

HP OpenView Smart Plug-in for UNIX® Operating Systems

Installation Guide

Version: A.03.50

For HP-UX and Solaris OpenView Operations Management Servers



Manufacturing Part Number: None

December 2005

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Support

Please visit the HP OpenView support web site at:

<http://www.hp.com/managementsoftware/support>

This web site provides contact information and details about the products, services, and support that HP OpenView offers.

HP OpenView online software support provides customer self-solve capabilities. It provides a fast and efficient way to access interactive technical support tools needed to manage your business. As a valuable support customer, you can benefit by using the support site to:

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- Submit enhancement requests online
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Most of the support areas require that you register as an HP Passport user and log in. Many also require a support contract.

To find more information about access levels, go to:

http://www.hp.com/managementsoftware/access_level

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1 **Installing the OSSPI**

You can install the Smart Plug-in for UNIX Operating Systems (OSSPI) on HP OpenView Operations (OVO) 7.x and 8.10 management servers. The procedure for upgrading an earlier version of OSSPI, and installing OSSPI on both versions of OVO is described in the following sections.

The management server versions, the managed node operating system versions, and the performance product versions that are supported by OSSPI are listed in the *HP OpenView Smart Plug-in for UNIX Operating Systems Release Notes*. Before you proceed with the installation of OSSPI, make sure that supported versions are installed on your setup.

Upgrading the OSSPI

You can upgrade an earlier version of OSSPI to this version, by uninstalling the previous version and installing the new version. If you have customized any components of the earlier version of OSSPI, and wish to retain it, follow the procedure given below:

1. Make a copy of the customized components with a unique name (for example, add "-" at the end for each name).
2. Uninstall the previous version of OSSPI.
3. Install the new version of OSSPI.
4. Repeat the modification on the components installed with the new version of OSSPI.

Backup the components by copying and downloading the configuration. Refer to *HP OpenView Operations Administrator's Reference Volume I* for more information on copying and downloading configuration. Once you install the new version of OSSPI, you can upload the downloaded data (with changed names) and refer to them for customizing the new components.

Prerequisites to Install OSSPI

You must make sure that the Service Discovery Framework (SDF) version A.2.10 and Self-Healing Service (SHS) are installed on the management server prior to the installation of UNIX OS SPI.

You must install `xpg4` package on the management server and the managed node before installing UNIX OS SPI.

Installing OSSPI on OVO 8.10 Management Server

You can choose to install the Smart Plug-in for UNIX Operating Systems software on the OVO 8.10 management server during the OVO installation procedure. You will be prompted to mount the HP OpenView Smart Plug-in CD-ROM. Mount the CD-ROM and follow the instructions.

If you choose to install the Smart Plug-in for UNIX Operating Systems later, do the following:

- Step 1.** Log on to the OVO management server as **root** user.
- Step 2.** Set the `LANG` variable in the environment.
- Step 3.** Mount the HP OpenView Smart Plug-in CD-ROM. Use the CD that contains the OSSPI management server installation packages (HP OpenView Smart Plug-ins for OVO/*UNIX*). Refer to the *HP OpenView Smart Plug-ins for OVO/UNIX Release Notes* for more information.
- Step 4.** Set the environment variable `OSSPI_INSTALLER_HOME` to the installables' directory, `/<mount_point>/OV_DEPOT`
- Step 5.** Type the following:
`/<mount_point>/OV_DEPOT/UNIXOSSPI/unix_osspi_setup`

You will be prompted to select the components you want to install. Installation will proceed based on the options you select.

NOTE

You can also install OSSPI on a clustered OVO management server.

Installing OSSPI on OVO 7.x Management Server

To install the Smart Plug-in for UNIX Operating Systems software bundle on the OVO 7.x management server, do the following:

- Step 1.** Log on to the OVO management server as **root** user.
- Step 2.** Set the `LANG` variable in the environment.
- Step 3.** Mount the HP OpenView Smart Plug-in CD-ROM. Use the CD that contains the management server installation packages (HP OpenView Smart Plug-ins for OVO/*UNIX*). Refer to the *HP OpenView Smart Plug-ins for OVO / UNIX Release Notes* for more information.
- Step 4.** Use `swinstall` to install the OSSPI fileset. Refer to the *HP OpenView Smart Plug-ins for OVO / UNIX Release Notes* for more information about product locations and valid platform names.

NOTE

You can also install OSSPI on a clustered OVO management server.

HP-UX (*not* part of an MC/ServiceGuard cluster)

On an HP-UX system, use the `swinstall` graphical user interface:

1. Type the following: `/usr/sbin/swinstall -s\
/ <mount_point>/OV_DEPOT/ <platform>.sdtape`
The SD Install - Software Selection window appears.
2. Highlight SPI-OSUX-OVO.
3. Select Actions: Mark for Install from the menu bar.
4. Select Actions: Install (Analysis) from the menu bar.
5. Verify that the analysis phase of the installation completes without errors by clicking on **Logfile**. This displays the `/var/adm/sw/swagent.log` log file. Correct any errors that appear.
6. Click on **OK** to continue with the installation.
7. Exit `swinstall` after the installation completes.

Or on an HP-UX system, use the command line:

1. Type the following: `/usr/sbin/swinstall -s\
/ <mount_point>/OV_DEPOT/ <platform>.sdtape SPI-OSUX-OVO`
2. Check the `/var/adm/sw/swagent.log` log file and correct any errors that appear.

Solaris

On a Solaris system, use the command line:

1. Type the following: `/usr/sbin/swinstall -s\
/ <mount_point>/OV_DEPOT/SOLARIS.sdtape SPI-OSUX-OVO-SOL`
The `swinstall` application is installed with OVO (`swinstall` is also referred to as SD or Software Distributor).
2. Check the `/var/adm/sw/swagent.log` log file for any errors.

Installing the OSSPI

Installing OSSPI on OVO 7.x Management Server

following topics:

- “Software Bundles” on page 17
- “Verifying Installation of the OSSPI Software” on page 19
- “Installed File Locations” on page 22

Software Bundles

The following tables list the bundles, products, and filesets that make up the OSSPI and explain what the contents are. Table 2-1 shows the contents of the Smart Plug-in for UNIX Operating Systems software depot (SD) file set.

Table 2-1 The OSSPI Software Depot (SD)

Software Depot	Description
SPI-OSUX-OVO	OSSPI server software – contains everything necessary to run the OSSPI for HP-UX and Solaris (executables, shell scripts, etc.)

Table 2-2 describes the contents of the Smart Plug-in for UNIX Operating Systems server and agent sub-products.

Table 2-2 The OSSPI Server and Agent Sub-products

Sub-product	Description
AGT-OSUX-AIX	Contains OSSPI agent filesets for AIX
AGT-OSUX-HP	Contains OSSPI agent filesets for HP-UX
AGT-OSUX-LNX	Contains OSSPI agent filesets for Linux
AGT-OSUX-SOL	Contains OSSPI agent filesets for Solaris
AGT-OSUX-TRU64	Contains OSSPI agent filesets for Tru64 UNIX
CORE-OSUX-HP	Contains Core OSSPI agent filesets
DOC-OSUX-HP	Contains OSSPI documentation
SCS-OSUX-SOL	Contains OSSPI filesets for Sun cluster on Solaris
SG-OSUX-HP	Contains OSSPI filesets for MC/ServiceGuard on HP-UX
VCS-OSUX-SOL	Contains OSSPI filesets for VERITAS cluster on Solaris

Table 2-3 describes the contents of the Smart Plug-in for UNIX Operating Systems server and agent filesets.

Table 2-3 The OSSPI Server and Agent File Sets

SD File Set	Description
SPI-OS-AGT-AIX	Contains OSSPI agent files for AIX
SPI-OS-CORE	Contains core OSSPI agent files
SPI-OS-AGT-HP	Contains OSSPI agent files for HP-UX
SPI-OS-AGT-LNX	Contains OSSPI agent files for Linux
SPI-OS-AGT-SOL	Contains OSSPI agent files for Solaris
SPI-OS-AGT-Tru64	Contains OSSPI agent files for Tru64 UNIX
SPI-OS-SRV-HP11 ^a	Contains OSSPI management server files for HP-UX
SPI-OS-SRV-SOL ^b	Contains OSSPI management server files for Solaris
SPI-OS-DOC	Contains OSSPI documentation
SPI-OS-SCS-SOL	Contains OSSPI Sun cluster files for Solaris
SPI-OS-SG-HP	Contains OSSPI MCSG files for HP-UX
SPI-OS-VCS-SOL	Contains OSSPI VERITAS Cluster Server files for Solaris
SPI-OS-VxVM-HP	Contains OSSPI VERITAS Volume Manager files for HP-UX
SPI-OS-VxVM-SOL	Contains OSSPI VERITAS Volume Manager files for Solaris

a. present only on HP-UX management server

b. present only in Solaris management server

Verifying Installation of the OSSPI Software

To verify that the installation of the Smart Plug-in for UNIX Operating Systems completed successfully on the OVO management server, carry out the steps in the following list:

1. On the command line, enter: **swlist**, and look for one of the following entries in the output displayed

```
SPI-OSUX-OVO A.03.50
```

2. In the OVO GUI, check that the following elements have been added to the respective windows:

Application Groups:

Unix OS SPI, containing:

- OSSPI Discovery
- OSSPI Supportability
- AIX
- HP-UX
- Linux
- Solaris
- Tru64
- HP Performance Products
- Sun Cluster Applications
- Veritas

Message Groups:

OSSPI-FS
OSSPI-Internal
OSSPI-Kernel
OSSPI-Services

Message-Source Templates:

Operating System SPIs,
containing:

- IBM AIX
- HP UX

Node Groups:

- Linux
- Sun Solaris
- Tru64 UNIX

OSSPI-AIX
OSSPI-Discovery
OSSPI-HPUX
OSSPI-Linux
OSSPI-Removal
OSSPI-Solaris
OSSPI-Tru64

User Profiles:

AIX Admin
AIX Operator
HPUX Admin
HPUX Operator
Linux Admin
Linux Operator
Solaris Admin
Solaris Operator
Tru64 Admin
Tru64 Operator
Veritas Admin
Veritas Operator
Sun Cluster Admin
Sun Cluster Operator
Supportability
Performance
Janitor

3. If any of these steps fails to produce the desired results, use the `swverify` command to ensure that all rules and dependencies were applied during the installation of the OSSPI software. Enter:

```
swverify -x autoselect_dependencies=false SPI-OSUX-OVO
```

- a. Check the following log files for more specific information relating to installation problems:
 - `/var/adm/sw/swagent.log`
 - `/var/adm/sw/swinstall.log`
- b. Check your installation with the details in Table 2-4, “OSSPI File Locations on the OVO Management Server,” on page 22.

Installed File Locations

The installation process copies the necessary files to the OVO management server. Table 2-4 shows the directories that the installation process creates on the OVO 8.10 management server for the OSSPI server.

Table 2-4 OSSPI File Locations on the OVO Management Server

File Type	Directory Location
Binaries	/opt/OV/lbin/osspi/
Documentation	/opt/OV/doc/C/osspi/
Log files	/var/opt/OV/share/osspi/log/
Temporary and Runtime	/var/opt/OV/share/osspi/tmp/
OVO integration	/var/opt/OV/share/tmp/OpC_appl/
- AIX:	/var/opt/OV/share/tmp/OpC_appl/unix_osspi_appl/osspi_AIX
- Core:	pl/osspi_AIX
- HP-UX:	/var/opt/OV/share/tmp/OpC_appl/unix_osspi_appl/osspi_CORE
- Linux:	pl/osspi_CORE
- Solaris:	/var/opt/OV/share/tmp/OpC_appl/unix_osspi_appl/osspi_HPUX
- Tru64:	pl/osspi_HPUX
- Bitmaps:	/var/opt/OV/share/tmp/OpC_appl/unix_osspi_appl/osspi_LINUX
	/var/opt/OV/share/tmp/OpC_appl/unix_osspi_appl/osspi_SOLARIS
	/var/opt/OV/share/tmp/OpC_appl/unix_osspi_appl/osspi_TRU64
	/etc/opt/OV/share/symbols/C/OSSPI

Table 2-5 on page 23 shows the directory locations for the installed OSSPI files on an OVO 8.10 managed node. These are the standard locations for OVO commands, actions, and monitors.

Table 2-5 OSSPI File Locations for the OVO Managed Node

File Type	OS	Directory Location
Binaries	AIX	/var/lpp/OV/bin/instrumentation/ for Distributed Computing Environment (DCE) agents /var/opt/OV/bin/instrumentation/ for HTTPS agents
	HP-UX, Linux, Solaris, Tru64	/var/opt/OV/bin/instrumentation/
Default Configuration	AIX	/var/lpp/OV/conf/ossapi/
	HP-UX, Linux, Solaris, Tru64	/var/opt/OV/conf/ossapi/
Configuration & Discovery	AIX	/usr/lpp/OV/conf/ossapi/
	HP-UX, Linux, Solaris, Tru64	/var/opt/OV/conf/ossapi/
Logs	AIX	/var/lpp/OV/log/ossapi/
	HP-UX, Linux, Solaris, Tru64	/var/opt/OV/log/ossapi/

Table 2-5 **OSSPI File Locations for the OVO Managed Node (Continued)**

File Type	OS	Directory Location
Temporary & Runtime	AIX	/var/lpp/OV/tmp/osspi/
	HP-UX, Linux, Solaris, Tru64	/var/opt/OV/tmp/osspi/

3 **Uninstalling the OSSPI**

This chapter describes how to remove the OSSPI software from the OVO managed node and the OVO management server.

In this Section

This section describes how to remove the OSSPI software quickly and cleanly. The information provided in this section covers the following areas:

- “Removing the OSSPI from the Managed Node” on page 27
- “Removing the OSSPI from the Management Server” on page 29

Removing the OSSPI from the Managed Node

To remove the OSSPI software from the OVO managed node, you should carry out the following steps in the order specified:

1. In the OVO GUI, *de-assign* the OSSPI policies from *all* those OSSPI managed nodes from which you want to uninstall the OSSPI software by moving the nodes (not copying them) from the OSSPI-AIX, OSSPI-HPUX, OSSPI-Linux, OSSPI-Solaris, or OSSPI-Tru64 Node Group in which they reside to the OSSPI-Removal Node Group. This includes the OVO management server if it is also a managed node and you want to uninstall the OSSPI software.

The OSSPI-Removal Node Group has only the monitor policy OSSPI-alarmdef_write assigned to it.

2. Use the OVO GUI to *distribute* the OSSPI-alarmdef_write policy to the OSSPI-Removal Node Group. This de-activates and removes any remaining OSSPI policy definitions from the managed nodes present in the OSSPI-Removal Node Group and, in addition, de-activates any alarm definitions.

NOTE

This step should be carried out regardless of whether OV Performance or GlancePlus is running on the managed nodes.

3. Remove any OSSPI configuration data from the managed nodes by running the OSSPI's Clean Node application on the managed nodes in the OSSPI-Removal Node Group:
 - a. In the OVO Application Bank window, open the OSSPI application group OSSPI_Admin
 - b. In the OSSPI_Admin application-group window, select the Clean Node application, drag it across to the OVO Node Bank window, and drop it onto the OSSPI-Removal node group icon. The application prompts you to confirm the activation of the clean-up operation:

Are you sure you want to delete the OSSPI from the Node [Yes/No]

To remove configuration data used by the OSSPI enter: **Yes**

4. Remove the managed nodes manually from the OSSPI-Removal Node Group using the following menu option:

Actions > Node > Remove from this group

Removing the OSSPI from the Management Server

To remove the OSSPI software completely, you should first carry out the steps described in “Removing the OSSPI from the Managed Node” on page 27 and then remove the OSSPI components from the OVO management server, as follows:

1. Remove the OSSPI configuration data from the OVO management server using the OSSPI `Clean Server` application, which you can find in the `OSSPI_Admin` application-group window:
 - a. In the OVO `Node Bank` window, select the OVO management server icon and drag it across to the `OSSPI_Admin` application-group window
 - b. Drop it onto the OSSPI `Clean Server` application icon

2. Remove the OSSPI software from the OVO management server by using the following command in a shell on the OVO management server itself:

```
unix_osspi_remove
```

3. Remove any remaining OSSPI-specific actions, commands, and monitors by distributing the actions, commands, and monitors to *all* managed nodes.
4. Remove all OSSPI components manually from the OVO GUI, for example:
 - Node Groups
 - Application Groups
 - Message Groups
 - Policies and Policy Groups
 - Users and User Profiles

NOTE

The `unix_osspi_remove` script will not remove the service discovery depot (`SPI-SVCDISC-OVO`) that is needed for the discovery functionality to work, and is installed along with the OSSPI. Before you remove the service discovery depot, make sure that no other programs are using the service discovery framework.
