

Quickstart: Installing and Setting Up Sun Management Center 3.6

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Installing and Setting Up Sun Management Center 3.6

This Quickstart guide provides hardware and software requirements for Sun[™] Management Center 3.6, and the procedures for a fresh installation of Sun Management Center 3.6. This guide also describes how to monitor a zone using Sun Management Center. This guide assumes that Sun Management Center has not been installed.

Note – The material in this guide is extracted from the *Sun Management Center 3.6 Installation and Configuration Guide*, which can be found at http://docs.sun.com.

All chapter, appendix, and section references in this guide are references to the *Sun Management Center 3.6 Installation and Configuration Guide*.

Installing the Product

Sun Management Center has three main components, called base layers, that need to be installed: server, agent, and Java Console (console). The server is a collection of processes on a central host that enables management services. The agent is a process that runs on each monitored host. The Java Console is the window through which you monitor and manage the agents. It is the main user interface to the product.

Before you can use Sun Management Center 3.6, you must install the

Server – On at least one machine.

Note – When the server is installed, the Sun Management Center agent is installed on the server machine as well.

- Agent On all machines you want to monitor.
- Java Console On any machine from which users will log into Sun Management Center.

In planning your installation you need to consider the following items:

- On which machine do you want to run the Sun Management Center server?
- Which machines do you want to monitor and manage? On these machines you need to install the Sun Management Center agent.
- On which machines do you want to run the Sun Management Center console? On these machines you need to install the Java Console.

In addition to *installing* the product components and the add-ons, you must *set up* the product components and add-ons before you can start the product.

Preinstallation Information

The following table lists the prerequisite information that you need before installing the product.

Installation Item	Description
Environment	Choose the <i>production</i> environment.
Base Layers (Components)	Determine the machines on which you will install each component, for example, server, agent, and console.
Languages	Determine which, if any, additional languages (French, Traditional Chinese, Simplified Chinese, Korean, or Japanese) you need.
	The documentation for Sun Management Center 3.6 is not available on the media. Go to http://docs.sun.com for documentation in English and the supported languages.
Add-on Products	Review the add-on supplements to determine which add-ons you want to install. For a list of add-on supplements, see "Sun Management Center Documentation Resources" on page 23.
	Add-on products are installed on the same machine as the server.

TABLE 1 Information Needed Before Installing

Installation Item	Description	
Space Needed	 If the machine does not have enough space in the default /opt directory, you might need to make one of the following adjustments: Specify an alternate file system that has sufficient space Select a machine with sufficient resources Make more space in /opt 	
Permissions	You must have permission to write to the /var/opt and /opt/SUNWsymon directories as root on each machine. You also need privileges to run commands such as chmod.	

After installing the product and its add-ons, you will need to set up the product and its add-ons. The following table lists the prerequisite information that you need before *setting up* the product.

 TABLE 2 Information Needed Before Setting Up

Set Up Item	Description	
Administrator user name	A valid Solaris user name is required for assignment as the Sun Management Center administrator on Sun Management Center server machines.	
Network Addressing Mode	 Sun Management Center uses two types of addressing for communication between the server and agent: IP addressing, and Network Address Translation (NAT). You must have the following information: Which addressing mode is used in your network The name of each machine that is to be managed by Sun Management Center The IP addresses and names for all machines that have been assigned static IP addresses See "Network Address Translation" for further information. 	
Sun Management Center Password to Generate Security Key	Sun Management Center requires an encrypted security key for communication between processes. The security key is generated based on a unique password you provide.	
	Store the password securely. You need the password if you modify your Sun Management Center installation.	
SNMPv1 Community String	Sun Management Center requires an SNMPv1 community string for security. The default is public. You have the option of specifying a more secure custom string.	
	Store the SNMPv1 string securely. You need the SNMPv1 security string if you modify your Sun Management Center installation.	

ABLE 2 Information Needed Before Setting Up (Continued)				
Set Up Item	Description			
Information to Generate Web Server Security Key	• The Sun Management Center Web server requires an encrypted security key. The security key is generated based your organization name and location.			
	Store the organization name and location securely. You need this information if you modify your Sun Management Center Web server.			
Ports	 Determine the assignments for the following ports: SNMPv1 Port: default 161 Sun Management Center Port: default 161, recommended 1161 Database port: default 2521 Web server port: default 8080 Web server secure port: 8443 			
	See "Default Ports" for further information.			

Hardware and Software Requirements

This section provides the minimal Sun Management Center 3.6 hardware and software requirements. For detailed requirements and sizing information, see the *Sun Management Center 3.6 Installation and Configuration Guide*.

Supported Hardware

The following table lists the Sun systems supported by Sun Management Center 3.6.

For updated information on supported hardware, see the *Sun Management Center 3.6 Installation and Configuration Guide.*

System Type	Model
Netra TM	Netra 1280
	Netra T4/Netra 20
	Netra T 1120/1125
	Netra T 1400/1405

System Type	Model	
	Sun Fire V100	
	Sun Fire V120/Netra 120	
	Sun Fire V210	
	Sun Fire V240	
	Sun Fire V250	
	Sun Fire V440	
	Netra 240	
	Netra 440	
Sun Fire midrange and high-end	Sun Fire 6800/4810/4800/3800	
	Sun Fire E6900/E4900	
	Sun Fire E25K/E20K/15K/12K	
	Sun Fire E2900	
	Sun Fire V1280	
Workgroup Server	Sun Fire 280R	
	Sun Fire V480	
	Sun Fire V490	
	Sun Fire V880	
	Sun Fire V890	
Desktop	Sun Blade™ 100	
	Sun Blade 150	
	Sun Blade 1000	
	Sun Blade 1500	
	Sun Blade 2000	
	Sun Blade 2500	

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Sun Management Center Base Layer Requirements

The following table provides a summary of Sun Management Center 3.6 base layer requirements.

Note – Some hardware platform config readers (add-ons) do not work on all layers of Sun Management Center when installed on Solaris 10.

For specific information about determining the total amount of resources needed, see "Determining Hardware Resources".

Base Layer	Operating System	Disk Space	RAM	Swap
Server S (SPARC) S I S i	Solaris 8, Solaris 9, and Solaris 10 Solaris Developer Software Group installation	800 Mbytes total: 300 Mbytes in /opt, 500 Mbytes in /var/opt	512 Mbytes minimum	1 Gbyte recommended
			1 Gbyte recommended for small to large servers	
			2 Gbytes recommended for extra-large servers.	
Agent (SPARC)	Solaris 2.6, Solaris 7, Solaris 8, Solaris 9, and Solaris 10 releases	18 Mbytes per agent in /opt/SUNWsymon. 2 Mbytes per agent in /var/opt/SUNWsymon.	10 to 29 Mbytes per agent depending on modules loaded and system type	
Agent (x86)	Solaris 9 and Solaris 10	18 Mbytes per agent in /opt/SUNWsymon. 2 Mbytes per agent in /var/opt/SUNWsymon.	10 to 29 Mbytes per agent depending on modules loaded and system type	

 TABLE 4 Sun Management Center 3.6 System Requirements

 TABLE 4 Sun Management Center 3.6 System Requirements
 (Continued)

Base Layer	Operating System	Disk Space	RAM	Swap
Agent (Linux) on x86	Red Hat Linux Enterprise 2.1 - 3.0 (32-bit and 64-bit), Sun Java [™] Desktop System 2.x, SUSE Linux Enterprise 8.0 (32-bit and 64-bit), SUSE Professional 9 (32-bit and 64-bit)	18 Mbytes per agent in /opt/SUNWsymon. 2 Mbytes per agent in /var/opt/SUNWsymon.	10 to 29 Mbytes per agent depending on modules loaded and system type	
Java Console	Solaris 2.6, Solaris 7, Solaris 8, Solaris 9, and Solaris 10 releases	Solaris platform: 62 Mbytes	Solaris platform: 256 Mbytes	Solaris platform: 130 Mbytes
	Microsoft Windows 98, Microsoft Windows NT SP 4 or later, Microsoft Windows 2000 Professional, Microsoft Windows XP	Microsoft Windows platform: 35 Mbytes	Microsoft Windows platform: 256 Mbytes	Microsoft Windows platform: 768 Mbytes
	Linux 2.4.21 or higher	62 Mbytes	256 Mbytes	130 Mbytes

The default maximum heap size for the console and server is 64 Mbytes apiece.

Java console does not install jar files for add-ons.

You can customize the maximum heap size for the console and server as described in "Starting Components Using es-start".

Sun Management Center Base Add-on Requirements

The following table shows the minimum disk space necessary for each Sun Management Center layer to install the base add-ons. For installation requirements for other add-ons, see the documentation supplement for that add-on. See "Sun Management Center Documentation Resources" on page 23.

For specific information about determining the total amount of resources needed, see "Determining Hardware Resources".

Base Add-on	Operating System	Disk Space	
Advanced System	Solaris 2.6, Solaris 7, Solaris 8, Solaris 9, Solaris 10 releases	Server: 3300 Kbytes	
Monitoring	Min dama 00 Min dama NIT	Agent: 2020 Kbytes	
	Windows 98, Windows N1, Windows 2000, Windows XP	Console: 270 Kbytes	
Service Availability	Solaris 2.6, Solaris 7, Solaris	Server: 1600 Kbytes	
Manager	0, 501a115 7, 501a115 10 Teleases	Agent: 1000 Kbytes	
0		Console: 500 Kbytes	
Solaris	Solaris 8, Solaris 9, Solaris 10	Server: 300 Mbytes	
Manager	releases	Agent: 18 Mbytes	
0		Console: 500 Kbytes	
System	Solaris 2.6, Solaris 7, Solaris 8, Solaris 9, Solaris 10 releases	Server: 3000 Kbytes	
Reliability Manager		Agent: 1000 Kbytes	
		Console: not applicable	
Performance Reporting	Solaris 2.6, Solaris 7, Solaris 8, Solaris 9, Solaris 10 releases	Server: depends on reporting options selected.Small configuration: 5 Gbytes	
Manager	Windows 98 Windows NT	 Medium configuration: 12 Gbytes 	
	Windows 2000, Windows XP	Large configuration: 24 Gbytes	
		Agent: 8000 Kbytes minimum. For 1000 properties logged at five minute intervals, 80 Mbytes are needed.	
		Console: 3 Mbytes	

TABLE 5 Add-on Disk Space Requirements by Base Component

TABLE 5 Add-on Disk Space Requirements by Base Component			(Continued)
Base Add-on	Operating System	Disk Space	
	Note – The Performance Reporting Manager requires 1 Gbyte of RAM and 1 Gbyte of swap space.		
X86Rack	RedHat, SuSE Linux kernel version 2.4.x or higher		
	Note – This add-on can be installed only on hosts that has the N1 [™] System Manager (N1SM) server installed.		

Installing the Required JDK Version

Sun Management Center 3.6 requires JDKTM 1.4.2 (minimum requirement), which is available on the $\langle DiskMountDir \rangle / disk1/jdk_dir$ directory, where jdk_dir is the name of the JDK directory on the disk.

Note – The JDK available on the disk is only for Windows and Solaris. Download the appropriate JDK for Linux.

▼ To Install the Required JDK Version

Steps 1. Install the JDK from the disk using the pkgadd command.

Type the command pkgadd -d <DiskMountDir>/disk1/jdk_dir.

Press Return to install all of the packages. The JDK packages are installed in the /usr/j2se directory.

- 2. Reset the JAVA_HOME environment variable to /usr/j2se.
 - In a C shell environment, type:
 - # setenv JAVA_HOME /usr/j2se
 - In a Bourne or Korn shell environment, type:

JAVA_HOME=/usr/j2se
export JAVA HOME

Installing Sun Management Center

Note – On Solaris 10, install Sun Management Center in the global zone. On Linux, you can install only agent and console layers.

This section describes how to install Sun Management Center 3.6 on Solaris and Linux platforms using the graphical user interface (GUI).

For information on using the command-line install script, see "Installing Sun Management Center Using es-inst".

This installation procedure assumes that you are installing Sun Management Center from a image directory on your network.

▼ To Install Sun Management Center

Steps 1. Set up the installation environment.

- a. If you are installing the product remotely, grant access to the X server by typing the command xhost + machine in a terminal window where machine is the name of the machine where you want to install the product.
- b. Log into the machine. If you are installing the product remotely, type the command rlogin *machine* and type the password.
- c. Log in as root by typing su root and the root password.

Note – Do not miss the '-' after the su command.

- d. If you prefer a specific UNIX shell, type the command to use the shell, for example, csh.
- e. If you are installing the product remotely, make sure that the DISPLAY environment variable is set to the machine's display, for example, setenv DISPLAY *local-machine*:0.0.
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f. Make sure that the group entry in the /etc/nsswitch.conf has files as the first token.

group: files nis

g. Change to the *image* directory. Ensure that the *image* directory is NFS-shared. For example:

cd /net/machine/image/disk1/sbin

where *machine* is the machine where you created the installation image, and *image* is the root directory containing the installation image.

- h. Review /disk1/sbin/README.INSTALL and disk1/sbin/INSTALL_README.HWDS.
- 2. Run the installation.
 - a. Go to the installation directory <DiskMountDir>/disk1/sbin.
 - b. Type the installation command:

./es-guiinst

The welcome screen appears.

- 3. Follow the screen prompts.
 - a. To accept the default /opt installation directory, click Next or click Browse to choose another directory.
 - b. Select the production environment.
 - c. Select the components you want to install.
 - d. Review the Server Layer Binary Code License and use the scroll bar to scroll down to the end of the text.
 - e. To agree to the terms of the license, click I Agree and click Next.
 - f. If you want to install the product in additional languages, select the additional languages and click Next. The progress bar appears.
 - g. Select the add-on products.

The add-on products screen appears. Your list of add-on products might vary from this screen.

- h. If you selected add-on products that have optional components, select the optional components desired and click Next.
- i. Review the add-on products binary license and use the scroll bar to scroll down to the end of the text.

Some add-ons require binary license.

j. To agree to the terms of the license, click I Agree and click Next.

The Checking Disk Space progress bar appears. If there is not enough disk space, you are asked to provide an alternate file system.

Tip – In a terminal window on the machine where you are installing Sun Management Center, type **df** -**ak** to list the amount of used and free space for each file system on the machine.

k. Confirm installation selections and click Next.

Note – The installation process can take from a few minutes to half an hour or more, depending on the products selected.

If installation failed, a summary screen is displayed.

Review the installation log in /var/opt/SUNWsymon/install to find out why the installation failed, and correct the problem.

- 4. Choose whether to run the setup wizard.
 - a. To continue to set up, click Next.
 - b. To run set up later, click Close.

You cannot run the product until you have set it up.

Setting Up Sun Management Center

You use the graphical setup wizard to set up, configure, and re-configure your Sun Management Center installation.

For information on using the command-line setup script, see "Setting Up Sun Management Center Using es-setup".

To Set Up Sun Management Center

Steps 1. Set up the installation environment. For more information, see Step 1 in "To Install Sun Management Center" on page 14.

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2. Go to the Sun Management Center sbin directory. For example:

cd /opt/SUNWsymon/sbin

If you installed Sun Management Center in a directory other than /opt, go to /*installdir*/SUNWsymon/sbin, where *installdir* is the directory you specified.

3. Run the set up by typing:

./es-guisetup

The Set Up screen appears.

4. Follow the screen prompts.

a. You are given the opportunity to store all of your setup responses in the file /var/opt/SUNWsymon/install/setup-responses-file. The setup-responses-file file is useful if you need to duplicate the setup on the current machine on other machines.

- To continue setup without creating the response file, click Next.
- To create the response file, select Store Response Data and then click Next.

b. Generate the Sun Management Center security key.

Type a password in both fields and click Next to generate the security keys.

An encrypted security key is needed for communications between all Sun Management Center processes. The key is generated based on the password you provide, which must be between one and eight characters long and contain no spaces. Entries that are greater than eight characters are truncated to eight characters.

Note – Keep a record of the password you use to generate the security key for this machine in a secure location. You might need to regenerate the key for the machine at a later time. You can also change the security key later, if needed, as described in "Regenerating Security Keys".

c. Specify the SNMPv1 community security string.

The community string is used for SNMP security and is set to public by default.

Set the community string to a value other than public or private to provide better SNMP security.



Caution – The same SNMP community string must be used on all of the machines on which you install Sun Management Center. If you use different community strings on each machine, SNMP communications between the machines and Sun Management Center components will not work.

- If you want to accept the community string default value of public, click Next.
- If you want to use a custom community string:
 - a. Select Use Custom Community String.
 - The community string can be up to 255 characters and must not contain any spaces or blanks.
 - b. Type the same community string in both fields, and then click Next.
- d. Enter a valid Solaris user name as the UNIX administrator account and click Next.

The setup process checks whether the SNMP port is in use.

e. If the SNMP port is in use, the SNMP Port Conflict screen appears.

f. Resolve the port conflict.

In most cases, port 161 is the default port assigned to and used by the SNMP daemon. However, other processes or daemons could be using port 161. Several third-party replacements and enhancements for the SNMP daemon exist and could be installed on your system. The Sun Management Center agent is such a daemon.

We recommend that you use a different port number, such as port 1161.

- To assign a different port number to Sun Management Center:
 - a. Click Use a Different Port Number.
 - For instructions on how to find out whether a port is used, see "To Determine Whether a Port Is Used".
 - b. Type the port number, for example, 1161, in the Port ID field and click Next.

Note – Keep a record of this alternate port number. You will need this number if you later install agents using JumpStart or update the Sun Management Center agents using the agent update-image tools.

• To use port 161, select Use Port 161 and click Next.

g. If you use port 161, you are prompted to stop and disable the SNMP daemon snmpdx.

(On Solaris 10) If you use port 161, you are prompted to stop and disable the SNMP daemon SMA.

There is no SNMP daemon on Linux by default.

 To stop and disable the SNMP daemon snmpdx automatically, make sure that Stop and Disable SNMP Daemon snmpdx has been selected, and then click Next.



Caution – Stopping and disabling the system SNMP daemon does not guarantee that you have stopped the actual process using port 161. To determine the actual daemon process that uses port 161, you must manually review all /etc/rcN and /etc/rcN.d files, where N is 0 through 6 and S. When you have identified the file that defines the process using port 161, you can disable the process by renaming the file. For example,

/etc/rc3.d# mv S76snmpdx s76snmpdx

You must stop all other processes that use port 161 before you can start Sun Management Center.

- To stop and disable the SNMP daemon SMA, go to the /etc/init.d directory. Type ./init.sma stop.
- h. If any Sun Management Center ports are in use, you are prompted to resolve the port conflict.

The ports are checked in the following order: trap service, event service, topology service, configuration service, platform agent, cst service, metadata service, database, look-up service, Web server default port, and Web server secure port.

If any of the ports are in use, you are prompted to provide an unused port number. Type an unused port number in the field, and then click Next.

i. Generate the Web server security key.

An encrypted security key is needed for the Sun Management Center Web server. The key is generated based on the name of your organization and the name of your location. The names that you provide must not contain any spaces or blanks.

Type the name of your organization and the name of your location to generate the Web server security key and click Next.

For example, you could type admin in the Name of Your Organization field and headquarters in the Name of Your Location field.

Note – Keep a record of the entries you use to generate the security key in a secure location in case you need to regenerate the key for a particular machine at a later time.

j. Confirm setup selections.

The setup process can take from a few minutes to half an hour or more, depending on the products selected.

If base product setup failed, you are informed that the setup of the base products was not successful. You are directed to see the log file for more details. The name of the log file is provided.

k. If you installed add-ons, click Next to set them up.

Some add-on products are included with the Sun Management Center 3.6 installation media. These add-ons are the ones listed in the Select Add-on Products panel. For information on how to set up each add-on, refer to the Sun Management Center supplement for each add-on. Each supplement provides the setup procedure for the specific add-on.

1. Start the product by selecting the components to start and clicking Next.

For more information on starting and stopping Sun Management Center, see "Starting and Stopping Sun Management Center".



Caution – If your network uses Network Address Translation (NAT), click Close. Use the es-config command-line utility described in "To Enable NAT Support" to configure the machine for NAT before you start Sun Management Center.

Note – (On Solaris 10) When Sun Management Center is installed and set up, the services run as Service Management Facility (SMF) services. Based on the layers chosen, appropriate services will be started.

5. Start the Java Web Console by typing this from a terminal window: ./es-start -c&.

The Java Console login screen appears.

Log in to the console using your UNIX user ID and password.

For information on using the product, see Sun Management Center 3.6 User's Guide.

(On Solaris 10) Monitoring a Zone Using Sun Management Center

Zone is a virtualized operating system environment that you can set up for systems that run the Solaris 10 Operating System (OS).

Every Solaris 10 OS contains a global zone, the default zone for the system. You can create local zones inside a global zone. You can monitor a zone by running an agent inside a local zone.

▼ To Create a Local Zone

You can create a local zone either through zone commands or through the zone wizard of Solaris Container Manager.

When you create a local zone using Solaris Container Manager, ensure that you add the base directory of Sun Management Center to the inherit-pkg-dir directory. You can specify this in the "Provide Inherit Package" step of the wizard.

For more information, see "Managing Zones" in *Installing and Administering Solaris Container Manager* 1.1.

Step • Create a local zone using zone commands.

- a. Become superuser and open two terminal windows.
- b. From the first terminal window, type the following lines to create a local zone.

zonecfg - z localzonename, where localzonename is the name of the local zone.

create

export

add inherit-pkg-dir

set dir=/opt, where /opt is the installation directory.

end

add net

set address=ipaddress

set physical=networkinterface

end

set zonepath=/export/zone/localzonename

verify

commit

exit

zoneadm -z localzonename install

- c. From the second terminal window, type zlogin -C *localzonename* to log in to the local zone.
- d. From the first terminal window, type zoneadm z localzonename boot to boot the zone.

The boot messages are displayed in the second terminal window where you logged in to the zone.

e. Type the appropriate values for locale, terminal type, host name, naming service, and so on.

The zone will be rebooted.

▼ To Use an Existing Local Zone

This procedure assumes that the local zone does not inherit /opt/SUNWsymon and that the path of the local zone is /export/zone/localzonename.

Steps 1. Become superuser.

2. From the terminal window, log in to the local zone.

zlogin localzonename mkdir -p /opt/SUNWsymon

3. Do a loopback mounting of /opt/SUNWsymon.

mount -F lofs /opt/SUNWsymon
/export/zone/localzonename/root/opt/SUNWsymon



To Monitor a Zone Using Sun Management Center

Before You Install and set up Sun Management Center in the global zone. Begin

Steps 1. Create a local zone as described in "To Create a Local Zone" on page 21 or use an existing local zone as described in "To Use an Existing Local Zone" on page 22.

- 2. From the global zone, set up an agent to run inside this local zone. /opt/SUNWsymon/sbin/es-setup -z localzonename
- 3. From the global zone, log in to the local zone. zlogin *localzonename*
- From the local zone, complete the setup. /opt/SUNWsymon/sbin/es-setup

Supported Commands, Modules, and Add-ons

You can start and stop the agent from within the local zone. You can use es-config to change the port number of the agent.

You can also start the Java Console inside a local zone. For more information on this, see "Starting the Console".

The commands supported inside the local zone are es-start, es-stop, es-setup, es-config, and es-load-default.

The list of modules that will be available for the agent inside the local zone is available at /var/opt/SUNWsymon/cfg/zone-modules-d.dat. If you remove a module from this file, that module will not be available when the agent is restarted.

Advanced System Monitoring, Service Availability Manager, System Reliability Manager, and Performance Reporting Manager can be set up and run inside a local zone.

Sun Management Center Documentation Resources

Sun Management Center works in *production* and *developer* environments. It also has many add-on products. For more information on the product and how it works in these two environments, see the documentation listed in the following table.

For updated information on documentation resources, see the *Sun Management Center* 3.6 *Installation and Configuration Guide*.

Note – Documentation for Sun Management Center is *not* installed with the product. The documents are available at http://docs.sun.com.

TABLE 6 Documentation Resources

Environment	Documentation
If you install and use the product in a <i>production</i> environment, see	<i>Sun Management Center 3.6 User's Guide-</i> Describes how to use the product.
	<i>Sun Management Center 3.6 Installation and Configuration Guide-</i> Describes how to install and configure the product.
If you use the product in a <i>developer</i> environment, see	Sun Management Center 3.5 Developer Environment Reference Manual
If you use the product with <i>other software products or add-ons</i> (listed alphabetically), see	
Advanced System Monitoring	Not Applicable
Hardware Diagnostic Suite 2.0	Sun Management Center 3.5 Hardware Diagnostic Suite 2.0 User's Guide
Solaris Container Manager 1.1	Solaris Container Manager 1.1 Release Notes
	Installing and Administering Solaris Container Manager 1.1
Performance Reporting Manager	Sun Management Center 3.6 Performance Reporting Manager User's Guide
Service Availability Manager	Sun Management Center 3.5 Service Availability Manager User's Guide
Sun Cluster	Task Map: Installing the Sun Cluster Module for Sun Management Center in the <i>Sun Cluster Software</i> <i>Installation Guide for Solaris OS</i>
System Reliability Manager	Sun Management Center 3.5 System Reliability Manager User's Guide
Tivoli TEC Adapter	Sun Management Center Tivoli TEC Adapter Installation Guide
Unicenter TNG	Sun Management Center CA Integration Package User's Guide for Unicenter TNG
If you use the product with these <i>hardware platforms</i> (listed alphabetically), see	
ELP Config Reader (CommonConfigReader)	See Sun Fire V210/V240/V250/V440/1500/2500
Desktop	See Sun Ultra 30/60/80

TABLE 6 Documentation Resources	(Continued)
Environment	Documentation
Dynamic Reconfiguration for Sun Fire high-end and midrange	See Sun Fire V880/V890/15K to 3800
hPCI+ board and CP2140 system controller for Sun Fire high-end systems	See Sun Fire high-end systems
Netra 20/120/1280	Sun Management Center 3.5 Supplement for Netra Servers
Netra 240/440	Sun Management Center 3.6 Supplement for Sun Fire, Sun Blade and Netra Systems
Netra T4/20	Sun Management Center 3.5 Supplement for Netra Servers
PCI+ support for Sun Fire midrange systems	See Sun Fire midrange systems
Sun Blade™ 100/150/1000/2000	Sun Management Center 3.5 Supplement for Workstations
Sun Blade 1500/2500	Sun Management Center 3.6 Supplement for Sun Fire, Sun Blade and Netra Systems
Sun Cobalt™ LX50	See the software product Sun Management Center Linux Agent
Sun Enterprise 5S/10S	Sun Management Center 3.5 Supplement for VSP High-End Entry Servers (Workgroup Servers)
Sun Fire V60x/V65x/B100x/B200x/ V20z/V40z	See the software product Sun Management Center Linux Agent
Sun Fire 280R/V480/V490/V880/V890	Sun Management Center 3.5 Supplement for VSP High-End Entry Servers (Workgroup Servers)
Sun Fire high-end E25K/E20K/15K/12K	Sun Management Center 3.5 Version 6 Release Notes for Sun Fire High-End Systems
Sun Fire midrange E6900/E4900/6800/4810/ 4800/3800	Sun Management Center 3.5 Version 6 Release Notes for Sun Fire Midrange Systems
Sun Fire entry-level midrange E2900/V1280	Sun Management Center 3.5 Version 6 Release Notes for Sun Fire Entry-Level Midrange Systems
	Sun Management Center 3.5 Version 6 Supplement for Sun Fire Entry-Level Midrange Systems
Sun Fire V100/V120	Sun Management Center 3.5 Supplement for Netra Servers
Sun Fire V210/V240/V250/V440	Sun Management Center 3.6 Supplement for Sun Fire, Sun Blade and Netra Systems

TABLE 6 Documentation Resources	(Continued)
Environment	Documentation
Sun LX50	See the software product Sun Management Center Linux Agent
Sun StorEdge™ A5x00/T3	Sun Management Center 3.5 Supplement for the Sun StorEdge A5x00 and T3 Arrays
UltraSPARC [®] IV CPU board support for Netra 1280	Requires midrange systems firmware 5.17.0 and Netra-T add-on packages for Sun Management Center
UltraSPARC IV CPU board support for Sun Fire 6800/4800	See Sun Fire 6800/4800
UltraSPARC IV CPU board support for Sun Fire V1280	Requires midrange systems firmware 5.17.0 and Netra-T add-on packages for Sun Management Center