SIEBEL® eBusiness 7

SIEBEL ANYWHERE ADMINISTRATION GUIDE

VERSION 7.5.3

SEPTEMBER 2003

12-FAUN8J

Siebel Systems, Inc., 2207 Bridgepointe Parkway, San Mateo, CA 94404
Copyright © 2003 Siebel Systems, Inc.
All rights reserved.
Printed in the United States of America

No part of this publication may be stored in a retrieval system, transmitted, or reproduced in any way, including but not limited to photocopy, photographic, magnetic, or other record, without the prior agreement and written permission of Siebel Systems, Inc.

Siebel, the Siebel logo, TrickleSync, TSQ, Universal Agent, and other Siebel product names referenced herein are trademarks of Siebel Systems, Inc., and may be registered in certain jurisdictions.

Other product names, designations, logos, and symbols may be trademarks or registered trademarks of their respective owners.

U.S. GOVERNMENT RESTRICTED RIGHTS. Programs, Ancillary Programs and Documentation, delivered subject to the Department of Defense Federal Acquisition Regulation Supplement, are “commercial computer software” as set forth in DFARS 227.7202, Commercial Computer Software and Commercial Computer Software Documentation, and as such, any use, duplication and disclosure of the Programs, Ancillary Programs and Documentation shall be subject to the restrictions contained in the applicable Siebel license agreement. All other use, duplication and disclosure of the Programs, Ancillary Programs and Documentation by the U.S. Government shall be subject to the applicable Siebel license agreement and the restrictions contained in subsection (c) of FAR 52.227-19, Commercial Computer Software - Restricted Rights (June 1987), or FAR 52.227-14, Rights in Data—General, including Alternate III (June 1987), as applicable. Contractor/licensor is Siebel Systems, Inc., 2207 Bridgepointe Parkway, San Mateo, CA 94404.

Proprietary Information
Siebel Systems, Inc. considers information included in this documentation and in Siebel eBusiness Applications Online Help to be Confidential Information. Your access to and use of this Confidential Information are subject to the terms and conditions of: (1) the applicable Siebel Systems software license agreement, which has been executed and with which you agree to comply; and (2) the proprietary and restricted rights notices included in this documentation.

Contents

Introduction

Chapter 1. Siebel Anywhere Concepts

Chapter 2. Upgrade Planning and Preliminary Tasks

Chapter 3. Defining Upgrade Kits

Chapter 4. Activating, Applying, and Distributing Upgrade Kits

Chapter 5. Retrieving, Installing, and Testing Upgrade Kits

Chapter 6. Supplementary Information for Specific Upgrade Types

Appendix A. Troubleshooting for Siebel Anywhere

Index

Introduction

The Siebel Anywhere product lets Siebel Systems Administrators distribute many kinds of software upgrades to Siebel client machines and Siebel Regional Node Servers. This guide provides information about creating and distributing Siebel Anywhere upgrade kits and about how these kits are used by Siebel clients and servers.

Although job titles and duties at your company may differ from those listed in the following table, the audience for this guide consists primarily of employees in these categories:

Database Administrators	Persons who administer the database system, including data loading, system monitoring, backup and recovery, space allocation and sizing, and user account management.
Siebel Application Administrators	Persons responsible for planning, setting up, and maintaining Siebel applications.
Siebel System Administrators	Persons responsible for the whole system, including installing, maintaining, and upgrading Siebel applications.

This guide assumes that users have an understanding of their system and network.

Product Modules and Options

This *Siebel Bookshelf* contains descriptions of modules that are optional and for which you may not have purchased a license. Siebel’s Sample Database also includes data related to these optional modules. As a result, your software implementation may differ from descriptions in this Bookshelf. To find out more about the modules your organization has purchased, see your corporate purchasing agent or your Siebel sales representative.

How This Guide Is Organized

This guide begins with a chapter that explains the concepts you must understand to use Siebel Anywhere correctly.

The next three chapters concentrate on administrative procedures for creating and distributing upgrade kits.

The following chapter discusses procedures for obtaining upgrade kits and installing them correctly, whether on client machines or Siebel Servers. This chapter also discusses procedures for testing upgrade kits before making them generally available to clients.

The final chapter provides supplementary information for specific types of upgrade kits and other special circumstances in which Siebel Anywhere may be used.

The guide concludes with an appendix that discusses troubleshooting techniques for use with Siebel Anywhere.

Revision History

Siebel Anywhere Administration Guide

Version 7.5.3

Table 1. Changes Made in Version 7.5.3

Topic	Revision
"How Siebel Anywhere Versions Work" on page 17	Revised for 7.5.3: Changed the names of some version settings in the Upgrade Kit Wizard and the Apply Upgrade Kit Version Information dialog box.
"Defining Upgrade Kits" on page 69	Added tables detailing Upgrade Kit Wizard elements for individual component types.

Additional Changes

For Version 7.5.3, this guide was restructured to consolidate information in a more logical order and to minimize duplication of information. Information is now presented in the context of tasks to be accomplished, rather than being organized according to screens and views available in the software. Some chapters were renamed and some were removed as part of the restructuring process.

Version 7.5, Rev. A

Table 2. Changes Made in Version 7.5, Rev. A

Topic	Revision
"Database Schema Extensions"	Added cautionary note about distributing database schema updates and upgrades.
"Minimum and Maximum Version Fields"	Added a note concerning where to find current revision numbers. Expanded existing cautionary note about preserving component version numbers.
"Activating an Upgrade Kit" on page 108	Expanded Step 4 of "To activate an upgrade kit" on page 108 to include information about browser behavior for large kits.

Table 2. Changes Made in Version 7.5, Rev. A

Topic	Revision
“Testing Upgrade Kits” on page 134	Modified wording of note for greater clarity.
“Global Deployment Example Records” on page 142	Corrected the name of the Configuration Type field in Table 32.
“Controlling the Order of Kit Installation” on page 109	Expanded Step 5 of the procedure “To set the order of kit installation” on page 109.
“Performing Database Schema Updates”	Added cautionary note about distributing database schema updates and upgrades. Modified Step 4 of the procedure “To create a database schema upgrade kit,” and added subsequent steps. Corrected Step 4 of the procedure “To install a database schema update kit for regional databases.”
“New Upgrade Kit Status “Request Submitted”” on page 171	Added this topic.
“New Upgrade Kit Status “In Progress”” on page 173	Expanded this topic to clarify normal waiting times.
“Testing for Upgrade Kit Component Consistency” on page 163	Expanded and renamed the procedure now called “To test repository components for consistency” on page 163, to provide current details and improve clarity.

Siebel Anywhere Concepts 1

This chapter contains the following information:

- A brief description of the features and benefits provided by Siebel Anywhere. See "Features and Benefits of Siebel Anywhere" on page 11.
- A high-level overview of how Siebel Anywhere is used by administrators and end users. See "How Siebel Anywhere Is Used" on page 12.
- Information about how Siebel Anywhere uses version checks to perform its functions. See "How Siebel Anywhere Versions Work" on page 17.
- Definitions of a few terms you must understand when administering Siebel Anywhere. See "Crucial Siebel Anywhere Terminology" on page 24.
- Recommendations for the deployment of Siebel Anywhere within your organization. See "Siebel Anywhere Deployment Recommendations" on page 30.

Features and Benefits of Siebel Anywhere

Siebel Anywhere allows the Siebel system administrator to distribute software upgrades to Siebel Dedicated Web Clients, Siebel Mobile Web Clients, and Siebel Servers. Upgrades can include custom configurations, some new versions of Siebel eBusiness Applications (as licensed), custom extensions to the database schema, custom files, or third-party files or applications.

NOTE: Siebel Anywhere is not designed to apply kits to Siebel Tools.

Siebel Anywhere provides the following mechanisms:

- Configuration control to make sure users are connecting to a system with the appropriate software components.
- Creation and packaging of upgrade components for distribution to users.
- Distribution to provide users with acceptable version levels of upgrade components.

For information about how administrators and end users work with Siebel Anywhere, see "How Siebel Anywhere Is Used" on page 12. For information about how Siebel Anywhere performs its functions, see "How Siebel Anywhere Versions Work" on page 17.

How Siebel Anywhere Is Used

This section contains four types of information concerning how Siebel Anywhere is used:

- An overview of the process that administrators and end users follow when administering and using Siebel Anywhere. See "Process of Using Siebel Anywhere" on page 12.
- Information about the screens and views used during this process. See "Siebel Anywhere Screens and Views" on page 14.
- Information about wizards and utilities used during this process. See "Siebel Anywhere Wizards and Utilities" on page 14.
- Information about how file attachments are handled during this process. See "Siebel Anywhere File Attachments" on page 16.

Process of Using Siebel Anywhere

The process for using Siebel Anywhere consists of the following steps:

1. Determine your upgrade requirements. For instructions concerning this step, see "Determining Upgrade Requirements" on page 34.

2. As a Siebel system administrator, create any required configurations, dynamic configuration assignments, and components. For a discussion of components and configurations, see "Crucial Siebel Anywhere Terminology" on page 24. For instructions concerning this step, see "Creating Needed Infrastructure Elements" on page 52.

3. Define an upgrade kit to meet your requirements. For instructions concerning this step, see Chapter 3, "Defining Upgrade Kits."

4. Activate the upgrade kit. Activating a kit gathers the files to be included in the upgrade kit and compresses them into a single archive on the Siebel File System. For instructions concerning this step, see "Activating an Upgrade Kit" on page 108.

5. Apply the upgrade kit. Applying a kit updates a compiled information string with the component version information. For instructions concerning this step, see "Applying an Upgrade Kit" on page 111.

6. Distribute the upgrade kit to test users for testing. Test users are specified by a membership in a test configuration. For instructions concerning this step, see "Distributing Upgrade Kits" on page 115.

7. As a client belonging to the test configuration, test the upgrade kit by using one of the following methods:

   - For a required kit and a Mobile Web Client test user, test the kit by synchronizing.

   - For a required kit and Dedicated Web Client test user, test the kit by logging in to the Siebel application.

   - For an optional kit, test the kit by selecting and upgrading the applicable component from the Product Updates view in the User Preferences screen.

   For further instructions concerning this step, see Chapter 5, "Retrieving, Installing, and Testing Upgrade Kits."

8. As a Siebel system administrator, correct any problems discovered during testing. You may find helpful information in Appendix A, "Troubleshooting for Siebel Anywhere." Repeat client testing as necessary.

9. Use additional configurations to distribute the upgrade kit for wider use, and notify the appropriate users that it is available.

10 Mobile users retrieve the upgrade by synchronizing (if the kit is required) or by using the Product Updates view in the User Preferences screen (if the kit is optional). Connected users are automatically prompted to retrieve the upgrade upon logging in to the Siebel application.

NOTE: As part of your planning process, you may also find it helpful to consult Chapter 6, "Supplementary Information for Specific Upgrade Types," which contains additional useful information for particular kinds of upgrades.

Siebel Anywhere Screens and Views

Most administrative tasks concerned with Siebel Anywhere are done using the Siebel Anywhere Administration screen. You must be logged on to the Siebel eBusiness Applications as a Siebel administrator to access this screen. The Siebel database installation process creates a Siebel administrator account that can be used to perform the tasks described in this guide. For information about this, see *Siebel Server Installation Guide for Microsoft Windows* and *Siebel Server Installation Guide for UNIX*.

CAUTION: Do *not* perform system administrative functions on your local database or in disconnected mode. Although there is nothing to prevent you from doing this, it can have serious consequences. Examples include data conflicts, potential for overly large local database, and potential for a large number of additional transactions to route.

Siebel Anywhere clients use the Product Updates view of the User Preferences screen for retrieving and installing optional upgrade kits. This view also allows clients to see their current update status.

This guide provides additional information about these screens and views in later chapters, as part of the information that accompanies specific procedures.

Siebel Anywhere Wizards and Utilities

This section briefly describes the following Siebel Anywhere wizards and utilities, which are used during various stages of upgrades involving Siebel Anywhere:

- The Upgrade Kit Wizard
- The Upgrade Kit Builder
- The Upgrade Wizard

The Upgrade Kit Wizard

The Siebel Upgrade Kit Wizard is the task-oriented feature Siebel administrators must use to define an upgrade kit. The Upgrade Kit Wizard uses a Web-enabled user interface to prompt the administrator for the required information. The Upgrade Kit Wizard performs the following functions:

- Validates the parameters supplied by the administrator
- Handles file attachment uploads for certain types of upgrade kits
- Specifies upgrade kit items
- Specifies the sequence of events in the upgrade being defined
- Submits a schedule-mode server request to invoke the *Upgrade Kit Builder* when kit definition is complete

For more information about using the Upgrade Kit Wizard, see Chapter 3, "Defining Upgrade Kits."

NOTE: Do not confuse the Upgrade *Kit* Wizard with the Upgrade Wizard, which is described later in this section. The Upgrade *Kit* Wizard constructs the upgrade kit. The Upgrade Wizard reads the upgrade kit and installs it.

The Upgrade Kit Builder

Upgrade Kit Builder is part of the Siebel Anywhere Component Group. It constructs upgrade kits on the server, based upon definitions of kits collected by the *Upgrade Kit Wizard*. During the construction process, the Administrator can monitor the progress of the Upgrade Kit Builder through the Server Component Request screen or the Upgrade Kit Builder log file. The associated log file is UpgKitBldr_*task id*.log.

The Upgrade Wizard

The Siebel Upgrade Wizard is a stand-alone executable that reads and installs upgrade kits on Mobile or Dedicated Web Clients or servers. The Siebel Upgrade Wizard also tracks the upgrade process and automatically recovers from errors. In the Windows environment the associated log file is UpgWiz.log. In the UNIX environment the associated log file is srvrupgwiz1.log.

NOTE: Do not confuse the Upgrade Wizard with the Upgrade *Kit* Wizard, which is described earlier in this section. The Upgrade *Kit* Wizard constructs the upgrade kit. The Upgrade Wizard reads the upgrade kit and installs it.

During the installation of an upgrade kit, the Upgrade Wizard creates a backup of affected files in the \temp or \upgrade folders. If an error occurs during the upgrade, the Upgrade Wizard attempts to roll back the changes and restore the machine to its original state. Subsequently, when the user starts the Siebel client, Siebel eBusiness Applications detects that an upgrade is either in progress or has failed and notifies the user.

The Upgrade Wizard cannot roll back to the previous version after the upgrade has been installed successfully. After a successful upgrade, the Upgrade Wizard deletes the backup files. Consequently, restoring to a previous configuration is not possible.

Siebel Anywhere File Attachments

This section briefly describes how Siebel Anywhere works with file attachments. Siebel Anywhere stores two kinds of file attachments in the Siebel File System:

- **Individual upgrade kit item files.** Upgrade kit item files are files that are included when a particular upgrade kit is built. Examples include CFG files for configuration upgrade kits and Siebel Repository Files (SRF files) for repository upgrade kits. Depending on the component type being upgraded, an upgrade kit may need to include zero, one, or multiple upgrade kit item files. These files are stored in the Siebel File System after you click Finish in the Upgrade Kit Wizard. The files should be visible in the Siebel File System as soon as the status of the upgrade kit record is Pending in the Upgrade Kits view. In the Siebel File System, individual upgrade kit item files are assigned file names that have the format S_UPG_KIT_IARG*_ROW_ID_REV_NO*.SAF.

- **Complete upgrade kit files.** These are the files that end users will download. Each upgrade kit file contains instructions for updating a specific Siebel component. Some types of upgrade kit files also contain one or more upgrade kit item files, as described earlier in this section. If upgrade kit item files are specified in the Upgrade Kit Wizard, the specified files are incorporated into the complete upgrade kit file when the kit is built. Complete upgrade kit files are stored in the Siebel File System after you activate the upgrade kit. In the Siebel File System, complete upgrade kit files are assigned file names that have the format S_UPG_KIT_*ROW_ID_REV_NO*.SAF.

The file name extension SAF is used for all Siebel file attachments, including Siebel Anywhere file attachments. In Siebel Anywhere file attachment names, *ROW_ID* is a unique number combination that identifies the upgrade kit record in the database, and *REV_NO* indicates whether the kit has been revised. If you deactivate and reactivate a kit, a new complete upgrade kit file is created, using the same *ROW_ID* value but a different *REV_NO* value in the file name.

How Siebel Anywhere Versions Work

This section describes how Siebel Anywhere uses version settings to perform its functions, beginning with some brief definitions of essential terminology.

Siebel Anywhere packages and delivers certain kinds of software using special files called *upgrade kits*. For more information about upgrade kits, see "Upgrade Kits" on page 24.

A software module that is upgraded as a single unit is called a Siebel Anywhere *component*. Examples of components include Siebel configuration files, Siebel database schemas, Siebel Executables, Siebel repository files, third-party software, and customer revisions. Any component that needs an upgrade must have its own upgrade kit. For more information about Siebel Anywhere components, see "Upgrade Components" on page 26.

A Siebel application server or Siebel client that has been associated with one or more Siebel Anywhere components is called a Siebel Anywhere *subscriber*. The association between a subscriber and a set of components is not direct; the association is formed by means of the subscriber's membership in an upgrade *configuration,* which is a definition of a setup used by a particular group of users, such as Siebel Call Center Clients or Siebel Sales Clients. A configuration associates a group of subscribers with the specific set of upgrade components that those subscribers need to have managed and maintained. For more information about configurations, see "Upgrade Configurations" on page 28. For more information about subscribers, see "Siebel Anywhere Subscribers" on page 30.

Siebel Anywhere stores and checks several kinds of version information to determine whether a particular subscriber can or should use a particular upgrade kit. To create upgrade kits that have the effects you want, you must understand how these versions are specified, stored, and used. The following paragraphs briefly describe the kinds of version information that Siebel Anywhere uses and how Siebel Anywhere uses them. The information is divided into the following sections:

- "About Specifying a New Version Number for a Component" on page 18
- "About Specifying Versions That Can Use the Upgrade Kit" on page 19
- "About Specifying Versions That Must Upgrade" on page 20
- "About Storing Version Information" on page 22
- "About How Siebel Anywhere Component Versions Are Used" on page 22

About Specifying a New Version Number for a Component

An administrator who creates an upgrade kit specifies the version number that the component being upgraded will have after the kit is used to install the upgrade. This version number is called the New Version number.

For example, if the administrator sets the value of New Version to 3 when creating a new customer revision upgrade kit, a Mobile Web Client who successfully installs that upgrade kit will be upgraded to version 3 of the customer revision component.

About Specifying Versions That Can Use the Upgrade Kit

The administrator who creates an upgrade kit also specifies which previous versions of the component are compatible with the upgrade kit. If one or more specific versions are specified, a client or server must have one of those versions already installed to download and use the upgrade kit.

The following Upgrade Kit Wizard settings are used to specify the acceptable range of versions for downloading the kit:

- Minimum Old Version
- Maximum Old Version

These settings are specified as part of the process of defining the upgrade kit. For more information about defining upgrade kits, see Chapter 3, "Defining Upgrade Kits."

As an example, suppose you assign the following values when creating a customer revision upgrade kit:

Minimum Old Version = 1
Maximum Old Version = 2

This causes the following results:

- A Mobile Web Client with version 0 of the customer revision component *cannot* download the upgrade kit until they install an upgrade that changes their customer revision number from 0 to 1.
- A Mobile Web Client with version 1 or 2 of the customer revision component *can* download the upgrade kit.

As another example, suppose you assign the following values when creating an upgrade kit for a custom report component:

Minimum Old Version = NULL
Maximum Old Version = NULL

Null values for both these settings indicate that subscribers who have any previous version of the component or no previous version of the component can download and use the kit. Therefore, null values for these settings should only be used if there are no prerequisite versions for the component, or if the upgrade kit will contain all prerequisites within itself.

As a third example, suppose you want to distribute two kits for the same component, such as a report and a batch file that will manipulate the report. To make sure that the report is installed before the batch file is run, you would create one kit for the report and a separate kit for the batch file, and you would make the kit for the batch file dependent on the kit for the report. The settings shown in Table 3 would accomplish this objective.

Table 3. Example Settings for Upgrade Kits Where Kit #2 Depends on Kit #1

Kit Description	Minimum Old Version Value	Maximum Old Version Value	New Version Value
Report	NULL	NULL	1
Batch file to manipulate report	1	1	2

About Specifying Versions That Must Upgrade

The administrator who creates an upgrade kit also specifies the following version information:

- Which upgrade component versions are still acceptable for running the software that is being upgraded (such as a Siebel application)
- Which component versions must be upgraded

For a user who must upgrade, the upgrade kit is called a *required* kit. For a user who can either upgrade or continue to use an older version of the component being updated, the upgrade kit is called an *optional* kit.

There are two different ways to specify the acceptable range of upgrade component versions for running the software:

- **Apply in the Upgrade Kit Wizard.** In the Upgrade Kit Wizard, choose to activate and apply the upgrade kit immediately, and then use the read-only default values supplied for the following settings:
  - Component Minimum Version
  - Component Maximum Version
- **Apply in the Apply Upgrade Kit Version Information dialog box.** Do not apply the upgrade kit while using the Upgrade Kit Wizard. Instead, follow the procedures described in Chapter 4, "Activating, Applying, and Distributing Upgrade Kits," and specify values for the following settings in the Apply Upgrade Kit Version Information dialog box:
  - Min Version
  - Max Version

NOTE: The Component Minimum Version setting in the Upgrade Kit Wizard is equivalent to the Min Version setting in the Apply Upgrade Kit Version Information dialog box, except that the former is read-only. Similarly, the Component Maximum Version setting in the Upgrade Kit Wizard is equivalent to the Max Version setting in the Apply Upgrade Kit Version Information dialog box, except that the former is read-only.

As an example, suppose you assign the following values when using the Apply Upgrade Kit Version Information dialog box for a customer revision upgrade kit:

Min Version = 2
Max Version = 4

This causes the following results:

- The kit is required for any Mobile Web Client with version 1 of the customer revision component. If users have a version less than the minimum and choose not to install the upgrade, they can only access the application in a read-only mode.
- The kit is optional for any Mobile Web Client with version 2, 3, or 4 of the customer revision component.

About Storing Version Information

When an administrator applies an upgrade kit (either by using the Upgrade Kit Wizard or the Apply Upgrade Kit Version Information dialog box), the following settings for the kit are recorded as a compiled information string in the database:

- New Version
- Minimum Old Version
- Maximum Old Version
- Component Minimum Version (also known as Min Version)
- Component Maximum Version (also known as Max Version)

About How Siebel Anywhere Component Versions Are Used

After Siebel Anywhere has stored an upgrade kit's version information in the database and the administrator has distributed the kit, eligible subscribers have access to the kit. Siebel Anywhere compares the subscriber's current component version with the version information in the database under conditions that depend on the type of the subscriber and certain settings. For detailed information about when these version checks are done, see Table 4.

Table 4. Version Check Occurrence

Subscriber Type	When Version Check Occurs
Mobile and dedicated users	Mobile and Dedicated Web Clients perform the version check when the client starts up and connects to either the server or local database. Mobile Web Clients also perform a version check during each synchronization session.
Regional Node Servers	Performed as the Regional Node Server starts up, dependent upon the version check flag on the Regional Node Server. The Replication Agent on a Regional Node Server also performs a version check per synchronization session dependent upon the same Version Check parameter.

Multiple factors affect what happens after Siebel Anywhere performs a version check. These factors include the subscriber type, the state the Siebel application is in when the versions are compared, and the relative numbers of the versions.

In general, if a version check reveals that a subscriber is required to upgrade, that subscriber is prompted to do so, and has limited or no access to the affected application until the upgrade is complete. For detailed information about responses to the version check process when the upgrade is required, see Table 5.

However, if a version check reveals that a subscriber is *not* required to upgrade, that subscriber generally is not prompted to upgrade, but must voluntarily navigate to User Preferences > Product Updates to discover whether an upgrade is available and to request the upgrade. For more information about displaying optional upgrade kits and requesting optional upgrades, see "Retrieving and Installing Upgrade Kits" on page 124.

Table 5. Response to Version Check Process Based on Application Status

Client or Server	Status of Application: Running	Status of Application: Startup
Mobile Web Client	During synchronization, a prompt will appear asking the user if you want to download the upgrade kit now. The choices are: ■ *Yes*. Upgrade will take place. ■ *No*. Synchronization ends.	A prompt will appear asking the user if you want to download the upgrade kit now. The choices are: ■ *Yes*. Upgrade will take place. ■ *No*. User application starts up in read-only mode.
Dedicated Web Client	Not applicable.	■ *Yes*. Upgrade takes place. ■ *No*. User application starts up in read-only mode.
Regional Node Server	If Version Check is TRUE, Replication Agent will automatically download the upgrade kit and shutdown the Regional Node Server. If Version Check is FALSE, Replication Agent will stop merging but will not shut down the Regional Node Server.	If Version Check is set to TRUE, the Regional Node Server will download the upgrade kit and exit. The administrator needs to invoke the Upgrade wizard manually, from the command line, to carry out the upgrade. If Version Check is FALSE, the Regional Node Server will start up.

Crucial Siebel Anywhere Terminology

This section provides information about the following crucial terms for understanding and working with Siebel Anywhere:

- Upgrade Kits (required and optional)
- Upgrade Components
- Upgrade Configurations
- Siebel Anywhere Subscribers

Upgrade Kits

A *Siebel Anywhere Upgrade Kit* is an archived file that contains software or database schema changes required to upgrade a specific upgrade component on a subscriber's computer. An upgrade kit contains one or more upgrade kit items, which are instructions for actions to be performed and the files associated with those actions. A kit also contains information about the sequence in which the actions are to be performed. Available actions include:

- Executing any type of program or batch script.
- Copying, moving, or deleting files.

Siebel Anywhere architecture supports creation of upgrade kits in a Web deployment. Administrators can use an HTML browser without any Siebel software installed on their machines to perform the Siebel Anywhere administrative tasks. Preparation of upgrade kits is done through the use of the Upgrade Kit Wizard and the Upgrade Kit Builder.

After the Siebel Anywhere Administrator creates an upgrade kit, it is automatically stored on the Siebel File System. From this location, it is available for retrieval and installation by subscribers. Files or scripts that are included in the upgrade kit are stored in compressed form. For more information about how Siebel Anywhere stores and identifies upgrade kits and the files that are included in upgrade kits, see "Siebel Anywhere File Attachments" on page 16.

It is very important to test upgrade kits. It is recommended that you distribute each kit to selected mobile and connected users through the use of a test configuration, and have those users attempt to download and install the kit before you distribute the kit to a wider group of users.

There are two types of upgrade kits for Siebel client subscribers—required and optional. Upgrade kits created for Siebel Servers should always be required.

Required Upgrade Kits

A *required upgrade kit* is a kit that must be retrieved and installed on the intended Mobile or Dedicated Web Clients, or Siebel Servers. The Siebel clients and servers will prompt the user to upgrade if there is a required upgrade. If a required upgrade is not implemented, Siebel client can only be started in read-only mode, and Siebel Server will not start.

Optional Upgrade Kits

An *optional upgrade kit* is a kit that is made available to subscribers, but subscribers are not required to retrieve and install the kit. For example, optional upgrade kits are useful for making third-party applications, files, or other noncritical components available for users to retrieve at their discretion.

Siebel Anywhere does not automatically prompt users to retrieve and install optional kits. Optional upgrade kits are manually retrieved using the Product Updates view, which is accessible from the Siebel User Preferences screen, and are installed using the Upgrade Wizard. The Product Updates view must be included in the responsibilities that are assigned to users. See “Retrieving and Installing Upgrade Kits” on page 124.

CAUTION: It is strongly recommended that you use the optional kit feature as a method for testing *every* Siebel Anywhere component upgrade. When an upgrade kit is created as an optional kit, test users can retrieve kit from the Product Updates view whenever it is convenient to do so. If the kit is created as a required kit, test users can lose read/write access to Siebel applications unless they upgrade when automatically prompted to do so. After testing, you can make the kit required or optional.

Upgrade Components

An *upgrade component* is a logical unit of software for which Siebel Anywhere performs version checks, to determine whether that software needs to be upgraded. The determination is made by comparing the subscriber's existing version of the component with the version requirements specified in an upgrade kit. Each upgrade component defines how to check versions for a particular software module. For example, the upgrade component Siebel Sales CFG, which is used to check the version of the Siebel Sales Client configuration file, defines how to locate the file and how to read the version from it. For more information about how Siebel Anywhere conducts version checks, see "How Siebel Anywhere Versions Work" on page 17.

Upgrade components can be thought of as belonging to two broad categories:

- *History-dependent* components depend on the presence of certain previously installed software.
- *History-independent* components can be upgraded regardless of the software previously installed.

Components are associated with subscribers by means of Siebel Anywhere configurations, which are discussed in more detail later in this section. A configuration contains one or more upgrade components. The Siebel administrator can include one or more upgrade components in a configuration.

Siebel eBusiness Applications provide several preconfigured Upgrade Components. Seeded components are available based upon the languages installed on the database server. The Siebel administrator can also register additional Siebel Anywhere components or other third-party software. Siebel Anywhere can upgrade these components, just as it does the predefined components used by Siebel eBusiness Applications. For example, it would be possible to create an upgrade component to run a batch program in the form of a .bat or .exe file. Each upgrade component is classified by a component type, as described in Table 6.

Table 6. Predefined Examples of Siebel Anywhere Components

Siebel Component Type	Siebel Anywhere Component	Comment
Customer Revisions	■ Siebel Client Customer Revision ■ Siebel Client Customer Revisions_[*language-code*]	A nonspecific component for distributing any customer-revised files, such as Online Help files, Siebel Report files, Siebel Help Files, Siebel Sample Database Files, third-party files or applications on the Siebel client. Can be either history-dependent or history-independent.
	■ Siebel Server Customer Revisions ■ Siebel Server Customer Revision_[*language-code*]	A nonspecific component for distributing any customer-revised files on the Siebel Server. Can be either history-dependent or history-independent.
Siebel Upgrade Wizard	■ Siebel Upgrade Wizard	The Siebel Upgrade Wizard. It is automatically associated with every upgrade kit to make sure the client uses the current version of the wizard. History-independent.
Siebel Configuration File	■ Siebel Sales CFG_[*language-code*]	A component for distributing a customized CFG file for client systems. History-independent.
Siebel Database Extensions	■ Siebel Database Schema	The database schema used by the Siebel Regional Node and Siebel Remote user databases. History-independent.

Table 6. Predefined Examples of Siebel Anywhere Components

Siebel Component Type	Siebel Anywhere Component	Comment
Siebel Executables	■ Siebel Client Executables ■ Siebel Client Executables_[*language-code*]	The Siebel eBusiness Applications client executables. History-independent.
Siebel Repository File	■ Siebel Client Repository File_[*language-code*] ■ Siebel Server Repository File_[*language-code*]	The file used by Siebel eBusiness Applications (.srf). History-independent.
Third-Party Software	■ Third Party - Oracle 8 Client ■ Third Party - Microsoft Word ■ Third Party - Microsoft SQL Server Driver ■ Third Party - Microsoft Internet Explorer ■ Third Party - IBM DB2 Client ■ Third Party - Adobe Acrobat Reader ■ Third Party - Adobe Acrobat	Third-Party Software, as used on the Siebel client. Can be either history-dependent or history-independent. Some Third-Party Software upgrade components are for version checking *only*. Siebel Anywhere is not intended to deliver complex Third Party software products as upgrade kits. For smaller and simpler software products such as Adobe Acrobat and WinZip, you can use Siebel Anywhere to deliver them as Third-Party upgrade kits.

For more information about upgrade components, see “Setting Up Custom Siebel Anywhere Upgrade Components” on page 59.

Upgrade Configurations

An Upgrade Configuration is a definition of the setup used by a particular set of Siebel Anywhere subscribers, such as Siebel Call Center Clients or Siebel Sales Clients. A configuration associates a particular set of Siebel Anywhere subscribers with the specific set of upgrade components that those subscribers need to have managed and maintained. Each Siebel subscriber belongs to an individual Siebel Anywhere configuration. When Siebel Anywhere checks whether a particular subscriber needs an upgrade, it checks the versions of all components included in that subscriber’s configuration.

Siebel eBusiness Applications provide configurations such as:

- Siebel Test Client
- Siebel Call Center Client
- Siebel Service Client
- Siebel Sales Client
- Siebel Marketing Client
- Siebel Partner Manager Client
- Siebel ERM Client

Each subscriber can be assigned to one of these configurations. Administrators can also create new configurations for special situations.

NOTE: Siebel Anywhere supports global deployments by including seeded upgrade configurations and components for each supported language included within the Siebel eBusiness Application. Consider carefully the receivers or subscribers to any upgrade kit you create, and use the correct upgrade component based on end-user languages.

By default, Siebel Anywhere uses the value of the ComponentName entry in the Siebel section of an employee's CFG file to determine what configuration the employee is using and thus what components it should check. The sever parameter UpgComponent specifies the configuration for Siebel Server.

It is possible to override an employee's default configuration assignment by using the Siebel Anywhere Administration screen to assign the employee to a different configuration. This method of assigning a client to a configuration is appropriate for situations in which the assignment is temporary. For example, a client might be assigned to a specific configuration to let that client test an upgrade kit before it is released for general use. These temporary assignments are also called *dynamic assignments*.

For more information about working with configurations, see "Modifying and Creating Siebel Anywhere Configurations" on page 52.

Siebel Anywhere Subscribers

A Siebel Anywhere subscriber is a Siebel client or a Siebel application server that belongs to an active configuration. It can be a laptop, desktop, or a regional node. A Siebel Anywhere subscriber belongs to one upgrade configuration. Types of subscribers include the following:

- Mobile Web Clients of Siebel eBusiness Applications such as Siebel Sales, Partner Manager, Siebel Field Service, or Siebel Call Center
- Dedicated Web Clients
- Siebel Servers operating against regional databases (referred to as Regional Node Servers)

CAUTION: It is strongly recommended that you run *only* the Siebel Smart Web Client for user accounts that have Siebel administrator responsibilities, to make sure that administrative tasks are performed while connected to the HQ server, and to make sure that the administrator is not prevented from logging in for reasons related to component versions. However, *if* you run the Siebel Dedicated Client for any administrator account, it is strongly recommended that the account *not* be associated with a Siebel Anywhere configuration. This precaution also helps prevent version-related login problems.

Siebel Anywhere Deployment Recommendations

It is recommended that the Siebel Anywhere component group be enabled on only one Siebel Applications Server in the enterprise. To create upgrade kits, the Upgrade Kit Builder server component should also be enabled.

CAUTION: During the installation of the first Siebel Server in the Siebel enterprise, do not enable the Siebel Anywhere component group. Wait until every Siebel Server is installed. Then, enable the Siebel Anywhere component group on only one Siebel Server. Do not enable Siebel Anywhere on a Regional Node Server. The reason for this is that upgrade Kits should be built sequentially in the correct order. If the Upgrade Kit Builder is enabled on multiple servers, upgrade kits may be built in the incorrect order because multiple upgrade kits can be created at the same time.

For details about how to enable a Component group, see *Siebel Server Administration Guide*.

Upgrade Planning and Preliminary Tasks 2

This chapter describes planning and other preliminary tasks that must be completed before you use Siebel Anywhere to create an upgrade kit. It includes the following sections:

- "Process of Planning and Preparing for Kit Creation" on page 33
- "Determining Upgrade Requirements" on page 34
- "Creating Needed Infrastructure Elements" on page 52
- "Preparing Upgrade Kit Contents" on page 65

Process of Planning and Preparing for Kit Creation

This section provides an overview of how to plan a Siebel Anywhere upgrade and complete the tasks that must precede creation of one or more upgrade kits. The planning and preparation process consists of three main parts:

1. "Determining Upgrade Requirements" on page 34. In this part of the process, you gather information about the software to be distributed and the computers that will receive it. The information you gather determines how many components will be involved and how many upgrade kits will be needed, among other important points.
2. "Creating Needed Infrastructure Elements" on page 52. In this part of the process, you determine whether or not existing Siebel Anywhere components and configurations match your upgrade needs, create any additional components, and create or modify any configurations you will need.

3. "Preparing Upgrade Kit Contents" on page 65. In this part of the process, you gather (and, where necessary, create) the files that will be included in each upgrade kit. The specific process to follow depends on the type of components you are planning to upgrade.

   NOTE: Some kits do not require any files. For example, Database Schema kits do not require any files to create a kit.

When these parts of the process have been completed, you can use the information, infrastructure elements, and files you have prepared to define the upgrade kits you need. This process is described in Chapter 3, "Defining Upgrade Kits."

CAUTION: Any errors in an upgrade kit, whether in the files being distributed or in application processes defined for them, can have widespread impact on your production environment. To prevent such errors, thorough planning, preparation, and testing of upgrade kits are essential.

Determining Upgrade Requirements

Before using Siebel Anywhere to upgrade existing software or distribute new software, you must gather a considerable amount of information about the software to be distributed and the computers that will receive it. Specifically, you must collect the following kinds of information, each of which is described in further detail in following sections.

Determining upgrade requirements is a step in Process of Planning and Preparing for Kit Creation on page 33.

- **What software needs to be replaced or added?** For detailed information, see "Identifying Software to Be Replaced or Added" on page 35.
- **Is Siebel Anywhere a suitable method for upgrading or adding this software?** For detailed information, see "Evaluating Siebel Anywhere as an Upgrade or Delivery Method" on page 36.
- **Which computers need the software?** For detailed information, see "Identifying Computers and Users to Receive Upgrades" on page 37.

- **Which configurations can deliver the necessary components to the designated computers?** For detailed information, see "Identifying Configurations to Deliver Upgrade Components" on page 37.
- **What files must each component's upgrade kit contain?** For detailed information, see "Identifying Files to Include in Upgrade Kits" on page 40.
- **Will each upgrade kit be required or optional?** For detailed information, see "Choosing Required or Optional Upgrade Types" on page 40.
- **What version settings must each component's upgrade kit have?** For detailed information, see "Determining Version Setting Values" on page 41.
- **What specific preliminary tasks must be performed for particular upgrade kit types?** For detailed information, see "Other Preliminary Upgrade Tasks for Specific Upgrade Kit Types" on page 49.
- **Do multiple components need to be delivered in a prescribed sequence?** For detailed information, see "Determining Required Upgrade Sequences" on page 51.
- **How will you test each upgrade kit before distributing it to end users?** For detailed information, see "Planning Upgrade Test Details" on page 51.

Identifying Software to Be Replaced or Added

Siebel Anywhere can upgrade or distribute many kinds of software. The nature of the software to be upgraded or distributed affects many parts of the process of using Siebel Anywhere:

- **Upgrades of existing software.** For upgrades of existing software, you must determine the version numbers used by Siebel Anywhere for previous versions of the software being upgraded. You must also decide whether to allow any of those previous versions to remain in use, or whether to require that they be upgraded.
- **Distribution of new software.** For distribution of new software, you may need to create one or more custom components. Depending on who will use the software, you may also need to create new configurations.

For language-dependent components, planning the upgrade also includes identifying every end-user language used in your Siebel implementation. For example, a CFG file associated with a specific language is a language-dependent component, such as Siebel Sales CFG_ENU for English, Siebel Sales CFG_DEU for German, or Siebel Sales CFG_JPN for Japanese. Be sure to use the correct end-user language pack (or upgrade component) for each language included in the Siebel eBusiness Application while creating upgrade kits. For more information regarding the use of different languages, see "Example of Global Deployment with Siebel Anywhere" on page 140.

The number and type of upgrade kits required for your upgrade depend on your subscribers and the components to be upgraded. For example, you may be preparing to upgrade to a new version of your custom Siebel configuration, requiring the distribution of a new SRF file to every Mobile and Dedicated Web Client user.

Your custom configuration may also need to apply database schema changes to your Siebel databases and to the local databases of Mobile Web Clients. Database schema changes are not distributed by a kit to Dedicated Web Clients. Creating a database schema kit applies the changes from the logical schema to the physical schema. These changes are visible to Dedicated Web Clients, without distribution through a kit, because they connect directly to the Siebel Server Database.

You must create an upgrade kit for each component to be upgraded. In the preceding example, you would need to create one upgrade kit for the Siebel Client Repository File and a second upgrade kit for the database schema extensions.

It is a good idea to compile a list of the upgrade kits you will need.

Evaluating Siebel Anywhere as an Upgrade or Delivery Method

Siebel Anywhere is suitable for delivering many kinds of software, including many software upgrades, but it is not suitable for delivery of some types of software and some types of upgrades. Observe the following guidelines:

- Use Siebel Anywhere *only* with software that is related to the use of Siebel eBusiness Applications.
- Do *not* use Siebel Anywhere for major Siebel release upgrades, such as upgrading a database schema from Siebel 6 to Siebel 7.

- Do *not* use Siebel Anywhere to upgrade from Siebel 7.0.x to 7.5.x. The addition of Unicode support in release 7.5 puts this upgrade outside the scope that Siebel Anywhere can handle.

Identifying Computers and Users to Receive Upgrades

To make sure that Siebel Anywhere delivers your upgrade kit to the appropriate computers and users, you must take the following steps:

- Determine whether any Siebel Servers need the upgrade. (Steps to follow for servers and expected behavior may differ from corresponding client steps and behavior.)
- Determine which clients need the upgrade. Some possibilities include:
    - All clients need the upgrade.
    - Clients who have a particular job function need the upgrade.
    - Clients who have particular prior versions of the software need the upgrade.

Identifying Configurations to Deliver Upgrade Components

A Siebel Anywhere *configuration* is a definition of the setup used by a particular set of Siebel Anywhere subscribers, such as Siebel Call Center Clients or Siebel Sales Clients. A configuration associates a particular set of Siebel Anywhere subscribers with the specific set of upgrade components that those subscribers need to have managed and maintained. Each Siebel subscriber belongs to an individual Siebel Anywhere configuration that includes a specific set of components.

As part of the process of planning your upgrade, you must make sure that your Siebel implementation contains configurations that are related to the components you want to upgrade. You must also make sure that those configurations can be used to distribute the upgrade to the appropriate subscribers, whether those subscribers represent servers or clients.

The following procedure provides instructions for listing existing configurations and inspecting the components to which they are related.

To display available Siebel Anywhere configurations and their related components

1. From the application-level menu, select View > Site Map > Siebel Anywhere Administration.
2. From the Show drop-down list, select Configurations.
3. In the Upgrade Configurations list, select a configuration that you want to inspect.

   The Related Components list displays the components that are currently associated with the selected configuration. Table 7 describes some of the fields in this list.

Table 7. Selected Fields in the Related Components List

Field	Comments
Name	Name of the component. Only single-byte, alphanumeric characters, blank space, underscore, and dash are allowed. Component names may not include special characters like periods or other invalid characters such as slash, asterisk, pipe, question mark, colon, quotes, or angle brackets.
Min Version	Minimum version required for the component on the client's system. If the client uses a version of the component that is less than the minimum, the client must upgrade or the application runs in read-only mode.
Max Version	Maximum version allowed for the component on the client's system. If clients use a version of the component that is between the minimum and maximum, they can still use the application in read/write mode without installing an upgrade kit, even if the upgrade kit is required. Clients can access the system if their local version is higher than the maximum version for the component.

NOTE: Siebel 7.5 does not include the Required At Startup field in the Related Components list. In Siebel 7.0, version checking was done automatically only if a Required at Startup parameter was checked for the particular component in question. In Siebel 7.5, every component receives automatic version checking.

The following procedure provides instructions for listing the subscribers who are dynamically assigned to a selected configuration. The procedure does *not* list subscribers who are assigned to a particular configuration by means of a CFG file setting.

To list employees who are dynamically associated with a configuration

1. From the application-level menu, select View > Site Map > Siebel Anywhere Administration.
2. From the Show drop-down list, click Employees.
3. In the Upgrade Configurations list, select the configuration for which you want to view dynamically assigned employees.

   The Upgrade Employee Configuration list displays the employees who are dynamically assigned to the selected configuration. Employees who are assigned to the configuration through their CFG file values are not listed.

If you find that existing configurations do not meet your current upgrade needs, see "Modifying and Creating Siebel Anywhere Configurations" on page 52 for information on how to modify existing configurations or create new configurations.

Identifying Files to Include in Upgrade Kits

Most Siebel Anywhere upgrade kits contain software files to be distributed to subscribers. (The exceptions are kits that contain only instructions to be executed. Such instructions are generated during the kit creation process, rather than being stored in file attachments.) As part of planning an upgrade kit, you should identify any files the kit will include and gather those files into a single directory. Table 8 lists some files that are typically included in various kit types.

NOTE: It is recommended that you gather files for only one upgrade kit at a time.

Table 8. Typical Files Included in Upgrade Kits

Upgrade Kit Type	Included Files
Siebel Configuration File	One CFG file per kit, such as siebel.cfg or uagent.cfg
Siebel Database Schema	No files
Siebel Client Executables	All the language-independent (base) files for a Siebel patch
Siebel Client Executables_[*language-code*]	All files for a Siebel patch that are specifically for a given language
Siebel Client Customer Revisions	Batch files, web images
Siebel Client Customer Revisions_[*language-code*]	Reports, message templates
Siebel Repository File	siebel.srf

Choosing Required or Optional Upgrade Types

It is possible to define an upgrade kit as either required or optional, as described in “Upgrade Kits” on page 24. However, it is recommended that you initially define *every* upgrade kit as optional. Your test clients can test an optional kit at their convenience, while keeping read/write access to the Siebel application in the meantime.

When you are satisfied that an optional upgrade kit functions appropriately for test clients, you can modify the kit to make it required, retest it as a required kit, and distribute it to production users as a required kit. For more information about this process, see "Converting an Optional Kit to a Required Kit" on page 114.

Determining Version Setting Values

The exact set of information needed for defining a Siebel Anywhere upgrade kit depends on the type of kit involved. However, you must supply version information for all upgrade kit types. When determining who can and who must upgrade a particular component, Siebel Anywhere compares version information stored in the database with the versions of components actually installed on each subscriber's computer. The information in the database comes from the information you supply when you create upgrade kits.

For each upgrade kit, you will need to supply values or approve default values for five version settings:

- New Version
- Minimum Old Version
- Maximum Old Version
- Min Version (also known as Component Minimum Version)
- Max Version (also known as Component Maximum Version)

For a general discussion of the significance of these versions, see "How Siebel Anywhere Versions Work" on page 17. In general, the values you supply will be related to the version numbers already in use for the component being upgraded. Therefore, gathering version information about existing components is an important part of planning an upgrade.

CAUTION: Make certain that Minimum Old Version, Maximum Old Version, and New Version settings are correctly set before finishing your upgrade kit, using the default numbering system, if possible. Incorrectly specifying the version information can prevent subscribers from upgrading successfully.

Gathering Information on Existing Component Versions

The following procedure provides instructions for listing the components currently available in your Siebel implementation, along with information about currently acceptable versions of those components and how those versions are checked.

CAUTION: When implementing major upgrades, be sure to preserve the version numbers for every component. This precaution is important because Siebel Anywhere assigns increasing version numbers, but components that are included in upgrades may have default version numbers set to zero. If the version number of a new component is left lower than the version number of the corresponding preupgrade component, newly-upgraded users may be prompted, incorrectly, to install the old component. Never reset any Siebel Anywhere version numbers to zero; instead, increase the version numbers of the new components to match their preupgrade counterparts. In particular, you must use the srfstamp utility to stamp a current version number on a new repository (.srf) file. For information about using srfstamp, see "To test repository components for consistency" on page 163. The version number of your repository is displayed as User Version when you choose Help > About Repository from the application-level menu in your Siebel application.

To display version information for existing components

1 From the application-level menu, select View > Site Map > Siebel Anywhere Administration.

2 From the Show drop-down list, select Upgrade Components.

The Upgrade Components list appears. Table 9 on page 43 describes the information available in this list.

CAUTION: Do not use the Upgrade Components list to modify information about an existing component—modifying information in the list can prevent version checking from working properly. If you need to modify version information for an existing component, use the Upgrade Kit Wizard, as described in Chapter 3, "Defining Upgrade Kits." If you want to modify other component characteristics, create a custom component with the characteristics you need, as described in "Setting Up Custom Siebel Anywhere Upgrade Components" on page 59.

Table 9. Fields in the Upgrade Components List

Name	Comment
Component Type	The type of component kit; for example, Siebel Executables or third-party software.
Locate Information	Information used by Siebel Anywhere when locating version information for the subscriber's currently installed component. For more information about how Siebel Anywhere uses this setting, see "About Monitoring and Verifying Siebel Anywhere Version Numbers" on page 59.
Locate Method	Method used by Siebel Anywhere to locate version information for the subscriber's currently installed component. For more information about how Siebel Anywhere uses this setting, see "About Monitoring and Verifying Siebel Anywhere Version Numbers" on page 59.
Max Version	The latest version of the component that is available for running the application in read/write mode.
Min Version	The earliest version of the component that is acceptable for running the application in read/write mode.
Name	Name that identifies the component for Siebel Anywhere.

Table 9. Fields in the Upgrade Components List

Name	Comment
Version Information	Information used by Siebel Anywhere when checking the version of the subscriber's currently installed component. For more information about how Siebel Anywhere uses this setting, see "About Monitoring and Verifying Siebel Anywhere Version Numbers" on page 59.
Version Method	Method used by Siebel Anywhere to check the version for the subscriber's currently installed component. For more information about how Siebel Anywhere uses this setting, see "About Monitoring and Verifying Siebel Anywhere Version Numbers" on page 59.

Planning Version Settings for a New Upgrade Kit

The information you gather about current version settings lets you plan version settings for your new upgrade kit.

NOTE: When you run the Upgrade Kit Wizard to define your new upgrade kit, you will need to supply the version settings described in this section.

The following tables contain guidelines for determining the version values you should use in a variety of situations.

- Table 10 on page 45 provides guidelines for choosing your New Version value.
- Table 11 on page 46 provides guidelines for choosing your Minimum Old Version and Maximum Old Version values.
- Table 12 on page 48 provides guidelines for choosing your Component Minimum Version and Component Maximum Version values (also known as Min Version and Max Version)

You can use these tables as worksheets by printing them out and filling in the values that you will use when you define your upgrade kit.

The New Version value specifies the version number that the component being upgraded will have after the upgrade kit is used. Look in the Situation column of Table 10 to find a description of your situation, and read the adjacent guidelines.

Table 10. New Version Planning Worksheet for Upgrade Component ______________

Version Setting	Situation	Value Guidelines	Your Value
New Version (Identifies the version number of the component in the upgrade kit)	New component	Set New Version to 1.	1
	Upgrade to existing component	Set New Version to $n + 1$, where n is the Siebel Anywhere version number of the latest version of the component previously installed within your Siebel System. To display previously installed versions, see "To display version information for existing components" on page 42.)	
	Upgrade to existing component after a major Siebel upgrade	Make sure that any components provided in the major upgrade have Siebel Anywhere version numbers equal to or greater than preupgrade components. You may need to stamp new numbers on the components to achieve this, particularly for SRF files. For more information, see "Testing for Upgrade Kit Component Consistency" on page 163. When component version numbering is continuous across the upgrade, use instructions in "Upgrade to existing component," in previous row of this table.	
	Replacing a defective kit that has been distributed and deactivated	Set New Version to the same value you assigned to the defective kit.	

The Minimum Old Version and Maximum Old Version values specify the range of component versions that subscribers must have to download and install the upgrade kit. Look in the Situation column of Table 11 to find a description of your subscribers' situation, and read the adjacent guidelines for choosing values.

Table 11. Minimum Old Version and Maximum Old Version Planning Worksheet for Upgrade Component ________________

Version Setting	Situation	Value Guidelines	Your Value
Minimum Old Version (Determines who can use the kit)	No component versions are prerequisites for subscribers using upgrade kit or all needed prerequisites are included in this kit.	Leave blank.	NULL
	Subscribers are upgrading a history-independent component, such as SRF, executable, or database schema.	Automatically set to NULL. Cannot be changed.	NULL
	Subscribers are upgrading a CFG file.	It is recommended that you leave this setting blank.	
	Subscribers are upgrading a customer revision component.	It is recommended that you accept the default value for this setting and Maximum Old setting, to make sure that your users download and install every kit of this type, without skipping any of them.	
	Subscribers are required to have a prior version of component.	Set to earliest component version that can download and install the new kit.	
	You are replacing a defective kit that has been distributed and deactivated.	Set Minimum Old Version to the same value as you used in the defective kit.	

Table 11. Minimum Old Version and Maximum Old Version Planning Worksheet for Upgrade Component ______________.

Version Setting	Situation	Value Guidelines	Your Value
Maximum Old Version (Determines who can use the kit)	No component versions are prerequisites for subscribers using upgrade kit or all needed prerequisites are included in this kit.	Leave blank.	NULL
	Subscribers are upgrading a history-independent component, such as SRF, executable, or database schema.	Automatically set to NULL. Cannot be changed.	NULL
	Subscribers are upgrading a CFG file.	It is recommended that you leave this setting blank.	
	Subscribers are upgrading a customer revision component.	It is recommended that you accept the default value for this setting and Minimum Old setting, to make sure that your users download and install every kit of this type, without skipping any of them.	
	Subscribers are required to have a prior version of component.	Set to latest component version that can download and install the new kit. This value is always less than the value of New Version.	
	You are replacing a defective kit that has been distributed and deactivated.	Set Maximum Old Version to the same value as you used in the defective kit.	

The Component Minimum Version and Component Maximum Version values specify the range of versions for the component that is being upgraded that can still be used in your Siebel implementation. Any users who have component versions outside the defined range will be required to upgrade. Look in the Situation column of Table 12 to find a description of your situation, and read the adjacent guidelines for choosing values.

Table 12. Component Minimum Version and Component Maximum Version Planning Worksheet for Upgrade Component _______________

Version Setting	Situation	Value Guidelines	Your Value
Component Minimum Version (same as Min Version in Apply Upgrade Kit Version Information dialog box) (Determines which component versions can still be used)	Any version of component is acceptable—upgrade is optional for all.	Leave blank.	
	Some prior versions of component are acceptable—upgrade is optional for some versions, required for other versions.	Set to earliest component version acceptable for running the software in read/write mode.	
	No prior versions of component are acceptable—upgrade is required for all.	Set to New Version value. (Automatic if you select the Required Upgrade Kit check box in the Upgrade Kit Wizard.)	
Component Maximum Version (same as Max Version in Apply Upgrade Kit Version Information dialog box (Determines which component versions can still be used)	Any version of component is acceptable—upgrade is optional for all.	Leave blank.	
	Some prior versions of component are acceptable—upgrade is optional for some versions, required for other versions.	Set to latest component version acceptable for running the software in read/write mode.	
	No prior versions of component are acceptable—upgrade is required for all.	Set to New Version value. (Automatic if you select the Required Upgrade Kit check box in the Upgrade Kit Wizard.)	

Other Preliminary Upgrade Tasks for Specific Upgrade Kit Types

The following paragraphs describe additional preliminary tasks to perform for specific upgrade kit types.

Preliminary Tasks for Siebel Database Schema Upgrade Kits

Perform the following tasks before creating a Siebel Database Schema upgrade kit:

- Make sure the ODBC data source correctly points to the server database that has the modified database definition.
- Determine the values to use for the following settings. For brief descriptions of these settings, see Table 17 on page 76.
  - User Name (for DBA)
  - User Password (for DBA)
  - Schema Qualifier
  - Privileged User ID
  - Privileged User Password
  - Table Space
  - Index Space
- Use SQL queries on your server database to obtain values for the following parameters specific to your database platform:
  - 16K Table Space
  - 32K Table Space
  - Table Group File
- If you are operating in a DB2 environment, drop all customized views and triggers before you run the Upgrade Kit Wizard to define a database schema upgrade kit. Otherwise, the attempt to create the kit will fail.

For more information about the overall process of deploying a database schema upgrade, see “Performing Database Schema Updates” on page 146.

Preliminary Tasks for Siebel Repository File Upgrade Kits

Perform the following tasks before creating either a Siebel Client Repository File upgrade kit or a Siebel Server Repository File upgrade kit:

- Obtain or create the new repository (.srf) file.
- Place the new repository file in a network location that is accessible to the Siebel Server where the Upgrade Kit Builder will be running.
- Make a note of the UNC path to the network location where you placed the .srf file.

Preliminary Tasks for Third-Party Software Upgrade Kits

Perform the following tasks before creating a Third-Party upgrade kit:

- Locate or prepare the executable file or script that will be executed on the subscriber’s machine when the upgrade kit is installed. Make a note of any input parameters required by the executable file or script.
- Place the executable file on the Siebel Server where the Upgrade Kit Builder is enabled, or in a network location that is accessible to that server.
- Make a note of the UNC path to the network location where you placed the executable file.
- Determine the location where the third-party software should be installed on the subscriber’s machine.

Preliminary Tasks for Siebel Customer Revisions Upgrade Kits

Perform the following tasks before creating a Siebel Customer Revisions upgrade kit:

- Locate or prepare the executable file or script that will be executed on the subscriber’s machine when the upgrade kit is installed. (For example, this might be a reset.bat script file that resets browser security settings to the values that allow the Mobile Web Client to function properly.) Make a note of any input parameters required by the executable file or script.
- Locate any other files to be included in the upgrade kit, and make a note of the locations to which they should be installed on the subscriber’s machine.

Determining Required Upgrade Sequences

You may sometimes need to use more than one upgrade kit to complete an upgrade. For example, client software in a Siebel maintenance release or patch may consist of a base component and a language-specific component. The base component would require a Siebel Client Executable upgrade kit, and the language-specific component would require a Siebel Client Executable_[*language-code*] upgrade kit.

In cases involving multiple upgrade kits, the kits may need to be installed in a specific sequence. (For Siebel maintenance releases, the base upgrade kit must be installed before any language-specific upgrade kit.) It is possible to automate this process by making one kit dependent on the prior installation of another kit. You can specify this dependency before activating the second kit in the sequence. For instructions on how to do this, see "Controlling the Order of Kit Installation" on page 109.

NOTE: If you plan to specify a required upgrade sequence, do not use the Upgrade Kit wizard to activate the kits involved.

Planning Upgrade Test Details

It is important to plan your upgrade kit testing ahead of time, to make sure that you create any needed infrastructure elements and choose appropriate settings when you create the upgrade kit.

The following general recommendations are useful for most test plans:

- Create all upgrade kits as optional kits. This facilitates testing by letting you request an upgrade at your convenience. (A required kit may or may not prompt you to upgrade when you start the application, depending on version requirements and test client version.) After you have verified that an optional upgrade kit installs correctly, you can change it to a required kit, if you wish, and retest its installation using another test client.
- Distribute a new upgrade kit to a test configuration (such as the Test Client Configuration) before distributing it to production configurations. If necessary, create such a test configuration ahead of time, and make sure that it has appropriate test employee logins assigned to it, either by means of configuration files or dynamic assignments.

- Test each upgrade kit with both remote and connected clients.

Creating Needed Infrastructure Elements

This section contains information about creating or modifying the infrastructure elements that are prerequisites for successful creation and deployment of an upgrade kit. It also contains information about verifying Siebel File System connections, which are another essential part of your infrastructure.

Creating needed infrastructure elements is a step in Process of Planning and Preparing for Kit Creation on page 33.

The information in this section is divided into the following subsections:

- "Modifying and Creating Siebel Anywhere Configurations" on page 52
- "Setting Up Custom Siebel Anywhere Upgrade Components" on page 59
- "Verifying Connections to the Siebel File System" on page 64
- "Verifying Availability of Siebel Anywhere" on page 64

Modifying and Creating Siebel Anywhere Configurations

This section contains information about modifying and creating Siebel Anywhere configurations. The information is divided into the following subsections:

- "Adding Components to a Configuration" on page 53
- "Removing Components from a Configuration" on page 53
- "Creating a New Configuration" on page 54
- "Assigning Employees to a Configuration" on page 56

NOTE: If a new configuration is created, a configuration is split or merged with another configuration, or the name of an existing configuration is changed, the ComponentName parameter on the corresponding Siebel clients must also be updated so that the clients can detect any upgrades.

Adding Components to a Configuration

At times, you may need to add components to an existing configuration. Any custom component that you create must be added to a configuration before you can use it to distribute upgrades. The following procedure describes how to perform this task.

Adding components to a configuration is a step in Process of Limiting Distribution of an Upgrade Kit on page 117.

To add a component to a configuration

1. From the application-level menu, select View > Site Map > Siebel Anywhere Administration.
2. From the Show drop-down list, select Configurations.
3. In the Upgrade Configurations list, select the configuration to which you want to add a component.
4. In the Related Components list, click New.
5. In the Upgrade Components dialog box, double-click the component you want to add.

   The component appears, highlighted, in the Related Components list.

Repeat Step 3 through Step 5 for any additional components you want to add.

Removing Components from a Configuration

At times, you may need to remove components from an existing configuration.

To remove a component from a configuration

1. From the application-level menu, select View > Site Map > Siebel Anywhere Administration.
2. From the Show drop-down list, select Configurations.
3. From the Upgrade Configurations list, select the configuration from which you want to remove a component.
4. In the Related Components list, select the component you want to remove.

5 In the Related Components list, click the menu button and select Delete Record.

6 In the dialog box, confirm that this record is the record you want to delete.

Repeat Step 3 through Step 6 for any additional components to be removed from this configuration.

Creating a New Configuration

In most cases, the configurations provided with Siebel Anywhere are sufficient. However, you can create new configurations for special situations or to represent different installed clients within your company.

Creating a new configuration is a step in Process of Limiting Distribution of an Upgrade Kit on page 117.

For example, if everyone in your company uses Siebel Sales and you need to distribute certain upgrades to employees in remote offices separately from the rest of the company, you would create a new configuration to accommodate this situation. The employees in the remote offices would be temporarily associated with the new configuration so that you could distribute the special upgrade just to them. (See “Assigning Employees to a Configuration” on page 56 for details on associating specific employees with a configuration.)

Also, you may need to create different configurations based upon language usage. If there is a set of the users in your company only using English (ENU) and another set using both English (ENU) and German (DEU), you should create two different configurations.

If you need to create a new configuration for long term use (as in language usage), make sure that every client CFG file is appropriately updated.

NOTE: The recommended method for creating a new configuration is to copy an existing configuration and modify the copy, as this method minimizes the possibility for error. The following procedure describes the use of this method. However, it is also possible to use standard Siebel application techniques to create a new record and fill in the necessary fields.

To create a new configuration

1. From the application-level menu, select View > Site Map > Siebel Anywhere Administration.
2. From the Show drop-down list, click Configurations.
3. In the Upgrade Configurations list, select an existing configuration record that resembles the configuration you want to create, and then click the menu button and select Copy Record.

   A highlighted copy of the record that you selected appears.
4. Modify the fields in the copied record to meet your requirements.

   Some fields are described in the following table.

   CAUTION: Limit the Name field to 91 characters or less. Exceeding the 91-character limit in the Name field causes the synchronization process to fail.

Field	Comment
Name	The name of the configuration.
Active	When this check box is selected, it indicates that the configuration is to be version-checked. When you create a new configuration by copying an existing configuration, this check box is cleared by default. Be sure to select it before using the new configuration.
Component Type	This value is either client or server configuration.
Comments	Comments can be entered here.

5. Add appropriate Related Components to the new configuration you just created.

   To do this, see "To add a component to a configuration" on page 53.

Assigning Employees to a Configuration

The purpose of assigning employees to configurations is to handle uncommon situations, such as having one particular employee retrieve and test a kit. In most cases, testing is done using special test accounts and test configurations, and regular employees are associated with a specific configuration based on a ComponentName entry in the CFG file of an application.

Assigning employees to a configuration is a step in Process of Limiting Distribution of an Upgrade Kit on page 117.

For example, in the Siebel Sales application the ComponentName in the default CFG file (siebel.cfg) would be Siebel Sales Client by default. This means that everyone using the Siebel Sales application is automatically associated with the Siebel Sales configuration.

Assigning employees to a configuration in the Upgrade Employee Configuration applet in the Employee view can be used in place of the entry in the CFG file, or as a method for overriding the entry in the CFG file.

CAUTION: It is strongly recommended that you run *only* the Siebel Smart Web Client for user accounts that have Siebel administrator responsibilities, to make sure that administrative tasks are performed while connected to the HQ server, and to make sure that the administrator is not prevented from logging in for reasons related to component versions. However, *if* you run the Siebel Dedicated Client for any administrator account, it is strongly recommended that the account *not* be associated with a Siebel Anywhere configuration. This precaution also helps prevent version-related login problems.

When associating employees to configurations, keep in mind the following recommendations:

- Do not dynamically assign the System Administrator to a configuration.
- Do not dynamically assign Siebel Tools users to a configuration.

Siebel Anywhere *will not* allow an Employee to be dynamically associated with more than one configuration. For example, if the employee JSMITH is dynamically associated with Configuration A and the Siebel administrator then associates JSMITH with Configuration B, JSMITH will automatically be disassociated from Configuration A and only dynamically associated with Configuration B.

CAUTION: If an employee is accidentally associated with an incorrect configuration, that employee is disassociated from the correct configuration, and may not have access to upgrades that are distributed to the correct configuration. For this reason, it is best to correct the configuration assignment without delay.

If an employee will use more than one installation of the Siebel client in the same Siebel eBusiness implementation, do not associate that employee with a configuration. For example, if the Employee JSMITH chooses to install and use both Siebel Call Center and Siebel Sales, then that employee should not be dynamically associated with a Siebel Anywhere configuration. The reason is the upgrade kit for one configuration will likely be different than the upgrade kit for another configuration.

In this example, the CFG file would be different for the Siebel Call Center and Siebel Sales configurations. If JSMITH were dynamically associated to the Call Center configuration and logged on using the Siebel Sales client, the version check would only detect that there was a new upgrade kit and would not differentiate between the two installations of the Siebel client.

If the login is specified under an Employees view, then Siebel Anywhere does not check the CFG file any further and only checks the version of the component listed under the associated configuration for that client. Typically, Siebel Anywhere groups users by the product they use, for example Call Center or Sales Client, which is determined by the CFG file the user uses.

NOTE: The first time a Mobile Web Client connects to the Remote Server to initialize the local database, Siebel Anywhere does a version check for the client using the Upgrade Configuration specified in the CFG file. Siebel Anywhere cannot detect a dynamic configuration assignment at this time. However, after the Mobile Web Client successfully initializes the local database, Siebel Anywhere can detect any dynamic configuration assignment for that client.

To assign an employee to a configuration

1. From the application-level menu, select View > Site Map > Siebel Anywhere Administration.
2. From the Show drop-down list, click Employees.
3. From the Upgrade Configurations list, select the configuration to which you want to add an employee.
4. In the Upgrade Employee Configuration list, click New.

   A new record appears.
5. In the Login field, click the select button.

   From the Pick Employee dialog box, select the employee you want to add, and click OK.

Repeat Step 3 through Step 5 to assign additional employees to this configuration.

NOTE: When it initializes the local database for the first time, Siebel Anywhere uses the configuration in the CFG file. It does not use the configuration defined in the Employees view under the Siebel Anywhere Administration Screen.

Removing Employees from a Configuration

Use the following procedure to end an employee's dynamic configuration assignment, which returns that user to the original configuration assignment defined in the user's CFG file.

Removing employees from a configuration is a step in Process of Limiting Distribution of an Upgrade Kit on page 117.

To remove an employee from a configuration

1. From the application-level menu, select View > Site Map > Siebel Anywhere Administration.
2. From the Show drop-down list, click Employees.

3. In the Upgrade Configurations list, select the configuration from which you want to remove an employee.
4. In the Upgrade Employee Configuration list, select the record for the employee you want to remove from the configuration, and then click the menu button and select Delete Record.

Setting Up Custom Siebel Anywhere Upgrade Components

This section contains information about creating custom components. Siebel eBusiness Applications provide many predefined upgrade components, but you can create additional components if you need them. For example, it would be possible to create an upgrade component to run a batch program in the form of a .bat or .exe file.

Siebel Anywhere can upgrade custom components, just as it does the predefined components provided with Siebel eBusiness Applications. For correct operation, however, you must define how Siebel Anywhere will monitor and verify the version number for any custom component. The following paragraphs describe how Siebel Anywhere monitors and verifies version numbers, followed by instructions for creating a custom component:

- "About Monitoring and Verifying Siebel Anywhere Version Numbers"
- "Creating a Custom Component" on page 62

About Monitoring and Verifying Siebel Anywhere Version Numbers

Siebel Anywhere uses information from the Locate Method, Locate Information, Version Method, and Version Information settings to determine how it needs to check the version of a component. Depending on the component, Siebel Anywhere uses some or all of these settings.

For information about when a version check occurs for each type of subscriber, see Table 4 on page 22.

The following subsections describe how the Locate Method and Version Method settings are used, along with the Locate Information and Version Information settings. An example follows.

Locate Method

The purpose of the Locate Method setting is to build a path to a file or other location, such as a registry. This value is then passed to the Version Method to read version information. Table 13 describes some available values for Locate Method, each of which specifies a different way to locate version information.

NOTE: For some Locate Method values, you will need to specify additional information in the Location Information setting.

Table 13. Locate Method Values

Value	Comment
Siebel Root/Siebel Home	Determines location based on the client's Siebel root directory. Locate Information is ignored in this case. (For example, this method would be used for Siebel Upgrade Wizard components.) Both server and client use this to retrieve the value of Siebel Root.
Registry	Determines location based on information in the Microsoft Windows registry. Locate Information would contain the path to read in the registry. (For example, this method would be used for Third Party - Microsoft Word components.)
Environment	Determines the location on the client by reading an environment variable. Locate Information would contain the name of the environment variable to read.
CCF	Determines location on server from a set of common core facility (CCF) parameters. Locate Information would contain the value from the CCF program context. (For example, this method would be used for a Siebel Server Customer Revision component.)
CFG	Determines location based on reading the client's active CFG file. Locate Information would contain the section and entry to read from the CFG file, plus an optional value to append to the value read from the CFG file. (For example, this method would be used for a Siebel Client Customer Revision component.)

Version Method

This setting provides additional information that is used in conjunction with Locate Method to read the version of a file. Table 14 describes the available values for Version Method, each of which specifies a different way to determine the version of the component.

NOTE: Some Version Method values require you to specify additional information in the Version Information setting.

Table 14. Version Method Values

Value	Comment
File Version	Determines version based on reading the version of a file. Version Information would contain the name of the file to version check.
Registry	Determines version based on reading the version from the registry. Version Information would contain the path to read in the registry.
DLL	Determines the version based on executing an entry point in a DLL file. Version Information would contain the name of the DLL file and the name of the entry point. For example, `bin\sslcver.dll,VersionString` executes the function VersionString in the file bin\sslcver.dll.
Database	Determines the version based on reading the Siebel Database Schema. Version Information is ignored in this case.
CFG	Determines version based on reading the client’s active CFG file. Version Information would contain the section and entry to read from the CFG file, plus an optional value to append to the value read from the CFG file. (For example, this method would be used for a Siebel Client Customer Revision component.)
SRF	Determines the version based on reading the SRF. Version Information would contain the section name and the entry name from the active CFG file to be read to determine the name of the SRF.

Example: How Siebel Anywhere Uses Locate and Version Methods

The following example shows how Siebel Anywhere checks component versions, using the Locate Method and Version Method settings.

Table 15 shows information that appears in the Upgrade Components list for the Siebel Client Customer Revisions_ENU component, along with comments explaining how each setting is used.

Table 15. Example of Locate and Version Method Values

Field Name	Value	Comments
Name	Siebel Client Customer Revisions_ENU	Name of the component.
Locate Method	CFG	Information about the location of component version information is stored in the client's active CFG file.
Locate Information	Siebel,ClientRootDir,bin\enu\clntrev.cfg	Information about the location of component version information is stored in the ClientRootDir entry in the [Siebel] section of the client's CFG file. To find the actual version information, append \bin\enu\clntrev.cfg to the value in the ClientRootDir entry. For example, if the ClientRootDir entry is c:\siebel, the path to the version information would be c:\siebel\bin\enu\clntrev.cfg.
Version Method	CFG	Version information is stored in the CFG file specified by the Locate Method and Locate Information settings.
Version Information	Siebel,Version	Version information is stored in the Version entry in the [Siebel] section of the specified file.

Creating a Custom Component

Siebel Anywhere functionality allows you to define your own custom components, if necessary.

The Siebel administrator *must define* how Siebel Anywhere will monitor and verify the version number for a custom upgrade component. Siebel Anywhere maintains an individual version number for each upgrade component. The version number must be maintained on a Siebel Anywhere subscriber to compare it to the version number in the database. The Siebel administrator can maintain the version number in the application, in a file, or in the Windows registry.

CAUTION: It is strongly recommended that the Siebel administrator use the Copy Record functionality to copy existing upgrade components and simply rename the new upgrade component so that the correct parameters are used for the new upgrade component. This method is described in the following procedure. Make sure that you also update the Locate and Version columns appropriately.

To create a custom component

1. From the application-level menu, select View > Site Map > Siebel Anywhere Administration.
2. From the Show drop-down list, click Upgrade Components.
3. In the Upgrade Component list, select an existing component that resembles the component you want to create, and then click the menu button and select Copy Record.

   A highlighted copy of the record that you selected appears.

4. Modify the fields in the copied record to meet your requirements.

   Use a meaningful name to describe the function of the component. Limit the Name field to 91 characters or less.

   CAUTION: Exceeding the 91-character limit in the Name field causes the synchronization process to fail.

   Make sure the Min Version and Max Version fields are blank. This information is filled in when the kits are applied.

5. For any configuration that you will upgrade using your new custom component, you must specify that the component is a related component for the configuration. For instructions, see "Adding Components to a Configuration" on page 53.

Verifying Connections to the Siebel File System

The Siebel File System on the server stores the newly created upgrade kits. It is important to verify settings for connections to the Siebel File System. The connection settings vary depending upon the type of client. In either case these are essential to downloading the kits.

Mobile Web Clients connect to the Siebel File System through the Siebel Server. Therefore, the Siebel File System parameter in Synchronization Manager should be set to the same location as the File System parameter in the CFG file of the user who created the kit.

Dedicated Web Clients connect directly to the Siebel File System. Therefore, the File System parameter in the ServerDataSrc of the client's CFG file should be set to the appropriate location. Also, the user should have read/write access to that directory. Test for this by having the user open an attachment, and if that is successful, then the connection to File System is set correctly.

Verifying Availability of Siebel Anywhere

The Siebel Anywhere component group must be available to allow the creation of upgrade kits. The following procedure describes how to verify the availability of this component group.

To check the availability of Siebel Anywhere

1. From the application-level menu, select View > Site Map > Server Administration.
2. In the Show drop-down list, select Servers.
3. In the Servers list, select a Server that you want to inspect.
4. Click the Server Component Groups view tab, and select the Siebel Anywhere component group.

5. Verify that Run State is set to Online.

   If Run State is not Online, see *Siebel Server Administration Guide* for information about administering component groups, including instructions for enabling a component group.

Preparing Upgrade Kit Contents

Preparing to create an upgrade kit involves gathering the software, files, or database schema updates required for the kit. It can also involve preparing simple batch scripts. The specific process to follow depends on the type of components you are planning to upgrade.

Preparing upgrade kit contents is a step in "Process of Planning and Preparing for Kit Creation" on page 33.

NOTE: Do not use the upgrade kit type Customer Revisions for upgrade kits containing a Siebel SRF or CFG file. Instead, use the Siebel Client Repository File and Siebel Client CFG kit types, respectively, for these upgrades. This will allow proper version checking.

The following sections describe specific steps to take for certain upgrade kit types:

- "Preparing Contents for a Siebel Executables Upgrade Kit" on page 65
- "Preparing Contents for Repository or Third-Party Upgrade Kits" on page 68

Preparing Contents for a Siebel Executables Upgrade Kit

You can use the Siebel Executables component type to deliver Siebel maintenance releases (patches) or additional language packs to Mobile or Dedicated Web Clients.

Siebel maintenance releases consist of a set of language-independent files (called *base* files) and one or more sets of language-specific files. Base files and language-specific files require different upgrade kits:

- Siebel Client Executable upgrade kits are used to distribute base files.

- Siebel Client Executable_[*language-code*] upgrade kits are used to distribute language-specific files.

NOTE: The base upgrade kit must be installed before language-specific kits are installed. If you wish, you can make the language-specific kits technically dependent on the base kit, so this will be accomplished automatically. For more information see "Controlling the Order of Kit Installation" on page 109. For an overview of the entire process of distributing a Siebel maintenance release, see "Distributing a Siebel Maintenance Release (Patch)" on page 138. For tips on distributing language packs alone, see "Distributing Additional Language Packs" on page 140.

The following procedure describes how to prepare upgrade kit contents for base and language-specific portions of a Siebel maintenance release.

To prepare Siebel maintenance release files for inclusion in upgrade kits

1. On your maintenance release CD, locate and inspect the contents of the \seaw folder.

   You should see individual files such as install.exe, data1.cab, and data2.cab. You should also see several subfolders. Some of these are language-independent folders, and some are for specific languages, such as ENU, DEU, and FRA.

2. Create a network-visible directory to hold base files, such as \\machine\seaw\base.

3. Copy all language-independent files and subfolders from the CD directory \seaw to the base directory you created in the previous step.

4. For each language used in your Siebel system, copy the language-specific folder to its own network-visible directory.

   For example, you might copy the CD directory \seaw\ENU to \\machine\seaw\ENU.

   CAUTION: Make sure that you use separate directories for base files and for each language's set of language-specific files. The directories for language-specific files should *not* be subdirectories of the directory that contains base files. Mixing these different file types may prevent proper installation of part of the maintenance release or may result in unnecessarily large upgrade kits.

5. If you want to change the default installation path that InstallShield will display to subscribers during the installation of the maintenance release, change the appropriate setting in the following siebel.ini files:

   - Siebel.ini file in the base directory you created in Step 2 of this procedure
   - Siebel.ini file in each language-specific directory you created in Step 4 of this procedure

   For information on siebel.ini file syntax, or for instructions on disabling the InstallShield dialog box for the installation path, see the Packager information in *Siebel Web Client Administration Guide*.

   If you do not change the siebel.ini file setting, InstallShield will default the client installation path to c:\sea\client, which the subscriber will need to set to the current Siebel client installation location.

For detailed information about defining the upgrade kits for a Siebel maintenance release, see "Defining a Siebel Client Executables Upgrade Kit" on page 80. For an overview of the complete process for distributing a Siebel maintenance release, see "Distributing a Siebel Maintenance Release (Patch)" on page 138.

Preparing Contents for Repository or Third-Party Upgrade Kits

To prepare for creating an upgrade kit for a Siebel repository file, third-party application, or other non-Siebel file, copy the files to a directory on the Siebel Server from which you will run the Upgrade Kit Builder server component, or to a directory that is accessible from that server.

NOTE: The SRF upgrade kit *must* contain the entire SRF file. (Siebel Anywhere does not currently support the use of *delta* SRF files, which contain only changes.)

Siebel Anywhere can install third-party applications or other files using one of the following methods:

- Executing a batch script or installation program.
- Copying files to a specified location.

Before deploying a kit through Siebel Anywhere, make sure that any files, scripts, or other programs required to install third-party applications contain the necessary data and are fully tested.

Defining Upgrade Kits 3

Defining an upgrade kit is the process of running the Upgrade Kit Wizard and entering data concerning a single Siebel Anywhere component that is to be upgraded. After all necessary data has been provided, the Upgrade Kit Wizard invokes the Upgrade Kit Builder, which uses the gathered data to build the upgrade kit.

NOTE: It is important to gather the data to be entered before you run the Upgrade Kit Wizard. For information on planning your upgrade kit and gathering the necessary data, see Chapter 2, "Upgrade Planning and Preliminary Tasks." For general information about the Upgrade Kit Wizard and the Upgrade Kit Builder, see "Siebel Anywhere Wizards and Utilities" on page 14.

This chapter provides general instructions for running the Upgrade Kit Wizard, followed by specific instructions for defining several types of upgrade kits, and instructions for viewing upgrade kit properties, after the kits have been defined:

- "Running the Upgrade Kit Wizard" on page 70
- "Defining a Siebel Configuration File (CFG) Upgrade Kit" on page 71
- "Defining a Siebel Database Schema Upgrade Kit" on page 74
- "Defining a Siebel Client Executables Upgrade Kit" on page 80
- "Defining a Siebel Repository File Upgrade Kit" on page 86
- "Defining a Third-Party Software Upgrade Kit" on page 89
- "Defining a Siebel Customer Revisions Upgrade Kit" on page 94
- "Defining a Custom Component Upgrade Kit" on page 99

For language-specific kits, use the instructions for the appropriate kit type. For example, use instructions for defining a CFG kit to define a language-specific CFG kit.

NOTE: If your upgrade includes multiple components, use the instructions in this chapter to create an upgrade kit for each component.

After you define your upgrade kit, you must proceed to activate, apply, and distribute it. For information on these tasks, see Chapter 4, “Activating, Applying, and Distributing Upgrade Kits.”

Defining upgrade kits is a step in Process of Limiting Distribution of an Upgrade Kit on page 117.

Running the Upgrade Kit Wizard

All upgrade kits must be defined using the Upgrade Kit Wizard. This section provides general instructions for running the Upgrade Kit Wizard. For background information about the Upgrade Kit Wizard, see “The Upgrade Kit Wizard” on page 15.

NOTE: The following procedure describes how to start the Upgrade Kit Wizard for any type of upgrade kit. Subsequent steps and information required vary depending on the type of kit.

To start the Upgrade Kit Wizard

1. From the application-level menu, select View > Site Map > Siebel Anywhere Administration.
2. From the Show drop-down list, click Upgrade Kits.

   The Upgrade Kits view appears.
3. Click Auto Create to start the Upgrade Kit Wizard.

   The Upgrade Kit Wizard - Upgrade Component page appears.

4. Follow the prompts to specify all parameters necessary to define your upgrade kit.

   The following sections of this chapter provide instructions for individual upgrade kit types. For a list of these sections, see Chapter 3, “Defining Upgrade Kits.”

Defining a Siebel Configuration File (CFG) Upgrade Kit

This section provides specific instructions for defining a Siebel Configuration File upgrade kit using the Upgrade Kit Wizard. Kits of this type are used to upgrade Siebel CFG files, and are always language-specific.

To define a Siebel Configuration File upgrade kit

1. Gather the information you will need, as described in Chapter 2, “Upgrade Planning and Preliminary Tasks.”
2. Start the Upgrade Kit Wizard using the instructions in “Running the Upgrade Kit Wizard” on page 70.
3. Use the information you have gathered and the information in Table 16 on page 72 to respond to the prompts in the Upgrade Kit Wizard.
4. When you have finished specifying data about the upgrade kit you are defining, click Finish to pass the request to the Upgrade Kit Builder and to exit from the Upgrade Kit Wizard.

   A new row for the new upgrade kit appears in the Upgrade Kits list, with Status set to Request Submitted. For more information about the kit information available in this list and other lists, see “Viewing Upgrade Kit Properties” on page 100.

   After you define your upgrade kit, you must proceed to activate, apply, and distribute it. For information on these tasks, see Chapter 4, “Activating, Applying, and Distributing Upgrade Kits.”

Information in Table 16 is presented in approximately the sequence used by the Upgrade Kit Wizard.

Table 16. Upgrade Kit Wizard Elements for a Siebel Configuration File Upgrade Kit

Wizard Element	Element Type	Comments
Upgrade Component	Drop-down list	Name of the component the upgrade kit will install or upgrade. Typical values for configuration files include Siebel Sales CFG_ENU and Siebel Call Center CFG_ENU.
Files to Add	Text field	Name of the CFG file to include in the upgrade kit. This field is populated either by entering a file name and path, or by clicking Browse and choosing a file from the directory listings displayed.
Browse	Button	Displays a standard dialog box for browsing and choosing a file.
Minimum Old Version	Text field	Earliest component version that can download and install the upgrade kit. When this field is blank, indicates that there are no prerequisite versions required for using the kit. Defaults to the current component version recorded in the database. For more information about choosing version values, see "Determining Version Setting Values" on page 41.
Maximum Old Version	Text field	Latest component version that can download and install the upgrade kit. When this field is blank, indicates that there are no prerequisite versions required for using the kit. For more information about choosing version values, see "Determining Version Setting Values" on page 41.
New Version	Text field	Version number that the component being upgraded will have after the upgrade kit is installed. Default value is 1 greater than the current version for the component to be upgraded. For more information about choosing version values, see "Determining Version Setting Values" on page 41.

Table 16. Upgrade Kit Wizard Elements for a Siebel Configuration File Upgrade Kit

Wizard Element	Element Type	Comments
Activate Upgrade Kit	Check box	When this check box is selected, the files to be included in the upgrade kit will be compressed into a single archive on the Siebel File System automatically. Activation can also be performed manually, as described in Chapter 4, “Activating, Applying, and Distributing Upgrade Kits.” For most upgrade kits, it is recommended that you select this check box. However, if you are creating an upgrade kit that is dependant on another upgrade kit, be sure to clear this check box. For information about working with dependent kits, see “Controlling the Order of Kit Installation” on page 109.
Apply Versions	Check box	Displayed only if Activate Upgrade Kit check box was selected in an earlier Upgrade Kit Wizard screen. When this check box is selected, the compiled information string in the database will be updated automatically with the component version information for this upgrade kit. Applying versions can also be performed manually, as described in Chapter 4, “Activating, Applying, and Distributing Upgrade Kits.” For most upgrade kits, it is recommended that you select this check box. However, if you are creating an upgrade kit that is dependant on another upgrade kit, or if you know that you need to specify nondefault values for Component Minimum Version or Component Maximum Version, be sure to clear this check box. For information about working with dependent kits, see “Controlling the Order of Kit Installation” on page 109.
Component Minimum Version	Read-only text field	Earliest component version acceptable for running the software in read/write mode. Displayed only if Apply Versions check box was selected in an earlier Upgrade Kit Wizard screen.
Component Maximum Version	Read-only text field	Latest component version acceptable for running the software in read/write mode. Displayed only if Apply Versions check box was selected in an earlier Upgrade Kit Wizard screen.

Table 16. Upgrade Kit Wizard Elements for a Siebel Configuration File Upgrade Kit

Wizard Element	Element Type	Comments
Required Upgrade Kit	Check box	When this check box is selected, the upgrade kit will be required regardless of previous versions installed. (Component Minimum Version and Component Maximum Version are set equal to New Version, but this change is not visible in the Upgrade Kit Wizard.) Displayed only if Apply Versions check box was selected in an earlier Upgrade Kit Wizard screen.
Upgrade Kit Title	Text field	Identifier for the upgrade kit. Defaults to Upgrade Component Name value followed by a space and the New Version value, but can be modified during the kit definition process. After the kit is defined, appears in the Name field of the Upgrade Kits list.
Comments	Text field	Available for comments about the upgrade kit. Comments entered here are displayed in the Upgrade Kits list.

Defining a Siebel Database Schema Upgrade Kit

This section provides specific instructions for defining a Siebel Database Schema upgrade kit using the Upgrade Kit Wizard.

Installing the schema upgrade kit synchronizes the logical and physical schemas on Mobile Web Client and Regional Node Server databases.

CAUTION: In the DB2 environment before creating database schema upgrade kits, you must drop all customized views and triggers. Otherwise, the upgrade kit will fail.

To define a Siebel Database Schema upgrade kit

1. Gather the information you will need, as described in Chapter 2, "Upgrade Planning and Preliminary Tasks."

2. Start the Upgrade Kit Wizard using the instructions in "Running the Upgrade Kit Wizard" on page 70.

3. Use the information you have gathered and the information in Table 17 on page 76 to respond to the prompts in the Upgrade Kit Wizard.

4. When you have finished specifying data about the upgrade kit you are defining, click Finish to pass the request to the Upgrade Kit Builder and to exit from the Upgrade Kit Wizard.

   A new row for the new upgrade kit appears in the Upgrade Kits list, with Status set to Request Submitted. For more information about the kit information available in this list and other lists, see "Viewing Upgrade Kit Properties" on page 100.

   After you define your upgrade kit, you must proceed to activate, apply, and distribute it. For information on these tasks, see Chapter 4, "Activating, Applying, and Distributing Upgrade Kits."

   NOTE: Be sure to check the log file after Upgrade Kit Builder creates a database schema kit—make sure that error messages or warnings, if any, are nonfatal.

Information in Table 17 is presented in approximately the sequence used by the Upgrade Kit Wizard.

Table 17. Upgrade Kit Wizard Elements for a Siebel Database Schema Upgrade Kit

Wizard Element	Element Type	Comments
Upgrade Component	Drop-down list	Name of the component the upgrade kit will install or upgrade. Select Siebel Database Schema.
ODBC Data Source	Text field	Name of the ODBC data source used to connect to the HQ database.
User Name	Text field	Siebel administrator login ID used to connect to the database.
User Password	Text field	Siebel administrator password used to connect to the database.
Schema Qualifier	Text field	For DB2/390 and AS/400 environments only, the name used to qualify all database objects created that are required by Siebel eBusiness Applications.
Privileged User ID	Text field	Required. User account that has the necessary database authority and privileges to perform operations required to implement Siebel, including creating, accessing, and modifying Siebel database objects and native database objects. These environments have rigid controls on user identification—accounts must correspond to a real person. For a database other than DB2/390 or AS/400, this account is the same account as table owner.
Privileged User Password	Text field	Privileged User’s password on the Regional Database. For a database other than DB2/390 or AS/400, this password is the table owner's password.
Table Space	Text field	Database table space or segment for Siebel tables. Table spaces are created during initial installation or by the DBA. Obtain this value from your DBA or through a SQL query on the server database. Not required for Oracle or MSSQL.
Index Space	Text field	Database table space or segment for Siebel indexes. Obtain this value from your DBA through a SQL query on the server database. Not required for Oracle or MSSQL.

Table 17. Upgrade Kit Wizard Elements for a Siebel Database Schema Upgrade Kit

Wizard Element	Element Type	Comments
16K Table Space	Text field	Obtain the optional parameter from your DBA or through a SQL query on the server database. This setting is specific to the DB2 database platform.
32K Table Space	Text field	Obtain the optional parameter from your DBA or through a SQL query on the server database. This setting is specific to the DB2 database platform.
Table Group File	Text field	Obtain the optional parameter from your DBA or through a SQL query on the server database. This setting is specific to the DB2/390 database platform.
Minimum Old Version	Read-only text field	Earliest component version that can download and install the upgrade kit. Automatically set to NULL for history-independent component types, including database schemas, indicating that there are no prerequisite versions required for using the kit. For more information about choosing version values, see “Determining Version Setting Values” on page 41.
Maximum Old Version	Read-only text field	Latest component version that can download and install the upgrade kit. Automatically set to NULL for history-independent component types, including database schemas, indicating that there are no prerequisite versions required for using the kit. For more information about choosing version values, see “Determining Version Setting Values” on page 41.
New Version	Text field	Version number that the component being upgraded will have after the upgrade kit is installed. Default value is 1 greater than the current version for the component to be upgraded. For more information about choosing version values, see “Determining Version Setting Values” on page 41.

Table 17. Upgrade Kit Wizard Elements for a Siebel Database Schema Upgrade Kit

Wizard Element	Element Type	Comments
Activate Upgrade Kit	Check box	When this check box is selected, the information to be included in the upgrade kit will be compressed into a single archive on the Siebel File System automatically. Activation can also be performed manually, as described in Chapter 4, "Activating, Applying, and Distributing Upgrade Kits." For most upgrade kits, it is recommended that you select this check box. However, if you are creating an upgrade kit that is dependant on another upgrade kit, be sure to clear this check box. For information about working with dependent kits, see "Controlling the Order of Kit Installation" on page 109.
Apply Versions	Check box	Displayed only if Activate Upgrade Kit check box was selected in an earlier Upgrade Kit Wizard screen. When this check box is selected, the compiled information string in the database will be updated automatically with the component version information for this upgrade kit. Applying versions can also be performed manually, as described in Chapter 4, "Activating, Applying, and Distributing Upgrade Kits." For most upgrade kits, it is recommended that you select this check box. However, if you are creating an upgrade kit that is dependant on another upgrade kit, or if you know that you need to specify nondefault values for Component Minimum Version or Component Maximum Version, be sure to clear this check box. For information about working with dependent kits, see "Controlling the Order of Kit Installation" on page 109.
Component Minimum Version	Read-only text field	Earliest component version acceptable for running the software in read/write mode. Displayed only if Apply Versions check box was selected in an earlier Upgrade Kit Wizard screen.
Component Maximum Version	Read-only text field	Latest component version acceptable for running the software in read/write mode. Displayed only if Apply Versions check box was selected in an earlier Upgrade Kit Wizard screen.

Table 17. Upgrade Kit Wizard Elements for a Siebel Database Schema Upgrade Kit

Wizard Element	Element Type	Comments
Required Upgrade Kit	Check box	When this check box is selected, the upgrade kit will be required regardless of previous versions installed. (Component Minimum Version and Component Maximum Version are set equal to New Version, but this change is not visible in the Upgrade Kit Wizard.) Displayed only if Apply Versions check box was selected in an earlier Upgrade Kit Wizard screen. Database Schema upgrade kits should be required kits when they are distributed to users in a production environment. However, it is recommended that you create and test the kit as an optional kit before making it required. For information about changing an optional kit to a required kit, see "Converting an Optional Kit to a Required Kit" on page 114.
Upgrade Kit Title	Text field	Identifier for the upgrade kit. Defaults to Upgrade Component Name value followed by a space and the New Version value, but can be modified during the kit definition process. After the kit is defined, this identifier appears in the Name field of the Upgrade Kits list.
Comments	Text field	Available for comments about the upgrade kit. Comments entered here are displayed in the Upgrade Kits list.

NOTE: To avoid unnecessary download operations, it is recommended that you keep only one upgrade kit for history-independent components, including database schema kits. Depending on your preference, you can either delete or inactivate previous kits for a history-independent component. Deleting a kit increases available space in the Siebel File System. Inactivating a kit prevents use of the kit, while keeping it available in case you need it unexpectedly.

For detailed information about using a database schema upgrade kit, see "Performing Database Schema Updates" on page 146.

Defining a Siebel Client Executables Upgrade Kit

This section provides specific instructions for defining a Siebel Client Executables upgrade kit using the Upgrade Kit Wizard. Instructions in this section apply to the following two component types:

- **Siebel Client Executables.** Used for language-independent portions of Siebel maintenance releases, known as *base* portions.

- **Siebel Client Executables_[*language-code*].** Used for language-specific portions of Siebel maintenance releases.

Each of these component types needs its own kit. For example, if you want to install a Siebel maintenance release on a Siebel system that uses both English and German, you would need at least three upgrade kits, one each for Siebel Client Executables, Siebel Client Executables_ENU, and Siebel Client Executables_DEU. The base kit must be installed before the language-specific kits. For instructions on enforcing this by making the language-specific kits dependent on the base kit, see "Controlling the Order of Kit Installation" on page 109. For a general overview of the process of deploying a Siebel maintenance release, see "Distributing a Siebel Maintenance Release (Patch)" on page 138.

The following procedure describes how to define either a Siebel Client Executables kit for the base component, or a Siebel Client Executables_[*language-code*] kit for a language-specific component.

To define a Siebel Client Executables upgrade kit (base or language-specific)

1. Gather the information you will need, as described in Chapter 2, "Upgrade Planning and Preliminary Tasks."

2. Start the Upgrade Kit Wizard using the instructions in "Running the Upgrade Kit Wizard" on page 70.

3 Use the information you have gathered and the information in Table 18 on page 82 to respond to the prompts in the Upgrade Kit Wizard.

NOTE: The Minimum Old Version and Maximum Old Version settings are automatically set to NULL for history-independent component types, including Siebel Client Executables, indicating that there are no prerequisite versions required for using the kit. The value for New Version is also automatically supplied for Siebel Client Executables upgrade kits. These settings are displayed only in the final screen of the Upgrade Kit Wizard.

4 When you have finished specifying data about the upgrade kit you are defining, click Finish to pass the request to the Upgrade Kit Builder and to exit from the Upgrade Kit Wizard.

A new row for the new upgrade kit appears in the Upgrade Kits list, with Status set to Request Submitted. For more information about the kit information available in this list and other lists, see "Viewing Upgrade Kit Properties" on page 100.

After you define your upgrade kit, you must proceed to activate, apply, and distribute it. For information on these tasks, see Chapter 4, "Activating, Applying, and Distributing Upgrade Kits."

Information in Table 18 is presented in approximately the sequence used by the Upgrade Kit Wizard.

Table 18. Upgrade Kit Wizard Elements for a Siebel Client Executables Upgrade Kit

Wizard Element	Element Type	Comments
Upgrade Component	Drop-down list	Name of the component the upgrade kit will install or upgrade: ■ For the language-independent or *base* part of a Siebel maintenance release (patch) for clients, select Siebel Client Executable. ■ For the language-specific part of a Siebel maintenance release (patch) for clients, select Siebel Client Executable_[*language-code*], such as Siebel Client Executable_ENU.
UNC Path for Master Installation	Text field	Universal Naming Convention (UNC) path to the directory that contains the files for the upgrade. The path should identify a network-accessible location. ■ For the base component of a Siebel maintenance release (patch), a typical path would be \\machine\seaw\base. ■ For a language-specific component of a Siebel maintenance release (patch), a typical path would be \\machine\seaw\ENU. ■ For a full release in which Siebel Packager has been used to create an installation package, you must choose the directory where the package was created.
Destination Directory	Text field	Specifies where the files of the upgrade kit are to be placed on the client machine.
Delete destination file when done	Check box	When this check box is selected, the upgrade kit files will be deleted, automatically, after the kit is installed. If you are defining this kit for a Siebel Client maintenance release, be sure to clear this check box.

Table 18. Upgrade Kit Wizard Elements for a Siebel Client Executables Upgrade Kit

Wizard Element	Element Type	Comments
Uninstall previous Siebel version	Check box	When this check box is selected, the Upgrade Wizard will automatically uninstall all existing Siebel applications before proceeding with installation of the upgrade. ■ If you are creating a kit for a Siebel Maintenance Release (patch), be sure to clear this check box. ■ If you are creating a kit for a complete Siebel Release (such as a kit to upgrade release 7.5 client executables to release 7.7), select this check box.
File to execute	Read-only text field	Specifies one file in the upgrade kit to be executed as part of installation of the kit. Automatically set to install.exe for this component type, indicating that install.exe will be run from the directory identified in UNC Path for Master Installation.
Enter command line arguments	Text field	Specifies any command line arguments to use when running the install.exe file. If you are defining this kit for a Siebel Client maintenance release, do *not* change the default command line arguments supplied in this field.
Major Version	Text field	Enter a value from the first part of the release number. For example, for maintenance release version 7.5.2.211, set Major Version to 7.
Minor Version	Text field	Enter a value from the second part of the release number. For example, for maintenance release version 7.5.2.211, set Minor Version to 5.
Maintenance Version	Text field	Enter a value from the third part of the release number. For example, for maintenance release version 7.5.2.211, set Maintenance Version to 2.
Patch Version	Text field	Enter a value from the fourth part of the release number. For example, for maintenance release version 7.5.2.211, set Patch Version to 211.

Table 18. Upgrade Kit Wizard Elements for a Siebel Client Executables Upgrade Kit

Wizard Element	Element Type	Comments
Vertical Code	Drop-down list	If you are using industry-specific Siebel applications, such as Siebel Consumer Sector or Siebel Financial Services, choose SIA from the drop-down list. For all other Siebel eBusiness Applications, leave the field blank.
Activate Upgrade Kit	Check box	It is recommended that you clear this check box for all Siebel Client Executables upgrade kits. If this check box is selected, the files to be included in the upgrade kit will be compressed into a single archive on the Siebel File System automatically. Activation can also be performed manually, as described in Chapter 4, "Activating, Applying, and Distributing Upgrade Kits." For most upgrade kits, it is recommended that you select this check box. However, if you are creating an upgrade kit that is dependant on another upgrade kit, be sure to clear this check box. For information about working with dependent kits, see "Controlling the Order of Kit Installation" on page 109.
Apply Versions	Check box	It is recommended that you clear this check box for all Siebel Client Executables upgrade kits. Displayed only if Activate Upgrade Kit check box was selected in an earlier Upgrade Kit Wizard screen. When this check box is selected, the compiled information string in the database will be updated automatically with the component version information for this upgrade kit. Applying versions can also be performed manually, as described in Chapter 4, "Activating, Applying, and Distributing Upgrade Kits." For most upgrade kits, it is recommended that you select this check box. However, if you are creating an upgrade kit that is dependant on another upgrade kit, or if you know that you need to specify nondefault values for Component Minimum Version or Component Maximum Version, be sure to clear this check box. For information about working with dependent kits, see "Controlling the Order of Kit Installation" on page 109.

Table 18. Upgrade Kit Wizard Elements for a Siebel Client Executables Upgrade Kit

Wizard Element	Element Type	Comments
Component Minimum Version	Read-only text field	Earliest component version acceptable for running the software in read/write mode. Displayed only if Apply Versions check box was selected in an earlier Upgrade Kit Wizard screen.
Component Maximum Version	Read-only text field	Latest component version acceptable for running the software in read/write mode. Displayed only if Apply Versions check box was selected in an earlier Upgrade Kit Wizard screen.
Required Upgrade Kit	Check box	When this check box is selected, the upgrade kit will be required regardless of previous versions installed. (Component Minimum Version and Component Maximum Version are set equal to New Version, but this change is not visible in the Upgrade Kit Wizard.) Displayed only if Apply Versions check box was selected in an earlier Upgrade Kit Wizard screen.
Upgrade Kit Title	Text field	Identifier for the upgrade kit. Defaults to Upgrade Component Name value followed by a space and the New Version value, but can be modified during the kit definition process. After the kit is defined, this identifier appears in the Name field of the Upgrade Kits list.
Comments	Text field	Available for comments about the upgrade kit. Comments entered here are displayed in the Upgrade Kits list.

NOTE: To avoid unnecessary download operations, it is recommended that you keep only one upgrade kit for history-independent components, including Siebel Client Executables kits. Depending on your preference, you can either delete or inactivate previous kits for a history-independent component. Deleting a kit increases available space in the Siebel File System. Inactivating a kit prevents use of the kit, while keeping it available in case you need it unexpectedly.

Defining a Siebel Repository File Upgrade Kit

This section provides specific instructions for defining a Siebel Repository File upgrade kit using the Upgrade Kit Wizard. These instructions can be used for the following types of upgrade components, which are always language-specific:

- Siebel Client Repository File_[*language-code*]
- Siebel Server Repository File_[*language-code*]

NOTE: A Siebel Repository File upgrade kit must contain the entire new SRF file to be distributed to users. The upgrade kit also sets the version of the SRF in the file itself.

To define a Siebel Repository File upgrade kit

1. Gather the information you will need, as described in Chapter 2, "Upgrade Planning and Preliminary Tasks."
2. Start the Upgrade Kit Wizard using the instructions in "Running the Upgrade Kit Wizard" on page 70.
3. Use the information you have gathered and the information in Table 19 on page 87 to respond to the prompts in the Upgrade Kit Wizard.
4. When you have finished specifying data about the upgrade kit you are defining, click Finish to pass the request to the Upgrade Kit Builder and to exit from the Upgrade Kit Wizard.

   A new row for the new upgrade kit appears in the Upgrade Kits list, with Status set to Request Submitted. For more information about the kit information available in this list and other lists, see "Viewing Upgrade Kit Properties" on page 100.

   After you define your upgrade kit, you must proceed to activate, apply, and distribute it. For information on these tasks, see Chapter 4, "Activating, Applying, and Distributing Upgrade Kits."

Information in Table 19 is presented in approximately the sequence used by the Upgrade Kit Wizard.

Table 19. Upgrade Kit Wizard Elements for a Siebel Repository File Upgrade Kit

Wizard Element	Element Type	Comments
Upgrade Component	Drop-down list	Name of the component the upgrade kit will install or upgrade. Select one of the following: ■ Siebel Client Repository File_[*language-code*] (use when distributing repository file to clients) ■ Siebel Server Repository File_[*language-code*] (use when distributing repository file to servers)
UNC Path for SRF file	Text field	Universal Naming Convention (UNC) path and file name of the SRF file to include in the upgrade kit. Browsing is not available.
Minimum Old Version	Read-only text field	Earliest component version that can download and install the upgrade kit. Automatically set to NULL for history-independent component types, including repository files, indicating that there are no prerequisite versions required for using the kit. For more information about choosing version values, see "Determining Version Setting Values" on page 41.
Maximum Old Version	Read-only text field	Latest component version that can download and install the upgrade kit. Automatically set to NULL for history-independent component types, including repository files, indicating that there are no prerequisite versions required for using the kit. For more information about choosing version values, see "Determining Version Setting Values" on page 41.
New Version	Text field	Version number that the component being upgraded will have after the upgrade kit is installed. Default value is 1 greater than the current version for the component to be upgraded. For a Siebel Repository File upgrade kit, the New Version Value *must* be an integer. For more information about choosing version values, see "Determining Version Setting Values" on page 41.

Table 19. Upgrade Kit Wizard Elements for a Siebel Repository File Upgrade Kit

Wizard Element	Element Type	Comments
Activate Upgrade Kit	Check box	When this check box is selected, the files to be included in the upgrade kit will be compressed into a single archive on the Siebel File System automatically. Activation can also be performed manually, as described in Chapter 4, "Activating, Applying, and Distributing Upgrade Kits." For most upgrade kits, it is recommended that you select this check box. However, if you are creating an upgrade kit that is dependant on another upgrade kit, be sure to clear this check box. (For example, a repository kit might be dependent on a database schema kit.) For information about working with dependent kits, see "Controlling the Order of Kit Installation" on page 109.
Apply Versions	Check box	Displayed only if Activate Upgrade Kit check box was selected in an earlier Upgrade Kit Wizard screen. When this check box is selected, the compiled information string in the database will be updated automatically with the component version information for this upgrade kit. Applying versions can also be performed manually, as described in Chapter 4, "Activating, Applying, and Distributing Upgrade Kits." For most upgrade kits, it is recommended that you select this check box. However, if you are creating an upgrade kit that is dependant on another upgrade kit, or if you know that you need to specify nondefault values for Component Minimum Version or Component Maximum Version, be sure to clear this check box. For information about working with dependent kits, see "Controlling the Order of Kit Installation" on page 109.
Component Minimum Version	Read-only text field	Earliest component version acceptable for running the software in read/write mode. Displayed only if Apply Versions check box was selected in an earlier Upgrade Kit Wizard screen.

Table 19. Upgrade Kit Wizard Elements for a Siebel Repository File Upgrade Kit

Wizard Element	Element Type	Comments
Component Maximum Version	Read-only text field	Latest component version acceptable for running the software in read/write mode. Displayed only if Apply Versions check box was selected in an earlier Upgrade Kit Wizard screen.
Required Upgrade Kit	Check box	When this check box is selected, the upgrade kit will be required regardless of previous versions installed. (Component Minimum Version and Component Maximum Version are set equal to New Version, but this change is not visible in the Upgrade Kit Wizard.) Displayed only if Apply Versions check box was selected in an earlier Upgrade Kit Wizard screen.
Upgrade Kit Title	Text field	Identifier for the upgrade kit. Defaults to Upgrade Component Name value followed by a space and the New Version value, but can be modified during the kit definition process. After the kit is defined, this identifier appears in the Name field of the Upgrade Kits list.
Comments	Text field	Available for comments about the upgrade kit. Comments entered here are displayed in the Upgrade Kits list.

NOTE: It is recommended that you keep only one upgrade kit for history-independent components, including repository file kits. Depending on your preference, you can either delete or inactivate previous kits for a history-independent component. Deleting a kit increases available space in the Siebel File System. Inactivating a kit prevents use of the kit, while keeping it available in case you need it unexpectedly.

Defining a Third-Party Software Upgrade Kit

This section provides specific instructions for defining a Third-Party software upgrade kit using the Upgrade Kit Wizard.

For an example of the creation of a Third-Party software upgrade kit, see "Example of Constructing a Third-Party Upgrade Kit" on page 167.

NOTE: Siebel Anywhere Third-Party software components are meant to support third-party software products that are needed for operation with Siebel applications. Siebel Anywhere is not a general purpose tool for software configuration management and distribution.

To define a Third-Party software upgrade kit

1. Gather the information you will need, as described in Chapter 2, "Upgrade Planning and Preliminary Tasks."

2. Start the Upgrade Kit Wizard using the instructions in "Running the Upgrade Kit Wizard" on page 70.

3. Use the information you have gathered and the information in Table 20 on page 91 to respond to the prompts in the Upgrade Kit Wizard.

4. When you have finished specifying data about the upgrade kit you are defining, click Finish to pass the request to the Upgrade Kit Builder and to exit from the Upgrade Kit Wizard.

   A new row for the new upgrade kit appears in the Upgrade Kits list, with Status set to Request Submitted. For more information about the kit information available in this list and other lists, see "Viewing Upgrade Kit Properties" on page 100.

   After you define your upgrade kit, you must proceed to activate, apply, and distribute it. For information on these tasks, see Chapter 4, "Activating, Applying, and Distributing Upgrade Kits."

Information in Table 20 is presented in approximately the sequence used by the Upgrade Kit Wizard.

Table 20. Upgrade Kit Wizard Elements for a Third-Party Software Upgrade Kit

Wizard Element	Element Type	Comments
Upgrade Component	Drop-down list	Name of the component the upgrade kit will install or upgrade. Choose one of the following predefined components, or a custom component you have created: ■ Third Party - Oracle 8 Client ■ Third Party - Microsoft Word ■ Third Party - Microsoft SQL Server Driver ■ Third Party - Microsoft Internet Explorer ■ Third Party - IBM DB2 Client ■ Third Party - Adobe Acrobat Reader ■ Third Party - Adobe Acrobat
UNC Path for Software Directory	Text field	Path to the directory that contains the files to include in the upgrade kit. All files in the specified directory are included in the kit automatically.
Destination Directory	Text field	Specifies where the files from the upgrade kit are to be placed on the client machine. Default value is $SiebelRoot\upgrade\$KitName, where $SiebelRoot refers to the Siebel client root directory, and $KitName refers to a subdirectory with the name of the upgrade kit. Both of these variables are case-sensitive.
Delete destination file when done	Check box	When this check box is selected, the upgrade kit files will be deleted, automatically, after the kit is installed.

Table 20. Upgrade Kit Wizard Elements for a Third-Party Software Upgrade Kit

Wizard Element	Element Type	Comments
Specify file to execute	Text field	Specifies the file that runs the software installer on the subscriber's computer, such as install.exe. Only one file per upgrade kit can be specified for execution. Be sure you specify a file that can be executed, such as a .bat or .exe file. If you specify a file that *cannot* be executed, such as a .txt file or a CFG file, the upgrade kit will not install properly.
Enter command line arguments	Text field	Specifies any command line arguments to use when running the file chosen in the Select file to execute field.
Minimum Old Version	Text field	Earliest component version that can download and install the upgrade kit. When this field is blank, indicates that there are no prerequisite versions required for using the kit. Defaults to the current component version recorded in the database. For more information about choosing version values, see "Determining Version Setting Values" on page 41.
Maximum Old Version	Text field	Latest component version that can download and install the upgrade kit. When this field is blank, indicates that there are no prerequisite versions required for using the kit. For more information about choosing version values, see "Determining Version Setting Values" on page 41.
New Version	Text field	Version number that the component being upgraded will have after the upgrade kit is installed. Default value is 1 greater than the current version for the component to be upgraded. For more information about choosing version values, see "Determining Version Setting Values" on page 41.

Table 20. Upgrade Kit Wizard Elements for a Third-Party Software Upgrade Kit

Wizard Element	Element Type	Comments
Activate Upgrade Kit	Check box	When this check box is selected, the files to be included in the upgrade kit will be compressed into a single archive on the Siebel File System automatically. Activation can also be performed manually, as described in Chapter 4, "Activating, Applying, and Distributing Upgrade Kits." For most upgrade kits, it is recommended that you select this check box. However, if you are creating an upgrade kit that is dependant on another upgrade kit, be sure to clear this check box. For information about working with dependent kits, see "Controlling the Order of Kit Installation" on page 109.
Apply Versions	Check box	Displayed only if Activate Upgrade Kit check box was selected in an earlier Upgrade Kit Wizard screen. When this check box is selected, the compiled information string in the database will be updated automatically with the component version information for this upgrade kit. Applying versions can also be performed manually, as described in Chapter 4, "Activating, Applying, and Distributing Upgrade Kits." For most upgrade kits, it is recommended that you select this check box. However, if you are creating an upgrade kit that is dependant on another upgrade kit, or if you know that you need to specify nondefault values for Component Minimum Version or Component Maximum Version, be sure to clear this check box. For information about working with dependent kits, see "Controlling the Order of Kit Installation" on page 109.
Component Minimum Version	Read-only text field	Earliest component version acceptable for running the software in read/write mode. Displayed only if Apply Versions check box was selected in an earlier Upgrade Kit Wizard screen.
Component Maximum Version	Read-only text field	Latest component version acceptable for running the software in read/write mode. Displayed only if Apply Versions check box was selected in an earlier Upgrade Kit Wizard screen.

Table 20. Upgrade Kit Wizard Elements for a Third-Party Software Upgrade Kit

Wizard Element	Element Type	Comments
Required Upgrade Kit	Check box	When this check box is selected, the upgrade kit will be required regardless of previous versions installed. (Component Minimum Version and Component Maximum Version are set equal to New Version, but this change is not visible in the Upgrade Kit Wizard.) Displayed only if Apply Versions check box was selected in an earlier Upgrade Kit Wizard screen.
Upgrade Kit Title	Text field	Identifier for the upgrade kit. Defaults to Upgrade Component Name value followed by a space and the New Version value, but can be modified during the kit definition process. After the kit is defined, this identifier appears in the Name field of the Upgrade Kits list.
Comments	Text field	Available for comments about the upgrade kit. Comments entered here are displayed in the Upgrade Kits list.

Defining a Siebel Customer Revisions Upgrade Kit

This section provides specific instructions for defining a Siebel Customer Revisions upgrade kit using the Upgrade Kit Wizard. These instructions can be used for the following types of upgrade components, where (base) indicates a language-independent component, and _[*language-code*] indicates a component that applies to a particular language represented by a code such as ENU (English) or DEU (German):

- Siebel Client Customer Revisions (base)
- Siebel Client Customer Revisions_[*language-code*]

These instructions can also be used for custom components.

CAUTION: Do not use the upgrade kit type Customer Revisions for upgrade kits containing a Siebel SRF or CFG file. (Using a Customer Revisions kit type to deliver a Siebel SRF or CFG file can result in upgrade failures or incorrect version checking and version numbering.) Instead, use the Siebel Client Repository File and Siebel Client CFG kit types, respectively, for these upgrades.

To define a Siebel Customer Revisions upgrade kit

1. Gather the information you will need, as described in Chapter 2, “Upgrade Planning and Preliminary Tasks.”

2. Start the Upgrade Kit Wizard using the instructions in “Running the Upgrade Kit Wizard” on page 70.

3. Use the information you have gathered and the information in Table 21 on page 96 to respond to the prompts in the Upgrade Kit Wizard.

4. When you have finished specifying data about the upgrade kit you are defining, click Finish to pass the request to the Upgrade Kit Builder and to exit from the Upgrade Kit Wizard.

   A new row for the new upgrade kit appears in the Upgrade Kits list, with Status set to Request Submitted. For more information about the kit information available in this list and other lists, see “Viewing Upgrade Kit Properties” on page 100.

   After you define your upgrade kit, you must proceed to activate, apply, and distribute it. For information on these tasks, see Chapter 4, “Activating, Applying, and Distributing Upgrade Kits.”

Information in Table 21 is presented in approximately the sequence used by the Upgrade Kit Wizard.

Table 21. Upgrade Kit Wizard Elements for a Siebel Customer Revisions Upgrade Kit

Wizard Element	Element Type	Comments
Upgrade Component	Drop-down list	Name of the component the upgrade kit will install or upgrade: For customer revisions, select one of the following, as needed: ■ Siebel Client Customer Revisions ■ Siebel Client Customer Revisions_[*language-code*] For a custom component, select the name of the component you created.
Files to Add	Text field	Names of files to include in the upgrade kit. This field is populated either by entering one file name and path, or by clicking Browse and choosing a file from the directory listings displayed. In either case, click the Add button after specifying each path and file name combination. Repeat to add more files.
Browse	Button	Displays a standard dialog box for browsing and choosing a file.
Add	Button	When this button is clicked, the information in the Files To Add field is saved. If the Add button is not clicked, the information is discarded when you click Next, and an error message is displayed.
Added Files	Drop-down list	Displays the names of the files added to the kit so far. Automatically populated when you enter information in Files to Add and then click the Add button.
Remove	Button	When clicked, the Upgrade Kit Wizard discards the file information currently selected and displayed in the Added Files drop-down list. Other items in the drop-down list are not affected.
Destination Directory	Text field	Specifies where the files of the upgrade kit are to be placed on the client machine.

Table 21. Upgrade Kit Wizard Elements for a Siebel Customer Revisions Upgrade Kit

Wizard Element	Element Type	Comments
Delete destination file when done	Check box	When this check box is selected, the upgrade kit files will be deleted, automatically, after the kit is installed.
Select file to execute	Drop-down list	Specifies one file in the upgrade kit to be executed as part of installation of the kit. Available values are the values stored in the Added Files field. Be sure you specify a file that can be executed, such as a .bat or .exe file. If you specify a file that *cannot* be executed, such as a .txt file or a CFG file, the upgrade kit will not install properly.
Enter command line arguments	Text field	Specifies any command line arguments to use when running the file chosen in the Select file to execute drop-down list.
Minimum Old Version	Text field	Earliest component version that can download and install the upgrade kit. When this field is blank, indicates that there are no prerequisite versions required for using the kit. Defaults to the current component version recorded in the database. For more information about choosing version values, see "Determining Version Setting Values" on page 41.
Maximum Old Version	Text field	Latest component version that can download and install the upgrade kit. When this field is blank, indicates that there are no prerequisite versions required for using the kit. For more information about choosing version values, see "Determining Version Setting Values" on page 41.
New Version	Text field	Version number that the component being upgraded will have after the upgrade kit is installed. Default value is 1 greater than the current version for the component to be upgraded. For more information about choosing version values, see "Determining Version Setting Values" on page 41.

Table 21. Upgrade Kit Wizard Elements for a Siebel Customer Revisions Upgrade Kit

Wizard Element	Element Type	Comments
Activate Upgrade Kit	Check box	When this check box is selected, the files to be included in the upgrade kit will be compressed into a single archive on the Siebel File System automatically. Activation can also be performed manually, as described in Chapter 4, "Activating, Applying, and Distributing Upgrade Kits." For most upgrade kits, it is recommended that you select this check box. However, if you are creating an upgrade kit that is dependant on another upgrade kit, be sure to clear this check box. For information about working with dependent kits, see "Controlling the Order of Kit Installation" on page 109.
Apply Versions	Check box	Displayed only if Activate Upgrade Kit check box was selected in an earlier Upgrade Kit Wizard screen. When this check box is selected, the compiled information string in the database will be updated automatically with the component version information for this upgrade kit. Applying versions can also be performed manually, as described in Chapter 4, "Activating, Applying, and Distributing Upgrade Kits." For most upgrade kits, it is recommended that you select this check box. However, if you are creating an upgrade kit that is dependant on another upgrade kit, or if you know that you need to specify nondefault values for Component Minimum Version or Component Maximum Version, be sure to clear this check box. For information about working with dependent kits, see "Controlling the Order of Kit Installation" on page 109.
Component Minimum Version	Read-only text field	Earliest component version acceptable for running the software in read/write mode. Displayed only if Apply Versions check box was selected in an earlier Upgrade Kit Wizard screen.
Component Maximum Version	Read-only text field	Latest component version acceptable for running the software in read/write mode. Displayed only if Apply Versions check box was selected in an earlier Upgrade Kit Wizard screen.

Table 21. Upgrade Kit Wizard Elements for a Siebel Customer Revisions Upgrade Kit

Wizard Element	Element Type	Comments
Required Upgrade Kit	Check box	When this check box is selected, the upgrade kit will be required regardless of previous versions installed. (Component Minimum Version and Component Maximum Version are set equal to New Version, but this change is not visible in the Upgrade Kit Wizard.) Displayed only if Apply Versions check box was selected in an earlier Upgrade Kit Wizard screen.
Upgrade Kit Title	Text field	Identifier for the upgrade kit. Defaults to Upgrade Component Name value followed by a space and the New Version value, but can be modified during the kit definition process. After the kit is defined, this identifier appears in the Name field of the Upgrade Kits list.
Comments	Text field	Available for comments about the upgrade kit. Comments entered here are displayed in the Upgrade Kits list.

Defining a Custom Component Upgrade Kit

The instructions for defining a custom component upgrade kit depend on the component type you choose when you create the custom component. For information about which instructions to use for each component type, see Table 22.

Table 22. Instructions for Defining a Custom Component Upgrade Kit

If Custom Component Type Is	Use the Following Instructions
Siebel CFG File	"Defining a Siebel Configuration File (CFG) Upgrade Kit" on page 71
Siebel Database Extension	"Defining a Siebel Database Schema Upgrade Kit" on page 74
Siebel Executables	"Defining a Siebel Client Executables Upgrade Kit" on page 80
Siebel Repository File	"Defining a Siebel Repository File Upgrade Kit" on page 86

Table 22. Instructions for Defining a Custom Component Upgrade Kit

If Custom Component Type Is	Use the Following Instructions
Third-Party Software	"Defining a Third-Party Software Upgrade Kit" on page 89
Customer Revision	"Defining a Siebel Customer Revisions Upgrade Kit" on page 94

Viewing Upgrade Kit Properties

After you use the Upgrade Kit Wizard to define an upgrade kit, information about the kit becomes visible in your Siebel application. There are two general types of information available:

- Information that applies to the kit as a whole, and the component it will upgrade. See "Properties of the Entire Upgrade Kit and Its Component".
- Information that applies to items and item parameters within the kit. See "Properties of Upgrade Kit Items and Upgrade Kit Item Parameters" on page 104.

Properties of the Entire Upgrade Kit and Its Component

The following procedure describes how to view and interpret information that applies to the upgrade kit as a whole, and the components it will upgrade.

To view properties of an existing upgrade kit and its components

1. From the application-level menu, select View > Site Map > Siebel Anywhere Administration.
2. From the Show drop-down list, select Upgrade Kits.

   The Upgrade Kits list and the Upgrade Kit Components list appear.

3 In the Upgrade Kits list, select the record for the upgrade kit for which you want to view properties.

For information about the fields in the Upgrade Kits list, which displays each upgrade kit defined in the system, see Table 23.

For information about how to interpret various values that are displayed in the Status field of this list, see Table 24 on page 102.

For information about the fields in the Upgrade Kit Components list, which displays the components associated with the selected upgrade kit, see Table 25 on page 103.

Table 23. Fields in the Upgrade Kits List

Name	Comment
Name	Name of the upgrade kit (called Upgrade Kit Title in the Upgrade Kit Wizard). The default name includes the component name and version in the kit. You can specify a different name when defining the kit. However, it is recommended that you use descriptive names if you do not accept the default wording. Also see Table 7 on page 38 for additional limitations for a name. The name cannot be modified once the kit has been defined.
Status	For definition of Status and the associated values and descriptions, see Table 24 on page 102.
Archive Kit Name	Name of the compressed file containing the upgrade kit.
File Size	Size of the physical file containing the upgrade kit.
Comments	This field is available for comments.
Modified	The date and time this record was last modified.
Compiled Information	Compiled string that includes all information about the upgrade kit.

The Status column indicates whether the Upgrade Kit is Request Submitted (awaiting for Server to pick up) or In Progress (in process of being created). The status column may have other values as well such as Pending, Active, Error, and so on. It is not limited to just Request Submitted and In Progress. Table 24 describes the values and description of the Status column.

NOTE: The status of this request can also be monitored in My Component Request view in the Server Component Requests screen.

Table 24. Status Column Values and Definitions, Upgrade Kit View

Values	Description
Active	Kit is ready to be applied and distributed.
Error	Indicator that there was an error while creating the kit.
Inactive	Kit on hold and not ready for further processing. First step to activate the kit is to change status to Pending. Then you can activate it.
In Progress	Creation of new upgrade kit is underway on the server.
Pending	Kit successfully created and ready to be activated.
Request Submitted	Request has been submitted to the server to create the new upgrade kit.

Table 25 describes the fields in the Upgrade Kit Components list, which displays the components associated with the upgrade kit. The components are automatically created by the Upgrade Kit Wizard when you click Auto Create on the Upgrade Kits list.

When you select the new upgrade kit in the Upgrade Kit list, you will notice that two records appear in the Upgrade Kit Components list. The first record is the component to be upgraded. The second is the Siebel Upgrade Wizard. Including the Upgrade Wizard as a component reinforces using the correct version of the Upgrade Wizard for the upgrade.

CAUTION: Do not delete the default records in the Upgrade Kit Components list. These records store key information about how components work, and provide models you may eventually need for setting up custom components.

Table 25. Fields in the Upgrade Kit Components List

Name	Comment
Name	Name of the component.
Min Old Version	Minimum component version that a subscriber must have to install this upgrade kit.
Max Old Version	Maximum component version that a subscriber may have to install this upgrade kit.
New Version	Version of this component the user will have after installing the kit.
Comments	This field is available for comments.

This list also controls the upgrade kit sequence (the order of upgrades), when several upgrade kits are used together. For example, if Kit 1 should be installed before Kit 2, you can add component Kit 1 upgrades as Upgrade Kit Components of Kit 2. For details, see “Controlling the Order of Kit Installation” on page 109.

Properties of Upgrade Kit Items and Upgrade Kit Item Parameters

Each upgrade kit item defines an action in an upgrade kit and requires certain parameters to operate. For example, a file copy action needs the file to copy and the destination for the copy. The following procedure describes how to view and interpret information that applies to items and item parameters within a selected upgrade kit.

NOTE: It is recommended that you do not add, update, or delete any records in the Upgrade Kit Items list and Upgrade Kit Item Parameters list in the Upgrade Kit Items view. The records in these lists are created automatically, and changing them in any way can damage the selected upgrade kit.

To view properties of an existing upgrade kit's items and item parameters

1. From the application-level menu, select View > Site Map > Siebel Anywhere Administration.
2. From the Show drop-down list, select Upgrade Kits Items.

   The Upgrade Kits list, the Upgrade Kit Items list, and the Upgrade Kit Item Parameters list appear.

   For information about the fields in the Upgrade Kits list, see Table 23 on page 101 and Table 24 on page 102.

   For information about the fields in the Upgrade Kit Items list, which displays the individual items that define actions to be executed by a selected upgrade kit, see Table 26.

   For information about the fields in the Upgrade Kit Item Parameters list, which displays the parameters associated with a selected upgrade kit item, see Table 27 on page 105.

Table 26. Fields in the Upgrade Kit Items List

Field	Comment
Comments	This field is available for comments.
Estimated Disk Space	The disk space required to download and execute an item (optional). When the upgrade kit is created, the value for this field defaults to 0. You can enter a new value (in bytes) before activating the kit. Before a subscriber installs the upgrade kit, the Upgrade Wizard validates that the specified amount of free disk space is available. If adequate disk space is not available, the Upgrade Wizard returns an error message.
Item Type	The type of item to execute.
Sequence	The order in which the Upgrade Wizard executes the item.
Title	The title of the item, which is displayed in the Upgrade Wizard.

Each upgrade kit item defines an action in an upgrade kit and requires certain parameters to operate. For example, a file copy action needs the file to copy and the destination for the copy. The Upgrade Kit Item Parameters list includes the parameters associated with each upgrade kit item. Table 27 describes the fields of this list.

Table 27. Fields in the Upgrade Kit Item Parameters List

Field	Comment
Attachment Name	The name of the file associated with this item.
Comments	This field is available for comments.
Date	Date and time when the file is attached.
File Ext	The extension of the file associated with this item.
Name	Name of the parameter.
Size	The size of the file associated with this item.
Value	The value of the parameter.

Activating, Applying, and Distributing Upgrade Kits 4

This chapter discusses activating, applying, and distributing upgrade kits, plus related tasks. It includes the following topics:

Process of Completing Upgrade Kit Creation

The remaining three steps in the process of creating an upgrade kit are activating, applying, and distributing the kit.

1. "Activating an Upgrade Kit" on page 108. This step gathers all the files for the upgrade and creates a single compressed archive file.
2. "Applying an Upgrade Kit" on page 111. This step updates the compiled information string in the database with the new version information. During this step, if you have not already done so, you indicate whether or not a kit will be required.

3. "Distributing Upgrade Kits" on page 115. This step makes the upgrade kit available to designated subscribers as either a required kit or an optional kit, depending on your selection in Step 2 of this process.

   NOTE: There are additional instructions for distributing database schema upgrade kits. For information, see "Performing Database Schema Updates" on page 146.

Activating an Upgrade Kit

After you define the upgrade kits for an upgrade, you need to activate each kit. The status of a kit must be Pending before activating it. Activating a kit gathers the files to be included in the upgrade kit and compresses them into a single archive on the Siebel File System. It also sets the status of the upgrade kit to Active.

This task is a step in Process of Completing Upgrade Kit Creation on page 107 and in Process of Limiting Distribution of an Upgrade Kit on page 117.

To activate an upgrade kit

1. From the application-level menu, select View > Site Map > Siebel Anywhere Administration.
2. From the Show drop-down list, click Upgrade Kits.

   The Upgrade Kits view appears.
3. Select the kit you want to activate.

   The Status field must show that it is Pending.
4. Click Activate.

   A dialog box appears indicating activation is in progress.

   If you are activating a large kit, such as a repository (SRF) kit, your browser may appear unresponsive for a few minutes after you click Activate. The delay in response occurs because the browser must wait for a reply from the server before proceeding. During the wait, no hourglass is displayed. When the browser receives the server's reply, the Status field changes to Active.

Repeat Step 3 and Step 4 to activate each kit required for your upgrade.

NOTE: Activating the upgrade kit does not affect the version information stored in the database. Activating a kit populates the File Size field for that kit. The kit is not available to subscribers until it has been applied and distributed.

When you activate the upgrade kit, the kit items you see in this view turn into item entries in the upgrade.ucf, which is part of every Siebel Anywhere upgrade kit.

Controlling the Order of Kit Installation

Usually, when you distribute upgrades to a configuration requiring several related components, the order in which kits are installed is undefined. If you need to control the installation order of kits, you can do this by making one kit dependent upon another. If this is the case, do not use the Upgrade Kit Wizard to activate the kit.

An example of this type of situation is when you have one Siebel Repository File kit (Kit 1) and another Siebel Client Customer Revision kit (Kit 2), and you need Kit 1 to be installed first.

To set the order of kit installation

1. From the application-level menu, select View > Site Map > Siebel Anywhere Administration.

2. From the Show drop-down list, click Upgrade Kits.

   The Upgrade Kits list appears.

3. In the Upgrade Kits list, select the kit you need installed second (for example, Kit 2, the Siebel Client Customer Revision kit).

4. If the kit is already activated, perform one of the following actions:

   - Manually set the status to Pending.

   - Deactivate the kit and change the status to Pending.

5. In the Upgrade Kit Component list (lower list in the same view), make sure that the kit to be installed second is still selected in the list above, and then click New.

   The Upgrade Components dialog box appears.

6. Select the component Kit 1 upgrades (for example, Siebel Client Repository_$Language).
7. In the new record, set the Min Old Version to the New Version of the kit (the Siebel Repository File).
8. Click to activate the Upgrade Kits applet.
9. Select the kit you need installed second again and click Activate.

This procedure forces first the installation of Kit 1 (Siebel Repository File), followed by Kit 2 (Siebel Client Customer Revision). This interlinked series can be extended to three or more kits.

Deactivating an Upgrade Kit

There are times when you may need to deactivate an active kit—perhaps there was a last minute decision to delete a kit. (You must first deactivate a kit before deleting it.)

Observe the following guidelines when deciding whether to deactivate a kit:

- If there was a problem with the kit, then the kit can be deactivated and a replacement kit should be created to upgrade the users who had problems with the initial kit.
- If later kits depend on the kit you are considering for deactivation, perform the following actions to make sure that users will be able to download and install the later kits:

- Make sure that every user who needs the upgrade kit that will be deactivated has already installed the kit. This includes any infrequent users who may log on too infrequently to have been prompted to install the kit.

CAUTION: Deactivating a previously distributed kit could cause mobile users to have an unsuccessful synchronization, and place those users unnecessarily into a read-only state.

- Make sure that you can clone new client installations from existing up-to-date clients. This method is the preferred method for providing new users with material that was formerly delivered in one or more upgrade kits. New users cannot download later kits if a prerequisite kit has been deactivated.

To deactivate an upgrade kit

1. From the application-level menu, select View > Site Map > Siebel Anywhere Administration.
2. From the Show drop-down list, click Upgrade Kits.

   The Upgrade Kits view appears.
3. Select the kit you want to deactivate.

   The Status field should show that it is Active.
4. Click the menu button and select Deactivate.

   A warning message will ask you to confirm. If appropriate, click OK.

   The Status field should change to Inactive.

Repeat Step 3 and Step 4 for each kit that you want to deactivate.

Applying an Upgrade Kit

After you activate the upgrade kits for an upgrade, you need to apply each kit. Applying a kit updates the compiled information string in the database with the component version information. This is an essential step in creating an upgrade kit. This is also the step in which you indicate whether a kit is a required upgrade kit.

This task is a step in Process of Completing Upgrade Kit Creation on page 107 and in Process of Limiting Distribution of an Upgrade Kit on page 117.

Upgrade.ucf is the driver file for the Upgrade Wizard to apply the upgrade kit. It contains an ordered list of action items for the Upgrade Wizard to execute during the installation of the upgrade kit.

The following procedure describes how to apply an upgrade kit. This updates the compiled information string in the database with the component version information.

NOTE: If a replacement kit uses the same values for New Version, Minimum Old Version, and Maximum Old Version as the deactivated kit it replaces, and if the deactivated kit was previously distributed, you do not need to apply or distribute the replacement kit.

To apply an upgrade kit

1. Navigate to the Anywhere Administration screen, and from the Show drop-down list, click Upgrade Kits.

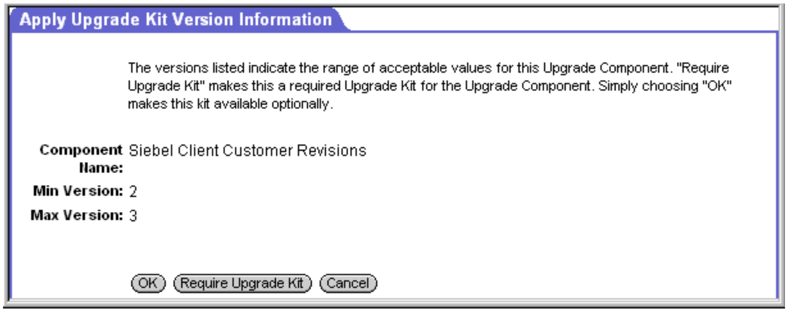
   The Upgrade Kits view appears.

2. Select the kit you want to apply.

   The Status field must show that it is Active.

3 Click Apply Versions.

The Apply Upgrade Kit Version Information dialog box appears, as shown in the following figure. Review the information in this dialog box. The paragraphs following the figure provide additional information.



Apply Upgrade Kit Version Information

The versions listed indicate the range of acceptable values for this Upgrade Component. "Require Upgrade Kit" makes this a required Upgrade Kit for the Upgrade Component. Simply choosing "OK" makes this kit available optionally.

Component Name: Siebel Client Customer Revisions

Min Version: 2

Max Version: 3

- The Min Version and Max Version numbers in this dialog box apply to the version of the component that can be used to bring up the application in read/write mode. If users have a version below the minimum and choose not to install the upgrade, they can only access the application in a read-only mode.
- If you click OK without clicking Require Upgrade Kit, you are making it an optional kit (that is, after the kit is distributed, your subscribers can use Siebel eBusiness Applications without upgrading—provided their version is between the minimum and maximum).
- If you click Require Upgrade Kit, the minimum version changes to match the maximum version, which is the new version. In this case, the subscribers will have to upgrade after the configuration is distributed; otherwise, they can only bring up the application in a read-only mode.

NOTE: It is strongly recommended that you create upgrade kits as optional and then test to make sure the kit is functioning properly. After you thoroughly test a kit using retrieval and installation, you can return to the Upgrade Kits view and reapply and distribute the kit as a required kit. See "Distributing Upgrade Kits" on page 115 for more information.

4. Click OK if the version information is correct or click Cancel to exit the dialog box without applying the upgrade kit.

   If you click OK, a prompt reminds you that you need to distribute the kit to make it available to subscribers. For information on distributing kits, see "To distribute an upgrade kit" on page 116.

Repeat Step 2 through Step 4 for each kit in this upgrade. Continue to "Distributing Upgrade Kits" on page 115 for distributing updated version information for upgrade kits.

NOTE: If there are multiple kits of the same type that are either SRF, Database Schema, or Client Executable, it is strongly recommended you deactivate the old kits. This will save time for your users by preventing the downloading of outdated kits. (The version information for a deactivated kit can be retrieved, but a deactivated kit, itself, cannot be retrieved. When a user tries and fails to retrieve a deactivated kit, an automatic attempt is made to retrieve a later kit that is currently activated.)

Converting an Optional Kit to a Required Kit

After thoroughly testing an optional kit, you can reapply the kit to convert it to a required upgrade kit.

To convert an optional kit to a required kit

1. From the application-level menu, select View > Site Map > Siebel Anywhere Administration.
2. From the Show drop-down list, click Upgrade Kits.

   The Upgrade Kits view appears.
3. From the Upgrade Kits list, select the optional kit you want to convert.

   The current status should be Active.

4 Click Apply Versions.

The Apply Upgrade Kit Version Information dialog box appears. Review the information in this dialog box.

5 Click Require Upgrade Kit to make the upgrade kit required.

The Minimum and Maximum Version numbers are now the same because the kit is now required.

6 Click OK if the version information is correct or click Cancel to exit the dialog box without applying the upgrade kit.

If you click OK, a prompt reminds you that you need to distribute the kit to make it available to subscribers. See "Distributing Upgrade Kits" on page 115.

Distributing Upgrade Kits

After applying an upgrade kit, you need to distribute it to one or more configurations. For general information about configurations, see "Upgrade Configurations" on page 28.

This task is a step in Process of Completing Upgrade Kit Creation on page 107 and in Process of Limiting Distribution of an Upgrade Kit on page 117.

NOTE: If a replacement kit uses the same values for New Version, Minimum Old Version, and Maximum Old Version as the deactivated kit it replaces, and if the deactivated kit was previously distributed, you do not need to distribute the replacement kit.

Upgrade kits are distributed to one configuration at a time. The distribution process makes the kit's component version information available to all the subscribers who are associated with that configuration—this gives the subscribers their first opportunity to download and install the kit. Neither required nor optional kits are available to subscribers until the version information is distributed.

The version information that is made available during the distribution process includes version information for *all* the related components of the configuration, not just the component that the new kit is designed to upgrade. Technically, therefore, when you distribute a new upgrade kit to a configuration, you are making that kit's version information available to the configuration, and you are redistributing the version information of other active kits for the configuration's related components. In practice, however, you generally can proceed as if you were distributing only the one kit.

After distribution, if the kit is required, subscribers are automatically prompted to retrieve and install it. If the kit is optional, subscribers use the Product Updates view and Upgrade Wizard to locate and install the kit.

CAUTION: Before you distribute a kit, you must define, activate, and apply it. Before you distribute a kit to any configuration containing production users, it is strongly recommended that you use the Siebel Test Client configuration to test the kit thoroughly. It is particularly important to test any required kit before distributing for general use, because Mobile Web Client users can suffer unnecessary delays while downloading a defective required kit, and they can lose read/write access to Siebel eBusiness applications until a correctly functioning kit is available.

The following procedure provides the steps to distribute a kit from the Configurations view. The same procedure can also be accomplished from the Employees view.

NOTE: There are additional instructions for distributing database schema upgrade kits. For information, see "Performing Database Schema Updates" on page 146.

To distribute an upgrade kit

1. From the application-level menu, select View > Site Map > Siebel Anywhere Administration.
2. From the Show drop-down list, click Configurations.
3. In the Configurations view, select the appropriate Anywhere subscriber configuration.

4. Inspect the Related Components list to verify that the components in the upgrade kit are related components for the selected configuration.

   For example, for a Siebel maintenance release, the related components must include the Siebel Client Executables component for the base upgrade kit and the Siebel Client Executables_[*language-code*] component for each language-specific upgrade kit.

5. Click Distribute.

   This action makes the version information in the database available to subscribers with that particular configuration.

   A dialog box appears to confirm the intent to distribute the related components to the configuration.

Repeat Step 3 through Step 5 for other configurations, as applicable.

The following sections provide additional information about special cases of distribution:

- "Process of Limiting Distribution of an Upgrade Kit" on page 117
- "Distributing Different CFG Files to Different Users" on page 118

Process of Limiting Distribution of an Upgrade Kit

You can limit the distribution of a upgrade kit to certain subscribers by temporarily assigning subscribers to a new configuration. For example, you might have a situation where you want to send a set of reports only to management, or you want to limit the users for testing a kit.

To limit kit distribution for a new configuration, perform the following tasks:

1. "Defining Upgrade Kits" on page 69. Define the upgrade kit that you will be distributing, if you have not already done so.
2. "Activating an Upgrade Kit" on page 108. Activate the upgrade kit that you will be distributing, if you have not already done so.
3. "Applying an Upgrade Kit" on page 111. Apply the upgrade kit that you will be distributing, if you have not already done so.

4. "Creating a New Configuration" on page 54. Either create a new configuration that you will use to distribute the kit to specific subscribers, or use the Siebel Test Client configuration for this purpose.

5. "Adding Components to a Configuration" on page 53. Associate the configuration with one or more components that correspond to the upgrade kit or kits that you want to distribute.

6. "Assigning Employees to a Configuration" on page 56. Add the login for the users you want to receive this kit to the Employee view for this configuration.

7. "Distributing Upgrade Kits" on page 115. Distribute active upgrade kits to the configuration. When you select a configuration and click Distribute, the subscribers associated with the configuration gain access to version information for all of the related components for the configuration. This gives those subscribers potential access to all active upgrade kits for those components, including any new upgrade kits that have been defined, activated, and applied. Subscribers associated with other configurations do not gain access to your new kit until you distribute to their configurations.

8. "Removing Employees from a Configuration" on page 58. Give the subscribers who are associated with the configuration enough time to download the kit. However, you need to disassociate these subscribers from this special configuration as soon as possible. Ending a user's dynamic configuration assignment returns that user to the original configuration assignment defined in that user's CFG file. Kits targeted for the original configuration are again available to the user.

Distributing Different CFG Files to Different Users

It is possible to distribute different CFG files to different sets of users. For example, you might have two groups of users, Sales users and Engineering users, each group using a different CFG file with their respective Siebel Applications. The following procedure describes how to use Siebel Anywhere to send a new CFG file to each group.

To distribute different CFG files to different groups of users

1. Prepare all of the CFG files your various groups will use.

2. Launch the Siebel Application.

3 From the application-level menu, select View > Site Map > Siebel Anywhere Administration.

4 From the Show drop-down list, click Upgrade Components.

The Upgrade Components list appears.

5 Create a component for each language, such as Sales CFG_ENU, similar to the Siebel Call Center CFG component. Use the Copy Record option. Set the values for the columns for each record as shown in the following tables.

Example values for Record 1:

Field	Comment
Name	Sales CFG
Component Type	Siebel CFG_ENU File
Min Version	100
Max Version	Should be blank for a new component
Locate Method	CFG
Locate Information	Siebel,ClientRootDir,bin\enu\sales.cfg
Version Method	CFG
Version Information	Siebel,Version

Example values for Record 2:

Field	Comment
Name	Engineering CFG
Component Type	Siebel CFG_ENU File
Min Version	100
Max Version	Should be blank for a new component
Locate Method	CFG

Field	Comment
Locate Information	Siebel,ClientRootDir,bin\enu\eng.cfg
Version Method	CFG
Version Information	Siebel,Version

6 Create a configuration for each language combination for each group of users (such as Sales and Engineering), and add the appropriate CFG components you just created as related components.

   See Chapter 2, “Upgrade Planning and Preliminary Tasks” for details.

7 Go to Siebel Anywhere Administration > Upgrade Kits and use Auto Create to create one kit for each group of users.

   For example, you might create one kit for Sales users, using the Sales CFG component and the Sales.cfg file, and another for Engineering users, using the Engineering CFG component and Eng.cfg file.

8 Apply the kits, and be sure to click on the Require Upgrade Kit button in the Apply Upgrade Kit Version Information dialog box.

The following procedure describes how to test the distribution of different CFG files to different groups of users.

To test distributing CFG files to different groups of users

1 From the application-level menu, select View > Site Map > Siebel Anywhere Administration > Configuration.

2 Add the new CFG components (such as Sales CFG and Engineering CFG) to the Siebel Test Client configuration.

3 Add two or more users to the Employee list for Siebel Test Client.

4 Distribute the Siebel Test Client to verify that you can retrieve the kit successfully.

5 Make sure that your test users' CFG files reflect the correct ComponentName in their CFG files.

For example, Sales users should have this parameter set to Sales Configuration while Engineering users should have this parameter set to Engineering Configuration. Also, users should verify an exact match between the ComponentName in the CFG file and Configuration name in the Anywhere Administration > Configuration view.

6 Distribute the final configurations (such as Sales Configuration and Engineering Configuration) to send the kit to all users.

Disabling Siebel Anywhere

There may be times when you do not want your users to be prompted to install upgrade kits when they log in to Siebel applications. The following procedures describe how to disable Siebel Anywhere version checking and the ability to install Siebel Anywhere upgrade kits for connected clients and mobile clients.

To disable Siebel Anywhere for Connected Clients

1 Navigate to the Siebel Anywhere Administration screen.

2 From the Show drop-down menu, select Configurations.

3 Use one of the following methods to disable Siebel Anywhere version checking and related user prompts:

   - Rename the appropriate configurations. For example, rename the Siebel Sales Client as Old Siebel Sales Client, and so on. Then, redistribute current version information to the renamed configuration.

   - Delete all the related components in a configuration and redistribute current version information to that configuration.

To disable Siebel Anywhere for Mobile Web Clients

1 Follow the instructions in "To disable Siebel Anywhere for Connected Clients."

2 In addition, use one of the following methods to disable Siebel Anywhere version checking and related user prompts:

- Change ComponentName parameter in the CFG file to None.
- Reextract local database.

  If Mobile Web Clients are associated with a particular configuration through Siebel Anywhere Administration > Employee view, reextracting is the only choice.

Retrieving, Installing, and Testing Upgrade Kits 5

After you distribute an upgrade kit to a configuration, the subscribers associated with that configuration can retrieve and install that kit. Kits should be retrieved, installed, and tested by test subscribers before being distributed to production subscribers.

This chapter discusses retrieval, installation and testing of upgrade kits. It includes the following topics:

Process of Retrieving, Installing, and Testing Upgrade Kits

To retrieve, install, and test an upgrade kit, perform the following tasks:

1. "Retrieving and Installing Upgrade Kits" on page 124. The procedure for retrieving an upgrade kit depends on its type. Kits should be retrieved by test subscribers before being distributed to production subscribers.
2. "Launching the Upgrade Wizard" on page 131. Install the upgrade kit using the Upgrade Wizard. The process for invoking the Upgrade Wizard depends on the subscriber type. Kits should be installed by test subscribers before being distributed to production subscribers.
3. "Testing Upgrade Kits" on page 134. Kits should be tested by test subscribers before being distributed to production users. (Among other possible problems, incorrectly constructed kits can prevent production users from writing data to Siebel eBusiness applications.)

If you encounter errors in the retrieval, installation, or testing process, see the following topics for additional information:

- "About Client Upgrade Error Recovery" on page 131.
- "Retrieving Upgrade Kits for Siebel Regional Node Servers" on page 132.

Retrieving and Installing Upgrade Kits

This task is a step in Process of Retrieving, Installing, and Testing Upgrade Kits on page 123.

The procedure for retrieving an upgrade kit depends on its type:

- Optional upgrade kits can be manually retrieved and installed by Siebel client subscribers through the Product Updates view.
- Required upgrade kits are automatically retrieved when mobile users synchronize or log into the application and when the server starts up or RepAgent synchronizes with Siebel Server.

It is a common misunderstanding that Mobile Web Clients retrieve kits directly from the Siebel File System. Instead:

- Mobile Web Clients request the files from the Siebel Remote Server. The Remote Server retrieves the files from the Siebel File System.

- Dedicated Web Clients retrieve kits (.saf files) directly from the Siebel File System or by using the File System Manager, depending on the settings defined in the active CFG file.

Subscribers use the Siebel Anywhere Upgrade Wizard to install upgrade kits after they are retrieved. The process for invoking the Upgrade Wizard varies by subscriber type:

- For client subscribers, the Upgrade Wizard is invoked automatically after an upgrade is retrieved.
- For Siebel Server subscribers, the Upgrade Wizard is invoked manually (see "Retrieving Upgrade Kits for Siebel Regional Node Servers" on page 132).

The process for retrieving and installing upgrade kits by Siebel Client subscribers is described in the following sections:

- "Retrieving Optional Upgrade Kits for Mobile Web Clients" on page 125
- "Retrieving Optional Upgrade Kits for Dedicated Web Clients" on page 128
- "Retrieving Required Upgrade Kits" on page 128

NOTE: When a Siebel Repository File upgrade kit is retrieved and installed, the size of the downloaded SRF file may differ from the original size of the SRF file included in the upgrade kit. The size change is related to details of how compression and decompression are implemented, and does not normally indicate an error. To check for correct file size and timestamp, use the size and timestamp from a test Mobile Web Client as the standard for other subscribers.

Retrieving Optional Upgrade Kits for Mobile Web Clients

This section describes how to retrieve and install an optional upgrade kit for a Mobile Web Client. Optional upgrade kits are only for client subscribers. Upgrade kits for server subscribers should always be required.

NOTE: Siebel Smart Web Clients are not Siebel Anywhere subscribers.

The following procedure describes how to retrieve and install an optional kit for a Mobile Web Client.

NOTE: The following procedure restarts the Mobile Web Client computer. It is recommended that users save their work and exit from other applications before starting this procedure.

To retrieve an optional kit for a Mobile Web Client

1. Invoke the Mobile Web Client.
2. From the application-level menu, select File > Synchronize > Database.
3. In the Siebel Remote dialog box, click Synchronize.

   Synchronization takes place and is complete when the opposing arrows (red and blue) in the lower-right corner of the screen disappear.
4. From the application-level menu, select View > Site Map > User Preferences screen > Product Updates.
5. In the Product Updates list, select the desired upgrade component, and check the check box under the Upgrade column.

   A check appears. The Status field value should be Upgrade Available for those components where optional kits are available. For information about possible values for the Status field, see Table 28 on page 127.
6. Click Upgrade Selected Components to display the Siebel Anywhere Kit Download dialog box, and then complete the following substeps:

   a. Follow the instructions in the Siebel Anywhere Kit Download dialog box to start a Siebel Remote session and retrieve the Upgrade Kit necessary to upgrade your system.

   b. Click OK to close the Siebel Anywhere Kit Download dialog box.
7. Synchronize *again* as in Step 2 and Step 3 to retrieve the corresponding upgrade kits.

8 Click Upgrade Selected Components again to invoke the Upgrade Wizard for the desired upgrade component.

After the Upgrade Wizard completes, it will automatically restart the Mobile Web Client.

9 Log in, repeat Step 4 and, from the Product Updates list, verify the Status is Version OK for the desired upgrade component.

Table 28 describes the fields in the Product Updates list.

Table 28. Fields in the Product Updates List

Field	Comment
Upgrade	Check this field to upgrade the component.
Component Name	Name of the upgrade component.
Status	Status of the upgrade component. Values can include the following: ■ *Upgrade Available.* An optional upgrade kit is available for this component. ■ *Upgrade Required.* A required upgrade kit is available for this component. ■ *Version OK.* Version of this upgrade component is current. ■ *Upgrade Not Available.* The upgrade component is out-dated and needs to be updated; however, no kit is available to do this. Contact your system administrator.
Current Version	The version of the component on the client machine.
Minimum Version	The minimum required version of the component.
Maximum Version	The maximum required version of the component.
Upgrade Size (bytes)	The size of the upgrade kit.
Download Time (mins)	The estimated time to download the kit on a 28.8 modem.

Retrieving Optional Upgrade Kits for Dedicated Web Clients

Dedicated Web Clients can retrieve optional upgrade kits as described in the following procedure.

To retrieve an optional kit for a dedicated Web client

1. Invoke the Dedicated Web Client.
2. From the application-level menu, select View > Site Map > User Preferences screen > Product Updates.

   In the Product Updates list, the upgrade status should be Upgrade Available for those components where optional kits are available.
3. In the Product Updates list, select the desired upgrade component, and check the check box under the Upgrade column of the desired upgrade component.
4. Click Upgrade Selected Components.

   This will download the upgrade kit, shut down the Dedicated Web Client application, and launch the Upgrade Wizard. After the Upgrade Wizard completes, it will automatically restart the Dedicated Web Client application. For some Third-Party upgrade kits, the client computer may shut down and restart.
5. Log in and, from the Product Updates list, verify the Status is Version OK for the desired upgrade component.

Retrieving Required Upgrade Kits

Both Mobile and Dedicated Web Clients perform a version check during login to a Siebel application. Mobile Web Clients also perform a version check during synchronization.

If the version check detects that an upgrade is required, a dialog appears asking the user whether to upgrade or not. If the user chooses Yes, the upgrade kit will be downloaded. The following procedures for both the Mobile and Dedicated Web Clients illustrate this point.

Upgrade kits are *not* automatically retrieved upon version check. A prompt appears, asking if the user would like to retrieve the upgrade kit**.** The kit is downloaded only if the user clicks yes to download the kit.

The version check verifies the components used by the client configuration; multiple required components can be displayed in the dialog box. Mobile Web Clients will detect a new required upgrade when merging changes from the first synchronization session following distribution of the upgrade kit.

If the user answers Yes, every required upgrade kit for the components used by the client configuration is automatically retrieved and the Upgrade Wizard is launched.

If the user answers No, the Dedicated Web Client starts in read-only mode against the server database, and the Mobile Web Client starts in read-only mode against the local database.

If the user answers No, the user’s session continues in read-only mode against either the local or server database, until the upgrade has been completed. A prompt notifies the user of this status.

While operating in read-only mode, both Dedicated and Mobile Web Client users can view screens, views and data as usual, but they cannot make changes. Mobile Web Client users can synchronize, but can only download files; they cannot send, receive, or apply database changes. Read-only mode prevents users from corrupting data with an outdated or invalid Siebel application configuration.

Both Dedicated and Mobile Web Client users exit read-only mode when the Siebel eBusiness Application is restarted following a successful upgrade. At that point, a Mobile Web Client user can perform a full synchronization, sending to the Siebel Server any local database changes that predate the upgrade.

Retrieving Required Upgrade Kits for Mobile Web Clients

If a user starts the Mobile Web Client in read-only mode, the user is prompted to upgrade at each synchronization session.

The version check for Mobile Web Clients occurs during synchronization. If the version check detects the need for an upgrade, the user receives a prompt indicating a possible upgrade. The remote user logs in again to synchronize the server and local database.

To retrieve required upgrade kits for Mobile Web Clients

1. Invoke the Mobile Web Client.

2 From the application-level menu, select File > Synchronize > Database.

A dialog box appears indicating there is a required upgrade available.

3 From the dialog box, click Yes and follow the prompts to invoke the Upgrade Wizard.

The Upgrade Wizard will shut down the Siebel client, install the upgrade kit, and automatically restart the client unless there is an error while installing the kit.

4 Log in, and from the application-level menu, select View > Site Map > User Preferences > Product Updates.

5 Verify that the Status and Current Version columns contain the updated information.

Retrieving Required Upgrade Kits for Dedicated Web Clients

Retrieving Dedicated Web Clients is similar to that of Mobile Web Clients, except version checking only occurs during login.

To retrieve required upgrade kits for Dedicated Web Clients

1 Invoke a Dedicated Web Client.

Logging on will trigger a version check and will prompt for retrieval of a required upgrade kit. If you choose not to upgrade at this time, you can only operate in read-only mode.

2 Click Yes.

The Siebel client will download the appropriate upgrade kits.

After the retrieval is complete, it will invoke the Siebel Upgrade Wizard before exiting.

After the client exits, the Siebel Upgrade Wizard takes over and applies the upgrade kits and automatically restarts the client when it is done.

3 Log in, and from the application-level menu, select View > Site Map > User Preferences > Product Updates.

4 In the Product Updates list, verify that Status is Version OK.

Launching the Upgrade Wizard

Subscribers use the Siebel Anywhere Upgrade Wizard to install upgrade kits after they are retrieved. This task is a step in Process of Retrieving, Installing, and Testing Upgrade Kits on page 123.

The process for invoking the Upgrade Wizard varies by subscriber type:

- For Siebel Server subscribers, the Upgrade Wizard is launched manually (see "Retrieving Upgrade Kits for Siebel Regional Node Servers" on page 132).
- For client subscribers, the Upgrade Wizard is launched automatically after an upgrade is retrieved.

  The wizard automatically shuts down the Siebel client. It then displays a progress page as it completes the upgrade kit items for the upgrade kits that were retrieved.

  NOTE: The items displayed on the Upgrade Wizard page vary, depending on the number and type of kits.

  When the Upgrade Wizard has successfully installed the upgrade kit, the Siebel client is automatically restarted.

About Client Upgrade Error Recovery

Before beginning the upgrade process, the Upgrade Wizard makes a backup copy of every file affected by the upgrade. If errors are encountered in the upgrade process, the Upgrade Wizard stops processing. A message indicates that the Upgrade Wizard did not complete successfully and that you should examine the log file for details. It also indicates to restart the Siebel application and attempt the upgrade again.

The next time the user restarts the Siebel client, a prompt appears that states there had been an upgrade in process.

After the user clicks OK, another prompt appears where the user can cancel the upgrade or restart the upgrade from the point of failure. Canceling the upgrade will result in a cleanup. The user will not be able to restart this upgrade.

The Siebel Upgrade Wizard functionality includes error recovery for upgrades on individual files, such as database schema extensions, client configurations or SRF files. However, rolling back upgrades always requires manual intervention.

Retrieving Upgrade Kits for Siebel Regional Node Servers

Upgrade kits for Siebel Regional Node Server configurations are retrieved automatically by the Siebel Server. These upgrade kits may include a database schema or user-defined files to be installed with version tracking.

For regional databases, the Siebel administrator should be especially careful to distribute the database schema kit under the correct configuration. The default configuration that ships with Siebel eBusiness Applications is Siebel Regional Server. You can create your own configuration for Regional Node Servers to suit the particular needs of your organization.

To set the correct configuration for Regional Node Servers

1. From the application-level menu, select View > Site Map > Server Administration > Servers.
2. From the Siebel Servers list, select the appropriate server, and click on the Server Parameters tab.

   The Server Parameters list appears.
3. Modify the parameters as necessary.

   Modify the server parameter Upgrade Component to your configuration name. This configuration name can be Siebel Regional Server or the name of your custom configuration.

To set the correct configuration for Regional Node Servers using command line

- From the srvrmgr command line, enter:

  ```
  srvrmgr.exe /g gateway_srvr_host /e enterprise /s server_name
  /u user_name /p password
  ```

  ```
  change param UpgComponent="Siebel Regional Server" or “name of
  your custom configuration”
  ```

Should the version check recognize a required upgrade, the Siebel Server fails to start and logs an error message in the siebsrvr.log or repagent_$taskid.log similar to the following:

```
Please contact HQ administrator. An upgrade may be required.
```

With the Siebel Regional Node Server and all tasks stopped, the Siebel administrator must manually invoke the Upgrade Wizard.

To manually invoke the Upgrade Wizard on Windows

1. Open a command prompt window on the Windows server where the Siebel Regional Node Server is installed.
2. Navigate to the *SIEBSRVR_ROOT*\BIN directory, where *SIEBSRVR_ROOT* is the root directory of the Siebel Regional Node Server installation.
3. Copy the file siebupg.exe to siebupg1.exe.
4. Execute `siebupg1.exe` to launch the Upgrade Wizard.

   Follow the prompts on the wizard pages.
5. Restart the Siebel Regional Node Server.

   See *Siebel Server Administration Guide* for details.

Repeat the process from Step 1 on any other Siebel Regional Node Server as appropriate.

To manually invoke the Upgrade Wizard on UNIX

1. Open a shell on the UNIX server where the Siebel Regional Node Server is installed.
2. Navigate to the *SIEBSRVR_ROOT*/BIN directory, where *SIEBSRVR_ROOT* is the root directory of the Siebel Regional Node Server installation.
3. Copy the file srvrupgwiz to srvrupgwiz1.
4. Execute `srvrupgwiz1` to launch the Upgrade Wizard.

   Follow the prompts on the wizard pages.

5. Restart the Siebel Regional Node Server.

   See *Siebel Server Administration Guide* for details.

Repeat the process from Step 1 on any other Siebel Regional Node Server as appropriate.

Should the Upgrade Wizard fail, there will be an error message to that effect.

You should exit the Upgrade Wizard, correct the condition that caused the error, and restart the Upgrade Wizard using the SIEBUPG1.exe file. Upon restarting, Upgrade Wizard prompts you either to cancel the upgrade, restoring the Siebel Regional Node Server to its preupgrade state (if possible), or to retry the upgrade from the point of failure. You will need to restart the Siebel Regional Node Server to initiate a version check to restart the upgrade process. If you want to restart, you should choose Retry.

The Siebel Regional Node Server will be down until you successfully recover from the failed upgrade. This downtime can affect many users.

After a successful installation of an upgrade, it will take manual intervention to roll it back.

Testing Upgrade Kits

This task is a step in Process of Retrieving, Installing, and Testing Upgrade Kits on page 123.

The recommended method for testing kits is to create and distribute a kit to a limited and controlled number of users. In this method, you can assign specific testing users to the Test Client configuration so your regular subscribers will not be allowed to install any kits in the testing phase. Distribute the kit only to the Siebel Test Client configuration. See "Using the Siebel Test Client Configuration for Testing" on page 135.

After distribution to the Test Client configuration, test users should retrieve and install the upgrade kit. Test users should then run the application that has been upgraded, and report any unexpected behavior in the application, particularly in areas that have changed due to the upgrade.

CAUTION: When testing new upgrade kits, it is strongly recommended that you perform tests using both Dedicated and Mobile Web Clients. If for any reason Mobile Web Client users experience problems installing or downloading the new kit, the problems will be significant.

After a kit has been thoroughly tested under the Siebel Test Client configuration, you can then distribute it to the appropriate production configurations.

To optimize the setup process for new users, it is recommended that you create a “master installation image” for each configuration your Siebel Anywhere subscribers use, and keep these images up to date. If all current upgrade kits are installed to create a current image, you can use the image to set up new subscribers, so each new subscriber will not need to download and install many upgrade kits. This method also makes it safer to deactivate old upgrade kits, since new subscribers will receive the necessary software by means of installation images, rather than being required to install old kits.

NOTE: Siebel Anywhere does not deliver database schema upgrades to individual Dedicated Web Client users, because they connect to shared databases. Database extensions should be tested in the development environment.

Using the Siebel Test Client Configuration for Testing

Siebel Anywhere provides a special configuration called Siebel Test Client to serve as your test user. By default, the Siebel Test Client configuration is representative of the other subscriber configurations initially provided, but it can be modified to reflect your active configuration.

To test an upgrade kit

1 Create a user and assign this user with the Siebel Test Client configuration in either of the following ways:

- Assign the user to the configuration, as described in "Assigning Employees to a Configuration" on page 56.
- Install a client and set ComponentName = Siebel Test Client in the active CFG file.

2. Define, activate and apply the kit as an optional kit and distribute to the appropriate configuration.
3. Verify that the Siebel Test Client configuration contains the components being upgraded with the kit.
4. Notify the selected users assigned to the Siebel Test Client configuration to log on. Instruct them to use the procedures described in "Retrieving and Installing Upgrade Kits" on page 124 to retrieve and install the upgrade kit.
5. After test users install the upgrade kit, have them test it by running the application that was upgraded.

   Have all test users report any unexpected behavior in the application. Special attention should be paid to areas of the application that changed due to the upgrade.

   If the test is unsuccessful, see Appendix A, "Troubleshooting for Siebel Anywhere," for possible solutions.

NOTE: If you want to change your optional kit to a required kit after testing, see "Converting an Optional Kit to a Required Kit" on page 114.

Supplementary Information for Specific Upgrade Types 6

This chapter provides supplementary information for specific types of upgrade kits and other special circumstances in which Siebel Anywhere may be used. It includes the following topics:

Distributing a Siebel Maintenance Release (Patch)

This section provides an overview of the process of deploying a Siebel maintenance release (patch), including links to more specific instructions.

CAUTION: Do *not* use Packager for Siebel maintenance releases. Packager is designed for use with full releases. It does not include the necessary functionality to install a Siebel release that depends on the existence of a previous release.

NOTE: Only Mobile and Dedicated Web Clients can use Siebel Anywhere to download the kits needed for a Siebel maintenance release. For other types of clients, such as Siebel Tools clients, users can only receive notification and then manually apply the patch. For information about applying matches manually, see the *Maintenance Release Guide* for the patch, which is available on Siebel SupportWeb.

The process of distributing a Siebel maintenance release consists of the following steps:

1. Determine your upgrade requirements. For instructions concerning this step, see "Determining Upgrade Requirements" on page 34.
2. Prepare any needed infrastructure elements, such as configurations. For instructions concerning this step, see "Creating Needed Infrastructure Elements" on page 52.
3. Prepare Siebel maintenance release files for inclusion in upgrade kits. For instructions concerning this step, see "Preparing Contents for a Siebel Executables Upgrade Kit" on page 65.

   NOTE: In this step, it is important to keep the language-independent base files and the files specific to each language in separate directories.

4 Define the following upgrade kits:

NOTE: Although the following kits can be created in any order, it is important to wait for the status of each kit to become Pending before defining the next kit. Press ALT + ENTER to refresh the view. You may need to refresh the view several times before you will see the Status change.

a Define an upgrade kit for the language-independent (base) portion of the maintenance release. For instructions concerning this step, see "Defining a Siebel Client Executables Upgrade Kit" on page 80.

b For each language that you use in your Siebel implementation, define an upgrade kit for the language-specific part of the maintenance release. For instructions concerning this step, see "Defining a Siebel Client Executables Upgrade Kit" on page 80.

NOTE: In Step 4, you define each upgrade kit to execute a different install.exe file.

5 Make each language-specific upgrade kit dependent upon the base upgrade kit. For instructions concerning this step, see "Controlling the Order of Kit Installation" on page 109.

6 Activate each base and language-specific kit you created. For instructions concerning this step, see "Activating an Upgrade Kit" on page 108.

7 Apply each base and language-specific kit you created. For instructions concerning this step, see "Applying an Upgrade Kit" on page 111.

8 Distribute the base and language-specific kits to a test configuration. For instructions concerning this step, see "Distributing Upgrade Kits" on page 115.

9 Test the upgrade kits by retrieving and installing them as both local and remote members of the test configuration, and by running the software that has been upgraded. For instructions concerning this step, see Chapter 5, "Retrieving, Installing, and Testing Upgrade Kits."

10 After each base and language-specific kit is operating correctly for test configuration members, distribute the kit to one or more additional configurations, for general use.

Distributing Additional Language Packs

When you need to deliver additional language packs to Mobile or Dedicated Web Clients, follow these steps:

- System administrator installs the new language packs and tests these thoroughly before distributing.
- For a major release, you can use Siebel Packager to package the language packs to be distributed. Do not use Siebel Packager to deliver a Siebel Maintenance Release (patch).
- For each language pack, create Siebel Client Executables_[*language-code*] upgrade kits using the package created in the previous step.
- Distribute the upgrade kits to the appropriate configurations. You must have separate configurations for each combination of languages for your users.

Example of Global Deployment with Siebel Anywhere

This section provides an example of a global deployment using Siebel Anywhere. The objective is to allow users to access and use the same application in different languages.

You have upgrade components for the languages you installed with your database server. You will map these to the applicable configurations. These configurations will be based upon the languages that different sets of users require to access the same application.

Assumptions for Global Deployment Example

This example makes the following assumptions:

- You have five sets of users for five different languages.
- You will base your application on Siebel Call Center.
- You will have five SRF files compiled, one for one each language.
- You will have customer revisions (reports for example) depending on the language.

- You will use the same database.
- Each user only uses the application in one language.

Requirements for Global Deployment Example

You will need:

- Five components for the Siebel Repository Files (SRF)
- Five components for the CFG files
- Five components for Client Customer Revisions
- Five configurations to distribute the upgrade kits
- Six components for Client Executables—one for Client Executables (base), and five for Client Executables_$Language (language pack)

  The language pack component has same locate method, locate information, and version method as the base Client Executables component, but with different Version Information: bin\sslcver.dll,VersionString,$Language

Global Deployment Example Records

For the records available, use the values in Table 29, Table 30, Table 31, and Table 32.

NOTE: Other language codes can be substituted for ENU in these example records.

Table 29. Example CFG Record in the Upgrade Components View Files

Field	Comment
Name	CFG ENU
Component Type	Siebel CFG File
Min Version	100
Max Version	Should be blank
Locate Method	CFG
Locate Information	Siebel,ClientRootDir,bin\$Language\uagent.cfg
Version Method	CFG
Version Information	Siebel,Version

Table 30. Example SRF Record in the Upgrade Components View

Field	Comment
Name	Siebel Client SRF ENU
Component Type	Siebel Repository File
Min Version	Should be blank
Max Version	Should be blank
Locate Method	CFG
Locate Information	Siebel,ClientRootDir,objects\$Language

Table 30. Example SRF Record in the Upgrade Components View

Field	Comment
Version Method	SRF
Version Information	Siebel,RepositoryFile

Table 31. Example Client Customer Revision Record in the Upgrade Components View

Field	Entry
Name	Customer Revision ENU
Component Type	Customer Revision
Min Version	Should be blank
Max Version	Should be blank
Locate Method	CFG
Locate Information	Siebel,ClientRootDir,bin\clntrev.cfg
Locate Information - language dependent component	Siebel,ClientRootDir,bin\$Language\clntrev.cfg
Version Method	CFG
Version Information	Siebel,Version

Table 32. Example Client Configuration Record in the Siebel Anywhere Configurations View

Field	Comment
Name	Siebel Call Center ENU
Configuration Type	Siebel Client Configuration
In the related components applet, make sure that the following components are included:	
Siebel Call Center CFG_ENU	Required
Siebel Client Customer Revisions	Required
Siebel Client Customer Revisions_ENU	Required
Siebel Client Executables	Required
Siebel Client Executables_ENU	Required
Siebel Client Repository File_ENU	Required
Siebel Database Schema	Required

Table 32. Example Client Configuration Record in the Siebel Anywhere Configurations View

Field	Comment
Siebel Upgrade Wizard	Required
Third Party - File Attachment	Not Required

NOTE: You must create a configuration for each language combination. For example, if a user installed both English (ENU) and French (FRA) on a system, create a configuration with the components related to these two languages. For more information regarding multilingual deployments, see *Global Deployment Guide*.

Example of Creating Multiple Kits of the Same Type

If you need to distribute multiple files to different directories, you should create a kit of the appropriate type Client Customer Revision for each destination directory. You should set the values of the Minimum Old Version and Maximum Old Version settings of the upgrade kits so that they create an unbroken sequence.

The following example uses the Customer Revision kit type. Keep in mind that the same logic can be used for other types of kits when there is a need to distribute multiple kits of the same type.

Create the first kit as usual (for example, Minimum Old Version and Maximum Old Version should be set to blank, New Version = 1).

For the next kit set Minimum Old Version = 1, Maximum Old Version = 1, New Version = 2, and so forth.

If you have to skip a version number for some reason, then set the Minimum Old Version and Maximum Old Version values appropriately. Always set the Minimum Old Version so that it matches the New Version of the previous active kit.

In this example, you need three kits, but Kit 2 was skipped because it contained one wrong file. The version information would be as shown in Table 33.

Table 33. Example of Version Settings for Multiple Kits with One Skipped Kit

Kit	Minimum Old Version	Maximum Old Version	New Version
Kit 1	Null	Null	1
Kit 2 (This kit contains one wrong file, was never activated, and should be skipped.)	1	1	2
Kit 3 (This kit replaces Kit 2.)	1	2	3
Kit 4	3	3	4

For more information about the version numbers used by Siebel Anywhere, see "How Siebel Anywhere Versions Work" on page 17.

Performing Database Schema Updates

This section provides special instructions for updating a Siebel database schema using Siebel Anywhere. Typical database schema changes include:

- Adding extension columns to Siebel base tables
- Adding extension tables to the Siebel database
- Creating or modifying indexes

This section includes the following subsections:

- "Process of Updating a Siebel Database Schema" on page 147
- "About What Happens During a Database Schema Upgrade" on page 148
- "About Changing the Database Schema in a Development Environment" on page 149

- "About Moving Database Schema Changes Between Environments" on page 150
- "About Creating Needed Upgrade Kits for Database Schema Changes" on page 150
- "About Preparing Mobile Web Clients for Database Schema Changes" on page 152
- "Process of Preparing Regional Node Servers for Database Schema Changes" on page 152
- "Checking Regional Node Server Parameters Before a Database Schema Update" on page 153
- "About Installing Database Schema Changes on Mobile Web Clients" on page 155
- "About Installing Database Schema Changes on Regional Node Servers" on page 156

Process of Updating a Siebel Database Schema

The overall process for using Siebel Anywhere to update a Siebel database schema is as follows:

1. Make and test database schema changes in development environment, using Siebel Tools. For more information about this step, see "About Changing the Database Schema in a Development Environment" on page 149.
2. Move changes to test environment, using Siebel Configuration Utility. For more information about this step, see "About Moving Database Schema Changes Between Environments" on page 150.
3. Create needed upgrade kits in test environment. For more information about this step, see "About Creating Needed Upgrade Kits for Database Schema Changes" on page 150.
4. Prepare test Mobile Web Client users and Regional Node Servers for changes. For more information about this step, see the following topics:
   - "About Preparing Mobile Web Clients for Database Schema Changes" on page 152

- "Process of Preparing Regional Node Servers for Database Schema Changes" on page 152

5. Install changes on test Mobile Web Client users and Regional Node Servers. For more information about this step, see the following topics:

   - "About Installing Database Schema Changes on Mobile Web Clients" on page 155
   - "About Installing Database Schema Changes on Regional Node Servers" on page 156

6. Move changes to production environment, using Siebel Configuration Utility. For more information about this step, see "About Moving Database Schema Changes Between Environments" on page 150.

7. Create needed upgrade kits in production environment. For more information about this step, see "About Creating Needed Upgrade Kits for Database Schema Changes" on page 150.

8. Prepare production Mobile Web Clients and Regional Node Server for changes. For more information about this step, see the following topics:

   - "About Preparing Mobile Web Clients for Database Schema Changes" on page 152
   - "Process of Preparing Regional Node Servers for Database Schema Changes" on page 152

9. Install changes on production Mobile Web Clients and Regional Node Server. For more information about this step, see the following topics:

   - "About Installing Database Schema Changes on Mobile Web Clients" on page 155
   - "About Installing Database Schema Changes on Regional Node Servers" on page 156

About What Happens During a Database Schema Upgrade

This section provides background information about what happens during a database schema upgrade.

During database schema upgrades, new and changed objects are identified by comparing the current physical schema with the new virtual schema. Based on this comparison, Upgrade Wizard adds new objects and alters existing objects by using the following:

- To create the new objects: create table, create index, and so on.
- To alter the existing objects: alter table, alter index, and so on.

CAUTION: Downsizing existing columns is not recommended. Do not drop columns or tables. These operations can cause transactions that were created before the schema change to be rejected, because data that was included in the earlier transactions may not fit into the new database schema.

Normally, the database does not allow downsizing a column that already contains data that could not fit into a new smaller column. If you downsize a column, the column representation in the repository would be different from the physical schema. Under these conditions, Siebel Remote would fail, among other possible errors.

For example, after downsizing existing columns, one of the columns in the new database is shorter (it is created from the representation in the repository). Then, a local database is reextracted (this includes a new schema). After the Remote user synchronizes, initialization occurs. Upgrade Wizard first applies the new local database (including a new schema) to a Remote user's machine. Next, Upgrade Wizard applies any server transactions downloaded during synchronization. If these transactions were generated before the schema changed, Upgrade Wizard tries to insert data that does not fit into the new column, causing the transaction to be rejected. Furthermore, if this occurs on a regional node, the error may cause an outage.

About Changing the Database Schema in a Development Environment

The first step in deploying Siebel database schema changes is to make the schema changes in a development environment, using Siebel Tools. For information about this step, see *Siebel Tools Reference*.

Keep track of whether your changes include creation or modification of views or applets. This information will affect later steps in the deployment.

Test the changes in the development environment before proceeding to the next part of the process. For links to other steps in this process, see "Process of Updating a Siebel Database Schema" on page 147.

About Moving Database Schema Changes Between Environments

When you are ready to move database schema changes from a developmental environment to a test environment, or from a test environment to a production environment, do *not* use Siebel Tools to make the changes. Instead, use the Migrate Repository option in the Siebel Configuration Utility to migrate the entire Siebel Repository containing the schema changes to the new environment.

For information about this step, see *Siebel Tools Reference*.

Test the changes in the new environment before proceeding to the next part of the process. For links to other steps in this process, see "Process of Updating a Siebel Database Schema" on page 147.

About Creating Needed Upgrade Kits for Database Schema Changes

The creation of a database schema kit has two consequences beyond the creation of the kit itself:

- Schema changes from the logical schema (in Siebel Tools) are automatically applied to the physical schema of the HQ database.
- The custom schema version number in the HQ database is automatically incremented by one.

The number and type of upgrade kits you need for deploying database schema changes depend on the kinds of changes you made to the schema:

- **Major schema changes.** Siebel Anywhere is suitable for distributing *minor* database schema updates that have been created using database extensibility. If you are performing a major upgrade (such as migrating from Siebel 6 to Siebel 7), or if you are migrating from Siebel 7.0.x to 7.5.x, do *not* use Siebel Anywhere to distribute your changes.

  For information about performing major upgrades, see *Upgrade Guide for Microsoft Windows* or *Upgrade Guide for UNIX*. For information about extracting database changes for Mobile Web Clients, see *Siebel Remote and Replication Manager Administration Guide*, and for detailed information regarding database extensibility, see *Siebel Tools Reference*.

- **Incremental schema changes.** If your database schema changes are *incremental* (that is, if you have added tables, added columns, or changed the names of existing tables or columns), you can create a Siebel Anywhere upgrade kit to upgrade Mobile Web Clients or a Siebel Regional Node Server. You do not need to reextract.

- **Preference for reextraction rather than Siebel Anywhere.** It is possible to reextract databases for Mobile Web Clients and Regional Databases, rather than updating them using Siebel Anywhere, if you prefer.

- **Mandatory reextraction for nonincremental schema changes.** If your database schema changes are *nonincremental* (that is, if you have removed or deactivated tables or columns, which are changes that are *not* recommended), then you *must* reextract all Mobile Web Clients and Regional Node Servers. Otherwise, synchronization might fail due to transactions that contain data for columns or tables that are no longer available. Reextraction makes it unnecessary to create a database schema upgrade kit.

After you define the kit or kits for your upgrade, you need to activate and apply them as described in Chapter 4, “Activating, Applying, and Distributing Upgrade Kits.” If you created both a Siebel Database Schema kit and a Siebel Repository File kit, make sure both are activated and applied before you proceed to the next part of the process.

For links to other steps in this process, see "Process of Updating a Siebel Database Schema" on page 147.

CAUTION: Do not make any kits dependent upon the database schema component. If you create this type of dependency, you will receive an error when first time Mobile Web Client users initialize their local databases. The error will indicate the system was unable to check initialization status.

About Preparing Mobile Web Clients for Database Schema Changes

In either a test environment or a production environment, it is recommended that you have your Mobile Web Client users synchronize before you distribute your Siebel Database Schema upgrade kit.

NOTE: If any of your mobile users connect to a Regional Node Server, rather than a HQ server, the Regional Node Server must install the database schema changes before those mobile users can obtain and install the changes.

After Mobile Web Client users have synchronized, you can distribute your active upgrade kits to an appropriate test or production configuration for your Mobile Web Clients. For information about distributing kits, see "Distributing Upgrade Kits" on page 115.

For links to other steps in this process, see "Process of Updating a Siebel Database Schema" on page 147.

Process of Preparing Regional Node Servers for Database Schema Changes

Before you distribute your Siebel Database Schema upgrade kit to either test Regional Node Servers or production Regional Node Servers, take the following steps:

1. Have your Regional Node Servers synchronize with the HQ server.

2 Determine which configuration you will use to distribute the upgrade kit or kits to your Regional Node Servers.

The default configuration that ships with Siebel eBusiness Applications is Siebel Regional Server. You can create your own configuration for Regional Node Servers to suit the particular needs of your organization. Make sure the Siebel Database Schema component is associated with your custom configuration. For information on these tasks, see "Identifying Configurations to Deliver Upgrade Components" on page 37, and "Creating Needed Infrastructure Elements" on page 52.

3 Inspect the Upgrade Component server parameter value for each Regional Node Server, and change it if necessary. For instructions, see "Checking Regional Node Server Parameters Before a Database Schema Update" on page 153.

4 Distribute your upgrade kit (or kits) to a configuration for your Regional Node Servers.

These may be either test Regional Node Servers, or production Regional Node Servers, depending on where you are in the process. For information about distributing kits, see "Distributing Upgrade Kits" on page 115.

For links to other steps in the process of updating a database schema, see "Process of Updating a Siebel Database Schema" on page 147.

Checking Regional Node Server Parameters Before a Database Schema Update

This section describes how to check Regional Node Server parameters before you distribute a database schema update kit to a Regional Node Server.

Before you distribute a database schema to a Regional Node Server, you must make sure that the server parameter Upgrade Component on the Regional Node Server is set to the correct value to match either Siebel Regional Server or any custom configuration you have made for your Regional Node Server. The simplest way to modify the parameter is to use the Server Parameters view, as described in the following procedure.

CAUTION: Before installing a database schema upgrade kit on a Regional Node Server in a DB2 environment, you must drop all customized views and triggers in the regional database. Otherwise, the Siebel Upgrade Wizard will encounter errors when applying the changes in the logical schema to the physical schema.

To set Regional Node Server parameters before distributing a database schema update

1. On the Regional Node Server, from the application-level menu, select View > Site Map > Server Administration.
2. From the Show drop-down list, click Servers.

   The Siebel Servers list appears.
3. From the Servers list, select the appropriate server, and click the Server Parameters tab.

   The Server Parameters list appears.
4. In the Server Parameters list, select Upgrade Component in the Parameter field, and set Current Value to Siebel Regional Server or the name of your custom configuration.

   The Value on Restart setting is automatically populated with the same value when you leave the Current Value field.
5. Still in the Server Parameters list, select Table Owner Password in the Parameter field, and make sure that Current Value and Value on Restart are not blank.

6 Still in the Server Parameters list, select Version Check in the Parameter field, and set Current Value and Value on Restart to True.

NOTE: You can also check and modify the Upgrade Component, Table Owner Password, and Version Check parameters in Server Manager.

You can also check and modify Regional Node Server parameters using Server Manager, as described in the following two procedures.

To check server parameters using Server Manager

- From the command-prompt, enter:

```
list param <UpgComponent, VersionCheck, TableOwnPass>
```

To modify server parameters using Server Manager

- Enter:

```
change param param_alias=parameter_value
```

  Where *param_alias* is UpgComponent, VersionCheck or TableOwnPass.

For information about other steps in the process of preparing a Regional Node Server for a database schema update, see "Process of Preparing Regional Node Servers for Database Schema Changes" on page 152.

For links to other steps in the process of updating a database schema, see "Process of Updating a Siebel Database Schema" on page 147.

About Installing Database Schema Changes on Mobile Web Clients

In a test environment, install the Siebel Database Schema upgrade kit (and any accompanying kits) on test Mobile Web Clients. In a production environment, install the Siebel Database Schema upgrade kit (and any accompanying kits) on production Mobile Web Clients. For instructions, see Chapter 5, "Retrieving, Installing, and Testing Upgrade Kits."

NOTE: The Database Schema kit will only be downloaded by Mobile Web Client users.

Installing the schema upgrade kit synchronizes the logical and physical schemas on Mobile Web Client databases.

To distribute a kit for Mobile Web Clients

- For Mobile Web Clients assigned to the HQ Server, distribute the kit under the appropriate configurations so each Mobile Web Client can receive the kit during synchronization.
- For Mobile Web Clients assigned to a Regional Node Server, distribute the database schema update to the configuration for the Regional Node Server, and install the update on the Regional Node Server before distributing the kit to the configuration for that server's Mobile Web Clients.

  Schema changes must also be complete on a Regional Node Server before any Dedicated Web Clients connected to that server can resume normal operations.

For links to other steps in this process, see "Process of Updating a Siebel Database Schema" on page 147.

About Installing Database Schema Changes on Regional Node Servers

In a test environment, install the Siebel Database Schema upgrade kit (and any accompanying kits) on test Regional Node Servers. In a production environment, install the Siebel Database Schema upgrade kit (and any accompanying kits) on production Regional Node Servers. The following procedure describes how to install a database schema update on a Regional Node Server.

Installing the schema upgrade kit synchronizes the logical and physical schemas on Regional Node Server databases.

NOTE: If any of your mobile Web Client users connect to a Regional Node Server, rather than a HQ server, the Regional Node Server must install the database schema changes before those mobile users can obtain and install the changes.

To install a database schema update kit for regional databases

1. Disconnect all users from the Regional Node Servers and the HQ server.

2. Stop all tasks on the applications servers except the Replication Agent, Transaction Processor, Router, and Merger.

3. Wait until the replication backlog has been processed.

   Check the download and upload statistics in the Siebel Remote Administration screen for each Regional Node. The three Last File and Last Transaction numbers should match in the lower applet. Make sure that there are no outstanding transactions by checking that \docking\inbox and \docking\outbox directories are empty on the Regional Applications Servers.

4. Verify the server parameter Version Check is set to True on the Regional Applications Server using one of the following options.

   - In the Server Parameters View, verify that the server parameter Version Check is set to True on the Regional Applications Server.

   - Use the following commands to start srvrmgr and verify the value of the Version Check parameter:

     ```
     srvrmgr /g gateway_host /e enterprise_server /s server_name
     /u user_name /p password
     ```

     ```
     list param VersionCheck
     ```

5. The Replication Agent should now perform a version check and shut down itself and the Regional Applications Server so the Administrator can perform the upgrade manually.

6. Check the appropriate log files (RepAgent.log and syncthrd.log) to verify the need to run the Upgrade Wizard.

7. Verify that the Siebel Server is properly shut down. If not, shut it down manually.

8. Use one of the following methods to make a copy of the Upgrade Wizard and run the copy:

   - In a Windows environment, copy siebupg.exe into siebupg1.exe in the server bin directory, and run siebupg1.exe to carry out the upgrade.

   - In an UNIX environment, copy srvrupgwiz into srvrupgwiz1 in the server bin directory, and run srvrupgwiz1 to carry out the upgrade.

9. After the upgrade, bring up the Regional Siebel Server.

10 You can change the server parameter Version Check back to False, which is its default value.

NOTE: When you install the Database Schema kit, the schema changes are applied to the server and the custom version is incremented, which makes the database template obsolete. If there are Mobile Web Client users who connect to the Regional Node Server, you must run Generate New Database task to create a new database template.

The Mobile Web Clients should be able to synchronize and perform the Schema Upgrade kit in much the same manner as any other kits by using the Siebel Upgrade Wizard.

If the Siebel Developer created or modified applets or views to display data in new extension columns or new extension tables, it is necessary to create and distribute the accompanying Siebel Repository File upgrade kit. Installing the combination of the Siebel Database Schema upgrade kit and the Siebel Repository File upgrade kit allows users to view these data after the schema upgrade.

After the Database Schema upgrade is finished, distribute the new SRF kit to its corresponding Mobile Web Clients.

For links to other steps in this process, see “Process of Updating a Siebel Database Schema” on page 147.

Example of Updating Specific Lines in the CFG File

This topic gives one example of updating specific lines in a CFG file. It is recommended that you have uniform client installations across a Siebel deployment. But if for some reason, some of your Siebel clients use different installation directories than others, the traditional CFG Upgrade Kit will not work for every client in the deployment. The reason for this failure is that certain parameters (for example, ClientRootDir) in a CFG file are directly tied to the installation directory.

To address this issue in Siebel 7, Siebel Systems has provided a stand-alone executable (cfgedit.exe) that is capable of modifying specific lines in a CFG file.

The cfgedit.exe executable compares a new CFG file that you supply (called the source CFG file) with a subscriber's CFG file (called the destination CFG file). If there are differences, cfgedit.exe updates the destination CFG file as needed to match the contents of the source CFG file. In the following example, the source CFG file is source.cfg, and the destination CFG file is uagent.cfg. Table 34 shows the arguments for cfgedit.exe.

Table 34. Arguments for Cfgedit.exe

Argument	Comment
/S *source_CFG_file*	Required. The CFG file containing the setting changes that you want to distribute to clients.
/D *destination_CFG_file*	Required. The subscriber CFG file that you want to update.
/C	Create destination file if it does not already exists. (By default, cfgedit.exe does not create the destination file.)

CAUTION: Make sure that your source CFG file assigns a value for every listed setting (key). If the source CFG file contains “empty keys,” such as “Vertical = [blank],” the formatting of the destination CFG file may be altered in such a way that the file becomes unusable.

It is recommended that you use a kit of the type Customer Revisions to deliver and execute `cfgedit.exe`. You may create a separate Upgrade Component of the type Customer Revisions to keep track of the CFG version history as well.

The following procedure provides an example of how to update a specific line in a CFG file. In this example you use cfgedit.exe to modify a specific line in the client’s ENU uagent.cfg.

To update specific lines in the CFG file

1. From the application-level menu, select View > Site Map > Siebel Anywhere Administration.

2. From the Show drop-down list, select Upgrade Kits.

   The Upgrade Kits view appears.

3. Click Auto Create to invoke the Upgrade Kit Wizard.

   The Upgrade Kit Wizard - Upgrade Component page appears.

4. Follow the prompts to specify all necessary information to define your upgrade kit. Use the following on the appropriate pages:

   - For Siebel Component Type, pick Customer Revisions.

     NOTE: To keep track of the changes to specific configuration files, it is recommended that you create a new upgrade component, such as Client Customer Revision-CallCenterCFG_ENU.

   - Add `cfgedit.exe` and `source.cfg` files to the kit.

     Sample file for source.cfg:

     ```
     [Siebel]
     ComponentName= New Component Name
     [New Section]
     NewKey = New Value
     ```

   - Change the Destination Directory from the default to `$SiebelRoot\bin\`

   - Select to execute, `cfgedit.exe`

   - For command line arguments, enter the following:

     ```
     /s source.cfg /d "$SiebelRoot\bin\enu\uagent.cfg"
     ```

   - For more information about version information, see “How Siebel Anywhere Versions Work” on page 17 and “Determining Version Setting Values” on page 41.

5. Activate, apply, and distribute the upgrade kit you built in the previous step.

Deleting Old Upgrade Kits

Sometimes you may want to purge older upgrade kits to free up some space used by these kits. When you purge old kits, you must make sure that users will not encounter errors when they retrieve kits that are expecting to use information from kits that have been deleted.

Two groups of users can be adversely affected when old kits are deleted, new users and infrequent users. For example, assume that your end users belong to the same configuration. Also assume they are currently using version 3 of Client Customer Revisions and version 4 of SRF.

If you were to delete all the previous Client Customer Revisions and SRF kits, a new user might have trouble with Client Customer Revisions if starting from version 0. This situation occurs because Client Customer Revisions kits often depend on the previous versions. If a new user needs version 2 in order to gain access to version 3, and if version 2 is deleted, Siebel Anywhere would not be able to provide the new user with version 3. However, the new user *would* be able to install version 4 of the SRF, because SRF kits do not depend on any version history.

The correct way to handle this situation is to keep an updated installation for new users where each of the kits has been installed. You can do this by creating a package periodically and making the most current package available to new users. This method addresses the problem for new users, because they always install a client with up-to-date configurations.

However, do *not* delete old kits as soon as a new package is created. There may be infrequent users in your organization who have not logged in for months. While the rest of the company is using version 3, the infrequent users may still be on version 1. In this case, it is up to the individual Siebel administrators to assess the situation and determine how old the kit must be before deletion.

Sometimes you have a few kits of the type Customer Revision that were distributed long ago. Use the following procedure to delete them. Use the same logic if you are planning to delete any other kits.

To delete old Customer Revision kits

1. Establish one installation that includes all the Customer Revision kits ever installed.

2. Create a package from that installation.
3. Set up each new user with the package prepared in Step 1. This provides new clients with the files that were distributed through the old Customer Revision kits, and also provides new clients with the correct version of the clntrev.cfg.

Upgrading the Siebel Upgrade Wizard

The Siebel Upgrade Wizard is a stand-alone program that is invoked to carry out the installation of the upgrade kits for Siebel Clients as well as Siebel Regional Node Servers. It is also used to carry out the initialization process for a regional database as well as local databases of Mobile Web Client users. Both siebupg.exe and siebupg1.exe are stand-alone executables for the Siebel Upgrade Wizard.

In most cases, siebupg.exe and siebupg1.exe are identical. But during an upgrade, the Siebel Client always calls siebupg1.exe to carry out the job. In the case of a Siebel Regional Node Server upgrade, the Siebel administrator should manually copy siebupg.exe to siebupg1.exe before invoking `siebupg1.exe`.

The reason that there are two stand-alone executables is that some upgrades involve upgrading the Siebel Upgrade Wizard itself. A new executable cannot be copied to the file name and location of an executable that is currently running. Therefore, the Siebel client runs the siebupg1.exe version of the Siebel Upgrade Wizard to perform the upgrade, and the upgrade process copies the new siebupg.exe version of the Siebel Upgrade Wizard to the correct location for future use.

When a new siebupg.exe executable has been successfully copied to the correct location, the client automatically restarts and automatically copies the new siebupg.exe file to siebupg1.exe, making both executables for the Siebel Upgrade Wizard current and identical. The upgrade process then resumes using the siebupg1.exe executable.

Testing for Upgrade Kit Component Consistency

After you upgrade a Siebel application to a new release, you should check to make sure that version numbering continues across releases for Upgrade Components in each Siebel Anywhere Configuration. Upgrading to a new release of Siebel eBusiness Applications upgrades the Siebel Anywhere table definitions. However, it does not reset the Upgrade Component information for Siebel Anywhere Configurations.

As a result, Siebel Anywhere will resume version checking against the existing component versions in the new release of Siebel eBusiness Applications. If required upgrade kits for Siebel Client Repository File, Siebel Client Customer Revisions, or Siebel CFG File were distributed in the previous release, newly upgraded Production clients may be incorrectly prompted for upgrade kits when they synchronize with the server.

Before upgrading Production users, test the upgrade kit using the Packager Client machine with version checking enabled. Verify that the Packager Client passes version check, so that after the upgrade kit is packaged and distributed, it will function correctly for the remainder of your Production users.

To accomplish this testing, verify that Administrator Client has the latest versions for Siebel Client Repository File_[*language-code*], Siebel Client Customer Revisions, and Siebel CFG_[*language-code*] in advance of running the Siebel Packager utility.

The following procedure describes how to test repository components for consistency.

To test repository components for consistency

1 Determine the current version values of your repository components by completing the following substeps:

   a In your production Siebel environment, navigate to Siebel Anywhere Administration > Upgrade Components.

   b Use standard query techniques to select your server and client repository components.

   c Determine the current value of your repository components by inspecting their Min Version values. A blank Min Version field indicates a value of zero.

2. Use a computer and a login account that have read/write access to the location of the repository file you want to check, and open a command window.

3. Make sure that the repository file you want to check is not currently in use.

   You may need to exit from any Siebel application that is using the repository.

4. In the command window, navigate to the directory where the srfstamp utility is located, as follows:

   - If you are using a server computer, navigate to *SIEBEL_ROOT*\bin, where *SIEBEL_ROOT* is the root directory for your Siebel Server software.
   - If you are using a client computer, navigate to *SIEBEL_CLIENT_ROOT*\bin, where *SIEBEL_CLIENT_ROOT* is the root directory for your Siebel Mobile Web Client or Siebel Dedicated Web Client software.

5. Enter the following command, where *repository_file_name* is the complete path and file name of your repository file, and *language-code* indicates the language for which this repository is used:

   ```
   srfstamp /r repository_file_name /l language-code
   ```

   After a brief pause, the current version number of the specified repository file is displayed.

6. Compare the version displayed by srfstamp to the component version you obtained in Step 1 of this procedure.

7. If you want to change the version number of the specified repository file (for example, to use your current repository version number for a new repository during a major upgrade), enter the following command:

   ```
   srfstamp /w repository_file_name /v new_version_number /l language-code
   ```

The following procedure describes how to test for Siebel Client Customer Revisions component consistency.

To test Siebel Client Customer Revisions component consistency

- Copy the clntrev.cfg file from one of your previous release Production Clients to the SIEBEL_CLNT_ROOT\bin directory of the Administrator Client.

The following procedure describes how to test for Siebel CFG File component consistency.

To test Siebel CFG file component consistency

- Edit the appropriate CFG file under SIEBEL_CLNT_ROOT\bin\[*language-code*] and increment the Version parameter in the [Siebel] section to the Maximum Version of the Upgrade Component Siebel Call Center CFG for the previous release.

Test with the Administrator Client until this client passes version check. Run the Siebel Packager Utility to create the custom installer. Distribute the custom installer through Siebel Anywhere (as described in *Upgrade Guide for UNIX* or *Upgrade Guide for Microsoft Windows*) or through a shared network location.

Creating Kits That Check DLL File Versions

Sometimes you may need to upgrade third-party software based upon the version of a particular DLL file. An example would be an ODBC upgrade on a client, based upon the version of the file odbcint.dll.

The following procedure describes how to create a custom component and an upgrade kit that check the version of a particular DLL file.

To create an upgrade component and kit for DLL version check

1. From the application-level menu, select View > Site Map > Siebel Anywhere Administration.
2. From the Show drop-down list, select Upgrade Components.

   The Upgrade Components list appears.

3 Create an Upgrade Component and specify the field values shown in the following table.

Field	Comment
Name	Upgrade Component Name
Component Type	Third-Party Software
Locate Method	Registry
Locate Information	*hkey,subkey_name,value_name*
Version Method	FileVersion

In this table, the value for Locate Information points to the registry hkey, subkey and a specific value that points to the DLL file you wish to version check.

For example:

```
HKEY_LOCAL_MACHINE,SOFTWARE\ODBCFileDSN\DefaultIcon,Driver
```

If the registry value is DefaultIcon, then the *value_name* must be omitted. This value in the registry will then point to the specific DLL file.

For example:

```
C:\WINNT\System32\odbcint.dll
```

4 After creating the custom component, as described in the previous steps of this procedure, define the upgrade kit as described in Chapter 3, “Defining Upgrade Kits.”

When defining the Upgrade Kit, remember to select the name of the custom upgrade component (created above) when the Upgrade Kit Wizard page appears.

Example of Constructing a Third-Party Upgrade Kit

This section provides an example of how to construct a third-party upgrade kit, using Third-Party Win-Zip as the example software for which the kit is created. The process shown in this section can be used to construct upgrade kits for other third-party software applications, provided that the software is related to the use of Siebel eBusiness Applications.

There are two procedures to this process:

- To create a new upgrade component Third Party - WinZip
- To define a Third Party - WinZip upgrade kit on page 168

To create a new upgrade component Third Party - WinZip

1. From the application-level menu, select View > Site Map > Siebel Anywhere Administration.
2. From the Show drop-down list, select Upgrade Components.

   The Upgrade Components list appears.
3. On the Upgrade Components list, click New.

   A blank record appears.

   Enter the necessary information.

   As an alternative, copy the record of an existing Third Party component and then edit the fields as required.
4. Enter the values shown in the following table.

Field	Comment
Component Name	Enter `Third Party - WinZip`.
Component Type	From the pick list, choose Third Party Software.
Locate Method	From the pick list, choose Registry.

Field	Comment
Locate Information	Enter `HKEY_CLASSES_ROOT,WinZip\shell\open\command` Locate Info has the following structure when Locate Method is set to Registry: *HKEY,Subkey,Name*. If *Name* is equal to the default, that is, (Default) as seen in the Registry Editor, then leave *Name* as blank in Locate info.
Version method	From the pick list, choose FileVersion.

5. From the Show drop-down list, select Configurations.

   The Configurations list appears, along with the Related Components list.

6. On the Configurations list, select the desired clients such as Siebel Sales Client.

7. On the Related Components list, click New.

   The Upgrade Components pick list appears.

8. On the Upgrade Components Selection dialog box, select Third Party - WinZip.

   The Configurations list appears, along with the Related Components list.

   The new record (Third Party - WinZip upgrade component) is highlighted in the Related Components list, which indicates that it is selected.

   This step completes the procedure to create a new upgrade component, Third Party - WinZip.

To define a Third Party - WinZip upgrade kit

1. From the application-level menu, select View > Site Map > Siebel Anywhere Administration.

2. From the Show drop-down list, select Upgrade Kits.

   The Upgrade Kits view appears.

3. Click Auto Create to invoke the Upgrade Kit Wizard.

   The Upgrade Kit Wizard - Upgrade Components page appears.

4 Choose Third Party - WinZip in the list and click Next.

The Upgrade Kit Wizard - Add Files page appears.

5 Input the UNC path of the WinZip installer.

6 Click Next.

The Upgrade Kit Wizard - Select Execute File page appears.

7 Input the executable filename such as `Install.exe` and the command-line argument if any.

8 Follow the prompts to perform the following actions:

a Review and verify the information.

b Specify the new version number.

c (Optional) Change the title, if you want to do so.

9 When you have finished entering upgrade kit information, click Finish.

Follow the procedures in Chapter 4, “Activating, Applying, and Distributing Upgrade Kits,” to activate, apply, and distribute the kit.

Troubleshooting for Siebel Anywhere A

This appendix includes tips to help administrators resolve some problems that can arise while working with Siebel Anywhere. It includes the following topics:

NOTE: For any troubleshooting that involves Mobile Web Clients, make sure that Transaction Processor and Transaction Router are up and running on the Siebel Server with which the mobile users synchronize. Verify the Status of the process. For more information see *Siebel Remote and Replication Manager Administration Guide*.

New Upgrade Kit Status "Request Submitted"

From time to time, you may notice that the status of a new upgrade kit remains Request Submitted after several minutes of waiting. A status of Request Submitted means that the Upgrade Kit Builder has not yet picked up the server request to build the kit. There are a number of possible causes for this delay:

- The upgrade kit may have been created when the Siebel Anywhere component was not enabled. The status will not change until the component is enabled. After the component is enabled, the request should be processed automatically.
- The server component Upgrade Kit Builder (UpgKitBldr) may be busy building a previously submitted kit. Most kits take only a few minutes to build. However, database schema kits can take as long as two hours or more to build, depending on the database type, size, and the extent of the schema changes.
- The server component Upgrade Kit Builder (UpgKitBldr) may not be running.
- The server component Service Request Broker (SRBroker) may not be running correctly.
- The server component Service Request Processor (SRProc) may not be running correctly.

The following paragraphs provide information about troubleshooting the latter problems.

Checking for Current Upgrade Kit Builder Activity

There are four ways to check whether the Upgrade Kit Builder is busy building another kit:

- In your Siebel application, navigate to Server Component Request > My Component Requests and inspect the status of the component requests submitted for the Upgrade Kit Builder component. Be aware that this view only shows component requests submitted by the current user.
- In your Siebel application, navigate to Server Administration > Enterprise Operations > Component Requests, and inspect the status of the component requests submitted for the Upgrade Kit Builder component. This view shows requests made by all users.
- In your Siebel application, navigate to Server Administration > Tasks, and query for tasks with Component Type of Upgrade Kit Builder.
- In srvrmgr, enter the following command to check on the status of previous upgrade kit requests:

  ```
  srvrmgr> list task for comp UpgKitBldr
  ```

Checking the Status of Components Related to Upgrade Kits

There are three ways to check the status of the UpgKitBldr, SRBroker, and SRProc components:

- In your Siebel application, navigate to Server Administration > Components and inspect the Component Status values for the applicable components.
- In srvrmgr, use the following command to view the status of a component, replacing *component_name* with UpgKitBldr, SRBroker, or SRProc:

  ```
  srvrmgr> list comp component_name
  ```

- In the log directory, check the log files as follows:
  - Inspect the *enterprise_server_name.siebel_server_name*.log to verify that all the processes for UpgKitBldr, SRBroker, and SRProc were created correctly.
  - See whether there are any signs of trouble in the SRProc_*task#*.log file or the SRBroker_*task#*.log file.

Troubleshooting Service Request Processor Problems

If you find evidence that the SRProc component is not running correctly, check the following aspects of your server’s configuration:

- Is database connection information correct?
- Is User Name/Password correct?
- Have you done server component synchronization? (Server Administration->Enterprise Configuration->Batch Component Admin)

For more information about troubleshooting server problems, see *Siebel Server Administration Guide*.

New Upgrade Kit Status “In Progress”

From time to time, you may notice that the status of a new upgrade kit remains In Progress for an extended period, indicating that the upgrade kit is taking a long time to build. If this is the case, consider the following information to help troubleshoot the situation.

Some of the reasons for a delay in status change include:

- **The upgrade kit is still being built.** (In particular, database schema kits can take as long as two hours or more to build.) To monitor the progress of the upgrade kit, you have three options to check the latest status:
  - Go to the My Component Requests view and look for the latest status.
  - In the server manager line-mode utility, enter:

    ```
    list task for comp UpgKitBldr
    ```

  - Look for the component log file for Upgrade Kit Builder (UpgKitBldr_<taskno>.log) in the log directory.
- **Upgrade Kit Builder is not responding.** Sometimes a Siebel File System error or a network connection error interrupts the operation of Upgrade Kit Builder. If you conclude that Upgrade Kit Builder is not responding, take the following actions:
  - Check two other Server Components that support Upgrade Kit Builder—File System Manager (FSM) and Service Request Broker (SRBroker). Be sure these components are running correctly.
  - Edit the record, change the status from In Progress to Error, save the record, and then delete the record before trying to rebuild. (The reason for deleting the failed record is to avoid a naming conflict.) Then, recreate the upgrade kit.

Unable to Download Upgrade Kit

There are times when the following error messages appear when attempting to download an upgrade kit.

- Unable to find upgrade kit path to upgrade component: *component_name*. Please contact your Siebel administrator or try again.
- The file '*upgrade_kit_file_name*.arc' could not be found on any specified file system.
- Upgrade wizard did not complete successfully. Restart Siebel application to attempt the upgrade again.

- Unable to open compressed file (*Sublevel_directory_path*\S_UPG_KIT_IARG*ROW_ID_REV_NO*.saf).
- Unable to download the Upgrade Kit '*upgrade_kit_title*' required to upgrade your system.

These errors can be caused by the following conditions:

- **A previously required kit has been deactivated or deleted.** The client is trying to find an active kit with a certain New Version number, but there is no such kit because it was deactivated or deleted.

  To solve this problem, have your Mobile Web Client first synchronize using an invalid Configuration (set the Component Name in the CFG file to none). This action will get the recent transactions routed to the Mobile Web Client and pass the transaction regarding the nonfunctioning or inactivated kit.

  Then have users change the Component Name back to the original value and synchronize again. You can make this process transparent to your users by sending them a batch file that synchronizes for them from the command line using a different CFG that was sent to them with the batch file. Use `siebsync.exe` and specify the CFG with the `/c` option.

- **A nonexecutable file has been specified for execution.** The kit you have created is of type Siebel Client Customer Revision and when you were creating the kit, you selected a nonexecutable file to be executed. You need to deactivate the kit and recreate it with the same version number. Activate the kit, but do not apply or distribute it.

- **A user's connection to the Siebel File System is not set correctly.** Use one of the following techniques, depending on the type of user involved:

  - **For Dedicated Web Client users.** Check the Dedicated Web Client users' CFG files and make sure that the File System parameter under Server section is set to the appropriate location and that your user has read/write access to that directory. One test for correct location and read/write access would be to have the user open an attachment. If the attachment opens, then the connection to the Siebel File System is set correctly.

  - **For Mobile Web Client users.** Because Mobile Web Client users are connected to the Siebel File System through the Siebel Server, make sure the Siebel File System parameter of Synchronization Manager is set to the correct location—the same location as the File System parameter in the CFG file (of the user who has created the kit). In other words, make sure that the File System Manager is working properly.

- **There is not enough space on the machine to download the kit.** Free some space and try to retrieve and install the upgrade kit again.
- **A prerequisite upgrade kit is not available.** An upgrade that the System Administrator intends for the end users to retrieve may depend on another kit that has either been deactivated, deleted, or not created yet. The Siebel Client will make sure that all kits are ready before invoking the Upgrade Wizard.

Required Kit Cannot Be Installed

If you create and distribute a required upgrade kit that, for some reason, cannot be installed on the client or server, you need to define and distribute a repair kit (a new upgrade kit that functions properly).

Use the Upgrade Kit Wizard to define the repair kit. Make sure the version information in the repair kit differs from the version information in the nonfunctioning kit in the following ways:

- If the minimum version is editable, make sure that its value is set to the last known good version for this upgrade component.

  For example, if the minimum version of the nonfunctioning kit was 5, the minimum version of the priority kit should be no higher than 5.

- Make sure that the new version of the repair kit is at least one version number higher than the new version of the nonfunctioning kit.

  For example, if the new version of the nonfunctioning kit was 6, make the new version of the repair kit 7. Then, Siebel Anywhere can upgrade the user’s setup from the last good version, skipping the nonfunctioning version.

After you have defined your repair kit, activate and test the kit as you would do for any other required kit. Distribute the repair kit to the appropriate Dedicated or Mobile Web Client users, as described in the following procedure.

To distribute a repair kit

1 From the application-level menu, select View > Site Map > Siebel Anywhere Administration.

2 From the Show drop-down list, select Configurations.

The Configurations list appears.

3 Prepare the kit for distribution.

a In the Upgrade Configurations list, select the configuration under which you distributed the nonfunctioning kit.

b Verify that the components in the repair kit are included in the configuration as related components.

c With this configuration selected, click Distribute.

Failed Upgrade Kit Locks Administrator's Account

If the Siebel administrator's account is locked out due to a failed upgrade kit, the following procedure will help you recover.

It is also sometimes possible to log in as a Web Client that does not have version checking or upgrades, and take corrective measures to resolve the issue related to the failed upgrade.

To unlock the Siebel administrator

1. Edit the Siebel administrator's CFG file by changing the ComponentName parameter to None.

   This change will prevent the Siebel client from performing any version checking. If you dynamically associated the System Administrator account with a configuration, contact Siebel Technical Support for assistance to help resolve this issue.

   CAUTION: Dynamically associating the System Administrator account with any configuration is *not* recommended, because doing so sometimes prevents the System Administrator from logging in.

2. If the upgrade kit failed while the Siebel Upgrade Wizard was running, then delete the file upgwiz.ucf in the \bin directory.

   The Siebel client always checks for the existence of the file upgwiz.ucf in the \bin directory to find out if it was in the middle of an upgrade.

3. Log in to the system to determine the reason for the failed upgrade, and take corrective measures.

   Presumably, the other subscribers to your original configuration are also affected.

4. Test your solutions using the Siebel Test Client configuration.

5. After testing the upgrade kit thoroughly, distribute the correct upgrade kit to every appropriate configuration.

   Remember to change the value of the ComponentName parameter to its original value in the CFG.

Converting a Required Kit to an Optional Kit

If you distribute a required kit for Dedicated Web Client users and realize it should have been optional, use the following procedure to convert the kit from required to optional.

NOTE: *This procedure only applies to Dedicated Web Client users.* Kits for Mobile Web Client users cannot be changed from required to optional. If a Mobile Web Client user has difficulty with a required kit, you must deactivate the problematic kit and create a new kit. The new kit should have the same Minimum Old Version and Maximum Old Version settings as the deactivated kit, but it should have a higher New Version number.

To convert a required kit to an optional kit (for Dedicated Web Clients only)

1. From the application-level menu, select View > Site Map > Anywhere Administration.
2. From the Show drop-down list, select Upgrade Components.

   The Upgrade Components list appears.
3. From the Upgrade Components list, select the name of the Upgrade Component for which you distributed the upgrade kit.
4. Modify the Min Version field with the minimum value that is acceptable, or change it to null.

   CAUTION: Perform this step carefully, because the wrong minimum value could cause some users to skip a related required kit.
5. Step off the record, or choose Save Record from the applet menu, to save the record.
6. Navigate to the Anywhere Administration screen.
7. From the Show drop-down list, select Configurations.

   The Upgrade Configurations and Related Components list applets appear.

8. On the Upgrade Configurations list applet, select the configurations you had previously distributed the component information to.
9. Click Distribute.

These steps make the upgrade kit optional and allow the users to log in to the Product Updates view—if the client version they are using is between the minimum and maximum for the upgrade component in the Upgrade Components view.

Changing Version Settings After Distribution

If users receive an error message such as “Unable to select required upgrade kits to upgrade your system” when attempting to retrieve an upgrade kit, Minimum Old Version and Maximum Old Version may be set inappropriately.

The following procedure describes how to correct inappropriate values for Minimum Old Version and Maximum Old Version after an upgrade kit has been distributed.

To change Minimum Old and Maximum Old versions of a kit after distribution

1. From the application-level menu, select View > Site Map > Siebel Anywhere Administration.
2. From the Show drop-down list, select Upgrade Kits.

   The Upgrade Kits list appears.
3. From the Upgrade Kits list, select the target upgrade kit.
4. If the status is Active, change the status to Pending.
5. Change Minimum Old Version and Maximum Old Version values per your requirement.

   If you want the upgrade kit to be available for every client, set both values to blank.

6. While the kit is selected, click Activate.

   NOTE: Do *not* change the status of the kit to Active manually. Manually changing the status in this way does not actually activate the kit.

   You do not need to apply or distribute.

Index