

ArcIMS® 4.0.1 Installation Guide

Red Hat™ Linux®



Installing ArcIMS 4.0.1 on Linux Red Hat

Copyright © 2003 ESRI

All rights reserved.

Printed in the United States of America.

The information contained in this document is the exclusive property of ESRI. This work is protected under United States copyright law and the copyright laws of the given countries of origin and applicable international laws, treaties and/or conventions. No part of this work may be reproduced or transmitted in any form or by any means, electronic or mechanical, including photocopying and recording, or by any information storage or retrieval system, except as expressly permitted in writing by ESRI. All requests should be sent to Attention: Contracts Manager, ESRI, 380 New York Street, Redlands, CA 92373-8100, USA.

The information contained in this document is subject to change without notice.

U.S. GOVERNMENT RESTRICTED/LIMITED RIGHTS

Any software, documentation, and/or data delivered hereunder is subject to the terms of the License Agreement. In no event shall the U.S. Government acquire greater than RESTRICTED/LIMITED RIGHTS. At a minimum, use, duplication, or disclosure by the U.S. Government is subject to restrictions as set forth in FAR §52.227-14 Alternates I, II, and III (JUN 1987); FAR §52.227-19 (JUN 1987) and/or FAR §12.211/12.212 (Commercial Technical Data/Computer Software); and DFARS §252.227-7015 (NOV 1995) (Technical Data) and/or DFARS §227.7202 (Computer Software), as applicable. Contractor/Manufacturer is ESRI, 380 New York Street, Redlands, CA 92373-8100, USA.

ESRI, ArcExplorer, ArcGIS, ArcIMS, ArcMap, ArcSDE, ArcObjects, the ArcIMS logo, the ArcGIS logo, the ESRI globe logo, @esri.com, and www.esri.com are trademarks, registered trademarks, or service marks of ESRI in the United States, the European Community, or certain other jurisdictions. Microsoft and the Windows logo are registered trademarks and the Microsoft Internet Explorer logo is a trademark of Microsoft Corporation. The Netscape N logo is a registered trademark of Netscape Communications Corporation in the United States and other countries. Other companies and products mentioned herein are trademarks or registered trademarks of their respective trademark owners.

Introduction	1
Overview.....	2
What's included with ArcIMS 4.0.1?.....	2
ArcIMS components	2
ArcIMS Manager	3
ArcIMS Manager Applications	3
ArcIMS Service Administrator	3
ArcIMS Application Server	3
ArcIMS Application Server Connectors	3
ArcIMS Spatial Servers	4
ArcIMS Viewers	5
Five steps to get ArcIMS up and running	6
What you need to get ArcIMS running.....	6
Step 1: Verify that your site meets ArcIMS system requirements	6
Hardware configuration	6
System software	6
Step 2: Determine your ArcIMS site configuration	6
Step 3: Install ArcIMS	6
Step 4: Configure your Web server.....	6
Step 5: Configure ArcIMS	6
Questions, feedback, and information	8
Questions and feedback	8
ArcIMS Knowledge Base	8
Using ArcIMS Help	8
Visit the ESRI home page on the Internet	8
ESRI education solutions.....	8
Installation flowchart	9
Existing users	10
Upgrading Metadata from ArcIMS 4.0 to 4.0.1	10
Upgrading the Gazetteer data from ArcIMS 4.0 to 4.0.1	11
Step 1: Verify that your site meets ArcIMS system requirements	12
Hardware configuration	12
Memory requirements	12
Disk space	12

System software	12
Operating system.....	12
Web server	13
Java Runtime Environment.....	13
ArcIMS Service Administrator requirements	13
Metadata Service requirements	13
Metadata Explorer requirements	14
Web browser for ArcIMS Viewers	14
Font requirement	14
Installing Chinese HKSCS Font.....	14
ArcIMS Application Server Connectors	15
Java Connector.....	15
ArcSDE	15
Metadata users only.....	15
Other users	15
Step 2: Determine your ArcIMS site configuration	16
Choosing an ArcIMS configuration for your system.....	16
Step 3: Install ArcIMS	18
Doing a typical installation	18
Installing ArcIMS	18
Installing ArcIMS custom Application Server Connectors	20
Installing ArcIMS Application Server Connectors	20
ArcIMS Java Connector.....	21
ArcIMS Servlet Connector.....	22
WMS	22
Installing ArcIMS Manager Applications.....	23
Installing ArcIMS Manager Applications.....	23
Installing ArcIMS Service Administrator.....	24
Installing multiple ArcIMS Spatial Servers.....	25
Installing ArcIMS Spatial Server.....	25
Installing Metadata Explorer	27
Installing Metadata Explorer.....	27
Configuring the Z39.50 Connector	29
Loading the Z39.50 specifications	30

Step 4: Configure your Web server	31
Configuring Sun ONE 6.0 (iPlanet).....	31
Setting up your Web server for ArcIMS	31
Creating virtual directories.....	32
Making ArcIMS files available to Web users	32
Using the Diagnostics tool to test your ArcIMS installation	32
Configuring Oracle Application Server 9.0.1 with Apache.....	33
Creating virtual directories.....	33
Making ArcIMS files available to Web users	34
Using the Diagnostics tool to test your ArcIMS installation	34
Configuring ServletExec for Apache.....	34
Creating virtual directories.....	35
Making ArcIMS files available to Web users	35
Using the Diagnostics tool to test your ArcIMS installation	35
Configuring Tomcat 3.2.3 for Apache 1.3.20.....	36
Setting up your Web server for ArcIMS	36
Creating virtual directories.....	36
Making ArcIMS files available to Web users	37
Using the Diagnostics tool to test your ArcIMS installation	37
Configuring WebLogic 6.1	38
Making ArcIMS files available to Web users	39
Using the Diagnostics tool to test your ArcIMS installation	39
Configuring WebSphere 4.0.2 for IBM HTTP Server.....	39
Creating virtual directories.....	39
Configuring ArcIMS Servlet Connector	40
Making ArcIMS files available to Web users	41
Using the Diagnostics tool to test your ArcIMS installation	41
Configuring your Web server for ArcIMS Service Administrator	41
Configuring Sun ONE 6.0 (iPlanet) for ArcIMS Service Administrator	42
Configuring Oracle Application Server 9.0.1 for ArcIMS Service Administrator	42
Configuring ServletExec for Apache for ArcIMS Service Administrator	43
Configuring Tomcat 3.2.3 for Apache 1.3.20 for ArcIMS Service Administrator	44
Configuring WebLogic 6.1 for ArcIMS Service Administrator	45
Configuring WebSphere 4.0.2 for ArcIMS Service Administrator.....	45
Setting up ArcSDE UNIX and Linux Servers for ArcIMS Service Administrator	46
Introduction.....	46
Background	46
Setting up the ArcSDE Server.....	47

Configuring your Web server for ArcIMS Metadata Explorer.....	48
Configuring Sun ONE 6.0 (iPlanet) for Metadata Explorer.....	48
Configuring Oracle Application Server 9.0.1 for Metadata Explorer.....	49
Configuring ServletExec for Apache for Metadata Explorer.....	50
Configuring Tomcat 3.2.3 for Apache 1.3.20 for Metadata Explorer.....	51
Configuring WebLogic 6.1 for Metadata Explorer.....	51
Configuring WebSphere 4.0.2 for Metadata Explorer.....	52
Step 5: Configure ArcIMS.....	53
Setting up your ArcIMS account.....	53
Using ArcIMS with a proxy server.....	54
Starting the ArcIMS processes.....	54
Running ArcIMS.....	55
Troubleshooting.....	56
Uninstalling ArcIMS 4.0.1.....	59
Installing ArcIMS Viewer.....	60
Installing ArcIMS Viewer on HP-UX.....	61
Setting up the ArcIMS Host computer on UNIX/Linux.....	61
Installing JRE 1.3 or higher on a remote HP-UX computer.....	61
Internet clients only.....	61
Internet and Intranet clients.....	61
Installing ArcIMS Viewer on a remote HP-UX computer.....	62
Internet clients only.....	62
Intranet clients only.....	62
Setting up ArcExplorer—Java Edition on a remote UNIX/Linux computer.....	63
Intranet and Internet clients.....	63
Installing ArcIMS Viewer on IBM AIX.....	64
Setting up the ArcIMS Host computer on UNIX/Linux.....	64
Installing JRE 1.3 or higher on a remote IBM AIX computer.....	64
Internet clients only.....	64
Internet and Intranet clients.....	64
Installing ArcIMS Viewer on a remote IBM AIX computer.....	65
Internet clients only.....	65
Intranet clients only.....	66
Setting up ArcExplorer—Java Edition on a remote UNIX/Linux computer.....	66
Intranet and Internet clients.....	66
Installing ArcIMS Viewer on Linux Red Hat.....	67
Setting up the ArcIMS Host computer on UNIX/Linux.....	67
Installing JRE 1.3 or higher on a remote Linux Red Hat computer.....	67
Internet clients only.....	67
Internet and Intranet clients.....	67
Installing ArcIMS Viewer on a remote Linux Red Hat computer.....	68

Installing ArcIMS 4.0.1 on Linux Red Hat

Internet clients only.....	68
Intranet clients only.....	69
Setting up ArcExplorer—Java Edition on a remote UNIX/Linux computer	69
Intranet and Internet clients.....	69
Installing ArcIMS Viewer on Microsoft Windows	70
Installing ArcIMS Viewer on Internet Explorer 5.0 on Microsoft Windows	70
Uninstalling ArcIMS Viewer	71
Installing ArcIMS Viewer on Internet Explorer 5.5 or 6.0 on Microsoft Windows	71
Uninstalling ArcIMS Viewer	72
Installing ArcIMS Viewer on Netscape 4.75 or 6 on Microsoft Windows.....	72
Uninstalling ArcIMS Viewer	73
Installing ArcIMS Viewer on SGI IRIX.....	74
Setting up the ArcIMS Host computer on UNIX/Linux	74
Installing JRE 1.3.1 on a remote SGI IRIX computer	74
Internet clients only.....	74
Internet and Intranet clients.....	74
Installing ArcIMS Viewer on a remote SGI IRIX computer	75
Internet clients only.....	75
Intranet clients only.....	75
Setting up ArcExplorer—Java Edition on a remote UNIX/Linux computer	76
Intranet and Internet clients.....	76
Installing ArcIMS Viewer on Sun Solaris	77
Setting up the ArcIMS Host computer on UNIX/Linux	77
Installing JRE 1.3 or higher on a remote Sun Solaris computer	77
Internet clients only.....	77
Internet and Intranet clients.....	77
Installing ArcIMS Viewer on a remote Sun Solaris computer.....	78
Internet clients only.....	78
Intranet clients only.....	79
Setting up ArcExplorer—Java Edition on a remote UNIX/Linux computer	79
Intranet and Internet clients.....	79
Setting up the ArcIMS Host computer on UNIX/Linux	80
Setting up ArcExplorer—Java Edition on a remote UNIX/Linux computer	80
Intranet and Internet clients.....	80
Configuring Sun ONE 6.0 (iPlanet) for ArcIMS Viewer.....	81

Introduction

ESRI® ArcIMS® is Internet Map Server (IMS) software for authoring, designing, publishing, and administering Internet mapping applications. ArcIMS allows Web clients, map servers, data servers, and the Web server to communicate with one another.

Use this guide to get ArcIMS up and running. If you are new to ArcIMS, start with the typical installation for your platform. Once you are familiar with ArcIMS, use this guide to help you figure out your site configuration and install ArcIMS on a distributed system.

This book assumes you have a Web server and servlet engine installed and operational and know how to administer the Web server, stop and start services/daemons, and create virtual directories. It also assumes knowledge of the Internet and related terminology.

Overview

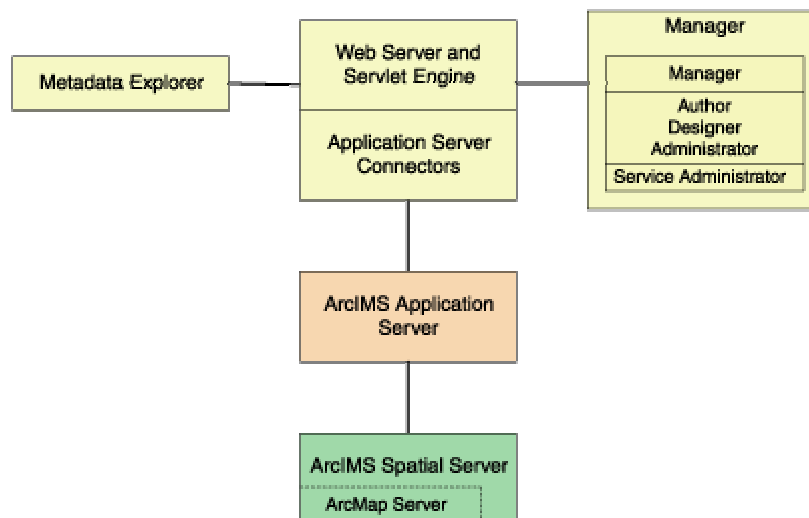
What's included with ArcIMS 4.0.1?

- The installation CD with ArcIMS software. See *Using ArcIMS* for details on working with ArcIMS. To find out about ArcIMS customization, see *Customizing ArcIMS*, a five-book series you can install with the software. The *ArcXML Programmer's Reference Guide*, a programming guide for customizing map configuration files, is also included with the software. For a printable version of *Installing ArcIMS*, see ArcOnline at <http://support.esri.com> for an Adobe® Portable Document Format (PDF) for your platform. The free Adobe Acrobat Reader® software can be downloaded from www.adobe.com.
- ArcExplorer™—Java™ Edition is included with ArcIMS and is documented in *Using ArcExplorer—Java Edition*.
- ArcSDE® for Coverages is included with ArcIMS and comes with two digital documents: *Installing ArcSDE for Coverages* and *ArcSDE for Coverages Administration Guide*. ArcSDE for Coverages can be used without any special licenses or keycodes. Refer to the ArcSDE for Coverages CD for information. Installing ArcSDE for Coverages is optional.
- ServletExec 4.1.1 is included on the ArcIMS CD under the ServletExec folder for all supported platforms except SGI® IRIX®. See the ServletExec readme and the ServletExec installation guide for information on installing ServletExec.

ArcIMS components

ArcIMS is made up of:

- ArcIMS Manager/Manager Applications
- ArcIMS Service Administrator
- ArcIMS Application Server
- ArcIMS Application Server Connectors
- ArcIMS Spatial Servers
- ArcIMS Viewers



Installing ArcIMS 4.0.1 on Linux Red Hat

Each component is described in the following paragraphs.

See the discussion of architecture in *Using ArcIMS* for more detailed information on ArcIMS components.

ArcIMS Manager

The ArcIMS Manager provides the Web-based interface and supports the three main tasks you perform in ArcIMS—author ArcIMS Services, design Web pages, and administer sites. As a Web interface, ArcIMS Manager also allows remote site management.

ArcIMS Manager resides on the Web server computer and can be accessed remotely via the Internet using the Microsoft® Internet Explorer Web browser. Remote access to ArcIMS Manager requires a one-time Remote Manager download to the remote computer. See Installing ArcIMS Remote Manager for instructions regarding Remote Manager.

ArcIMS Manager is supported only on Windows® using Internet Explorer. It is not supported on HP®-UX®, IBM® AIX®, Linux® Red Hat®, SGI® IRIX®, or Sun™ Solaris™, and it is not supported on Windows using Netscape Communicator™. This is because Netscape Communicator does not currently support scripting of applets—a feature that is critical for ArcIMS Manager.

ArcIMS Manager Applications

The ArcIMS Manager Applications—Author, Designer, and Administrator—are also provided as independent applications that run outside a Web browser. They can be installed on any computer.

ArcIMS Service Administrator

The ArcIMS Service Administrator is a remote site administration tool and can be used as an alternative to or in conjunction with ArcIMS Administrator. The ArcIMS Service Administrator can also be used to administer ArcSDE. To administer ArcSDE on Windows, a custom installation of the optional ArcSDE Administrator component on the ArcSDE Server is required; on UNIX, a custom installation of ArcIMS Spatial Server is required on the ArcSDE Server. The ArcIMS Service Administrator uses the JavaServer™ Pages (JSP) tag libraries and the Java API (application program interface) of the ArcIMS Java Connector.

The ArcIMS Service Administrator is installed with a typical installation and a custom Spatial Server installation on Windows and with a typical installation and ArcIMS Manager Applications installation on UNIX.

See *Using ArcIMS*, "Using ArcIMS Service Administrator," for details on using ArcIMS Service Administrator.

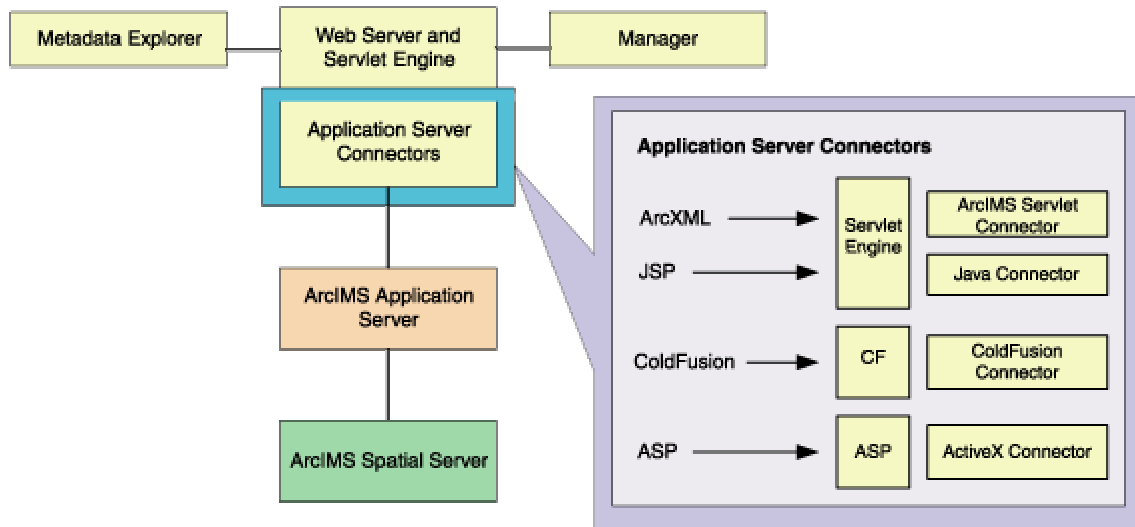
ArcIMS Application Server

The ArcIMS Application Server handles the incoming requests and tracks which ArcIMS Services are running on which ArcIMS Spatial Servers. The ArcIMS Application Server hands off a request to the appropriate Spatial Server. The Application Server is written as a Java application and runs as a Windows service or a daemon process (on UNIX®/Linux). It may reside on any computer.

ArcIMS Application Server Connectors

The ArcIMS Application Server Connectors are used to connect the Web server to the ArcIMS Application Server. Each instance of a connector is dedicated to one Web server and must be installed on the same computer as the Web server; however, a single Web server can support several connectors.

Installing ArcIMS 4.0.1 on Linux Red Hat



The ArcIMS Servlet Connector is the standard connector used for ArcIMS, and it supports the Open GIS Consortium (OGC) Web Map Service (WMS) 1.1.0 implementation specification. It uses the ArcIMS language, ArcXML, to communicate from the Web server to the ArcIMS Application Server. The ArcIMS Servlet Connector provides Map Service-level user password authentication. You need the ArcIMS Servlet Connector to administer your ArcIMS site and to author and design ArcIMS Web pages.

In addition to the ArcIMS Servlet Connector, you can use the following connectors to link the Web server to the ArcIMS Application Server:

- ColdFusion® Connector
- ActiveX® Connector
- Java Connector

The ColdFusion and ActiveX connectors work with custom clients and translate their own languages into ArcXML. The ArcIMS Java Connector communicates with the ArcIMS Application Server via a Java application or JSP client. Samples can be installed with the software. For more information on these custom connectors, see the Customizing ArcIMS series.

The ArcIMS Java Connector runs on Windows and UNIX/Linux, the ColdFusion Connector runs on Windows and Solaris, and the ActiveX Connector runs on Windows only. If you install these connectors, the ArcIMS Servlet Connector must also be installed on your system for the custom connectors to communicate with ArcIMS.

After installation, see ArcIMS Servlet Connector in ArcIMS Help for information on the ArcIMS Servlet Connector and WMS. See *Customizing ArcIMS—ColdFusion Connector* for information on using the ColdFusion Connector. See *Customizing ArcIMS—ActiveX Connector* for information on using the ActiveX Connector. For JSP Connector information, see *Customizing ArcIMS—Java Connector*.

ArcIMS Spatial Servers

The ArcIMS Spatial Server is the backbone of ArcIMS. ArcIMS Spatial Servers process requests for maps and related information and serve the data to the client. For ArcIMS Metadata Service, ArcGIS™ and ArcSDE are required.

For ArcMap™ Server, ArcGIS and ArcObjects™ runtime files are required; ArcMap Server only runs on Windows platforms. ArcIMS Spatial Servers run on a Windows NT® Server, Windows NT Workstation, Windows 2000, Windows XP, or UNIX/Linux. A graphics card is not required.

Note: ArcMap Server installs the ArcObjects runtime files. ArcGIS cannot reside on the same computer as the ArcObjects runtime files; therefore, ArcGIS cannot reside on the same computer as ArcMap Server.

Installing ArcIMS 4.0.1 on Linux Red Hat

ArcIMS Viewers

ArcIMS provides client-side viewers:

- ArcIMS HTML Viewer
- ArcIMS Java Viewer
- Metadata Explorer

The ArcIMS Viewers determine the functionality and graphical look of your Web site. The viewer is what appears in the Web browser when someone accesses your Web site.

The Java Viewers require a one-time ArcIMS Viewer download to the client user's computer and are only compatible with Web browsers that support Java plug-in functionality. See *Installing ArcIMS Viewer* for instructions regarding the Java client download.

The Metadata Explorer can only be used to view metadata from an ArcIMS Metadata Service. See *Creating and Using Metadata Services* for information on Metadata Explorer.

Five steps to get ArcIMS up and running

There are five steps required to get ArcIMS running:

1. Verify that your site meets ArcIMS system requirements.
2. Determine your ArcIMS site configuration.
3. Install ArcIMS.
4. Configure your Web server.
5. Configure ArcIMS.

These steps are outlined below.

For the latest requirements or for any changes to the Installation Guide, see the Readme.html file on the ArcIMS Web Site at <http://support.esri.com>.

What you need to get ArcIMS running

Step 1: Verify that your site meets ArcIMS system requirements

Hardware configuration

- Memory requirements
- Disk space

System software

- Operating system
- Web server
- Servlet engine
- Java Runtime Environment (JRE)
- Web browser

Step 2: Determine your ArcIMS site configuration

- ArcIMS Typical Configuration—All on a single computer
- ArcIMS Custom Configuration—ArcIMS Application Server Connectors
- ArcIMS Custom Configuration—ArcIMS ArcMap Server (Windows only)
- ArcIMS Custom Configuration—ArcIMS Manager Applications
- ArcIMS Custom Configuration—ArcIMS Spatial Servers
- ArcIMS Custom Configuration—Metadata Explorer

Step 3: Install ArcIMS

Step 4: Configure your Web server

- Configure your Web server and servlet engine.
- Create virtual directories.

Step 5: Configure ArcIMS

- Set environment parameters.

Installing ArcIMS 4.0.1 on Linux Red Hat

See the installation flowchart for your platform for an overview of the steps required to get ArcIMS running:

- HP-UX
- IBM AIX
- Linux Red Hat
- Microsoft Windows
- SGI IRIX
- Sun Solaris

Questions, feedback, and information

Questions and feedback

ArcIMS Help provides information on how to contact ESRI Technical Support with questions or comments.

All questions and comments should be forwarded to ESRI Technical Support.

- Phone 909-793-3774
- Fax 909-792-0960
- E-mail support@esri.com
- Hours 6:00 a.m. to 6:00 p.m. Pacific time, Monday through Friday, except ESRI holidays. If you are outside the United States, please contact your local ESRI distributor.

ArcIMS Knowledge Base

The ArcIMS Knowledge Base is a database that contains:

- Frequently Asked Questions
- How To instructions
- Troubleshooting tips
- Error messages

You can search the Knowledge Base using keywords, or you can browse through folders that contain information on different topics relating to ArcIMS.

You can access the ArcIMS Knowledge Base from ArcOnline at <http://support.esri.com>.

Using ArcIMS Help

If you need more information about a specific topic or procedure, use ArcIMS Help from within ArcIMS. You can locate what you need by searching the table of contents, finding terms in the index, or finding the number of times a term appears in a section.

Visit the ESRI home page on the Internet

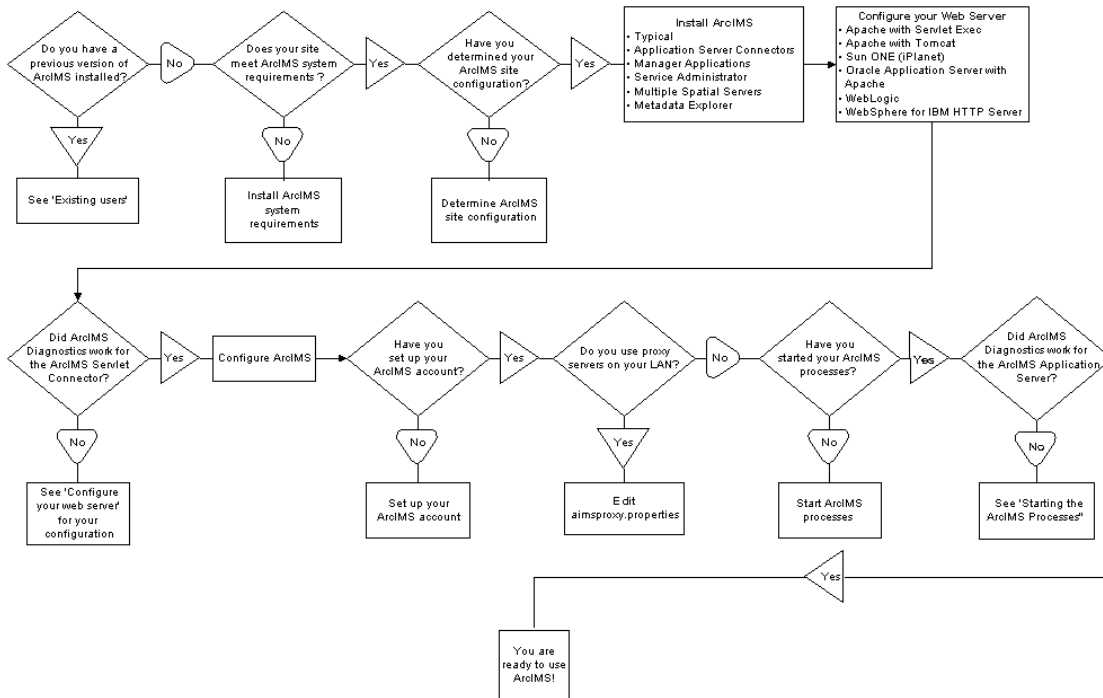
Visit the ESRI home page at www.esri.com for up-to-date information on ESRI software and services. It is an invaluable resource in helping you expand your understanding of geographic information system (GIS) technology and Internet mapping.

Visit the ArcIMS home page at www.esri.com/software/arcims for the latest information about ArcIMS including a showcase of ArcIMS-enabled Web sites.

ESRI education solutions

ESRI provides educational opportunities related to geographic information science, GIS applications, and technology. You can choose among instructor-led courses, Web-based courses, and self-study workbooks to find education solutions that fit your learning style and pocketbook. For more information, go to www.esri.com/education.

Installation flowchart



Existing users

ArcIMS 4.0.1 users need to be aware of the following conflicts if your system has ArcIMS 4.0 installed:

- ArcIMS 4.0.1 creates a new directory named ArcIMS when installed. It is possible to have both ArcIMS 4.0 and ArcIMS 4.0.1 on the same system. However, there are many areas that can cause problems, and it is recommended that you run only one version of ArcIMS on your computer. See Uninstalling ArcIMS 4.0 for details.
- Java 2 Platform Standard Edition (J2SE) JRE 1.3 or higher is required for ArcIMS 4.0.1.
- See ArcIMS System Requirements at <http://arconline.esri.com/arconline/sysreqs.cfm?PID=6> for Web servers and servlet engines supported for ArcIMS 4.0.1.

See "What's new with ArcIMS" in ArcIMS Help for information on the differences between ArcIMS 4.0 and ArcIMS 4.0.1.

Upgrading Metadata from ArcIMS 4.0 to 4.0.1

Your Metadata Service utilizes ten tables in your relational database to store all metadata documents published to your service. At ArcIMS 4.0.1, the schema of some of these tables has changed to improve searching performance. Because of this change, you'll need to update the metadata tables in the database before starting your Metadata Service in ArcIMS 4.0.1. Don't worry. Performing this update will not delete any metadata documents published to your metadata database.

Follow the steps below to upgrade the tables.

1. Uninstall ArcIMS 4.0.
2. In ArcCatalog, connect to your database using the same connection information specified in your Metadata Service configuration file (e.g., MetadataService.axl).
3. Locate and delete the following four tables in the database. Deleting these tables will not delete any metadata documents published to your Metadata Service.
 - ImsmetadataTags
 - ImsmetadataValues
 - ImsmetadataWords
 - ImsmetadataWordindex

If you changed the table name prefix in your Metadata Service configuration file from the default value of Imsmetadata, your table names will be slightly different. Your tables will be named with your prefix instead of Imsmetadata, for example, <table_name_prefix>Tags, <table_name_prefix>Values and so on.

4. Install ArcIMS 4.0.1.
5. Start your Metadata Service. Your Metadata Service will start automatically if it was previously created and saved in the site startup file (ArcIMSSite.sez).
6. Run the indexing command, aimsmetaindx, with the indexAll option. This command is located in <ArcIMS Installation Directory>/Metadata/Commands. For information on how to run this command, see the section titled "Indexing metadata documents" in Chapter 3 of Creating and Using Metadata Services.

Note: If you've already installed ArcIMS 4.0.1 but didn't delete the four database tables in Step 2 and 3 above, your existing Metadata Service will not start. Simply follow Steps 2 through 6 above and skip Step 4.

Upgrading the Gazetteer data from ArcIMS 4.0 to 4.0.1

The Gazetteer data distributed for use with Metadata Explorer has been upgraded for use with ArcIMS 4.0.1. If you had previously installed the Gazetteer data and imported the data into ArcSDE, you will need to delete the Gazetteer data from your database and reload it. The Gazetteer data has not changed except to implement the new database schema required for any Metadata Service.

If you attempt to start your Gazetteer Service at 4.0.1 and have not reloaded the new Gazetteer data, the service will not start. Follow the steps below to remove the Gazetteer data from your database.

1. Uninstall ArcIMS 4.0.
2. In ArcCatalog, connect to your database using the same connection information specified in your Gazetteer configuration file (e.g., Gazetteer.axl).
3. Locate and delete the following ten tables in the database:
 - Gazetteer
 - GazetteerDeleted
 - GazetteerDeletedRel
 - GazetteerRelationships
 - GazetteerThumbnails
 - GazetteerTags
 - GazetteerUsers
 - GazetteerValues
 - GazetteerWords
 - GazetteerWordIndex
4. Install ArcIMS 4.0.1.
5. Load the Gazetteer data using the import scripts. See the topic called "Loading the Gazetteer data" in Appendix A of *Creating and Using Metadata Services*.
6. Start your Metadata Service based on the Gazetteer data.

Note: If you've already installed ArcIMS 4.0.1 but didn't delete the Gazetteer data in Step 2 and 3 above, your existing Gazetteer Service will not start. Simply follow Steps 2 through 6 above and skip Step 4.

Step 1: Verify that your site meets ArcIMS system requirements

The ArcIMS Manager Applications—Author, Designer, and Administrator—must be installed together on one computer. They don't need to be installed on the Web server. ArcIMS Manager is not available on Linux due to limitations of Web browsers for Linux.

Hardware configuration

Memory requirements

This can be a combination of disk-backed memory and physical memory:

- Manager Applications: 64 MB of RAM recommended
- ArcIMS Application Server: 256 MB of RAM recommended
- ArcIMS Spatial Server: 256 MB of RAM recommended per CPU
- HTML Viewers: 64 MB of RAM recommended
- Java Viewers and ArcExplorer—Java Edition: 128 MB of RAM recommended
- All components: 256 MB of RAM recommended per CPU

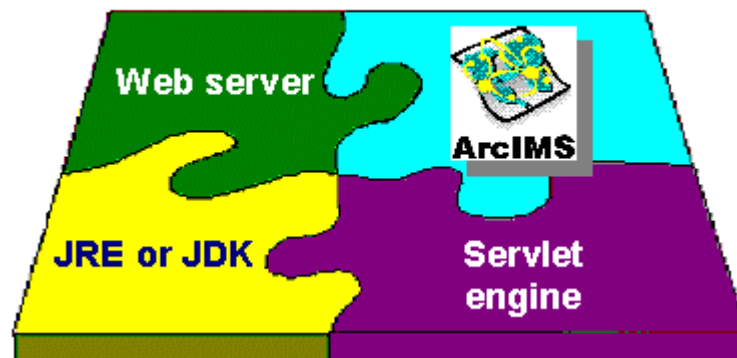
Disk space

The disk space requirement for all ArcIMS components is 602 MB.

For current information, see the ArcIMS installation program on the CD.

System software

The following system software is required to run ArcIMS.



Operating system

- Linux Red Hat 7.1

Note: For international users ESRI recommends Linux Red Hat 7.2.

Note: ESRI recommends that you execute ArcIMS from a C shell. The instructions in this installation document are for a C shell environment setup only.

Note: The X Window System must be installed. X Window is usually installed by default with the operating system.

Installing ArcIMS 4.0.1 on Linux Red Hat

Web server

ArcIMS works in conjunction with Web server software, so a Web server must be installed and operational in order to start serving maps.

System administration access to the Web server computer is necessary, and knowing how to stop and start your Web server is mandatory.

ArcIMS is fully supported on the following Web servers:

- Apache Web Server for Linux with Jakarta–Tomcat as its servlet engine (hereafter referred to as Tomcat)
- Apache Web Server for Linux with ServletExec™ as its servlet engine
- Sun™ ONE 6.0 (iPlanet™) Web Server for Linux using its native Java servlet engine
- IBM HTTP Server with WebSphere® as its servlet engine
- Oracle® Application Server
- WebLogic®

The servlet engine must use Java Runtime Environment (J2SE JRE) or Java 2 Software Development Kit (J2SE SDK) 1.3 or higher.

See ArcIMS System Requirements at <http://arconline.esri.com/arconline/sysreqs.cfm?PID=6> for other Web servers and their ESRI support level.

Java Runtime Environment

Java Runtime Environment 1.3 or higher is a prerequisite for installing ArcIMS. J2SE JRE 1.4 will be installed under: <ArcIMS Installation Directory>/jre.

1. Create an environment variable for the J2SE JRE. It can point to the J2SE JRE installed under ArcIMS or anywhere J2SE JRE is installed. Add the following line to your .login or .cshrc file:

```
setenv JAVA_HOME <JRE Installation Directory>
```

Make sure the \$JAVA_HOME/bin is in the PATH variable

2. Verify that you have the correct J2SE JRE running by typing:

```
java -version
```

For example, Linux Red Hat 7.1 should return the following if you set your JAVA_HOME to <ArcIMS Installation Directory>/jre:

```
Java version "1.4.0"
```

```
Java 2 Runtime Environment, Standard Edition (build 1.4.0-b92)
```

```
Java Hotspot™ Client VM (Build 1.4.0-b92 mixed mode)
```

ArcIMS Service Administrator requirements

The following software is required to use the ArcIMS Service Administrator:

- Java 2 Software Development Kit (J2SE SDK) from <http://java.sun.com>

Metadata Service requirements

The following software is required to use the ArcIMS Metadata Service:

- ArcGIS 8.3
- ArcSDE 8.3

Installing ArcIMS 4.0.1 on Linux Red Hat

Metadata Explorer requirements

The following software is required to use the Metadata Explorer:

- Java 2 Software Development Kit (J2SE SDK) from <http://java.sun.com>

Web browser for ArcIMS Viewers

- HTML Viewer: Netscape Communicator 4.76 or 6.0 and higher

The Java Viewer requires that a one-time download including the Java 2 plug-in and ArcIMS Viewer Download be installed.

- Java Standard Viewer: Netscape Communicator 4.76 or 6.0 and higher

The Java Custom Viewer doesn't run in Netscape Communicator.

Note: See ArcOnline at <http://support.esri.com> for the latest support information.

Note: All Web pages created on Linux can be viewed on Windows. See ArcOnline at <http://support.esri.com> for Web browser requirements on Windows.

Font requirement

ArcIMS components other than the Application Server and Connectors require TrueType fonts.

Note: This is required. ArcIMS will not function properly unless the fonts are installed.

1. Copy the following fonts.
 - LucidaBrightRegular.ttf
 - LucidaSansRegular.ttf
 - LucidaTypewriterRegular.ttf

Note: These fonts will be installed with ArcIMS at <ArcIMS installation directory>/jre/lib/fonts. You can execute the Font requirement steps after installing ArcIMS.

2. Put these fonts in the following directory:

/usr/lib/X11/fonts/TrueType

Note: You might need to create the TrueType directory if it does not exist.

3. Register the fonts with the X Font Server:

```
su
```

```
cd /usr/lib/X11/fonts/TrueType
```

```
ttmkfdir -d . -o fonts.scale
```

```
cp fonts.scale fonts.dir
```

```
chkfontpath -a /usr/lib/X11/fonts/TrueType
```

Installing Chinese HKSCS Font

ESRI includes ZYSongHKSCS TrueType font on the ArcIMS 4.0.1 CD. This font contains Traditional Chinese (which are regular Traditional Chinese and HKSCS characters) and Simplified Chinese characters.

Font Installation procedure:

1. Copy ZYSongHKSCS5.ttf from \$AIMSHOME/fonts into the following font path:

/usr/lpp/X11/lib/X11/fonts/TrueType

Installing ArcIMS 4.0.1 on Linux Red Hat

2. Modify font.properties file for this ZYSongHKSCS font that is located in: <JREHOME>/lib or <JAVA_HOME>/lib by following the instructions at: <http://java.sun.com/j2se/1.3/docs/guide/intl/fontprop.html>

ArcIMS Application Server Connectors

ArcIMS Application Server requires the following optional software if you will be creating custom Viewers using JSP:

Java Connector

- Java 2 Software Development Kit (J2SE SDK) 1.3.x

For Java Connector information, see *Customizing ArcIMS—Java Connector*.

ArcSDE

Metadata users only

- ArcSDE 8.3

Other users

- ArcSDE 8.0.x, ArcSDE 8.1.x, ArcSDE 8.2, or ArcSDE 8.3
- ArcSDE for Coverages 8.0.x, ArcSDE for Coverages 8.1.x, ArcSDE for Coverages 8.2, or ArcSDE for Coverages 8.3

Once you have the required software, see Step 2: Determine your ArcIMS site configuration.

Step 2: Determine your ArcIMS site configuration

Choosing an ArcIMS configuration for your system

ArcIMS provides the mechanism to allow ArcIMS Spatial Servers, ArcIMS Application Servers, and the Web server to communicate with one another to serve maps and data over the Internet to client Web browsers. An ArcIMS site consists of one or more computers that host the Web server, ArcIMS Application Server, ArcIMS Spatial Server, and data.

There are many possible ArcIMS site configurations. Some sites run all ArcIMS components on a single computer, and some are composed of multiple computers. The only requirement in a multiple computer environment is that you must install the ArcIMS Application Server Connectors and Manager (Windows) on the same computer as the Web server.

Configurations will vary depending on the available computing resources and the mapping services provided. For ArcIMS Spatial Servers, processing speed and the ability to handle the load are important. Will the Services perform process-intensive functions or create basic map displays? How many services will be running at one time? Will the Web server computer be dedicated to the Web site or used for other purposes as well? Answers to these questions will assist in ArcIMS site configuration planning.

Configure an ArcIMS Web site based on the anticipated number of users visiting the site and the number of maps generated each day. For example, a Web site with very few anticipated users, averaging 100 to 1,000 maps per day, could run from one computer. A high-volume Web site, with 100,000 to 1,000,000 maps per day, should be distributed to multiple ArcIMS Spatial Server computers.

The ArcIMS typical installation installs all standard components on one computer. ArcIMS also supports custom configurations for multiple ArcIMS Spatial Servers, ArcIMS Application Server Connectors, and Manager Applications.

The advantages of these different installation options are listed below.

Advantages of Different ArcIMS Installation Options	
Typical (ArcIMS on one computer)	<ul style="list-style-type: none">• Limited computer resources.• Quick and easy way to learn ArcIMS.• Light Web site usage.• Remotely access ArcIMS Manager using Microsoft Internet Explorer Web browser (Windows only).
Multiple ArcIMS Spatial Servers	<ul style="list-style-type: none">• Expand configuration.• Add processing capabilities.• Heavy Web site usage.
ArcIMS Manager Applications	<ul style="list-style-type: none">• Access ArcIMS functions without needing Internet Explorer Web browser.• Solution for environments where Internet Explorer isn't available and for advanced users.

Installing ArcIMS 4.0.1 on Linux Red Hat

Application Server Connectors	<ul style="list-style-type: none">• Customize Web pages using JSP.
Metadata Explorer	<ul style="list-style-type: none">• View metadata from an ArcIMS Metadata Service.

When you have determined your site configuration, see Step 3: Install ArcIMS.

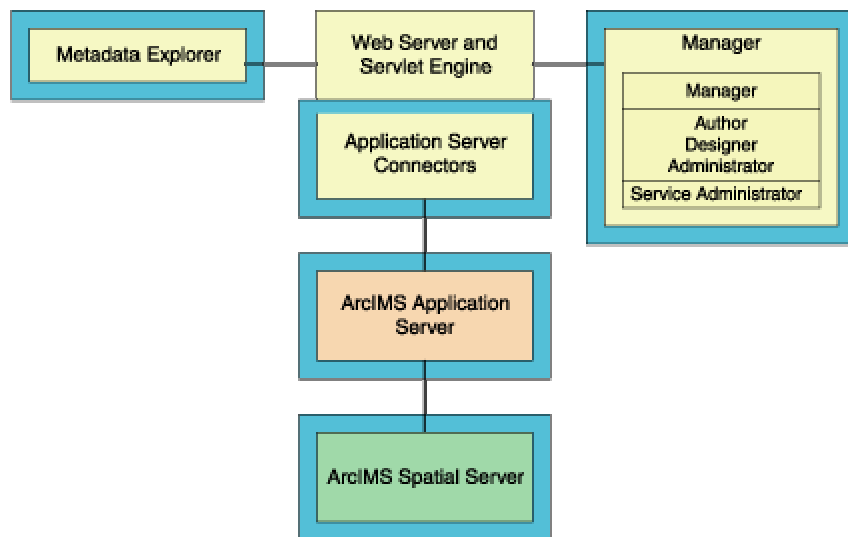
Step 3: Install ArcIMS

Choose the installation steps for your configuration:

- Doing a typical installation
- Installing ArcIMS custom Application Server Connectors
- Installing ArcIMS Manager Applications
- Installing ArcIMS Service Administrator
- Installing multiple ArcIMS Spatial Servers
- Installing Metadata Explorer

Doing a typical installation

In this scenario, your Web site uses the resources of one computer; Web server software and ArcIMS applications are installed on the same computer. This configuration is useful for those with limited resources or light server loads. See Overview for details on ArcIMS components.



Installing ArcIMS

Linux Red Hat 7.1 automatically mounts the CD.

Note: Make sure that the user account that installs ArcIMS has write permissions to the installation directory.

Note: For security reasons, don't install ArcIMS as super user. ESRI recommends that you create a separate user account for installing and administering ArcIMS.

The "install" command has four options:

Usage: install <-help | -load | -remove | -verify >

Type "install -help" to read more about the installation procedure.

1. To start ArcIMS installation, type the following command from anywhere on your system:

Installing ArcIMS 4.0.1 on Linux Red Hat

```
% /mnt/cdrom/ArcIMS/install -load
```

This will start the command-driven dialog for the ArcIMS software installation procedure. Default selections are noted in brackets []. To obtain a list of options or online help, type "?" at any prompt. You can quit the installation procedure at any time by typing "quit" or "q". To return to a previous question, type the caret "^". Before continuing with the installation you will be asked to read the license agreement and accept it, or exit if you don't agree with the terms. The default is set to "no" and you have to type "yes" to proceed with the installation. Please read the license agreement file appropriate for your locale. The license agreement files are in Adobe Acrobat PDF format and are located at <http://www.esri.com/licenseagreement>. The English version can be found on the CD at /cdrom/license. ESRI is willing to license the software to you only if you accept and agree to the license agreement. If you have read and agree with the terms in the license agreement type "yes" to continue the installation process; if not press <Return> or type "no" to exit installation process.

2. At the Enter CD mount point: [/mnt/cdrom/ArcIMS] prompt, type the location and press <Return>.
3. At the Enter pathname to install directory prompt, type the path to where you want ArcIMS installed on your system. The ArcIMS version and date display.
4. At the ArcIMS Application Server Package numbers to load: [all] prompt, press <Return> to accept the default and install all packages.
5. At the ArcIMS Application Server Connectors Package numbers to load: [none] prompt, type "?" to display a list of available packages. Type the numbers of the packages you want to install, type "all" to load all packages, or press <Return> to accept the default and load no packages.

Note: For ArcIMS to function, you need to install the ArcIMS Application Server and at least one connector.

6. At the ArcIMS Manager Applications Package numbers to load: [all] prompt, press <Return> to accept the default and install all packages.
- Note:** You must choose [all] to run ArcIMS Author, ArcIMS Administrator, and ArcIMS Designer.
7. At the ArcIMS Spatial Server Software Package numbers to load: [all] prompt, press <Return> to accept the default and install all packages.
 8. At the ArcIMS Metadata Explorer/Gazetteer Data Package numbers to load: [all] prompt, press <Return> to accept the default and load all packages.
 9. At the ArcIMS Sample Applications and Data Package numbers to load: [none] prompt, type "?" to display a list of available packages. Type the numbers of the packages you want to install, type "all" to load all packages, or press <Return> to accept the default and load no packages.

Note: If you install any Sample packages, you need to install the Tutorial Data package.

The Package selection complete message and a list of the packages you chose to install display.

10. At the Is this correct? [yes] prompt, press <Return> to accept the default and install ArcIMS. The size of the selected packages and available space display.
11. At the List file names while loading? [no] prompt, press <Return> to accept the default or type "yes" and press <Return>, if desired. ArcIMS is installed, and the Finished loading package(s) message displays.

Note: The Spatial Server uses TrueType fonts located in: /usr/lib/X11/fonts/TrueType. ArcIMS Author and ArcExplorer—Java Edition use fonts from the font.properties file located in: <JREHOME>/lib or <\$JAVA_HOME>/lib. You can modify the font property file for your own font by following the instructions at: <http://java.sun.com/j2se/1.3/docs/guide/intl/index.html>.

Before you begin using ArcIMS, you must complete Step 4: Configure your Web server. See the appropriate section to configure your Web server to run ArcIMS:

- Configuring Sun ONE 6.0 (iPlanet)
- Configuring Oracle Application Server 9.0.1 with Apache

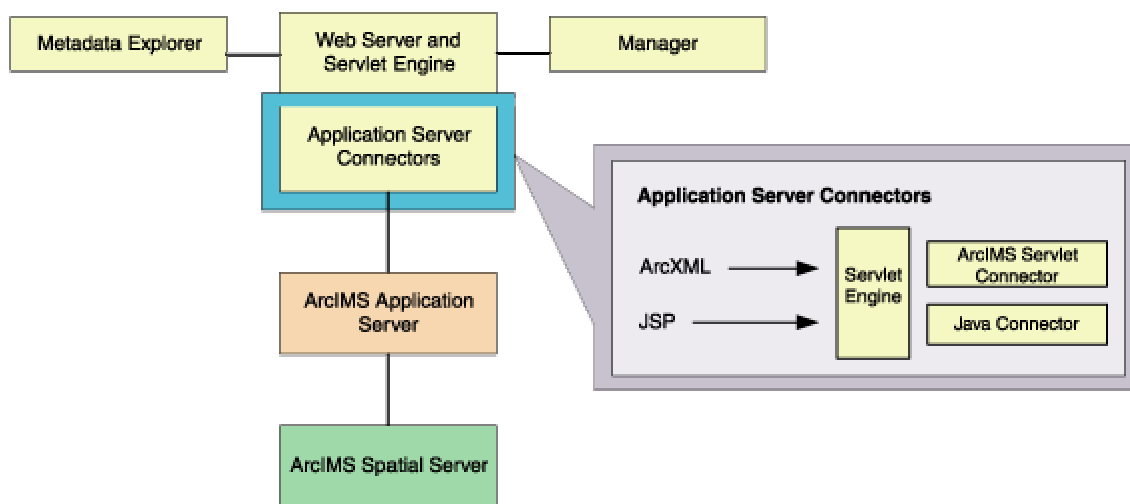
Installing ArcIMS 4.0.1 on Linux Red Hat

- Configuring ServletExec for Apache
- Configuring Tomcat 3.2.3 for Apache 1.3.20
- Configuring WebLogic 6.1
- Configuring WebSphere 4.0.2 for IBM HTTP Server

Installing ArcIMS custom Application Server Connectors

In this custom scenario, you select an ArcIMS Application Server Connector depending on the development environment you plan to use for creating Web pages. The supported Application Server Connectors on Linux are Servlet with WMS and Java.

The ArcIMS Application Server and Application Server Connector reside on the Web server. Each Web server can have more than one Application Server Connector, as long as they are of different types.



The Servlet Connector with WMS is the standard ArcIMS Connector. Select this connector if you plan to use the Web design tools in ArcIMS (Author and Designer). The Servlet Connector also provides service-level user password authentication. WMS works within the OGC WMS 1.0.0 specification.

The Java Connector communicates with the ArcIMS Application Server and a JSP client. The Java Connector is not dependent on the ArcIMS Application Server and can be installed on any computer.

Note: These instructions describe only custom Application Server Connector installation. To install ArcIMS Application Server, ArcIMS Manager Applications, and ArcIMS Spatial Server, refer to Doing a typical installation.

Installing ArcIMS Application Server Connectors

Perform the following steps on the computer where you want to install ArcIMS Application Server and custom Connectors.

Linux Red Hat 7.1 automatically mounts the CD.

Note: Make sure that the user account that installs ArcIMS has write permissions to the installation directory.

Note: For security reasons, don't install ArcIMS as super user. ESRI recommends that you create a separate user account for installing and administering ArcIMS.

1. To start ArcIMS installation, type the following command from anywhere on your system:

```
% /mnt/cdrom/ArcIMS/install -load
```

Installing ArcIMS 4.0.1 on Linux Red Hat

This will start the command-driven dialog for the ArcIMS software installation procedure. Default selections are noted in brackets []. To obtain a list of options or online help, type "?" at any prompt. You can quit the installation procedure at any time by typing "quit" or "q". To return to a previous question, type the caret "^". Before continuing with the installation you will be asked to read the license agreement and accept it, or exit if you don't agree with the terms. The default is set to "no" and you have to type "yes" to proceed with the installation. Please read the license agreement file appropriate for your locale. The license agreement files are in Adobe Acrobat PDF format and are located at <http://www.esri.com/licenseagreement>. The English version can be found on the CD at /cdrom/license. ESRI is willing to license the software to you only if you accept and agree to the license agreement. If you have read and agree with the terms in the license agreement type "yes" to continue the installation process, if not press <Return> or type "no" to exit installation process.

2. At the Enter CD mount point: [/mnt/cdrom/ArcIMS] prompt, type the location and press <Return>.
3. At the Enter pathname to install directory prompt, type the path to where you want ArcIMS Application Server Connectors installed on your system. The ArcIMS version and date display.
4. At the ArcIMS Application Server Package numbers to load: [all] prompt, type "none" and press <Return>.
5. At the ArcIMS Application Server Connectors Package numbers to load: [none] prompt, type "?" to display a list of available packages. Type the numbers of the packages you are installing separated by commas, type "all" to load all packages, or press <Return> to accept the default and load no packages.

Note: For ArcIMS to function, you need to install the Application Server and at least one connector.

6. At the ArcIMS Manager Applications Package numbers to load: [all] prompt, type "none" and press <Return>.
7. At the ArcIMS Spatial Server Software Package numbers to load: [all] prompt, type "none" and press <Return>.
8. At the ArcIMS Metadata Explorer/Gazetteer Data Package numbers to load: [all] prompt, type "none" and press <Return>.
9. At the ArcIMS Sample Applications and Data Package numbers to load: [none] prompt, type "?" to display a list of available packages. Type the numbers of the packages you are installing separated by commas, type "all" to load all packages, or press <Return> to accept the default and load no packages.

Note: If you install any Sample packages, you need to install the Tutorial Data package.

The Package selection complete prompt and a list of the packages you chose to install display.

10. At the Is this correct? [yes] prompt, press <Return> to accept the default and install the ArcIMS Application Server and custom Connector packages.

The size of the selected packages and available space display.

11. At the List file names while loading? [no] prompt, press <Return> to accept the default or type "yes" and press <Return>, if desired. ArcIMS Application Server and custom Connector are installed, and the Finished loading package(s) message displays.

Configure the connector you installed:

- ArcIMS Java Connector
- ArcIMS Servlet Connector
- WMS

Note: To install the Z39.50 Connector see Installing Metadata Explorer.

ArcIMS Java Connector

For information on using the ArcIMS Java Connector, see *Customizing ArcIMS—Java Connector*.

ArcIMS Servlet Connector

If you installed the ArcIMS Servlet Connector, before you begin using ArcIMS software, you must complete Step 4: Configure your Web server. See the appropriate section to configure your Web server to run ArcIMS:

- Configuring Sun ONE 6.0 (iPlanet)
- Configuring Oracle Application Server 9.0.1 for Apache
- Configuring Tomcat 3.2.3 for Apache 1.3.20
- Configuring WebLogic 6.1
- Configuring WebSphere 4.0.2 for IBM HTTP Server

For information on the ArcIMS Servlet Connector, see ArcIMS Help.

WMS

To configure ArcIMS to use WMS perform the following:

1. In a text editor, open the WMSEsrimap_prop file in the location where you placed it when you configured your Web server. For example:

Apache with ServletExec: <ServletExec Installation Directory>/NewAtlanta/ServletExecAS/se-<instance-name>/Servlets

Apache with Tomcat: <Tomcat Installation Directory>/webapps/ROOT/WEB-INF/classes

IBM HTTP Server with WebSphere 4.0.2: <WebSphere Installation Directory>/AppServer/installedApps/servlet.ear/arcimsservletconnector.war/WEB-INF/classes

Sun ONE (iPlanet): <iPlanet Installation Directory>/servers/docs/servlet

Oracle Application Server: <OAS Installation Directory>/Apache/Jserv/servlets

WebLogic: <WebLogic Installation Directory>/bea/wlserver6.1/config/mydomain/applications/DefaultWebApp/WEB-INF/classes

Note: If the file is not there, see Step 4: Configure your Web server.
2. Find enable and change it to enable=true.
3. Find appServerMachine and set it to the name of the computer where the ArcIMS Application Server is installed.
4. Find appServerClientPort and set it to the name of the port on which the Application Server is running (default is 5300).
5. Find capabilitiesDir and provide the path to the capabilities directory, for example, capabilitiesDir=/disk1/ArcIMS/capabilities.
6. Find debug and set it to debug=true if you want detailed debug information. If you set it to true, the log file will be created inside the working directory.
7. Find workingDirectory and provide the path to the working directory, for example, workingDirectory=/disk1/ArcIMS/workingdir.
8. Find reaspect and set it to true if you want to reaspect the generated map images.
9. Find defaultService and set it to a default ArcIMS Service name. If the WMS client doesn't specify the Service, then this default Service will be used.
10. Save and close the file.
11. Stop and start your Web server.

Installing ArcIMS 4.0.1 on Linux Red Hat

12. To test that WMS is installed and working, open your browser and type:

`http://<localhost>/servlet/com.esri.wms.Esrimap?Cmd=ping`

Note: If your Web server port is not set to the default port (port 80), then type the following:

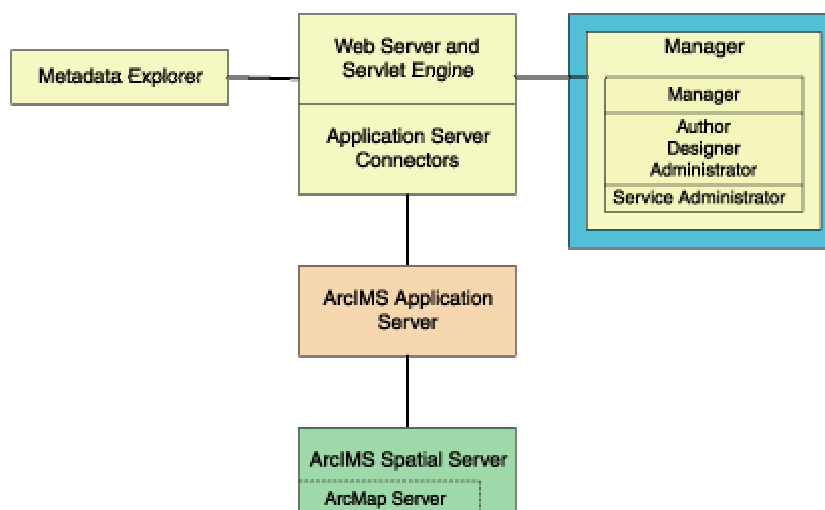
`http://<localhost>:<port#>/servlet/com.esri.wms.Esrimap?Cmd=ping`

The following should display: ArcIMS WMS-OGC Connector Version 4.0

For information on WMS, see ArcIMS Help.

Installing ArcIMS Manager Applications

In this custom scenario, ArcIMS Manager Applications can be installed on any computer on your network. This is optimal for UNIX users since ArcIMS Manager is not available for the UNIX environment.



Note: These instructions describe only the ArcIMS Manager Applications installation. To install ArcIMS Spatial Server, ArcIMS Application Server, and Application Server Connectors, refer to Doing a typical installation.

Installing ArcIMS Manager Applications

Perform the following steps on the computer where you want to install ArcIMS Manager Applications.

Linux Red Hat 7.1 automatically mounts the CD.

Note: Make sure that the user account that installs ArcIMS has write permissions to the installation directory.

Note: For security reasons, don't install ArcIMS as super user. ESRI recommends that you create a separate user account for installing and administering ArcIMS.

1. To start ArcIMS installation, type the following command from anywhere on your system:

`% /mnt/cdrom/ArcIMS/install -load`

This will start the command-driven dialog for the ArcIMS software installation procedure. Default selections are noted in brackets []. To obtain a list of options or online help, type "?" at any prompt. You can quit the installation procedure at any time by typing "quit" or "q". To return to a previous question, type the caret "^". Before continuing with the installation you will be asked to read the license agreement and accept it, or exit if you don't agree with the terms. The default is set to "no" and you have to type "yes" to proceed with the installation. Please read the license agreement file

Installing ArcIMS 4.0.1 on Linux Red Hat

appropriate for your locale. The license agreement files are in Adobe Acrobat PDF format and are located at <http://www.esri.com/licenseagreement>. The English version can be found on the CD at /cdrom/license. ESRI is willing to license the software to you only if you accept and agree to the license agreement. If you have read and agree with the terms in the license agreement type "yes" to continue the installation process, if not press <Return> or type "no" to exit installation process.

2. At the Enter CD mount point: [/mnt/cdrom/ArcIMS] prompt, type the location and press <Return>.
3. At the Enter pathname to install directory prompt, type the path to where you want ArcIMS Manager Applications installed on your system. The ArcIMS version and date display.
4. At the ArcIMS Application Server Package numbers to load: [all] prompt, type "none" and press <Return>.
5. At the ArcIMS Application Server Connectors Package numbers to load: [none] prompt, press <Return> to accept the default and install no packages.
6. At the ArcIMS Manager Applications Package numbers to load: [all] prompt, press <Return> to accept the default and install all packages.
7. At the ArcIMS Spatial Server Software Package numbers to load: [all] prompt, type "none" and press <Return>.
8. At the ArcIMS Metadata Explorer/Gazetteer Data Package numbers to load: [all] prompt, type "none" and press <Return>.
9. At the ArcIMS Sample Applications and Data Package numbers to load: [none] prompt, type "?" to display a list of available packages. Type the numbers of the packages you are installing separated by commas, type "all" to load all packages, or press <Return> to accept the default and load no packages.

Note: If you install any Sample packages, you need to install the Tutorial Data package.

The Package selection complete prompt and a list of the packages you chose to install display.

10. At the Is this correct? [yes] prompt, press <Return> to accept the default and install the ArcIMS Manager Applications packages. The size of the selected packages and available space display.
11. At the List file names while loading? [no] prompt, press <Return> to accept the default or type "yes" and press <Return>, if desired. ArcIMS Manager Applications are installed, and the Finished loading package(s) message displays.

You are ready to use ArcIMS Manager Applications.

Note: ArcIMS Author and ArcExplorer—Java Edition use fonts from the font.properties file located in: <JREHOME>/lib or <\$JAVA_HOME>/lib. You can modify the font property file for your own font by following the instructions at: <http://java.sun.com/j2se/1.3/docs/guide/intl/index.html>.

If you wish to use ArcIMS Service Administrator to administer ArcIMS Services, see Configuring ArcIMS Service Administrator.

Installing ArcIMS Service Administrator

The ArcIMS Service Administrator is a remote site administration tool and can be used as an alternative to or in conjunction with ArcIMS Administrator. The ArcIMS Service Administrator uses the JavaServer Pages (JSP) tag libraries and the Java API (application program interface) of the ArcIMS Java Connector. Java 2 Software Development Kit (J2SE SDK) is required for ArcIMS Service Administrator.

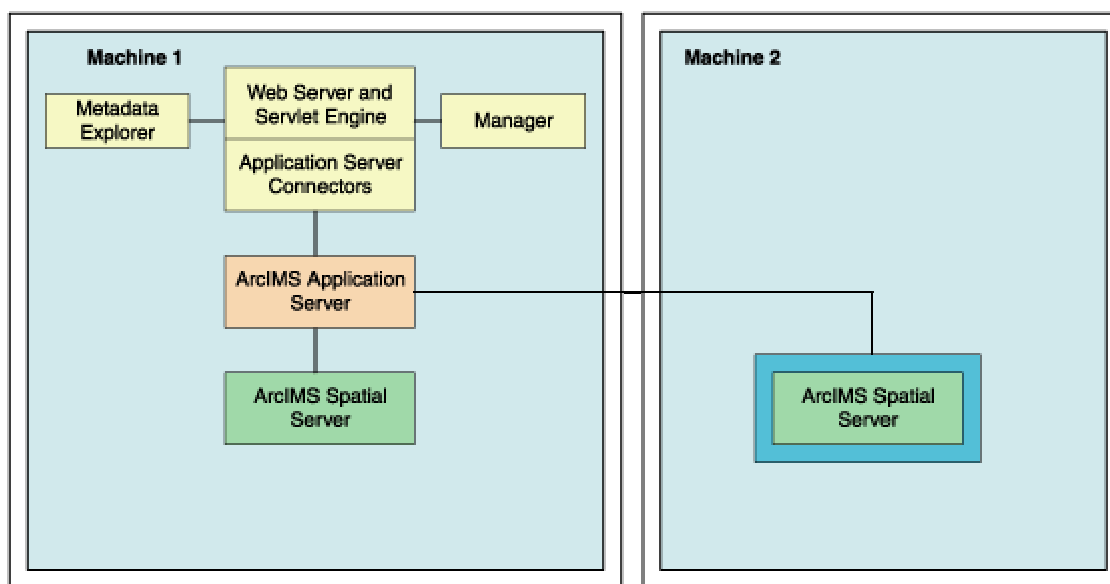
- The ArcIMS Service Administrator is installed with a typical installation or with ArcIMS Manager Applications. If you plan to administer only ArcIMS Services, you need to:
 1. Install ArcIMS Manager Applications on the computer where you wish to use ArcIMS Service Administrator.
 2. Configure ArcIMS Service Administrator for your Web server.
- The ArcIMS Service Administrator can also be used to administer ArcSDE. To administer ArcSDE on UNIX/Linux, you need to do the following:

Installing ArcIMS 4.0.1 on Linux Red Hat

1. Install ArcIMS Manager Applications on the computer where you wish to use ArcIMS Service Administrator.
2. Configure ArcIMS Service Administrator for your Web server.
3. Install and set up the optional ArcSDE Administrator component on the ArcIMS Spatial Server computer.

Installing multiple ArcIMS Spatial Servers

In this custom scenario, several computers run ArcIMS Spatial Servers and communicate with the Web server via TCP/IP. One computer runs Web server software with Manager Applications, ArcIMS Application Server, and Application Server Connectors, and there are multiple instances of ArcIMS Spatial Server. ArcIMS Application Server balances the load, maximizing speed and capacity if you have heavy application use.



Note: These instructions describe only the ArcIMS Spatial Server installation. To install ArcIMS Manager Applications, ArcIMS Application Server, and Application Server Connectors, refer to Doing a typical installation.

Installing ArcIMS Spatial Server

Perform the following steps on the computer where you want to install an ArcIMS Spatial Server.

Linux Red Hat 7.1 automatically mounts the CD.

Note: Make sure that the user account that installs ArcIMS has write permissions to the installation directory.

Note: For security reasons, don't install ArcIMS as super user. ESRI recommends that you create a separate user account for installing and administering ArcIMS.

1. To start ArcIMS installation, type the following command from anywhere on your system:

```
% /mnt/cdrom/ArcIMS/install -load
```

This will start the command-driven dialog for the ArcIMS software installation procedure. Default selections are noted in brackets []. To obtain a list of options or online help, type "?" at any prompt. You can quit the installation procedure at any time by typing "quit" or "q". To return to a previous question, type the caret "^". Before continuing with the installation you will be asked to read the license agreement and accept it, or exit if you don't agree with the terms. The default is set to "no" and you have to type "yes" to proceed with the installation. Please read the license agreement file appropriate for your locale. The license agreement files are in Adobe Acrobat PDF format and are located at

Installing ArcIMS 4.0.1 on Linux Red Hat

<http://www.esri.com/licenseagreement>. The English version can be found on the CD at /cdrom/license. ESRI is willing to license the software to you only if you accept and agree to the license agreement. If you have read and agree with the terms in the license agreement type "yes" to continue the installation process, if not press <Return> or type "no" to exit installation process.

2. At the Enter CD mount point: [/mnt/cdrom/ArcIMS] prompt, type the location and press <Return>.
3. At the Enter pathname to install directory prompt, type the path to where you want ArcIMS Spatial Servers installed on your system. The ArcIMS version and date display.
4. At the ArcIMS Application Server Package numbers to load: [all] prompt, type "none" and press <Return>.
5. At the ArcIMS Application Server Connectors Package numbers to load: [none] prompt, press <Return> to accept the default and install no packages.
6. At the ArcIMS Manager Applications Package numbers to load: [all] prompt, type "none" and press <Return>.
7. At the ArcIMS Spatial Server Software Package numbers to load: [all] prompt, press <Return> to install the Spatial Server software. The Package selection complete prompt and the package you chose to install display.
8. At the ArcIMS Metadata Explorer/Gazetteer Data Package numbers to load: [all] prompt, type "none" and press <Return>.
9. At the ArcIMS Sample Applications and Data Package numbers to load: [none] prompt, type "?" to display a list of available packages. Type the numbers of the packages you are installing separated by commas, type "all" to load all packages, or press <Return> to accept the default and load no packages.

Note: If you install any Sample packages, you need to install the Tutorial Data package.

The Package selection complete prompt and a list of the packages you chose to install display.

10. At the Is this correct? [yes] prompt, press <Return> to accept the default and install the ArcIMS Spatial Server packages. The size of the selected packages and available space display.
11. At the List file names while loading? [no] prompt, press <Return> to accept the default or type "yes" and press <Return>, if desired. ArcIMS Spatial Server is installed, and the Finished loading package(s) message displays.
12. In your environment, set the AIMSHOME variable to the location where you installed the spatial server component:

```
setenv AIMSHOME <ArcIMS Spatial Server Installation Directory>/ArcIMS
```
13. Modify the startup parameters for the ArcIMS Monitor process located in the file:

```
$AIMSHOME/Xenv/aimsmonitor
```

. Search for the section:
"OPTIONALLY MODIFY THE VALUES OF THESE VARIABLES".
 - a. Set the value of AIMSHOME to the same location as in Step 12 above.
 - b. Set the value of JAVA_HOME to the location of your J2SE JRE.
14. Make sure that the following directories are mounted and visible on this computer:
 - a. The server output directory that was established as a virtual directory on your Web server. (See Step 4: Configure your Web server for your configuration.)
 - b. All data directories referenced in all your map configuration files.

Note: These directories must be mounted using exactly the same pathnames as on the Web server computer; for example, if your map configuration files reference data located in the directory /machine2/data, then /machine2 must be mounted on this computer as well. The path /net/machine/machine2/data is not considered the same, and ArcIMS will not work.

Installing ArcIMS 4.0.1 on Linux Red Hat

15. The ArcIMS Monitor process relies on the Monitor.properties file for some of its information. Navigate to \$AIMSHOME/Monitor/Monitor.properties, open the file in a text editor, and follow the descriptions to customize the process. The Monitor.properties file needs to be edited prior to starting the aimsmonitor process.

Edit the Monitor.properties file and change the value "localhost" to the name of your Application Server. For example:

```
registryHost = <server name>.esri.com
```

16. Start the ArcIMS Monitor process.

You may set up the ArcIMS Monitor process as a daemon that starts up every time your computer is rebooted, or you may choose to start it manually when required.

- a. To start the ArcIMS Monitor process at system boot, refer to the instructions provided in the file \$AIMSHOME/Xenv/aimsmonitor.
- b. To start ArcIMS Monitor manually, navigate to the \$AIMSHOME/Xenv directory and type the following:

```
./aimsmonitor start &
```

17. Start ArcIMS Administrator on the Web server computer (or do a Site Refresh in Administrator if it is already running) to see the new Spatial Server listed under Servers.

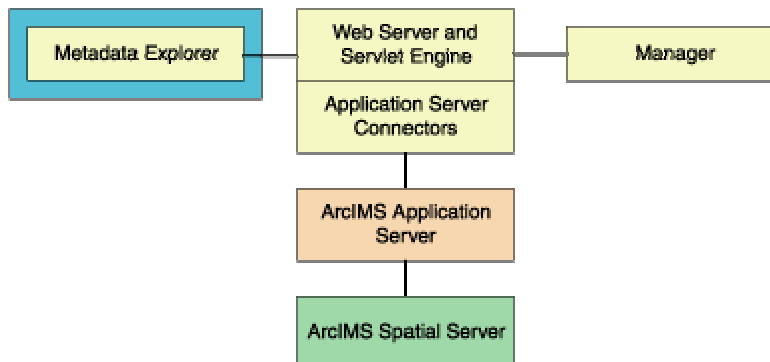
Note: The Spatial Server uses TrueType fonts located in: /usr/lib/X11/fonts/TrueType.

After installing an ArcIMS Spatial Server, see *Using ArcIMS*, "Administering your site," for details on how to administer the ArcIMS Spatial Server.

See ArcIMS Help for more information on configuring your Web site.

Installing Metadata Explorer

In this custom scenario, you install Metadata Explorer and Gazetteer data to view metadata from an ArcIMS Metadata Service. Java 2 Software Development Kit (J2SE SDK) is required for ArcIMS Metadata Explorer.



Note: These instructions describe only Metadata Explorer and Gazetteer data installation. To install the ArcIMS Host (ArcIMS Manager, ArcIMS Application Server, ArcIMS Spatial Server, and Application Server Connectors), refer to Doing a typical installation.

Installing Metadata Explorer

On the computer where you wish to install Metadata Explorer, perform the following steps.

Linux Red Hat 7.1 automatically mounts the CD.

Note: Make sure that the user account that installs ArcIMS has write permissions to the installation directory.

Installing ArcIMS 4.0.1 on Linux Red Hat

Note: For security reasons, don't install ArcIMS as super user. ESRI recommends that you create a separate user account for installing and administering ArcIMS.

1. To start ArcIMS installation, type the following command from anywhere on your system:

```
% /mnt/cdrom/ArcIMS/install -load
```

This will start the command-driven dialog for the ArcIMS software installation procedure. Default selections are noted in brackets []. To obtain a list of options or online help, type "?" at any prompt. You can quit the installation procedure at any time by typing "quit" or "q". To return to a previous question, type the caret "^". Before continuing with the installation you will be asked to read the license agreement and accept it, or exit if you don't agree with the terms. The default is set to "no" and you have to type "yes" to proceed with the installation. Please read the license agreement file appropriate for your locale. The license agreement files are in Adobe Acrobat PDF format and are located at <http://www.esri.com/licenseagreement>. The English version can be found on the CD at /cdrom/license. ESRI is willing to license the software to you only if you accept and agree to the license agreement. If you have read and agree with the terms in the license agreement type "yes" to continue the installation process, if not press <Return> or type "no" to exit installation process.

2. At the Enter CD mount point: [/cdrom/cdrom0/ArcIMS] prompt, type the location and press <Return>.
3. At the Enter pathname to install directory prompt, type the path to where you want Metadata Explorer installed. The ArcIMS version and date display.
4. At the ArcIMS Application Server Package numbers to load: [all] prompt, type "none" and press <Return>.
5. At the ArcIMS Application Server Connectors Package numbers to load: [none] prompt, press <Return> to accept the default and install no packages.
6. At the ArcIMS Manager Applications Package numbers to load: [all] prompt, type "none" and press <Return>.
7. At the ArcIMS Spatial Server Software Package numbers to load: [all] prompt, type "none" and press <Return>.
8. At the ArcIMS Metadata Explorer/Gazetteer Data Package numbers to load: [all] prompt, press <Return> to accept the default and load all packages.
9. At the ArcIMS Sample Applications and Data Package numbers to load: [none] prompt, type "?" to display a list of available packages. Type the numbers of the packages you are installing separated by commas, type "all" to load all packages, or press <Return> to accept the default and load no packages.

Note: If you install any Sample packages, you need to install the Tutorial Data package.

The Package selection complete prompt and a list of the packages you chose to install display.

10. At the Is this correct? [yes] prompt, press <Return> to accept the default and install the ArcIMS Manager Applications packages. The size of the selected packages and available space display.
11. At the List file names while loading? [no] prompt, press <Return> to accept the default or type "yes" and press <Return>, if desired. ArcIMS Manager Applications are installed, and the Finished loading package(s) message displays.

ArcIMS Metadata Explorer is installed, and the Finished loading package(s) message displays.

Note: The Z39.50 Connector is installed with the Metadata Explorer. In order to use the Z39.50 connector it must be configured. See Configuring the Z39.50 Connector.

See *Creating and Using Metadata Services* for information on Metadata Explorer.

You need to configure your Web server to use ArcIMS Metadata Explorer.

Configuring the Z39.50 Connector

The Z39.50 Connector must be installed prior to configuring. For information on installing the Z39.50 Connector see Installing Metadata Explorer.

To configure ArcIMS with Z39.50, perform the following.

1. In a text editor, open z3950.properties.
`<ArcIMS Installation Directory>/ArcIMS/Metadata/Z3950Connector/z3950.properties`
2. If necessary, change the port number the Z39.50 Connector will use.
`port=210`
The default port number is 210 but it can be modified depending on your network configuration.
3. Edit `defaultServiceName=MyMetadataService` to match your Metadata Service name.
If you have not created your Metadata Service yet, accept the default value and edit the property as necessary at a later date.
See *Creating and Using Metadata Services* for details on creating the necessary Metadata Service.
4. The default connection type is HTTP. If utilizing TCP/IP connection protocols, proceed to Step 7.
`connectionType=http`
5. Set the URL of the server hosting ArcIMS services.
`url=http://<localhost>.<domain>.com`
6. If browsing of the Metadata Service used in Step 3 is restricted by username and password, set these values. The username and password remain blank if browse access is unrestricted.
`username=`
`password=`
If you have not created your Metadata Service yet, accept the default blank values and edit the property as necessary at a later date.
See *Creating and Using Metadata Services* or ArcIMS Help for details on the methods used to restrict access to services.
Proceed to Step 9.
7. If `connectionType=http` in Step 4 above, proceed to Step 9.
If `connectionType=tcp`, find `appServerMachine`, set it to the name of the computer where ArcIMS Application Server is installed, and remove the comment mark (#) preceding the property.
`appServerMachine=hostname`
8. Find `appServerPort`, set it to the port on which the Application Server is running, and remove the comment mark (#) preceding the property.
`appServerPort=5300`
The default is 5300.
9. Save and close the file.
10. Execute the file z3950server.sh
`<ArcIMS Installation Directory>/ArcIMS/Metadata/Z3950Connector/z3950server.sh`

Installing ArcIMS 4.0.1 on Linux Red Hat

Installation of the Z39.50 Connector is complete. However, the connector is not functional until you have loaded the required Z39.50 specifications into your ArcSDE metadata tables. This step cannot be performed until you have created your Metadata Service. If you already have your Metadata Service created and in place, proceed to the next section, "Loading the Z39.50 specifications." If not, see *Creating and Using Metadata Services* for details on setting it up and loading the Z39.50 specifications into your metadata tables.

Note: If you are using TCP/IP, the connector must also be configured for authentication of users. Detailed steps are provided in *Creating and Using Metadata Services*.

Loading the Z39.50 specifications

The following step cannot be performed until you have created your Metadata Service. If you have not created your service, see *Creating and Using Metadata Services* for details on setting it up and loading the Z39.50 specifications into your metadata tables.

Execute the command-line utility that loads the necessary Z39.50 parameters into your SDE metadata tables. It's located at:

- <ArcIMS Installation Directory>/ArcIMS/Metadata/Commands/mdzcodeoader

Command usage:

```
mdzcodeoader.exe <input_file> <sde_server_machine> <sde_instance> <database> <username> <password>
{table_name_prefix} {logfile}
```

- <input_file>: The information to load ArcSDE tables is defined in two files—GEO_mandatory.xml and GEO_expanded.xml. For setting up a basic configuration, use GEO_mandatory.xml as your input file. See *Creating and Using Metadata Services* for details on these files.
- <sde_server_machine>: The name of the ArcSDE host machine.
- <sde_instance>: The service or port number for ArcSDE.
- <database>: The ArcSDE database name. Use the same database name used in the <SDEWORKSPACE> element of your Metadata Service configuration file (*.axl). Use "" or # to accept the default value.
- <username>: The ArcSDE database username. Use the same username used in the <SDEWORKSPACE> element of your Metadata Service configuration file (*.axl).
- <password>: The ArcSDE database password. Use the same password used in the <SDEWORKSPACE> element of your Metadata Service configuration file (*.axl).
- {table_name_prefix}: The prefix name for your metadata tables in ArcSDE. Use the same prefix used in the <TABLE_NAME> element of your Metadata Service configuration file (*.axl). The default prefix name for ArcIMS metadata tables, IMSMETADATA will be used if you don't specify a prefix name in your command.
- {logfile}: File name used to log any errors generated during the loading of the Z39.50 data. The default name, mdzcodeoader.log, will be used if you don't specify one in your command.

For example:

```
mdzcodeoader GEO_mandatory.xml my.sde.machine 5151 "" user123 pass456 mymetadata.
```

Step 4: Configure your Web server

Choose the steps for your Web server and servlet engine:

- Configuring Sun ONE 6.0 (iPlanet)
- Configuring Oracle Application Server 9.0.1 for Apache
- Configuring ServletExec for Apache
- Configuring Tomcat 3.2.3 for Apache 1.3.20
- Configuring WebLogic 6.1
- Configuring WebSphere 4.0.2 for IBM HTTP Server

Configuring Sun ONE 6.0 (iPlanet)

After installing ArcIMS, you must configure your Web server for ArcIMS. If your Web server is not operational, contact your system administrator before you proceed. See www.sun.com for information on problems with Sun ONE 6.0 (iPlanet).

Setting up your Web server for ArcIMS

1. If you do not already have a servlet directory defined, create one in the docs directory.
`mkdir <iPlanet Installation Directory>/servers/docs/servlet`
2. Copy the following from <ArcIMS Installation Directory>/ArcIMS/Middleware/servlet_connector to <iPlanet Installation Directory>/servers/docs/servlet:
 - com directory
 - Esrimap_prop
 - ServletConnector_Res.properties
 - ServletConnector_Res_en_US.properties
 - WMSEsrimap_prop
3. Open the Esrimap_prop file in a text editor. Change the value of appServerMachine to the name of your Application Server computer. For example:
`appServerMachine=<server name>.esri.com`
4. Save and close the file.
5. Make sure your Web server is running and, in your Web browser, type:
`http://<localhost.domain.com>:<serveradminport>`
For example: `http://arcims.esri.com:10000`
Note: If you don't know your server's administration port, open <iPlanet Installation Directory>/servers/https-admserv/config/admin.conf in a text editor and read the `http://<localhost.domain.com>:<serveradminport>` there.
6. Type your user name and password and click OK. The iPlanet Web Server Administration Server screen displays.
7. Select the server from the dropdown list and click Manage. The Server On/Off screen displays. Make sure the server is on.
8. Click Java in the navigation bar along the top.

Installing ArcIMS 4.0.1 on Linux Red Hat

9. The Enable/Disable Servlets/JSP screen displays. Make sure the Enable Java Globally and Enable Java for class defaultclass options are checked. Click OK.
10. Click Class Manager in the upper right corner of the screen. The Manage Virtual Servers screen displays.
11. Click Content Mgmt in the navigation bar along the top.
12. Click Document Preferences on the left sidebar. The Document Preferences screen displays.
13. Add the following first in the list under Index Filenames:
default.htm,default.html,index.htm
Click OK.

Creating virtual directories

After installing ArcIMS, you must create virtual directories for output and website. A virtual directory is a mapped location on the Web server to a physical path.

14. Click Content Mgmt in the navigation bar along the top.
15. Click Additional Document Directories in the sidebar.
16. Create a directory named output for the URL prefix and map it to the location where ArcIMS Spatial Server output will be stored.
17. Web site files can be stored under <iPlanet Installation Directory>/servers/docs.

You can specify that location when asked to provide a website directory when initializing the ArcIMS Administrator. If you wish to save website files to another location, you must map them the same way the ArcIMS Spatial Server output virtual directory was mapped: create a virtual directory named website and map them to the desired location.
18. Click OK, then click Apply in the upper right corner of the screen. Click Apply Changes to save all changes.
19. Close iPlanet Web Server Administration Server.

Making ArcIMS files available to Web users

20. To provide your Web users with the ArcIMS files that are necessary to view your Java Web pages, you need to do the following:


```
cp -r <ArcIMS Installation Directory>/ArcIMS/ViewerDownLoad/install <Path to website directory>/
```


For more information, see Installing ArcIMS Viewer.

Using the Diagnostics tool to test your ArcIMS installation

21. Stop and Start the iPlanet Web Server.
22. Open <ArcIMS Installation
Directory>/ArcIMS/Xenv/ArcIMS_Diagnostics/ArcIMS_Diagnostics.html in Netscape. The ArcIMS Diagnostics tool displays.
23. Select your Web server protocol, type your Web server name including domain, and type your port number. The default is 80.
24. Click 1 to test the ArcIMS Servlet Connector.

If this test is successful, your ArcIMS Servlet Connector is configured correctly.

If you receive an error message, select the error number in the dropdown list and click View. The error number and a description display. Follow the instructions in the description to fix the problem and try the Diagnostics tool again.

See WMS for information on configuring for WMS.

Installing ArcIMS 4.0.1 on Linux Red Hat

See Configuring Sun ONE 6.0 (iPlanet) for ArcIMS Service Administrator for information on configuring ArcIMS Service Administrator.

See Configuring Sun ONE 6.0 (iPlanet) for Metadata Explorer for information on configuring Metadata Explorer.

See Step 5: Configure ArcIMS for instructions on running ArcIMS.

Configuring Oracle Application Server 9.0.1 with Apache

After installing ArcIMS, you must configure your Web server for ArcIMS. If your Web server and servlet engine are not operational, contact your system administrator before you proceed. See www.oracle.com for information on problems with Oracle Application Server (OAS).

Note: OAS may not be supported with J2SE JRE 1.4. Please check with Oracle for more detailed information.

1. Copy the following from <ArcIMS Installation Directory>/ArcIMS/Middleware/servlet_connector to <OAS Installation Directory>/Apache/Jserv/servlets:
 - com directory
 - Esrimap_prop
 - ServletConnector_Res.properties
 - ServletConnector_Res_en_US.properties
 - WMSEsrimap_prop
2. Open the Esrimap_prop file in a text editor.
3. Change the value of appServerMachine to the name of your Application Server computer. For example:
appServerMachine=<server name>.esri.com
4. Save and close the file.

Creating virtual directories

After installing ArcIMS, you must create virtual directories for output and website. A virtual directory is a mapped location on the Web server to a physical path.

5. Open the file <OAS Installation Directory>/Apache/Apache/conf/httpd.conf.
6. In the Alias section, add the following for website and server output:

```
Alias /output "/<Path to output directory>/output"
<Directory "/<Path to output directory>/output">
Options Indexes MultiViews
AllowOverride None
Order allow,deny
Allow from all
</Directory>
Alias /website "/<Path to website directory>/website"
<Directory "/<Path to website directory>/website">
Options Indexes MultiViews
AllowOverride None
Order allow,deny
Allow from all
</Directory>
```
7. For the Web pages designed in ArcIMS to start automatically, make sure your DirectoryIndex line includes default.htm. For example:

Installing ArcIMS 4.0.1 on Linux Red Hat

DirectoryIndex index.html default.htm

8. Save and close the file.

Making ArcIMS files available to Web users

9. To provide your Web users with the ArcIMS files that are necessary to view your Java Web pages, you need to do the following:

```
cp -r <ArcIMS Installation Directory>/ArcIMS/ViewerDownload/install <Path to website directory>
```

For more information, see Installing ArcIMS Viewer.

Using the Diagnostics tool to test your ArcIMS installation

10. Restart Oracle Application Server.
11. Open <ArcIMS Installation Directory>/ArcIMS/Xenv/ArcIMS_Diagnostics/ArcIMS_Diagnostics.html in Netscape. The ArcIMS Diagnostics tool displays.
12. Select your Web server protocol, type your Web server name including domain, and type your port number. The default is 80.
13. Click 1 to test the ArcIMS Servlet Connector.

If this test is successful, your ArcIMS Servlet Connector is configured correctly.

If you receive an error message, select the error number in the dropdown list and click View. The error number and a description display. Follow the instructions in the description to fix the problem and try the Diagnostics tool again.

See WMS for information on configuring for WMS.

See Configuring Oracle Application Server 9.0.1 for ArcIMS Service Administrator for information on configuring ArcIMS Service Administrator.

See Configuring Oracle Application Server 9.0.1 for Metadata Explorer for information on configuring Metadata Explorer.

See Step 5: Configure ArcIMS for the final step required to get ArcIMS running.

Configuring ServletExec for Apache

After installing ArcIMS, you must configure your Web server for ArcIMS. If your Web server and servlet engine are not operational, contact your system administrator before you proceed. See www.newatlanta.com for information on problems with ServletExec.

1. Stop Apache and Servlet Exec.
2. Copy the following from <ArcIMS Installation Directory>/ArcIMS/Middleware/servlet_connector to <ServletExec Installation Directory>/NewAtlanta/ServletExecAS/se-<instance-name>/Servlets:
 - com directory
 - Esrimap_prop
 - ServletConnector_Res.properties
 - ServletConnector_Res_en_US.properties
 - WMSEsrimap_prop
3. Open the Esrimap_prop file in a text editor.

Installing ArcIMS 4.0.1 on Linux Red Hat

4. Change the value of appServerMachine to the name of your Application Server computer. For example:
`appServerMachine=<server name>.esri.com`
5. Save and close the file.

Creating virtual directories

6. After installing ArcIMS, you must create virtual directories for output and website. A virtual directory is a mapped location on the Web server to a physical path.
7. Open the file <Apache Installation Directory>/conf/httpd.conf.
8. In the Alias section, add the following for website and server output:

```
Alias /output "/<Path to output directory>/output"  
<Directory "/<Path to output directory>/output">  
Options Indexes MultiViews  
AllowOverride None  
Order allow,deny  
Allow from all  
</Directory>  
Alias /website "/<Path to website directory>/website"  
<Directory "/<Path to website directory>/website">  
Options Indexes MultiViews  
AllowOverride None  
Order allow,deny  
Allow from all  
</Directory>
```
9. For the Web pages designed in ArcIMS to start automatically, make sure your DirectoryIndex line includes default.htm. For example:
`DirectoryIndex index.html default.htm`
10. Save and close the file.

Making ArcIMS files available to Web users

11. To provide your Web users with the ArcIMS files that are necessary to view your Java Web pages, you need to do the following:
`cp -r <ArcIMS Installation Directory>/ArcIMS/ViewerDownLoad/install <Path to website directory>`
For more information, see Installing ArcIMS Viewer.

Using the Diagnostics tool to test your ArcIMS installation

12. Start the Apache and ServletExec services.
13. Open <ArcIMS Installation
Directory>/ArcIMS/Xenv/ArcIMS_Diagnostics/ArcIMS_Diagnostics.html in Netscape. The ArcIMS Diagnostics tool displays.
14. Select your Web server protocol, type your Web server name including domain, and type your port number. The default is 80.
15. Click 1 to test the ArcIMS Servlet Connector.

If this test is successful, your ArcIMS Servlet Connector is configured correctly.

If you receive an error message, select the error number in the dropdown list and click View. The error number and a description display. Follow the instructions in the description to fix the problem and try the Diagnostics tool again.

Installing ArcIMS 4.0.1 on Linux Red Hat

See WMS for information on configuring for WMS.

See Configuring ServletExec for Service Administrator for information on configuring ArcIMS Service Administrator.

See Configuring ServletExec for Metadata Explorer for information on configuring Metadata Explorer.

See Step 5: Configure ArcIMS for the final step required to get ArcIMS running.

Configuring Tomcat 3.2.3 for Apache 1.3.20

After installing ArcIMS on your system, you must configure the Apache Web Server and Tomcat for ArcIMS. These instructions assume Apache and Tomcat are already running properly. If your Web server and servlet engine are not operational, contact your system administrator before you proceed. See www.apache.org for information on problems with Apache and Tomcat.

Setting up your Web server for ArcIMS

1. Open <Apache Installation Directory>/conf/httpd.conf in a text editor. Verify that the tomcat-apache.conf file is declared as an include in the httpd.conf file. If it is not declared, add the following at the bottom of the httpd.conf file:

`include <Tomcat Installation Directory>/conf/tomcat-apache.conf`
2. Verify that the line `ApJServMount /servlet /ROOT` is included in the tomcat-apache.conf file. If it is not listed, add it to the end of the file.
3. Save and close the file.
4. Copy the following from <ArcIMS Installation Directory>/ArcIMS/Middleware/servlet_connector to <Tomcat Installation Directory>/webapps/ROOT/WEB-INF/classes:
 - com directory
 - Esrimap_prop
 - ServletConnector_Res.properties
 - ServletConnector_Res_en_US.properties
 - WMSEsrimap_prop
5. Open the Esrimap_prop file in a text editor.
6. Change the value of appServerMachine to the name of your Application Server computer. For example:

`appServerMachine=<server name>.esri.com`
7. Save and close the file.

Creating virtual directories

After installing ArcIMS, you must create virtual directories for output and website. A virtual directory is a mapped location on the Web server to a physical path.

8. Open the file <Apache Installation Directory>/conf/httpd.conf.
9. In the Alias section, add the following for website and server output:

`Alias /output "/<Path to output directory>/output"`

`<Directory "/<Path to output directory>/output">`

`Options Indexes MultiViews`

`AllowOverride None`

`Order allow,deny`

Installing ArcIMS 4.0.1 on Linux Red Hat

Allow from all

</Directory>

Alias /website "/<Path to website directory>/website"

<Directory "<Path to website directory>/website">

Options Indexes MultiViews

AllowOverride None

Order allow,deny

Allow from all

</Directory>

10. For the Web pages designed in ArcIMS to start automatically, make sure your DirectoryIndex line includes default.htm. For example:

DirectoryIndex index.html default.htm

11. Save and close the file.

Making ArcIMS files available to Web users

12. To provide your Web users with the ArcIMS files that are necessary to view your Java Web pages, you need to do the following:

```
cp -r <ArcIMS Installation Directory>/ArcIMS/ViewerDownLoad/install <Path to website directory>
```

For more information, see Installing ArcIMS Viewer.

Using the Diagnostics tool to test your ArcIMS installation

13. Stop the Tomcat and Apache services.

14. Restart the Tomcat and Apache services by typing:

```
setenv JAVA_HOME <J2SE SDK Installation Directory>
```

```
setenv PATH $JAVA_HOME/bin:$PATH
```

```
<Tomcat Installation Directory>/bin/startup.sh
```

```
<Apache Installation Directory>/bin/apachectl start
```

15. Open <ArcIMS Installation

Directory>/ArcIMS/Xenv/ArcIMS_Diagnostics/ArcIMS_Diagnostics.html in Netscape. The ArcIMS Diagnostics tool displays.

16. Select your Web server protocol, type your Web server name including domain, and type your port number. The default is 80.

17. Click 1 to test the ArcIMS Servlet Connector.

If this test is successful, your ArcIMS Servlet Connector is configured correctly.

If you receive an error message, select the error number in the dropdown list and click View. The error number and a description display. Follow the instructions in the description to fix the problem and try the Diagnostics tool again.

See WMS for information on configuring for WMS.

See Configuring Tomcat 3.2.3 for Apache 1.3.20 for ArcIMS Service Administrator for information on configuring ArcIMS Service Administrator.

Installing ArcIMS 4.0.1 on Linux Red Hat

See Configuring Tomcat 3.2.3 for Apache 1.3.20 for Metadata Explorer for information on configuring Metadata Explorer.

See Step 5: Configure ArcIMS for instructions on running ArcIMS.

Configuring WebLogic 6.1

After installing ArcIMS, you must configure your Web server for ArcIMS. If your Web server is not operational, contact your system administrator before you proceed. See www.bea.com for information on problems with WebLogic.

1. Copy the following items from <ArcIMS Installation

Directory>/ArcIMS/Middleware/servlet_connector to <WebLogic Installation

Directory>/bea/wlserver6.1/config/mydomain/applications/DefaultWebApp/WEB-INF/classes:

- com directory
- Esrimap_prop
- ServletConnector_Res.properties
- ServletConnector_Res_en_US.properties files
- WMSEsrimap_prop

Note: You may need to create a classes directory.

2. Open the Esrimap_prop file in a text editor.
3. Change the value of AppServerMachine to the name of your Application Server computer. For example:

AppServerMachine=<server name>.esri.com

4. Save and close the file.
5. In a text editor, open the <WebLogic Installation

Directory>/bea/wlserver6.1/config/mydomain/applications/DefaultWebApp/WEB-INF/web.xml file.

6. Find the line <web-app> and add the following under it:

```
<servlet>
<servlet-name>Esrimap</servlet-name>
<servlet-class>com.esri.esrimap.Esrimap</servlet-class>
</servlet>
<servlet-mapping>
<servlet-name>Esrimap</servlet-name>
<url-pattern>/servlet/com.esri.esrimap.Esrimap/*</url-pattern>
</servlet-mapping>
<welcome-file-list>
<welcome-file>default.htm</welcome-file>
</welcome-file-list>
```

7. Save and close the file.
8. Create a directory for ArcIMS image output:

Installing ArcIMS 4.0.1 on Linux Red Hat

```
mkdir <WebLogic Installation Directory>/bea/wlserver6.1/config/mydomain/applications/DefaultWebApp/output
```

Note: Make sure you have write permission to this directory.

9. Create a directory for ArcIMS Web site files:

```
mkdir <WebLogic Installation Directory>/bea/wlserver6.1/config/mydomain/applications/DefaultWebApp/website
```

Note: Make sure you have write permission to this directory.

10. Restart the WebLogic Server.
11. In the WebLogic console, on the left sidebar, click Web Applications.
12. Click DefaultWebApp.
13. On the right panel, under the Files tab, check the box to enable Index Directories and click Apply.
14. Close the console.

Making ArcIMS files available to Web users

15. To provide your Web users with the ArcIMS files that are necessary to view your Java Web pages, you need to do the following:

```
cp -r <ArcIMS Installation Directory>/ArcIMS/ViewerDownload/install <Path to website directory>
```

For more information, see Installing ArcIMS Viewer.

Using the Diagnostics tool to test your ArcIMS installation

16. Open <ArcIMS Installation Directory>/ArcIMS/Xenv/ArcIMS_Diagnostics/ArcIMS_Diagnostics.html in Netscape. The ArcIMS Diagnostics tool displays.
17. Select your Web server protocol, type your Web server name including domain, and type your port number. The default is 80.
18. Click 1 to test the ArcIMS Servlet Connector.

If this test is successful, your ArcIMS Servlet Connector is configured correctly.

If you receive an error message, select the error number in the dropdown list and click View. The error number and a description display. Follow the instructions in the description to fix the problem and try the Diagnostics tool again.

See WMS for information on configuring for WMS.

See Configuring WebLogic for ArcIMS Service Administrator for information on configuring ArcIMS Service Administrator.

See Configuring WebLogic for Metadata Explorer for information on configuring Metadata Explorer.

See Step 5: Configure ArcIMS for instructions on running ArcIMS.

Configuring WebSphere 4.0.2 for IBM HTTP Server

After installing ArcIMS, you must configure your Web server for ArcIMS. If your Web server and servlet engine are not operational, contact your system administrator before you proceed. See www.ibm.com for information on problems with WebSphere.

Creating virtual directories

After installing ArcIMS, you must create virtual directories for output and website. A virtual directory is a mapped location on the Web server to a physical path.

Installing ArcIMS 4.0.1 on Linux Red Hat

1. Open the file <IBM HTTP Installation Directory>/conf/httpd.conf in a text editor.
2. In the Alias section, add the following for website and server output:

```
Alias /output "<Path to output directory>/output"  
<Directory "<Path to output directory>/output">  
Options Indexes MultiViews  
AllowOverride None  
Order allow,deny  
Allow from all  
</Directory>  
  
Alias /website "<Path to website directory>/website"  
<Directory "<Path to website directory>/website">  
Options Indexes MultiViews  
AllowOverride None  
Order allow,deny  
Allow from all  
</Directory>
```
3. For the Web pages designed in ArcIMS to start automatically, make sure your DirectoryIndex line includes default.htm.
For example:
DirectoryIndex index.html default.htm
4. Save and close the file.

Configuring ArcIMS Servlet Connector

5. Start IBM HTTP servers by navigating to <IBM HTTP Server Installation Directory>/bin and typing:
./adminctl start
./apachectl start
6. Make sure IBM WebSphere Application server is running. If not, start the server by navigating to <WebSphere Installation Directory>/AppServer/bin and typing:
./startupServer.sh
7. Start the WebSphere Advanced Administrative Console by navigating to <WebSphere Installation Directory>/AppServer/bin and typing:
./adminclient.sh
8. On the left side panel, expand the WebSphere Administrative Domain, Nodes, computer name and Application Server to make sure that the 'Default Server' is running. If not, right click on it and click on Start.
9. On the tool bar, click on Wizards and select Install Enterprise Application. This opens the Install Enterprise Application Wizard.
10. Select Install stand-alone module (*.war, *.jar). For Path, browse and navigate to <ArcIMS Installation Directory>/Middleware/servlet_connector/arcimsservletconnector.war.
11. For Application Name, type: servlet
12. For Context root for Web module, type: /servlet
13. Click Next and accept all the defaults until you reach the Completing the Application Installation Wizard page. Click on Finish. This deploys the application.
14. The ArcIMS Servlet Connector is installed under installedApps inside the IBM WebSphere installation directory.

Installing ArcIMS 4.0.1 on Linux Red Hat

15. Open the Esrimap_prop file located at <WebSphere Installation Directory>/AppServer/installedApps/servlet.ear/arcimsservletconnector.war/WEB-INF/classes
16. Change the value of appServerMachine to the name of your Application Server computer. For example:
AppServerMachine=<server name>.esri.com
17. Save and close the file.
18. In WebSphere Advanced Administrative Console, right click on 'Default Server' under Nodes, your computer name, Application Servers. Click on Stop. Restart it by clicking on Start.
19. Close the WebSphere Console.

Making ArcIMS files available to Web users

20. To provide your Web users with the ArcIMS files that are necessary to view your Java Web pages, you need to do the following:

```
cp -r <ArcIMS Installation Directory>/ViewerDownLoad/install <Path to website directory>
```

For more information, please see Installing ArcIMS Viewer.

Using the Diagnostics tool to test your ArcIMS installation

21. Open <ArcIMS Installation Directory>/Xenv/ArcIMS_Diagnostics/ArcIMS_Diagnostics.html in Netscape. The ArcIMS Diagnostics tool displays.
22. Select your Web server protocol, type your Web server name including domain, and type your port number. The default is 80.
23. Click 1 to test the ArcIMS Servlet Connector.

If this test is successful, your ArcIMS Servlet Connector is configured correctly.

If you receive an error message, select the error number in the dropdown list and click View. The error number and a description display. Follow the instructions in the description to fix the problem and try the Diagnostics tool again.

See WMS for information on configuring for WMS.

See Configuring WebSphere 4.0.2 for ArcIMS Service Administrator for information on configuring ArcIMS Service Administrator.

See Configuring WebSphere 4.0.2 for Metadata Explorer for information on configuring Metadata Explorer.

See Step 5: Configure ArcIMS for the final step required to get ArcIMS running.

Configuring your Web server for ArcIMS Service Administrator

If you wish to use ArcIMS Service Administrator to remotely administer ArcIMS services, you must configure your Web server:

- Configuring Sun ONE 6.0 (iPlanet)
- Configuring Oracle Application Server 9.0.1
- Configuring ServletExec for Apache
- Configuring Tomcat 3.2.3 for Apache 1.3.20
- Configuring WebLogic 6.1
- Configuring WebSphere 4.0.2 for IBM HTTP Server

Configuring Sun ONE 6.0 (iPlanet) for ArcIMS Service Administrator

If you wish to use ArcIMS Service Administrator to remotely administer ArcIMS services, you must configure your Web server:

1. In a text editor, open <ArcIMS Installation Directory>/ArcIMS/Middleware/Application_Server/AppServer.properties.

```
preferenceFile=<ArcIMS Installation Directory>/ArcIMS/Middleware/Application_Server/sitePreferences.properties
```
2. Find `preferenceFile=` and edit it to point to the `sitePreferences.properties` file:

```
preferenceFile=<ArcIMS Installation Directory>/ArcIMS/Middleware/Application_Server/sitePreferences.properties
```
3. Save and close the file.
4. In your Web browser, type:
`http://<localhost.domain.com>:<serveradminport>`
For example: `http://arcims.esri.com:10000`
Note: If you don't know your server's administration port, open <iPlanet Installation Directory>/servers/https-admserv/config/admin.conf in a text editor and read the `http://<localhost.domain.com>:<serveradminport>` there.
5. Type your user name and password and click OK.
6. Click the Global Settings tab.
7. Click Configure J2SE JRE/JDK Paths on the left sidebar.
8. Click JDK.
9. For path, type the JDK Path, for example, <JDK Installation Directory>/jdk1.3.1. The Libpath and Classpath can be left blank.
10. Click OK and exit iPlanet.
11. In a text editor, open <iPlanet Installation Directory>/https-<localhost>.<domain>.com/config/web-apps.xml.
12. Scroll to the end of the file and add the following lines before `</vs>`.

```
<web-app uri="/esriadmin" dir="<ArcIMS Installation Directory>/ArcIMS/Administrator/esriadmin" />
```

Note: Make sure you specify a valid directory path for web-app. Invalid entries for web-app will prevent your iPlanet Web server from starting. Also, the context path you specify, `/esriadmin`, is case sensitive. You might want to create additional web-apps with names like `ESRIAdmin` or `ESRIADMIN` pointing to ArcIMS Service Administrator.
13. Save and close the file.
14. Stop and Start the iPlanet Web Server.

See *Using ArcIMS*, "Appendix A: Using ArcIMS Service Administrator," for information on the ArcIMS Service Administrator.

See Configuring Sun ONE 6.0 (iPlanet) for Metadata Explorer for information on configuring Metadata Explorer.

See Step 5: Configure ArcIMS for the final step required to get ArcIMS running.

Configuring Oracle Application Server 9.0.1 for ArcIMS Service Administrator

If you wish to use ArcIMS Service Administrator to remotely administer ArcIMS services, you must configure your Web server:

1. Install Oracle9iAS Containers for J2EE (OC4J).
Note: You can find OC4J in the <OAS Installation Directory>/J2EE_containers/oc4j.zip file after you've installed Oracle9i Application Server. If you don't have the `oc4j.zip` file, you can install it from your Oracle Application Server 9i installation CD or you can download it from www.oracle.com.

Installing ArcIMS 4.0.1 on Linux Red Hat

To install OC4J, unzip the oc4j.zip file in the Oracle installation directory and follow the instructions in the README.TXT file.

2. In a text editor, open <J2EE Installation Directory>/config/application.xml and add the following line under the line <orion-application>:

```
<web-module id="esriadmin" path= "<ArcIMS Installation  
Directory>/ArcIMS/Administrator/esriadmin" />
```

3. Save and close the file.
4. In a text editor, open <J2EE Installation Directory>/config/default-web-site.xml and add the following under the line <web-site port="8888">:

```
<web-app application="default" name="esriadmin" root="/esriadmin" />
```

5. Save and close the file.
6. Start OC4J.
7. In a text editor, open <OAS Installation Directory>/Apache/Apache/conf/httpd.conf and add the following two lines:

```
ProxyPass /esriadmin http://hostname:8888/esriadmin  
ProxyPassReverse /esriadmin http://hostname:8888/esriadmin
```

8. Save and close the file.
9. In a text editor, open <ArcIMS Installation Directory>/ArcIMS/Middleware/Application_Server/AppServer.properties.
10. Find `preferenceFile=` and edit it to point to the `sitePreferences.properties` file:

```
preferenceFile=<ArcIMS Installation  
Directory>/ArcIMS/Middleware/Application_Server/sitePreferences.properties
```

11. Save and close the file.
12. Restart Oracle Application Server.

See *Using ArcIMS*, "Appendix A: Using ArcIMS Service Administrator," for information on the ArcIMS Service Administrator.

See *Configuring Oracle Application Server 9.0.1 for Metadata Explorer* for information on configuring Metadata Explorer.

See Step 5: Configure ArcIMS for the final step required to get ArcIMS running.

Configuring ServletExec for Apache for ArcIMS Service Administrator

If you wish to use ArcIMS Service Administrator to remotely administer ArcIMS services, you must configure your Web server:

1. Start the Apache and ServletExec services.
2. In your Web browser, type `http://<localhost>/servlet/admin` to open ServletExec Admin.
3. On the left sidebar under Servlets, click `manage` and verify that `JSP10Servlet` has been loaded.
4. On the left sidebar under Servlets, click `aliases` and verify that there is an entry for `*.jsp` that points to `JSP10Servlet`.
5. In the left sidebar under Web Applications, click `manage`.
6. Click `Add Web Application`.
7. For `Application Name`, type: `esriadmin`

Installing ArcIMS 4.0.1 on Linux Red Hat

8. For URL Context Path, type: /esriadmin

This is the name you will use to run ArcIMS Service Administrator.

Note: The context path you specify is case sensitive. You might want to create more than one Web Application with path names like ESRIadmin or ESRIADMIN pointing to the ArcIMS Service Administrator.

9. For Location, type: <ArcIMS Installation Directory>/Administrator/esriadmin
10. Click Submit and close ServletExec Admin.
11. Open the file <Apache Installation Directory>/conf/httpd.conf.
12. Add the following to the bottom of the httpd.conf

```
AddHandler servlet-exec jsp
ServletExecApplications <localhost> /esriadmin
<Location /esriadmin>
SetHandler servlet-exec
</Location>
```

13. Stop and Start Apache Web server and ServletExec and close the Services window.

See *Using ArcIMS*, "Appendix A: Using ArcIMS Service Administrator," for information on the ArcIMS Service Administrator.

See Configuring ServletExec for Metadata Explorer for information on configuring Metadata Explorer.

See Step 5: Configure ArcIMS for the final step required to get ArcIMS running.

Configuring Tomcat 3.2.3 for Apache 1.3.20 for ArcIMS Service Administrator

If you wish to use ArcIMS Service Administrator to remotely administer ArcIMS services, you must configure your Web server:

1. Navigate to <ArcIMS Installation Directory>/ArcIMS/Administrator and copy the esriadmin directory to <Tomcat Installation Directory>/webapps.

In a text editor, open <ArcIMS Installation

Directory>/ArcIMS/Middleware/Application_Server/AppServer.properties.

2. Find the `preferenceFile` parameter and edit it to point to the `sitePreferences.properties` file:

```
preferenceFile=<ArcIMS Installation
Directory>/ArcIMS/Middleware/Application_Server/sitePreferences.properties
```

3. Save and close the file.
4. Stop the Tomcat and Apache services.
5. Restart the Tomcat and Apache services by typing:

```
setenv JAVA_HOME <J2SE SDK Installation Directory>
setenv PATH $JAVA_HOME/bin:$PATH
<Tomcat Installation Directory>/bin/startup.sh
<Apache Installation Directory>/bin/apachectl start
```

See *Using ArcIMS*, "Appendix A: Using ArcIMS Service Administrator," for information on the ArcIMS Service Administrator.

See Configuring Tomcat 3.2.3 for Apache 1.3.20 for Metadata Explorer for information on configuring Metadata Explorer.

See Step 5: Configure ArcIMS for the final step required to get ArcIMS running.

Installing ArcIMS 4.0.1 on Linux Red Hat

Configuring WebLogic 6.1 for ArcIMS Service Administrator

If you wish to use ArcIMS Service Administrator to remotely administer ArcIMS services, you must configure your Web server:

1. In your Web browser, type `http://<localhost.domain.com>:<serveradminport>/console`, for example:
`http://arcims.esri.com:10000/console`
2. Type your password.
3. On the left sidebar, click Web Applications.
4. Click Configure a new Web Application.
5. For the Name, type: `esriadmin`
6. For Path URI, type: `<ArcIMS Installation Directory>/ArcIMS/Administrator/esriadmin`
7. Click Create.
8. Click the Targets tab.
9. In Servers, move `<WebLogic Server Name>` from Available to Chosen.
10. Click Apply.
11. On the left sidebar, click Servers.
12. Right-click WebLogic, select Stop this server, and click Yes.
13. Close the console.
14. Restart WebLogic.

See *Using ArcIMS*, "Appendix A: Using ArcIMS Service Administrator," for information on the ArcIMS Service Administrator.

See Configuring WebLogic for Metadata Explorer for information on configuring Metadata Explorer.

See Step 5: Configure ArcIMS for the final step required to get ArcIMS running.

Configuring WebSphere 4.0.2 for ArcIMS Service Administrator

If you wish to use ArcIMS Service Administrator to remotely administer ArcIMS services, you must configure your Web Server:

1. In a text editor, open `<ArcIMS Installation Directory>/Middleware/Application_Server/AppServer.properties`.
2. Find the `preferenceFile` parameter and edit it to point to the `sitePreferences.properties` file:
`preferenceFile=<ArcIMS Installation Directory>/Middleware/Application_Server/sitePreferences.properties`
3. Save and close the file.
4. Start IBM HTTP server by navigating to `<IBM HTTP Server Installation Directory>/bin` and typing:
`./adminctl start`
`./apachectl start`
5. Make sure IBM WebSphere Application server is running. If not, start the server by navigating to `<WebSphere Installation Directory>/AppServer/bin` and typing:
`./startupServer.sh`
6. Start the WebSphere Advanced Administrative Console by navigating to `<WebSphere Installation Directory>/AppServer/bin` and typing:
`./adminclient.sh`

Installing ArcIMS 4.0.1 on Linux Red Hat

7. On the left side panel, expand the WebSphere Administrative Domain, Nodes, computer name and Application Server to make sure that the "Default Server" is running. If not, right click on it and click on Start.
8. On the tool panel, click on Wizards and select Install Enterprise Application. This opens the Install Enterprise Application Wizard.
9. Select Install stand-alone module (*.war, *.jar). For Path, Browse and navigate to <ArcIMS Installation Directory>/Administrator/esriadmin.war.
10. For Application Name, type: esriadmin
11. For Context root for Web module, type: /esriadmin
12. Click Next and accept all the defaults until you reach the Completing the Application Installation Wizard page. Click on Finish. This deploys the application.
13. The ArcIMS Service Administrator is installed under installedApps inside the IBM WebSphere installation directory.
14. Open the websphereplugin-cfg.xml file located under <WebSphere Installation Directory>/AppServer/config
Create an esri UriGroup if you don't have one:
<UriGroup Name="esri">
</UriGroup>
Add the following to Route ServerGroup session if you don't have one.
<Route ServerGroup="<server name>/Default Server" UriGroup="esri" VirtualHostGroup="default_host" />
Add <Uri Name="/esriadmin/*" /> to the esri UriGroup session:
<UriGroup Name="esri">
<Uri Name="/esriadmin/*" />
</UriGroup>
15. Save and close the file.
16. Stop and restart the "Default Server".

See Using ArcIMS, "Appendix A: Using ArcIMS Service Administrator," for information on the ArcIMS Service Administrator.

See Configuring WebSphere 4.0.2 for Metadata Explorer for information on configuring Metadata Explorer.

See Step 5: Configure ArcIMS for the final step required to get ArcIMS running.

Setting up ArcSDE UNIX and Linux Servers for ArcIMS Service Administrator

Introduction

This document describes how to set up ArcSDE UNIX and Linux servers for use with the ArcIMS Service Administrator. This document presumes that you have already installed and configured your ArcSDE Server for the DB2, Informix, and Oracle relational database management systems.

To use an ArcSDE Server with ArcIMS Service Administrator, you should already have installed ArcIMS Service Administrator and configured your Web server for ArcIMS Service Administrator. See the ArcIMS Service Administrator instructions for your platform: HP-UX, IBM AIX, Linux Red Hat, SGI IRIX, or Sun Solaris.

Background

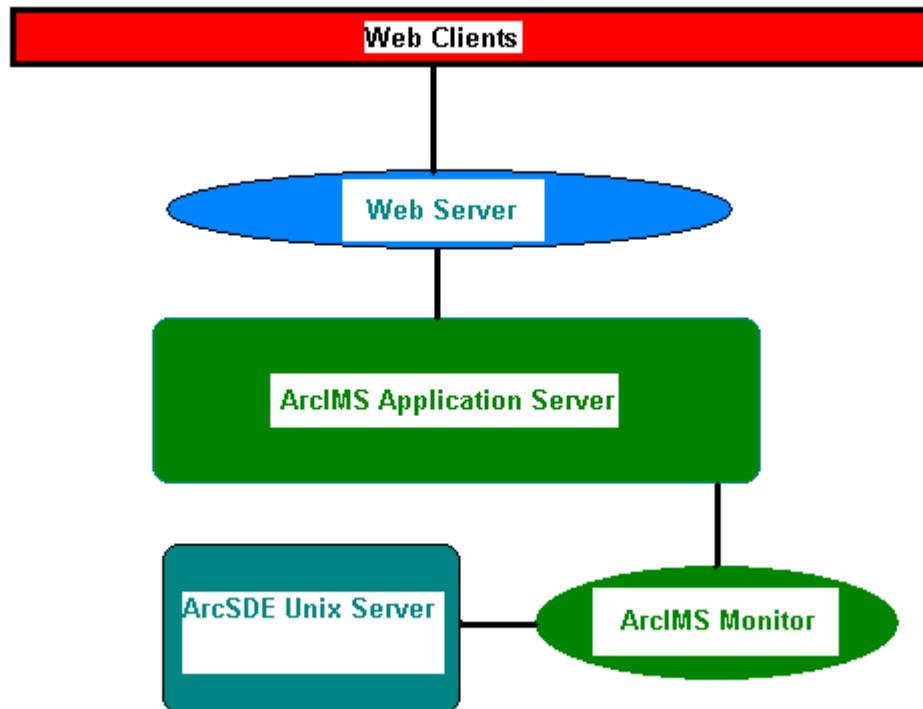
The ArcIMS Service Administrator is a JavaServer Pages application. It uses a presentation tier within a Web browser to administer an ArcSDE service. The ArcIMS Monitor and ArcIMS Application Server are used to direct sde administration requests to an ArcSDE Server. Functionality administered at this release includes:

- Start, stop, pause, resume an ArcSDE three tier service.
- List, terminate, or terminate all ArcSDE gsrvr connections.

Installing ArcIMS 4.0.1 on Linux Red Hat

- Retrieve an ArcSDE server status, including number of connections and release number.

This Web based administrator uses the ArcIMS Application Server and ArcIMS Monitor to send requests to the ArcSDE Application Server. A user makes a request through an html page. This page is generated by JSP, which uses a proxy tier to generate ArcXML requests which are sent through the application server to an ArcIMS monitor. The ArcIMS monitor then generates ArcSDE instance management requests.



Setting up the ArcSDE Server

1. Install and configure ArcSDE—You must install and configure your ArcSDE Server first. Make sure you can start your ArcSDE service with the `sdemon -o start` command. Make sure the `services.sde` file in `$SDEHOME/etc` contains a valid service name entry: `sde82_inf 5200/tcp`
2. You must also have the `jsde82_sdk.jar` and the `jsde82_sdkres.jar` files in your CLASSPATH. These jar files can be installed from the ArcSDE installation CD. The easiest way to locate them in your CLASSPATH is to place them into your J2SE SDK or J2SE JRE installation directory under the `lib/ext` folder.
3. Install ArcIMS Monitor for your platform onto your ArcSDE Server: HP-UX, IBM AIX, Linux Red Hat, SGI IRIX, or Sun Solaris.

You should run the install as the same user who owns the sde binaries and directories. Most likely, this will be the sde user.

4. Once the software is installed:
 - a. Type: `cd <ArcIMS Installation Directory>/ArcIMS/Monitor`
 - b. Open the `Monitor.properties` file in a text editor:
 - c. Change the `registryHost` setting from `localhost` to your ArcIMS Application Server: `registryHost=<server name>.<domain>.com`
 - d. Uncomment the `sdePropertiesFilename` parameter: `sdePropertiesFilename=Sde.properties`

Installing ArcIMS 4.0.1 on Linux Red Hat

- e. Save and close the file.
5. Open the Sde.properties file in that same directory in a text editor:
 - a. Uncomment the instanceNames property and set it equal to your ArcSDE service name:
`instanceNames=esri_sde`
 - b. Uncomment the portNumbers property and set it equal to your ArcSDE server port number: `portNumbers=5151`
 - c. Uncomment the sdehomes property and set it equal to your \$SDEHOME path: `sdehomes=/<server name>/sde82`
6. Open the aimsmonitor script in the `<ArcIMS Installation Directory>/Xenv` directory in a text editor:
 - a. Uncomment the AIMSHOME property and set it to the path to your ArcIMS Installation Directory:
`AIMSHOME=/<server name>/ArcIMS; export AIMSHOME`
 - b. Uncomment the JAVA_HOME property and set it to the path to your Java or J2SE JRE installation:
`JAVA_HOME=/usr/java/jre1.3.1_02`

Note: For this utility, you must have J2SE SDK or J2SE JRE installed. You can install this from the ArcIMS installation CD.

7. Uncomment the \$LD_LIBRARY_PATH and \$LIBPATH properties accordingly. Append your existing \$LD_LIBRARY_PATH or \$LIBPATH to this entry as well.
8. Start the ArcIMS monitor in the \$AIMSHOME/Xenv directory:

`./aimsmonitor start &`

9. Open ArcIMS Service Administrator and login. If you have set up the software correctly, you will see an ArcSDE option. See *Using ArcIMS*, "Appendix A: Using ArcIMS Service Administrator," for information on the ArcIMS Service Administrator. For information about installing, configuring or running ArcSDE, refer to the appropriate ArcSDE documentation.

Configuring your Web server for ArcIMS Metadata Explorer

If you wish to use ArcIMS Metadata Explorer, you must configure your Web server:

- Configuring Sun ONE 6.0 (iPlanet)
- Configuring Oracle Application Server 9.0.1
- Configuring ServletExec for Apache
- Configuring Tomcat 3.2.3 for Apache 1.3.20
- Configuring WebLogic 6.1
- Configuring WebSphere 4.0.2 for IBM HTTP Server

Configuring Sun ONE 6.0 (iPlanet) for Metadata Explorer

If you wish to use Metadata Explorer, you must configure your Web server:

Note: Skip to Step 8 if you already configured your J2SE JRE/JDK paths for ArcIMS Service Administrator.

1. In your Web browser, type:
`http://<localhost.domain.com>:<serveradminport>`
For example: `http://arcims.esri.com:10000`

Installing ArcIMS 4.0.1 on Linux Red Hat

Note: If you don't know your server's administration port, open <iPlanet Installation Directory>/servers/https-admserv/config/admin.conf in a text editor and read the `http://<localhost.domain.com>:<serveradminport>` there.

2. Type your user name and password and click OK.
3. Click the Global Settings tab.
4. Click Configure J2SE JRE/JDK Paths on the left sidebar.
5. Click JDK.
6. For path, type the JDK Path, for example, <JDK Installation Directory>/jdk1.3.1. The Libpath and Classpath can be left blank.
7. Click OK and exit iPlanet.
8. In a text editor, open <iPlanet Installation Directory>/https-<localhost>.<domain>.com/config/web-apps.xml.
9. Scroll to the end of the file and add the following lines before </vs>.

```
<web-app uri="/metadataexplorer" dir="<ArcIMS Installation  
Directory>/ArcIMS/Metadata/metadataexplorer" />
```

Note: Make sure you specify a valid directory path for web-app. Invalid entries for web-app will prevent your iPlanet Web server from starting. Also, the context path you specify, /metadataexplorer, is case sensitive. You might want to create additional web-apps with names like MetadataExplorer or METADATAEXPLORER pointing to ArcIMS Metadata Explorer.

10. Save and close the file.
11. Stop and Start the iPlanet Web Server.

See *Creating and Using Metadata Services* for information on Metadata Explorer.

See *Configuring Sun ONE 6.0 (iPlanet) for ArcIMS Service Administrator* for information on configuring ArcIMS Service Administrator.

See Step 5: Configure ArcIMS for the final step required to get ArcIMS running.

Configuring Oracle Application Server 9.0.1 for Metadata Explorer

If you wish to use Metadata Explorer, you must configure your Web server:

Note: Skip to Step 2 if you already installed Oracle9iAS Containers for ArcIMS Service Administrator.

1. Install Oracle9iAS Containers for J2EE (OC4J).

Note: You can find OC4J in the <OAS Installation Directory>/J2EE_containers/oc4j.zip file after you've installed Oracle9i Application Server. If you don't have the oc4j.zip file, you can install it from your Oracle Application Server 9i installation CD or you can download it from www.oracle.com.

To install OC4J, unzip the oc4j.zip file in the OAS installation directory and follow the instructions in the README.TXT file.

2. In a text editor, open <J2EE Installation Directory>/config/application.xml and add the following line under the line <orion-application>:

```
<web-module id="metadataexplorer" path="<ArcIMS Installation Directory>/ArcIMS/Metadata/metadataexplorer" />
```
3. Save and close the file.
4. In a text editor, open <J2EE Installation Directory>/config/default-web-site.xml and add the following under the line <web-site port="8888">:

```
<web-app application="default" name="metatdataexplorer" root="/metadataexplorer" />
```


Installing ArcIMS 4.0.1 on Linux Red Hat

5. Save and close the file.
6. Start OC4J.
7. In a text editor, open <OAS Installation Directory>/Apache/Apache/conf/httpd.conf and add the following two lines:
ProxyPass /metadataexplorer http://hostname:8888/metadataexplorer
ProxyPassReverse /metadataexplorer http://hostname:8888/metadataexplorer
8. Save and close the file.
9. Restart Oracle Application Server.

See *Creating and Using Metadata Services* for information on Metadata Explorer.

See Configuring Oracle Application Server 9.0.1 for ArcIMS Service Administrator for information on configuring ArcIMS Service Administrator.

See Step 5: Configure ArcIMS for the final step required to get ArcIMS running.

Configuring ServletExec for Apache for Metadata Explorer

If you wish to use Metadata Explorer, you must configure your Web server:

1. Start the Apache and ServletExec services.
2. In your Web browser, type http://<localhost>/servlet/admin to open ServletExec Admin.
3. On the left sidebar under Servlets, click manage and verify that JSP10Servlet has been loaded.
4. On the left sidebar under Servlets, click aliases and verify that there is an entry for *.jsp that points to JSP10Servlet.
5. In the left sidebar under Web Applications, click manage.
6. Click Add Web Application.
7. For Application Name, type: metadataexplorer
8. For URL Context Path, type: /metadataexplorer

This is the name you will use to run Metadata Explorer.

Note: The context path you specify is case sensitive. You might want to create more than one Web Application with path names like MetadataExplorer or METADATAEXPLORER pointing to the ArcIMS Metadata Explorer.

9. For Location, type: <ArcIMS Installation Directory>/Metadata/metadataexplorer
10. Click Submit and close ServletExec Admin.
11. Open the file <Apache Installation Directory>/conf/httpd.conf.
12. Add the following to the bottom of the httpd.conf

```
AddHandler servlet-exec jsp
```

```
ServletExecApplications <localhost> /metadataexplorer
```

```
<Location /metadataexplorer>
```

```
SetHandler servlet-exec
```

```
</Location>
```

13. Stop and Start Apache Web server and ServletExec and close the Services window.

See *Creating and Using Metadata Services* for information on Metadata Explorer.

Installing ArcIMS 4.0.1 on Linux Red Hat

See Configuring ServletExec for Service Administrator for information on configuring Service Administrator.

See Step 5: Configure ArcIMS for the final step required to get ArcIMS running.

Configuring Tomcat 3.2.3 for Apache 1.3.20 for Metadata Explorer

If you wish to use Metadata Explorer, you must configure your Web server:

1. Navigate to <ArcIMS Installation Directory>/ArcIMS/Metadata and copy the metadataexplorer directory to <Tomcat Installation Directory>/webapps.
2. Stop the Tomcat and Apache services.
3. Restart the Tomcat and Apache services by typing:
setenv JAVA_HOME <J2SE SDK Installation Directory>
setenv PATH \$JAVA_HOME/bin:\$PATH
<Tomcat Installation Directory>/bin/startup.sh
<Apache Installation Directory>/bin/apachectl start

See *Creating and Using Metadata Services* for information on Metadata Explorer.

See Configuring Tomcat 3.2.3 for Apache 1.3.20 for ArcIMS Service Administrator for information on configuring ArcIMS Service Administrator.

See Step 5: Configure ArcIMS for the final step required to get ArcIMS running.

Configuring WebLogic 6.1 for Metadata Explorer

If you wish to use Metadata Explorer, you must configure your Web server:

1. In your Web browser, type `http://<localhost.domain.com>:<serveradminport>/console`, for example:
`http://arcims.esri.com:10000/console`
2. Type your password.
3. On the left sidebar, click Web Applications.
4. Click Configure a new Web Application.
5. For the name, type: metadataexplorer
6. For Path URI, type: <ArcIMS Installation Directory>/ArcIMS/Metadata/metadataexplorer
7. Click Create.
8. Click the Targets tab.
9. In Servers, move <WebLogic Server Name> from Available to Chosen.
10. Click Apply.
11. On the left sidebar, click Servers.
12. Right-click WebLogic, select Stop this server, and click Yes.
13. Close the console.
14. Restart WebLogic.

See *Creating and Using Metadata Services* for information on Metadata Explorer.

See Configuring WebLogic for ArcIMS Service Administrator for information on configuring ArcIMS Service Administrator.

See Step 5: Configure ArcIMS for the final step required to get ArcIMS running.

Installing ArcIMS 4.0.1 on Linux Red Hat

Configuring WebSphere 4.0.2 for Metadata Explorer

If you wish to use Metadata Explorer, you must configure your Web server:

1. Start IBM HTTP server by navigating to <IBM HTTP Server Installation Directory>/bin and typing:
`./adminctl start`
`./apachectl start`
2. Make sure IBM WebSphere Application server is running. If not, start the server by navigating to <WebSphere Installation Directory>/AppServer/bin and typing:
`./startupServer.sh`
3. Start the WebSphere Advanced Administrative Console by navigating to <WebSphere Installation Directory>/AppServer/bin and typing:
`./adminclient.sh`
4. On the left side panel, expand the WebSphere Administrative Domain, Nodes, computer name and Application Server to make sure that the "Default Server" is running. If not, right click on it and click on Start.
5. On the tool bar, click on Wizards and select Install Enterprise Application. This opens the Install Enterprise Application Wizard.
6. Select Install stand-alone module (*.war, *.jar). For Path, Browse and navigate to <ArcIMS Installation Directory>/Metadata/metadataexplorer.war.
7. For Application Name, type: metadataexplorer
8. For Context root for Web module, type: /metadataexplorer
9. Click Next and accept all the defaults until you reach the Completing the Application Installation Wizard page. Click on Finish. This deploys the application.
10. The ArcIMS Metadata Explorer is installed under installedApps inside the IBM WebSphere installation directory.
11. Open the plugin-cfg.xml file located under <WebSphere Installation Directory>/AppServer/config
Create an esri UriGroup if you don't have one:
`<UriGroup Name="esri">`
`</UriGroup>`
Add the following to Route ServerGroup session if you don't have one.
`<Route ServerGroup="<server name>/Default Server" UriGroup="esri" VirtualHostGroup="default_host" />`
Add `<Uri Name="/metadataexplorer/*" />` to the esri UriGroup session:
`<UriGroup Name="esri">`
`<Uri Name="/metadataexplorer/*" />`
`</UriGroup>`
12. Save and close the file.
13. Stop and restart the "Default Server".

See *Creating and Using Metadata Services* for information on Metadata Explorer.

See Configuring WebSphere 4.0.2 for ArcIMS Service Administrator for information on configuring ArcIMS Service Administrator.

See Step 5: Configure ArcIMS for the final step required to get ArcIMS running.

Step 5: Configure ArcIMS

Perform the following activities to set up your ArcIMS environment:

- Setting up your ArcIMS account
- Using ArcIMS with a proxy server
- Starting the ArcIMS processes
- Running ArcIMS

ESRI recommends that you execute ArcIMS from a C shell. The following instructions are for a C shell environment setup.

Setting up your ArcIMS account

ESRI recommends that you set up a separate account for installing and administering ArcIMS.

1. Add the following lines to your .login or .cshrc file:

```
setenv AIMSHOME <ArcIMS Installation Directory>/ArcIMS
setenv LD_LIBRARY_PATH $AIMSHOME/lib:$AIMSHOME/bin
```

Make sure that \$AIMSHOME/bin is in the PATH.

2. To enable the changes, type:

```
% source <.login or .cshrc>
```

The \$AIMSHOME/Xenv directory contains sample system startup files such as the .login and .cshrc files.

3. Copy the \$AIMSHOME/Xenv/aimsdefaults.properties file to your HOME directory.

```
% cp $AIMSHOME/Xenv/aimsdefaults.properties $HOME
```

4. Edit the \$HOME/aimsdefaults.properties file.

Note: Do not use system or user variables in this file. Provide the complete path.

- a. Replace all references to ARCMISHOST with the full name of your host computer.
- b. Add a working directory location. Updating this variable will save time in navigating to the location where map configuration files are stored. To change this location, you must add a path to the following variable:
WorkingDir=<path to location where you wish to store map configuration files>
- c. For geocoding, you must add a path to the following variable:
IndexBuilderEXE=<ArcIMS Installation Directory>/ArcIMS/IndexBuilder/aimsindxb.exe
- d. Update the value of the following variable to point to the location of the image output directory:
ImagePath=/disk1/ArcIMS/output
- e. Update the value of the following line to point to the location of a valid browser:
WebBrowser=<Netscape Installation Directory>/netscape
- f. To access ArcIMS Help, update the value of the following line to reflect the location of your ArcIMS installation:
ArcIMSHelp=<ArcIMS Installation Directory>/Manager/Help/arcims_help.htm
- g. Update the value of the following variable to point to the location of the Web site where created sites are output:
WebSiteDir=/disk1/ArcIMS/website

Using ArcIMS with a proxy server

Use the Proxy Server properties to specify whether your LAN uses a proxy server to connect to the Internet. A proxy server is a computer on your LAN that connects to the Internet without compromising the security of your internal network. If you are not sure how your LAN connects to the Internet, contact your system administrator.

If you use proxy servers, then set the appropriate properties in the `aimsproxy.properties` file, which is located in your `$HOME` directory.

- If your LAN uses a proxy server to connect to the Internet for HTTP protocol requests:
 1. Open `$AIMSHOME/Xenv/aimsproxy.properties` in a text editor.
 2. Set the `HostName` and `Port` of the proxy server to use. For example:
`httpproxyhost=proxy.esri.com`
`httpproxyport=5000`
 3. After editing the `aimsproxy.properties` file, copy it to your `$HOME` directory:
`cp $AIMSHOME/Xenv/aimsproxy.properties $HOME`
- If your LAN connects to the Internet via a proxy server using a secure HTTP protocol (HTTPS):
 1. Open `$AIMSHOME/Xenv/aimsproxy.properties` in a text editor.
 2. Set the `HostName` and `Port` of the https proxy server to use. For example:
`httpsproxyhost=httpsproxy.esri.com`
`httpsproxyport=5010`
 3. After editing the `aimsproxy.properties` file, copy it to your `$HOME` directory:
`cp $AIMSHOME/Xenv/aimsproxy.properties $HOME`
- If your LAN doesn't use a proxy server and is directly connected to the Internet, do not set these properties. By default, they are not set.

Starting the ArcIMS processes

Three scripts are located in the `$AIMSHOME/Xenv` directory. These scripts are used to start the ArcIMS processes. They are:

`aimsappsrvr`—Starts and Stops the ArcIMS Application Server

`aimsmonitor`—Starts and Stops the ArcIMS Monitor

`aimstasker`—Starts and Stops the ArcIMS Tasker

Note: To start the ArcIMS Monitor process at system boot, refer to the instructions provided in the file `$AIMSHOME/Xenv/automatic_startup_instructions`.

The ArcIMS processes rely on property files for some of their information. These files are located at:

Application Server: `$AIMSHOME/Middleware/Application_Server/AppServer.properties`

Monitor: `$AIMSHOME/Monitor/Monitor.properties`

Tasker: `$AIMSHOME/Middleware/Tasker/Tasker.properties`

Each file contains a description of the various settings. Follow the descriptions to customize the processes. The `Monitor.properties` and the `Tasker.properties` files need to be edited prior to starting the `aimsmonitor` and `aimstasker` processes.

Installing ArcIMS 4.0.1 on Linux Red Hat

1. Edit the Monitor.properties file and change the value "localhost" to the name of your Application Server. For example:
registryHost = <server name>.esri.com
2. Edit the Tasker.properties file and change the value "localhost" to the name of your Application Server, for example,
registryHost = <server name>.esri.com
Change the value of "taskFile" to the path where the Tasks.xml file is located.
Also, edit the Tasks.xml file so that it contains a valid output path.
3. To start the processes manually, navigate to the \$AIMSHOME/Xenv directory and start the services in the following order:

```
./aimsappsrvr start &  
./aimsmonitor start &  
./aimstasker start &
```
4. To test the processes, open <ArcIMS Installation Directory>/ArcIMS/Xenv/ArcIMS_Diagnostics/ArcIMS_Diagnostics.html in Netscape. The ArcIMS Diagnostics displays.
 - a. Select your Web server protocol, type your Web server name including domain, and type your port number. The default is 80.
 - b. Click 2 to test the ArcIMS Application Server.
If this test is successful, your ArcIMS Application Server is configured correctly.
If you receive an error message, select the error number in the dropdown list. The error number and a description display. Follow the instructions in the description to fix the problem and try the Diagnostics tool again.
5. To stop the processes manually, navigate to the \$AIMSHOME/Xenv directory and stop the services in the following order:

```
./aimstasker stop  
./aimsmonitor stop  
./aimsappsrvr stop
```

Running ArcIMS

The various ArcIMS components can be launched by typing the following commands at the system prompt:

```
aimsadmin  
aimsauthor  
aimsdesigner
```

The scripts are located in the \$AIMSHOME/bin directory and are accessed by including this directory in the \$PATH variable. You are ready to use ArcIMS.

Troubleshooting

Most problems associated with starting ArcIMS occur because of a problem with the system environment. Often a critical step was missed during the installation or configuration of the software. This topic reviews common problems with suggested approaches to solving them.

- The ports used by ArcIMS are already in use on my system.
- My ArcIMS Catalog hangs when I select local data.
- When I run aimsadmin for the first time or after deleting *.sez files, there are no ArcIMS Virtual Servers available.
- Additional Online Troubleshooting articles.

Problem: The ports used by ArcIMS are already in use on my system.

Solution:

Change the port numbers ArcIMS uses. ArcIMS uses predefined ports to communicate between the Application Server and the Servlet Connector and the Application Server and the Spatial Server.

The default ports are:

5300 for communication between the Application Server and the Servlet Connector.

5353 for communication between the Application Server and the Spatial Server.

If there is a conflict with existing ports, it will be necessary to change the ArcIMS ports. Follow these steps:

1. Edit the following lines in \$AIMSHOME/Middleware/servlet_connector/Esrimap_prop.
appServerMachine=APPSMACHINE
appServerClientPort=5300 **Change port number
2. Edit the following lines in \$AIMSHOME/Middleware/ Application_Server/AppServer.properties.
connectorPort=5300 **Change port number
regPort=5353 **Change port number
3. Edit the following line in the \$AIMSHOME/Monitor/Monitor.properties:
registryPort=5353
Change 5353 to the regPort assigned in Step 2.
4. Shut down the ArcIMS Tasker, ArcIMS Monitor, and ArcIMS Application Server processes:
./aimstasker stop
./aimsmonitor stop
./aimsappsrvr stop
5. Restart your Web server. Then start the ArcIMS Application Server, ArcIMS Monitor, and the ArcIMS Tasker processes:
./aimsappsrvr start &
./aimsmonitor start &
./aimstasker start &

Installing ArcIMS 4.0.1 on Linux Red Hat

Problem: My ArcIMS Catalog hangs when I select local data.

Solution:

On UNIX/Linux, ArcIMS works best with Automount file systems as opposed to static mount file systems.

When a static mount NFS server is down, just as performing an ls on root (/) will hang, ArcIMS will hang if you select the local data access option in the ArcIMS Catalog.

Problem: When I run aimsadmin for the first time or after deleting *.sez files, there are no ArcIMS Virtual Servers available.

Solution:

Exit aimsadmin and reinitiate it. This should resolve the problem.

Additional Online Troubleshooting articles:

Troubleshooting ArcIMS Installation:

ArcIMS Viewer must be removed before installing ArcIMS - Article 23357 at <http://support.esri.com/search/KbDocument.asp?dbid=23357>

Post installation setup - Web server servlet engine configuration completed with errors - Article 23672 at <http://support.esri.com/search/KbDocument.asp?dbid=23672>

Error: Please enter a valid username on your domain - Article 23727 at <http://support.esri.com/search/KbDocument.asp?dbid=23727>

(Windows only) AdminSiteApplet is not found for Manager - Article 20394 at <http://support.esri.com/search/KbDocument.asp?dbid=20394>

Troubleshooting Web server & servlet engine:

Jakarta Tomcat service fails to start due to internal error - Article 22327 at <http://support.esri.com/search/KbDocument.asp?dbid=22327>

HowTo: Update ServletExec to use a new version of JRE - Article 20340 at <http://support.esri.com/search/KbDocument.asp?dbid=20340>

(Windows only) Tomcat service fails to start - Article 18766 at <http://support.esri.com/search/KbDocument.asp?dbid=18766>

Check out <http://support.esri.com/search/KbDocument.asp?dbid=23450> for information on setting up your Web server and servlet engine.

Troubleshooting Application start up after installation:

Unable to login to Administrator in ArcIMS - Article 23057 at <http://support.esri.com/search/KbDocument.asp?dbid=23057>

Add virtual server failed - Article 22055 at <http://support.esri.com/search/KbDocument.asp?dbid=22055>

(Linux only) Map service not available due to fonts missing - Article 22185 at <http://support.esri.com/search/KbDocument.asp?dbid=22185>

ArcIMS services or Tomcat stop immediately after starting - Article 20915 at <http://support.esri.com/search/KbDocument.asp?dbid=20915>

Installing ArcIMS 4.0.1 on Linux Red Hat

Reset ArcIMS so that Administrator prompts for new user information - Article 15442 at <http://support.esri.com/search/KbDocument.asp?dbid=15442>

HowTo: Create a scripts virtual directory in IIS - Article 23622 at <http://support.esri.com/search/KbDocument.asp?dbid=23622>

HowTo: View error messages generated by Administrator, Author, and ArcExplorer—Java while developing an ArcIMS site - Article [19439](#) at <http://support.esri.com/search/KbDocument.asp?dbid=19439>

HowTo: Enable Complete Logging for the ArcIMS Application Server and Spatial Server - Article 20844 at <http://support.esri.com/search/KbDocument.asp?dbid=20844>

Unable to add ArcMap Image Service because the ArcMap image server is not showing up - Article 22034 at <http://support.esri.com/search/KbDocument.asp?dbid=22034>

Unable to create an ArcMap Image Service – Article 22039 at <http://support.esri.com/search/KbDocument.asp?dbid=22039>

"Requested Map Service not available" error in HTML viewer – Article 21331 at <http://support.esri.com/search/KbDocument.asp?dbid=21331>

URL is invalid, or ArcIMS is not running in Administrator – Article 23444 at <http://support.esri.com/search/KbDocument.asp?dbid=23444>

Uninstalling ArcIMS 4.0.1

You must remove the following items to uninstall ArcIMS:

1. Remove <ArcIMS Installation Directory>/ArcIMS.
2. Remove the following from the appropriate Web server location:
 - com directory
 - Erimap_prop
 - ServletConnector_Res.properties
 - ServletConnector_Res_en_US.properties
 - WMSErimap_prop
3. Remove the following files from your \$HOME directory:
 - aimsdefaults.properties
 - aimsproxy.properties, if applicable

Note: If you are using Sun ONE 6.0 (iPlanet) with ArcIMS, before Sun ONE 6.0 (iPlanet) will restart you must remove all references to ArcIMS from the web-apps.xml file located in: <Sun ONE 6.0 (iPlanet) Installation Directory>/servers/https-<localhost>.<domain>.com/config.

Installing ArcIMS Viewer

The ArcIMS Viewer installation allows your end users to view ArcIMS Web sites created using the Java Viewers.

The client is supported on Windows 98, Windows NT, Windows 2000, Windows XP, HP-UX, IBM AIX, Linux Red Hat, SGI IRIX and Sun Solaris; 128 MB of RAM are required for the Java clients.

Note: You must uninstall ArcExplorer—Java Edition on your Windows computer before you install ArcIMS Viewer.

The items installed are:

- Java Plug-in 1.3 or higher (if needed)
- ESRI ArcIMS Viewer
- ArcExplorer—Java 4.0.1

See the section for your platform:

- Installing ArcIMS Viewer on HP-UX
- Installing ArcIMS Viewer on IBM AIX
- Installing ArcIMS Viewer on Linux Red Hat
- Installing ArcIMS Viewer on Microsoft Windows
- Installing ArcIMS Viewer on SGI IRIX
- Installing ArcIMS Viewer on Sun Solaris

Installing ArcIMS Viewer on HP-UX

The ArcIMS Host computer runs the ArcIMS Web site, and the ArcIMS remote computer accesses the Web site from a Web browser via the Intranet or Internet.

An Intranet client has NFS access to the ArcIMS Host, and an Internet client has only HTTP access.

Note: ArcIMS Web sites created using the Java Custom Viewer cannot be viewed from an HP-UX remote computer.

To view ArcIMS Web sites created using the ArcIMS Java Standard Viewer, the following components must be installed on the remote computer:

- J2SE JRE 1.3 (the Java Plug-in is included with J2SE JRE)
- ArcIMS Viewer

If the remote computer has ArcIMS Manager or ArcExplorer—Java Edition installed, the J2SE JRE and ArcIMS Viewer are already available on it. If not, Internet clients are prompted to install these via the ArcIMS Viewer installation. Intranet clients can copy the necessary components to their computer. See *Installing ArcIMS Viewer on a remote HP-UX computer*.

There are four steps required to set up a remote ArcIMS Viewer:

1. Setting up the ArcIMS Host computer
2. Installing JRE 1.3 on a remote computer
3. Installing ArcIMS Viewer on a remote HP-UX computer
4. Setting up ArcExplorer—Java Edition on a remote computer

The steps have different instructions for Internet and Intranet clients, where appropriate.

Setting up the ArcIMS Host computer on UNIX/Linux

To provide Internet clients with the ability to download the ArcIMS Viewer from an ArcIMS Web site, the ArcIMS Web site Administrator must do the following:

```
cp -r $AIMSHOME/ViewerDownload/install <path to your ArcIMS website directory>
```

For information on the ArcIMS website directory specific to the type of Web server you are using, see *Configuring your Web server for HP-UX, IBM AIX, Linux Red Hat, SGI IRIX, or Sun Solaris*.

If you are using Sun ONE 6.0 (iPlanet) Web server, you must make changes to support the use of ArcIMS Viewer. See the instructions for *Configuring your Sun ONE 6.0 (iPlanet) Web server for ArcIMS Viewer*.

Once you have set up the ArcIMS Host computer, the next step is to install JRE 1.3 or higher on a remote HP-UX, IBM AIX, Linux Red Hat, SGI IRIX, or Sun Solaris computer.

Installing JRE 1.3 or higher on a remote HP-UX computer

Internet clients only

When a remote HP-UX computer tries to access an ArcIMS Java Standard Web site, the application automatically detects whether the J2SE JRE and the Plug-in are installed. If not, the browser is redirected to www.hp.com to download J2SE JRE 1.3. If you have already installed J2SE JRE 1.3 but still receive the redirect message, the Plug-in may not be configured properly.

Internet and Intranet clients

1. Register and follow the instructions to download and install J2SE JRE.
2. ESRI recommends that you increase the Java VM memory parameters. Open the Java Plug-in Control Panel and set the required memory parameters in the field named Java Run Time parameters to

Installing ArcIMS 4.0.1 on Linux Red Hat

-Xms10m -Xmx256m

and click Apply.

The Java Plug-in Control Panel is located at <JRE Installation Directory>/bin/ControlPanel.

3. Configure J2SE JRE 1.3:

- a. Make sure the correct J2SE JRE is being used. Add the following to your .cshrc file:

```
setenv JAVA_HOME <JRE Installation Directory>
set path = ( $JAVA_HOME/bin $path)
```

For Netscape to use the correct Plug-in, add the following variables to your .cshrc file:

```
setenv NPX_PLUGIN_PATH <path to Java install>/plugin/PA_RISC/ns4
setenv NPX_JRE_PATH <JRE Installation Directory>
```

- b. Source the .cshrc file:

```
source .cshrc
```

Once you have J2SE JRE 1.3 installed, the next step is to install ArcIMS Viewer.

Installing ArcIMS Viewer on a remote HP-UX computer

Internet clients only

1. Once you have installed J2SE JRE and configured JPI, close your browser to clear the cache and reopen it.
2. Type the URL to the ArcIMS Web site:
`http://<hostname>/website/<name>/default.htm`
3. At the ESRI ArcIMS Viewer screen, click Download installer for Unix.
4. The ArcIMS Viewer installer is automatically downloaded to your \$HOME directory. The Viewer installer: AEJava.bin is saved under \$HOME/IA_Installers/ESRI_ArcIMS_Viewer directory. The Viewer installer is automatically executed.
5. At the language screen, choose a language and click OK.
6. At the Location of JRE screen, choose the location where you installed J2SE JRE 1.3. This should be the same as what your \$NPX_JRE_PATH variable is set to in Step 4 of Installing JRE 1.3 on a remote HP-UX computer. Click Next.

Note: You must have write access to the lib and bin directories in JRE.

7. At the Introduction screen, click Next.
8. At the Installation Directory screen, choose the installation directory and click Install. The installer creates a directory called AEJava4.0 at this location.

Note: The Viewer JAR files and libraries are installed directly into the JRE directory that you selected in Step 8. See the install.log file located in AEJava4.0/UninstallerData for a list of where each file is copied.

9. At the Install Complete screen, click Done.
10. Close the browser to clear the cache, and reopen it.

You are now ready to view ArcIMS Web pages created using the Java Standard Viewer. Proceed to Setting up ArcExplorer—Java Edition on a remote UNIX/Linux computer.

Intranet clients only

Check with your ArcIMS system administrator if you do not know what \$AEJHOME should be set to.

1. Copy the Viewer *.jar files to your JRE ext directory:

Installing ArcIMS 4.0.1 on Linux Red Hat

```
cp $AEJHOME/lib/*.jar $NPX_JRE_PATH/lib/ext
```

2. Add \$AEJHOME/lib to your LD_LIBRARY_PATH in your .cshrc file:

```
setenv LD_LIBRARY_PATH $AEJHOME/lib:$LD_LIBRARY_PATH
```

You are now ready to view ArcIMS Web pages created using the Java Standard Viewer. Proceed to Setting up ArcExplorer—Java Edition on a remote UNIX/Linux computer.

Setting up ArcExplorer—Java Edition on a remote UNIX/Linux computer

Intranet and Internet clients

Check with your ArcIMS system administrator if you do not know what \$AEJHOME should be set to.

1. To enable ArcExplorer—Java Edition, set the following variable in your .cshrc file:

```
setenv AEJHOME <ArcExplorer Installation Directory>/aej40exe
```

2. In your .cshrc file, add \$AEJHOME/bin to your \$PATH variable or set an alias to the startup script:

```
set path = ( $path $AEJHOME/bin )
```

or

```
alias aejava $AEJHOME/bin/aejava
```

3. To enable ArcExplorer—Java Edition Help, copy the aimsclient.properties file from <ArcExplorer Installation Directory>/Xenv to your \$HOME directory, open the file in a text editor, and edit the values for:

- WebBrowser=<Netscape Installation Directory>/netscape
AEJavaHelp=<ArcExplorer Installation Directory>/aej40exe/Help/aejava_help.htm
- Save and close the file.

4. Source your .cshrc file:

```
source .cshrc
```

5. To start ArcExplorer—Java Edition, type:

```
aejava
```

You can now use ArcExplorer—Java Edition to view local data and ArcIMS services.

Note: If your remote IBM AIX computer accesses an ArcIMS Web site created using the Java Standard Viewer on Windows or Solaris, then you will encounter the following warning message: "You need a font named Arial to view data from this server." Click OK. This is just a warning message, and it should not affect the functionality of the Java Standard Viewer.

Note: If your remote Windows computer accesses an ArcIMS Web site created using the Java Custom Viewer on SGI IRIX, then you will encounter the following warning message: "You need a font named Helvetica to view data from this server." Click OK. This is just a warning message, and it should not affect the functionality of the Java Custom Viewer.

Installing ArcIMS Viewer on IBM AIX

The ArcIMS Host computer runs the ArcIMS Web site, and the ArcIMS remote computer accesses the Web site from a Web browser via the Intranet or Internet.

An Intranet client has NFS access to the ArcIMS Host, and an Internet client has only HTTP access.

Note: ArcIMS Web sites created using the Java Custom Viewer cannot be viewed from an AIX remote computer.

To view ArcIMS Web sites created using the ArcIMS Java Standard Viewer, the following components must be installed on the remote computer:

- J2SE JRE 1.3 or higher (the Java Plug-in is included with J2SE JRE)
- ArcIMS Viewer

If the remote computer has ArcExplorer—Java Edition installed, the J2SE JRE and ArcIMS Viewer are already available on it. If not, Internet clients are prompted to install these via the ArcIMS Viewer installation. Intranet clients can copy the necessary components to their computer. See Installing ArcIMS Viewer on a remote AIX computer.

There are four steps required to set up a remote ArcIMS Viewer:

1. Setting up the ArcIMS Host computer on UNIX/Linux
2. Installing JRE 1.3 or higher on a remote IBM AIX computer
3. Installing ArcIMS Viewer on a remote IBM AIX computer
4. Setting up ArcExplorer—Java Edition on a remote UNIX/Linux computer

The steps have different instructions for Internet and Intranet clients, where appropriate.

Setting up the ArcIMS Host computer on UNIX/Linux

To provide Internet clients with the ability to download the ArcIMS Viewer from an ArcIMS Web site, the ArcIMS Web site Administrator must do the following:

```
cp -r $AIMSHOME/ViewerDownload/install <path to your ArcIMS website directory>
```

For information on the ArcIMS website directory specific to the type of Web server you are using, see Configuring your Web server for HP-UX, IBM AIX, Linux Red Hat, SGI IRIX, or Sun Solaris.

If you are using Sun ONE 6.0 (iPlanet) Web server, you must make changes to support the use of ArcIMS Viewer. See the instructions for Configuring your Sun ONE 6.0 (iPlanet) Web server for ArcIMS Viewer.

Once you have set up the ArcIMS Host computer, the next step is to install JRE 1.3 or higher on a remote HP-UX, IBM AIX, Linux Red Hat, SGI IRIX, or Sun Solaris computer.

Installing JRE 1.3 or higher on a remote IBM AIX computer

Internet clients only

When a remote computer tries to access an ArcIMS Java Standard Web site, the application automatically detects whether the J2SE JRE and Plug-in are installed. If it does not detect your J2SE JRE, you need to go to the following IBM Web site to download J2SE JRE 1.3 or higher: <http://www.ibm.com/java/jdk>.

If you have already installed J2SE JRE 1.3 or higher, but it is not detected, the Plug-in may not be configured properly. Skip to Step 4 below for instructions on configuring J2SE JRE 1.3 or higher and the Plug-in.

Internet and Intranet clients

The URL for the IBM J2SE JRE 1.3 or higher download is <http://www.ibm.com/java/jdk>.

Installing ArcIMS 4.0.1 on Linux Red Hat

1. Register and follow the instructions to download the J2SE JRE.
2. ESRI recommends that you increase the Java VM memory parameters. Open the Java Plug-in Control Panel located at <JRE Installation Directory>/bin/JavaPluginControlPanel. Set the required memory parameters in the field named Java Run Time Parameters:

-Xms10m -Xmx256m

Click Apply.
3. Make sure that you add \$JAVA_HOME/bin to LIBPATH. See System requirements for more information.
4. Configure JRE 1.3 or higher:
 - a. Make sure the correct J2SE JRE is being used. Add the following to your .cshrc file:

setenv JAVA_HOME <JRE Installation Directory>

set path = (\$JAVA_HOME/bin \$path)
 - b. Source the .cshrc:

source .cshrc
 - c. For Netscape to use the correct Plug-in, copy the javaplugin.a file from your \$JAVA_HOME/bin directory to your Netscape plugin directory:

cp <JRE Installation Directory>/bin/javaplugin.a <Netscape Installation Directory>/plugins

Once you have J2SE JRE 1.3 or higher installed, the next step is to install ArcIMS Viewer.

Installing ArcIMS Viewer on a remote IBM AIX computer

Internet clients only

1. Once you have installed J2SE JRE, close your browser to clear the cache and reopen it.
2. Type the URL to the ArcIMS Web site:

http://<hostname>/website/<name>/default.htm
3. At the ESRI ArcIMS Viewer screen, click Start Installer for AIX.
4. The ArcIMS Viewer installer is automatically downloaded to your \$HOME directory. The Viewer installer: AEJava.bin is save under \$HOME/IA_Installers/ESRI_ArcIMS_Viewer directory. The Viewer installer is automatically executed.
5. At the language screen, choose a language and click OK.
6. At the Location of JRE screen, choose the location where you installed J2SE JRE 1.3 or higher. This should be the same as what your \$JAVA_HOME variable is set to in Step 3 of Installing J2SE JRE 1.3 or higher on a remote computer. Click Next.

Note: You must have write access to the lib and bin directories in JRE.
7. At the Introduction screen, click Next.
8. At the Installation Directory screen, choose the installation directory and click Install. The installer creates a directory called AEJava4.0 at this location.

Note: The Viewer JAR files and libraries are installed directly into the JRE directory that you selected in Step 8. See the install.log file located in AEJava4.0/UninstallerData for a list of where each file is copied.
9. At the Install Complete screen, click Done.
10. Close the browser to clear the cache, and reopen it.

Installing ArcIMS 4.0.1 on Linux Red Hat

You are now ready to view ArcIMS Web pages created using the Java Standard Viewer. Proceed to Setting up ArcExplorer—Java Edition on a remote UNIX/Linux computer.

Intranet clients only

Check with your ArcIMS system administrator if you do not know what \$AEJHOME should be set to.

1. Copy the Viewer *.jar files to your JRE ext directory:
`cp $AEJHOME/lib/*.jar <JRE Installation Directory>/lib/ext`
2. Add \$AEJHOME/lib to your LIBPATH in your .cshrc file:
`setenv LIBPATH $AEJHOME/lib:$LIBPATH`

You are now ready to view ArcIMS Web pages created using the Java Standard Viewer. Proceed to Setting up ArcExplorer—Java Edition on a remote UNIX/Linux computer.

Setting up ArcExplorer—Java Edition on a remote UNIX/Linux computer

Intranet and Internet clients

Check with your ArcIMS system administrator if you do not know what \$AEJHOME should be set to.

1. To enable ArcExplorer—Java Edition, set the following variable in your .cshrc file:
`setenv AEJHOME <ArcExplorer Installation Directory>/aej40exe`
2. In your .cshrc file, add \$AEJHOME/bin to your \$PATH variable or set an alias to the startup script:
`set path = ($path $AEJHOME/bin)`
or
`alias aejava $AEJHOME/bin/aejava`
3. To enable ArcExplorer—Java Edition Help, copy the aimsclient.properties file from <ArcExplorer Installation Directory>/Xenv to your \$HOME directory, open the file in a text editor, and edit the values for:
`WebBrowser=<Netscape Installation Directory>/netscape`
`AEJavaHelp=<ArcExplorer Installation Directory>/aej40exe/Help/aejava_help.htm`
Save and close the file.
4. Source your .cshrc file:
`source .cshrc`
5. To start ArcExplorer—Java Edition, type:
`aejava`

You can now use ArcExplorer—Java Edition to view local data and ArcIMS services.

Note: If your remote IBM AIX computer accesses an ArcIMS Web site created using the Java Standard Viewer on Windows or Solaris, then you will encounter the following warning message: "You need a font named Arial to view data from this server." Click OK. This is just a warning message, and it should not affect the functionality of the Java Standard Viewer.

Note: If your remote Windows computer accesses an ArcIMS Web site created using the Java Custom Viewer on SGI IRIX, then you will encounter the following warning message: "You need a font named Helvetica to view data from this server." Click OK. This is just a warning message, and it should not affect the functionality of the Java Custom Viewer.

Installing ArcIMS 4.0.1 on Linux Red Hat

Installing ArcIMS Viewer on Linux Red Hat

The ArcIMS Host computer runs the ArcIMS Web site, and the ArcIMS remote computer accesses the Web site from a Web browser via the Intranet or Internet.

An Intranet client has NFS access to the ArcIMS Host, and an Internet client has only HTTP access.

Note: ArcIMS Web sites created using the Java Custom Viewer cannot be viewed from a Linux remote computer.

To view ArcIMS Web sites created using the ArcIMS Java Standard Viewer, the following components must be installed on the remote computer:

- J2SE JRE 1.3 or higher (the Java Plug-in is included with J2SE JRE)
- ArcIMS Viewer

If the remote computer has ArcIMS Manager or ArcExplorer—Java Edition installed, the J2SE JRE and ArcIMS Viewer are already available on it. If not, Internet clients are prompted to install these via the ArcIMS Viewer installation. Intranet clients can copy the necessary components to their computer. See Installing ArcIMS Viewer on a remote Linux computer.

There are four steps required to set up a remote ArcIMS Viewer:

1. Setting up the ArcIMS Host computer
2. Installing JRE 1.3 or higher on a remote computer
3. Installing ArcIMS Viewer on a remote Linux computer
4. Setting up ArcExplorer—Java Edition on a remote computer

The steps have different instructions for Internet and Intranet clients, where appropriate.

Setting up the ArcIMS Host computer on UNIX/Linux

To provide Internet clients with the ability to download the ArcIMS Viewer from an ArcIMS Web site, the ArcIMS Web site Administrator must do the following:

```
cp -r $AIMSHOME/ViewerDownLoad/install <path to your ArcIMS website directory>
```

For information on the ArcIMS website directory specific to the type of Web server you are using, see Configuring your Web server for HP-UX, IBM AIX, Linux Red Hat, SGI IRIX, or Sun Solaris.

If you are using Sun ONE 6.0 (iPlanet) Web server, you must make changes to support the use of ArcIMS Viewer. See the instructions for Configuring your Sun ONE 6.0 (iPlanet) Web server for ArcIMS Viewer.

Once you have set up the ArcIMS Host computer, the next step is to install JRE 1.3 or higher on a remote HP-UX, IBM AIX, Linux Red Hat, SGI IRIX, or Sun Solaris computer.

Installing JRE 1.3 or higher on a remote Linux Red Hat computer

Internet clients only

When a remote Linux computer tries to access an ArcIMS Java Standard Web site, the application automatically detects whether the J2SE JRE and the Plug-in are installed. If not, the browser is redirected to <http://java.sun.com/j2se/> to download J2SE JRE 1.3 or higher. If you have already installed J2SE JRE 1.3 or higher but still receive the redirect message, the Plug-in may not be configured properly. Skip to Step 4 below for instructions on configuring J2SE JRE 1.3 and the Plug-in.

Internet and Intranet clients

The URL for the Linux J2SE JRE 1.3 or higher download is <http://java.sun.com/j2se/>.

1. Register and follow the instructions to download and install J2SE JRE.

Installing ArcIMS 4.0.1 on Linux Red Hat

2. ESRI recommends that you increase the Java VM memory parameters. Open the Java Plug-in Control Panel and set the required memory parameters in the field named Java Run Time parameters to

`-Xms10m -Xmx256m`

and click Apply.

The Java Plug-in Control Panel is located at <JRE Installation Directory>/bin/ControlPanel.

3. Execute the JRE script for Linux.
4. Configure JRE 1.3 or higher:
 - a. Make sure the correct J2SE JRE is being used. Add the following to your .cshrc file:
`setenv JAVA_HOME <JRE Installation Directory>`
`set path = ($JAVA_HOME/bin $path)`
For Netscape to use the correct Plug-in, add the following variables to your .cshrc file:
`setenv NPX_PLUGIN_PATH <JRE Installation Directory>/plugin/i386/ns4`
`setenv NPX_JRE_PATH <JRE Installation Directory>`
 - b. Source the .cshrc file:
`source .cshrc`

Once you have J2SE JRE 1.3 or higher installed, the next step is to install ArcIMS Viewer.

Installing ArcIMS Viewer on a remote Linux Red Hat computer

Internet clients only

1. Once you have installed J2SE JRE and configured JPI, close your browser to clear the cache and reopen it.
2. Type the URL to the ArcIMS Web site:
`http://<hostname>/website/<name>/default.htm`
3. At the ESRI ArcIMS Viewer screen, click Start installer for Linux.
4. The ArcIMS Viewer installer is automatically downloaded to your \$HOME directory. The Viewer installer: AEJava.bin is saved under \$HOME/IA_Installers/ESRI_ArcIMS_Viewer directory. The Viewer installer is automatically executed.
5. At the language screen, choose a language and click OK.
6. At the Location of JRE screen, choose the location where you installed J2SE JRE 1.3 or higher. This should be the same as what your \$NPX_JRE_PATH variable is set to in Step 4 of Installing JRE 1.3 or higher on a remote Linux computer. Click Next.

Note: You must have write access to the lib and bin directories in JRE.

7. At the Introduction screen, click Next.
8. At the Installation Directory screen, choose the installation directory and click Install. The installer creates a directory called AEJava4.0 at this location.

Note: The Viewer JAR files and libraries are installed directly into the JRE directory that you selected in Step 8. See the install.log file located in AEJava/UninstallerData for a list of where each file is copied.

9. At the Install Complete screen, click Done.

Installing ArcIMS 4.0.1 on Linux Red Hat

10. Close the browser to clear the cache, and reopen it.

You are now ready to view ArcIMS Web pages created using the Java Standard Viewer. Proceed to Setting up ArcExplorer—Java Edition on a remote UNIX/Linux computer.

Intranet clients only

Check with your ArcIMS system administrator if you do not know what \$AEJHOME should be set to.

1. Copy the Viewer *.jar files to your JRE ext directory:

```
cp $AEJHOME/lib/*.jar $NPX_JRE_PATH/lib/ext
```
2. Add \$AEJHOME/lib to your LD_LIBRARY_PATH in your .cshrc file:

```
setenv LD_LIBRARY_PATH $AEJHOME/lib:$LD_LIBRARY_PATH
```

You are now ready to view ArcIMS Web pages created using the Java Standard Viewer. Proceed to Setting up ArcExplorer—Java Edition on a remote UNIX/Linux computer.

Setting up ArcExplorer—Java Edition on a remote UNIX/Linux computer

Intranet and Internet clients

Check with your ArcIMS system administrator if you do not know what \$AEJHOME should be set to.

1. To enable ArcExplorer—Java Edition, set the following variable in your .cshrc file:

```
setenv AEJHOME <ArcExplorer Installation Directory>/aej40exe
```
2. In your .cshrc file, add \$AEJHOME/bin to your \$PATH variable or set an alias to the startup script:

```
set path = ( $path $AEJHOME/bin )
```

or

```
alias aejava $AEJHOME/bin/aejava
```
3. To enable ArcExplorer—Java Edition Help, copy the aimsclient.properties file from <ArcExplorer Installation Directory>/Xenv to your \$HOME directory, open the file in a text editor, and edit the values for:

```
WebBrowser=<Netscape Installation Directory>/netscape
```

```
AEJavaHelp=<ArcExplorer Installation Directory>/aej40exe/Help/aejava_help.htm
```

Save and close the file.
4. Source your .cshrc file:

```
source .cshrc
```
5. To start ArcExplorer—Java Edition, type:

```
aejava
```

You can now use ArcExplorer—Java Edition to view local data and ArcIMS services.

Note: If your remote IBM AIX computer accesses an ArcIMS Web site created using the Java Standard Viewer on Windows or Solaris, then you will encounter the following warning message: "You need a font named Arial to view data from this server." Click OK. This is just a warning message, and it should not affect the functionality of the Java Standard Viewer.

Note: If your remote Windows computer accesses an ArcIMS Web site created using the Java Custom Viewer on SGI IRIX, then you will encounter the following warning message: "You need a font named Helvetica to view data from this server." Click OK. This is just a warning message, and it should not affect the functionality of the Java Custom Viewer.

Installing ArcIMS Viewer on Microsoft Windows

To install ArcIMS Viewer on Windows 98, Windows NT, Windows 2000, or Windows XP, see the instructions for your Web browser:

- Installing ArcIMS Viewer on Internet Explorer 5.0
- Installing ArcIMS Viewer on Internet Explorer 5.5 and 6.0
- Installing ArcIMS Viewer on Netscape

Installing ArcIMS Viewer on Internet Explorer 5.0 on Microsoft Windows

To install ArcIMS Viewer on Windows 98, Windows NT, Windows 2000, or Windows XP:

1. Type the URL to the ArcIMS Web site:

`http://<hostname>/website/<name>`

Note: If you do not have the correct Java Plug-in, you will be prompted to install Java 2 Runtime Environment, otherwise skip to Step 6.

2. At the Security Warning screen for Java Plug-in 1.3.1, click Yes.
3. At the Locale selection screen, click Install.
4. At the Software License Agreement screen, click Yes.
5. At the Choose Destination Location screen, click Next. J2SE JRE 1.3.1 is installed on your computer, and the ArcIMS Viewer installation begins.

Note: You may see Steps 6 and 7, otherwise skip to Step 8.

6. Install on Demand displays if Java Virtual Machine is needed, click Download.
7. A Security Warning for Microsoft Virtual Machine displays. Click Yes.
8. At the Security Warning screen for InstallAnywhere Web Installer, click Yes.
9. Click Start Installer for Windows.
10. At the language screen, choose English and click OK.
11. At the Welcome screen, click Next.
12. At the JRE and Java Plug-in screen, click Next.
13. At the Installation Directory screen, click Next.
14. At the Location of JRE screen, highlight the correct path and click Install.
15. At the Summary screen, click Next.
16. At the Install Complete screen, click Done.
17. Close your browser to clear the cache and reopen it.
18. Type the URL to the Web site:

`http://<hostname>/website/<name>`.

Now you can access the ArcIMS Web site.

Installing ArcIMS 4.0.1 on Linux Red Hat

Note: If you receive the following error message, "Problem in opening a connection to the installer on the Server. It is possible that the installer cannot be found or has a different name," tell your ArcIMS system administrator to refer to the instructions for Configuring your Sun ONE 6.0 (iPlanet) Web server for ArcIMS Viewer.

Uninstalling ArcIMS Viewer

To uninstall ArcIMS Viewer:

1. Choose Start | Settings | Control Panel and double-click Add/Remove Programs on Windows NT, or Change/Remove on Windows 2000; or choose Start | Control Panel and double-click Add or Remove Programs on Windows XP.
2. Click ArcGIS ArcIMS Viewer and click Add/Remove on Windows NT or Change/Remove on Windows 2000 or Windows XP.

Installing ArcIMS Viewer on Internet Explorer 5.5 or 6.0 on Microsoft Windows

To install ArcIMS Viewer on Windows 98, Windows NT, Windows 2000, or Windows XP:

1. Type the URL to the ArcIMS Web site:

`http://<hostname>/website/<name>`

Note: If you do not have the correct Java Plug-in, you will be prompted to install Java 2 Runtime Environment, otherwise skip to Step 6.

2. At the Security Warning screen for Java Plug-in 1.3.1, click Yes.
3. At the Locale selection screen, click Install.
4. At the Java 2 Runtime Environment Software License Agreement screen, click Yes.
5. At the Choose Destination Location screen, click Next. J2SE JRE 1.3.1 is installed on your computer, and the ArcIMS Viewer installation begins.

Note: You may see Steps 6 and 7, otherwise skip to Step 8.

6. Install on Demand displays if Java Virtual Machine is needed, click Download.
7. A Security Warning for Microsoft Virtual Machine displays. Click Yes.
8. At the Security Warning screen for InstallAnywhere Web Installer, click Yes.
9. Click Start Installer for Windows.
10. At the language screen, choose English and click OK.
11. At the Welcome screen, click Next.
12. At the JRE and Java Plug-in screen, click Next.
13. At the Installation Directory screen, click Next.
14. At the Location of JRE screen, highlight the correct path and click Install. If you do not highlight the path, the ArcIMS Viewer installation will not be complete.
15. At the Summary screen, click Next.
16. At the Install Complete screen, click Done.
17. Close your browser to clear the cache and reopen it.
18. Type the URL to the Web site:

`http://<hostname>/website/<name>`

Now you can access the ArcIMS Web site.

Installing ArcIMS 4.0.1 on Linux Red Hat

Note: If you receive the following error message, "Problem in opening a connection to the installer on the Server. It is possible that the installer cannot be found or has a different name," tell your ArcIMS system administrator to refer to the instructions for Configuring your Sun ONE 6.0 (iPlanet) Web server for ArcIMS Viewer.

Uninstalling ArcIMS Viewer

To uninstall ArcIMS Viewer:

1. Choose Start | Settings | Control Panel and double-click Add/Remove Programs on Windows NT, or Change/Remove on Windows 2000; or choose Start | Control Panel and double-click Add or Remove Programs on Windows XP.
2. Click ArcGIS ArcIMS Viewer and click Add/Remove on Windows NT or Change/Remove on Windows 2000 or Windows XP.

Installing ArcIMS Viewer on Netscape 4.75 or 6 on Microsoft Windows

To install ArcIMS Viewer on Windows 98, Windows NT, Windows 2000, or Windows XP:

1. Type the URL to the ArcIMS Web site:

`http://<hostname>/website/<name>`

Note: If you do not have the correct Java Plug-in, you will be prompted to install Java 2 Runtime Environment, otherwise skip to Step 5.

2. At the Plug-in not loaded screen, click get the Plug-in.
 3. After being directed to the Java Web site, you will be prompted to download Java 2 Runtime Environment. Follow the instructions. (If you are not automatically prompted to download, click the download link for Windows on the Java 2 Runtime Page.)
 4. Install J2SE JRE.
 5. Type the URL to the ArcIMS Web site:
- `http://<hostname>/website/<name>`
6. On Netscape 6.0, at the Java Plug-in security warning, select Grant this session. On Netscape 4.75, at the Java Security screen, select Grant.
 7. Click Start Installer for Windows.
 8. At the language screen, choose English and click OK.
 9. At the Welcome screen, click Next.
 10. At the JRE and Java Plug-in screen, click Next.
 11. At the Installation Directory screen, click Next.
 12. At the Summary screen, click Next.
 13. At the Location of JRE screen, highlight the correct path and click Install.
 14. At the Install Complete screen, click Done.
 15. Close your browser to clear the cache and reopen it.
 16. Type the URL to the Web site:

`http://<hostname>/website/<name>`

Now you can access the ArcIMS Web site.

Installing ArcIMS 4.0.1 on Linux Red Hat

Note: If you receive the following error message, "Problem in opening a connection to the installer on the Server. It is possible that the installer cannot be found or has a different name," tell your ArcIMS system administrator to refer to the instructions for Configuring your Sun ONE 6.0 (iPlanet) Web server for ArcIMS Viewer.

Uninstalling ArcIMS Viewer

To uninstall ArcIMS Viewer:

1. Choose Start | Settings | Control Panel and double-click Add/Remove Programs on Windows NT, or Change/Remove on Windows 2000; or choose Start | Control Panel and double-click Add or Remove Programs on Windows XP.
2. Click ArcGIS ArcIMS Viewer and click Add/Remove on Windows NT or Change/Remove on Windows 2000 or Windows XP.

Installing ArcIMS Viewer on SGI IRIX

The ArcIMS Host computer runs the ArcIMS Web site, and the ArcIMS remote computer accesses the Web site from a Web browser via the Intranet or Internet.

An Intranet client has NFS access to the ArcIMS Host, and an Internet client has only HTTP access.

Note: ArcIMS Web sites created using the Java Custom Viewer cannot be viewed from an IRIX remote computer.

To view ArcIMS Web sites created using the ArcIMS Java Standard Viewer, the following components must be installed on the remote computer:

- J2SE JRE 1.3.1 (the Java Plug-in is included with J2SE JRE)
- ArcIMS Viewer

If the remote computer has ArcExplorer—Java Edition installed, the J2SE JRE and ArcIMS Viewer are already available on it. If not, Internet clients are prompted to install these via the ArcIMS Viewer installation. Intranet clients can copy the necessary components to their computer. See *Installing ArcIMS Viewer on a remote IRIX computer*.

There are four steps required to set up a remote ArcIMS Viewer:

1. Setting up the ArcIMS Host computer on UNIX/Linux
2. Installing the JRE 1.3.1 on a remote SGI IRIX computer
3. Installing ArcIMS Viewer on a remote SGI IRIX computer
4. Setting up ArcExplorer—Java Edition on a remote UNIX/Linux computer

The steps have different instructions for Internet and Intranet clients, where appropriate.

Setting up the ArcIMS Host computer on UNIX/Linux

To provide Internet clients with the ability to download the ArcIMS Viewer from an ArcIMS Web site, the ArcIMS Web site Administrator must do the following:

```
cp -r $AIMSHOME/ViewerDownload/install <path to your ArcIMS website directory>
```

For information on the ArcIMS website directory specific to the type of Web server you are using, see *Configuring your Web server* for HP-UX, IBM AIX, Linux Red Hat, SGI IRIX, or Sun Solaris.

If you are using Sun ONE 6.0 (iPlanet) Web server, you must make changes to support the use of ArcIMS Viewer. See the instructions for *Configuring your Sun ONE 6.0 (iPlanet) Web server for ArcIMS Viewer*.

Once you have set up the ArcIMS Host computer, the next step is to install JRE 1.3 or higher on a remote HP-UX, IBM AIX, Linux Red Hat, SGI IRIX, or Sun Solaris computer.

Installing JRE 1.3.1 on a remote SGI IRIX computer

Internet clients only

When a remote computer tries to access an ArcIMS Java Standard Web site, the application automatically detects whether the Java Runtime Plug-in is installed. If it does not detect your Java Runtime Plug-in, you need to go to www.sgi.com to download Java Runtime Plug-in 1.3.1.

If you have already installed Java Runtime Plug-in 1.3.1, but it is not detected, the Plug-in may not be configured properly. Skip to Step 4 below for instructions on configuring Java Runtime Plug-in 1.3.1.

Internet and Intranet clients

The URL for the SGI Java Runtime Plug-in 1.3.1 download is <http://www.sgi.com/developers/devtools/languages/java.html>.

1. Register and follow the instructions to download the Java Runtime Plug-in.

Installing ArcIMS 4.0.1 on Linux Red Hat

2. ESRI recommends that you increase the Java VM memory parameters. Open the Java Plug-in Control Panel located at <Netscape Installation Directory>/javaplugin/java/ControlPanel.html. Set the required memory parameters in the field named Java Run Time Parameters:

-Xms10m -Xmx256m

Click Apply.

3. Make sure that you add \$JAVA_HOME/bin to LD_LIBRARY_PATH. See System requirements for more information.
4. Configure Java Runtime Plug-in 1.3.1:
 - a. Make sure the correct Java Runtime Plug-in is being used. Add the following to your .cshrc file:
setenv JAVA_HOME <JRE Installation Directory>
set path = (\$JAVA_HOME/bin \$path)
 - b. Source the .cshrc:
source .cshrc
 - c. If you have installed Netscape or the Plug-in in a nonstandard location, refer to www.sgi.com for more information.

Once you have Java Runtime Plug-in 1.3.1 installed, the next step is to install ArcIMS Viewer.

Installing ArcIMS Viewer on a remote SGI IRIX computer

Internet clients only

1. Once you have installed J2SE JRE, close your browser to clear the cache and reopen it.
2. Type the URL to the ArcIMS Web site:
`http://<hostname>/website/<name>/default.htm`
3. At the ESRI ArcIMS Viewer screen, click Start Installer for Unix.
4. The ArcIMS Viewer installer is automatically downloaded to your \$HOME directory. The Viewer installer: AEJava.bin is saved under \$HOME/IA_Installers/ESRI_ArcIMS_Viewer directory. The Viewer installer is automatically executed.
5. At the language screen, choose a language and click OK.
6. At the Location of JRE screen, choose the location where you installed J2SE JRE 1.3.1. This should be the same as what your \$JAVA_HOME variable is set to in Step 3 of Installing J2SE JRE 1.3.1 on a remote computer. Click Next.

Note: You must have write access to the lib and bin directories in JRE.

7. At the Introduction screen, click Next.
8. At the Installation Directory screen, choose the installation directory and click Install. The installer creates a directory called AEJava4.0 at this location.

Note: The Viewer JAR files and libraries are installed directly into the JRE directory that you selected in Step 8. See the install.log file located in AEJava4.0/UninstallerData for a list of where each file is copied.

9. At the Install Complete screen, click Done.
10. Close the browser to clear the cache, and reopen it.

You are now ready to view ArcIMS Web pages created using the Java Standard Viewer. Proceed to Setting up ArcExplorer—Java Edition on a remote UNIX/Linux computer.

Intranet clients only

Check with your ArcIMS system administrator if you do not know what \$AEJHOME should be set to.

Installing ArcIMS 4.0.1 on Linux Red Hat

1. Copy the Viewer *.jar files to your JRE ext directory:

```
cp $AEJHOME/lib/*.jar <JRE Installation Directory>/lib/ext
```
2. Add \$AEJHOME/lib to your LD_LIBRARY_PATH in your .cshrc file:

```
setenv LD_LIBRARY_PATH $AEJHOME/lib:$LD_LIBRARY_PATH
```

You are now ready to view ArcIMS Web pages created using the Java Standard Viewer. Proceed to Setting up ArcExplorer—Java Edition on a remote UNIX/Linux computer.

Setting up ArcExplorer—Java Edition on a remote UNIX/Linux computer

Intranet and Internet clients

Check with your ArcIMS system administrator if you do not know what \$AEJHOME should be set to.

1. To enable ArcExplorer—Java Edition, set the following variable in your .cshrc file:

```
setenv AEJHOME <ArcExplorer Installation Directory>/aej40exe
```
2. In your .cshrc file, add \$AEJHOME/bin to your \$PATH variable or set an alias to the startup script:

```
set path = ( $path $AEJHOME/bin )
```

or

```
alias aejava $AEJHOME/bin/aejava
```
3. To enable ArcExplorer—Java Edition Help, copy the aimsclient.properties file from <ArcExplorer Installation Directory>/Xenv to your \$HOME directory, open the file in a text editor, and edit the values for:

```
WebBrowser=<Netscape Installation Directory>/netscape  
AEJavaHelp=<ArcExplorer Installation Directory>/aej40exe/Help/aejava_help.htm
```

Save and close the file.
4. Source your .cshrc file:

```
source .cshrc
```
5. To start ArcExplorer—Java Edition, type:

```
aejava
```

You can now use ArcExplorer—Java Edition to view local data and ArcIMS services.

Note: If your remote IBM AIX computer accesses an ArcIMS Web site created using the Java Standard Viewer on Windows or Solaris, then you will encounter the following warning message: "You need a font named Arial to view data from this server." Click OK. This is just a warning message, and it should not affect the functionality of the Java Standard Viewer.

Note: If your remote Windows computer accesses an ArcIMS Web site created using the Java Custom Viewer on SGI IRIX, then you will encounter the following warning message: "You need a font named Helvetica to view data from this server." Click OK. This is just a warning message, and it should not affect the functionality of the Java Custom Viewer.

Installing ArcIMS Viewer on Sun Solaris

The ArcIMS Host computer runs the ArcIMS Web site, and the ArcIMS remote computer accesses the Web site from a Web browser via the Intranet or Internet.

An Intranet client has NFS access to the ArcIMS Host, and an Internet client has only HTTP access.

Note: ArcIMS Web sites created using the Java Custom Viewer cannot be viewed from a Solaris remote computer.

To view ArcIMS Web sites created using the ArcIMS Java Standard Viewer, the following components must be installed on the remote computer:

- J2SE JRE 1.3 or higher (the Java Plug-in is included with J2SE JRE)
- ArcIMS Viewer

If the remote computer has ArcIMS Manager or ArcExplorer—Java Edition installed, the J2SE JRE and ArcIMS Viewer are already available on it. If not, Internet clients are prompted to install these via the ArcIMS Viewer installation. Intranet clients can copy the necessary components to their computer. See Installing ArcIMS Viewer on a remote Solaris computer.

There are four steps required to set up a remote ArcIMS Viewer:

1. Setting up the ArcIMS Host computer
2. Installing JRE 1.3 on a remote computer
3. Installing ArcIMS Viewer on a remote Solaris computer
4. Setting up ArcExplorer—Java Edition on a remote computer

The steps have different instructions for Internet and Intranet clients, where appropriate.

Setting up the ArcIMS Host computer on UNIX/Linux

To provide Internet clients with the ability to download the ArcIMS Viewer from an ArcIMS Web site, the ArcIMS Web site Administrator must do the following:

```
cp -r $AIMSHOME/ViewerDownLoad/install <path to your ArcIMS website directory>
```

For information on the ArcIMS website directory specific to the type of Web server you are using, see Configuring your Web server for HP-UX, IBM AIX, Linux Red Hat, SGI IRIX, or Sun Solaris.

If you are using Sun ONE 6.0 (iPlanet) Web server, you must make changes to support the use of ArcIMS Viewer. See the instructions for Configuring your Sun ONE 6.0 (iPlanet) Web server for ArcIMS Viewer.

Once you have set up the ArcIMS Host computer, the next step is to install JRE 1.3 or higher on a remote HP-UX, IBM AIX, Linux Red Hat, SGI IRIX, or Sun Solaris computer.

Installing JRE 1.3 or higher on a remote Sun Solaris computer

Internet clients only

When a remote Solaris computer tries to access an ArcIMS Java Standard Web site, the application automatically detects whether the J2SE JRE and the Plug-in are installed. If not, the browser is redirected to <http://java.sun.com/j2se/> to download J2SE JRE 1.3. If you have already installed J2SE JRE 1.3 but still receive the redirect message, the Plug-in may not be configured properly. Skip to Step 4 below for instructions on configuring J2SE JRE 1.3 and the Plug-in.

Note: If you use J2SE JRE 1.3.1, you need to install the required Sun OS patches listed on the java.sun.com Web site for Solaris: <http://java.sun.com/j2se/1.3/install-solaris-patches.html>.

Internet and Intranet clients

The URL for the Sun J2SE JRE 1.3 download is <http://java.sun.com/j2se/1.3/jre/>.

Installing ArcIMS 4.0.1 on Linux Red Hat

1. Register and follow the instructions to download and install J2SE JRE.
2. ESRI recommends that you increase the Java VM memory parameters. Open the Java Plug-in Control Panel and set the required memory parameters in the field named Java Run Time parameters to

`-Xms10m -Xmx256m`

and click Apply.

The Java Plug-in Control Panel is located at `<JRE Installation Directory>/bin/ControlPanel`.

3. Execute the JRE script for Solaris.

Note: Be sure to check the Solaris patch requirements for the JPI and J2SE JRE prior to installing these components.

4. Configure J2SE JRE 1.3:

- a. Make sure the correct J2SE JRE is being used. Add the following to your `.cshrc` file:

```
setenv JAVA_HOME <JRE Installation Directory>
```

```
set path = ( $JAVA_HOME/bin $path)
```

For Netscape to use the correct Plug-in, add the following variables to your `.cshrc` file:

```
setenv NPX_PLUGIN_PATH <JRE Installation Directory>/plugin/sparc/ns4
```

```
setenv NPX_JRE_PATH <JRE Installation Directory>
```

- b. Source the `.cshrc` file:

```
source .cshrc
```

Once you have J2SE JRE 1.3 installed, the next step is to install ArcIMS Viewer.

Installing ArcIMS Viewer on a remote Sun Solaris computer

Internet clients only

1. Once you have installed J2SE JRE and configured JPI, close your browser to clear the cache and reopen it.
2. Type the URL to the ArcIMS Web site:
`http://<hostname>/website/<name>/default.htm`
3. At the ESRI ArcIMS Viewer screen, click Download installer for Unix.
4. The ArcIMS Viewer installer is automatically downloaded to your \$HOME directory. The Viewer installer: AEJava.bin is saved under \$HOME/IA_Installers/ESRI_ArcIMS_Viewer directory. The Viewer installer is automatically executed.
5. At the language screen, choose a language and click OK.
6. At the Location of JRE screen, choose the location where you installed J2SE JRE 1.3. This should be the same as what your \$NPX_JRE_PATH variable is set to in Step 4 of Installing JRE 1.3 or higher on a remote Solaris computer. Click Next.

Note: You must have write access to the lib and bin/sparc directories in JRE.

7. At the Introduction screen, click Next.
8. At the Installation Directory screen, choose the installation directory and click Install. The installer creates a directory called AEJava4.0 at this location.

Note: The Viewer JAR files and libraries are installed directly into the JRE directory that you selected in Step 8. See the `install.log` file located in AEJava/UninstallerData for a list of where each file is copied.

Installing ArcIMS 4.0.1 on Linux Red Hat

9. At the Install Complete screen, click Done.
10. Close the browser to clear the cache, and reopen it.

You are now ready to view ArcIMS Web pages created using the Java Standard Viewer. Proceed to Setting up ArcExplorer—Java Edition on a remote UNIX/Linux computer.

Intranet clients only

Check with your ArcIMS system administrator if you do not know what \$AEJHOME should be set to.

1. Copy the Viewer *.jar files to your JRE ext directory:

```
cp $AEJHOME/lib/*.jar $NPX_JRE_PATH/lib/ext
```
2. Add \$AEJHOME/lib to your LD_LIBRARY_PATH in your .cshrc file:

```
setenv LD_LIBRARY_PATH $AEJHOME/lib:$LD_LIBRARY_PATH
```

You are now ready to view ArcIMS Web pages created using the Java Standard Viewer. Proceed to Setting up ArcExplorer—Java Edition on a remote UNIX/Linux computer.

Setting up ArcExplorer—Java Edition on a remote UNIX/Linux computer

Intranet and Internet clients

Check with your ArcIMS system administrator if you do not know what \$AEJHOME should be set to.

1. To enable ArcExplorer—Java Edition, set the following variable in your .cshrc file:

```
setenv AEJHOME <ArcExplorer Installation Directory>/aej40exe
```
2. In your .cshrc file, add \$AEJHOME/bin to your \$PATH variable or set an alias to the startup script:

```
set path = ( $path $AEJHOME/bin )
```

or

```
alias aejava $AEJHOME/bin/aejava
```
3. To enable ArcExplorer—Java Edition Help, copy the aimsclient.properties file from <ArcExplorer Installation Directory>/Xenv to your \$HOME directory, open the file in a text editor, and edit the values for:

```
WebBrowser=<Netscape Installation Directory>/netscape
```

```
AEJavaHelp=<ArcExplorer Installation Directory>/aej40exe/Help/aejava_help.htm
```

Save and close the file.
4. Source your .cshrc file:

```
source .cshrc
```
5. To start ArcExplorer—Java Edition, type:

```
aejava
```

You can now use ArcExplorer—Java Edition to view local data and ArcIMS services.

Note: If your remote IBM AIX computer accesses an ArcIMS Web site created using the Java Standard Viewer on Windows or Solaris, then you will encounter the following warning message: "You need a font named Arial to view data from this server." Click OK. This is just a warning message, and it should not affect the functionality of the Java Standard Viewer.

Note: If your remote Windows computer accesses an ArcIMS Web site created using the Java Custom Viewer on SGI IRIX, then you will encounter the following warning message: "You need a font named Helvetica to view data from this server." Click OK. This is just a warning message, and it should not affect the functionality of the Java Custom Viewer.

Installing ArcIMS 4.0.1 on Linux Red Hat

Setting up the ArcIMS Host computer on UNIX/Linux

To provide Internet clients with the ability to download the ArcIMS Viewer from an ArcIMS Web site, the ArcIMS Web site Administrator must do the following:

```
cp -r $AIMSHOME/ViewerDownload/install <path to your ArcIMS website directory>
```

For information on the ArcIMS website directory specific to the type of Web server you are using, see Configuring your Web server for HP-UX, IBM AIX, Linux Red Hat, SGI IRIX, or Sun Solaris.

If you are using Sun ONE 6.0 (iPlanet) Web server, you must make changes to support the use of ArcIMS Viewer. See the instructions for Configuring your Sun ONE 6.0 (iPlanet) Web server for ArcIMS Viewer.

Once you have set up the ArcIMS Host computer, the next step is to install JRE 1.3 or higher on a remote HP-UX, IBM AIX, Linux Red Hat, SGI IRIX, or Sun Solaris computer.

Setting up ArcExplorer—Java Edition on a remote UNIX/Linux computer

Intranet and Internet clients

Check with your ArcIMS system administrator if you do not know what \$AEJHOME should be set to.

1. To enable ArcExplorer—Java Edition, set the following variable in your .cshrc file:

```
setenv AEJHOME <ArcExplorer Installation Directory>/aej40exe
```
2. In your .cshrc file, add \$AEJHOME/bin to your \$PATH variable or set an alias to the startup script:

```
set path = ( $path $AEJHOME/bin )
```

or

```
alias aejava $AEJHOME/bin/aejava
```
3. To enable ArcExplorer—Java Edition Help, copy the aimsclient.properties file from <ArcExplorer Installation Directory>/Xenv to your \$HOME directory, open the file in a text editor, and edit the values for:

```
WebBrowser=<Netscape Installation Directory>/netscape
```

```
AEJavaHelp=<ArcExplorer Installation Directory>/aej40exe/Help/aejava_help.htm
```

Save and close the file.
4. Source your .cshrc file:

```
source .cshrc
```
5. To start ArcExplorer—Java Edition, type:

```
aejava
```

You can now use ArcExplorer—Java Edition to view local data and ArcIMS services.

Note: If your remote IBM AIX computer accesses an ArcIMS Web site created using the Java Standard Viewer on Windows or Solaris, then you will encounter the following warning message: "You need a font named Arial to view data from this server." Click OK. This is just a warning message, and it should not affect the functionality of the Java Standard Viewer.

Note: If your remote Windows computer accesses an ArcIMS Web site created using the Java Custom Viewer on SGI IRIX, then you will encounter the following warning message: "You need a font named Helvetica to view data from this server." Click OK. This is just a warning message, and it should not affect the functionality of the Java Custom Viewer.

Configuring Sun ONE 6.0 (iPlanet) for ArcIMS Viewer

The following instructions are for Sun ONE 6.0 (iPlanet) only.

If you use Sun ONE 6.0 (iPlanet), you need to make a change in the configuration of the MIME type property. The MIME type file tells the Web server what to do when an incoming request is looking for a particular file extension.

1. Start iPlanet Administration Server from the Start menu or from your Web browser.
2. Type your user name and password and click OK.
3. Select your Server from the dropdown list and click Manage.
4. In the left sidebar, click Mime Types.
5. Select the Edit option and click OK. Click OK again.
6. On the Global Mime Types list, find Content-Type: application/octet-stream File Suffix: bin
7. Click Edit and add ,exe to the File Suffix.
8. Click Change MIME Type and OK to update the record.
9. Scroll down and find Content-Type: magnus-internal/cgi File Suffix: cgi,exe,bat
10. Click Edit and Remove exe, from the File Suffix.
11. Click Change MIME Type and OK to update the record.
12. Click Apply in the upper right corner.
13. Select Apply changes to stop and start the Web server.
14. Exit Sun ONE 6.0 (iPlanet).