Implementing NetWare News Server

Originally known as USENET, news servers have been around nearly as long as the Internet has been. Until recently, if you wanted to implement a news server, you had to install either Windows NT or UNIX. Shortly after the release of NetWare 5, however, Novell released a news server for NetWare. What makes this news server unique? Because NetWare is News Server is integrated with NDS eDirectory, you can restrict access to authorized users, and you can leverage your company's investment in NDS eDirectory to minimize the amount of administrative work that is needed to offer news services to your users.

GETTING THE SERVER READY FOR INSTALLATION

The server on which you will install NetWare News Server must meet two main requirements: The server must have a minimum of 128 MB of RAM and a minimum of 200 MB of free disk space on the volume on which you will install NetWare News Server.

If NetWare News Server is being handled just a few in-house news or discussion groups, these requirements should more than do the job. If, on the other hand, you want to offer a full assortment of USENET groups to your users, you must increase the amount of memory to at least 1 GB of RAM and the free disk space to at least 20 GB since you will be handling more than 20,000 newsgroups.

You will also need to install TCP/IP on the server since the Network News Transport Protocol (NNTP) runs only on TCP/IP. If you want to restrict NetWare News Server to only authorized individuals, you should consider implementing Lightweight Directory Access Protocol (LDAP) or Secure Sockets Layer (SSL) for authentication and possible encryption of information going to and from the news server. This extra security is especially important if you plan to permit access to NetWare News Server from outside of your company and want to protect the information going to and from the server. In addition, NetWare News Server supports Simple Network Management Protocol (SNMP), thereby allowing you to monitor the server and minimize any disruption in service.

INSTALLING NETWARE NEWS SERVER

Installing NetWare News Server is straightforward. To install NetWare News Server, you must complete the following steps:

1. If the CDROM.NLM is not loaded, load it, and then insert the NetWare 5.1 CD into the server's CD drive.
2. Access the X-Windows screen on the server, and click the Novell logo in the lower left corner of the screen.
3. Highlight and click the Install option.
4. When the Installed Products screen appears, click Add.
5. When the Source Path screen appears, replace the A: that appears by default with the name of the CD-ROM that should now appear as a mounted volume on the server. (As the CD-ROM drive automatically mounts, you should see a message that indicates the name of the CD-ROM. In case you missed this message, you can use the VOLUMES command at the server console to find the name you need to enter at the Source Path screen.) Unless you have a special copy of the NetWare 5.1 CD, the volume name should be NW51. After you enter the path name, click OK.
6. When the Components screen appears, click the check box next to NetWare News Server. A check mark should then appear next to that option. In addition, a grayed-out check mark appears next to NetWare Web Manager. (If you did not install NetWare Web Manager or another product that required this service when you installed NetWare 5.1, this option may not be grayed out). Click Next.
7. When the NetWare News Server Settings screen appears, click the check box next to NetWare News Server. A check mark should then appear next to that option. In addition, a grayed-out check mark appears next to NetWare Web Manager. (If you did not install NetWare Web Manager or another product that required this service when you installed NetWare 5.1, this option may not be grayed out). Click Next.

The following three options and make any necessary changes for your company's particular implementation:

• The port for NNTP
• The host name or IP address of the Simple Mail-Transfer Protocol (SMTP) server to be used for e-mail notification of problems with the news server.
• The address to which e-mail alerts should be sent

By default, NNTP will be set to port 119. You should change this setting only if you want to make the server a little
harder to find. Click Next.
8. The NetWare Web Manager Setting screen appears. If you have already installed NetWare Web Manager, you should see two options:

- Keep Current Settings
- Overwrite Current Settings

Unless you need to make changes to the port used by NetWare Web Manager, accept the default option of keeping the current settings, and click Next.

9. A Summary Screen, which includes a list of the products to be installed, appears. You should see NetWare News Server and NetWare Web Manager (even though this particular piece may have already been installed when you first set up the server). Click Finish to install NetWare News Server.

10. A progress screen appears, showing the status of the files being copied from the NetWare 5.1 CD. After all of the files have been copied, a Completed screen appears. Click Close to complete the installation.

Depending on what server hardware you are using, you will need to, at a minimum, reinstall the version of the NetWare Service Pack that was installed on this server to make sure that any files weren’t inadvertently downgraded. You can download NetWare Service Packs from www.novell.com/download. If you are using a Compaq server, you will also need to install the latest Compaq Server Support (SSD) for NetWare to make sure you have the latest drivers for the SCI and network interface cards in the server.

If you are not using a Compaq server, check with your vendor's technical support to see if you will need to install any files after you reinstall the service pack. When this process is completed, you should restart the server to make sure that everything is loading properly.

CONFIGURING NETW ARE NEWS SERVER

You are now ready to start configuring the server and making it available to users. Because NetWare News Server is linked to NetWare Web Manager, you will be able to manage the server from almost any workstation on the network. To be on the safe side, you should use an SSL connection to communicate with NetWare News Server.

Establishing a Secure Relationship

Open a browser window and go to https://server_ip_address:2200. (Replace server_ip_address with the IP address of the server on your company's network.) Port 2200 is the default port for NetWare Web Manager, but you should check this port number before proceeding. You can verify the port number being used by going to the NetWare Web Manager screen on the server and looking for the Port: line on the screen. To the right of that will be the port number on which NetWare Web Manager is listening.

After your browser connects to the server, you should see a screen that indicates you are establishing a secure connection to a server that you don’t currently "trust." To prevent this message from continually appearing, you may want to take a few minutes to import the certificate your browser lists. (You will still be
Figure 1. NetWare News Server allows you to determine who you want to be able to access your company's discussion groups.

Can I Come In?
To begin configuring NetWare News Server, click on the server name under NetWare News Server 3.52. When the NetWare News Server screen appears, you will see a quick status page that indicates whether or not the server is running and what is currently going on with the News Server service, such as the number of posts, number of users, and so on.

Next, decide if your NetWare News Server will be open to everyone who can reach it or just those who have authenticated to the network. Click the Control Access button at the top of the NetWare News Server screen. (See Figure 1.)

When the screen refreshes, you should see the Access Control Options window. By default, when the News Server starts up, Access Control is turned off. As a result, everyone who knows about the server can find the server's IP address or host name in Domain Naming Service (DNS) and will be able to access the server, send posts (the USENET term for sending a message), and see the messages that are currently in each discussion group on the server.

Unless you enable the use of an LDAP server, NetWare News Server will check NDS eDirectory to decide if a particular user is allowed to access the server. By clicking the Access Control option (see Figure 2 on p. 39), you can set up a "closed" news server that will require users to authenticate to NetWare News Server.

The default authentication method is a username and password. Although you have the option of using a Client certificate, you will probably want to use the username and password authentication method until you become more familiar with NetWare News Server.

Receiving Alerts
Because you probably can't continually monitor NetWare News Server, you can rely on its reporting feature to send you a message if something on the server needs attention. To use this feature, click Report at the top of the NetWare News Server screen, and then click Mail Notices on the left side of the screen. Next, enter an e-mail address and either the name or the IP address of an SMTP server that can send the message to the e-mail address.

Two types of e-mail can be sent periodically: news.daily reports and emergency warnings. The news.daily report provides a brief rundown of current disk-space utilization, the number of posts that have been received recently, and an overview of how NetWare News Server is configured. As the name implies, emergency warnings indicate a problem that needs immediate attention.

Establishing Discussion Groups
Before you delve into creating discussion groups, you will need to plan how these groups should be organized to make them easy to manage. You can look at other companies' news servers, such as support-forums.novell.com, to see how they organized their discussion groups.

Organizing Discussion Groups
You can organize discussion groups in one of two ways: You can set up a main category for each company, or if you are a project-driven company, you can set up a main discussion group for each project. Don't worry about creating specific discussion groups for every facet of your company's operation. To keep things simple and manageable, set up discussion groups that address a particular project or category, and let the users or managers of the discussion group dictate when you need to create more specific discussion groups.

Before you name your company's discussion groups, look closely at how other companies name their discussion groups. A general rule is that group names should not include spaces, commas, or periods between the words. (Periods are reserved for separating the group name when you are using a category structure such as company.project, task.)

Setting Up Discussion Groups
After you plan how the discussion groups should be organized, you are ready to start. Click Discussion Groups. When the Manage Discussion Groups screen appears, click OK. Then select the root-level discussion group to create the first discussion group.

You also need to decide whether you want an open or a moderated discussion group. In an open discussion group, anyone can post and read messages. In a moderated group, a moderator reviews the messages before they become public. If the moderator approves the message, it is forwarded to the discussion group and posted. If the moderator does not approve the message, an e-mail message...
is sent to the originator, explaining why the message was not accepted.

Another advantage of having a moderated discussion group is that the moderator can combine messages and posts into a single message, or digest, that is sent out periodically. Digests are beneficial for users who don’t directly participate in the forums on a day-to-day basis but need to know what is happening. Digests are also a good way to archive messages.

If you decide to set up moderated discussion groups, you should choose moderators who are involved with the subject matter being covered by the group. You should also define the time commitment required to be a moderator. Of course, how often the moderator checks for messages is a matter to be decided by that person and his or her immediate supervisor.

Managing Discussion Groups

Depending on the amount of information your discussion groups contain and how long this information will be kept before being deleted, you may want to consider indexing. Indexing allows full-text searching of one or more groups without the users having to read each individual message or header.

Typically, you will set up only one indexer to keep things easy to manage. The indexer is a process that runs periodically on NetWare News Server that facilitates full-text searching of newsgroup posts.

You can set up multiple indexers if a discussion group includes more than 1,000 articles or if messages are being posted every 15 minutes.

If a particular discussion group is somewhat static, you probably don’t need to index it. As a result, you can free resources for more heavily used discussion groups. Keep in mind that if you have a lot of discussion groups and these groups are indexed, you may need to dedicate a server to NetWare News Server.

If you are using NetWare News Server to handle feeding newsgroups from this server to multiple NNTP servers closer to the users, you may want to consider using the Replication feature to have a NetWare News Server at each physical location. This feature offers several benefits:

- WAN traffic is reduced because the same message isn't being downloaded to users at the same location again and again.
- You gain a degree of fault tolerance since users at one location can still post messages to the discussion group even though the "main" news server is down.

You can set up replication in two ways— as peers or as a master-synchronized replication. Setting up the replication as peers allows the servers to accept...
posts locally and to forward the new information between themselves. In master-synchronized replication, the replica maintains the same discussion groups as the master, which includes the article and messaging numbering. Although users can post messages to this server, these messages won't actually be included in the discussion group until the synchronized replica has forwarded the message to the master news server and that message has been sent back to the synchronized replica. The master-synchronized replication may be more attractive to companies that want to host the news service from a central location.

MAINTAINING NETWARE NEWS SERVER

After you get NetWare News Server running, you will learn over time how to interpret the daily reports NetWare News Server sends you. By default, NetWare News Server retains articles, or posted messages, that do not have expiration headers for 10 days. The server then keeps messages in the history file for 14 days.

NetWare News Server will delete a message before that time if the header in the article has the expiration flag set. You can modify settings such as this one by clicking the Expiration button on the NetWare News Server configuration screen. Of course, extending the settings beyond their defaults will have a direct impact on the amount of disk space needed to store the messages for the discussion groups on this server.

You can also create a custom expiration policy for each discussion group, but remember that when you start managing by exceptions, you may add to your administrative work. In addition, you must keep even more detailed records about what you have done to the server so that you can quickly restore the server if a disaster occurs.

RECOVERY

By clicking Advanced Tasks, you can fix some problems without having to recreate everything from scratch. By clicking Advanced Tasks, you can see that you can perform some tasks when the server is up. However, you must stop NetWare News Server to perform other tasks.

You can read the documentation for NetWare News Server for in-depth information about performing each of the available options listed under Advanced Tasks. The documentation for NetWare News Server is included with the NetWare 5.1 Online Documentation CD. You can also find this documentation online at www.novell.com/documentation/lg/nw51/docui/index.html.

CONCLUSION

As you can see, setting up NetWare News Server for your company isn't that difficult. Although this article has just scratched the surface on the ways that you can use NetWare News Server, you can see that it is something that can grow with you. Depending on what exactly you need it to do, NetWare News Server is flexible enough to work the way you need it to work, rather than you having to work the way it does.

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