



Sun Java System Directory Server Enterprise Edition 6.2 Release Notes



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Preface

These release notes contain important information available at the time of release. New features and enhancements, known limitations and problems, technical notes, and other information are addressed here. Read this document before you begin using Directory Server Enterprise Edition.

How This Book Is Organized

This book includes the following chapters.

[Chapter 1, “Compatibility Issues,”](#) addresses compatibility with previous component product versions, and with potential upcoming changes to Directory Server Enterprise Edition software.

[Chapter 2, “Installation Notes,”](#) covers topics related to installation, including hardware and software requirements.

[Chapter 3, “Directory Server Bugs Fixed and Known Problems,”](#) covers fixes and issues for Directory Server.

[Chapter 4, “Directory Proxy Server Bugs Fixed and Known Problems,”](#) covers fixes and issues for Directory Proxy Server.

[Chapter 5, “Identity Synchronization for Windows Bugs Fixed and Known Problems,”](#) covers fixes and issues for Identity Synchronization for Windows.

[Chapter 6, “Directory Editor Bugs Fixed and Known Problems,”](#) covers fixes and issues for Directory Editor.

[Chapter 7, “Directory Server Resource Kit Bugs Fixed and Known Problems,”](#) introduces Directory Server Resource Kit. This chapter also covers fixes and issues for Directory Server Resource Kit.

Directory Server Enterprise Edition Documentation Set

This Directory Server Enterprise Edition documentation set explains how to use Sun Java System Directory Server Enterprise Edition to evaluate, design, deploy, and administer directory services. In addition, it shows how to develop client applications for Directory Server Enterprise Edition. The Directory Server Enterprise Edition documentation set is available at <http://docs.sun.com/coll/1224.3>.

For an introduction to Directory Server Enterprise Edition, review the following documents in the order in which they are listed.

TABLE P-1 Directory Server Enterprise Edition Documentation

Document Title	Contents
<i>Sun Java System Directory Server Enterprise Edition 6.2 Release Notes</i>	Contains the latest information about Directory Server Enterprise Edition, including known problems.
<i>Sun Java System Directory Server Enterprise Edition 6.2 Documentation Center</i>	Contains links to key areas of the documentation set.
<i>Sun Java System Directory Server Enterprise Edition 6.2 Evaluation Guide</i>	Introduces the key features of this release. Demonstrates how these features work and what they offer in the context of a fictional deployment that you can implement on a single system.
<i>Sun Java System Directory Server Enterprise Edition 6.2 Deployment Planning Guide</i>	Explains how to plan and design highly available, highly scalable directory services based on Directory Server Enterprise Edition. Presents the basic concepts and principles of deployment planning and design. Discusses the solution life cycle, and provides high-level examples and strategies to use when planning solutions based on Directory Server Enterprise Edition.
<i>Sun Java System Directory Server Enterprise Edition 6.2 Installation Guide</i>	<p>Explains how to install the Directory Server Enterprise Edition software. Shows how to select which components to install, configure those components after installation, and verify that the configured components function properly.</p> <p>For instructions on installing Directory Editor, go to http://docs.sun.com/coll/DirEdit_05q1.</p> <p>Make sure you read the information in <i>Sun Java System Directory Server Enterprise Edition 6.2 Release Notes</i> related to Directory Editor before you install Directory Editor.</p>
<i>Sun Java System Directory Server Enterprise Edition 6.2 Migration Guide</i>	Provides instructions for upgrading components from earlier versions of Directory Server, Directory Proxy Server, and Identity Synchronization for Windows.
<i>Sun Java System Directory Server Enterprise Edition 6.2 Administration Guide</i>	<p>Provides command-line instructions for administering Directory Server Enterprise Edition.</p> <p>For hints and instructions on using the Directory Service Control Center (DSCC) to administer Directory Server Enterprise Edition, see the online help provided in DSCC.</p> <p>For instructions about administering Directory Editor, go to http://docs.sun.com/coll/DirEdit_05q1.</p> <p>For instructions about installing and configuring Identity Synchronization for Windows, see Part II, "Installing Identity Synchronization for Windows," in <i>Sun Java System Directory Server Enterprise Edition 6.2 Installation Guide</i>.</p>

TABLE P-1 Directory Server Enterprise Edition Documentation (Continued)

Document Title	Contents
<i>Sun Java System Directory Server Enterprise Edition 6.2 Developer's Guide</i>	Provides instructions for developing directory client applications with the tools and APIs that are provided as part of Directory Server Enterprise Edition.
<i>Sun Java System Directory Server Enterprise Edition 6.2 Reference</i>	Introduces the technical and conceptual foundations of Directory Server Enterprise Edition. Describes its components, architecture, processes, and features. Also provides a reference to the developer APIs.
<i>Sun Java System Directory Server Enterprise Edition 6.2 Man Page Reference</i>	Describes the command-line tools, schema objects, and other public interfaces that are available through Directory Server Enterprise Edition. Individual sections of this document can be installed as online manual pages.
<i>Sun Java System Directory Server Enterprise Edition 6.2 Troubleshooting Guide</i>	Provides information for defining the scope of the problem, gathering data, and troubleshooting the problem areas using various tools.
<i>Sun Java System Identity Synchronization for Windows 6.0 Deployment Planning Guide</i>	Provides general guidelines and best practices for planning and deploying Identity Synchronization for Windows.

Related Reading

The SLAMD Distributed Load Generation Engine is a Java™ application that is designed to stress test and analyze the performance of network-based applications. It was originally developed by Sun Microsystems, Inc. to benchmark and analyze the performance of LDAP directory servers. SLAMD is available as an open source application under the Sun Public License, an OSI-approved open source license. To obtain information about SLAMD, go to <http://www.slamd.com/>. SLAMD is also available as a java.net project. See <https://slamd.dev.java.net/>.

Java Naming and Directory Interface (JNDI) technology supports accessing the Directory Server using LDAP and DSML v2 from Java applications. For information about JNDI, see <http://java.sun.com/products/jndi/>. The *JNDI Tutorial* contains detailed descriptions and examples of how to use JNDI. This tutorial is at <http://java.sun.com/products/jndi/tutorial/>.

Directory Server Enterprise Edition can be licensed as a standalone product, as a component of Sun Java Enterprise System, as part of a suite of Sun products, such as the Sun Java Identity Management Suite, or as an add-on package to other software products from Sun. Java Enterprise System is a software infrastructure that supports enterprise applications distributed across a network or Internet environment. If Directory Server Enterprise Edition was licensed as a component of Java Enterprise System, you should be familiar with the system documentation at <http://docs.sun.com/coll/1286.3>.

Identity Synchronization for Windows uses Message Queue with a restricted license. Message Queue documentation is available at <http://docs.sun.com/coll/1307.2>.

Identity Synchronization for Windows works with Microsoft Windows password policies.

- Information about password policies for Windows 2003 is available in the [Microsoft documentation](#) online.
- Information about changing passwords, and about group policies in Windows 2003 is available in the [Microsoft documentation](#) online.
- Information about the Microsoft Certificate Services Enterprise Root certificate authority is available in the [Microsoft support documentation](#) online.
- Information about configuring LDAP over SSL on Microsoft systems is available in the [Microsoft support documentation](#) online.

Redistributable Files

Directory Server Enterprise Edition does not provide any files that you can redistribute.

Default Paths and Command Locations

This section explains the default paths used in the documentation, and gives the locations of commands on different operating systems and deployment types.

Default Paths

The table in this section describes the default paths that are used in this document. For complete descriptions of the files installed, see the following product documentation.

- Chapter 14, “Directory Server File Reference,” in *Sun Java System Directory Server Enterprise Edition 6.2 Reference*
- Chapter 25, “Directory Proxy Server File Reference,” in *Sun Java System Directory Server Enterprise Edition 6.2 Reference*
- Appendix A, “Directory Server Resource Kit File Reference,” in *Sun Java System Directory Server Enterprise Edition 6.2 Reference*

TABLE P-2 Default Paths

Placeholder	Description	Default Value
<i>install-path</i>	<p>Represents the base installation directory for Directory Server Enterprise Edition software.</p> <p>The software is installed in directories below this base <i>install-path</i>. For example, Directory Server software is installed in <i>install-path/ds6/</i>.</p>	<p>When you install from a zip distribution using <code>dsee_deploy(1M)</code>, the default <i>install-path</i> is the current directory. You can set the <i>install-path</i> using the <code>-i</code> option of the <code>dsee_deploy</code> command. When you install from a native package distribution, such as you would using the Java Enterprise System installer, the default <i>install-path</i> is one of the following locations:</p> <ul style="list-style-type: none"> ■ Solaris systems - <code>/opt/SUNWdsee/</code>. ■ Red Hat systems - <code>/opt/sun/</code>. ■ Windows systems - <code>C:\Program Files\Sun\JavaES5\DSEE</code>.
<i>instance-path</i>	<p>Represents the full path to an instance of Directory Server or Directory Proxy Server.</p> <p>The documentation uses <code>/local/ds/</code> for Directory Server and <code>/local/dps/</code> for Directory Proxy Server.</p>	<p>No default path exists. Instance paths must nevertheless always be found on a <i>local</i> file system.</p> <p>The following directories are recommended:</p> <ul style="list-style-type: none"> <code>/var</code> on Solaris systems <code>/global</code> if you are using Sun Cluster
<i>serverroot</i>	Represents the parent directory of the Identity Synchronization for Windows installation location	Depends on your installation. Note the concept of a <i>serverroot</i> no longer exists for Directory Server.
<i>isw-hostname</i>	Represents the Identity Synchronization for Windows instance directory	Depends on your installation
<code>/path/to/cert8.db</code>	Represents the default path and file name of the client's certificate database for Identity Synchronization for Windows	<i>current-working-dir/cert8.db</i>
<i>serverroot/isw-hostname/logs/</i>	Represents the default path to the Identity Synchronization for Windows local logs for the System Manager, each connector, and the Central Logger	Depends on your installation
<i>serverroot/isw-hostname/logs/central/</i>	Represents the default path to the Identity Synchronization for Windows central logs	Depends on your installation

Command Locations

The table in this section provides locations for commands that are used in Directory Server Enterprise Edition documentation. To learn more about each of the commands, see the relevant man pages.

TABLE P-3 Command Locations

Command	Java ES, Native Package Distribution	Zip Distribution
cacoadm	Solaris - /usr/sbin/cacoadm	Solaris - <i>install-path/dsee6/ cacao_2/usr/sbin/cacoadm</i>
	Red Hat - /opt/sun/cacao/bin/cacoadm	Red Hat- <i>install-path/dsee6/ cacao_2/cacao/bin/cacoadm</i>
	Windows - <i>install-path\share\ cacao_2\bin\cacoadm.bat</i>	Windows - <i>install-path\ dsee6\cacao_2\bin\cacoadm.bat</i>
certutil	Solaris - /usr/sfw/bin/certutil	<i>install-path/dsee6/bin/certutil</i>
	Red Hat- /opt/sun/private/bin/certutil	
dpadm(1M)	<i>install-path/dps6/bin/dpadm</i>	<i>install-path/dps6/bin/dpadm</i>
dpconf(1M)	<i>install-path/dps6/bin/dpconf</i>	<i>install-path/dps6/bin/dpconf</i>
dsadm(1M)	<i>install-path/ds6/bin/dsadm</i>	<i>install-path/ds6/bin/dsadm</i>
dscmcom(1M)	<i>install-path/dscc6/bin/dscmcom</i>	<i>install-path/dscc6/bin/dscmcom</i>
dsccreg(1M)	<i>install-path/dscc6/bin/dsccreg</i>	<i>install-path/dscc6/bin/dsccreg</i>
dscctest(1M)	<i>install-path/dscc6/bin/dscctest</i>	<i>install-path/dscc6/bin/dscctest</i>
dsconf(1M)	<i>install-path/ds6/bin/dsconf</i>	<i>install-path/ds6/bin/dsconf</i>
dsee_deploy(1M)	Not provided	<i>install-path/dsee6/bin/dsee_deploy</i>
dsmig(1M)	<i>install-path/ds6/bin/dsmig</i>	<i>install-path/ds6/bin/dsmig</i>
entrycmp(1)	<i>install-path/ds6/bin/entrycmp</i>	<i>install-path/ds6/bin/entrycmp</i>
fildif(1)	<i>install-path/ds6/bin/fildif</i>	<i>install-path/ds6/bin/fildif</i>
idsktune(1M)	Not provided	At the root of the unzipped zip distribution
insync(1)	<i>install-path/ds6/bin/insync</i>	<i>install-path/ds6/bin/insync</i>
ns-accountstatus(1M)	<i>install-path/ds6/bin/ns-accountstatus</i>	<i>install-path/ds6/bin/ns-accountstatus</i>
ns-activate(1M)	<i>install-path/ds6/bin/ns-activate</i>	<i>install-path/ds6/bin/ns-activate</i>
ns-inactivate(1M)	<i>install-path/ds6/bin/ns-inactivate</i>	<i>install-path/ds6/bin/ns-inactivate</i>

TABLE P-3 Command Locations (Continued)

Command	Java ES, Native Package Distribution	Zip Distribution
repldisc(1)	<i>install-path/ds6/bin/repldisc</i>	<i>install-path/ds6/bin/repldisc</i>
schema_push(1M)	<i>install-path/ds6/bin/schema_push</i>	<i>install-path/ds6/bin/schema_push</i>
smcwebserver	Solaris and Linux- <i>/usr/sbin/smcwebserver</i>	This command pertains only to DSCC when it is installed using native packages distribution.
	Windows - <i>install-path\share\webconsole\bin\smcwebserver</i>	
wadmin	Solaris and Linux- <i>/usr/sbin/wadmin</i>	This command pertains only to DSCC when it is installed using native packages distribution.
	Windows - <i>install-path\share\webconsole\bin\wadmin</i>	

Typographic Conventions

The following table describes the typographic changes that are used in this book.

TABLE P-4 Typographic Conventions

Typeface	Meaning	Example
AaBbCc123	The names of commands, files, and directories, and onscreen computer output	Edit your <code>.login</code> file. Use <code>ls -a</code> to list all files. <code>machine_name% you have mail.</code>
AaBbCc123	What you type, contrasted with onscreen computer output	<code>machine_name% su</code> Password:
<i>AaBbCc123</i>	A placeholder to be replaced with a real name or value	The command to remove a file is <code>rm filename</code> .
<i>AaBbCc123</i>	Book titles, new terms, and terms to be emphasized (note that some emphasized items appear bold online)	Read Chapter 6 in the <i>User's Guide</i> . <i>A cache</i> is a copy that is stored locally. Do <i>not</i> save the file.

Shell Prompts in Command Examples

The following table shows default system prompts and superuser prompts.

TABLE P-5 Shell Prompts

Shell	Prompt
C shell on UNIX and Linux systems	machine_name%
C shell superuser on UNIX and Linux systems	machine_name#
Bourne shell and Korn shell on UNIX and Linux systems	\$
Bourne shell and Korn shell superuser on UNIX and Linux systems	#
Microsoft Windows command line	C:\

Symbol Conventions

The following table explains symbols that might be used in this book.

TABLE P-6 Symbol Conventions

Symbol	Description	Example	Meaning
[]	Contains optional arguments and command options.	ls [-l]	The -l option is not required.
{ }	Contains a set of choices for a required command option.	-d {y n}	The -d option requires that you use either the y argument or the n argument.
\${ }	Indicates a variable reference.	\${com.sun.javaRoot}	References the value of the com.sun.javaRoot variable.
-	Joins simultaneous multiple keystrokes.	Control-A	Press the Control key while you press the A key.
+	Joins consecutive multiple keystrokes.	Ctrl+A+N	Press the Control key, release it, and then press the subsequent keys.
→	Indicates menu item selection in a graphical user interface.	File → New → Templates	From the File menu, choose New. From the New submenu, choose Templates.

Documentation, Support, and Training

The Sun web site provides information about the following additional resources:

- [Documentation](http://www.sun.com/documentation/) (<http://www.sun.com/documentation/>)
- [Support](http://www.sun.com/support/) (<http://www.sun.com/support/>)
- [Training](http://www.sun.com/training/) (<http://www.sun.com/training/>)

Searching Sun Product Documentation

Besides searching Sun product documentation from the docs.sun.comSM web site, you can use a search engine by typing the following syntax in the search field:

```
search-term site:docs.sun.com
```

For example, to search for “broker,” type the following:

```
broker site:docs.sun.com
```

To include other Sun web sites in your search (for example, java.sun.com, www.sun.com, and developers.sun.com), use sun.com in place of docs.sun.com in the search field.

Third-Party Web Site References

Third-party URLs are referenced in this document and provide additional, related information.

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Compatibility Issues

This chapter covers features that have been deprecated or removed from Directory Server Enterprise Edition component products. This chapter also covers features that are susceptible to removal, and functionality that is susceptible to deprecation for Directory Server Enterprise Edition component products.

This chapter includes the following sections:

- “Platform Support” on page 17
- “Administration Server and Console” on page 18
- “Directory Server Changes” on page 18
- “Directory Proxy Server Changes” on page 20
- “Identity Synchronization for Windows Changes” on page 20
- “Directory Server Resource Kit Changes” on page 20

Classifications of interface stability are provided per manual page entry in *Sun Java System Directory Server Enterprise Edition 6.2 Man Page Reference*.

Platform Support

In a future release of Directory Server Enterprise Edition, support for Windows 2000, Red Hat Advanced Server 3.0, and J2SE platform 1.4 may be removed. Support for 32-bit versions of the software might be discontinued for some platforms. To be prepared, start planning the transition to newer versions of Windows, Red Hat, and the Java SE platform and to 64-bit versions of the software.

Directory Server Enterprise Edition 6.2 does not support HP-UX. But the future version of the product is planned to support HP-UX.

Directory Server Enterprise Edition 6.2 also supports SuSE Linux Enterprise Server 9 Service Pack 3 but only for zip distribution.

System Virtualization Support

System virtualization is a technology that enables multiple operating system (OS) instances to execute independently on shared hardware. Functionally, software deployed to an OS hosted in a virtualized environment is generally unaware that the underlying platform has been virtualized. Sun performs testing of its Sun Java System products on select system virtualization and OS combinations to help validate that the Sun Java System products continue to function on properly sized and configured virtualized environments as they do on non-virtualized systems. For information about Sun support for Sun Java System products in virtualized environments, see <http://docs.sun.com/doc/820-4651>.

Administration Server and Console

Administration Server and the Java Swing-based Console used for remote graphical administration of Identity Synchronization for Windows may be replaced in a future release. Directory Service Control Center has been implemented to allow full browser-based service management, with easier configuration for access through a firewall.

Note – Directory Proxy Server and Directory Server already use Directory Service Control Center. *Directory Proxy Server and Directory Server no longer use the serverroot architecture, but instead the new administration framework.*

As a result, the following commands may not be included in a future release, even for Identity Synchronization for Windows:

- `start-admin`
- `stop-admin`
- `startconsole`

In addition, everything in `o=NetscapeRoot`, may change. In particular, `o=NetscapeRoot` might no longer be present. The `serverroot` architecture may be replaced by the new administration framework.

Furthermore, Directory Server chaining cannot be configured through Directory Service Control Center.

Directory Server Changes

The legacy command-line tools for managing Directory Server instances are deprecated.

The following tools have already been removed.

- `bak2db.pl`
- `db2bak.pl`
- `db2index.pl`

- `db2ldif.pl`
- `ldif2db.pl`
- `ns-accountstatus.pl`
- `ns-activate.pl`
- `ns-inactivate.pl`
- `schema_push.pl`
- `check-slapd`
- `getpwenc`
- `ldif2ldap`
- `monitor`
- `restoreconfig`
- `saveconfig`
- `suffix2instance`
- `vlvindex`
- `/usr/bin/directoryserver`
- `db2index`

The following tools might be removed from a future release.

- `bak2db`
- `db2bak`
- `db2ldif`
- `ldif2db`
- `restart-slapd`
- `start-slapd`
- `stop-slapd`

The new command line tools, `dsadm` and `dsconf`, and other commands replace the functionality provided by the tools listed. See “Command Line Changes” in *Sun Java System Directory Server Enterprise Edition 6.2 Migration Guide* for details.

For a detailed discussion of administration related Directory Server changes, see Chapter 5, “Architectural Changes in Directory Server,” in *Sun Java System Directory Server Enterprise Edition 6.2 Migration Guide*.

Before migrating a replicated server topology, review Chapter 4, “Migrating a Replicated Topology,” in *Sun Java System Directory Server Enterprise Edition 6.2 Migration Guide*. Support for legacy replication with Directory Server 4 has been removed from this release. Sun Microsystems ended support for Directory Server 4 in January 2004.

When you create a Directory Server instance, password policy is configured initially backwards-compatible. After upgrading, you change the compatibility mode to enable richer password policy configuration. Directory Server manages the conversion. In a future release, the backwards-compatible password policy configuration might be removed.

Also, when you create a Directory Server instance, support for the modify DN operation is disabled. After upgrade all server instances in your replication topology, the modify DN

operation can be replicated properly. At that point, you can enable support for the modify DN operation on each server instances. Use the `dsconf set -server-prop moddn-enabled:on` command for this purpose.

Directory Server chaining is deprecated and might be removed in a future release. Chaining is not configurable through Directory Service Control Center, nor is chaining configurable through the new command line tools. Most deployments enabled by chaining are now enabled using features of Directory Proxy Server. For example, data distribution, global account lockout across an entire replication topology, and merging directory information trees can be done with Directory Proxy Server. For legacy applications that continue to rely on chaining, you can configure the chained suffix plug-in with the `ldapmodify` command to set attributes for chaining. The attributes are listed in `dse.ldif(4)`.

Chapter 2, “Changes to the Plug-In API Since Directory Server 5.2,” in *Sun Java System Directory Server Enterprise Edition 6.2 Developer’s Guide* and Chapter 3, “Changes to the Plug-In API From Directory Server 4 to Directory Server 5.2,” in *Sun Java System Directory Server Enterprise Edition 6.2 Developer’s Guide* detail plug-in API changes. Interfaces identified there as deprecated might be removed in a future release.

Directory Proxy Server Changes

To access Directory Proxy Server 6.0 and 6.1 instances using the Directory Proxy Server 6.2 commands, no migration is required. But all the Directory Proxy Server 5.x instances need to be migrated before using with the Directory Proxy Server 6.2 commands. See Chapter 6, “Migrating Directory Proxy Server,” in *Sun Java System Directory Server Enterprise Edition 6.2 Migration Guide* for details.

Identity Synchronization for Windows Changes

Future releases of Identity Synchronization for Windows might discontinue support for all versions and service packs of Microsoft Windows NT. Microsoft ended support for Windows NT in June 2004.

Before upgrading Identity Synchronization for Windows, read Chapter 7, “Migrating Identity Synchronization for Windows,” in *Sun Java System Directory Server Enterprise Edition 6.2 Migration Guide*.

Directory Server Resource Kit Changes

“[About Directory Server Resource Kit](#)” on page 77 explains what is provided in this release of Directory Server Resource Kit.

The LDAP utility manual pages on Sun Solaris systems do not document the version of the LDAP utilities `ldapsearch`, `ldapmodify`, `ldapdelete`, and `ldapadd` delivered with Directory Server Enterprise Edition. The commands might no longer be delivered separately on Solaris

systems, but instead integrated with the commands provided by the operating system in a future version. See *Sun Java System Directory Server Enterprise Edition 6.2 Man Page Reference* for the manual pages for the LDAP client tools.

Installation Notes

This chapter tells you where to download Directory Server Enterprise Edition software, and lists primary installation requirements.

This chapter includes the following sections:

- “Support Services and Licenses” on page 23
- “What's New in Directory Server Enterprise Edition 6.2” on page 24
- “Getting the Software” on page 24
- “Hardware Requirements” on page 25
- “Operating System Requirements” on page 27
- “Software Dependency Requirements” on page 31
- “Installation Privileges and Credentials” on page 35
- “Installation Notes for Identity Synchronization for Windows” on page 36

Support Services and Licenses

Before you start with the product installation, make sure you read the support and licensing information thoroughly.

Support Services

Sun Software Service Standard, Premium and Premium Plus plan offerings are available for Sun Java System Directory Server Enterprise Edition and can be purchased either through a Sun sales representative, an authorized Sun reseller, or online at <http://www.sun.com/sales/index.jsp>. These service plans include telephone and online technical support, on-demand software updates, online system administration resources, support notification services and one-stop interoperability assistance (Premium and Premium Plus plans only). In addition, the Premium Plus plan features a customer advocate and a customer-focused support team.

For complete feature set information, visit:

<http://www.sun.com/service/serviceplans/software/overview.xml>

Customers wishing to buy a maintenance contract for the free 200,000 Directory Server entries included in Solaris can also purchase a Sun Software Service plan through a Sun sales representative or authorized Sun reseller.

You may access the service lists describing all Sun service program offerings at:
<http://www.sun.com/servicelist>

Licenses

Licenses are provided based on the number of entries you plan to manage using Directory Server Enterprise Edition. After a license is provided, you can replicate the entries as many times as required to get maximum flexibility out of your directory implementation. The only condition is that you do not change any of the replicated entries and store all of the replicated entries on the same operating system. If the replicated entries are stored on any other operating system, you must purchase a license for those entries.

Solaris provides 200,000 free entries for Directory Server. In this case, you only have license for the core directory server component, not for the other Directory Server Enterprise Edition components. You can purchase an upgrade from core directory server component to full Directory Server Enterprise Edition.

You can review the latest license for a given version of a product before downloading it from
http://www.sun.com/software/products/directory_srvr_ee/get.jsp.

What's New in Directory Server Enterprise Edition 6.2

Directory Server Enterprise Edition 6.2 is a patch release that adds the following new features to the Directory Server Enterprise Edition 6.1 release:

- Native distribution for Windows.
- Install the zip distribution as any user on Windows.
- The console is also available for the zip distribution, see “Installing Directory Service Control Center From Zip Distribution” in *Sun Java System Directory Server Enterprise Edition 6.2 Installation Guide*.
- Improved performance for some specific deployments.

For the list of new features added in Directory Server Enterprise Edition 6.1, see “What’s New at a Glance” in *Sun Java System Directory Server Enterprise Edition 6.2 Evaluation Guide*.

Getting the Software

You can download Sun Java System Directory Server Enterprise Edition 6.2 software from the following location.

http://www.sun.com/software/products/directory_srvr_ee/get.jsp

The download page serves as a starting point to direct you to the proper downloads depending on the distribution type you need to download. Directory Server Enterprise Edition 6.2 is available in the following distributions.

- Native package distribution
- zip distribution

For a comparison of the two distributions, see “Directory Server Enterprise Edition Software Distributions” in *Sun Java System Directory Server Enterprise Edition 6.2 Installation Guide*.

Directory Server Enterprise Edition 6.2 is available in the following forms.

- Java ES installer — full installer for Solaris and Linux systems native packages.
- Native patch — patches to upgrade Directory Server Enterprise Edition 6.0 and 6.1 native packages installed using the Java ES installer.

There is no Native patch delivery for SuSE Linux Enterprise Server in Directory Server Enterprise Edition 6.2.

- Zip based distribution — standalone delivery to install Directory Server Enterprise Edition 6.2 or upgrade Directory Server Enterprise Edition 6.0 and 6.1 zip installations.

For information on patch numbers, see “Software Installation” in *Sun Java System Directory Server Enterprise Edition 6.2 Installation Guide*.

For the detailed information on what you need to install based on your current installation, refer to the “Installation Procedure Quick Reference” in *Sun Java System Directory Server Enterprise Edition 6.2 Installation Guide*.

Hardware Requirements

This section covers hardware requirements for Directory Server Enterprise Edition component products.

- “Directory Server Hardware Requirements” on page 25
- “Directory Proxy Server Hardware Requirements” on page 26
- “Identity Synchronization for Windows Hardware Requirements” on page 26
- “Directory Editor Hardware Requirements” on page 27

Directory Server Hardware Requirements

Directory Server software requires the following hardware support.

Component	Platform Requirement
RAM	1-2 GB for evaluation purposes Minimum 2 GB for production servers
Local disk space	300 MB disk space for binaries. By default, binaries installed from native packages are placed in /opt on UNIX® systems. For evaluation purposes, an additional 2 GB local disk space for server software might be sufficient. If you are using Directory Server, consider that entries stored in Directory Server use local disk space. Directory Server does not support logs and databases installed on NFS-mounted file systems. Sufficient space should be provided for the database on a local file system in, for example, /var/opt or /local. For a typical production deployment with a maximum of 250,000 entries and no binary attributes such as photos, 4 GB might be sufficient. Directory Server may use more than 1.2 GB of disk space for its log files. This should be taken into account that 4 GB storage space is only for the databases, not the logs. Directory Server supports SAN disk storage. Before using SAN disk, you need to understand the layout and the design of the disk because the write performance of the system is affected if many applications simultaneously access data from the same disk.

Directory Proxy Server Hardware Requirements

Directory Proxy Server software requires the following hardware support.

Component	Platform Requirement
RAM	1-2 GB for evaluation purposes Minimum 2GB for production servers
Local disk space	300 MB disk space for binaries. By default, binaries installed from native packages are placed in /opt on UNIX systems. For evaluation purposes, an additional 2 GB local disk space per server instance is sufficient to hold server logs when the default configuration is used. Directory Proxy Server does not support installation on NFS-mounted file systems. Sufficient space should be provided for the instance, and for all files used by the instance on a local file system in, for example, /var/opt or /local.

Identity Synchronization for Windows Hardware Requirements

Identity Synchronization for Windows software requires the following hardware support.

Component	Platform Requirement
RAM	512 MB for evaluation purposes wherever components are installed. More memory is preferred.
Local disk space	400 MB disk space for minimal installation alongside Directory Server.

Directory Editor Hardware Requirements

Make sure you read [Chapter 6, “Directory Editor Bugs Fixed and Known Problems,”](#) in these release notes before you install Directory Editor.

Also, see the Directory Editor documentation at http://docs.sun.com/coll/DirEdit_05q1 for details.

Operating System Requirements

This section covers operating systems, patches and service packs required to support Directory Server Enterprise Edition component products.

Directory Server, Directory Proxy Server, and Directory Server Resource Kit Operating System Requirements

Directory Server, Directory Proxy Server, and Directory Server Resource Kit share the same operating system requirements. These software components run on the operating system versions listed here. Certain operating systems require additional service packs or patches as shown in the following table.

Operating System	Supported OS Versions	Additional Required Software
Solaris™ Operating System	Solaris 10 Operating System for SPARC®, x86, and AMD x64 architectures	Patches: <ul style="list-style-type: none"> ■ (SPARC) 118833, 119689, 119963, 122032, and 119254 or substitute patches ■ (x86/x64) 118855, 119964, 121208, 122033, and 119255 or substitute patches
	Solaris 9 Operating System for SPARC and x86 architectures	Patches: <ul style="list-style-type: none"> ■ (SPARC) 111711, 111712, 111722, 112874, 112963, 113225, 114344, 114370, 114371, 114372, and 114373 or substitute patches ■ (x86) 111713, 111728, 113986, 114345, 114427, 114428, 114429, 114430, 114432, 116545, and 117172 or substitute patches

Operating System	Supported OS Versions	Additional Required Software
Red Hat Linux (On 64-bit Red Hat systems, Directory Server runs in 32-bit mode.)	Red Hat Advanced Server 3.0 U4 for x86 and AMD x64	No additional software is required.
	Red Hat Advanced Server 4.0 U2 for x86 and AMD x64	<p>The following compatibility libraries are recommended:</p> <p><code>compat-gcc-32-3.2.3-47.3.i386.rpm</code></p> <p><code>compat-gcc-32-c++-3.2.3-47.3.i386.rpm</code></p> <p>The following compatibility library is required:</p> <p><code>compat-libstdc++-33-3.2.3-47.3.rpm</code></p> <p>Even when running Red Hat on a 64-bit system, you install 32-bit system libraries.</p> <p>These compatibility libraries are available from Red Hat media or https://www.redhat.com/rhn/rhndetails/update/.</p>
SuSE (On 64-bit SuSE systems, Directory Server runs in 32-bit mode.)	SuSE Linux Enterprise Server 9 for x86 and AMD x64	Service Pack 3
Microsoft Windows (On 64-bit Windows systems, Directory Server runs in 32-bit mode.)	Windows 2000 Server	Service Pack 4
	Windows 2000 Advanced Server	Service Pack 4
	Windows 2003 Server Standard Edition	Service Pack 1
	Windows 2003 Server Enterprise Edition	Service Pack 1

Note – Directory Server Enterprise Edition 6.2 does not support HP-UX. But the future version of the product is planned to support HP-UX.

Before you install Directory Server Enterprise Edition 6.2 on SuSE Linux Enterprise Server, you must read the following instructions:

- On SuSE Linux, only Directory Server and Directory Proxy Server are supported. This support is available only in the zip distribution.

- On SuSE Linux, you must install as root otherwise you cannot use DSCC to manage your servers remotely.
- You must apply a patch for Pluggable Authentication Modules (PAM) libraries.
If the patch is not applied, DSCC fails to authenticate the DSCC agent.
- On SuSE 64-bit, you must install `pam-32bit-9-yyyymmddhhmm.rpm`
If `pam-32bit-9-yyyymmddhhmm.rpm` is not installed, `cacaoadm start` fails.
- The Linux delivery, which works on both Red Hat and SuSE Linux, is labelled for Red Hat only.

You can obtain Solaris patch clusters and avoid downloading most individual patches. To obtain Solaris patch clusters, follow these steps:

1. Go to the SunSolve patch page at
<http://sunsolve.sun.com/pub-cgi/show.pl?target=patchpage>.
2. Click the Recommended Patch Clusters link.
3. Download the patch cluster for your Solaris OS and Java ES versions.

Directory Server Enterprise Edition software is validated with full installations of the operating systems listed here, not with reduced “base”, “End User”, or “core” installations.

Directory Server runs in 64-bit mode on the following platforms:

- Solaris SPARC
- Solaris 10 AMD x64 systems

Directory Server runs in 32-bit mode on the following platforms:

- Solaris x86 systems
- Solaris 9 AMD x64 systems
- Red Hat systems for x86 and AMD x64
- SuSE Linux Enterprise Server 9 SP3 for x86 and AMD x64

You must install Directory Server and Directory Proxy Server on Windows NTFS system. The Common Agent Container is not supported on Windows FAT system.

SuSE Linux Enterprise Server provides a set of scripts in `/etc/profile.d/` to automatically set the appropriate environment as per the installed software. Therefore, you must reset the following Java environment variables to none before you start working on the product using commands.

- `JAVA_BINDIR`
- `JAVA_HOME`
- `JRE_HOME`
- `JAVA_ROOT`

Identity Synchronization for Windows Operating System Requirements

Identity Synchronization for Windows components run on the operating system versions listed here. Certain operating systems require additional service packs or patches as shown in the following tables.

Identity Synchronization for Windows Requirements for Core Components and Connectors

The following table lists operating system requirements for core components, and connectors for Directory Server and Active Directory.

Operating System	Supported OS Versions	Additional Required Software
Solaris Operating System	Solaris 10 Operating System for UltraSPARC®, and x86 (Pentium) architectures	No additional software is required.
	Solaris 9 Operating System for SPARC architectures	No additional software is required.
	Solaris 8 Operating System for UltraSPARC architectures	No additional software is required.
Red Hat Linux	Red Hat Advanced Server 4.0	No additional software is required.
	Red Hat Advanced Server 3.0	No additional software is required.
Microsoft Windows	Windows 2000 Server	Service Pack 4
	Windows 2000 Advanced Server	Service Pack 4
	Windows 2003 Server Standard Edition	Latest security updates
	Windows 2003 Server Enterprise Edition	Latest security updates

Note – Identity Synchronization for Windows is not supported on SuSE systems.

Identity Synchronization for Windows Requirements for Windows NT

The following table lists operating system requirements for Windows NT components and connectors.

Operating System	Supported OS Versions	Additional Required Software
Microsoft Windows	Windows NT 4.0 Server Primary Domain Controller, x86 architectures	Service Pack 6A

Directory Editor Operating System Requirements

Make sure you read [Chapter 6, “Directory Editor Bugs Fixed and Known Problems,”](#) in these release notes before you install Directory Editor.

Also, see the Directory Editor documentation at http://docs.sun.com/coll/DirEdit_05q1 for details.

Software Dependency Requirements

Directory Server relies on the Network Security Services, NSS, layer for cryptographic algorithms. NSS has been validated to work with the Sun cryptographic framework provided on Solaris 10 systems, which supports cryptographic acceleration devices.

On Windows systems, Directory Server requires ActivePerl software to use account activation and manual schema replication commands. Directory Server Enterprise Edition does not provide ActivePerl. The dependency concerns the following commands.

- ns-accountstatus(1M)
- ns-activate(1M)
- ns-inactivate(1M)
- schema_push(1M)

On Windows, you must disable the pop-up blocker to make Directory Service Control Center work properly.

Directory Proxy Server requires a Java runtime environment, JRE, version of at least 1.5.0_09 on Solaris, Red Hat and Windows systems. The zip distribution installs JRE. When you install from the zip distribution with the JAVA_HOME environment variable set, the Java runtime environment specified by JAVA_HOME is used. If JAVA_HOME is set for your environment, make sure the version is up to date.

Directory Proxy Server will work with any LDAPv3 compliant directory servers, but it is tested only with Sun Java System Directory Server.

For virtualization, Directory Proxy Server has been validated with the following JDBC data sources, using the drivers mentioned below. Though Directory Proxy Server works with all the JDBC 3 compliant drivers.

JDBC Data Source	JDBC Driver
DB2 v9	IBM DB2 JDBC Universal Driver Architecture 2.10.27
JavaDB 10.2.2.0	Apache Derby Network Client JDBC Driver 10.2.2.0
MySQL 5.0	MySQL-AB JDBC Driver mysql-connector-java-5.0.4
Oracle 9i Database	Oracle JDBC driver
Oracle 10g Database	10.2.0.2.0

On Windows systems, the `dsee_deploy` command cannot properly register software with the Common Agent Container, `cacao`, when you run the command from an MKS shell. This can occur when your MKS PATH does not include the `system-drive:\system32` folder. Alternatively, run the command on the Windows native command line.

On Solaris 10, `rc.scripts` are deprecated so commands like `dsadm autostart` are not supported. Instead use Solaris 10 Service Management Facility (SMF) to handle these types of requests. For example, `dsadm enable-service`. For more information on SMF, see Solaris documentation.

Before you can install Identity Synchronization for Windows, you must install the prerequisite Sun Java System software components, including JRE and Message Queue.

- No JRE is provided with Identity Synchronization for Windows.
Identity Synchronization for Windows installer requires J2SE or JRE 1.5.0_09.
Identity Synchronization for Windows requires JRE 1.5.0_09 on Windows NT.
- The Identity Synchronization for Windows bundle for this release includes Message Queue 3.6.

When installing Identity Synchronization for Windows, you must specify the path to the version of Message Queue to use. The Identity Synchronization for Windows installation program then installs a required broker into Message Queue, so that Identity Synchronization for Windows can use Message Queue for synchronization.

On Windows systems, Identity Synchronization for Windows supports only Message Queue 3.6. You therefore install Message Queue 3.6 provided with the Identity Synchronization for Windows bundle.

Message Queue 3.7 is, however, installed as a Java Enterprise System shared component. On Windows systems by default you can therefore end up with both Message Queue 3.6 and Message Queue 3.7 installed. If you install Java Enterprise System components alongside Identity Synchronization for Windows on a Windows system, be sure Message Queue 3.7 is not selected.

On Windows systems, the JRE installed with Console and Administration Server does not include fixes for daylight savings time changes. You must apply fixes for daylight savings time changes after installation. To fix the JRE, use the `tzupdater` tool, described at http://java.sun.com/javase/tzupdater_README.html. The JRE to fix is found after installation under `ServerRoot/bin/base/jre/` where you installed the Console and Administration Server.

Identity Synchronization for Windows Requirements in a Firewall Environment

You can run Identity Synchronization for Windows in a firewall environment. The following sections list the server ports that you must expose through the firewall.

Message Queue Requirements

By default, Message Queue uses dynamic ports for all services except for its port mapper. To access the Message Queue broker through a firewall, the broker should use fixed ports for all services.

After installing the core, you must set the `imq.<service_name>.<protocol_type>.port` broker configuration properties. Specifically, you must set the `imq.ssljms.tls.port` option. Refer to the Message Queue documentation for more information.

Installer Requirements

The Identity Synchronization for Windows installer must be able to communicate with the Directory Server acting as the configuration directory.

- If you are installing an Active Directory connector, the installer must be able to contact Active Directory's LDAP port, 389.
- If you are installing a Directory Server connector or a Directory Server plug-in (subcomponent), the installer must be able to contact the Directory Server LDAP port, default 389.

Core Component Requirements

The Message Queue, system manager, and command line interface must be able to reach the Directory Server where the Identity Synchronization for Windows configuration is stored.

Console Requirements

The Identity Synchronization for Windows console must be able to reach the following:

- Active Directory over LDAP, port 389, or LDAPS, port 636
- Active Directory Global Catalog over LDAP, port 3268, or LDAPS, port 3269
- Each Directory Server over LDAP or LDAPS
- Administration Server
- Message Queue

Connector Requirements

All connectors must be able to communicate with Message Queue.

In addition, the following connector requirements must be met.

- The Active Directory connector must be able to access the Active Directory Domain Controller over LDAP, port 389, or LDAPS, port 636.
- The Directory Server connector must be able to access Directory Server instances over LDAP, default port 389, or LDAPS, default port 636.

Directory Server Plug-in Requirements in a Firewall Environment

Each Directory Server plug-in must be able to reach the Directory Server connector's server port, which was chosen when the connector was installed. Plug-ins that run in Directory Server Master replicas must be able to connect to Active Directory's LDAP, port 389, or LDAPS, port 636. The plug-ins that run in other Directory Server replicas must be able to reach the master Directory Server LDAP and LDAPS ports.

Supported Browsers for Directory Service Control Center

The following table displays the browsers for each operating system that supports Directory Service Control Center.

Operating System	Supported Browser
Solaris 10 and Solaris 9 (SPARC and x86)	Netscape™ Communicator 7.1, Mozilla™ 1.7.12, and Firefox 1.0.7, 1.5, and 2.0
Red Hat Linux 4, Red Hat Linux 3 and SuSE Linux	Mozilla 1.7.12 and Firefox 1.0.7, 1.5, and 2.0
Windows XP	Netscape Communicator 8.0.4, Microsoft Internet Explorer 6.0SP2, Mozilla 1.7.12, and Firefox 1.0.7, 1.5, and 2.0
Windows 2000/2003	Netscape Communicator 8.0.4, Microsoft Internet Explorer 6.0SP1, Mozilla 1.7.12, and Firefox 1.0.7, 1.5, and 2.0

Installation Privileges and Credentials

This section covers privileges or credentials required for installation of Directory Server Enterprise Edition component products.

- [“Directory Server, Directory Proxy Server, Directory Service Control Center, and Directory Server Resource Kit Privileges” on page 35](#)
- [“Identity Synchronization for Windows Installation Privileges and Credentials” on page 36](#)

Directory Server, Directory Proxy Server, Directory Service Control Center, and Directory Server Resource Kit Privileges

You must have the following privileges when installing Directory Server, Directory Proxy Server, or Directory Service Control Center from the Java Enterprise System native package based distribution.

- On Solaris, Red Hat, and SuSE systems, you must install as root.
- On Windows systems, you must install as Administrator.

You can install Directory Server, Directory Proxy Server, and Directory Server Resource Kit from the zip distribution without special privileges.

See “Directory Server Enterprise Edition Software Distributions” in *Sun Java System Directory Server Enterprise Edition 6.2 Installation Guide* for details.

Before You Upgrade

You must consider the following points before applying the Directory Server Enterprise Edition 6.2 patch.

- Native package based distribution. All Directory Server and Directory Proxy Server instances, including the DSCC registry, must be stopped before the DSEE 6.2 patch is applied.

If you apply the patch without stopping the server instances, the instances might crash the next time you restart them.

To use the localized console, apply the Directory Server Enterprise Edition 6.2 patch before the Directory Server Enterprise Edition 6.2 localized patch. Then run the following commands in the specified order.

```
# dscsetup console-unreg  
# dscsetup console-reg
```

- Zip based distribution. All Directory Server and Directory Proxy Server instances must be stopped before the DSEE 6.2 zip distribution is applied on top of a DSEE 6.0 and DSEE 6.1 zip installations. This check is done by the `dsee_deploy` command itself, but it does not work on Windows 2000.

If you apply the patch without stopping the server instances, the instances might crash the next time you restart them.

Note – After applying patches to upgrade Directory Server Enterprise Edition, you must restart Sun Web Console using the following command:

```
# smcwebserver restart
```

Identity Synchronization for Windows Installation Privileges and Credentials

To install Identity Synchronization for Windows, you must provide credentials for the following.

- Configuration Directory Server.
- Directory Server being synchronized.
- Active Directory.

See “Installing Core” in *Sun Java System Directory Server Enterprise Edition 6.2 Installation Guide* for details.

In addition, you must have the following privileges to install Identity Synchronization for Windows.

- On Solaris and Red Hat systems, you must install as root.
- On Windows systems, you must install as Administrator.

Note – When you enter passwords by using the text-based installer, the program automatically masks the passwords so passwords are not echoed in the clear. The text-based installer is supported on Solaris and Red Hat systems only.

Installation Notes for Identity Synchronization for Windows

Before installing fresh bits of Identity Synchronization for Windows, be sure to read Chapter 5, “Preparing for Installation,” in *Sun Java System Directory Server Enterprise Edition 6.2 Installation Guide*.

Using Windows 2003 Server and Identity Synchronization for Windows

On Windows 2003 Server, the default password policy enforces strict passwords, which is not the default password policy on Windows 2000.

Directory Server Bugs Fixed and Known Problems

This chapter contains important, product-specific information available at the time of release of Directory Server.

This chapter includes the following sections:

- [“Bugs Fixed in Directory Server 6.2” on page 39](#)
- [“Known Problems and Limitations in Directory Server” on page 40](#)

Bugs Fixed in Directory Server 6.2

This section lists the bugs fixed since the last release of Directory Server.

- 6500297 After installing from the zip distribution on Solaris and Linux, Directory Server does not appear through SNMP after the Common Agent Container, cacao, is restarted.
- 6509701 When changing LDAP passwords by using the password change extended operation, the current password of the account is required even if `pwdSafeModify` is off.
- 6520653 On Windows 2003 systems, do not use software installed with `dsee_deploy` from the zip distribution in the German locale.
- 6540157 After running `db2ldif` or `ldif2db`, the new changelog is created but the old changelog is not removed.
- 6558119 When replication is enabled, `ns-slapd` crashes.
- 6561746 Migrating a Directory Server 5.1 master to 6.x displays an error.
- 6561772 Some of the jar files loaded in lockhart are not upgraded after applying 125310-02 and 125278-02 patches.
- 6564778 The `dsconf create-plugin -Y pwdstoragescheme` command adds the plugin entry with incorrect DN

Known Problems and Limitations in Directory Server

This section lists known problems and limitations at the time of release.

Directory Server Limitations

This section lists product limitations.

Do not change file permissions by hand.

Changes to file permissions for installed Directory Server Enterprise Edition product files can in some cases prevent the software from operating properly. Only change file permissions when following instructions in the product documentation, or following instructions from Sun support.

To workaround this limitation, install products and create server instances as a user having appropriate user and group permissions.

Do not replicate the `cn=changeLog` suffix.

Although nothing prevents you from setting up replication for the `cn=changeLog` suffix, doing so can interfere with replication. Do not replicate the `cn=changeLog` suffix. The `cn=changeLog` suffix is created by the retro changelog plug-in.

Database cache may be outdated after failover on Sun Cluster.

When Directory Server runs on Sun Cluster, and `nsslapd-db-home-directory` is set to use a directory that is not shared, multiple instances share database cache files. After a failover, the Directory Server instance on the new node uses its potentially outdated database cache files.

To work around this limitation, either use a directory for `nsslapd-db-home-directory` that is shared, or systematically remove the files under `nsslapd-db-home-directory` at Directory Server startup.

The wrong SASL library is loaded when `LD_LIBRARY_PATH` contains `/usr/lib`.

When `LD_LIBRARY_PATH` contains `/usr/lib`, the wrong SASL library is used, causing the `dsadm` command to fail after installation.

Use the LDAP replace operation to change `cn=config` attributes.

An LDAP modify operation on `cn=config` can only use the replace sub-operation. Any attempt to add or delete an attribute will be rejected with `DSA is unwilling to perform, error 53`. While Directory Server 5 accepted adding or deleting an attribute or attribute value, the update was applied to the `dse.ldif` file without any value validation, and the DSA internal state was not updated until the DSA was stopped and started.

Note – The `cn=config` configuration interface is deprecated. Where possible use the `dsconf` command instead.

To work around this limitation, the LDAP modify replace sub-operation can be substituted for the add or delete sub-operation. No loss in functionality occurs. Furthermore, the state of the DSA configuration is more predictable following the change.

On Windows systems, Directory Server does not allow Start TLS by default.

This issue affects server instances on Windows systems only. This issue is due to performance on Windows systems when Start TLS is used.

To work around this issue, consider using the `-P` option with the `dsconf` command to connect using the SSL port directly. Alternatively, if your network connection is already secured, consider using the `-e` option with the `dsconf` command. The option lets you connect to the standard port without requesting a secure connection.

Replication update vectors may reference retired servers.

After you remove a replicated Directory Server instance from a replication topology, replication update vectors can continue to maintain references to the instance. As a result, you might encounter referrals to instances that no longer exist.

The Common Agent Container is not started at boot time.

To work around this issue when installing from native packages, use the `cacaoadm enable` command as `root`.

`max-thread-per-connection-count` is not useful on Windows systems.

The Directory Server configuration property `max-thread-per-connection-count` does not apply for Windows systems.

A Microsoft Windows bug shows service startup type as disabled.

A [Microsoft Windows 2000 Standard Edition bug](http://support.microsoft.com/kb/287516/en-us)

(<http://support.microsoft.com/kb/287516/en-us>) causes the Directory Server service to appear as disabled after the service has been deleted from Microsoft Management Console.

Console does not allow administrator login on Windows XP

Console does not allow administrator to logon to the server running Windows XP.

As a workaround to this problem, the guest account must be disabled and the registry key `HKEY_LOCAL_MACHINE\SYSTEM\CurrentControlSet\Control\Lsa\ForceGuest` must be set to 0.

Known Directory Server Issues in 6.2

This section lists the known issues that are found at the time of Directory Server 6.2 release.

- 2113177 Directory Server has been seen to crash when the server is stopped while performing online export, backup, restore, or index creation.
- 2133169 When entries are imported from LDIF, Directory Server does not generate `createTimeStamp` and `modifyTimeStamp` attributes.

LDIF import is optimized for speed. The import process does not generate these attributes. To work around this limitation, add rather than import the entries. Alternatively, preprocess the LDIF to add the attributes before import.

4979319 Some Directory Server error messages refer to the *Database Errors Guide*, which does not exist. If you cannot understand the meaning of a critical error message that is not documented, contact Sun support.

6358392 When removing software, the `dsee_deploy uninstall` command does not stop or delete existing server instances.

To work around this limitation, follow the instructions in the *Sun Java System Directory Server Enterprise Edition 6.2 Installation Guide*.

6366948 Directory Server has been seen to retain `pwdFailureTime` values on a consumer replica, even after the attribute values have been cleared on the supplier replica. The values remain after the modification of `userPassword` has been replicated.

6401484 The `dsconf accord-repl-agmt` command cannot align authentication properties of the replication agreement when SSL client authentication is used on the destination suffix.

To work around this issue, store the supplier certificate in the configuration on the consumer, following these steps. The examples command shown are based on two instances on the same host.

1. Export the certificate to a file.

The following example shows how to perform the export for servers in `/local/supplier` and `/local/consumer`.

```
$ dsadm show-cert -F der -o /tmp/supplier-cert.txt /local/supplier defaultCert
$ dsadm show-cert -F der -o /tmp/consumer-cert.txt /local/consumer defaultCert
```

2. Exchange the client and supplier certificates.

The following example shows how to perform the exchange for servers in `/local/supplier` and `/local/consumer`.

```
$ dsadm add-cert --ca /local/consumer supplierCert /tmp/supplier-cert.txt
$ dsadm add-cert --ca /local/supplier consumerCert /tmp/consumer-cert.txt
```

3. Add the SSL client entry on the consumer, including the `supplierCert` certificate on a `usercertificate;binary` attribute, with the proper `subjectDN`.
4. Add the replication manager DN on the consumer.

```
$ dsconf set-suffix-prop suffix-dn repl-manager-bind-dn:entryDN
```

5. Update the rules in `/local/consumer/alias/certmap.conf`.

6. Restart both servers with the `dsadm start` command.

6412131 The certificate names containing multi-byte characters are shown as dots in the output of the `dsadm show-cert instance-path valid-multibyte-cert-name` command.

6410741 Directory Service Control Center sorts values as strings. As a result, when you sort numbers in Directory Service Control Center, the numbers are sorted as if they were strings.

An ascending sort of 0, 20, and 100 results in the list 0, 100, 20. A descending sort of 0, 20, and 100 results in the list 20, 100, 0.

6415184 Directory Server instance with multi-byte characters in its path may fail to be created in DSCC, to start or perform other regular tasks.

Some of these issues can be resolved by using the charset that was used to create the instance. Set the charset using the following commands:

```
# cacaoadm list-params | grep java-flags
java-flags=-Xms4M -Xmx64M

# cacaoadm stop
# cacaoadm set-param java-flags="-Xms4M -Xmx64M -Dfile.encoding=utf-8"
# cacaoadm start
```

Use only the ASCII characters in the instance path to avoid these issues.

6416407 Directory Server does not correctly parse ACI target DNs containing escaped quotes or a single escaped comma. The following example modifications cause syntax errors.

```
dn:o=mary\red\doe,o=example.com
changetype:modify
add:aci
aci:(target="ldap:///o=mary\red\doe,o=example.com")
(targetattr="*")(version 3.0; acl "testQuotes";
allow (all) userdn ="ldap:///self";)

dn:o=Example Company\, Inc.,dc=example,dc=com
changetype:modify
add:aci
aci:(target="ldap:///o=Example Company\, Inc.,dc=example,dc=com")
(targetattr="*")(version 3.0; acl "testComma";
allow (all) userdn ="ldap:///self";)
```

Examples with more than one comma that has been escaped have been observed to parse correctly, however.

- 6428448 The `dpconf` command has been seen to display the Enter "cn=Directory Manager" password: prompt twice when used in interactive mode.
- 6443229 Directory Service Control Center does not allow you to manage PKCS#11 external security devices or tokens.
- 6446318 On Windows, SASL authentication fails due to the following two reasons:
- SASL encryption is used.
- To workaround the issue caused by the SASL encryption, stop the server, edit `dse.ldif`, and reset SASL to the following.
- ```
dn: cn=SASL, cn=security, cn=config
dssaslminssf: 0
dssaslmaxssf: 0
```
- The installation is done using native packages.
- To workaround the issue caused by the native packages installation , set `SASL_PATH` to `install-dir\share\lib`.
- 6448572 Directory Service Control Center fails to generate a self-signed certificate when you specify the country.
- 6449828 Directory Service Control Center does not properly display userCertificate binary values.
- 6468074 The configuration attribute name, `passwordRootdnMayBypassModsCheck`, does not reflect that the server now allows any administrator to bypass password syntax checking when modifying another user's password when the attribute is set.
- 6468096 Do not set `LD_LIBRARY_PATH` before installing from the zip distribution or using the `dsadm` command.
- 6469154 On Windows, the output of `dsadm` and `dpadm` commands, and help messages are not localized in Simplified and Traditional Chinese languages.
- 6469296 The Directory Service Control Center feature that allows you to copy the configuration of an existing server does not allow you to copy the plug-in configuration.
- 6469688 On Windows systems, the `dsconf` command has been seen to fail to import LDIF with double-byte characters in the LDIF file name.

To work around this issue, change the LDIF file name so that it does not contain double-byte characters.

- 6478568 The `dsadm enable-service` command does not work correctly with Sun Cluster.
- 6480753 The `dsee_deploy` command has been seen to hang while registering the Monitoring Framework component into the Common Agent Container.
- 6482378 The `supportedSSLCiphers` attribute on the root DSE lists NULL encryption ciphers not actually supported by the server.
- 6482888 Unless you start Directory Server at least once, the `dsadm enable-service` fails to restart Directory Server upon system reboot.
- 6483290 Neither Directory Service Control Center nor the `dsconf` command allows you to configure how Directory Server handles invalid plug-in signatures. Default behavior is to verify the plug-in signatures, but not to require that they are valid. Directory Server logs a warning for invalid signatures.
- To change the server behavior, adjust the `ds-require-valid-plugin-signature` and `ds-verify-valid-plugin-signature` attributes on `cn=config`. Both attributes take either `on` or `off`.
- 6485560 Directory Service Control Center does not allow you to browse a suffix that is configured to return a referral to another suffix.
- 6488197 After installation and after server instance creation on Windows systems, the file permissions to the installation and server instance folder allow access to all users.
- To work around this issue, change the permissions on the installations and server instance folders.
- 6490653 When enabling referral mode for Directory Server by using Directory Service Control Center through Internet Explorer 6, the text in the confirm referral mode window is truncated.
- To work around this issue, use a different browser such as Mozilla web browser.
- 6490762 After creating or adding a new certificate, Directory Server must be restarted for the change to take effect.
- 6491849 After upgrading replica, and moving servers to new systems, you must recreate replication agreements to use new host names. Directory Service Control Center lets you delete the existing replication agreements, but does not allow you to create new agreements.
- 6492894 On Red Hat systems, the `dsadm autostart` command does not always ensure that the server instances start at boot time.
- 6494997 The `dsconf` command does not prompt for the appropriate `dsSearchBaseDN` setting when configuring DSML.

- 6495004 On Windows systems, Directory Server has been seen to fail to start when the base name of the instance is ds.
- 6497053 When installing from the zip distribution, the `dsee_deploy` command does not provide an option to configure SNMP and stream adaptor ports.
- To workaroud this issue,
1. Enabled Monitoring Plug-in using the web console or `dpconf`.
  2. Using `cacaoadm set-param`, change `snmp-adaptor-port`, `snmp-adaptor-trap-port` and `commandstream-adaptor-port`.
- 6497894 The `dsconf help-properties` command is set to work properly only after instance creation. In addition, the correct list of values for the `dsml-client-auth-mode` command should be `client-cert-first | http-basic-only | client-cert-only`.
- 6498537 In order to use Directory Service Control Center on Windows XP systems, the guest account must be disabled. Additionally, the registry key `HKEY_LOCAL_MACHINE\SYSTEM\CurrentControlSet\Control\Lsa\ForceGuest` must be set to 0 in order for authentication to succeed.
- 6500936 In the Native patch delivery, the miniature calendar that is used to pick dates for filtering access logs is not properly localized in Traditional Chinese.
- 6501893 Output of the `schema_push`, `repldisc`, `pwdhash`, `ns-inactivate`, `ns-activate`, `ns-accountstatus`, `mmldif`, `insync`, `fildif`, `entrycmp`, `dsrepair`, `dsee_deploy`, `dsadm show-cert`, `dsadm repack`, and `ldif` commands are not localized.
- 6501900
- 6501902
- 6501904 Some output displayed by the `dsccon`, `dsccreg`, `dscsetup`, and `dsccreg` commands is not localized.
- 6503546 Changing the locale of the system and starting DSCC, does not display the pop-up window message in the locale that you selected.
- 6503558 When setting up Directory Service Control Center in a locale other than English, log messages concerning creation of the Directory Service Control Center Registry are not fully localized. Some log messages are shown in the locale used when setting up Directory Service Control Center.
- 6504180 On Solaris 10, the password verification fails for instances with multi-byte characters in their DN on English and Japanese locales.
- 6520646 Clicking Browse DSCC online help does not display the online help when you are using Internet Explorer.
- 6527999 The Directory Server plug-in API includes `slapi_value_init()`, `slapi_value_init_string()`, and `slapi_value_init_berval()` functions.

- These functions all require a "done" function to release internal elements. However, the public API is missing a `slapi_value_done()` function.
- 6533281 Because of a known issue, `nsslapd-idletimeout` is not computed on Windows installations as documented under all conditions.
- On Unix (including Solaris), `nsslapd-idletimeout` is computed when new connections are opened and when new data is received, as described in the documentation.
- On Windows, `nsslapd-idletimeout` is computed the same way for secure connections or if `ds-start-tls-enabled` is `true`. However, for non-secure connections and if `ds-start-tls-enabled` is `false`, `nsslapd-idletimeout` is computed only when new connections are opened.
- 6536770 DSCC might not display long ACIs depending on the limit set by Internet Service Provider.
- 6538726 On Linux, If a Directory Server instance is started in a locale that is different from the locale in which the instance was created, the multi-byte characters do not display properly.
- 6542857 When you use Service Management Facility (SMF) in Solaris 10 to enable a server instance, the instance might not start when you reboot your system.
- As a workaround, add the following lines which are marked with `+` to `/opt/SUNWdsee/ds6/install/tmpl_smf.manifest`.
- ```
...
restart_on="none" type="service">
<service_fmri value="svc:/network/initial:default"/>
  </dependency>
+ <dependency name="nameservice" grouping="require_all" \
+ restart_on="none" type="service">
+ <service_fmri value="svc:/milestone/name-services"/>
+ </dependency>
<exec_method type="method" name="start"
exec="%%INSTALL_PATH%%/bin/dsadm start --exec %sunds/path}"...
```
- 6547923 Directory Server Enterprise Edition Windows service fails to start more than one server instances when the system restarts.
- 6550543 You might encounter an error when DSCC is used with the combination of Tomcat 5.5 and JDK 1.6 .
- As a workaround, use JDK 1.5 instead.

- 6551672 Sun Java System Application Server bundled with Solaris 10 cannot create SASL client connection for authenticated mechanism and does not communicate with common agent container.
- As a workaround, change the JVM used by application server by editing the *appserver-install-path/appserver/config/asenv.conf* file and replace the AS_JAVA entry with AS_JAVA="/usr/java". Restart your Application Server domain.
- 6551685 The dsadm autostart can make native LDAP authentication to fail when you reboot the system.
- As a workaround, reverse the order of reboot scripts. The default order is /etc/rc2.d/S71ldap.client and /etc/rc2.d/S72dsee_directory.
- 6554777 The DSCC Version window might display the html source code if it is configured by deploying the Web Archive (WAR) file with application server. As a workaround, add the following entries in *domain-path/domain-name/config/default-web.xml*.
- ```
<mime-mapping>
<extension>shtml</extension>
<mime-type>text/html</mime-type>
</mime-mapping>
```
- 6555192 On Linux, the localized server messages shown in the DSCC progress window might display the international characters garbled in non—English locales.
- 6557480 On Solaris 9 and Windows, when you access the online help from the console configured using Web archive file (WAR), it displays an error.
- 6565893 The idsktune command does not support SuSE Enterprise Linux.
- 6571672 If unzip is unavailable on the system, dsee\_deploy does not install any product.
- 6573439 In the More View Options of an instance, the date shown under the Access Logs, Error Logs, and Audit Logs tabs is not localized.
- 6573440 If you configure the uniqueness plug-in to work across multiple attributes in Directory Server, an error is displayed during the Directory Server startup.
- 6577314 If you apply the Directory Server Enterprise Edition 6.2 patch without stopping the server instances, the dsadm info and dsadm stop will display that a server is down while the server is running.
- 6581469 The string err= is not translated in some of the Korean and Simplified Chinese messages.
- 6582831 On Solaris, the instances registered as a service might not start after restarting the system.



As a workaround to this problem, run the following commands:

```
/usr/sbin/svccfg
svc:> select application/sun/ds
svc:/application/sun/ds> delpropvalue start/timeout_seconds 60
svc:/application/sun/ds> delpropvalue stop/timeout_seconds 60
svc:/application/sun/ds> addpropvalue start/timeout_seconds 600
svc:/application/sun/ds> addpropvalue stop/timeout_seconds 600
svc:/application/sun/ds> quit
```

- 6586231 In the `dsconf help`, Directory Server is sometimes incorrectly translated as `répertoire` instead of `serveur d'annuaire` in the French language.
- 6588319 In DSCC configured using Tomcat server, the title of the Help and Version pop-up windows displays the multi-byte strings garbled.
- 6589603 If you set the value of the configuration property, `pwd-max-history-count`, or the password policy attribute, `pwdInHistory`, to its maximum allowed value 24, the Directory Server instance might crash.

As a workaround, the value of `pwd-max-history-count` or `pwdInHistory` should not exceed 23.

- 6589942 In French, German, and Spanish languages, `ROLE` is translated in the `dsconf enable-repl -? command's` syntax but it is not translated later in the `ROLE = master` string.
- 6589949 In the command line interface help, the string `INSTANCE_PATH` is not translated in the German and Spanish languages.
- 6590558 On Linux, the Directory Server instances do not start at system restart if the maximum number of files are specified in the `/etc/security/limits.conf` file.

As a workaround, add the following in the `etc/init.d/dsee_directory` file.

```
ulimit -Hn 65536
ulimit -Sn 65536
```

- 6592543 The pop-up windows prompting the confirmation for stopping or unregistering servers display the doubled apostrophes in the French locale.



# Directory Proxy Server Bugs Fixed and Known Problems

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This chapter contains important, product-specific information available at the time of release of Directory Proxy Server.

This chapter includes the following sections:

- [“Bugs Fixed in Directory Proxy Server 6.2” on page 51](#)
- [“Known Problems and Limitations in Directory Proxy Server” on page 51](#)

## Bugs Fixed in Directory Proxy Server 6.2

This section lists the bugs fixed since the last release of Directory Proxy Server.

- |         |                                                                                                                                                                                                            |
|---------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| 6554303 | When a join data view is configured using <code>filter-join-rule</code> , addition of the entries to join data view is not possible even after you set the transformation rule on the secondary data view. |
| 6557516 | Directory Proxy Server loops infinitely after aborting a search on a join data view.                                                                                                                       |
| 6563993 | Directory Proxy Server should never return a result code as 32 when search on a JDBC data view does not return any entry satisfying the search criteria.                                                   |

## Known Problems and Limitations in Directory Proxy Server

This section lists known problems and limitations at the time of release.

### Directory Proxy Server Limitations

This section lists product limitations.

Do not change file permissions by hand.

Changes to file permissions for installed Directory Server Enterprise Edition product files can in some cases prevent the software from operating properly. Only change file permissions when following instructions in the product documentation, or following instructions from Sun support.

To workaround this limitation, install products and create server instances as a user having appropriate user and group permissions.

Self-signed server certificates cannot be renewed.

When creating a self-signed server certificate, make sure you specify a validity long enough that you do not have to renew the certificate.

## Known Directory Proxy Server Issues in 6.2

This section lists the known issues that are found at the time of Directory Proxy Server 6.2 release.

- 5042517      The modify DN operation is not supported for LDIF, JDBC, join and access control data views.
- 6255952      When local proxy ACIs are defined, operations using the get effective rights control may not return the correct information.
- 6356465      Directory Proxy Server has been seen to reject ACIs that specify subtypes to the target attribute, such as (targetattr = "locality;lang-fr-ca").
- 6357160      The `dpconf` command does not reject new line and line feed characters in property values. Avoid using new line and line feed characters when setting property values.
- 6359601      When ACIs are configured, Directory Proxy Server has been seen not to return the same results as a search directly on the LDAP data source.
- 6360059      Directory Proxy Server cannot resume the JDBC data source connection that is restored after the data source connection failure. Directory Proxy Server can resume the connection only after restarting the Directory Proxy Server instance.
- 6374344      Directory Proxy Server has been seen to return an operations error, stating that the server is unable to read the bind response, after a Directory Server data source is restarted.
- 6383532      Directory Proxy Server must be restarted when the authentication mode configuration is changed.
- 6386073      After a CA-Signed Certificate request is generated for Directory Proxy Server, you can refresh Directory Service Control Center. Directory Service Control Center then labels the certificate as self-signed.
- 6388022      You can configure to use SSL connections when the client application connects using SSL. If the SSL port used by Directory Proxy Server is incorrect, Directory Proxy Server has been seen to close all connections after a secure search.
- 6390118      Directory Proxy Server fails to count the number of referral hops properly when configured to use authentication based on the client application credentials rather than proxy authorization.

- 6390220 Directory Proxy Server allows you to set the base-dn property of a data view to the root DN, "", only when initially creating the data view.
- 6410741 Directory Service Control Center sorts values as strings. As a result, when you sort numbers in Directory Service Control Center, the numbers are sorted as if they were strings.
- An ascending sort of 0, 20, and 100 results in the list 0, 100, 20. A descending sort of 0, 20, and 100 results in the list 20, 100, 0.
- 6415184 Directory Proxy Server instance with multi-byte characters in its path may fail to be created in DSCC, to start or perform other regular tasks.
- Some of these issues can be resolved by using the charset that was used to create the instance. Set the charset using the following commands:
- ```
# cacaoadm list-params | grep java-flags
java-flags=-Xms4M -Xmx64M

# cacaoadm stop
# cacaoadm set-param java-flags="-Xms4M -Xmx64M -Dfile.encoding=utf-8"
# cacaoadm start
```
- Use only the ASCII characters in the instance path to avoid these issues.
- 6439055 Do not use the dollar sign, \$, when defining attribute rules.
- 6439604 After configuring alerts, you must restart Directory Proxy Server for the change to take effect.
- 6461510 In Directory Proxy Server, referral hop limit does not work.
- 6447554 Directory Proxy Server has been seen to fail to rename an entry moving to another data view when numeric or lexicographic data distribution is configured.
- 6458935 When working with join data views, Directory Proxy Server does not take data distribution algorithms in the views that make up the join.
- To work around this issue, configure data distribution at the level of the join data view when using joins and data distribution together.
- 6463067 The dpadm autostart command does not work when you install software from native packages, and you relocate the native packages at installation time.
- 6469154 On Windows, the output of dsadm and dpadm commands, and help messages are not localized in Simplified and Traditional Chinese languages.
- 6469780 After configuring a JDBC data source, you must restart Directory Proxy Server for the change to take effect.

- 6475710 The modify RDN operation is not supported for entries in JDBC data views.
- 6479766 Directory Proxy Server does not allow you to manage schema over LDAP.
- 6486578 Directory Proxy Server should ignore the `filter-join-rule` property when it is used in a primary table.
- 6488197 After installation and after server instance creation on Windows systems, the file permissions to the installation and server instance folder allow access to all users.
- To work around this issue, change the permissions on the installations and server instance folders.
- 6488297 On Windows, DSCC initialization can only be performed by Administrator user
- 6490763 Access Manager, when accessing Directory Server through Directory Proxy Server, has been seen to encounter caching problems related to persistent searches after Directory Server is restarted.
- To work around this issue, restart either Access Manager or Directory Proxy Server after restarting Directory Server.
- For further fine tuning, you can increase the number of and delay between Access Manager attempts to reestablish persistent search connections. You can increase these parameters by changing the following properties in the `AMConfig.properties` file.
- Increase `com.ipanet.am.event.connection.num.retries`, which represents the number of attempts. The default is 3 attempts.
 - Increase `com.ipanet.am.event.connection.delay.between.retries`, which represents the number of milliseconds delay between attempts. The default is 3000 milliseconds.
- 6490853 If you run a search using JDBC data view configured with DB2 database and there are large number of entries to be returned in the search result, an error might occur after returning 1344 entries.
- To overcome this limitation, increase the number of large packages by setting the value of the CLI/ODBC configuration keyword `CLIPkg` to a value up to 30. Even then the search result is limited to maximum of 11712 Entries.
- For more information, see [DB2 documentation](#).
- 6491133 When creating a self-signed certificate using Directory Service Control Center, do not use multi-byte characters for the certificate names.
- 6491845 The default LDAP controls allowed through Directory Proxy Server are not displayed by Directory Service Control Center.

- 6492376 After configuring JDBC syntax, you must restart Directory Proxy Server for the change to take effect.
- 6493349 Directory Service Control Center removes commas when changing the DN for an existing excluded subtree, or alternate search base.
- 6494540 After enabling or disabling non secure LDAP access for the first time, you must restart Directory Proxy Server for the change to take effect.
- 6495395 Virtual directory macros using `split` do not work properly.
- 6497547 Time limit and size limit settings work only with LDAP data sources.
- 6497992 After using the command `dpadm set-flags cert-pwd-store=off`, Directory Proxy Server cannot be restarted using Directory Service Control Center.
- 6500298 When using the `jvm-args` flag of the `dpadm` command and restarting the server, you cannot successfully allocate more than 2 GB memory for the Java virtual machine.
- To work around this issue, use `dpadm stop` and `dpadm start` instead of `dpadm restart`.
- 6501867 The `dpadm start` command has been seen to fail when used with a server instance name combining both ASCII and multi-byte characters.
- 6505112 When setting the `data-view-routing-custom-list` property on an existing connection handler, an error occurs with data view names containing characters that must be escaped, such as commas.
- To work around this issue, do not give data views names that contain characters that must be escaped. For example, do not use data view names containing DNs.
- 6510583 Unlike previous versions, as stated in the manual page `allowed-ldap-controls(5dpconf)`, Directory Proxy Server does not allow the server side sort control by default.
- You can enable Directory Proxy Server support for the server side sort control by adding `server-side-sorting` to the list of allowed LDAP controls specified by the `allowed-ldap-controls` property.
- ```
$ dpconf set-server-prop \
 allowed-ldap-controls:auth-request \
 allowed-ldap-controls:chaining-loop-detection \
 allowed-ldap-controls:manage-dsa \
 allowed-ldap-controls:persistent-search \
 allowed-ldap-controls:proxy-auth-v1 \
 allowed-ldap-controls:proxy-auth-v2 \
 allowed-ldap-controls:real-attributes-only \
```

**allowed-ldap-controls:server-side-sorting**

Notice that you must repeat the existing settings. Otherwise, only the server side sort control is allowed.

- 6511264 When using the DN renaming feature of Directory Proxy Server, notice that repeating DN components are renamed to only one replacement component.
- Consider for example that you want to rename DN's that end in `o=myCompany.com` to end in `dc=com`. For entries whose DN repeats the original component, such as `uid=userid,ou=people,o=myCompany.com,o=myCompany.com`, the resulting renamed DN is `uid=userid,ou=people,dc=com`, and not `uid=userid,ou=people,o=myCompany.com,dc=com`.
- 6517615 The JDBC connection configuration to access Oracle 9 through Directory Proxy Server might not be as straightforward as shown in the documentation.
- Consider the following configuration. You have an Oracle 9 server listening on host `myhost`, port 1537 with the instance having system identifier (SID) `MYINST`. The instance has a database `MYNAME.MYTABLE`.
- Typically, to configure access through to `MYTABLE`, you would set the following properties.
- On the JDBC data source, set `db-name:MYINST`.
  - On the JDBC data source, set `db-url:jdbc:oracle:thin:myhost:1537:.`
  - On the JDBC table, set `sql-table:MYNAME.MYTABLE`.
- If these settings do not work for you, try configuring access through to `MYTABLE` with the following settings.
- On the JDBC data source, set `db-name:(CONNECT_DATA=(SERVICE_NAME=MYINST))`.
  - On the JDBC data source, set `db-url:jdbc:oracle:thin:@(DESCRIPTION=(ADDRESS_LIST=(ADDRESS=(PROTOCOL=TCP)(HOST=myhost)(PORT=1537)))`.
  - On the JDBC table, set `sql-table:MYNAME.MYTABLE`.
- 6527010 Directory Proxy Server cannot write JDBC attributes implying many-to-many (N:N) relationship between tables in the JDBC database.
- 6527869 Search doesn't work on a join view if using attributes from secondary view in the search filter.
- 6539650 Directory Proxy Server instances with multi-byte DN and created using DSCC, fail to start on Linux.
- 6542857 When you use Service Management Facility (SMF) in Solaris 10 to enable a server instance, the instance might not start when you reboot your system.



As a workaround, add the following lines which are marked with + to `/opt/SUNWdsee/ds6/install/tmpl_smf.manifest`.

```
...
restart_on="none" type="service">
<service_fmri value="svc:/network/initial:default"/>
 </dependency>
+ <dependency name="nameservice" grouping="require_all" \
+ restart_on="none" type="service">
+ <service_fmri value="svc:/milestone/name-services"/>
+ </dependency>
<exec_method type="method" name="start"
exec="%%INSTALL_PATH%%/bin/dsadm start --exec %{sunds/path}"...
```

- 6551076 Console does not retrieve the backend status of the Directory Proxy Server instance if a machine has multiple host names.
- 6555192 On Linux, the localized server messages shown in the DSCC progress window might display the international characters garbled in the Japanese locale.
- 6565106 If duplicate entries are present in RDBMS table matching a DN pattern found in JDBC object class, then duplicate subtree (non-leaf) nodes would be returned by Directory Proxy Server when search is performed against the JDBC data view. For example, if there is a DN pattern `ou` in a JDBC object class and there are duplicate entries (say, `sales`) present in the RDBMS column mapped to JDBC attribute `ou`, then there would be duplicate nodes like `ou=sales` present in the search result.
- To resolve this issue, do the following:
1. Create an RDBMS view by taking the values from the table that contains the column mapped to `ou` JDBC attribute in such a way that there are no duplicated entries.
  2. Replace the RDBMS table name with the RDBMS view name in the JDBC object class with the DN pattern `ou`. The limitation of this approach is that since RDBMS views are read-only, no values for the JDBC attribute `ou` could be added through Directory Proxy Server.
- 6565893 The `idsktune` command does not support SuSE Enterprise Linux.
- 6573439 In the More View Options of an instance, the date shown under the Access Logs, Error Logs, and Audit Logs tabs is not localized.
- 6581469 The string `err=` is not translated in some of the Korean and Simplified Chinese messages.
- 6588319 In DSCC configured using Tomcat server, the title of the Help and Version pop-up windows displays the multi-byte strings garbled.

- 6590460 On Solaris 9 x86, the string owner in the output of the `dpadm show-cert dps-instance-path` command is not translated in Simplified Chinese and Traditional Chinese.
- 6592543 The pop-up windows prompting the confirmation for stopping or unregistering servers display the doubled apostrophes in the French locale.

# Identity Synchronization for Windows Bugs Fixed and Known Problems

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This chapter contains important, product-specific information available at the time of release of Identity Synchronization for Windows.

This chapter includes the following sections:

- [“Bugs Fixed in Identity Synchronization for Windows” on page 59](#)
- [“Known Problems and Limitations in Identity Synchronization for Windows” on page 61](#)

## Bugs Fixed in Identity Synchronization for Windows

This section lists the bugs fixed since the last release of Identity Synchronization for Windows.

- |         |                                                                                                                                                                                                                                                                                                                                       |
|---------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| 6203357 | Identity Synchronization for Windows must support Group Synchronization between Active Directory and Directory Server.                                                                                                                                                                                                                |
| 6255331 | If the LDAP database is configured with subsuffix chaining, Identity Synchronization for Windows cannot be used to modify records of the chained database. Users can only create and delete entries in the chained database. All the operations, including creation, deletion, and update, are possible if the plug-in is not loaded. |
| 6306868 | The secondary failover server in a failover setup must have o=Net scapeRoot DIT to configure the server.                                                                                                                                                                                                                              |
| 6308208 | The command <code>prepds</code> throws errors for multiple hosts options in a multi-master replication setup. As a result, users cannot perform the multi-master replication setup.                                                                                                                                                   |
| 6312235 | Information on Linux is missing in the list of supported platforms in the TO DO list when installing Identity Synchronization for Windows.                                                                                                                                                                                            |
| 6331112 | Account lockout and activation synchronization is not performed with the new password policy attributes.                                                                                                                                                                                                                              |

- 6332185 Group Type mapping for synchronization between Active Directory and Directory Server should be implemented.
- 6332186 Identity Synchronization for Windows does not properly map user name attributes for groups.
- 6332189 Identity Synchronization for Windows does not check if the Group and Group members belong the same SUL.
- 6332300 Identity Synchronization for Windows fails to synchronize the user Creation, Modification, and Deletion from Secondary Masters to Windows Active Directory, when the Primary Master is down.
- 6332912 Identity Synchronization for Windows does not synchronize the user creation, modification, or deletion from Directory Server to Active Directory. The issue occurs when the primary and the Nth secondary, in a list of secondary hosts, are down.
- 6333957 Administration user created by Identity Synchronization for Windows is redundant as the administration user is no longer used. Creation of `uid=admin` user should be removed.
- 6333958 Identity Synchronization for Windows throws errors on clicking the Directory Information Tree to access the Directory Server console.
- 6334706 Identity Synchronization for Windows installer prompts for restart of Directory Server even when the configure Directory Server plug-in option is not selected.
- 6337005 The command line usage for Identity Synchronization for Windows erroneously references link users in the command line usage.
- 6339416 Uninstall program should prompt the user to uninstall Administration Server manually.
- 6339420 Administration Server is not listed in the list of components that are installed by the Identity Synchronization for Windows installer.
- 6388815 Active Directory connectors and Directory Server connectors crash when an attempt is made to synchronize nested groups as such synchronization is not currently supported.
- 6563860 On Linux, the administration server configuration fails and the administration server does not start after installation along with Identity Synchronization for Windows.
- 6574937 On Linux, running the `resync` command in SSL mode between Directory Server and Active Directory sources fails.

## Known Problems and Limitations in Identity Synchronization for Windows

This section lists known problems and limitations at the time of release.

### Identity Synchronization for Windows Limitations

This section lists product limitations. Limitations are not always associated with a change request number.

Identity Synchronization for Windows requires `sun-sasl-2.19-4.i386.rpm` to install successfully.

On Linux, before installing Identity Synchronization for Windows, make sure that the `sun-sasl-2.19-4.i386.rpm` package is installed on your system. Otherwise the Identity Synchronization for Windows installation would fail. You can get the SASL package from the shared components of the JES 5 distribution or later.

Do not change file permissions by hand.

Changes to file permissions for installed Directory Server Enterprise Edition product files can in some cases prevent the software from operating properly.

To workaround this limitation, install products as a user having appropriate user and group permissions.

No failover for the Identity Synchronization for Windows core service.

If you loose the system where Identity Synchronization for Windows core services are installed, you need to install it again. There is no failover for the Identity Synchronization for Windows core service.

Take a backup of `ou=services` (configuration branch of Identity Synchronization for Windows DIT) in LDIF format and use this information while reinstalling Identity Synchronization for Windows.

Change in authentication behavior on Windows 2003 SP1.

When you install Windows 2003 SP1, by default users are allowed one hour to access their accounts using their old passwords.

As a result, when users change their passwords on Active Directory, the on-demand sync attribute `dspswvaldate` is set to true, and the old password can be used to authenticate against Directory Server. The password synchronized on Directory Server is then the prior, old password, rather than the current Active Directory password.

See the [Microsoft Windows support documentation \(http://support.microsoft.com/?kbid=906305\)](http://support.microsoft.com/?kbid=906305) for details on how to turn off this functionality.

Remove `serverroot.conf` before you remove Administration Server

To successfully uninstall Administration Server, remove `/etc/mps/admin/v5.2/shared/config/serverroot.conf` before you remove the Administration Server package.

## Performing Data Recovery When System or Application Fails

After hardware or application failure, you might have to restore the data from backup in some of the synchronized directory sources.

After completing the data recovery, however, you must perform an additional procedure to ensure that the synchronization can proceed normally.

The connectors generally maintain information about the last change that was propagated to the message queue.

This information, which is called the connector state, is used to determine the subsequent change that the connector has to read from its directory source. If the database of a synchronized directory source is restored from a backup, then the connector state might no longer be valid.

Windows-based connectors for Active Directory and for Windows NT also maintain an internal database. The database is a copy of the synchronized data source. The database is used to determine what has changed in the connected data source. The internal database is no longer valid once the connected Windows source is restored from a backup.

In general, the `idsync resync` command can be used to repopulate the recovered data source.

---

**Note** – Resynchronization cannot be used to synchronize passwords with one exception. The `-i ALL_USERS` option can be used to invalidate passwords in Directory Server. This works if the resynchronization data source is Windows. The SUL list must also include only Active Directory systems.

---

Use of the `idsync resync` command, however, might not be an acceptable option in every situation.



**Caution** – Before executing any of the steps detailed that follow, make sure that synchronization is stopped.

---

## Bidirectional Synchronization

Use the `idsync resync` command with the appropriate modifier settings, according to the synchronization settings. Use the recovered directory source as the target of the `resync` operation.

## Unidirectional Synchronization

If recovered data source is a synchronization destination, then the same procedure can be followed as for bidirectional synchronization.

If recovered data source is a synchronization source, then `idsync resync` can still be used to repopulate the recovered directory source. You need not change the synchronization flow settings in the Identity Synchronization for Windows configuration. The `idsync resync` command allows you to set synchronization flow independent of the configured flows with the `-o Windows | Sun` option.

Consider the following scenario as an example.

Bidirectional synchronization is setup between Directory Server and Active Directory.

- The database of a Microsoft Active Directory server has to be recovered from a backup.
- In Identity Synchronization for Windows, this Active Directory Source is configured for the SUL AD.
- Bidirectional synchronization for modifies, creates and deletes is setup between this Active Directory Source and a Sun Directory Server Source.

## ▼ To Perform Unidirectional Synchronization

### 1 Stop synchronization.

```
idsync stopsync -w - -q -
```

### 2 Resynchronize Active Directory Source. Also, resynchronize modifies, creations, and deletes.

```
idsync resync -c -x -o Sun -l AD -w - -q -
```

### 3 Restart synchronization.

```
idsync startsync -w - -q -
```

## Directory Source Specific Recovery Procedures

The following procedures correspond to specific directory sources.

### Microsoft Active Directory

If Active Directory can be restored from a backup, then follow the procedures in the sections covering either bidirectional, or unidirectional synchronization.

You might, however, have to use a different domain controller after a critical failure. In this case, follow these steps to update the configuration of the Active Directory Connector.

## ▼ To Change the Domain Controller

- 1 Start the Identity Synchronization for Windows management console.
- 2 Select the Configuration tab. Expand the Directory Sources node.
- 3 Select the appropriate Active Directory Source.

**4 Click Edit controller, and then select the new domain controller.**

Make the selected domain controller the NT PDC FSMO role owner of the domain

**5 Save the configuration.**

**6 Stop the Identity Synchronization service on the host where the Active Directory Connector is running.**

**7 Delete all the files except the directories, under *ServerRoot/isw-hostname/persist/ADPxxx*. Here, *xxx* is the number portion of the Active Directory Connector identifier.**

For example, 100 if the Active Directory Connector identifier is CNN100.

**8 Start the Identity Synchronization service on the host where the Active Directory Connector is running.**

**9 Follow the steps according to your synchronization flow in the unidirectional or the bidirectional synchronization sections.**

### Fail Over and Directory Server

Either the Retro Changelog database, or the database with synchronized users, or both can be affected by a critical failure.

## ▼ To Manage Directory Server Fail Over

**1 Retro Changelog Database.**

Changes in the Retro Changelog database might have occurred that the Directory Server connector could not process. Restoration of the Retro Changelog database only makes sense if the backup contains some unprocessed changes. Compare the most recent entry in the *ServerRoot/isw-hostname/persist/ADPxxx/accessor.state* file with the last changenumber in the backup. If the value in *accessor.state* is greater than or equal to the changenumber in the backup, do not restore the database. Instead, recreate the database.

After the Retro Changelog database is recreated, make sure that you run `idsync prepds`. Alternatively, click Prepare Directory Server from the Sun Directory Source window in the Identity Synchronization for Windows management console.

The Directory Server connector detects that the Retro Changelog database is recreated and log a warning message. You can safely ignore this message.

**2 Synchronized Database.**

If no backup is available for the synchronized database, then the Directory Server connector has to be reinstalled.



If the synchronized database can be restored from a backup, then follow the procedures in either the bidirectional or the unidirectional synchronization sections.

### Known Identity Synchronization for Windows Issues

This section lists known issues. Known issues are associated with a change request number.

4997513 On Windows 2003 systems, the flag that indicates the user must change his password at the next login is set by default. On Windows 2000 systems, the flag is not set by default.

When you create users on Windows 2000 and 2003 systems with the user must change pw at next login flag set, users are created on Directory Server with no password. The next time the users log into Active Directory, the users must change their passwords. The change invalidates their passwords on Directory Server. The change also forces on-demand synchronization the next time those users authenticate to Directory Server.

Until users change their password on Active Directory, users are not able to authenticate to Directory Server.

5077227 Problems can occur when attempting to view the Identity Synchronization for Windows console with PC Anywhere 10 with Remote Administration 2.1. PC Anywhere version 9.2 has been seen not to cause errors. If problems persist, remove the remote administration software. Alternatively, VNC can be used. VNC is not known to cause any issues when displaying the Identity Synchronization for Windows console.

5097751 If you install Identity Synchronization for Windows on a Windows system that is formatted with FAT 32 system, then no ACLs are available. Furthermore, no access restrictions are enforced for the setup. To ensure security, use only Windows NTFS system to install Identity Synchronization for Windows.

6254516 When Directory Server plug-in is configured on the consumers with command-line, the plug-in does not create a new subcomponent ID for the consumers. The plug-in configuration does not create new IDs for consumers.

6288169 The password synchronization plug-in for Identity Synchronization for Windows tries to bind to the Active Directory for accounts that have not been synchronized even before checking the account lock and passwordRetryCount.

To resolve this issue, enforce a password policy on the LDAP server. Also, configure Access Manager to use the following filter on user search:

```
(| (!(passwordRetryCount=*)) (passwordRetryCount <=2))
```

This workaround, however, throws a user not found error when too many login attempts are made over LDAP. The workaround does not block the Active Directory account.

6331956 Identity Synchronization for Windows console fails to start if o=Net scapeRoot is replicated.

6332197 Identity Synchronization for Windows throws errors when groups, with user information of users not yet created, are synchronized on Directory Server.

6336471 Identity Synchronization for Windows plug-in cannot search through chained suffixes. As a result, the modify and bind operations cannot be performed on the Directory Server instance.

6337018 Identity Synchronization for Windows should support exporting the Identity Synchronization for Windows Configuration to an XML file.

6386664 Identity Synchronization for Windows synchronizes user and group information between Active Directory and Directory Server when group synchronization feature is enabled. The synchronization should ideally happen only after issuing the resync command from the command line.

6452425 If you install Identity Synchronization for Windows on a Solaris system where the SUNwtls package version 3.11.0 is installed, the Administration Server might not launch. To resolve this, uninstall the SUNwtls package before you install Identity Synchronization for Windows.

6251334 User deletion synchronization cannot be stopped even after changing the Active Directory source. Deletion synchronization therefore continues when the Synchronized Users List has been mapped to a different organizational unit, OU, in the same Active Directory Source. The user appears to have been deleted on the Directory Server instance. The user appears as deleted even if the user is deleted from the Active Directory source which does not have a SUL mapping.

6335193 You might try to run the resynchronization command to synchronize users from Directory Server to Active Directory. The creation of the group entity fails if unsynchronized users are added to an unsynchronized group.

To resolve this issue, you should run the resync command twice for the synchronization to happen correctly.

6339444 You can specify the scope of synchronization with the Synchronization Users List using the Browse button on the Base DN pane. When you specify the scope, the subsuffixes are not retrieved.

To work around this issue, add ACIs to permit anonymous access for reads and searches.

6379804 This error occurs during upgrade of core components of Identity Synchronization for Windows to version 1.1 SP1 on Windows systems. The `updateCore.bat` file contains hard coded incorrect reference to Administration Server. As a result, the upgrade process does not completely successfully.

To resolve this problem, users need to replace two instances of references to Administration Server from the upgrade script.

Replace the following instructions on lines 51 and 95 of the upgrade script. Change lines as follows.

```
net stop "Sun Java(TM) System Administration Server 5.2"
```

Instead, the lines should read as follows:

```
net stop admin52-serv
```

After making the specified changes, rerun the upgrade script.

6388872 For Windows Creation Expressions in a Directory Server to Active Directory, the flow `cn=%cn%` works both for users and groups. For every other combination, Identity Synchronization for Windows throws errors during synchronization.

6332183 Consider a scenario where a user, `dn: user1, ou=isw_data`, is added to an existing group, `dn: DSGroup1, ou=isw_data`. When the user is deleted from the group, that is, a Delete operation is performed, the `uniquemember` of the group gets modified. Imagine the same user is added to the group that has the same DN. For `userdn: user1, ou=isw_data`, an Add operation is performed.

Identity Synchronization for Windows might log exceptions stating that the user already exists, if the Add action flows from Directory Server to the Active Directory before the Delete can. A race condition might occur where the add operation is performed before the delete operation during synchronization, thus cause Active Directory to log an exception.

6444341 The Identity Synchronization for Windows uninstallation program is not localized. `WPSyncResources_X.properties` files fail to be installed in the `/opt/sun/isw/locale/resources` directory.

To work around this issue, copy the missing `WPSyncResources_X.properties` files from the `installer/locale/resources` directory by hand.

6444878 Install and set up Java Development Kit version 1.5.0\_06 before running Administration Server.

6444896 When performing a text-based installation of Identity Synchronization for Windows, leaving the administrator password empty and typing return causes the installation program to exit.

- 6452538 On Windows platforms, Message Queue 3.5 used by Identity Synchronization for Windows requires a PATH value less than 1 kilobyte in length. Longer values are truncated.
- 6486505 On Windows, Identity Synchronization for Windows supports only English and Japanese locales.
- 6477567 In Directory Server Enterprise Edition 6.2, the Directory Server plug-in for Identity Synchronization for Windows is installed with Directory Server installation. The Identity Synchronization for Windows installer does not install the Directory Server plug-in. Instead Identity Synchronization for Windows only configures the plug-in.
- In this release of Identity Synchronization for Windows, the text-based installer does not prompt you to configure the Directory Server plug-in for Identity Synchronization for Windows during the installation process. As a workaround, run the `Idsync dspuginconfig` command in the terminal window after the Identity Synchronization for Windows installation is completed.
- 6472296 After installation in the Japanese locale on Windows systems, Identity Synchronization for Windows user interfaces are not fully localized.
- To work around this issue, include `unzip.exe` in the PATH environment variable before starting the installation.
- 6485333 The installer and uninstaller on Windows systems are not internationalized.
- 6492125 The Identity Synchronization for Windows online help contents displays square boxes instead of multi-byte characters for CCK locales.
- 6501874 Account lockout synchronization fails from Directory Server to Active Directory when Directory Server password compatibility mode, `pwd-compat-mode`, is set to `DS6-migration-mode`, or `DS6-mode`.
- 6501886 When the Active Directory domain administrator password changes, the Identity Synchronization for Windows Console has been seen to show a warning. The warning shown is `Invalid credentials for Host-hostname.domainname`, even when the password used is valid.
- 6529349 On Solaris SPARC, Identity Synchronization for Windows might not uninstall due to the absence of the `/usr/share/lib/mps/jss4.jar` file. It happens only during the installation of the product, when the installer detects the already installed instance of the `SUNWjss` package and does not update it.
- As a workaround, while installing the product, add `/usr/share/lib/mps/secv1/jss4.jar` in the Java class path.

```
$JAVA_EXEC -Djava.library.path=./lib \
-classpath "${SUNWjss}/usr/share/lib/mps/secv1/jss4.jar:\
${SUNWjss}/usr/share/lib/mps/jss4.jar:\
${SUNWxrcsj}/sfw/share/lib/xerces-200.jar:./lib/installsdk.jar:\
./lib/ldap.jar:./lib/webstart.jar:\
${SUNWiqic}/usr/share/lib/jms.jar:./lib/install.jar:\
./resources:./locale/resources:./lib/common.jar:\
./lib/registry.jar:./lib/ldapjdk.jar:./installer/registry/resources" \
-Djava.util.logging.config.file=./resources/Log.properties \
-Djava.util.logging.config.file=./resources/Log.properties \
-Dcom.sun.directory.wps.logging.redirectStderr=false \
-Dcom.sun.directory.wps.logging.redirectStdout=false \
uninstall_ISW_Installer $1
```

- 6572575 For the group synchronization to work successfully during resync, both the user and group should reside at the same level in the synchronization scope. Otherwise, it displays an error.



# Directory Editor Bugs Fixed and Known Problems

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This chapter contains important, product-specific information available at the time of release of Directory Editor.

This chapter includes the following sections:

- [“Bugs Fixed in Directory Editor” on page 71](#)
- [“Known Problems and Limitations in Directory Editor” on page 71](#)

## Bugs Fixed in Directory Editor

This section lists the bugs fixed since the last release of Directory Editor.

- |         |                                                                                                                                                               |
|---------|---------------------------------------------------------------------------------------------------------------------------------------------------------------|
| 6319791 | Cannot access Application Server administration console after login to Directory Editor.                                                                      |
| 6404788 | When you remove browse capabilities from the default user role, users can no longer change their directory information.                                       |
| 6421100 | Directory Editor does not properly handle entries containing the ampersand character, &.                                                                      |
| 6433198 | Directory Editor does not allow you to add members to a group that has a name containing an ampersand character, &, an equals sign, =, or a question mark, ?. |
| 6444426 | A basic search fails to account for the filter criteria. Instead, the search returns all entries in the managed directory that match the chosen type.         |
| 6444329 | Directory Editor does not allow you to login with a multi-byte user ID.                                                                                       |
| 6460611 | Directory Editor does not allow you to use a configuration suffix with a multi-byte DN as the configuration suffix.                                           |

## Known Problems and Limitations in Directory Editor

This section lists known problems and limitations at the time of release.

## Directory Editor Limitations

This section lists product limitations. Limitations are not always associated with a change request number.

The following configuration requirements exist for using Directory Editor through Directory Proxy Server.

When configuring Directory Editor to access data through Directory Proxy Server, you must observe the following constraints.

- The Directory Editor configuration directory must be an instance of Directory Server, not Directory Proxy Server.

You specify the Directory Editor configuration directory when initially configuring Directory Editor through the Startup Properties page. The configuration directory must contain the entry with Bind DN and Password you provide in the Startup Properties page. The configuration directory must also already have the Configuration Suffix whose DN you select in the drop down list of the Startup Properties page.

- All Directory Proxy Server instances through which you access data using Directory Editor must be configured with a data view to allow access to search the directory schema. Schema are stored under `cn=schema` for Directory Server.

For example, the following command configures a schema view into the Directory Server instances in My Pool.

```
$ dpconf create-ldap-data-view -h localhost -p 1390 "schema view" \
 "My Pool" cn=schema
Enter "cn=Proxy Manager" password:
$
```

- All Directory Proxy Server instances through which you access data using Directory Editor must be configured to provide access through to the data sources. In particular, the Directory Proxy Server instances must have data views configured to allow the users logging in to Directory Editor at least to bind to the Directory Server data sources.

For example, the following command configures Directory Proxy Server to allow all LDAP operations through to the attached data source, My DS in My Pool.

```
$ dpconf set-attached-ldap-data-source-prop -h localhost -p 1390 \
 "My Pool" "My DS" add-weight:1 bind-weight:1 compare-weight:1 delete-weight:1 \
 modify-dn-weight:1 modify-weight:1 search-weight:1
Enter "cn=Proxy Manager" password:
$
```

## Known Directory Editor Issues

This section lists known issues. Known issues are associated with a change request number.



- 6257547 Directory Editor displays a configurable number of results for a search, with the default being 25. If a search returns more entries than the maximum number to display, refine the search to return fewer results.
- 6258793 When deploying on Sun Java Enterprise System Application Server 8, an error file is written. Also, login fails.

To work around this issue, ensure the following grant statement is included in the `Server.policy` file:

```
grant codeBase "file:${de.home}/-" {
 permission javax.security.auth.AuthPermission "getLoginConfiguration";
 permission javax.security.auth.AuthPermission "setLoginConfiguration";
 permission javax.security.auth.AuthPermission "createLoginContext.SunDirectoryLogin";
 permission javax.security.auth.AuthPermission "modifyPrincipals";
 permission java.lang.RuntimePermission "createClassLoader";
};
```

Use the grant statement shown here. The grant statement shown in *Sun Java System Directory Editor 1 2005Q1 Installation and Configuration Guide* is incorrect.

- 6397929 When deploying on Tomcat 5.5, login fails due to a missing JAAS configuration file.

To work around this issue, first create `tomcat-install-path/bin/setenv.sh` containing the following line:

```
JAVA_OPTS="-Djava.security.auth.login.config=$CATALINA_HOME/conf/jaas.conf"
```

Next create `tomcat-install-path/conf/jaas.conf`. Edit the file to contain the following lines:

```
SunDirectoryLogin {
 com.sun.dml.auth.SunDirectoryLoginModule required;
};
```

- 6436199 Directory Editor does not retain changes made to the Default User Form, Create. The issue occurs when the application container, where Directory Editor runs, is restarted before the changes have been validated.

To work around this limitation, do not restart the application container after restoring the configuration. Instead login, validate the Managed Directory setup under the Configure tab, save, and login again.

- 6441350 An application error appears after you save and continue beyond the startup page when running Directory Editor on Application Server in a locale other than English.

To work around this issue, start Application Server in the English locale on UNIX systems. On Windows systems, try restarting Application Server several times.

- 6456576 When you click the Help button in Directory Editor deployed in Application Server, the wrong help content is displayed.

To work around this issue, edit WEB-INF/sun-web.xml to correspond to the following, and then restart Application Server.

```
<?xml version="1.0" encoding="UTF-8"?>
<!DOCTYPE sun-web-app PUBLIC "-//Sun Microsystems, Inc.//DTD
Sun ONE Application Server 7.0 Servlet 2.3//EN"
"http://www.sun.com/software/sunone/appserver/dtds/sun-web-app_2_3-0.dtd">
<sun-web-app>
 <description>tomcat-test</description>
 <class-loader delegate="false"/>
</sun-web-app>
```

- 6480803 When deployed in Application Server running in a locale other than English, Directory Editor does not render English for en or en\_US browser settings.

To work around this issue, issue the following commands.

```
cd /var/opt/SUNWappserver/domains/domain1/applications/j2ee-modules/de/config
cp DMLMessages.properties DMLMessages_en.properties DMLMessages_en_US.properties
```

- 6487652 When logged in as a user having multi-byte characters in the user ID, you cannot edit your directory information. When you click Edit My Directory Information, you are presented with a blank page.

- 6488644 When you login to Directory Editor running in a locale other than English as a generic user, the Home and Change My Directory Password pages are not localized.

- 6489725 When you install Directory Editor in a locale other than English on Apache Tomcat on Windows, error pages are shown during configuration, save, and refresh operations.

- 6490590 When you install Directory Editor in a locale other than English, installer labels are not displayed properly.

To work around this issue, change to the English locale on UNIX systems before running the installer. On Windows systems, switch the locale to English using Control Panel > Regional Options before running the installer.

- 6492259 When accessing Directory Editor through Internet Explorer 6 running in the Spanish locale, garbage characters appear in the online help.

6493975      Directory Editor does not allow you to view multiple suffixes through the same instance.

To work around this issue, install additional instances of Directory Editor either in additional application servers or in separate domains on the same application server.



# Directory Server Resource Kit Bugs Fixed and Known Problems

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This chapter contains important, product-specific information available at the time of release of Directory Server Resource Kit.

This chapter includes the following sections:

- [“About Directory Server Resource Kit” on page 77](#)
- [“Bugs Fixed in Directory Server Resource Kit” on page 79](#)
- [“Known Problems and Limitations in Directory Server Resource Kit” on page 79](#)

## About Directory Server Resource Kit

This section provides an overview of Directory Server Resource Kit components.

Directory Server Resource Kit gives you tools for working with directory services in the laboratory, during deployment, and in the data center.

### Directory Subtree Deletion

Use the `ldapsubtree(1)` tool to delete an entire directory subtree over LDAP with one command.

### DSML v2 Access

Use the following tools to test directory access through DSML v2 when designing, developing, and testing web applications:

- The `dsmlmodify(1)` command to add, delete, modify, rename, and move entries
- The `dsmlsearch(1)` command to find and read entries

### LDAP Performance Measurements

Use the following tools to measure bind, read, and write performance when accessing the directory over LDAP:

- The `authrate(1)` command to measure LDAP bind performance
- The `modrate(1)` command to measure LDAP write performance

- The `searchrate(1)` command to measure LDAP read performance

#### LDIF Generation and Transformation

Use the following tools to generate sample LDIF for sizing and tuning. Use the tools also to transform, sort, and filter LDIF for interoperability:

- The `ldifxform(1)` command to transform, sort, and filter LDIF
- The `makeldif(1)` command to generate sample LDIF

#### Service Tuning

Use the `logconv(1)` command to examine how clients use directory services and to generate recommendations for indexing.

You can decide to set up and run Directory Server Resource Kit tools on the same system as your directory server, or on another system. The decision depends on your work environment. The decision also depends on the stage of deployment you have reached. The following questions and answers help you decide where to use Directory Server Resource Kit.

**Question:** Are you working to evaluate or to demonstrate directory technology prior to developing directory services?

**Answer:** For convenience, install and use Directory Server Resource Kit on the same system as your directory.

**Question:** Are you working to develop directory client applications or plug-ins?

**Answer:** For convenience, install and use Directory Server Resource Kit on the same system as your directory.

**Question:** Are you working to test directory performance characteristics?

**Answer:** The only command that you must run on the system that provides directory services is the `idsktune` command, which generates system-specific tuning recommendations.

**Answer:** Avoid perturbing the system that you measure by installing Directory Server Resource Kit and running commands, except for `idsktune`, on other systems.

Get accurate directory performance measurements by running clients such as `authrate`, `modrate`, and `searchrate` on separate systems. You can improve accuracy by carefully controlling the processes that run on the system you measure. You can also improve accuracy by controlling the sample data that you store in the directory. You can generate controlled data with `makeldif`.

**Question:** Have you already deployed your directory into the data center?

**Answer:** Avoid perturbing the deployed system by installing Directory Server Resource Kit and running commands on other systems.

Run analysis with `logconv`, LDIF conversions with `ldifxform`, and other operations from other systems as well.

## Bugs Fixed in Directory Server Resource Kit

This section lists the bugs fixed since the last release of Directory Server Resource Kit.

- 4536646     The `searchrate` command should have an option to specify a timeout.
- 4994437     Fix usage for `authrate`.
- 5005829     Fix usage for `searchrate`.
- 5005834     Fix usage for `modrate`.
- 5009664     The `ldifxform` command does not properly convert when used with `to=cs`.
- 5034829     The `ldapsubtdel` command should allow a password to be read from a file.
- 5082075     The `authrate` command should signal bind errors.
- 5082493     The `dsmsearch` command should handle LDAP filter string syntax.
- 5083049     Fix usage for `dsmmodify`.
- 5083952     The `ldifxform` command crashes on Windows systems when using the `-cto=ascii` option.
- 5084253     The `logconv -d` option generates a divide by zero error.

## Known Problems and Limitations in Directory Server Resource Kit

This section lists known problems and limitations at the time of release.

- 5081543     `searchrate` crashes on Windows systems when using multiple threads.
- 5081546     `modrate` crashes on Windows systems when using multiple threads.
- 5081549     `authrate` crashes on Windows systems when using multiple threads.
- 5082507     The `dsmsearch` command `-D` option takes an HTTP user ID rather than a bind DN.  
  
To work around this issue, provide the user ID that is mapped to a DN in Directory Server.
- 6379087     NameFinder has been seen to fail to deploy in Application Server on Windows systems.
- 6393554     NameFinder has been seen to throw a page not found error after deployment.  
  
To work around this issue, rename `nsDSRK/nf` to `nsDSRK/NF`.
- 6393586     Cannot add more than two users to My Selections list in NameFinder.
- 6393596     NameFinder search should fetch entries for values other than Last Name, First Name, Email, and Given Name.

- 6393599 NameFinder search should allow searches for groups.
- 6576045 Killing modrate and searchrate launcher does not kill actual modrate and searchrate processes respectively.