



Understanding the LDAP Directory

This chapter provides background information and deployment guidelines for using Cisco CallManager with the embedded Lightweight Directory Access Protocol (LDAP) directory. This chapter is written for the administrator of the LDAP directory. If you are not responsible for LDAP administration, you can skip this chapter.

This chapter includes the following topics:

- Cisco CallManager Directory, page 9-1
- Using the Embedded Directory, page 9-2

Cisco CallManager Directory

Cisco CallManager uses an LDAP directory to store authentication and authorization information about telephony application users. Authentication establishes a user's right to access the system, while authorization identifies the telephony resources a user is permitted to use, such as a specific telephone extension.

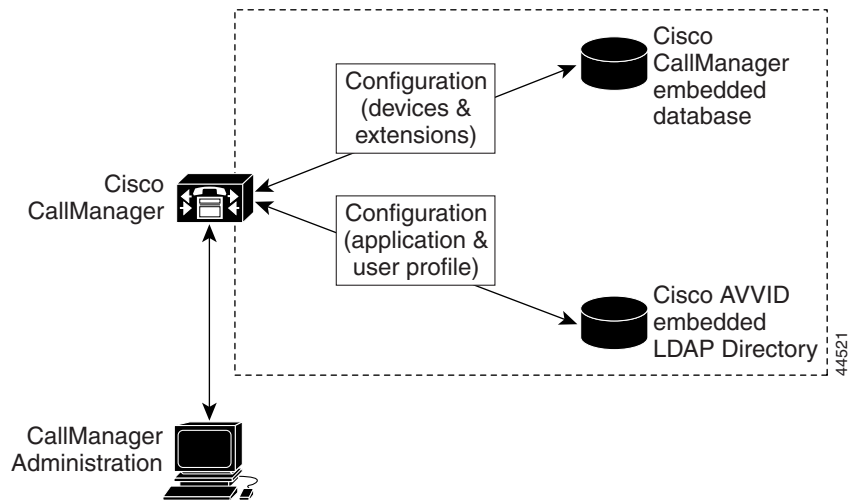
In this section, the term “embedded directory” is used to refer to the directory product that is provided with Cisco CallManager Release 3.0,

The following sections describe how Cisco CallManager works with the embedded directory.

Using the Embedded Directory

Figure 9-1 illustrates how the embedded directory works with the other components of Cisco CallManager.

Figure 9-1 Using the Cisco CallManager Embedded Directory



After the LDAP directory configuration is complete, you can upload completed workflow application files to it. The application server downloads these files to run workflow applications when you use the Administration client to start a specific application. This design allows you to start workflow applications from anywhere in the network, and to run them on application servers throughout the enterprise network.

This chapter describes using the embedded directory in two different situations:

- Scenario 1: Using the Embedded Directory, page 9-3
- Scenario 2: Using the Embedded Directory on a Pilot System, page 9-4

Scenario 1: Using the Embedded Directory

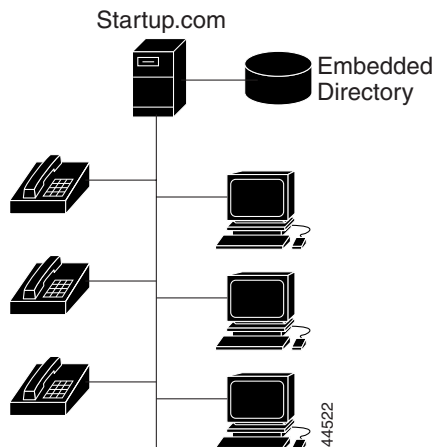
This section describes a scenario in which a small business, Startup.com, implements Cisco CallManager using only the embedded directory. This scenario illustrates the following issues:

- Using the Embedded Directory, page 9-3
- Managing User Entries in the Embedded Directory, page 9-4

Using the Embedded Directory

Startup.com is a fast-growing Internet business that currently has only 20 employees, but plans to add a large number of employees in the coming months. It is implementing Cisco CallManager with the embedded directory.

Figure 9-2 Using the Embedded Directory



In this scenario, the Cisco CallManager administrator does not need to know anything about the LDAP directory, as shown in Figure 9-2.

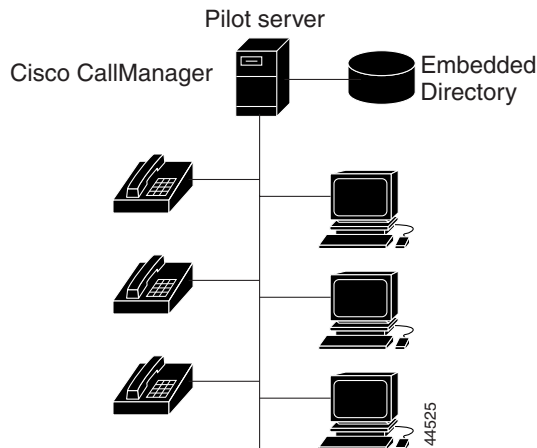
Managing User Entries in the Embedded Directory

The system administrator uses the Cisco CallManager Administrator User pages to manage user information and telephony resources. For more information, see Part 7 of the *Cisco CallManager Administration Guide*.

Scenario 2: Using the Embedded Directory on a Pilot System

Acme Communications is implementing Cisco CallManager on a pilot system, using the embedded directory for testing a deployment of 100 phones with Cisco CallManager and the workflow framework.

Figure 9-3 Using the Embedded Directory for a Pilot System



In this scenario, the administrator creates an LDIF file for adding each pilot user to the embedded directory, as shown in the following example:

Example 9-1 LDIF File for Adding Users to Acme Communication's Pilot System

```
dn: cn=jsmith-CCNProfile, ou=CCN, o=acme.com
changeType: add
cn: jsmith-CCNProfile
objectclass: top
objectclass: ciscoCCNocAppProfile
ciscoatProfileOwner: John Smith
ciscoCCNatAllDevices: false
ciscoCCNatControlDevices: SEP0010EB001801
ciscoCCNatControlDevices: SEP0010EB001B01
ciscoCCNatControlDevices: SEP0010EB003CF0
ciscoCCNatControlDevices: SEP0010EB003EA3
ciscoCCNatControlDevices: SEP0010EB003EC4

dn: cn=jsmith-profile, ou=CCN, o=acme.com
changeType: add
cn: jsmith-profile
objectclass: top
objectclass: ciscoocUserProfile
ciscoatProfileOwner: John Smith
ciscoatAppProfile: cn=jsmith-CCNProfile, ou=CCN, o=acme.com

dn: cn=John Smith, ou=CCN, o=acme.com
changeType: add
cn: John Smith
givenName: John
sn: Smith
mail: jsmith
userPassword: jsmith
objectclass: top
objectclass: inetOrgPerson
objectclass: ciscoocUser
ciscoatUserProfile: cn=jsmith-profile, ou=CCN, o=acme.com
```

Managing Users in the Pilot System

During the pilot phase, the Cisco CallManager administrator can also add or modify users for testing purposes with the Cisco CallManager Administrator User configuration page. This page allows the administrator to enter or change only that information required to manage telephony resources for specific users.

