**Running the Migration Script**

You must have root user authority to run the `/usr/cas/server/bin/MigrateData.sh` migration script.

The script will show the default CAS user name (`$PKIUSER`) in your current CAS server configuration file (`#/usr/cas/server/PkiConfig.properties`) and ask you to enter another one if you want to use a CAS user name other than the default. The CAS user name is the user name that CAS server runs as.

The utility will print some SQL information and any errors during processing.

When you run the migration script it will do the following:

- Create backup tables for all tables used by JavaPKI.
- Copy data from the original tables to backup tables.
- Drop the original tables.
- Create new tables using the new schema.
- Copy data from the backup tables to the new tables.

The only data not copied to the new tables will be audit information. Since this data is for audit only this data will be left in the backup tables.

Backup tables can be found with tmp appended to their names, for example: icltmp, rcltmp, reqtmp, and audit_logtmp. Please keep the backup tables for later use.

If there is no data in the database tables, you have to do the manual migration steps listed in the **Manual Migration Steps** section.

Once the migration is complete, the new version of CAS server (JavaPKI) can be started.

### Manual Migration Steps

The migration script only runs if there is data in the current tables. If there are no tables or no data in the tables, you will need to drop the old tables and create new tables.

Login as the CAS user ($PKIUSER) and use the following DB2 commands to drop the old tables *(drop_tables.sql is located in the /home/$PKIUSER/javapki/sqlscripts/ directory)*:

```bash
db2 -tf javapki/sqlscripts/drop_tables.sql
db2 -tf javapki/sqlscripts/audit_drop_tables.sql
```

Login as the CAS user ($PKIUSER) and use the following commands to create the new tables *(create_tables.sql is located in the /home/$PKIUSER/javapki/sqlscripts/ directory)*:

```bash
db2 -tf javapki/sqlscripts/create_tables.sql
audit_create_tables.aix dbname dbuser language
```

Once the new tables are created, the new version of CAS server (JavaPKI) can be started.

### Rollback Database Tables

The migration tool will ask DB2 to rollback if there are any problems during the migration.

The rollback after you successfully run the migration script is completely manual. The tables will have to be migrated from the backup tables to their original names. You will also need to populate the serial table using the SQL statements. Obtain the last serial number issued prior to setting the serial table. Make sure to add 1 to the value of the last serial number and insert the value into the icl table.

The following is an example of SQL statements that populate the serial table:

```sql
serialnum = select max(serial) from icl;
serialnum++;
insert into serial set serial=serialnum;
```
Appendix. Notices

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