Novell Linux* Small Business Suite

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PRODUCT GUIDE

March 11, 2005



Novell®

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About This Guide

As part of the open source movement, many enterprises and small businesses are looking to Linux as a key platform for their business systems. Novell[®] Linux Small Business Suite (NLSBS) brings to the Linux platform all the network services you need to enable and manage the your small business network.

This guide will help you understand, set up, manage, and use the products and rich features included in Novell Linux Small Business Suite 9.

For information on the features and benefits of NLSBS, see Chapter 1, "Overview," on page 9.

For information on setting up and configuring the server environment, see Chapter 2, "Installing Novell Linux Small Business Server," on page 15.

For information on managing e-mail and other collaboration services, see Chapter 3, "E-Mail and Instant Messaging," on page 25.

For information on setting up printing for network users, see Chapter 4, "Network Printing," on page 49.

For information on publishing documents to the Web, see Chapter 5, "Web Server Publishing," on page 53.

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In this documentation, a greater-than symbol (>) is used to separate actions within a step and items within a cross-reference path.

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When a single pathname can be written with a backslash for some platforms, or a forward slash for other platforms, the pathname is presented with a forward slash to reflect the Linux convention. Users of platforms that require a backslash, such as NetWare[®], should use backslashes as required by the software.

Overview

As a small business owner, you need to get the job done and keep your business running. Technology can improve your business processes and save you time and money, but you do not have unlimited IT resources, employees, and time.

With Novell[®] Linux Small Business Suite (NLSBS), you can have confidence that your data is secure, your employees are communicating effectively, and your customers are being served with the best networking technologies in the market.

Designed to deliver complete, reliable networking solutions tailored for your needs, this suite of products provides many features traditionally available only in large enterprises but without all the complexity. NLSBS delivers real value to small businesses with a small network of up to 100 workstations.

Features and Benefits

Novell Linux Small Business Suite is a network server environment that provides market-leading tools and technologies to help you and your employees be more productive and efficient. Setting up the suite delivers secure e-mail, shared scheduling, secure data storage, easy and reliable printing, Web server publishing, and much more.

The following table summarizes just a few of the main features available in NLSBS.

Table 1 Features and Benefits

Feature	Benefit
Novell Linux Small Business Server	Reliable and secure network operating system with powerful tools for network administrators.
GroupWise® post office	A powerful server environment providing e-mail and other collaboration services.
GroupWise WebAccess	Desktop software that allows access to e-mail over the Internet with a Web browser.
GroupWise client software	Desktop software that includes e-mail, calendaring, and task management for Linux, Windows*, and Macintosh* workstations.
GroupWise Messenger	Desktop software that provides instant messaging capability for Linux, Windows, and Macintosh workstations.

Feature	Benefit
Apache HTTP Server	Web server software that stores and provides HTML documents to users on the Internet or intranet using a Web browser.
Samba	Server services that provide network access to Windows and other CIFS/SMB client workstations.
Common UNIX Printing System	A printing environment that lets users print to printers on the network.
Novell eDirectory [™]	A network directory that organizes network resources to simplify network administration.
Novell iManager and ConsoleOne®	Linux, Windows, and browser-based software, used to manage the directory and network resources.
Novell Red Carpet®	Administrative and desktop program to keep your server and desktop updated with the latest software programs and patches.

Novell Linux Small Business Server

At the heart of the NLSBS is the server running Novell SUSE[®] Linux Enterprise Server (SLES) operating system. The SLES operating system is the same fast, reliable server platform used for enterprise-level networks, but customized in NLSBS to meet the needs of companies with smaller networks.

The server manages the network traffic and provides connectivity to workstations using technologies such as Internet Protocol (IP), Domain Name Service (DNS), Dynamic Host Core Protocol (DHCP), and Novell eDirectory. You can run all your business applications and services on a single server or you can dedicate it to provide just a few services, such as Internet connectivity with a firewall, a file server where users can store files, or a collaboration server to provide e-mail and instant messaging services. However you choose to configure the Novell Linux Small Business Server, it has the horsepower to handle your network needs.

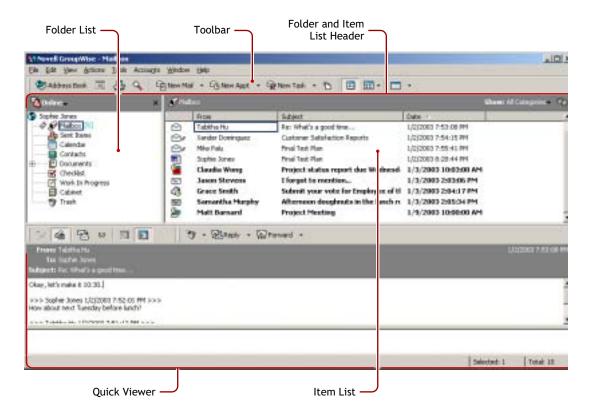
NLSBS includes several utilities and applications to help you manage network resources. Novell eDirectory, a network directory service which lets administrators organize network objects into a directory or tree, simplifies management of network resources and streamlines the user login experience. Novell iManager and ConsoleOne are two important utilities you can use to manage Novell eDirectory.

Because the Novell Linux Small Business Server runs on Linux, you can use open source technologies and solutions to help you keep down the cost ownership. You can realize significant benefits associated with software such as Apache, MySQL*, Perl, Common UNIX Printing System (CUPS), and Tomcat, which are all included as part of the NLSBS.

Novell GroupWise and Messenger

Novell GroupWise and Messenger deliver powerful tools for administrators and easy-to-use interfaces for end users. Network end users can use these collaboration programs to organize their work and improve communication with others. GroupWise and Messenger provide the following benefits to end users running on Linux, Windows, or Macintosh workstations.

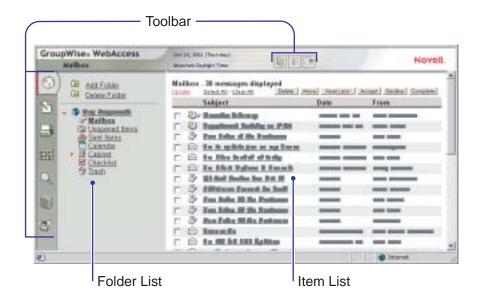
GroupWise: Send and receive e-mail, schedule appointments, track contacts, monitor tasks, and manage documents and files.



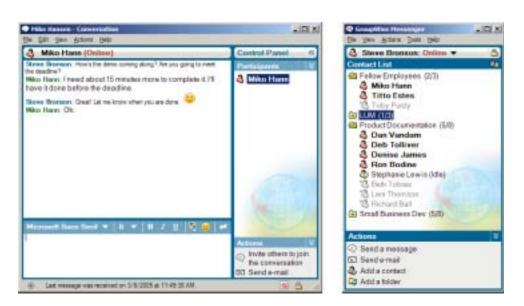
- E-mail and other messages: A mail message is for general correspondence. A phone message is designed for those who take phone messages for others. A reminder includes a start date and, when accepted by the recipient, is posted to the receipient's calendar.
- Appointments and tasks: When you schedule an appointment, you can search other users'
 calendars to find free times for the appointment. When you schedule a task, you can assign a
 priority and due date to the task. If the recipient accepts an appointment or task, it is
 automatically added to his calendar.
 - Of course, you have options to view and manage your own appointments, tasks, and reminder notes in several different ways. You can accept or decline the tasks you are sent, and track accepted tasks through to completion. You can categorize and prioritize your tasks by using the Checklist feature.
- Contacts: Manage information for your contacts, groups, resources, and organizations, including being able to view, update, delete, and add information to the contacts in your address book. In addition, you can view a history of messages sent to and received from individual contacts.

• Documents and files: Store documents, graphics, presentations, and other files in GroupWise. You can store them in folders or attach them to appointments, tasks, or e-mail messages. The files are compressed to save disk space and encrypted to maintain security.

GroupWise WebAccess: Endusers can use a Web or network browser on any computer to access their GroupWise e-mail, schedules, tasks, and contacts over the Internet. This easy-to-use user interface lets users at home, in the office, or on the road organize their work and communicate with others.



Novell Messenger. Communicate instantly, in real time, with other users on the network. Messenger lets you know when other users are online, busy, or away from their desks. It also allows you to save conversations to a file.



The infrastructure for these collaboration services is delivered through a GroupWise post office and software programs (called *agents*) running on the Small Business Server. This powerful and secure infrastructure provides the service level and capability demanded by end users while reducing the cost of ownership for system administrators.

Workstation Connectivity

Novell Linux Small Business Suite lets users log in, communicate, and share files on the network using Linux, Macintosh, and Windows workstations.

Linux workstations can use native commands and desktops to access the network. The Novell Linux Desktop (NLD) is included in the NLSBS. The NLD is a desktop operating system and suite of office software that enables businesses to use Linux and open source with confidence. It includes Novell editions of OpenOffice.org (the leading open source office productivity suite), Novell Evolution (the most popular open source collaboration client), Mozilla* Firefox* (a secure, feature-rich

Web browser), and Red Carpet (update services for adding patches and additional software). NLD is included as part of the NLSBS. Of course, Novell Linux Small Business Server works with other Linux desktops too.

Windows workstations: When properly configured with Samba, the Novell Linux Small Business Server provides network services to Windows and other Common Internet File Service (CIFS) workstations. Without installing additional software, Windows users can access network files and folders through familiar Windows venues such as My Network Places and My Computer.

What's Next

Now that ou have an understanding of Novell Linux Small Business Suite, you can install and set up the software. Continue with Chapter 2, "Installing Novell Linux Small Business Server," on page 15.

2

Installing Novell Linux Small Business Server

The Novell[®] Linux Small Business Server is the heart of the network. It is based on the Novell SUSE[®] LINUX Enterprise Server (SLES) platform. Using auto-detection, preselected configuration choices and wizards, the installation program and this chapter guide you through the steps to install the server and configure it for your business needs.

To install the server operating system and configure the network environment for the Novell suite of products, you must complete the following tasks in the following order.

- 1. Meet system requirements.
- 2. Install the server operating system.
- 3. Set up Red Carpet[®] automatic updates.
- 4. Set up Novell eDirectory™.
- 5. Set up GroupWise® e-mail and Messenger.
- 6. Set up iManager.

There are many different options for installing the server operating system. This chapter explains how to set up a basic one-server, one-tree network environment.

NOTE: For information on installing other server/network configurations and about problems you might encounter during the server installation, see the *SUSE LINUX Enterprise Server 9 Administration and Installation Guide* (http://www.novell.com/documentation/sles9/pdfdoc/sles_9_admin_guide/sles_9_admin_guide.pdf).

After installing the server operating system and configuring the initial services on the server, you can provide network services, such as Web servers and network printers. For more information on setting up and managing available network services, see the other chapters in this book.

Meeting System Requirements

Before you start the server installation, make sure the computer meets the system requirements and you have the necessary information in the following table.

Table 2 System Requirements and Descriptions

Requirement	Description
Computer (minimum requirements)	Pentium* II processor, 512 MB of RAM, 10 GB disk space, and CD-ROM drive.
Computer (recommended requirements)	Pentium 4 1.5 GHz processor, 1 GB of RAM, 20 GB disk space, and CD-ROM drive. Additional space might be required depending on the software components installed and specific data storage needs.

Requirement	Description
Static IP address	An externally visible, static IP address must be specified for at least one network card in the Small Business Server. You can get IP addresses from your Internet Service Provider (ISP).
	Novell eDirectory and GroupWise require a static IP address, and will not work properly if the network card is configured with DHCP.
Domain names	At least one domain name must be registered with your DNS provider. You can set up the same or different DNS names for other services such as host and e-mail. You can get domain names from your ISP.
	IMPORTANT: The domain name used for e-mail addresses needs a DNS record of type MX (mail exchange) that identifies this server as your mail server and a DNS record of type A (address) that resolves to this server's public IP address. You can set up GroupWise and Messenger for internal use before your Internet connection has been activated by your ISP.
Internet connection	The computer must be properly connected to the Internet to configure and use Internet services, such as e-mail and external Web publishing.
Network time source (recommended)	Specifying and linking to an external time source is recommended to provide accurate time to all devices on the network. The source can be on the internal network or on the Internet, but it must use Network Time Protocol (NTP).
	Contact your ISP for the address or domain name of an NTP server or see a list of public NTP servers at NTP.Servers Web (http://ntp.isc.org/bin/view/Servers/WebHome).

During the installation, installed devices and connected peripherals are auto-detected. Before you begin, verify that network cards, graphics cards, sound cards, and other internal devices are installed and that printers, backup devices, and other peripherals are attached. Also, make sure the computer hardware is properly attached to the network and Internet.

Installing the Server Operating System

The installation program guides you through the following tasks required to install and configure the server:

- 1. Begin the installation.
- 2. Specify language and installation settings.
- 3. Configure the server.

For information on installing other server/network configurations and about problems you might encounter during the server installation, see the *SUSE Linux Enterprise Server 9 Administration and Installation Guide* (http://www.novell.com/documentation/sles9/pdfdoc/sles_9_admin_guide/sles_9_admin_guide.pdf).

Beginning the Installation

- **1** Insert *Novell Linux Small Business Suite CD 1* into the CD-ROM drive.
- **2** Boot the computer from the CD-ROM drive.
- **3** Use the arrow keys to select Installation.

Figure 1 The Boot screen



4 Use the arrow keys to highlight Installation, then press Enter to begin the installation.

Throughout the installation, use the keyboard or mouse to supply the required information, then click the appropriate button to proceed to the next screen. When the installation begins, you are prompted to specify language and installation settings.

Specifying Language and Installation Settings

The installation program uses a Linux program named YaST (Yet another Setup Tool) to guide you through the steps to install and configure the server. Novell Linux Small Business Suite 9 has already preloaded the installation program with optimal server settings for your business environment.

In this section of the installation program, you are prompted to select the language and keyboard settings to use for the rest of the installation program. You are also asked to specify or verify settings such as how disk partitions should be created and which software programs should be installed.

- **1** When prompted, select the language you want to use during the installation program.
- 2 Click New Installation.
- **3** Review the Installation Settings to verify they are correct. To change settings, click Change.

IMPORTANT: Do not change the Sofware setting to anything other than Novell Linux Small Business Suite 9. This selection installs a mix of software designed specifically for this initial installation program. Other Software selections (such as Minimum System, Minimum Graphical System, Full Installation, and

Default System) are designed for installations in other environments. Of course, if you need to, you can remove or install additional software programs after the initial server installation is complete.

- 4 After verifying all settings, click Accept.
- **5** Insert the CDs as prompted by the installation program.

The installation program creates disk partitions, copies program files and selected software packages to the server, and sets up the computer as specified. After completing the steps in this section, you are prompted to configure the server.

Configuring the Server

The steps to set up the server require you to set up the root user, configure network settings and services, and choose the authentication method for users on your system.

1 Enter a password for the root user.

The root user, sometimes referred to as System Administrator or Superuser, is an account with access to everything on the system.

2 Configure the network settings.

IMPORTANT: NLSBS products (such as Novell GroupWise and eDirectory) require the network card to be configured with its own static IP address instead of using DHCP to obtain an IP address.

To configure the network interface card, click Change > Network Interfaces, then follow the screen instructions to specify the IP address, subnet mask address, hostname, domain name, name server addresses, domain search server addresses, and the address of the default gateway.

TIP: Contact your ISP for information required to configure your network interface card.

3 Test the Internet connection.

This step verifies that network configuration settings are properly specified. If the Internet test connection fails, go back and check the settings in Network Configuration.

4 Configure network services.

NLSBS provides a network service known as the Certificate Authority (CA) which issues certificates to establish credibility of users and services over SSL connections. There can be only one CA on the network and it is created during this server installation program.

For more information about Certificate Authority and other network services, see Network Services (http://www.novell.com/documentation/sles9/pdfdoc/sles_9_admin_guide/sles_9_admin_guide.pdf#page=66).

5 Select the authentication method for user accounts on the system.

NLSBS was designed for network environments consisting of a single server and up to 100 users logging in using local authentication methods. If you are installing a server on a network that uses another authentication method, see User Authentication (http://www.novell.com/documentation/sles9/pdfdoc/sles_9_admin_guide/sles_9_admin_guide.pdf#page=67).

6 Create at least one local user account.

User and group accounts are used to manage who has access to which files on the system. To add more than one local user account, click User Management on the Add New Local User screen before you click Next.

7 Configure graphics card, printer, and sound card.

If properly connected and installed, the correct settings for each device should be found with the installation's auto-detection program. If the settings are incorrect or a device is not detected, click Change and enter the correct settings.

The installation program now installs operating system files and does the initial configuration of Novell Small Business Server.

Next Steps

The next step is to set up Red Carpet automatic updates so the server is updated with the latest software patches and programs.

Set Up Red Carpet Automatic Updates

Your purchase of Novell Linux Small Business Suite entitles you automatic updates and patches using Red Carpet to connect to a service on the Internet. It is a simple, convenient way to keep your network running smoothly.

It is recommended that you set up automatic updates as soon as you install the server operating system.

- **1** From the server desktop's Main menu, select System > Configuration > Red Carpet.
- **2** Select Connect to This System, and then click Connect. If you are prompted to start the daemon, click Yes.
- **3** On the Updates Red Carpet screen, activate the service by clicking File > Activate. Activation requires you to enter the activation code and other information you received when you purchased the product.
- **4** Subscribe to all relevant channels.
- **5** Verify the updates on the Updates page, then click Update All.

You can configure Red Carpet to update automatically or at the interval you choose. For more information, see the *Novell Red Carpet Administration Guide* (http://www.novell.com/documentation/ximian/redcarpet.pdf).

What's Next

After updating your system with the latest patches and software, you should continue with the next section, "Setting Up Novell eDirectory" on page 19 so your network resources are secure and easy to manage.

Setting Up Novell eDirectory

Novell eDirectory is a directory framework (or tree) that organizes network resources such as user accounts, applications, data, and services into a hierarchical system called a tree. Each network resource is represented by an object residing in a container in the tree.

1 Launch the eDirectory Setup Wizard.

The Setup Wizard is located on the server desktop in the YaST Control Center. From the server desktop's Main menu, select System > YaST, then click Novell Linux Small Business Suite.

2 Create a new eDirectory tree.

Novell Linux Small Business Server is designed for use in a single-tree, single-server environment, but it can also be added to an existing tree.

3 Select a network time source.

The network time source, or NTP server, is the device you select to be the time source for devices and services on the network. Network services often require system clocks on network devices to be synchronized with the clock on the servers.

Contact your ISP for the address or domain name of an NTP server or see a list of public NTP servers at NTP.Servers Web (http://ntp.isc.org/bin/view/Servers/WebHome).

4 Create a context and administrator account.

The administrator account (admin) is a user with all rights to all files, folders, and objects in eDirectory. In this step, you create the admin user account and designate and create the container (or folder) where the admin User object will reside in the eDirectory tree.

It is recommended that you place the admin account in the organization folder by simply replacing *organization* with the name of your organization.

To create an admin in a different container, type the username and contexts in fully-distinguished-name format. The admin User object, context, and subcontexts are created for you. For example, typing cn=admin.ou=sales.o=companyname creates and places the admin user in the organizational unit (ou) named sales in the organization (o) named companyname.

5 Specify eDirectory contexts and ports.

The eDirectory Server Context is the container where the Server object will reside. It is recommended that you place the Server object in the organization (o) container.

To place the Server object in a different container, type the server context in fully-distinguished-name format in eDirectory Server Context. The context and subcontexts are created and the Server object is placed in the specified container. For example, typing ou=servers.o=companyname creates and places the Server object in the organizational unit named servers in the organization (o) named companyname.

TIP: See the online help for a list of the default port assignments.

6 Do not configure Service Location Protocol (SLP).

In a small-business environment, SLP is not required.

The eDirectory Setup Wizard now sets up eDirectory with the settings you chose and returns you to the Novell Linux Small Business Suite category page.

IMPORTANT: Do not create user accounts in eDirectory until after you set up GroupWise on the server. After GroupWise is installed, you can create user accounts in iManager and be prompted to assign a post office for each user.

What's Next

Continue with the next section, "Setting Up GroupWise E-Mail and Messenger" on page 21 so network users can have a post office and e-mail services.

Setting Up GroupWise E-Mail and Messenger

Novell Linux Small Business Suite includes several GroupWise software components that provide network users with secure, easy-to-use collaboration solutions. During the installation, you are prompted to install and configure the following components.

 Basic GroupWise system (one domain with its Message Transfer Agent and one post office with its Post Office Agent)

The domain functions as the main administrative unit for your GroupWise system. The post office serves as an administrative unit for a group of users and contains users' mailboxes. Each GroupWise user has an address that consists of a user ID, the user's post office name (gwpo by default), the GroupWise domain name (gwdom by default) and, optionally, an Internet domain name (typically, the name of your company).

• E-mail connectivity to the Internet (Internet Agent)

The Internet Agent allows communication between GroupWise users and users of other messaging systems who use the Internet to send e-mail. It also allows users to user POP and IMAP e-mail clients to access their GroupWise mailboxes.

• Browser-based access to mailboxes (WebAccess)

WebAccess enables access to GroupWise mailboxes through Web browsers, WAP-enabled wireless telephones, Palm OS devices, and Windows CE devices. WebAccess, when used on a computer's Web browser, provides most of the functionality available in the GroupWise client for Windows. Functionality on other devices is more limited.

Instant messaging (Novell Messenger)

Messenger is a corporate instant messaging product that is based on eDirectory. It enables users to send instant messages in a secure environment that includes user authentication through eDirectory and SSL encryption of instant messages.

IMPORTANT: SSL encryption requires that you obtain a public certificate and private key file for your Small Business server. If you are not familiar with the process of obtaining these files, refer to "Server Certificates and SSL Encryption" in "Security" in the *GroupWise 6.5 Administration Guide*. These files must exist on your Small Business server before you can set up instant messaging.

• Check the status of GroupWise and Messenger agents (Monitor)

Monitor lets administrators use an Internet browser to check the status of GroupWise and Messenger agents. As administrator, you can monitor agents and gateways from any location where you are connected to the Internet and have access to a Web browser. You can also use Monitor to do some administrative tasks from your Internet browser.

NOTE: If you are planning to set up your GroupWise system on more than one server, review "Setting Up a Multiple Server System" on page 45 before setting up your initial GroupWise system. If you want to set up GroupWise and Messenger using an installation script (instead of running the GroupWise Setup Wizard), see "Using a Response File" on page 46.

To set up the initial configuration of GroupWise on the server:

1 Launch the GroupWise Setup Wizard.

The Setup Wizard is located on the server desktop in the YaST Control Center. From the server desktop's Main menu, click >System > YaST, then click Novell Linux Small Business Suite.

- **2** Select the GroupWise components that you want to configure on your Small Business server, then click Next.
- **3** Specify the admin name and password for your Small Business server, then click Next.

Figure 2 YaST LDAP Authentication page



In order to set up your GroupWise and Messenger systems, YaST needs access to eDirectory so that it can create the eDirectory objects where GroupWise configuration information is stored for the domain, the post office, and the GroupWise and Messenger agents. eDirectory uses LDAP authentication to grant access. You must provide the fully distinguished name of the admin user (for example, cn=admin.o=mycompany), which includes the context of the admin User object.

IMPORTANT: Remember the admin name, password, and context. You will use it often to log in and manage the network.

4 (Conditional) If you selected the Internet Agent in the list of items to configure in Step 2 on page 21, specify the Internet domain name where you want to receive incoming e-mail from Internet senders, and then click Next.

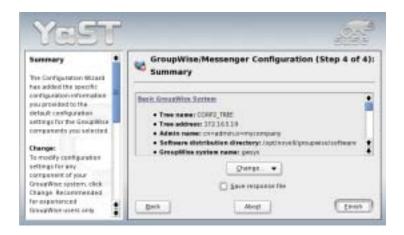
Figure 3 YaST Internet Domain page



After you have provided the requested information, YaST lets you modify your choices and customize a variety of configuration settings, if needed, before performing the installation.

5 (Conditional) If necessary, click Change to refine the configuration of your GroupWise system and then click Next to return to the Configuration Summary page.

Figure 4 YaST Summary page



6 Click Finish on the Configuration Summary page to create your initial GroupWise and Messenger systems.

After the GroupWise domain and post office have been created, YaST starts the GroupWise and Messenger agents so that your GroupWise system is ready for use. In addition, it configures your Linux server so that the GroupWise and Messenger agents start automatically whenever you reboot the server. For information about stopping, starting, and monitoring the agents, see "Managing the GroupWise and Messenger Agents" on page 41.

The GroupWise Setup Wizard now sets up the Novell Linux Small Business Server with GroupWise components and returns you to the Novell Linux Small Business Suite category page.

What's Next

Continue with the next section, "Setting Up iManager" on page 23 so you can create, edit, and delete network resources. This includes creating Novell eDirectory users who can use GroupWise e-mail and messaging services.

Setting Up iManager

Novell iManager is a network management utility that you run in an Internet browser. With it, network administrators can view and manage resources (objects) in the network tree and create, edit, and delete network objects such as user, printer, and container.

- **1** Launch the iManager Setup Wizard.
 - The Setup Wizard is located on the server desktop in the YaST Control Center. From the server desktop's Main menu, click >System > YaST, then click Novell Linux Small Business Suite.
- **2** Authenticate to eDirectory and enter the domain name of the Web server.

The iManager Setup Wizard now sets up iManager with the settings you chose and returns you to the Novell Linux Small Business Suite category page. You are now finished setting up the Novell Linux Small Business Server.

What Next

You have now completed the installation and initial setup of the Novell Linux Small Business Server. You can now configure other features and technologies based on your networking needs:

- E-Mail and Instant Messaging (page 25)
- Network Printing (page 49)
- Web Server Publishing (page 53)

3

E-Mail and Instant Messaging

After you have set up your basic GroupWise[®] system, as described in "Setting Up GroupWise E-Mail and Messenger" on page 21, you can create e-mail accounts for your users and set up users' workstations so they can access their GroupWise mailboxes. As time passes, you might also need to perform some agent management tasks.

- "Creating GroupWise E-Mail Accounts" on page 25
- "Setting Up User Workstations for E-Mail and Instant Messaging" on page 27
- "Maintaining E-Mail and Instant Messaging" on page 35

Creating GroupWise E-Mail Accounts

You can use iManager to create new users with GroupWise accounts and instant messaging capabilities.

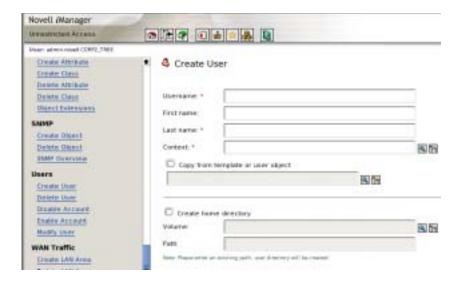
NOTE: All other GroupWise and Messenger administration requires the use of ConsoleOne[®], as described in "Using ConsoleOne" on page 35.

1 To start iManager, open the Small Business Suite home page.

http://server_address



- **2** In the right pane, click Launch iManager.
- **3** Specify the admin name and password for your Small Business server, and then click Login.
- **4** Add a user to your Small Business system.
 - **4a** In the left pane, scroll down to the Users section, and then click Create User.



4b Provide user information as needed, and then click OK.

A message informs you that the Create User request succeeded.

5 Click OK.

The Create User Mailbox page then prompts you for the GroupWise post office.



- **6** Click OK to add the user to the post office that was created as part of your initial GroupWise system.
- **7** Repeat Step 4 through Step 6 for each new user.

If you have users whose eDirectory accounts existed before you created your GroupWise system, you must use ConsoleOne to add GroupWise accounts to the existing eDirectory User objects (see "Creating GroupWise Accounts Manually" on page 38).

What's Next

After you created user and assign a post office, continue with the next section, Setting Up User Workstations for E-Mail and Instant Messaging.

Setting Up User Workstations for E-Mail and Instant Messaging

After your GroupWise system is up and running (see "Setting Up GroupWise E-Mail and Messenger" on page 21) and you have created eDirectory user accounts and GroupWise mailboxes

(see "Creating GroupWise E-Mail Accounts" on page 25), users can start communicating quickly and efficiently using e-mail and instant messaging.

- "Setting Up E-Mail" on page 27
- "Setting Up Instant Messaging" on page 33

Setting Up E-Mail

After the GroupWise agents are running and users have GroupWise accounts set up, users can access their GroupWise mailboxes to send and receive e-mail in a variety of ways:

- "Using the GroupWise WebAccess Client" on page 27
- "Installing and Using the GroupWise Linux Client" on page 28
- "Installing and Using the GroupWise Macintosh Client" on page 29
- "Installing and Using the GroupWise Windows Client" on page 29
- "Using a POP or IMAP E-Mail Client" on page 30
- "Using Microsoft Outlook" on page 32

Using the GroupWise WebAccess Client

The GroupWise WebAccess client allows users to access their GroupWise mailboxes from a Web browser on the road, in the office, or at home. The WebAccess Agent and a Web server must be running on your Small Business server in order for WebAccess to be available to GroupWise users. You must give the users the IP address or hostname of your Small Business server in order for them to use WebAccess. Then give them the following instructions.

1 Open the Small Business home page.

http://server_address

You can use either the server IP address or hostname.



- **2** In the right pane, click Access E-Mail from the Web. The WebAccess Login page appears.
- **3** Save this URL as a bookmark.
- **4** Provide the username and password associated with your GroupWise mailbox.
- **5** Click Login to log in to GroupWise WebAccess.

For assistance in learning to use GroupWise WebAccess, click Help or refer to the *GroupWise* 6.5 WebAccess Client User Guide in the Groupwise 6.5 online documentation.

Installing and Using the GroupWise Linux Client

The GroupWise Linux client is ideal for e-mail, calendaring, scheduling, and much more on Linux workstations. The GroupWise Linux client software must be installed on each user's workstation.

1 Open the Small Business home page.

http://server_address

You can use either the server IP address or hostname.



- **2** In the right pane, click Download the GroupWise Linux Client.
- **3** Review the installation instructions, and then click the link to download the file.
- **4** Save the install.bin file to a convenient location on your workstation.
- **5** Open a new terminal window, and then change to the directory where you saved the install.bin file.
- **6** Become root by entering **su** and the root password.
- 7 Enter sh install.bin.

Progress is displayed in the terminal window.

- **8** To start the GroupWise Linux client, click the GroupWise shortcut on your desktop.
- **9** Provide your GroupWise user ID, your eDirectory password, and the address (IP address or hostname) of your Small Business server, and then click OK.

For assistance in learning to use the GroupWise Linux client, click Help or refer to the *GroupWise 6.5 Cross-Platform Client User Guide* in the GroupWise 6.5 online documentation.

Installing and Using the GroupWise Macintosh Client

The GroupWise Macintosh client is ideal for e-mail, calendaring, scheduling, and much more on Macintosh workstations. The GroupWise Macintosh client software must be installed on each user's workstation.

1 Open the Small Business home page.

http://server_address

You can use either the server IP address or hostname.



2 In the right pane, click Download the GroupWise Macintosh Client.

The GroupWise.app.sit file automatically installs the Cross-Platform client software on your Macintosh workstation.

- **3** To start the GroupWise Macintosh client, click the GroupWise shortcut on your desktop.
- **4** Provide your GroupWise user ID, your eDirectory password, and the address (IP address or hostname) of your Small Business server, and then click OK.

For assistance in learning to use the GroupWise Macintosh client, click Help or refer to the *GroupWise* 6.5 *Cross-Platform Client User Guide* in the GroupWise 6.5 online documentation.

Installing and Using the GroupWise Windows Client

The GroupWise Windows client is ideal for e-mail, calendaring, scheduling, and much more on Windows workstations. The GroupWise Windows client software must be installed on each user's workstation. You have two options for distributing the GroupWise client software to users:

- Make copies of the *Novell GroupWise 6.5 Client* CDs and give them to users. The client Installation program is located at the root of the CD.
- Have users download the GroupWise Windows client from the GroupWise 6.5 Product Updates Web page (http://support.novell.com/filefinder/16963/index.html).

The following procedure assumes that users have the *Novell GroupWise 6.5 Client CDs* or have downloaded and extracted the client software files.

- **1** Make sure you are logged in as yourself on your workstation.
- **2** Click Start > Run, browse to the location of setup.exe on the *Novell GroupWise 6.5 Client* CD or the download location, select setup.exe, and then click OK.
- **3** Follow the instructions in the Setup program to install the Windows client software on your workstation.
 - Immediately after installation, the client Setup program gives you the opportunity to start the GroupWise Windows client. It also places an icon on your desktop to use when starting GroupWise in the future.
- **4** When you start GroupWise, provide your GroupWise user ID, your eDirectory password, and the address (IP address or hostname) of your Small Business server, and then click OK.

For assistance in learning to use the GroupWise Windows client, click Help or refer to the *GroupWise 6.5 Windows Client User Guide* in the GroupWise 6.5 online documentation.

Using a POP or IMAP E-Mail Client

If your users are familiar with a common POP or IMAP e-mail client such as Outlook* Express on Windows or Evolution™ on Linux, they can continue to use it to access their GroupWise mailboxes. Users of POP or IMAP e-mail clients have access to the feature sets of their familiar e-mail clients, but there are many GroupWise features that are not available to POP and IMAP e-mail clients.

The GroupWise Internet Agent is required in order for users to access their mailboxes using POP and IMAP e-mail clients. If you have not already installed the Internet Agent, you can rerun the GroupWise installation in YaST (as described in "Setting Up GroupWise E-Mail and Messenger" on page 21) selecting only the Internet Agent, or you can follow the instructions for installing the Internet Agent in the *GroupWise 6.5 Installation Guide*.

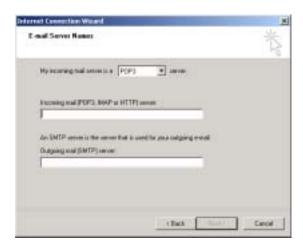
In order for users to access their GroupWise mailboxes from a POP or IMAP e-mail client, they must configure their e-mail clients to access their GroupWise accounts.

- "Configuring Outlook Express to Access Your GroupWise System" on page 30
- "Configuring Evolution to Access Your GroupWise System" on page 32

Configuring Outlook Express to Access Your GroupWise System

NOTE: Steps might vary depending on the versions of Windows and Outlook Express installed on the workstation.

- 1 In Outlook Express, click Tools > Accounts > Add > Mail.
- **2** Follow the prompts and provide personal information until you are prompted for the e-mail server information.



- **3** Select POP3 or IMAP as your incoming mail server type.
- **4** In the Incoming and Outgoing Mail fields, specify the IP address or hostname of your Small Business server, and then click Next.
- **5** Continue following the prompts and providing personal information until the new account has been set up in Outlook Express.
- **6** Click Tools > Accounts.

7 Select the new account you just created, and then click Properties > Servers.



- **8** Select My Server Requires Authentication, and then click OK.
 - The default setting for this option is Use Same Settings as My Incoming Mail Server, so you do not need to change any settings.
- **9** To access your GroupWise mailbox in Outlook Express, click Tools > Send and Receive.
- **10** Click the IP address or hostname of your Small Business server.
- **11** Provide your username and password, and then click OK.

Configuring Evolution to Access Your GroupWise System

NOTE: Steps might vary depending on the version of Evolution installed on the workstation.

- 1 Click Settings > Mail Accounts > Add.
- **2** Click Forward to start the Evolution Mail Configuration Assistant.
- **3** On the Identity page, provide your e-mail address in the GroupWise system (for example, mycompany.com), and then click Forward.
- **4** On the Receiving Email page, select IMAP in the Server Type list, specify the hostname of your Small Business server in the Host field, set the other Receiving Email options as appropriate for your system, and then click Forward.
- **5** On the Sending Email page, select SMTP in the Server Type list, specify the hostname of your Small Business server in the Host field, set the other Sending Email options as appropriate for your system, and then click Forward.
- **6** On the Account Management page, specify the name you want to use to identify this account on the Evolution Settings page, and then click Forward.
- **7** Click Apply to create the GroupWise account.
 - Your GroupWise mailbox now appears in the list of available e-mail accounts.



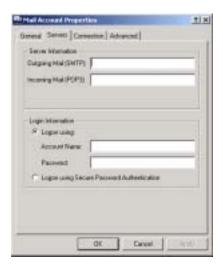
Using Microsoft Outlook

If your users have been using the Microsoft Outlook e-mail client that comes standard with Microsoft Office, they can continue to use it to access their GroupWise mailboxes. However, not all GroupWise functionality is available in Outlook.

In order for users to access their GroupWise mailboxes from Outlook, they must configure Windows to access their GroupWise accounts.

NOTE: Steps might vary depending on the versions of Windows and Outlook installed on the workstation.

- **1** In the Windows Control Panel, click Mail and Fax. The default profile is displayed.
- **2** Click Show Profiles > Add to add a new profile for your GroupWise account.
- **3** Select Internet E-Mail, and then follow the prompts and provide personal information until you reach the Servers property page.



- **4** In the Outgoing Mail and Incoming Mail fields, specify the IP address or hostname of your Small Business server.
- 5 In the Account Name and Password fields, specify your GroupWise user ID and password.
 IMPORTANT: Do not select Logon Using Secure Password Authentication.
- **6** Continue providing information on the Connection and Advanced property pages as needed, and then click OK to save the mail account information.
- **7** Continue following the prompts and providing personal information until the new account has been set up.

- **8** To access your GroupWise mailbox in Outlook, click Tools > Check for New Mail On, and then select the mail service that you set up from the Control Panel.
- **9** Provide your username and password, and then click OK.

What's Next

After you have set up users' workstations for e-mail, you can set up instant messaging (see "Setting Up Instant Messaging" on page 33) or you can consider long-term GroupWise system management issues (see "Maintaining E-Mail and Instant Messaging" on page 35).

Setting Up Instant Messaging

After your Messenger system is set up, you must implement Secure Sockets Layer (SSL) encryption on your Small Business server because the Messaging Agent requires SSL on Linux. After your Messenger system is secured by SSL encryption, users can set up their workstations for instant messaging.

- "Configuring Messenger for SSL" on page 33
- "Setting Up Messenger Software" on page 34

Configuring Messenger for SSL

If you do not yet have a public certificate and private key file on your Small Business server, follow the instructions in "Server Certificates and SSL Encryption" in "Security" in the *GroupWise* 6.5 *Administration Guide*. These files must exist on your Small Business server before you can set up secure instant messaging.

- 1 In a terminal window, become root by entering **su** and the root password.
- **2** Copy your public certificate file and private key file into the /opt/novell//messenger/certs directory on your Small Business server.
- **3** Stop the Messaging Agent by entering

/etc/init.d/novell-nmma stop

4 Start ConsoleOne.

See "Using ConsoleOne" on page 35.

- **5** Browse to and expand the Messenger Service object.
- **6** Right-click the Messenger Server object, and then click Properties.
- **7** Click Server > Security.



8 Fill in the following fields:

Certificate Path: This field defaults to /opt/novell/messenger/certs.

SSL Certificate: Browse to and select the public certificate file. If it is located in the directory specified in the Certificate Path field, you can simply type the filename.

SSL Key File: Browse to and select your private key file. If it is located in the directory specified in the Certificate Path field, you can simply type the filename.

Enable SSL: Select this option to enable SSL encryption for your Messenger system.

Because you provided the SSL information on the Messenger Server object, it applies to both the Messaging Agent and the Archive Agent.

- **9** Click OK to save the SSL settings.
- **10** Restart the Messaging Agent by entering

/etc/init.d/novell-nmma start

Setting Up Messenger Software

In order for users to send instant messages, they must install Novell GroupWise Messenger on their workstations.

1 Open the Small Business home page.

http://server_address

You can use either the server IP address or hostname.



- **2** In the right pane, click Download the GroupWise Messenger Client.
- **3** Follow the instructions on the Messenger Welcome page to install and start Messenger on the platform of your choice (Linux, Macintosh, or Windows).

For assistance in learning to use Messenger, click Help or refer to the *GroupWise Messenger* 1.0 Client User Guide.

For administrative information about your Messenger system, see the *Messenger 1.0 Administration Guide*.

What's Next

After you have set up users' workstations so they can use e-mail and instant messaging, you are ready to consider long-term GroupWise and Messenger management issues, as described in the next section, Maintaining E-Mail and Instant Messaging.

Maintaining E-Mail and Instant Messaging

The GroupWise/Messenger Setup Wizard in YaST helps you create your initial GroupWise and Messenger systems. iManager helps you automatically add GroupWise accounts for new eDirectory users. But long-term management and growth of your GroupWise and Messenger systems require that you use ConsoleOne for maintenance tasks.

- "Using ConsoleOne" on page 35
- "Managing Users" on page 38
- "Managing GroupWise and Messenger Systems" on page 41

Using ConsoleOne

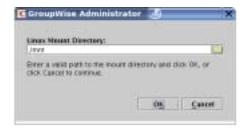
The eDirectory Setup Wizard in YaST installed ConsoleOne, along with the GroupWise snap-ins, under the /usr/ConsoleOne directory. You start ConsoleOne in a terminal window.

- **1** On your Linux desktop, open a terminal window, and then become root by entering **su** and the root password.
- **2** Enter the following command to start ConsoleOne:

/usr/ConsoleOne/bin/ConsoleOne

TIP: For ease of use, you can create a desktop icon for starting ConsoleOne. For example, if you use the KDE desktop, right-click the desktop, and then click Create New > File > Link to Application. On the Application tabbed page, specify the above command in the Command field. Click Advanced Options, and then in the User box, select to run ConsoleOne as root. Set up other icon properties as desired. Other desktops offer similar functionality.

The first time you start ConsoleOne on Linux, you are prompted for the directory where you typically mount external file systems.

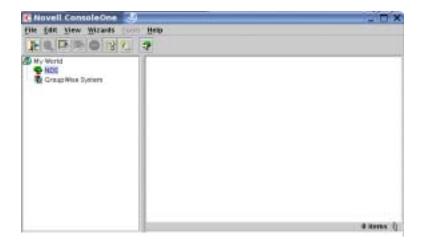


TIP: If the Linux Mount Directory dialog box does not appear, click the ConsoleOne window to clear the splash screen.

The default of /mnt is typically correct. You can change the directory as needed. ConsoleOne requires direct access to any server where a domain or post office is located. This dialog box does not appear again when you start ConsoleOne in the future.

For more information about what the Linux mount directory is used for, see "Selecting a Linux Mount Directory" in "Installing a Basic GroupWise System" in the *GroupWise* 6.5 *Installation Guide*.

3 If necessary, specify or browse to and select the Linux mount directory, and then click OK. The first time you start ConsoleOne on Linux, ConsoleOne does not automatically authenticate to any eDirectory trees, so the NDS[®] object is not immediately expandable.



- **4** In ConsoleOne, select the NDS object, and then click File > Authenticate.
- **5** Fill in the following fields:

Login Name: The Small Business server admin username.

Password: The password for the username.

Tree: The eDirectory tree for your Small Business server.

TIP: Under some circumstances, you need to provide the IP address of your Small Business server, rather than the tree name.

Context: The full context of the User object associated with the username you provided.

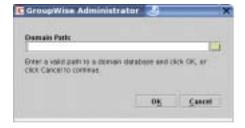
By default, the Admin object is created in the Organization object you specified when you ran the eDirectory Setup Wizard.

6 Click Login.

The next time you start ConsoleOne, all information except the password is automatically provided for you.

After you are logged in to eDirectory, you must connect to the GroupWise domain in order to access GroupWise system information.

7 Select the GroupWise System object, and then click Tools > GroupWise System Operations > Select Domain.



By default, the domain directory structure is created in /opt/novell/groupwise/db/gwdom and the post office directory structure is created in /opt/novell/groupwise/db/gwpo on your Small Business server.

8 Browse to and select the gwdom directory, and then click OK.

9 Expand the GroupWise System object, and then expand the Domain object to view the structure of your basic GroupWise system in the GroupWise View.



10 Expand the NDS object, expand your tree, and then expand the Organization object to see where the GroupWise and Messenger objects are located in the eDirectory View.



By default, the Domain and Post Office objects are located in the same container where the Admin User object is located.

The sections that follow cover basic GroupWise administration tasks that you might need to perform in maintaining your GroupWise system on your Small Business server. For more detailed instructions for using ConsoleOne to manage GroupWise, see the *GroupWise 6.5 Administration Guide*.

Managing Users

As time passes, you might need to perform some of the following tasks for users:

- "Creating GroupWise Accounts Manually" on page 38
- "Deleting GroupWise Accounts" on page 39
- "Disabling LDAP Password Changing" on page 40
- "Assigning a Postmaster" on page 40

Creating GroupWise Accounts Manually

You can create eDirectory users and GroupWise accounts in ConsoleOne as well as in iManager. In ConsoleOne, you can create GroupWise accounts individually or for multiple users in the same post office.

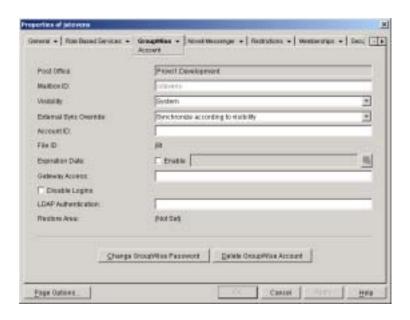
- "Adding GroupWise Accounts When Adding eDirectory Users" on page 38
- "Adding Multiple eDirectory Users to a Post Office" on page 39

Adding GroupWise Accounts When Adding eDirectory Users

- 1 In ConsoleOne, browse to and right-click the container object where you want to create a new User object, and then click New > User.
- **2** Fill in the fields as needed for the eDirectory user.

- **3** Select Add User to GroupWise Post Office, and then browse to and select the post office that you want the new user to belong to.
- **4** Click OK in the New User dialog box to create the new eDirectory user and assign the new user to the selected post office.

This creates a GroupWise tab on the property page of the User object.



Adding Multiple eDirectory Users to a Post Office

- **1** In ConsoleOne, browse to and right-click the post office where you want to add users (by default, the gwpo object), and then click Properties.
- **2** Click GroupWise > Membership.
- **3** Click Add, select one or more User objects, and then click OK.
- **4** Click OK on the Membership page to add the listed users to the post office.

Deleting GroupWise Accounts

You cannot delete GroupWise accounts in iManager. You must use ConsoleOne.

- 1 In ConsoleOne, browse to and select the context where the User object is located.
- **2** Right-click the User object, and then click Delete.

or

Select multiple User objects, right-click the selected objects, and then click Delete.

3 Click Yes to display the Delete Options dialog box.



In ConsoleOne, you can delete the user's eDirectory object and GroupWise account together, or you can delete the GroupWise account while retaining the eDirectory object.

4 Click OK to delete both the eDirectory object and the GroupWise account.

or

Deselect Delete in the eDirectory Account box if you want to retain the eDirectory object, while deleting the GroupWise account.

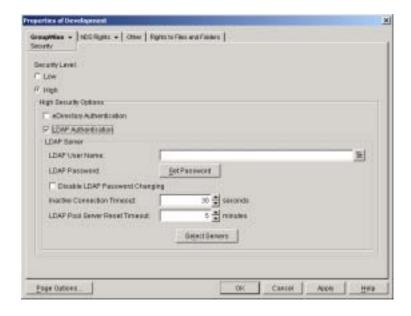
5 Click OK.

Disabling LDAP Password Changing

To facilitate easy access to GroupWise mailboxes, the GroupWise/Messenger Setup Wizard in YaST automatically enables LDAP authentication for the post office it creates. It also configures the LDAP server for use by GroupWise users. This default configuration accommodates SSL if it is in use on the LDAP server.

LDAP authentication allows the same password to be used for network login and mailbox access. When LDAP authentication is enabled, users are, by default, allowed to change their LDAP passwords in any of the GroupWise clients (WebAccess, Linux, Macintosh, or Windows). It is possible that users could change their GroupWise passwords without realizing that they are also changing their network login passwords. To prevent this, you can use ConsoleOne to disable the ability to change LDAP passwords in the GroupWise client.

- **1** In ConsoleOne, browse to and right-click the post office (by default, the gwpo object), and then click Properties.
- **2** Click GroupWise > Security.



3 Select Disable LDAP Password Changing, and then click OK.
ConsoleOne notifies the POA to restart so the new LDAP setting can be put into effect.

Assigning a Postmaster

On the Internet, each site must assign at least one user to be a Postmaster. The Postmaster is the recipient of messages addressed to postmaster@mydomain.

- 1 In ConsoleOne, browse to and select the domain (by default, the gwdom object) to display its contents.
- **2** Right-click the Internet Agent (GWIA) object for the domain, and then click Properties.
- **3** Click GroupWise > Gateway Administrators.
- **4** Click Add, select a GroupWise user to be the Postmaster, and then click OK.
- **5** Select the user from the list, and then click Postmaster.
- **6** Click OK to save the information.

ConsoleOne notifies the Internet Agent to restart so that applicable messages are sent to the Postmaster as needed.

Managing GroupWise and Messenger Systems

As time passes and your small business grows, your e-mail and instant messaging systems might need to change and grow as well. The following tasks can help you handle system maintenance and growth.

- "Managing the GroupWise and Messenger Agents" on page 41
- "Maintaining Your GroupWise System" on page 44
- "Maintaining Your Messenger System" on page 45

Managing the GroupWise and Messenger Agents

When you set up your GroupWise system, the GroupWise and Messenger agents are configured to start automatically whenever you reboot your server. When started automatically, the agents run as daemons, without a user interface. Status information is written to log files.

In a smoothly running system, you should not need to deal with the agents individually. However, the following sections provide useful commands and procedures for managing the GroupWise and Messenger agents, should you need to do so.

- "Viewing Agent Log Files" on page 41
- "Starting and Stopping the Agent Daemons" on page 41
- "Starting the Agents with a User Interface" on page 42
- "Monitoring the Agents from Your Web Browser" on page 43

Viewing Agent Log Files

The log files for the GroupWise and Messenger agents are located in agent-specific subdirectories:

/var/log/novell/groupwise /var/opt/novell/log/messenger

Starting and Stopping the Agent Daemons

The following table lists commands that help you manage the agent daemons in a terminal window. You must be logged in as root to start and stop the agents.

Task	GroupWise Agents	Messenger Agents
List the agent processes to see if they are running	ps -eaf grep gw	ps -eaf grep nm
Start the agent daemons	/etc/init.d/grpwise start /etc/init.d/grpwise-ia start /etc/init.d/grpwise-wa start /etc/init.d/grpwise-ma start	/etc/init.d/novell-nmma start /etc/init.d/novell-nmaa start
Stop the agent daemons	/etc/init.d/grpwise stop /etc/init.d/grpwise-ia stop /etc/init.d/grpwise-wa stop /etc/init.d/grpwise-ma stop	/etc/init.d/novell-nmma stop /etc/init.d/novell-nmaa stop
Restart the agent daemons	/etc/init.d/grpwise restart /etc/init.d/grpwise-ia restart /etc/init.d/grpwise-wa restart /etc/init.d/grpwise-ma restart	/etc/init.d/novell-nmma restart /etc/init.d/novell-nmaa restart

In addition, the agents respond properly to a standard Linux kill command.

Starting the Agents with a User Interface

The Post Office Agent, the Message Transfer Agent, and the Internet Agent can run with a user interface that provides information, status, and message statistics, as well as the ability to temporarily change some agent configuration settings. The WebAccess Agent can run so that it displays configuration and status messages in the terminal window. The Monitor Agent and the

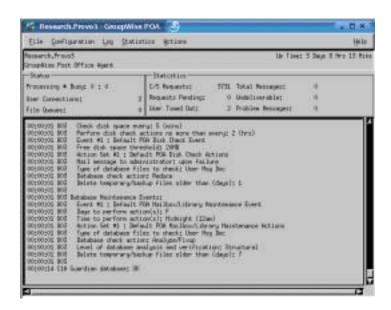
Messenger agents cannot run with any type of user interface. Running the agents with a user interface can be useful for troubleshooting.

IMPORTANT: The X Windows System and OpenMotif* are required by the user interfaces for the GroupWise agents.

- **1** In a terminal window, become root by entering **su** and the root password.
- **2** Stop the agents if they are currently running as daemons.
- **3** Change to the /opt/novell/groupwise/agents/bin directory.
- **4** Use the following commands to start the agents with a user interface:

```
./gwpoa --show @../share/gwpo.poa &
./gwmta --show @../share/gwdom.mta &
./gwia --show @../share/gwia.cfg &
./gwinter --show @../share/webac65a.waa &
```

The interfaces for the Post Office Agent, the Message Transfer Agent, and the Internet Agent are very similar.



5 To stop an agent from its user interface, click File > Exit.

or

To stop the WebAccess Agent from its configuration and status window, close the window.

For information about using the agent console interfaces, see the following sections of the *GroupWise 6.5 Administration Guide*

- "Using the POA Agent Console"
- "Using the MTA Agent Console"
- "Monitoring the Internet Agent through the Server Console"
- "Monitoring the Linux WebAccess Agent"

Monitoring the Agents from Your Web Browser

If you installed Monitor (see "Setting Up GroupWise E-Mail and Messenger" on page 21), you can monitor the GroupWise and Messenger agents from your Web browser by viewing the following URL:

http://server_address/gwmon/gwmonitor



By default, the Post Office Agent and the Message Transfer Agent are monitored. For information about configuring the Internet Agent and the WebAccess Agent to be monitored, see the following sections of the *GroupWise 6.5 Administration Guide*:

- "Monitoring the Internet Agent through the Web Console"
- "Monitoring the WebAccess Agent through the Web Console"

For information about configuring the Messenger agents to be monitored, see the following sections of the *Messenger 1.0 Administration Guide*:

- "Using the Messaging Agent Web Console"
- "Using the Archive Agent Web Console and GroupWise Monitor"

Maintaining Your GroupWise System

Depending on the importance and volume of e-mail generated by your users, a number of maintenance tasks might need to be performed to keep your GroupWise system running smoothly. The *GroupWise 6.5 Administration Guide* can help you learn to perform the tasks your system needs.

The following table summarizes the most common tasks and where they are described:

Guide Section	Task
System	 Using the GroupWise View in ConsoleOne Customizing the GroupWise Address Book
Domains	 Adding a domain Moving a domain
Post Offices	 Adding a post office Moving a post office Managing disk space usage

Guide Section	Task
Users	Renaming users
	Moving users
Resources	 Creating schedulable resources for meeting rooms, company equipment, etc.
Distribution Lists, Groups, and Roles	Creating public groups of e-mail users in addition to eDirectory groups
Libraries and Documents	Creating a library to store and manage documents
	Importing documents into the library
Databases	Repairing damaged databases
	Backing up databases
	Restoring databases and deleted messages
	Recovering deleted GroupWise accounts
Post Office Agent	Monitoring and optimizing the Post Office Agent
	Scheduling database maintenance and disk space management
Message Transfer	Monitoring and optimizing the Message Transfer Agent
Agent	Scheduling domain links
Internet Agent	Monitoring and optimizing the Internet Agent
	Configuring SMTP/MIME services
	Configuring paging services
	Blocking unwanted e-mail
WebAccess	 Monitoring and optimizing the WebAccess Agent
	Customizing the WebAccess interface
	Creating Palm Query Applications for Palm OS devices
Monitor	 Monitoring all GroupWise and Messenger agents from a single Web page
	 Generating reports about domain links, server environments, and message traffic
	Measuring agent performance
Client	 Supporting Caching mode and Remote mode for the GroupWise Windows client
	• Enabling AutoUpdate of the GroupWise Windows client software
Security	 Supporting personal digital certificates, digital signatures, and S/MIME encryption
	Generating and installing server certificates for SSL encryption

Maintaining Your Messenger System

Depending on the importance and volume of instant messages generated by your users, a number of maintenance tasks might need to be performed to keep your Messenger system running smoothly. The *Messenger 1.0 Administration Guide* can help you learn to perform the tasks your system needs.

The following table summarizes the most common tasks and where they are described:

Guide Section	Task
Messaging Agent	Monitoring and optimizing the Messaging Agent
Users	Providing user searches based on e-mail addressesSetting user policies
Archiving	 Enabling archiving of instant messages Monitoring and optimizing the Archive Agent Searching the instant message archive

Specialized Installations

The GroupWise/Messenger Setup Wizard in YaST is the best way to set up your GroupWise system for most Small Business systems. This section provides additional information for those with multiserver Small Business systems and for resellers of the Novell Small Business Suite 9 product.

- "Setting Up a Multiple Server System" on page 46
- "Using a Response File" on page 47
- "Using the Standard GroupWise Installation Advisor" on page 48

Setting Up a Multiple Server System

The GroupWise/Messenger Setup Wizard in YaST allows you to set up all or just some of the components of GroupWise and Messenger on your initial Small Business server.



By default, all components are installed together on the same server. However, if you anticipate a high volume of incoming and outgoing Internet e-mail, you might, for example, consider installing the Internet Agent on a different server from where the Post Office Agent is servicing GroupWise client requests. If you anticipate a high volume of instant messaging, you might consider installing your Messenger system on a different server from your GroupWise system.

You can run the GroupWise/Messenger Setup Wizard in YaST on any server where you want to install a GroupWise or Messenger component, keeping in mind the following:

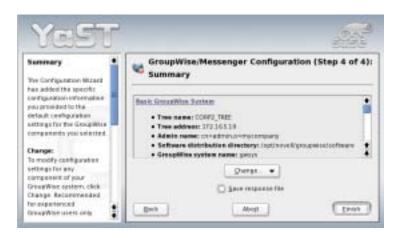
- Select the Basic GroupWise System item only once. If you run it a second time on the same server, it deletes the existing GroupWise system and creates a new one. If you run it a second time on a different server, it creates a new, independent GroupWise system.
- Each domain needs only one Internet Agent and only one WebAccess Agent. If you choose to install either of these agents on a different server from where you set up your initial GroupWise system, you must provide a read/write file system mount from the server where they are installed to the domain directory.
- Your Messenger system is completely independent from your GroupWise system. If you install it on a different server, there are no dependencies to consider.

If you would prefer to use the standard GroupWise Installation Advisor to install on multiple servers, see "Using the Standard GroupWise Installation Advisor" on page 48.

Using a Response File

Resellers of Novell products install the Small Business Suite and set up GroupWise systems at numerous customer sites. To assist with this repetitive task, the GroupWise/Messenger Setup Wizard provides the option of saving GroupWise configuration information in a response file. That response file can then be used as input to the Silent Install script that sets up a standardized GroupWise system automatically, without user intervention during the process.

1 Run the GroupWise/Messenger Setup Wizard as described in "Setting Up GroupWise E-Mail and Messenger" on page 21 until you reach the Summary page.



2 If necessary, click Change to specify configuration settings that are different from the defaults provided by the GroupWise/Messenger Setup Wizard.

You might also choose to edit the response file after it has been created, as explained in Step 6 below.

3 Select Save Response File, and then click Finish to finish the GroupWise/Messenger setup process.

By default, the response file is created in the following location:

/opt/novell/groupwise/software/gwinst.YaST2.cfg

4 If desired, change the location or filename in the Response File Path field, and then click Finish to create the response file.

The steps below elaborate on the instructions that appear in a warning dialog box when you click Finish.

5 Click Continue close the warning dialog box and create the response file.

When you create a response file, no GroupWise system is created on the server where you ran the GroupWise/Messenger Setup Wizard, nor is any other configuration performed. In this case, the response file is the only output from the wizard.

6 Print the response file to become familiar with its content.

The response file is an ASCII text file in .ini format. It contains a section for each item on the Select Items to Configure page of the GroupWise/Messenger Setup Wizard. You can use the response file with all sections in order to install all components on the target server or you can remove sections of the response file so that the removed components are not installed on the target server.

Some fields in the response file must be edited to provide information specific to each customer site:

- eDirectory tree name
- Admin user context of the
- Admin user password
- Server IP address where the Small Business Suite is installed
- Customer time zone

You might want to edit other fields to customize the GroupWise system for the customer:

- GroupWise system name
- Domain name
- Post office name
- GroupWise eDirectory object context
- **7** Edit the response file as needed for the customer site where you plan to use the Silent Install script to set up the GroupWise system.
- **8** Copy the response file from the software distribution directory to whatever medium you use to bring data with you to the customer site.
- **9** At the customer site, install Novell Small Business Suite 9 and run the eDirectory Setup Wizard.
- **10** Copy the response file to /opt/novell/groupwise/software, and then change to that directory.
- **11** As root, run the silent-install script.

Syntax:

./silent-install -r response_file -p admin_password -s status_file

Example:

./silent-install -r gwinst.YaST2.cfg -p palmtree -s gwinst.log

If you do not use the -s option, status information is displayed on the screen but is not written to a log file.

12 When the Silent Install script finishes, continue setting up the Small Business server as needed.

Using the Standard GroupWise Installation Advisor

If you would prefer to run the standard GroupWise Installation Advisor rather than the GroupWise/Messenger Setup Wizard, you can use YaST to set up a GroupWise software distribution directory where a standard GroupWise installation can be performed from.

- **1** In the YaST Control Center, click Software > Install and Remove Software.
- **2** In the Filter field, select Search.
- **3** In the Search field, type **groupwise**, and then click Search.
- **4** Select GroupWise Software Distribution Directory, and then click Accept.
- **5** After YaST has set up the GroupWise software distribution directory, open a terminal window.
- **6** Become root by entering **su** and the root password.
- **7** Use the following command to start the GroupWise Installation Advisor:

/opt/novell/groupwise/software/install

8 Follow the instructions in "Installing a Basic GroupWise System" in the *GroupWise 6.5 Administration Guide* to install and set up GroupWise.

For your convenience, the Messenger software is also included in the GroupWise Software Distribution Directory RPM. After that RPM has been installed, you can start the standard Messenger Installation program using the following command:

/opt/novell/messenger/software/server/install.sh

Then follow the instructions in "Installing a Novell Messenger System" in the *Messenger 1.0 Installation Guide* to install and set up Messenger.

4

Network Printing

Novell[®] Linux Small Business Suite 9 (NLSBS9) software lets your users share printers on the network through Common UNIX* Printing Services (CUPS), an open source print server solution. Although lprng and lpdfilter packages will continue to be supported, CUPS offers these advantages:

- Setting individual parameters on the user level
- Optimum support for PostScript* printers
- Browsing in the network
- Web front-end (on the user level and for administration)

This chapter guides you through the steps to set up a basic CUPS print server to service the print jobs on the network and provides instructions for printing from Linux and Windows workstations. After completing these steps, your network users can send their print jobs to server-attached printers.

For more information on printing in a Linux environment, see "Printer Operation" in the *SUSE LINUX Enterprise Server Administration and Installation* guide (http://www.novell.com/documentation/sles9/index.html).

Setting Up the Print Server

Setting up a print server requires you to create a CUPS password for the root user and then configure CUPS on the computer.

Creating a CUPS Password for Root

The CUPS printing software comes installed in SUSE[®] LINUX Enterprise Server 9 (SLES 9) and is a simple way to share printers with workstations. You set up a print server through CUPS from a browser after creating a password for the root user.

NOTE: CUPS supports fundamental LPD functionality, both on the recipient side by means of the cups-lpd and on the sender side by means of the lpd back-end. CUPS does not, however, support full LPRng functionality.

Follow these steps to create a password for the root user from your SLES 9 desktop:

- **1** Click the Shell icon to open the Shell Konsole.
- **2** At the prompt, type **lppasswd -a root** and press Enter. You are prompted to enter a password.
- **3** Enter your password, then re-enter it when prompted. It must contain at least six characters and one number.

Once you've created your admin user and password, you may exit the Shell Konsole and open a Web browser.

Configuring CUPS Print Server

- 1 In your browser, go to http://localhost:631. The CUPS administration screen appears.
- **2** Log into the CUPS Web site.
- **3** Click Manage Printers to open the Printer screen.

TIP: Don't confuse the Manage Printers link with the link Manage Printer Classes link.

- **4** On the Manage Printers page, click Add Printer. An authentication dialog will opens.
- **5** Enter the admin name and password you created. Once you have authenticated, the Add Printer page opens.
- **6** Type in a name, location, and description of the printer, then click Continue. The Device for Storage page opens.
- **7** Select the appropriate device from the dropdown list, then click Continue. The Printer URI page opens.
- **8** Type the appropriate hostname for your printer and port, then click Continue. The Model/ Driver for Storage page opens.
- **9** Select the appropriate printer driver for the printer you have attached, then click Continue to finish setting up your printer.

 Consult your printer manual for information on your printers' makes, models, etc.

What's Next

After you have set up a print server with CUPS, you can now print from any workstation on the network. See the next step, "Printing from Linux and Windows Workstations" on page 50 for more information.

Printing from Linux and Windows Workstations

You can print to any network printer from Windows or Linux workstations.

Printing from a Novell Linux Desktop

- 1 In YaST, click Hardware > Printer.
- **2** In the Printer Configuration window, select Other Not Detected and click Configure.
- **3** Select Print Directly to a Network Printer, then click Next.
- **4** In the Connection Type window, select Direct TCP Port Printing and click Next.

IMPORTANT: The network printer you connect to must have a NIC card; otherwise, select Remote IPP Queue.

- **5** In the IPP printer window, specify your connection information, and then click Next.
 - **5a** Type in the hostname of the print server; If you don't know it, click Lookup to check for available socket servers.

- **5b** Click Test Remote Socket Access to check the accessibility of the print server.
- **6** In the Queue Name window, set up your printer and then click Next.
 - **6a** Check the name and location of the printer.
 - **6b** Select the Do Local Filtering option.
 - **6c** Test the printer by clicking on Test Printing.
- **7** In the Printer Model window, select the make and model of printer you want to connect to, and then click Next.
- **8** In the Printer Configuration window, edit the elements of your printer configuration if desired, and click OK.
 - The newly selected print server appears in the lower pane with the words Changed, Not Yet Saved after it.
- **9** Click Finish to save the new print server configuration.

Printing from a Windows Workstation

You can print from Windows workstations via Samba, an open source implementation of SMB. The name Samba is derived from the initials SMB, or Server Message Block, a message format used by DOS and Windows to share files, directories, and devices.

Samba is a file sharing protocol that provides file and print services to SMB/CIFS clients. It allows a non-Windows server to communicate with the same networking protocol as the Windows products. Samba was originally developed for UNIX but also runs on Linux and other UNIX variants.

To print to a Linux printer from a Windows workstation, follow the normal Windows printing steps:

- **1** Click the Start button in the lower left of your Windows screen.
- 2 Click Printers and Faxes.

 If Samba is configured correctly on your server, all printers will appear in the window and all Windows functions are available to the Linux printers.

For more information on setting up Samba for your Windows workstations, see Samba (http://www.novell.com/documentation/oes/index.html?page=/documentation/oes/sles_admin/data/secsamba.html) in the Heterogenous Networks chapter of the *Novell Open Enterprise Server* online documentation.

5

Web Server Publishing

Web sites perform different functions. Some are simple collections of HTML pages that contain static information, such as company background information. Some are more dynamic, creating information as it is requested from a user or another computer. Building dynamic Web sites involves the use of servlets or Web applications, and might also involve databases (such as MySQL) and scripting languages (such as PHP or Perl).

Web sites where products or services are bought or sold are examples of dynamic Web sites. Other dynamic Web sites are not seen by users, but are used as part of a supply chain process between businesses.

For more information on the Apache Web server, visit the Apache Web site (http://httpd.apache.org/docs-2.0/).

NLSBS 9 Web Server—Novell Apache

The Novell[®] Linux Small Business Suite 9 (NLSBS9) home page and various GroupWise[®] and iManager Web pages use Novell-Apache. It is installed by both GroupWise and iManager YaST wizards using the Novell-web-sdd package.

TIP: Novell-Apache and Apache2 are not compatible, and compete for the default HTTP port 80. If you would like to install Apache2, use a separate server.

Although it looks as though it has overrun your Web server, NLSBS 9 has merely rearranged some key files. Once you know the new names and locations of the files that you're already familiar with, administrating your NLSBS 9 Web server is much the same as your NetWare servers.

Three key elements now have new names and locations:

- Config files are now located at /var/opt/novell/http/
- Doc root is now located at /var/opt/novell/httpd/htdocs
- Startup Daemon in now located at /etc/init.d/novell-http

Tomcat files also have new names and locations:

- Tomcat is now located at /etc/opt/novell/tomcat4
- Root files are now located at /var/opt/novell/tomcat4
- The startup daemon is novell-tomcat4

Startup names have changed to Novell.httpd.

Your NLSBS 9 Web Site

The Novell Linux Small Business Suite provides a Web page with useful links for your small business. If you would rather use your own design, you can copy it over the Novell index file.

To replace the NLSBS 9 Web page with your own:

- **1** Locate the NLSBS 9 Web page at /var/opt/novell/httpd/htdocs/Index.html.
- **2** Copy your small business' home page over the index.html file.
- **3** Use the Restart command to stop and restart Apache: /etc/init.d/novell-http restart.

What's Next

Using the NLSBS9 structure, you're ready to adapt your Web server to your specific needs. Although the main purpose of having a Web server is to host a Web site, you can also use Apache as the HTTP server in a partnership with an application server, such as the Novell[®] exteNdTM Application Server.