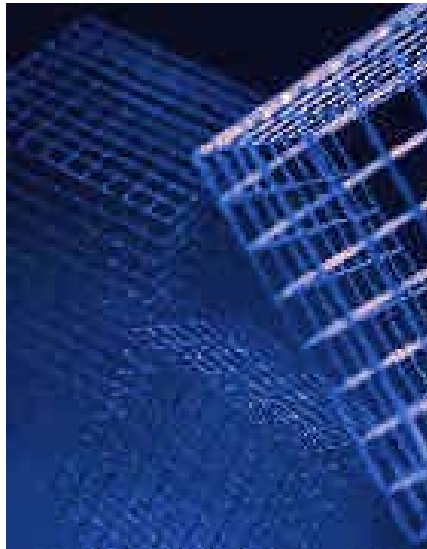


# Installation Guide: SAP DB



**Version 7.4**








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## Icons

| Icon  | Meaning        |
|---|----------------|
|  | Caution        |
|  | Example        |
|  | Note           |
|  | Recommendation |
|  | Syntax         |

## Typographic Conventions

| Type Style          | Description  |
|---------------------|--|
| <i>Example text</i> | Words or characters that appear on the screen. These include field names, screen titles, pushbuttons as well as menu names, paths and options.<br><br>Cross-references to other documentation                                  |
| <b>Example text</b> | Emphasized words or phrases in body text, titles of graphics and tables  |
| EXAMPLE TEXT        | Names of elements in the system. These include report names, program names, transaction codes, table names, and individual key words of a programming language, when surrounded by body text, for example, SELECT and INCLUDE. |
| Example text        | Screen output. This includes file and directory names and their paths, messages, names of variables and parameters, source code as well as names of installation, upgrade and database tools.                                  |
| <b>Example text</b> | Exact user entry. These are words or characters that you enter in the system exactly as they appear in the documentation.  |
| <Example text>      | Variable user entry. Pointed brackets indicate that you replace these words and characters with appropriate entries.   |
| EXAMPLE TEXT        | Keys on the keyboard, for example, function keys (such as F2) or the ENTER key   |

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## Installation Guide: SAP DB 7.4

This document describes how to install and register the SAP DB software on UNIX/Linux and Windows NT/Windows 2000 operating systems, how to upgrade existing SAP DB software or perform an update of the SAP DB software for a running database instance.



This guide is **not** relevant for standard installations or upgrades of SAP systems. The installation or upgrade of the SAP DB software required for SAP systems is described in SAP-specific guides. You can find these guides in the SAP Library.



For general information on the SAP DB database system, see the [User Manual: SAP DB \[Extern\]](#).

### Conventions

[Variables \[Page 7\]](#)

[Operating System Versions \[Page 8\]](#)

### Procedure

Unpack the desired software package. The required [installation files \[Page 9\]](#) and [software packages \[Page 9\]](#) are unpacked.

#### Installing/Upgrading the SAP DB Software

- For an installation/upgrade of the SAP DB software with [SDBINST \[Page 9\]](#), you can decide which software packages you want to install/upgrade by selecting the required [installation profile \[Page 12\]](#).
- An installation or upgrade can be carried out interactively ([Interactive Installation \[Page 13\]](#)) or in the background ([Background Installation \[Page 13\]](#)).

Follow the procedure described in [Installing the Database Server: SAP DB 7.4 \[Page 20\]](#) or [Installation of the Client Software: SAP DB 7.4 \[Page 34\]](#).

#### Updating an Existing Database Instance

If certain prerequisites are met, you can perform an [update of the SAP DB software \[Page 15\]](#) for an existing database instance (interactively or in the background) with [SDBUPD \[Page 9\]](#).

Follow the procedure described in [Update of a Database Instance: SAP DB 7.4 \[Page 45\]](#).

#### Uninstalling the SAP DB Software

Follow the procedure described in [Uninstalling the SAP DB Software \[Page 50\]](#).



## Variables

The following table lists the variable descriptions that are used.

|           |  |
|-----------|--|
| <os>      | Name of the operating system in the path specifications              |
| <arch>    | Name of the operating system architecture in the path specifications |
| <version> | Version number of the SAP DB software (four-character)               |

|                            |   |
|----------------------------|---|
| <independent_data_path>    | Version-independent path for all application data (configuration files and logs)  |
| <independent_program_path> | Program path that is independent of the software version This directory contains all programs for managing the database instance and the client software. Ensure that the directory is large enough that it has sufficient disk space for future enhancements of the client software.   |
| <dependent_path><n>        | File path that is dependent on the software version. This path must be unique. This directory contains the programs of the database kernel with its runtime environment. A number of directories with different versions can exist side by side.<br><br>All programs in these version-independent directories are called not directly by the user by via the programs stored in the <independent_program_path>. |
| <package>                  | Logical name of the <a href="#">software package [Page 9]</a>   |
| <package_directory>        | Directory in which the software package is stored after its installation  |
| <profile>                  | Name of the <a href="#">installation profile [Page 12]</a>  |
| <program_path>             | Standard Windows NT/Windows 2000 directory for the user software (for example, C:\Program Files)  |
| <owner>                    | UNIX/Linux: Name of the owner of the SAP DB database software   |
| <group>                    | UNIX/Linux: Name of the group of the SAP DB database software   |
| <database_name>            | Name of the <a href="#">database instance [Extern]</a>  |
| <userid>                   | Name of the <a href="#">DBM user [Extern]</a>   |
| <password>                 | Password of the DBM user  |



## Operating System Versions

The following table lists the operating systems that are supported.

| os      | arch  |
|---------|-------|
| aix     | ppc   |
| linux   | i386  |
| solaris | sparc |
| tru64   | alpha |
| hpux    | hppa  |
| win     | i386  |





## Installation File

After unpacking the software package that corresponds to your operating system architecture and your database instance type ([Unpacking the Installation Files \[Page 45\]](#)), the following installation files are available, among others:

- [SDBINST \[Page 9\]](#)
- [SDBUPD \[Page 9\]](#)



## SDBINST

After unpacking the software package that corresponds to your operating system architecture and your database instance type ([Unpacking the Installation Files \[Page 45\]](#)), the [installation file \[Page 9\]](#) SDBINST is available, among others.

SDBINST is a program for the installation or upgrade of the SAP DB software. SDBINST can be used interactively or in the background (with the specification of the appropriate [SDBINST options \[Page 14\]](#)).

### Procedure

For a detailed description of the possible installations, see the following sections:

- [Installing the Database Server: SAP DB 7.4 \[Page 20\]](#)
- [Installation of Client Software: SAP DB 7.4 \[Page 34\]](#)



## SDBUPD

After unpacking the software package that corresponds to your operating system architecture and your database instance type ([Unpacking the Installation Files \[Page 45\]](#)), the [installation file \[Page 9\]](#) SDBUPD is available, among others.

SDBUPD is a program for upgrading an existing SAP DB database instance. SDBUPD can be used interactively or in the background (with the specification of the appropriate [SDBUPD options \[Page 20\]](#)).

### Procedure

For a detailed description of the update of a SAP DB database instance, see:

[Update of a Database Instance: SAP DB 7.4 \[Page 45\]](#)



## Software Package

The SAP DB software is divided into the following software packages:

| Software Package | Name   |
|------------------|--|
| SAPDDBAS.TGZ     | <a href="#">Base [Page 10]</a>               |
| PCR<version>.TGZ | <a href="#">PCR&lt;version&gt; [Page 11]</a> |
| SAPDBUTL.TGZ     | <a href="#">Server Utilities [Page 11]</a>   |
| SAPDBKRN.TGZ     | <a href="#">Database Kernel [Page 11]</a>    |

|  |                                   |
|--|-----------------------------------|
| APOCOM.TGZ (only for <a href="#">liveCache [Extern]</a> for SAP APO) | <a href="#">APO COM [Page 11]</a> |
|--|-----------------------------------|

## Dependencies

The individual software packages are dependent on each other. This dependency can relate to the type of software package and the version details. Because the software packages are dependent on each other, there is a fixed installation sequence.

The following dependencies exist:

*Base* → *PCR*<version>

*Base* → *Server Utilities* → *Database Kernel* [→ *APO COM*]

The *Base* software package is independent of all other packages. *PCR*<version> and/or *Server Utilities* cannot be installed until *Base* has been installed. *Database Kernel* cannot be installed until *Server Utilities* has been installed. You can only install the *APO COM* software package after you have installed *Database Kernel*.

The software packages can be installed individually if their dependencies can be removed. As a result, it is possible to install missing components at a later date, for example.

## Installing/Upgrading the SAP DB Software

The software packages are assigned to [installation profiles \[Page 12\]](#). These profiles are installed or upgraded using [SDBINST \[Page 9\]](#). These procedures are described in the following sections:

- [Installing the Database Server: SAP DB 7.4 \[Page 20\]](#)
- [Installation of Client Software: SAP DB 7.4 \[Page 34\]](#)

After installation has been successfully completed, the software packages files are stored in the directories required for the correct functioning of the SAP DB software (<package\_directory>).

## Updating a Database Instance

During an update of the software for a database instance, the required software packages are selected and updated by [SDBUPD \[Page 9\]](#). Follow the procedure described in [Update of a Database Instance: SAP DB 7.4 \[Page 45\]](#).



### Base

The *Base* [software package \[Page 9\]](#) (SAPDDBAS.TGZ) is the basic SAP DB software package. It contains the following components:

- Programs for registering the installation
- Uninstallation tool, InstallRegistryViewer
- Programs needed by the SAP application server to access the SAP DB database

The *Base* software package must always be installed. Only then can further software packages be installed.

This software package is assigned to the following [installation profiles \[Page 12\]](#): [Server \[Page 12\]](#), [APO LiveCache \[Page 12\]](#), [Runtime for SAP AS \[Page 13\]](#), [all \[Page 13\]](#)

 **PCR<version>**

The *PCR<version>* [software package \[Page 9\]](#) (*PCR<version>.TGZ*) is the SAP DB Precompiler Runtime package. It contains runtime libraries for applications that were created with the SAP DB C/C++-Precompiler for Embedded SQL.

This software package can exist in several versions in the local installation directory. The *<version>* is entered with four characters.

The *PCR<version>* software packages cannot be installed until the [Base \[Page 10\]](#) software package has been installed. You can install all the *PCR<version>* packages, or just the ones you require.

This software package is assigned to the following [installation profiles \[Page 12\]](#): [Server \[Page 12\]](#), [APO LiveCache \[Page 12\]](#), [Runtime for SAP AS \[Page 13\]](#), [all \[Page 13\]](#)

 **Server Utilities**

The *Server Utilities* [software package \[Page 9\]](#) (*SAPDBUTL.TGZ*) contains all the tools needed for managing the database kernel.

The *Server Utilities* software package cannot be installed until the [Base \[Page 10\]](#) software package has been installed.

This software package is assigned to the following [installation profiles \[Page 12\]](#): [Server \[Page 12\]](#), [APO LiveCache \[Page 12\]](#), [all \[Page 13\]](#)

 **Database Kernel**

The *Database Kernel* [software package \[Page 9\]](#) (*SAPDBKRN.TGZ*) contains the database kernel with its runtime environment.

The *Database Kernel* software package cannot be installed until the [Server Utilities \[Page 11\]](#) software package has been installed.

This software package is assigned to the following [installation profiles \[Page 12\]](#): [Server \[Page 12\]](#), [APO LiveCache \[Page 12\]](#), [all \[Page 13\]](#)

 **APO COM**

The *APO COM* [software package \[Page 9\]](#) (*APOCOM.TGZ*) contains the libraries with the APO COM liveCache routines.

The *APO COM* software package cannot be installed until the [Database Kernel \[Page 11\]](#) software package has been installed.

This software package is assigned to the following [installation profiles \[Page 12\]](#), [APO LiveCache \[Page 12\]](#), [all \[Page 13\]](#)



## Installation Profile

Every [software package \[Page 9\]](#) is assigned to one or more installation profiles. The following installation profiles exist:

- [Server \[Page 12\]](#)
- [APO LiveCache \[Page 12\]](#) (only for [liveCache \[Extern\]](#) for SAP APO)
- [Runtime For SAP AS \[Page 13\]](#)
- [all \[Page 13\]](#)

## Procedure

Once the installation program [SDBINST \[Page 9\]](#) has been started, the user can decide on one of these installation profiles. All software packages assigned to the installation profile are installed. For a detailed description of the possible installations, see the following sections:

- [Installing the Database Server: SAP DB 7.4 \[Page 20\]](#)
- [Installation of Client Software: SAP DB 7.4 \[Page 34\]](#)



## Server

The *Server* [installation profile \[Page 12\]](#) contains the following [software packages \[Page 9\]](#):

- [Base \[Page 10\]](#)
- Several [PCR<version> \[Page 11\]](#)
- [Server Utilities \[Page 11\]](#)
- [Database Kernel \[Page 11\]](#)

If you use this installation profile, carry out an installation or upgrade of the database server and client software with SDBINST ([Installation of the Database Server: SAP DB 7.4 \[Page 20\]](#)).



## APO LiveCache

The *APO LiveCache* [installation profile \[Page 12\]](#) contains the following [software packages \[Page 9\]](#):

- [Base \[Page 10\]](#)
- Several [PCR<version> \[Page 11\]](#)
- [Server Utilities \[Page 11\]](#)
- [Database Kernel \[Page 11\]](#)
- [APO COM \[Page 11\]](#)

If you use this installation profile, carry out an installation or upgrade of the database server and client software with SDBINST ([Installation of the Database Server: SAP DB 7.4 \[Page 20\]](#)).



## Runtime For SAP AS

The *Runtime for SAP AS* [installation profile \[Page 12\]](#) contains the SAP DB client software for the SAP application server of a SAP system. The following [software packages \[Page 9\]](#) are contained in this profile:

- Administrative tools (in the [Base \[Page 10\]](#) software package)
- SAP DB Precompiler runtimes that the SAP application server loads in order to be able to connect to the SAP DB database (in several [PCR<version> \[Page 11\]](#) software packages)

If you use this installation profile, carry out an installation or upgrade of the client software with SDBINST ([Installation of the Client Software: SAP DB 7.4 \[Page 34\]](#)).



## all

The [installation profile \[Page 12\]](#) *all* contains all [software packages \[Page 9\]](#) found in the local installation directory. This profile currently corresponds to the [Server \[Page 12\]](#) or [APO LiveCache \[Page 12\]](#) installation profile.



## Interactive Installation

During interactive installation or upgrade with [SDBINST \[Page 9\]](#), the system requests all the required information in a preparatory phase:

- [Installation profile \[Page 12\]](#)
- Installation paths for the individual [software packages \[Page 9\]](#)

These entries are checked. The software packages are then installed and registered. Intervention by the user is no longer required, and is therefore no longer possible.

## Procedure

For more information about the procedure, see the following sections:

- [Installing the Database Server: SAP DB 7.4 \[Page 20\]](#)
- [Installation of Client Software: SAP DB 7.4 \[Page 34\]](#)

The installation or upgrade is [logged \[Page 50\]](#).



## Background Installation

You can perform an installation or upgrade of the SAP DB database software with [SDBINST \[Page 9\]](#) in the background. You can use the appropriate [SDBINST options \[Page 14\]](#) to define the necessary parameters.

### Advantages

Performing an installation or an upgrade in the background takes less time.

You can use call script to generate identical software installations on different computers.

## Disadvantages

You must enter all the required options in the call script correctly and completely. Some options are only determined from the software packages at runtime. As a result, it is not possible to check whether the option list is complete at the start of an installation. This means that the system will terminate installation if it needs an option that is missing.

## Installation or upgrade

During background installation, the installation program SDBINST itself decides whether it is dealing with a new installation or an upgrade. If the relevant [software package \[Page 9\]](#) already exists in the location in question, an upgrade is carried out, providing it is allowed for the version. As a rule, an older package can be replaced by a new one. The software packages can be combined as required on operating system platforms that support 32 and 64 bit applications.

## Procedure

For more information about the procedure, see the following sections:

- [Installing the Database Server: SAP DB 7.4 \[Page 20\]](#)
- [Installation of Client Software: SAP DB 7.4 \[Page 34\]](#)

The installation or upgrade is [logged \[Page 50\]](#).



## SDBINST Options

To be able to carry out a [background installation \[Page 13\]](#) with [SDBINST \[Page 9\]](#), you must enter options.

To display a list of these options, enter the following SDBINST command:

```
SDBINST -h
```

### Conventions

[Variables \[Page 7\]](#)

### General options

| Option                           | Explanation   |
|----------------------------------|---|
| -h   -help                       | List and description of options   |
| -v   -version                    | Version of the SDBINST installation program   |
| -l   -list                       | Display of all <a href="#">software packages [Page 9]</a> and <a href="#">installation profiles [Page 12]</a> |
| -b   -batch                      | Start of installation program in the background   |
| -profile <profile>               | Specification of installation profile   |
| -package <package1>[,<package2>] | Specification of software packages. Use the logical names of the software packages, <b>not</b> the file names |
| -o <owner>                       | Specification of the owner of the software (UNIX only)  |
| -g <group>                       | Specification of the software group (UNIX only)   |

Options that can only be used for the [Base \[Page 10\]](#) software package

| Option | Explanation |
|--------|-------------|
|--------|-------------|

|   |   |
|---|---|
| -indep_data<br><independent_data_path>    | The <independent_data_path> can be specified the first time the system is installed.    |
| -indep_prog<br><independent_program_path> | The <independent_program_path> can be specified the first time the system is installed. |

<independent\_data\_path> and <independent\_program\_path> cannot be changed once the system has been installed for the first time, and are therefore ignored for subsequent installations. You can only change these path specifications by fully uninstalling the system.

#### Options that can only be used for the [Database Kernel \[Page 11\]](#) software package

| Option                   | Explanation                       |
|--------------------------|-----------------------------------|
| -depend <dependent_path> | Specification of <dependent_path> |



## Updating an Existing Database Instance

You can perform an update of the SAP DB software for an existing SAP DB database instance with [SDBUPD \[Page 9\]](#). You can perform the update interactively or in the background, with the specification of the appropriate [SDBUPD options \[Page 20\]](#).

### Prerequisites

To be able to perform the update of the desired database instance, the following prerequisites must be fulfilled:

- Only this one database instance can be registered for the relevant SAP DB software installation.
- If there are other SAP DB software installations on your host, you must ensure that the database instance of these software installations are in OFFLINE operation status, or stop the X server.
- The database instance must be in a status from which it can be restarted (data and log areas have the required information, and the database parameters are set in such a way that the last start of the database instance ran successfully with these settings)
- The system tables for the database instance have been loaded at least once.

### Procedure

Start the update of the database instance as described in [Update of a Database Instance: SAP DB 7.4 \[Page 45\]](#).

The update program SDBUPD performs all required checks and selects the suitable [update strategy \[Page 15\]](#).

The corresponding update is [logged \[Page 50\]](#).



## Update Strategy

The [update of an existing database instance \[Page 15\]](#) with [SDBUPD \[Page 9\]](#) is performed in accordance with a certain update strategy. Which of the possible strategies is selected depends on the database instance type and the software versions.

## Database Instance Type

Currently, it is only possible to perform an update with SDBUPD for the database instance types [SAP DB OLTP \[Extern\]](#) and [liveCache \[Extern\]](#) (for SAP APO).

### Possible Update Strategies

| Database Instance Type SAP DB OLTP | Database Instance Type liveCache (for SAP APO)     |
|------------------------------------|--|
| <a href="#">INPLACE [Page 16]</a>  |  |
| <a href="#">PATCH [Page 17]</a>    | <a href="#">Inplace Upgrade [Page 17]</a>          |
|                                    | <a href="#">Backup/Restore Upgrade [Page 18]</a>   |
|                                    | <a href="#">APO Extract/Load Upgrade [Page 19]</a> |

## Software Versions

SDBUPD determines the SAP DB software versions (and, if appropriate, the SAP APO release) of the existing database instance and the software package to be installed. For more information about the resulting update strategies, see:

- [Update Strategy for SAP DB OLTP Database Instance \[Page 49\]](#)
- [Update Strategy for liveCache Database Instance \[Page 49\]](#)



You can find the *Upgrade for SAP APO* documentation as follows:

<http://service.sap.com/instguides>, *Integration & Upgrade Guides* → *mySAP SCM*.



## INPLACE

[Update strategy \[Page 15\]](#) INPLACE (COMPATIBLE\_DATA) for the database instance type [SAP DB OLTP \[Extern\]](#). With this update strategy, the database instance is restarted, if possible. The SAP DB software is then upgraded. the INPLACE upgrade strategy is supported for the SAP DB versions listed in [Update Strategy for SAP DB OLTP Database Instance \[Page 49\]](#).

### Prerequisites

The general prerequisites for [Update of an Existing Database Instance \[Page 15\]](#) must be fulfilled.

The database instance can be in any operation status.

### Procedure

[Update of a Database Instance: SAP DB 7.4 \[Page 45\]](#)

## Process Flow

SDBUPD proceeds as follows:

1. The [X Server \[Extern\]](#) is started, if necessary.
2. General checks are performed:  
The status of the data and log areas, database parameter settings, operation status of other database instances, and so on.
3. If the required log entries exist, the database instance is restarted.



4. The database instance is placed in operation status OFFLINE.
5. The X Server is stopped.
6. The required SAP DB software is upgraded.
7. The X Server is started.
8. The database instance is placed in operation status ONLINE.
9. The system tables are loaded.



## PATCH

[Update strategy \[Page 15\]](#) PATCH (COMPATIBLE\_LOG) for the database instance type [SAP DB OLTP \[Extern\]](#). With this update strategy, only the SAP DB software is upgraded. The PATCH upgrade strategy is supported for the SAP DB versions listed in [Update Strategy for SAP DB OLTP Database Instance \[Page 49\]](#).

### Prerequisites

The general prerequisites for [Update of an Existing Database Instance \[Page 15\]](#) must be fulfilled.

The database instance can be in any operation status.

### Procedure

[Update of a Database Instance: SAP DB 7.4 \[Page 45\]](#)

## Process Flow

SDBUPD proceeds as follows:

1. The [X Server \[Extern\]](#) is started, if necessary.
2. General checks are performed:  
The status of the data and log areas, database parameter settings, operation status of other database instances, and so on.
3. The database instance is placed in operation status OFFLINE.
4. The X Server is stopped.
5. The required SAP DB software is upgraded.
6. The X Server is started.
7. The database instance is placed in operation status ONLINE.
8. The system tables are loaded.



## Inplace Upgrade

[Update strategy \[Page 15\]](#) Inplace Upgrade (COMPATIBLE\_LOG) for the database instance type [liveCache \[Extern\]](#). With this update strategy, only the liveCache software is upgraded. The Inplace Upgrade update strategy is currently only used for the SAP APO liveCache ([Update Strategy for liveCache Database Instances \[Page 49\]](#)).



You can find the *Upgrade for SAP APO* documentation as follows:

<http://service.sap.com/instguides>, *Integration & Upgrade Guides* → *mySAP SCM*.

### Prerequisites

The general prerequisites for [Update of an Existing Database Instance \[Page 15\]](#) must be fulfilled.

The database instance can be in any operation status.

### Procedure

[Update of a Database Instance: SAP DB 7.4 \[Page 45\]](#)

## Process Flow

SDBUPD proceeds as follows:

1. The [X Server \[Extern\]](#) is started, if necessary.
2. General checks are performed:  
The status of the data and log areas, database parameter settings, operation status of other database instances, and so on.
3. The database instance is placed in operation status OFFLINE.
4. The X Server is stopped.
5. The required SAP DB software is upgraded.
6. The X Server is started.
7. The database instance is placed in operation status ONLINE.
8. The system tables are loaded.
9. The database instance is placed in operation status OFFLINE.



## Backup/Restore Upgrade

[Update strategy \[Page 15\]](#) Backup/Restore Upgrade (EXTERNAL\_CONSISTENT\_BACKUP) for the database instance type [liveCache \[Extern\]](#). A data backup is required for this update strategy. Only after you have backed up the data can the liveCache software be upgraded. The Backup/Restore Upgrade update strategy is currently only used for the SAP APO liveCache ([Update Strategy for liveCache Database Instances \[Page 49\]](#)).



You can find the *Upgrade for SAP APO* documentation as follows:

<http://service.sap.com/instguides>, *Integration & Upgrade Guides* → *mySAP SCM*.

### Prerequisites

The general prerequisites for [Update of an Existing Database Instance \[Page 15\]](#) must be fulfilled.

The database instance must be in operation status ADMIN.

A complete [data backup \[Extern\]](#) of the database instance is created in operation mode ADMIN and the database is not restarted after this.

### Procedure

[Update of a Database Instance: SAP DB 7.4 \[Page 45\]](#)

## Process Flow

SDBUPD proceeds as follows:

1. The [X Server \[Extern\]](#) is started, if necessary.

2. General checks are performed:  
The status of the data and log areas, database parameter settings, operation status of other database instances, and so on.
3. The existing data backup is checked.
4. The database instance is placed in operation status OFFLINE.
5. The X Server is stopped.
6. The required SAP DB software is upgraded.
7. The X Server is started.
8. The database instance is placed in operation status ADMIN.
9. The data and log areas are formatted and the necessary database parameters are adjusted.

Import the existing complete data backup. Use the [Database Manager \[Extern\]](#) to do this.

Start SDBUPD. SDBUPD proceeds as follows:

1. The X Server is started.
2. The database instance is placed in operation status ADMIN.
3. The system tables are loaded.
4. The database instance is placed in operation status OFFLINE.



## APO Extract/Load Upgrade

[Update strategy \[Page 15\]](#) APO Extract/Load Upgrade for the database instance type [liveCache \[Extern\]](#). For this update strategy, application system transaction data must first be backed up. The liveCache software is then upgraded.

The APO Extract/Load Upgrade update strategy is currently only used for the SAP APO liveCache ([Update Strategy for liveCache Database Instances \[Page 49\]](#)).



You can find the *Upgrade for SAP APO* documentation as follows:

<http://service.sap.com/instguides>, *Integration & Upgrade Guides* → *mySAP SCM*.

### Prerequisites

The general prerequisites for [Update of an Existing Database Instance \[Page 15\]](#) must be fulfilled.

The database instance can be in any operation status.

The liveCache transaction data must be backed up to the APO database. For more information, see *Upgrade for SAP APO 3.1: SAP liveCache 7.4* → *Upgrade Preparations*.

### Procedure

[Update of a Database Instance: SAP DB 7.4 \[Page 45\]](#)

## Process Flow

SDBUPD proceeds as follows:

1. The [X Server \[Extern\]](#) is started, if necessary.
2. General checks are performed:  
The status of the data and log areas, database parameter settings, operation status of other database instances, and so on.

3. The database instance is placed in operation status OFFLINE.
4. The X Server is stopped.
5. The required SAP DB software is upgraded.
6. The X Server is started.
7. The database instance is placed in operation status ONLINE.
8. The system tables are loaded.
9. The database instance is placed in operation status OFFLINE.

## SDBUPD Options

To be able to carry out an [upgrade of an existing database instance \[Page 15\]](#) with [SDBUPD \[Page 9\]](#), you must enter options.

To display a list of these options, enter the following SDBUPD command:

**SDBUPD -h**

| Option                  | Explanation  |
|-------------------------|--|
| -h   -help              | List of options and description of options                 |
| -v   -version           | Version of the SDBUPD installation program                 |
| -l   -list              | Displays all <a href="#">software packages [Page 9]</a>    |
| -b   -batch             | Start of update program in the background                  |
| -d <database_name>      | Name of the <a href="#">database instance [Extern]</a>     |
| -u <userid>, <password> | Name and password of the <a href="#">DBM user [Extern]</a> |



## Installing the Database Server: SAP DB 7.4

You can carry out your installation/upgrade of the SAP DB database software (server and client) either interactively or in the background on the operating systems UNIX, Linux, Windows NT, and Windows 2000. The various procedures for this are outlined in the following table:

|                          | UNIX/Linux   | Windows NT/Windows 2000                                     |
|--------------------------|--|---|
| Interactive Installation | <a href="#">UNIX: Interactive Installation [Page 21]</a> | <a href="#">Windows: Interactive Installation [Page 23]</a> |
| Background Installation  | <a href="#">UNIX: Background Installation [Page 21]</a>  | <a href="#">Windows: Background Installation [Page 23]</a>  |
| Interactive Upgrade      | <a href="#">UNIX: Interactive Upgrade [Page 22]</a>      | <a href="#">Windows: Interactive Upgrade [Page 23]</a>      |
| Background Upgrade       | <a href="#">UNIX: Background Upgrade [Page 22]</a>       | <a href="#">Windows: Background Upgrade [Page 24]</a>       |



## Installation Steps

You can carry out your installation/upgrade of the SAP DB database software (server and client) with SDBINST either interactively or in the background on the operating systems UNIX, Linux, Windows NT, and Windows 2000. The various procedures for this are outlined in the following table:

|                          | UNIX/Linux   | Windows NT/Windows 2000                                     |
|--------------------------|--|---|
| Interactive Installation | <a href="#">UNIX: Interactive Installation [Page 21]</a> | <a href="#">Windows: Interactive Installation [Page 23]</a> |
| Background Installation  | <a href="#">UNIX: Background Installation [Page 21]</a>  | <a href="#">Windows: Background Installation [Page 23]</a>  |
| Interactive Upgrade      | <a href="#">UNIX: Interactive Upgrade [Page 22]</a>      | <a href="#">Windows: Interactive Upgrade [Page 23]</a>      |
| Background Upgrade       | <a href="#">UNIX: Background Upgrade [Page 22]</a>       | <a href="#">Windows: Background Upgrade [Page 24]</a>       |



## UNIX: Interactive Installation

Interactive installation of the database software (server and client) with SDBINST (UNIX/Linux)



On Linux operating systems, you can use the Red Hat Package Manager (RPM) to install the SAP DB software. If an RPM installation of the SAP DB software has been performed on Linux, you cannot additionally carry out an SDBINST installation or SDBINST upgrade on this host.

### Procedure

1. [UNIX: Unpacking the Installation Files \[Page 46\]](#)
2. [UNIX: Interactive Installation with SDBINST \[Page 26\]](#)
3. [UNIX: Additional Steps \[Page 45\]](#)

### Additional Information

[Logging \[Page 50\]](#)

[UNIX: Background Information \[Page 33\]](#)



## UNIX: Background Installation

Background installation of the database software (server and client) with SDBINST (UNIX/Linux)



On Linux operating systems, you can use the Red Hat Package Manager (RPM) to install the SAP DB software. If an RPM installation of the SAP DB software has been performed on Linux, you cannot additionally carry out an SDBINST installation or SDBINST upgrade on this host.

## Procedure

1. [UNIX: Unpacking the Installation Files \[Page 46\]](#)
2. [UNIX: Background Installation with SDBINST \[Page 30\]](#)
3. [UNIX: Additional Steps \[Page 45\]](#)

### Additional Information

[Logging \[Page 50\]](#)

[UNIX: Background Information \[Page 33\]](#)



## UNIX: Interactive Upgrade

Interactive upgrade of the database software (server and client) with SDBINST (UNIX/Linux)



On Linux operating systems, you can use the Red Hat Package Manager (RPM) to install the SAP DB software. If an RPM installation of the SAP DB software has been performed on Linux, you cannot additionally carry out an SDBINST installation or SDBINST upgrade on this host.

## Procedure

1. [UNIX: Unpacking the Installation Files \[Page 46\]](#)
2. [UNIX: Interactive Upgrade with SDBINST \[Page 28\]](#)
3. [UNIX: Additional Steps \[Page 45\]](#)

### Additional Information

[Logging \[Page 50\]](#)

[UNIX: Background Information \[Page 33\]](#)



## UNIX: Background Upgrade

Background upgrade of the database software (server and client) with SDBINST (UNIX/Linux)



On Linux operating systems, you can use the Red Hat Package Manager (RPM) to install the SAP DB software. If an RPM installation of the SAP DB software has been performed on Linux, you cannot additionally carry out an SDBINST installation or SDBINST upgrade on this host.

## Procedure

1. [UNIX: Unpacking the Installation Files \[Page 46\]](#)
2. [UNIX: Background Upgrade with SDBINST \[Page 31\]](#)
3. [UNIX: Additional Steps \[Page 45\]](#)

### Additional Information

[Logging \[Page 50\]](#)

[UNIX: Background Information \[Page 33\]](#)



## Windows: Interactive Installation

Interactive installation of the database software (server and client) with SDBINST (Windows NT/Windows 2000)

### Procedure

1. [Windows: Unpacking the Installation Files \[Page 46\]](#)
2. [Windows: Interactive Installation with SDBINST \[Page 27\]](#)
3. [Windows: Additional Steps \[Page 45\]](#)

### Additional Information

[Logging \[Page 50\]](#)

[Windows: Background Information \[Page 33\]](#)



## Windows: Background Installation

Background installation of the database software (server and client) with SDBINST (Windows NT/Windows 2000)

### Procedure

1. [Windows: Unpacking the Installation Files \[Page 46\]](#)
2. [Windows: Background Installation with SDBINST \[Page 30\]](#)
3. [Windows: Additional Steps \[Page 45\]](#)

### Additional Information

[Logging \[Page 50\]](#)

[Windows: Background Information \[Page 33\]](#)



## Windows: Interactive Upgrade

Interactive upgrade of the database software (server and client) with SDBINST (Windows NT/Windows 2000)

### Procedure

1. [Windows: Unpacking the Installation Files \[Page 46\]](#)
2. [Windows: Interactive Upgrade with SDBINST \[Page 29\]](#)
3. [Windows: Additional Steps \[Page 45\]](#)

### Additional Information

[Logging \[Page 50\]](#)

[Windows: Background Information \[Page 33\]](#)



## Windows: Background Upgrade

Background upgrade of the database software (server and client) with SDBINST (Windows NT/Windows 2000)

### Procedure

1. [Windows: Unpacking the Installation Files \[Page 46\]](#)
2. [Windows: Background Upgrade with SDBINST \[Page 32\]](#)
3. [Windows: Additional Steps \[Page 45\]](#)

### Additional Information

[Logging \[Page 50\]](#)

[Windows: Background Information \[Page 33\]](#)



## Unpacking the Installation Files

[UNIX: Unpacking the Installation Files \[Page 46\]](#)

[Windows: Unpacking the Installation Files \[Page 46\]](#)



## UNIX: Unpacking the Installation Files

Unpacking the Installation Files (UNIX/Linux)

### Conventions

[Variables \[Page 7\]](#), [Operating System Versions \[Page 8\]](#)

### Procedure

1. Log onto your computer.
2. Select the software package (<software\_package\_name>) appropriate for your operating system architecture and database instance type:  
Database instance type [SAP DB OLTP \[Extern\]](#):  
`sapdb-server-<os>-<32|64bit>-<arch>-<version>.tgz`  
Database instance type [liveCache \[Extern\]](#) (SAP APO):  
`sapdb-apo310_livecache-<os>-<32|64bit>-<arch>-<version>.tgz` or  
`sapdb-apo30a_livecache-<os>-<32|64bit>-<arch>-<version>.tgz`
3. Copy the software package to a local directory of your choice.
4. Unpack the software. Use the `gnu tar` or `tar` program to do so.  
Unpack using `gnu tar`:  
Enter the following command:  
`tar -xpvzf <software_package_name>`  
Unpack with `tar`:  
Enter the following command:  
`gzip -dc <software_package_name> | tar -xvpf -`

### Result

The following installation files are unpacked to the local directory:

|         |                                  |
|---------|----------------------------------|
| SDBINST | <a href="#">SDBINST [Page 9]</a> |
|---------|----------------------------------|



|             |  |
|-------------|--|
| SDBUPD      | <a href="#">SDBUPD [Page 9]</a>  |
| SDBRUN      | Program for installing the run-time environment. The program consists of a Perl interpreter and some Perl extensions. SDBRUN is not called directly. |
| SDBINST.TGZ | This package contains some Perl modules that are needed for the installation.  |

A number of [software packages \[Page 9\]](#) are also unpacked to the local directory.



## Windows: Unpacking the Installation Files

Unpacking the Installation Files (Windows NT/Windows 2000)

### Conventions

[Variables \[Page 7\]](#), [Operating System Versions \[Page 8\]](#)

### Procedure

1. Log onto your computer.
2. Select the software package that is appropriate for your operating system architecture and your database instance type:  
 Database instance type [SAP DB OLTP \[Extern\]](#):  
`sapdb-server-<os>-<32|64bit>-<arch>-<version>.tgz`  
 Database instance type [liveCache \[Extern\]](#) (SAP-System APO):  
`sapdb-apo310_livecache-<os>-<32|64bit>-<arch>-<version>.tgz` or  
`sapdb-apo30a_livecache-<os>-<32|64bit>-<arch>-<version>.tgz`
3. Use WinZip to unpack the software package to a local directory of your choice.

### Result

The following installation files are unpacked to the local directory:

|             |  |
|-------------|--|
| SDBINST.EXE | <a href="#">SDBINST [Page 9]</a>   |
| SDBUPD.EXE  | <a href="#">SDBUPD [Page 9]</a>  |
| SDBRUN.EXE  | Program for installing the run-time environment. The program consists of a Perl interpreter and some Perl extensions. SDBRUN is not called directly. |
| SDBINST.TGZ | This package contains some Perl modules that are needed for the installation.  |
| perl.dll    | Perl library   |

A number of [software packages \[Page 9\]](#) are also unpacked to the local directory.



## Interactive Installation with SDBINST

[UNIX: Interactive Installation with SDBINST \[Page 26\]](#)

[Windows: Interactive Installation with SDBINST \[Page 27\]](#)



## UNIX: Interactive Installation with SDBINST

[Interactive installation \[Page 13\]](#) of the database software (server and client) with [SDBINST \[Page 9\]](#) (UNIX/Linux)



On Linux operating systems, you can use the Red Hat Package Manager (RPM) to install the SAP DB software. If an RPM installation of the SAP DB software has been performed on Linux, you cannot additionally carry out an SDBINST installation or SDBINST upgrade on this host.

### Prerequisites

[UNIX: Unpack the Installation Files \[Page 46\]](#)

Stop all SAP DB database systems (including V Server).

### Conventions

[Variables \[Page 7\]](#)

## Procedure

Log onto your computer as the `root` user.

Start the installation process by entering:

```
./SDBINST
```

1. Choose the [installation profile \[Page 12\]](#) by entering the corresponding profile ID:
  - [Server \[Page 12\]](#) for database instance type [SAP DB OLTP \[Extern\]](#)
  - [APO LiveCache \[Page 12\]](#) for database instance type [liveCache \[Extern\]](#) (for SAP APO)
2. The [software package \[Page 9\]](#) [Base \[Page 10\]](#) is installed.  
 The independent paths for data and programs only have to be entered, relatively or absolutely, the first time the system is installed.  
 Default value for `<independent_data_path>`: `/var/opt/sapdb/indep_data`  
 Default value for `<independent_program_path>`: `/opt/sapdb/indep_prog`  
 Confirm the default values by choosing `enter`.
3. Specification of group for SAP DB database software  
 Default value for `<group>` when the system is installed for the first time: `sapdb`  
 Specification of owner for SAP DB database software  
 Default value for `<owner>` when the system is installed for the first time: `sapsys`  
 Confirm the default values by choosing `enter`.  
 Specification of group and owner applies for all software packages that are selected over the course of the subsequent installation steps. For the installation profile you selected, this means that the group and owner are the same for all the software packages contained in the profile.  
 For each subsequent installation, the default values for group and owner are the last values you selected for group and owner.
4. Install the [PCR<version> \[Page 11\]](#) software packages.  
 Install the [server utilities \[Page 11\]](#) software package.  
 Confirm each of your entries by choosing `y` .
5. Install the [Database Kernel \[Page 11\]](#) software package.  
 The software package files that are specific to the software version must be stored in a directory with a unique name.  
 Default value for `<dependent_path>`: `/opt/sapdb/depend`  
 If this path name for the software package (`<package_directory>`) already exists, you can decide whether you want to upgrade the existing software. Otherwise, you must

select another name.  
Confirm your entries by choosing **y** .

- For the installation profile *APO LiveCache* only: Install the software package [APO COM \[Page 11\]](#).  
Confirm your entries by choosing **y**

## Result

All the required data has been specified and is checked. The software packages are now installed and registered.

## Further activities

Check the result of your installation using the log ([Logging \[Page 50\]](#)).

[UNIX: Additional Steps \[Page 45\]](#)



## Windows: Interactive Installation with SDBINST

[Interactive installation \[Page 13\]](#) of the database software (server and client) with [SDBINST \[Page 9\]](#) (Windows NT/Windows 2000)

## Prerequisites

[Windows: Unpack the Installation Files \[Page 46\]](#)

Stop all SAP DB database systems (including V Server).

## Conventions

[Variables \[Page 7\]](#)

## Procedure

Log on to your computer as the *administrator*.

Start the installation by executing the **SDBINST.exe** program in the command prompt.

- Choose the [installation profile \[Page 12\]](#) by entering the corresponding profile ID:
  - [Server \[Page 12\]](#) for database instance type [SAP DB OLTP \[Extern\]](#)
  - [APO LiveCache \[Page 12\]](#) for database instance type [liveCache \[Extern\]](#) (for SAP APO)
- The [software package \[Page 9\]](#) [Base \[Page 10\]](#) is installed.  
The independent paths for data and programs only have to be entered, relatively or absolutely, the first time the system is installed.  
Default value for <independent\_data\_path> :  
**<program\_path>/sapdb/indep\_data**  
Default value for <independent\_program\_path> :  
**<program\_path>/sapdb/indep\_prog**  
Confirm the default values by choosing **enter**.
- Install the [PCR<version> \[Page 11\]](#) software packages.  
Install the software package [server utilities \[Page 11\]](#).  
Confirm each of your entries by choosing **y** .
- Install the [Database Kernel \[Page 11\]](#) software package.  
The software package files that are specific to the software version must be stored in a directory with a unique name.  
Default value for <dependent\_path> : **<program\_path>/sapdb/depend**  
If this path name for the software package (<package\_directory>) already exists, you can decide whether you want to upgrade the existing software. Otherwise, you must

select another name.  
Confirm your entries by choosing **y** .

- For the installation profile *APO LiveCache* only: Install the software package [APO COM \[Page 11\]](#).  
Confirm your entries by choosing **y** .

### Result

All the required data has been specified and is checked. The software packages are now installed and registered.

### Further activities

Check the result of your installation using the log ([Logging \[Page 50\]](#)).

[Windows: Additional Steps \[Page 45\]](#)



## Interactive Upgrade with SDBINST

[UNIX: Interactive Upgrade with SDBINST \[Page 28\]](#)

[Windows: Interactive Upgrade with SDBINST \[Page 29\]](#)



## UNIX: Interactive Upgrade with SDBINST

[Interactive upgrade \[Page 13\]](#) of the database software (server and client) with [SDBINST \[Page 9\]](#) (UNIX/Linux)



On Linux operating systems, you can use the Red Hat Package Manager (RPM) to install the SAP DB software. If an RPM installation of the SAP DB software has been performed on Linux, you cannot additionally carry out an SDBINST installation or SDBINST upgrade on this host.

### Prerequisites

[UNIX: Unpack the Installation Files \[Page 46\]](#)

Stop all SAP DB database systems (including V Server).

### Conventions

[Variables \[Page 7\]](#)

## Procedure

Log onto your computer as the `root` user.

Start the installation process by entering:

```
./SDBINST
```

- Choose the [installation profile \[Page 12\]](#) by entering the corresponding profile ID:
  - [Server \[Page 12\]](#) for database instance type [SAP DB OLTP \[Extern\]](#)
  - [APO LiveCache \[Page 12\]](#) for database instance type [liveCache \[Extern\]](#) (for SAP APO)
- All of the existing installations are listed. If there is more than one, choose which of the installations you want to upgrade.  
Enter the number of this installation.

3. Confirm the installation of the [software packages \[Page 9\]](#) by choosing **y**.

**Result**

All the required data has been specified and checked. The software packages are installed and registered.

**Further activities**

Check the result of your upgrade using the log ([Logging \[Page 50\]](#)).

[UNIX: Additional Steps \[Page 45\]](#)



## Windows: Interactive Upgrade with SDBINST

[Interactive upgrade \[Page 13\]](#) of the database software (server and client) with [SDBINST \[Page 9\]](#) (Windows NT/Windows 2000)

**Prerequisites**

[Windows: Unpack the Installation Files \[Page 46\]](#)

Stop all SAP DB database systems (including V Server).

**Conventions**

[Variables \[Page 7\]](#)

## Procedure

Log on to your computer as the *administrator*.

Start the upgrade by executing the **SDBINST.EXE** program in the command prompt.

4. Choose the [installation profile \[Page 12\]](#) by entering the corresponding profile ID:
  - [Server \[Page 12\]](#) for database instance type [SAP DB OLTP \[Extern\]](#)
  - [APO LiveCache \[Page 12\]](#) for database instance type [liveCache \[Extern\]](#) (for SAP APO)
5. All of the existing installations are listed. If there is more than one, choose which of the installations you want to upgrade.  
Enter the number of this installation.
6. Confirm the installation of the [software packages \[Page 9\]](#) by choosing **y**.

**Result**

All the required data has been specified and checked. The software packages are updated and registered.

**Further activities**

Check the result of your installation using the log ([Logging \[Page 50\]](#)).

[Windows: Additional Steps \[Page 45\]](#)



## Background Installation with SDBINST

[UNIX: Background Installation with SDBINST \[Page 30\]](#)

[Windows: Background Installation with SDBINST \[Page 30\]](#)



## UNIX: Background Installation with SDBINST

[Background installation \[Page 13\]](#) of the database software (server and client) with [SDBINST \[Page 9\]](#) (UNIX/Linux)



On Linux operating systems, you can use the Red Hat Package Manager (RPM) to install the SAP DB software. If an RPM installation of the SAP DB software has been performed on Linux, you cannot additionally carry out an SDBINST installation or SDBINST upgrade on this host.

### Prerequisites

[UNIX: Unpack the Installation Files \[Page 46\]](#)

Stop all SAP DB database systems (including V Server).

### Conventions

[Variables \[Page 7\]](#), [SDBINST options \[Page 14\]](#)

## Procedure

1. Log onto your computer as the `root` user.
2. Start the installation by running the SDBINST program with the following options:  

```
./SDBINST -b -profile <profile> -indep_data
<independent_data_path> -indep_prog <independent_program_path> -
depend <dependent_path> -o <owner> -g <group>
```

Specify the following [installation profile \[Page 12\]](#) (<profile>):  
- [Server \[Page 12\]](#) for the database instance type [SAP DB OLTP \[Extern\]](#)  
- [APO LiveCache \[Page 12\]](#) for the database instance type [liveCache \[Extern\]](#) (for SAP APO)

### Further activities

Check the result of your installation using the log ([Logging \[Page 50\]](#)).

[UNIX: Additional Steps \[Page 45\]](#)



## Windows: Background Installation with SDBINST

[Background installation \[Page 13\]](#) of the database software (server and client) with [SDBINST \[Page 9\]](#) (Windows NT/Windows 2000)

### Prerequisites

[Windows: Unpack the Installation Files \[Page 46\]](#)

Stop all SAP DB database systems (including V Server).

### Conventions

[Variables \[Page 7\]](#), [SDBINST options \[Page 14\]](#)

## Procedure

1. Log on to your computer as the *administrator*.
2. Start the installation by running the SDBINST program from the command prompt with the following options:  

```
SDBINST.EXE -b -profile <profile> -indep_data
<independent_data_path> -indep_prog <independent_program_path> -
```

`depend <dependent_path>`

Specify the following [installation profile \[Page 12\]](#) (<profile>):

- [Server \[Page 12\]](#) for the database instance type [SAP DB OLTP \[Extern\]](#)
- [APO LiveCache \[Page 12\]](#) for the database instance type [liveCache \[Extern\]](#) (for SAP APO)

### Further activities

Check the result of your installation using the log ([Logging \[Page 50\]](#)).

[Windows: Additional Steps \[Page 45\]](#)



## Background Upgrade with SDBINST

[UNIX: Background Upgrade with SDBINST \[Page 31\]](#)

[Windows: Background Upgrade with SDBINST \[Page 32\]](#)



## UNIX: Background Upgrade with SDBINST

[Background upgrade \[Page 13\]](#) of the database software (server and client) with [SDBINST \[Page 9\]](#) (UNIX/Linux)



On Linux operating systems, you can use the Red Hat Package Manager (RPM) to install the SAP DB software. If an RPM installation of the SAP DB software has been performed on Linux, you cannot additionally carry out an SDBINST installation or SDBINST upgrade on this host.

### Prerequisites

[UNIX: Unpack the Installation Files \[Page 46\]](#)

Stop all SAP DB database systems (including V Server).

### Conventions

[Variables \[Page 7\]](#), [SDBINST options \[Page 14\]](#)

## Procedure

1. Log onto your computer as the `root` user.
2. Start the installation by running the SDBINST program with the following options:
 

```
./SDBINST -b -profile <profile> -indep_data
<independent_data_path> -indep_prog <independent_program_path> -
depend <dependent_path> -o <owner> -g <group>
```

 Specify the following [installation profile \[Page 12\]](#) (<profile>):
  - [Server \[Page 12\]](#) for the database instance type [SAP DB OLTP \[Extern\]](#)
  - [APO LiveCache \[Page 12\]](#) for the database instance type [liveCache \[Extern\]](#) (for SAP APO)

The installation program itself decides whether it is dealing with a new installation or an upgrade.

### Further activities

Check the result of your upgrade using the log ([Logging \[Page 50\]](#)).

[UNIX: Additional Steps \[Page 45\]](#)



## Windows: Background Upgrade with SDBINST

[Background upgrade \[Page 13\]](#) of the database software (server and client) with [SDBINST \[Page 9\]](#) (Windows NT/Windows 2000)

### Prerequisites

[Windows: Unpack the Installation Files \[Page 46\]](#)

Stop all SAP DB database systems (including V Server).

### Conventions

[Variables \[Page 7\]](#), [SDBINST options \[Page 14\]](#)

## Procedure

1. Log on to your computer as the *administrator*.
2. Start the installation by running the SDBINST program from the command prompt with the following options:  

```
SDBINST.EXE -b -profile <profile> -indep_data
<independent_data_path> -indep_prog <independent_program_path> -
depend <dependent_path>
```

Specify the following [installation profile \[Page 12\]](#) (<profile>):
  - [Server \[Page 12\]](#) for the database instance type [SAP DB OLTP \[Extern\]](#)
  - [APO LiveCache \[Page 12\]](#) for the database instance type [liveCache \[Extern\]](#) (for SAP APO)

The installation program itself decides whether it is dealing with a new installation or an upgrade.

### Further activities

Check the result of your upgrade using the log ([Logging \[Page 50\]](#)).

[Windows: Additional Steps \[Page 45\]](#)



## Additional Steps

[UNIX: Additional Steps \[Page 45\]](#)

[Windows: Additional Steps \[Page 45\]](#)



## UNIX: Additional Steps

Once you have installed or upgraded your software successfully, you may have to perform some of the following steps to complete the installation/upgrade.

### Conventions

[Variables \[Page 7\]](#)

## Procedure

- The required `sql6` and `sql30` services are entered in the `/etc/services` file if they do not already exist. If these services are managed centrally on your network (NIS), they must be entered here.



- If the owner or group you have specified does not exist, you can create them locally. If the owner and group cannot be created, or if they are to be administered on the network, you will have to create them manually.
- Add the path `<independent_program_path>/bin` to the `PATH` environment variables. Enter the following commands:  

```
PATH=<independent_program_path>/bin:$PATH
export PATH
```



## Windows: Additional Steps

Stop and restart your Windows NT/Windows 2000 system, so that all changes take effect.



## Background Information

[UNIX: Background Information \[Page 33\]](#)

[Windows: Background Information \[Page 33\]](#)



## UNIX: Background Information

### Conventions

[Variables \[Page 7\]](#)

- The `<independent_data_path>` and `<independent_program_path>` path specifications are stored in the `/usr/spool/sql/ini/SAP_DBTech.ini` file when the system is installed for the first time. With every subsequent installation or upgrade process where you use `SDBINST`, these paths will be determined using the information contained in the `SAP_DBTech.ini` file.
- You can run more than one SAP DB Server installation on the same host.
- On Linux operating systems, you can use the Red Hat Package Manager (RPM) to install the SAP DB Server. If an RPM installation of the SAP DB Server software has been performed on Linux, you cannot additionally carry out an `SDBINST` installation or `SDBINST` upgrade on this host.
- The files required to deinstall, verify, and upgrade the installation are created in the `<independent_data_path>/config/install` directory when the software is installed. These files should never be modified.



## Windows: Background Information

### Conventions

[Variables \[Page 7\]](#)

- The `<independent_data_path>` and `<independent_program_path>` path specifications are stored in the registry when the system is installed for the first time. With every subsequent installation or upgrade process where you use `SDBINST`, these paths will be determined using the information contained in the registry.

- You can run more than one SAP DB Server installation on the same host.
- The files required to deinstall, verify, and upgrade the installation are created in the <independent\_data\_path>\config\install directory when the software is installed. These files should never be modified.



## Installation of Client Software: SAP DB 7.4

You can carry out your installation/upgrade of the SAP DB client software either interactively or in the background on the operating systems UNIX, Linux, Windows NT, and Windows 2000. The various procedures for this are outlined in the following table:

|                          | UNIX/Linux   | Windows NT/Windows 2000                                     |
|--------------------------|--|---|
| Interactive Installation | <a href="#">UNIX: Interactive Installation [Page 34]</a> | <a href="#">Windows: Interactive Installation [Page 36]</a> |
| Background Installation  | <a href="#">UNIX: Background Installation [Page 35]</a>  | <a href="#">Windows: Background Installation [Page 36]</a>  |
| Interactive Upgrade      | <a href="#">UNIX: Interactive Upgrade [Page 35]</a>      | <a href="#">Windows: Interactive Upgrade [Page 37]</a>      |
| Background Upgrade       | <a href="#">UNIX: Background Upgrade [Page 36]</a>       | <a href="#">Windows: Background Upgrade [Page 37]</a>       |



## Installation Steps

You can carry out your installation/upgrade of the SAP DB client software with SDBINST either interactively or in the background on the operating systems UNIX, Linux, Windows NT, and Windows 2000. The various procedures for this are outlined in the following table:

|                          | UNIX/Linux   | Windows NT/Windows 2000                                     |
|--------------------------|--|---|
| Interactive Installation | <a href="#">UNIX: Interactive Installation [Page 34]</a> | <a href="#">Windows: Interactive Installation [Page 36]</a> |
| Background Installation  | <a href="#">UNIX: Background Installation [Page 35]</a>  | <a href="#">Windows: Background Installation [Page 36]</a>  |
| Interactive Upgrade      | <a href="#">UNIX: Interactive Upgrade [Page 35]</a>      | <a href="#">Windows: Interactive Upgrade [Page 37]</a>      |
| Background Upgrade       | <a href="#">UNIX: Background Upgrade [Page 36]</a>       | <a href="#">Windows: Background Upgrade [Page 37]</a>       |



## UNIX: Interactive Installation

Interactive installation of the client software with SDBINST (UNIX/Linux)



On Linux operating systems, you can use the Red Hat Package Manager (RPM) to install the SAP DB software. If an RPM installation of the SAP DB software has been performed on Linux, you cannot additionally carry out an SDBINST installation or SDBINST upgrade on this host.

## Procedure

1. [UNIX: Unpacking the Installation Files \[Page 46\]](#)
2. [UNIX: Interactive Installation with SDBINST \[Page 39\]](#)
3. [UNIX: Additional Steps \[Page 45\]](#)

### Additional Information

[Logging \[Page 50\]](#)



## UNIX: Background Installation

Background installation of the client software with SDBINST (UNIX/Linux)



On Linux operating systems, you can use the Red Hat Package Manager (RPM) to install the SAP DB software. If an RPM installation of the SAP DB software has been performed on Linux, you cannot additionally carry out an SDBINST installation or SDBINST upgrade on this host.

## Procedure

1. [UNIX: Unpacking the Installation Files \[Page 46\]](#)
2. [UNIX: Background Installation with SDBINST \[Page 42\]](#)
3. [UNIX: Additional Steps \[Page 45\]](#)

### Additional Information

[Logging \[Page 50\]](#)



## UNIX: Interactive Upgrade

Interactive upgrade of the client software with SDBINST (UNIX/Linux)



On Linux operating systems, you can use the Red Hat Package Manager (RPM) to install the SAP DB software. If an RPM installation of the SAP DB software has been performed on Linux, you cannot additionally carry out an SDBINST installation or SDBINST upgrade on this host.

## Procedure

1. [UNIX: Unpacking the Installation Files \[Page 46\]](#)
2. [UNIX: Interactive Upgrade with SDBINST \[Page 41\]](#)

3. [UNIX: Additional Steps \[Page 45\]](#)

#### Additional Information

[Logging \[Page 50\]](#)



## UNIX: Background Upgrade

Background upgrade of the client software with SDBINST (UNIX/Linux)



On Linux operating systems, you can use the Red Hat Package Manager (RPM) to install the SAP DB software. If an RPM installation of the SAP DB software has been performed on Linux, you cannot additionally carry out an SDBINST installation or SDBINST upgrade on this host.

### Procedure

1. [UNIX: Unpacking the Installation Files \[Page 46\]](#)
2. [UNIX: Background Upgrade with SDBINST \[Page 43\]](#)
3. [UNIX: Additional Steps \[Page 45\]](#)

#### Additional Information

[Logging \[Page 50\]](#)



## Windows: Interactive Installation

Interactive installation of the client software with SDBINST (Windows NT/Windows 2000)

### Procedure

1. [Windows: Unpacking the Installation Files \[Page 46\]](#)
2. [Windows: Interactive Installation with SDBINST \[Page 40\]](#)
3. [Windows: Additional Steps \[Page 45\]](#)

#### Additional Information

[Logging \[Page 50\]](#)



## Windows: Background Installation

Background installation of the client software with SDBINST (Windows NT/Windows 2000)

### Procedure

1. [Windows: Unpacking the Installation Files \[Page 46\]](#)
2. [Windows: Background Installation with SDBINST \[Page 43\]](#)
3. [Windows: Additional Steps \[Page 45\]](#)

**Additional Information**

[Logging \[Page 50\]](#)



## Windows: Interactive Upgrade

Interactive upgrade of the client software with SDBINST (Windows NT/Windows 2000)

**Procedure**

1. [Windows: Unpacking the Installation Files \[Page 46\]](#)
2. [Windows: Interactive Upgrade with SDBINST \[Page 41\]](#)
3. [Windows: Additional Steps \[Page 45\]](#)

**Additional Information**

[Logging \[Page 50\]](#)



## Windows: Background Upgrade

Background upgrade of the client software with SDBINST (Windows NT/Windows 2000)

**Procedure**

1. [Windows: Unpacking the Installation Files \[Page 46\]](#)
2. [Windows: Background Upgrade with SDBINST \[Page 44\]](#)
3. [Windows: Additional Steps \[Page 45\]](#)

**Additional Information**

[Logging \[Page 50\]](#)



## Unpacking the Installation Files

[UNIX: Unpacking the Installation Files \[Page 46\]](#)

[Windows: Unpacking the Installation Files \[Page 46\]](#)



## UNIX: Unpacking the Installation Files

Unpacking the Installation Files (UNIX/Linux)

**Conventions**

[Variables \[Page 7\]](#), [Operating System Versions \[Page 8\]](#)

**Procedure**

5. Log onto your computer.
6. Select the software package (<software\_package\_name>) appropriate for your operating system architecture and database instance type:

Database instance type [SAP DB OLTP \[Extern\]](#):

`sapdb-server-<os>-<32|64bit>-<arch>-<version>.tgz`

Database instance type [liveCache \[Extern\]](#) (SAP APO):

`sapdb-apo310_livecache-<os>-<32|64bit>-<arch>-<version>.tgz` OR

`sapdb-apo30a_livecache-<os>-<32|64bit>-<arch>-<version>.tgz`

7. Copy the software package to a local directory of your choice.
8. Unpack the software. Use the `gnu tar` or `tar` program to do so.  
Unpack using `gnu tar`:  
Enter the following command:  
`tar -xpvzf <software_package_name>`  
Unpack with `tar`:  
Enter the following command:  
`gzip -dc <software_package_name> | tar -xvpf -`

### Result

The following installation files are unpacked to the local directory:

|             |  |
|-------------|--|
| SDBINST     | <a href="#">SDBINST [Page 9]</a>   |
| SDBUPD      | <a href="#">SDBUPD [Page 9]</a>  |
| SDBRUN      | Program for installing the run-time environment. The program consists of a Perl interpreter and some Perl extensions. SDBRUN is not called directly. |
| SDBINST.TGZ | This package contains some Perl modules that are needed for the installation.  |

A number of [software packages \[Page 9\]](#) are also unpacked to the local directory.



## Windows: Unpacking the Installation Files

Unpacking the Installation Files (Windows NT/Windows 2000)

### Conventions

[Variables \[Page 7\]](#), [Operating System Versions \[Page 8\]](#)

### Procedure

4. Log onto your computer.
5. Select the software package that is appropriate for your operating system architecture and your database instance type:  
Database instance type [SAP DB OLTP \[Extern\]](#):  
`sapdb-server-<os>-<32|64bit>-<arch>-<version>.tgz`  
Database instance type [liveCache \[Extern\]](#) (SAP-System APO):  
`sapdb-apo310_livecache-<os>-<32|64bit>-<arch>-<version>.tgz` OR  
`sapdb-apo30a_livecache-<os>-<32|64bit>-<arch>-<version>.tgz`
6. Use WinZip to unpack the software package to a local directory of your choice.

### Result

The following installation files are unpacked to the local directory:

|             |                                  |
|-------------|----------------------------------|
| SDBINST.EXE | <a href="#">SDBINST [Page 9]</a> |
|-------------|----------------------------------|

|             |  |
|-------------|--|
| SDBUPD.EXE  | <a href="#">SDBUPD [Page 9]</a>  |
| SDBRUN.EXE  | Program for installing the run-time environment. The program consists of a Perl interpreter and some Perl extensions. SDBRUN is not called directly. |
| SDBINST.TGZ | This package contains some Perl modules that are needed for the installation.  |
| perl.dll    | Perl library   |

A number of [software packages \[Page 9\]](#) are also unpacked to the local directory.



## Interactive Installation with SDBINST

[UNIX: Interactive Installation with SDBINST \[Page 39\]](#)

[Windows: Interactive Installation with SDBINST \[Page 40\]](#)



## UNIX: Interactive Installation with SDBINST

[Interactive Installation \[Page 13\]](#) of the client software with [SDBINST \[Page 9\]](#) (UNIX/Linux)



On Linux operating systems, you can use the Red Hat Package Manager (RPM) to install the SAP DB software. If an RPM installation of the SAP DB software has been performed on Linux, you cannot additionally carry out an SDBINST installation or SDBINST upgrade on this host.

### Prerequisites

[UNIX: Unpacking the Installation Files \[Page 46\]](#)

### Conventions

[Variables \[Page 7\]](#)

## Procedure

Log onto your computer as the `root` user.

Start the installation process by entering:

```
./SDBINST
```

1. Choose [installation profile \[Page 12\]](#) [Runtime for SAP AS \[Page 13\]](#) by entering the appropriate profile ID.
2. Install the [software package \[Page 9\]](#) [Base \[Page 10\]](#).  
Confirm your entries by choosing `y`.
3. Specification of group for SAP DB database software  
Default value for `<group>` when the system is installed for the first time: `sapdb`  
Specification of owner for SAP DB database software  
Default value for `<owner>` when the system is installed for the first time: `sapsys`  
Confirm the default values by choosing `enter`.  
Specification of group and owner applies for all software packages that are selected over the course of the subsequent installation steps. For the installation profile you selected, this means that the group and owner are the same for all the software packages contained in the profile.

For each subsequent installation, the default values for group and owner are the last values you selected for group and owner.

4. Install the [PCR<version> \[Page 11\]](#) software packages.
5. Confirm your entries by choosing **y** .

### Result

All the required data has been specified and is checked. The software packages are now installed and registered.

### Further activities

Check the result of your installation using the log ([Logging \[Page 50\]](#)).

[UNIX: Additional Steps \[Page 45\]](#)



## Windows: Interactive Installation with SDBINST

[Interactive installation \[Page 13\]](#) of the client software with [SDBINST \[Page 9\]](#) (Windows NT/Windows 2000)

### Prerequisites

[Windows: Unpack the Installation Files \[Page 46\]](#)

Stop all SAP DB database systems (including V Server).

### Conventions

[Variables \[Page 7\]](#)

## Procedure

Log on to your computer as the *administrator*.

Start the installation by executing the `SDBINST.exe` program in the command prompt.

1. Choose [installation profile \[Page 12\]](#) [Runtime for SAP AS \[Page 13\]](#) by entering the appropriate profile ID.
2. Install the [software package \[Page 9\]](#) [Base \[Page 10\]](#).
3. Install the [PCR<version> \[Page 11\]](#) software packages.
4. Confirm your entries by choosing **y** .

### Result

All the required data has been specified and is checked. The software packages are now installed and registered.

### Further activities

Check the result of your installation using the log ([Logging \[Page 50\]](#)).

[Windows: Additional Steps \[Page 45\]](#)



## Interactive Upgrade with SDBINST

[UNIX: Interactive Upgrade with SDBINST \[Page 41\]](#)

[Windows: Interactive Upgrade with SDBINST \[Page 41\]](#)





## UNIX: Interactive Upgrade with SDBINST

[Interactive upgrade \[Page 13\]](#) of the client software with [SDBINST \[Page 9\]](#) (UNIX/Linux)



On Linux operating systems, you can use the Red Hat Package Manager (RPM) to install the SAP DB software. If an RPM installation of the SAP DB software has been performed on Linux, you cannot additionally carry out an SDBINST installation or SDBINST upgrade on this host.

### Prerequisites

[UNIX: Unpacking the Installation Files \[Page 46\]](#)

### Conventions

[Variables \[Page 7\]](#)

## Procedure

Log onto your computer as the `root` user.

Start the installation process by entering:

```
./SDBINST
```

1. Choose [installation profile \[Page 12\]](#) [Runtime for SAP AS \[Page 13\]](#) by entering the appropriate profile ID.
2. All of the existing installations are listed. If there is more than one, choose which of the installations you want to upgrade.  
Enter the number of this installation.
3. Confirm the installation of the [software packages \[Page 9\]](#) by choosing `y`.

### Result

All the required data has been specified and checked. The software packages are installed and registered.

### Further activities

Check the result of your upgrade using the log ([Logging \[Page 50\]](#)).

[UNIX: Additional Steps \[Page 45\]](#)



## Windows: Interactive Upgrade with SDBINST

[Interactive upgrade \[Page 13\]](#) of the client software with [SDBINST \[Page 9\]](#) (Windows NT/Windows 2000)

### Prerequisites

[Windows: Unpack the Installation Files \[Page 46\]](#)

Stop all SAP DB database systems (including V Server).

### Conventions

[Variables \[Page 7\]](#)

## Procedure

Log on to your computer as the *administrator*.

Start the installation by executing the `SDBINST.exe` program in the command prompt.

1. Choose the [installation package \[Page 12\]](#) [Runtime for SAP AS \[Page 13\]](#) by entering the appropriate profile ID.
2. All of the existing installations are listed. If there is more than one, choose which of the installations you want to upgrade.  
Enter the number of this installation.
3. Confirm the installation of the [software packages \[Page 9\]](#) by choosing `y`.

### Result

All the required data has been specified and checked. The software packages are installed and registered.

### Further activities

Check the result of your upgrade using the log ([Logging \[Page 50\]](#)).

[Windows: Additional Steps \[Page 45\]](#)



## Background Installation with SDBINST

[UNIX: Background Installation with SDBINST \[Page 42\]](#)

[Windows: Background Installation with SDBINST \[Page 43\]](#)



## UNIX: Background Installation with SDBINST

[Background installation \[Page 13\]](#) of the client software with [SDBINST \[Page 9\]](#) (UNIX/Linux)



On Linux operating systems, you can use the Red Hat Package Manager (RPM) to install the SAP DB software. If an RPM installation of the SAP DB software has been performed on Linux, you cannot additionally carry out an SDBINST installation or SDBINST upgrade on this host.

### Prerequisites

[UNIX: Unpacking the Installation Files \[Page 46\]](#)

### Conventions

[Variables \[Page 7\]](#)

## Procedure

1. Log onto your computer as the `root` user.
2. Start the installation by running the SDBINST program with the following options:  

```
./SDBINST -b -profile <profile> -indep_data
<independent_data_path> -indep_prog <independent_program_path> -
depend <dependent_path> -o <owner> -g <group>
```

Specify the [installation profile \[Page 12\]](#) (<profile>) "[Runtime For SAP AS \[Page 13\]](#)".  
The quotation marks are required.

**Further activities**

Check the result of your installation using the log ([Logging \[Page 50\]](#)).

[UNIX: Additional Steps \[Page 45\]](#)

**Windows: Background Installation with SDBINST**

[Background installation \[Page 13\]](#) of the client software with [SDBINST \[Page 9\]](#) (Windows NT/Windows 2000)

**Prerequisites**

[Windows: Unpack the Installation Files \[Page 46\]](#)

Stop all SAP DB database systems (including V Server).

**Conventions**

[Variables \[Page 7\]](#), [SDBINST options \[Page 14\]](#)

**Procedure**

1. Log on to your computer as the *administrator*.
2. Start the installation by running the SDBINST program from the command prompt with the following options:  

```
SDBINST.EXE -b -profile <profile> -indep_data
<independent_data_path> -indep_prog <independent_program_path> -
depend <dependent_path>
```

Specify the [installation profile \[Page 12\]](#) (<profile>) "[Runtime for SAP AS \[Page 13\]](#)". The quotation marks are required.

**Further activities**

Check the result of your installation using the log ([Logging \[Page 50\]](#)).

[Windows: Additional Steps \[Page 45\]](#)

**Background Upgrade with SDBINST**

[UNIX: Background Upgrade with SDBINST \[Page 43\]](#)

[Windows: Background Upgrade with SDBINST \[Page 44\]](#)

**UNIX: Background Upgrade with SDBINST**

[Background upgrade \[Page 13\]](#) of the client software with [SDBINST \[Page 9\]](#) (UNIX/Linux)



On Linux operating systems, you can use the Red Hat Package Manager (RPM) to install the SAP DB software. If an RPM installation of the SAP DB software has been performed on Linux, you cannot additionally carry out an SDBINST installation or SDBINST upgrade on this host.

**Prerequisites**

[UNIX: Unpacking the Installation Files \[Page 46\]](#)

## Conventions

[Variables \[Page 7\]](#), [SDBINST options \[Page 14\]](#)

## Procedure

1. Log onto your computer as the `root` user.
2. Start the installation by running the SDBINST program with the following options:  

```
./SDBINST -b -profile <profile> -indep_data  
<independent_data_path> -indep_prog <independent_program_path> -  
depend <dependent_path> -o <owner> -g <group>
```

Specify the [installation profile \[Page 12\]](#) (<profile>) "[Runtime For SAP AS \[Page 13\]](#)". The quotation marks are required.

The installation program itself decides whether it is dealing with a new installation or an upgrade.

## Further activities

Check the result of your upgrade using the log ([Logging \[Page 50\]](#)).

[UNIX: Additional Steps \[Page 45\]](#)



## Windows: Background Upgrade with SDBINST

[Background upgrade \[Page 13\]](#) of the client software with [SDBINST \[Page 9\]](#) (Windows NT/Windows 2000)

## Prerequisites

[Windows: Unpack the Installation Files \[Page 46\]](#)

Stop all SAP DB database systems (including V Server).

## Conventions

[Variables \[Page 7\]](#), [SDBINST options \[Page 14\]](#)

## Procedure

1. Log on to your computer as the *administrator*.
2. Start the installation by running the SDBINST program from the command prompt with the following options:  

```
SDBINST.EXE -b -profile <profile> -indep_data  
<independent_data_path> -indep_prog <independent_program_path> -  
depend <dependent_path>
```

Specify the [installation profile \[Page 12\]](#) (<profile>) "[Runtime for SAP AS \[Page 13\]](#)". The quotation marks are required.

The installation program itself decides whether it is dealing with a new installation or an upgrade.

## Further activities

Check the result of your upgrade using the log ([Logging \[Page 50\]](#)).

[Windows: Additional Steps \[Page 45\]](#)



## Additional Steps

[UNIX: Additional Steps \[Page 45\]](#)

[Windows: Additional Steps \[Page 45\]](#)



## UNIX: Additional Steps

Once you have installed or upgraded your software successfully, you may have to perform some of the following steps to complete the installation/upgrade.

### Conventions

[Variables \[Page 7\]](#)

### Procedure

- The required `sql16` and `sql30` services are entered in the `/etc/services` file if they do not already exist. If these services are managed centrally on your network (NIS), they must be entered here.
- If the owner or group you have specified does not exist, you can create them locally. If the owner and group cannot be created, or if they are to be administered on the network, you will have to create them manually.
- Add the path `<independent_program_path>/bin` to the `PATH` environment variables. Enter the following commands:  

```
PATH=<independent_program_path>/bin:$PATH
export PATH
```



## Windows: Additional Steps

Stop and restart your Windows NT/Windows 2000 system, so that all changes take effect.



## Update of a Database Instance: SAP DB 7.4

The [Update of an Existing Database Instance \[Page 15\]](#) with [SDBUPD \[Page 9\]](#) can be performed interactively or in the background for the Windows NT/Windows 2000 and UNIX/Linux operating systems.

The [update strategy \[Page 15\]](#) that is followed, depends on the database instance type ([SAP DB OLTP \[Extern\]](#) or [liveCache \[Extern\]](#) for SAP APO) and the version of the SAP DB software before and after the update. The prerequisites for the individual update strategies must also be fulfilled.

### Procedure

1. [Unpacking the Installation Files \[Page 45\]](#)
2. [Starting SDBUPD \[Page 47\]](#)
3. [Selection of Update Strategy \[Page 48\]](#)

### Additional Information

[Logging \[Page 50\]](#)



## Unpacking the Installation Files

[UNIX: Unpacking the Installation Files \[Page 46\]](#)

[Windows: Unpacking the Installation Files \[Page 46\]](#)



## UNIX: Unpacking the Installation Files

Unpacking the Installation Files (UNIX/Linux)

### Conventions

[Variables \[Page 7\]](#), [Operating System Versions \[Page 8\]](#)

### Procedure

9. Log onto your computer.
10. Select the software package (<software\_package\_name>) appropriate for your operating system architecture and database instance type:  
 Database instance type [SAP DB OLTP \[Extern\]](#):  
`sapdb-server-<os>-<32|64bit>-<arch>-<version>.tgz`  
 Database instance type [liveCache \[Extern\]](#) (SAP APO):  
`sapdb-apo310_livecache-<os>-<32|64bit>-<arch>-<version>.tgz` OR  
`sapdb-apo30a_livecache-<os>-<32|64bit>-<arch>-<version>.tgz`
11. Copy the software package to a local directory of your choice.
12. Unpack the software. Use the `gnu tar` or `tar` program to do so.  
 Unpack using `gnu tar`:  
 Enter the following command:  
`tar -xpvzf <software_package_name>`  
 Unpack with `tar`:  
 Enter the following command:  
`gzip -dc <software_package_name> | tar -xvpf -`

### Result

The following installation files are unpacked to the local directory:

|             |  |
|-------------|--|
| SDBINST     | <a href="#">SDBINST [Page 9]</a>   |
| SDBUPD      | <a href="#">SDBUPD [Page 9]</a>  |
| SDBRUN      | Program for installing the run-time environment. The program consists of a Perl interpreter and some Perl extensions. SDBRUN is not called directly. |
| SDBINST.TGZ | This package contains some Perl modules that are needed for the installation.  |

A number of [software packages \[Page 9\]](#) are also unpacked to the local directory.



## Windows: Unpacking the Installation Files

Unpacking the Installation Files (Windows NT/Windows 2000)

### Conventions

[Variables \[Page 7\]](#), [Operating System Versions \[Page 8\]](#)

### Procedure

7. Log onto your computer.
8. Select the software package that is appropriate for your operating system architecture and your database instance type:  
 Database instance type [SAP DB OLTP \[Extern\]](#):  
`sapdb-server-<os>-<32|64bit>-<arch>-<version>.tgz`  
 Database instance type [liveCache \[Extern\]](#) (SAP-System APO):  
`sapdb-apo310_livecache-<os>-<32|64bit>-<arch>-<version>.tgz` OR  
`sapdb-apo30a_livecache-<os>-<32|64bit>-<arch>-<version>.tgz`
9. Use WinZip to unpack the software package to a local directory of your choice.

### Result

The following installation files are unpacked to the local directory:

|             |  |
|-------------|--|
| SDBINST.EXE | <a href="#">SDBINST [Page 9]</a>   |
| SDBUPD.EXE  | <a href="#">SDBUPD [Page 9]</a>  |
| SDBRUN.EXE  | Program for installing the run-time environment. The program consists of a Perl interpreter and some Perl extensions. SDBRUN is not called directly. |
| SDBINST.TGZ | This package contains some Perl modules that are needed for the installation.  |
| perl.dll    | Perl library   |

A number of [software packages \[Page 9\]](#) are also unpacked to the local directory.



## Starting SDBUPD

To perform an [update of a database instance \[Page 45\]](#), you must start the installation file [SDBUPD \[Page 9\]](#).

### Prerequisites

You have unpacked the required installation files ([UNIX: Unpacking the Installation Files \[Page 46\]](#) bzw. [Windows: Unpacking the Installation Files \[Page 46\]](#)).

The prerequisites listed in [Update of an Existing Database Instance \[Page 15\]](#) have been fulfilled.

### Procedure

You can start SDBUPD interactively or in the background.

- [Interactive Update of a Database Instance \[Page 47\]](#)
- [Update of a Database Instance in the Background \[Page 48\]](#)

### Result

[Selection of Update Strategy \[Page 48\]](#)



## Interactive Update of a Database Instance

An option for [starting SDBUPD \[Page 47\]](#) to perform an [update of an existing database instance \[Page 15\]](#), is the interactive procedure.

### Procedure

|    | UNIX/Linux   | Windows NT/Windows 2000  |
|----|--|--|
| 1. | Log onto your computer as the <code>root</code> user.                          | Log on to your computer as the <i>administrator</i> .  |
| 2. | Start the installation process by entering:<br><code>./SDBUPD</code>           | Start the installation by executing the <code>SDBUPD.exe</code> program in the command prompt. |
| 3. | Specify which database instance you want to start using the <i>instance ID</i> | Specify which database instance you want to start using the <i>instance ID</i>                 |
| 4. | Specify the name of the <a href="#">DBM user [Extern]</a> .                    | Specify the name of the DBM user.  |



## Update of a Database Instance in the Background

An option for [starting SDBUPD \[Page 47\]](#) to perform an [update of an existing database instance \[Page 15\]](#), is to start it in the background.

### Conventions

[Variables \[Page 7\]](#), [SDBUPD options \[Page 20\]](#)

### Procedure

|    | UNIX/Linux  | Windows NT/Windows 2000  |
|----|---|--|
| 1. | Log onto your computer as the <code>root</code> user.   | Log on to your computer as the <i>administrator</i> .  |
| 2. | Start the installation by entering:<br><code>./SDBUPD -b -d &lt;database_name&gt;</code><br><code>-u &lt;userid&gt;,&lt;password&gt;</code> | Start the installation by running the SDBUPD program from the command prompt with the following options:<br><code>SDBUPD.exe -b -d &lt;database_name&gt; -u &lt;userid&gt;,&lt;password&gt;</code> |



## Selection of Upgrade Strategy

If you perform an [update of a database instance \[Page 45\]](#), the [update strategy \[Page 15\]](#) is determined by [SDBUPD \[Page 9\]](#).

### Prerequisites

[Starting SDBUPD \[Page 47\]](#)



## Process Flow

1. SDBUPD determines the database instance type.  
Currently, it is only possible to perform an update with SDBUPD for the database instance types [SAP DB OLTP \[Extern\]](#) and [liveCache \[Extern\]](#) (for SAP APO).
2. SDBUPD determines the SAP DB software versions (and, if appropriate, the APO release) of the existing database instance and the software package to be installed.

### Result

With these specifications, SDBUPD can decide, whether an update of the database instance is possible, and which update strategy is to be used.

Overviews of which update strategy is used in which circumstances:

- [Update Strategy for SAP DB OLTP Database Instance \[Page 49\]](#)
- [Update Strategy for liveCache Database Instance \[Page 49\]](#)



## Update Strategy for SAP DB OLTP Database Instance

For the [selection of the update strategy \[Page 48\]](#), [SDBUPD \[Page 9\]](#) determines the SAP DB software version of the existing database instance (start version), and the SAP DB software version of the software package to be installed (target version).

### Prerequisites

You are updating a [SAP DB OLTP \[Extern\]](#) database instance.

## SAP DB Software Versions

The following table shows which update strategy is selected for which start and target versions of the SAP DB software.

|                      | Target Version 7.4.02             |
|----------------------|-----------------------------------|
| Start Version 7.2.04 | <a href="#">INPLACE [Page 16]</a> |
| Start Version 7.2.05 | <a href="#">INPLACE [Page 16]</a> |
| Start Version 7.3.00 | <a href="#">INPLACE [Page 16]</a> |
| Start Version 7.4.02 | <a href="#">PATCH [Page 17]</a>   |



## Update Strategy for liveCache Database Instances

For the [selection of the update strategy \[Page 48\]](#), [SDBUPD \[Page 9\]](#) determines the SAP DB software version of the existing database instance and of the SAP APO release (start version), and the SAP DB software version of the software package and SAP APO release to be installed (target version).

### Prerequisites

You are updating a [liveCache \[Extern\]](#) database instance for SAP APO.

## SAP DB Software Versions

The following table shows which update strategy is selected for which start and target versions.

|                          | Target Version 7.4.02/30A                        | Target Version 7.4.02/310                          |
|--------------------------|--|--|
| Start Version 7.2.05/30A | <a href="#">Backup/Restore Upgrade [Page 18]</a> | <a href="#">APO Extract/Load Upgrade [Page 19]</a> |
| Start Version 7.4.02/30A | <a href="#">Inplace Upgrade [Page 17]</a>        | <a href="#">APO Extract/Load Upgrade [Page 19]</a> |
| Start Version 7.4.02/310 | not possible                                     | <a href="#">Inplace Upgrade [Page 17]</a>          |



## Logging

All steps of an installation or upgrade with [SDBINST \[Page 9\]](#) or an update with [SDBUPD \[Page 9\]](#) are stored in the log file `SAPDBSoftware_install-<date>-<time>.log`:

### Conventions

[Variables \[Page 7\]](#)

### Log File

- UNIX/Linux: `<independent_data_path>/wrk/SAPDBSoftware_install-<date>-<time>.log`
- Windows NT/Windows 2000:  
`<independent_data_path>\wrk\SAPDBSoftware_install-<date>-<time>.log`

If the `<independent_data_path>` directory is not known when the system crashes, the log will be created in the current directory.



## Uninstalling the SAP DB Software

You can uninstall the SAP DB software using the SDBUNINST program with the specification of the appropriate [SDBUNINST options \[Page 51\]](#).

### Prerequisites

Stop all SAP DB database systems (including VServer).

### Conventions

[Variables \[Page 7\]](#)

## Procedure

|    | UNIX/Linux   | Windows NT/Windows 2000   |
|----|--|---|
| 1. | Log onto your computer as the <code>root</code> user.  | Log on to your computer as the <i>administrator</i> .   |
| 2. | Start the uninstallation by entering:<br><code>sdbuninst -all</code> or<br><code>sdbuninst -package &lt;package&gt; [-package_dir &lt;package_directory&gt;] [-autoresolve]</code> | Start the uninstallation by running the SDBUNINST program from the command prompt with the following options:<br><code>sdbuninst.exe -all</code> or<br><code>sdbuninst -package &lt;package&gt; [-</code> |

|  |  |
|--|--|
|  | <code>package_dir &lt;package_directory&gt;] [-autoresolve]</code> |
|--|--|

## Result

- If you specified `-all`, all existing [software packages \[Page 9\]](#) are uninstalled.
- If you specify `-package <package> [-package_dir <package_directory>] [-autoresolve]`, the specified software packages are uninstalled.  
The dependencies between the software packages are always considered. If you want to uninstall a software package that is still required by another software package, the uninstall terminates with the following message: `cannot delete package \"<package>\" (<package_directory>) - other package (s) are dependent`  
To avoid this error, you can specify the option `-autoresolve`. This means that the software packages that are dependent on the specified software package are also uninstalled.  
If there are multiple identical software packages, specify the option `-package_dir` to specify the desired software package uniquely. You can determine the directory of a software package (`<package_directory>`) using the option `-l|-list`.  
If a software package is not uniquely specified, a list of the software packages with the same name is displayed. Then enter the desired package ID.
- If you do not specify any of the options listed above, the uninstall is terminated with the following error: `no package selected`



## SDBUNINST Options

To be able to carry out an [uninstallation of the SAP DB software \[Page 50\]](#) with SDBUNINST, you must enter options.

To display a list of these options, enter the following SDBUNINST command:

```
SDBUNINST -h
```

### Conventions

[Variables \[Page 7\]](#)

| Option  | Explanation   |
|---|---|
| <code>-h   -help</code>                             | List and description of options   |
| <code>-v   -version</code>                          | Version of the uninstallation program SDBUNINST   |
| <code>-l   -list</code>                             | Display all <a href="#">software packages [Page 9]</a> and their directories <code>&lt;package_directory&gt;</code>   |
| <code>-all</code>                                   | All software packages registered for SAP DB are uninstalled.  |
| <code>-package &lt;package&gt;</code>               | Specifies the software packages that is to be uninstalled. Use the logical names of the software packages, <b>not</b> the file names<br>You can make additional specifications about the software package with the options <code>-package_dir</code> and/or <code>-autoresolve</code> |
| <code>-package_dir &lt;package_directory&gt;</code> | Directory of the software package specified with <code>-package</code> This specification is only required if there are multiple software packages with the same name.  |

|                           |  |
|---------------------------|--|
| <code>-autoresolve</code> | <p>If you specify this option, the package that you specify with <code>-package</code> is uninstalled, along with all of the software packages dependent on this software package.</p> <p>Example: Specifying the options <code>-package Base -autoresolve</code> has the effect that all software packages registered for SAP DB are uninstalled.</p> |
|---------------------------|--|