



Performance Management Advisors 8.0

Contact Center Advisor &
Workforce Advisor

Deployment Guide

The information contained herein is proprietary and confidential and cannot be disclosed or duplicated without the prior written consent of Genesys Telecommunications Laboratories, Inc.

Copyright © 2003–2011 Genesys Telecommunications Laboratories, Inc. All rights reserved.

About Genesys

Alcatel-Lucent's Genesys solutions feature leading software that manages customer interactions over phone, Web, and mobile devices. The Genesys software suite handles customer conversations across multiple channels and resources—self-service, assisted-service, and proactive outreach—fulfilling customer requests and optimizing customer care goals while efficiently using resources. Genesys software directs more than 100 million customer interactions every day for 4000 companies and government agencies in 80 countries. These companies and agencies leverage their entire organization, from the contact center to the back office, while dynamically engaging their customers. Go to www.genesyslab.com for more information.

Each product has its own documentation for online viewing at the Genesys Technical Support website or on the Documentation Library DVD, which is available from Genesys upon request. For more information, contact your sales representative.

Notice

Although reasonable effort is made to ensure that the information in this document is complete and accurate at the time of release, Genesys Telecommunications Laboratories, Inc., cannot assume responsibility for any existing errors. Changes and/or corrections to the information contained in this document may be incorporated in future versions.

Your Responsibility for Your System's Security

You are responsible for the security of your system. Product administration to prevent unauthorized use is your responsibility. Your system administrator should read all documents provided with this product to fully understand the features available that reduce your risk of incurring charges for unlicensed use of Genesys products.

Trademarks

Genesys, the Genesys logo, and T-Server are registered trademarks of Genesys Telecommunications Laboratories, Inc. All other trademarks and trade names referred to in this document are the property of other companies. The Crystal monospace font is used by permission of Software Renovation Corporation, www.SoftwareRenovation.com.

Technical Support from VARs

If you have purchased support from a value-added reseller (VAR), please contact the VAR for technical support.

Technical Support from Genesys

If you have purchased support directly from Genesys, please contact Genesys Technical Support at the regional numbers provided on [page 9](#). For complete contact information and procedures, refer to the [Genesys Technical Support Guide](#).

Ordering and Licensing Information

Complete information on ordering and licensing Genesys products can be found in the [Genesys Licensing Guide](#).

Released by

Genesys Telecommunications Laboratories, Inc. www.genesyslab.com

Document Version: 80pma_dep_cca-wa_01-2011_v8.0.001.04



Table of Contents

List of Procedures	5
Preface	7
About Contact Center Advisor and Workforce Advisor	7
Intended Audience	8
Making Comments on This Document	8
Contacting Genesys Technical Support	9
Document History	9
New in Document Version 8.0.001.04	9
New in Document Version 8.0.001.02	9
Chapter 1 Contact Center Advisor and Workforce Advisor Deployment	11
Installation Notes	11
Prerequisites	12
Contact Groups' Filename	12
Contact Group File's Header	13
Installation Contents	13
Chapter 2 Installing CCAdv/WA Modules	15
Creating the Metrics Graphing Database	15
Updating the Advisors Login for the Metric Graphing Database	18
Installing CCAdv/WA Modules	22
Installing XML Generator Services	25
Installing the XML Generator	25
Notes for the Data Source Database Name	29
Workforce Advisor Web Service Option	29
Automated Installation Options	33
Specifying Input Properties	34
Performing a Semi-Silent Installation	34
Performing a Silent Installation	34
Troubleshooting Installation Errors	35

Chapter 3	Other Considerations	37
	Formatting Alert Messages Sent by Advisors.....	37
	Changing the XMLGen Connection after Installation	40
	Installing the XML Generator as a Service	40
	Installing and Configuring Apache.....	41
	Latency Getting to the Login page.....	41
	Disabling Performance Monitor and the Workforce What-If Tool.....	41
	Installing Services under Windows 2008 Server	42
Supplements	Related Documentation Resources	43
	Document Conventions	46
Index	49



List of Procedures

Creating the Metric Graphing database	16
Creating a login to the Metric Graphing database	18
Installing CCAdv/WA Modules	22
Installing the XML Generator	25
Installing Workforce Advisor Web service	30
Installing XML Generator as a service	40
Removing XMLGen as a service	41



Preface

Welcome to the Genesys *Performance Management Advisors 8.0 Contact Center Advisor & Workforce Advisor Deployment Guide*. This document describes how to configure and install Contact Center Advisor and Workforce Advisor.

This document is valid only for 8.0.x releases of this product.

Note: For versions of this document created for other releases of this product, visit the Genesys Technical Support website, or request the Documentation Library DVD, which you can order by e-mail from Genesys Order Management at orderman@genesyslab.com.

This preface contains the following sections:

- [About Contact Center Advisor and Workforce Advisor, page 7](#)
- [Intended Audience, page 8](#)
- [Making Comments on This Document, page 8](#)
- [Contacting Genesys Technical Support, page 9](#)
- [Document History, page 9](#)

For information about related resources and about the conventions that are used in this document, see the supplementary material starting on [page 43](#).

About Contact Center Advisor and Workforce Advisor

Contact Center Advisor and Workforce Advisor provide your company the capability to view and analyze contact centers and workforce management operations with real-time information from a central point of reference. Information technology and business operations personnel can proactively manage both technical and business aspects of the contact center operations and take action to correct problems before they affect the business operation.

Contact Center Advisor and Workforce Advisor provides a real-time display of contact center activity and workforce management for contact centers throughout the domain. Predefined alerting conditions on applications, call

types, and contact groups are established to display alerts on the dashboard, as well as to notify designated contacts. In addition, Cisco Intelligent Contact Management (ICM) peripheral gateways are monitored and will activate an alert when they go offline.

Intended Audience

This document is primarily intended for system installers. It has been written with the assumption that you have a basic understanding of:

- Computer-telephony integration (CTI) concepts, processes, terminology, and applications.
- Network design and operation.
- Your own network configurations.
- Operating systems and large system configuration.

Making Comments on This Document

If you especially like or dislike anything about this document, feel free to e-mail your comments to Techpubs.webadmin@genesyslab.com.

You can comment on what you regard as specific errors or omissions, and on the accuracy, organization, subject matter, or completeness of this document. Please limit your comments to the scope of this document only and to the way in which the information is presented. Contact your Genesys Account Representative or Genesys Technical Support if you have suggestions about the product itself.

When you send us comments, you grant Genesys a nonexclusive right to use or distribute your comments in any way it believes appropriate, without incurring any obligation to you.

Contacting Genesys Technical Support

If you have purchased support directly from Genesys, contact Genesys Technical Support at the following regional numbers:

Region	Telephone	E-Mail
North America and Latin America	+888-369-5555 (toll-free) +506-674-6767	support@genesyslab.com
Europe, Middle East, and Africa	+44-(0)-1276-45-7002	support@genesyslab.co.uk
Asia Pacific	+61-7-3368-6868	support@genesyslab.com.au
Malaysia	1-800-814-472 (toll-free) +61-7-3368-6868	support@genesyslab.com.au
India	000-800-100-7136 (toll-free) +91-(022)-3918-0537	support@genesyslab.com.au
Japan	+81-3-6361-8950	support@genesyslab.co.jp
Before contacting technical support, refer to the <i>Genesys Technical Support Guide</i> for complete contact information and procedures.		

Document History

New in Document Version 8.0.001.04

The installation procedure for the Metrics Graphing database has been described in detail in this release of this document.

New in Document Version 8.0.001.02

- Minor textual and screenshot corrections have been made in this release of this document.
- Information about contact groups has been added. See “Contact Groups’ Filename ” on [page 12](#).
- Information about data source names has been added. See “Notes for the Data Source Database Name ” on [page 29](#).
- Information about installing and running under Windows 2008 has been updated. See “Installing Services under Windows 2008 Server” on [page 42](#).



Chapter

1

Contact Center Advisor and Workforce Advisor Deployment

This chapter describes how to configure and install Contact Center Advisor and Workforce Advisor (CCAdv/WA). It contains the following sections:

- [Installation Notes, page 11](#)
- [Prerequisites, page 12](#)
- [Installation Contents, page 13](#)

Installation Notes

- For each physical server on which you install a Web application (such as Contact Center Advisor or Workforce Advisor), you must install Platform. XMLGen also needs Advisors Platform to be installed.
- Alert e-mail templates are located in the <install_dir>\conf\templates directory.
- An 8.0 version of the Advisors Browser can co-reside with a 3.x version on the same box; however, both versions cannot run on the same box simultaneously. Attempts to launch a second browser will only open another window for the running instance: for example, launching 3.3 and then 8.0 will result in two 3.3 windows. For 8.0 to co-reside with 3.X, you must do the following:
 - Agree to upgrade your browser to the later version found on the 8.0 server, and
 - Agree not to remove the older version of the browser on your machine.

- The installation process has several distinct sections in order to accommodate different stages of system preparation. If some or all of the infrastructure software systems are already installed, various steps can be bypassed. It is important to get specific information about the location of these components from the original installer or the package manager.

Prerequisites

You must take the following installation and configuration actions before you install the CCAdv/WA modules:

1. Install Java Development Kit Installation, version JDK 1.6.
2. Install Genesys Advisors Platform 8.0 and Administration Module option as part of Advisors Platform installation. See the *Performance Management Advisors 8.0 Advisors Platform Deployment Guide* for full details of installing Platform.
3. Install Flash Player 10.x for non-IE browsers (such as Firefox).
4. Install Apache HTTP Server 2.2.16
If the Apache server is installed on the same machine as Advisors Platform, the Apache server must use a port other than 8080 (which is used by Advisors Platform). In most cases, Apache will be able to use port 80.
5. Install Microsoft SQL Server 2005.
6. Install either Genesys Adapter if you are using a Genesys CTI installation. For Cisco installations, no adapter is required.

Then you can complete the remaining elements of the CCAdv/WA installation, as described in the remainder of this document.

Steps 1 to 5 are documented in the *Performance Management Advisors 8.0 Platform Deployment Guide*.

Step 6 is documented in the *Performance Management Advisors 8.0 Genesys Adapter Deployment Guide* and the *Performance Management Advisors 8.0 Cisco Adapter Deployment Guide*.

Contact Groups' Filename

The prefix of the contact group's filename must remain the same before the first period in order for file updates to be accurate.

For example, CPWU.20070307_2058.dat must always begin with CPWU. The naming convention is:

`<system>.<group_id>[.<date>].*`

The date is optional and the ending can be anything (.csv, .txt, .ewfm).

The IEX source names and the eWFM source names must be unique.

Contact Group File's Header

Each file must have a header exported by the WFM system, so Workforce Advisor knows which metrics are present, and their order.

In a file from IEX TotalView the header records are as follows:

```
#fields:date|period|TZ|custID|saGroupID|saGroupName|ssGroupID|ssGroupName|buID|buName|ctID|ctName|acdID|modify|fcstContactsReceived|fcstContactsHandled|fcstAHT|fcstSLPct|slPctObj|slTime|fcstOcc|maxOcc|fcstASA|asaObj|fcstReq|revPlanReq|commitPlanReq|schedOpen
```

```
#sort:date,period,TZ,custID,saGroupID,saGroupName,ssGroupID,ssGroupName,buID,buName,ctID,ctName,acdID,modify,fcstContactsReceived,fcstContactsHandled,fcstAHT,fcstSLPct,slPctObj,slTime,fcstOcc,maxOcc,fcstASA,asaObj,fcstReq,revPlanReq,commitPlanReq,schedOpen
```

The #sort record is not necessary.

For Aspect eWFM, the forecast and staff groups are either in:

- One file (undistributed), or;
- Two files (distributed).

The header records are as follows:

- **Undistributed scenario**

In the one file for both forecast and staff groups:

```
PRI_INDEX,ROUTING_SET,START_TIME,STOP_TIME,HOUR,MINUTE,RVOL,RAHT,SSL,RDELAY SEC,SGRREQ,SGRSCH
```

- **Distributed scenario**

In a file of metrics for forecast contact groups:

```
PRI_INDEX,ROUTING_SET,START_TIME,STOP_TIME,HOUR,MINUTE,RVOL,RAHT,SSL,RDELAY SEC,SGRREQ,SGRSCH
```

In a file of metrics for staff contact groups:

```
PRI_INDEX,ROUTING_SET,START_TIME,STOP_TIME,HOUR,MINUTE,SGRSCH,SGRREQ,RDELAY SEC
```

Installation Contents

The following files are shipped with the Contact Center Advisor/Workforce Advisor (CCAdv/WA) distribution:

- CCAdv/WA installer
ccadv-wa-server-installer-**<version>**.jar
- Metric Graphing database script
mg-new-database-**<version>**.sql



Chapter

2

Installing CCAdv/WA Modules

This section describes how to install Contact Center Advisor, Workforce Advisor and the Genesys Advisor browser. It contains the following sections:

- [Creating the Metrics Graphing Database, page 15](#)
- [Installing CCAdv/WA Modules, page 22](#)
- [Installing XML Generator Services, page 25](#)
- [Workforce Advisor Web Service Option, page 29](#)
- [Automated Installation Options, page 33](#)
- [Troubleshooting Installation Errors, page 35](#)

Creating the Metrics Graphing Database

This section outlines how to create the Metrics Graphing database.

Note: If due to security restrictions administrator access cannot be granted, have the customer's DBA implement the steps described in this section.

The Metric Graphing database is required only for installations of the CCAdv dashboards and XMLGen.

Procedure: Creating the Metric Graphing database

Note: If due to security restrictions administrator or security administrator access cannot be granted, the local DBA should implement the steps described in this section.

Start of procedure

1. Connect to the SQL Server 2005 instance using Microsoft SQL Server Management Studio with the LoginID assigned to the SQL Server sysadmin server role. It can be sa or any other login assigned to the sysadmin server role and created for you for temporary use during the deployment.
2. In the object explorer right-click on Databases and choose New Database. Open the General screen (Figure 1 on [page 16](#)).

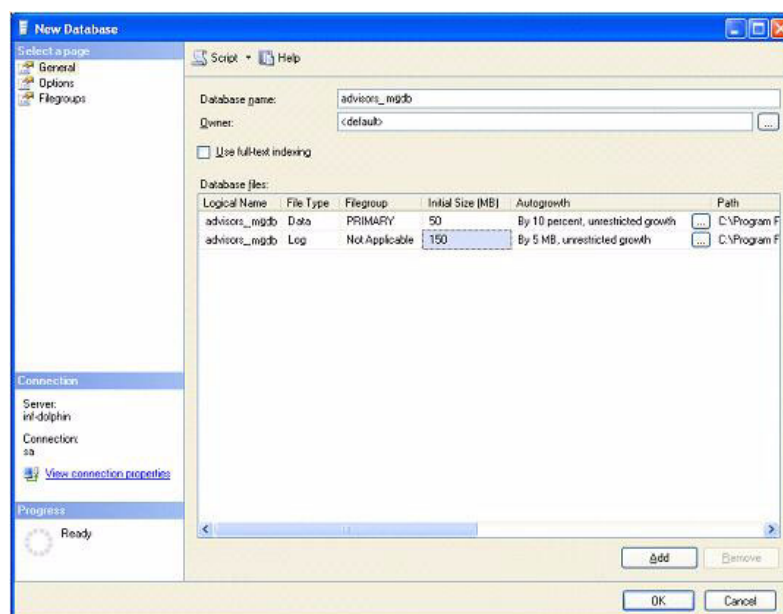


Figure 1: Database Properties—General

- a. Specify the database name—advisors_mgdb.
- b. Leave the owner as <default>.
- c. Specify 50 Mb as the initial data file size with Autogrowth set to By 10%, unrestricted file growth.
- d. Specify 150 Mb as the initial log file size with Autogrowth set to By 5MB, unrestricted file growth.
- e. Change the pathnames to the data and log files if necessary.

3. Open the Options screen. See Figure 2 on [page 17](#).

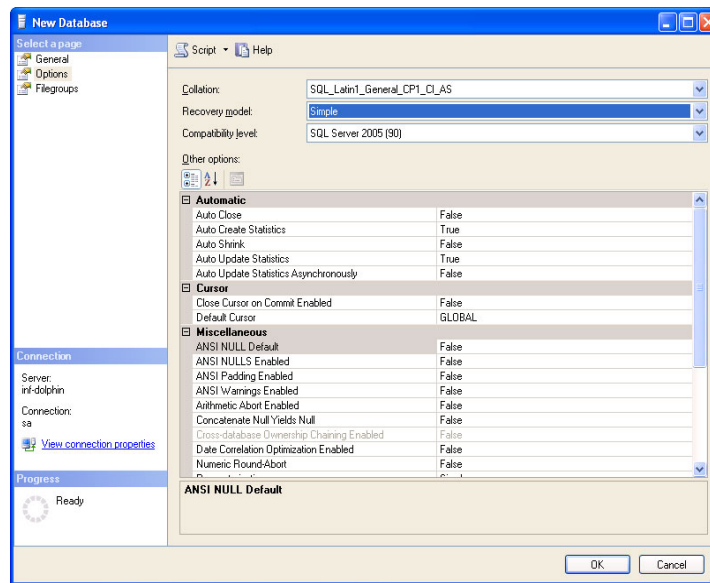


Figure 2: Database Properties, Options

- a. In the Collation field, select SQL_Latin1_General_CP1_CI_AS.
 - b. In the Recovery model field, select Simple.
 - c. Set Auto Create Statistics and Auto Update Statistics to the value true.
4. Click OK.
 5. If you want to use a separate schema as a container for the database objects related to the Advisors applications, implement steps 6 and 7. Otherwise proceed to “Creating a login to the Metric Graphing database” on [page 18](#).
 6. In the Object Explorer, expand Databases, advisors_mgdb, Security, and Schemas.

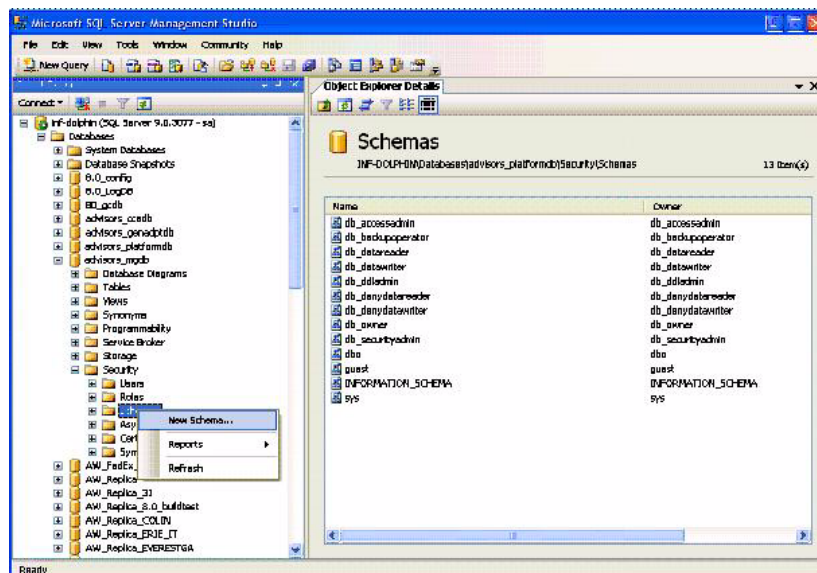


Figure 3: Database Security—Schemas

7. Right-click on Schemas, choose New Schema, then specify the schema name. You can choose any schema name that corresponds to your company and SQL Server naming conventions.
8. Click OK. The database is created and properties are configured.

End of procedure

Updating the Advisors Login for the Metric Graphing Database

Procedure: Creating a login to the Metric Graphing database

Note: If due to security restrictions administrator or security administrator access cannot be granted, have the customer's DBA implement the steps described in this section.

Start of procedure

1. In the Microsoft SQL Server Management Studio object explorer, select **Server** and then **Security**.

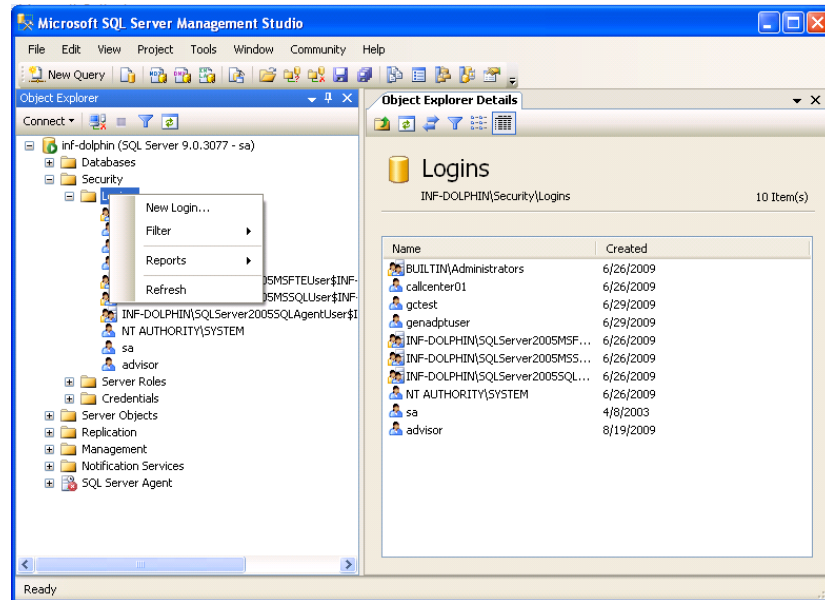


Figure 4: Server-Level Security

2. Right-click Logins and choose **New Login** (not required if using the same login as configured for the Advisors Platform).
 - a. Specify the login name (in this example, `callcenter01`).
 - b. Click **SQL Server Authentication**.
 - c. Specify a password that complies with the organization's security policy.
 - d. If strong passwords are part of the security policy, check the **Enforce password policy** check box.
3. Open the **Login Properties - User Mapping** screen (Figure 5 on [page 20](#)).

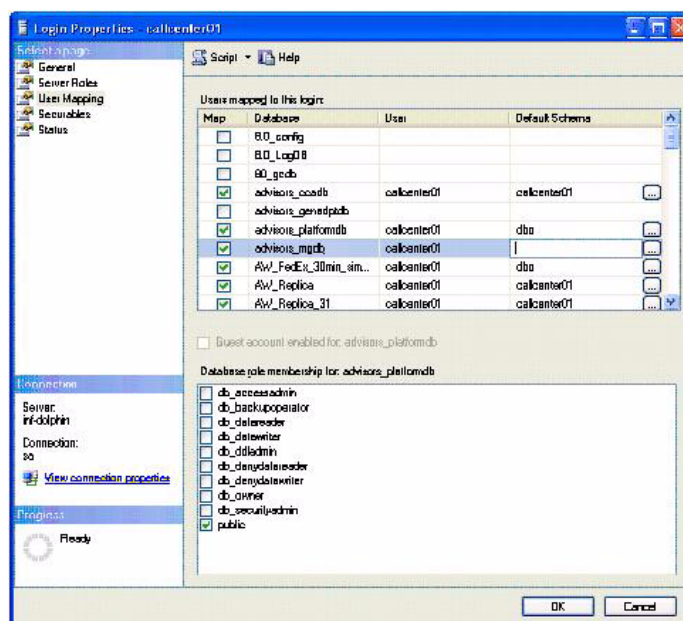


Figure 5: Login Properties—User Mapping 1

- a. Map the user (callcenter01 in this example) to the newly created database (advisors_mgdb in this example) by checking the appropriate check box.
- b. Choose dbo as a default schema if you skipped steps 5 and 6 in the procedure “Creating the Metric Graphing database” on [page 16](#). Otherwise select the name of the created schema.

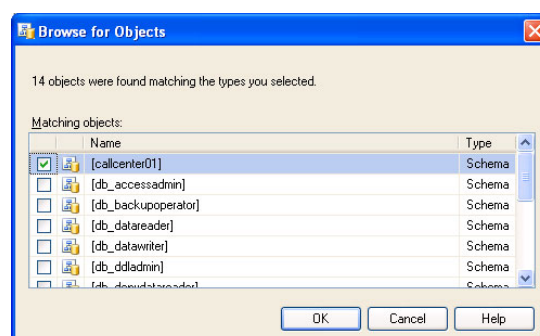


Figure 6: Browse for Objects

- c. Click OK, then confirm your selection by highlighting it and clicking OK again in the Select Schema dialog. This returns you to the User Mapping screen.

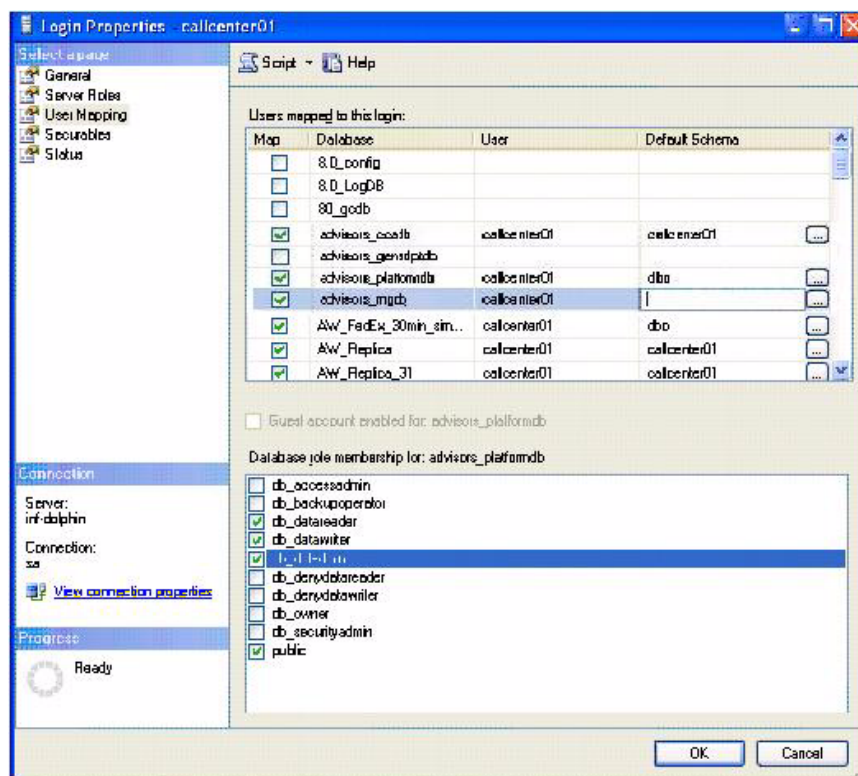


Figure 7: Login Properties—User Mapping 2

- d. Add the user to the db_owner database role (Figure 7) or to all three of the following roles: db_datareader, db_datawriter, and db_ddladmin.

The login to be used by Metric Graphing database is created and configured.

End of procedure

Installing CCAdv/WA Modules

Procedure: Installing CCAdv/WA Modules

Start of procedure

1. From the Advisors software DVD, launch the installer by double-clicking the install.jar. The Welcome screen displays.
2. Click Next.
The Module to Install screen displays (Figure 8 on [page 22](#)).

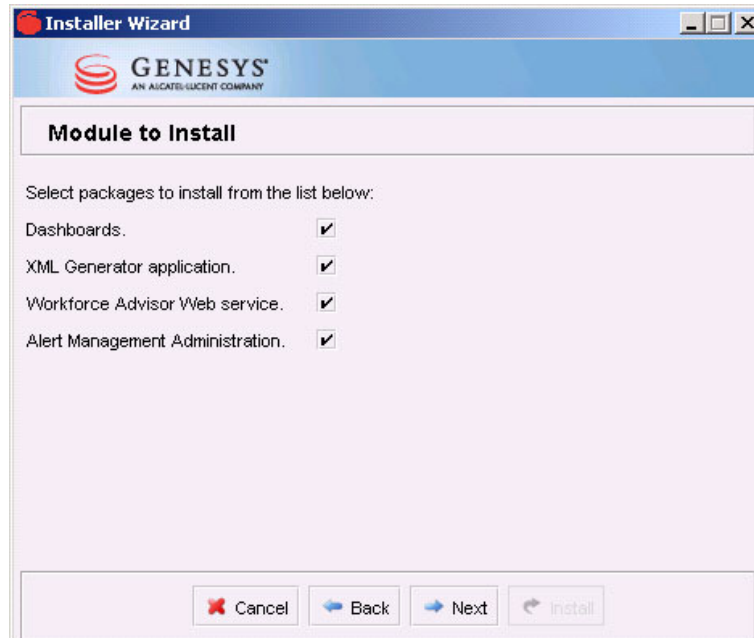


Figure 8: Module to Install Screen

3. Each of the module sets can be installed on a different machine; however, Advisors Platform must be installed on each server where a module is installed. When installing multiple modules on the same machine, the underlying components, such as Geronimo, are installed only once.

The module sets are:

- Dashboards:
 - Contact Center Advisor dashboard—No additional configuration required.
 - Workforce Advisor dashboard—Disabled for the user until the Workforce Advisor module is installed.

- XML Generator application—See “Installing the XML Generator” on [page 25](#).
 - Workforce Advisor Web service—Workforce Advisor Web server only (not the Dashboard).
 - Alert Management administration—No additional configuration required.
4. For all options, the installation process prompts for the location of the installation directory and Advisors Platform database. Use the same directory and database configuration that was specified when Advisors Platform was installed. See the *Performance Management Advisors 8.0 Platform Deployment Guide*.
 5. For the Dashboard and XML Generator options, the installation process prompts for the location of the Metric Graphing database.

Figure 9: Metric Graphing Screen—Dashboards and XMLGen

Note: If you have opted to install Dashboard but not XML Generator, the Store snapshots field is not displayed.

6. Specify the connection parameters for the Metric Graphing database, following the onscreen instructions.

If you are installing XML Generator, enter the interval in seconds that controls how frequently snapshots are stored in the database. For example, if this parameter is set to 60 seconds, then XML Generator will store graphable snapshots no more often than that. However, XML Generator

may store the snapshots less frequently depending upon load and the complexity of the configuration.

7. Click Next to continue.
The Java Development Kit screen displays.



Figure 10: Java Development Kit page

8. Enter or select the folder location for the Java Development Kit.
9. Click Next.

End of procedure

Installing XML Generator Services

This section describes how to install the XML Generator services.

Note: The creation of linked servers may be required for either Cisco or Genesys installations.

For a Cisco installation, you will definitely need to link to the server containing the Cisco Intelligent Contact Management AW databases. These must exist before the Advisors installation can proceed.

For a Genesys installation, you may or may not have existing metrics databases. These will either be created during the subsequent Genesys Adapter installation(s), or will have already been created as part of earlier Genesys Adapter installation(s) (for example, for a previous version). The creation of linked servers is required only if the metrics databases exist or will be created on different SQL Server instances.

Installing the XML Generator

If the XMLGen option is selected on the `Module to Install` screen and you have installed the Platform, the `XML Generator` screen displays.

Procedure: Installing the XML Generator

Start of procedure

1. Enter XML Generator's output directory. If XML Generator must write to a drive accessible over the network, enter a path to the directory using the Uniform Naming Convention, which includes the host name and the name of the shared drive. For example:

```
//host_name/shared_drive_name/root_directory_name/directory_1_name/  
directory_2_name
```

You can use forward slashes in the name even on Windows systems. If you use back slashes, they must be escaped.

```
\\\\host_name\\shared_drive_name\\root_directory_name\\directory_1_  
name\\directory_2_name.
```

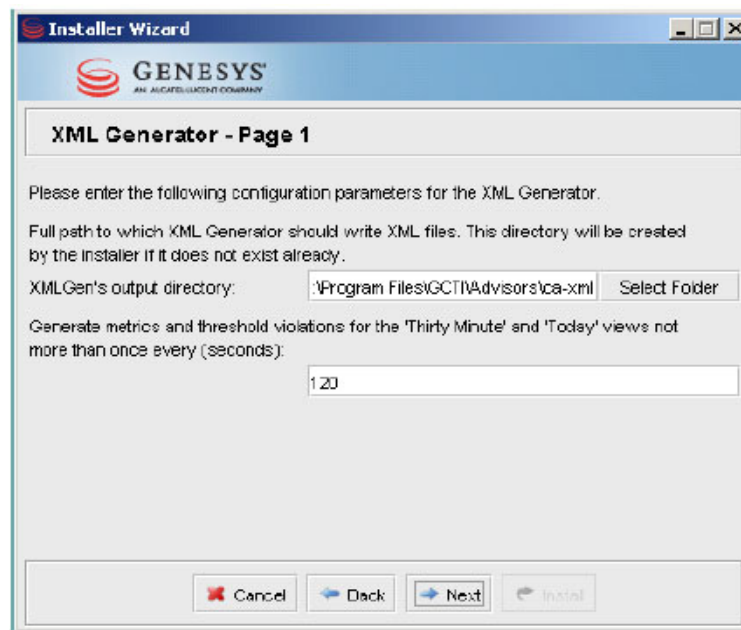


Figure 11: XML Generator Page 1

2. Enter the interval for the 30-minute and Today processing schedules. For example, if this parameter is set to 120 seconds, then XML Generator will store metrics and threshold violations for these two views no more often than that. However, XML Generator may store the view data less frequently depending upon load and the complexity of the configuration.
3. Click Next.
The XML Generator Page 2 screen displays.

Installer Wizard

GENESYS
AN AVAYA COMPANY

XML Generator - Page 2

Maximum number of retry attempts in case of DB connection failure.
Max. retry attempts:

Seconds between XMLGen's reconnect retry attempts in case of DB connection failure.

Support e-mail address to which connection problems will be sent.
Support E-mail To Address:

E-mail address from which alert messages will be sent.
Alert E-mail From Address:

Figure 12: XML Generator Page 2

4. Enter the maximum number of retry attempts in the event of the database connection failure.
5. Enter the number of seconds between Contact Center Advisor XML Generator's reconnection attempts in the event of the database connection failure.
6. Enter the e-mail address to which connection problems are to be sent.
7. Enter the e-mail address to appear as the From address in all alert e-mail messages.
8. Click Next.
The data source installer screen is then displayed.

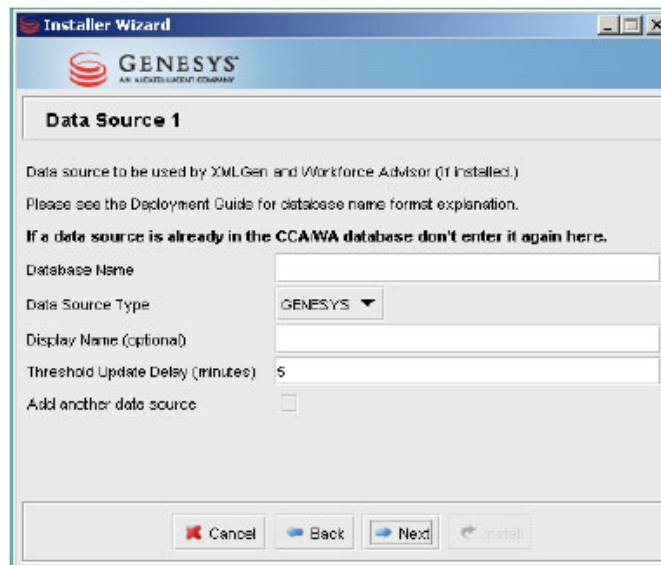


Figure 13: Data Source 1 Screen

9. For each data source not already in the database:
 - a. Enter the database name (including the linked server name if applicable).
 - b. Select the source type (Genesys or Cisco)
 - c. (Optional) Enter the display name.
 - d. Enter the threshold update delay.

If you have additional data sources to add, select Add another data source and repeat this step. Up to five data sources may be added via the installer.
10. Click Next.
The Installation Progress screen displays.
11. Click Show Details.
The Installation Progress screen displays.
The progress displays on the Output tab. Any errors display on the Errors tab.
12. Click Install.
The progress displays on the Output tab. Any errors display in the Errors tab.
13. If no errors display, close the Finished popup. The Output tab displays "Build Successful" and the total time taken for the deployment, or, if errors display, diagnose them in the Errors tab. Delete the installation directory and, after diagnosis, reinstall it.

End of procedure

Notes for the Data Source Database Name

The data source database name must include the linked server name if the database is present on a different MSSQL Server instance from that on which the Platform database is installed.

For Cisco data sources:

- The linked server must point to the MSSQL Server that hosts the Cisco central ICM/IPCC database
- The database specified must be an AWDB database

Example Data Source Names

Example database name setting for a Genesys data source (if located on the same MSSQL Server as the Platform database):

`advisors_gametrics`

Example database name setting for a Cisco data source (using linked server ICMCENTRAL and AWDB named `name_awdb`):

`ICMCENTRAL.name_awdb`

Example database name setting for a Genesys data source where the linked server name contains special characters (entire name enclosed in []):

`[DS00001Primary-345].advisors_gametrics`

Workforce Advisor Web Service Option

If the Workforce Advisor Web service option is selected on the Module to Install screen, the Workforce Advisor screen displays.

Procedure: Installing Workforce Advisor Web service

Start of procedure

1. Enter the To and From e-mail addresses for e-mail notifications.

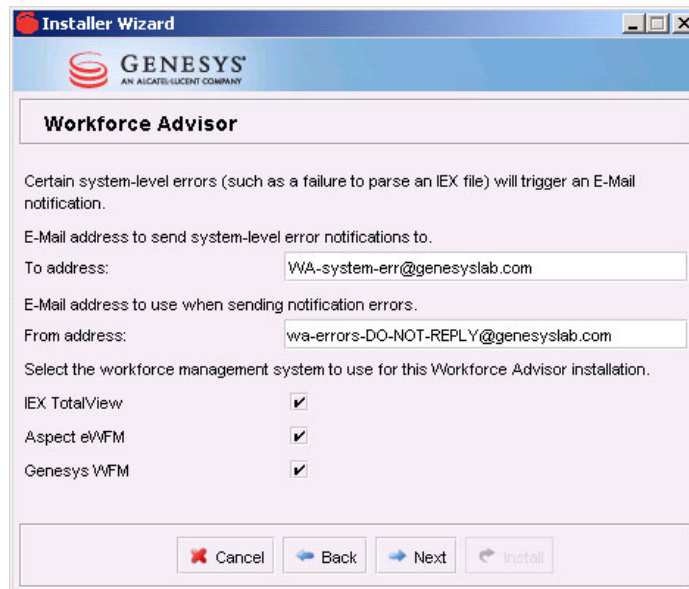


Figure 14: Workforce Advisor Screen

2. Select the sources of the workforce management data.
3. Click Next. The Workforce IEX TotalView page displays (Figure 15 on [page 31](#)).

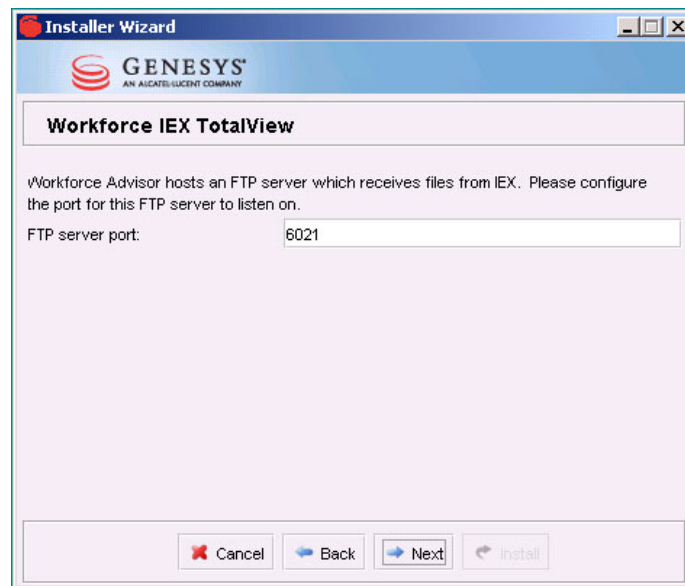


Figure 15: Workforce IEX TotalView Screen

4. Enter the FTP server port that Workforce Advisor should use to receive files.
5. Click Next.
The Workforce Aspect eWFM screen displays.

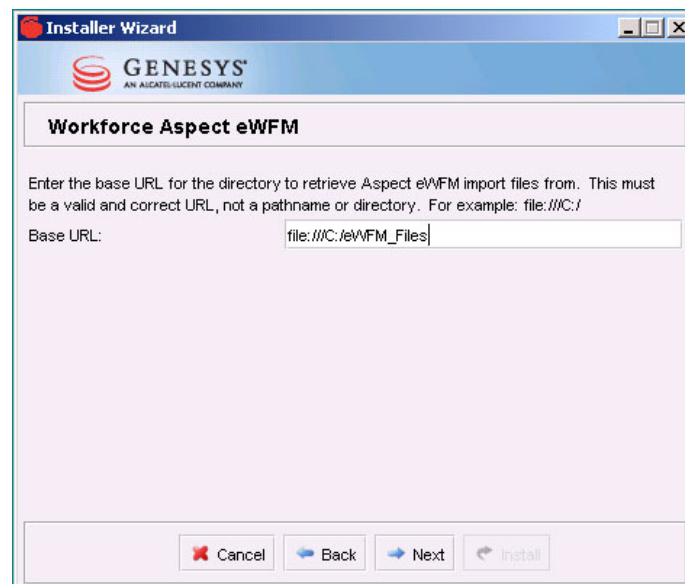


Figure 16: Workforce Genesys WFM Screen

6. Enter the Aspect eWFM base retrieval URL.
The base retrieval URL should be `file:///`, followed by the location of the eWFM files. For Aspect eWFM, if the component must read or write

data kept on a drive accessible over the network, then enter the pathname to the directory using the Uniform Naming Convention, which includes the host name and the name of the shared drive. For example;

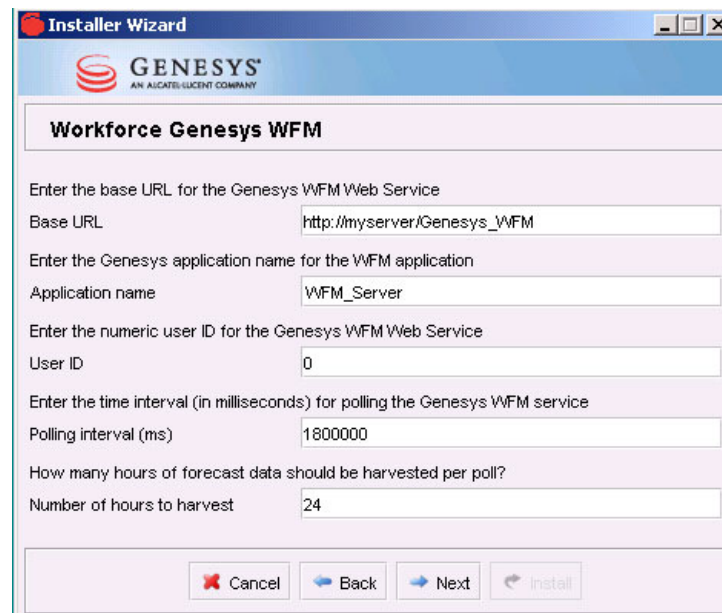
```
//host_name/shared_drive_name/root_directory_name/directory_1_name/
directory_2_name
```

You can use forward slashes in the name even on Windows systems. If you use back slashes, they must be escaped.

```
\\\\host_name\\shared_drive_name\\root_directory_name\\directory_1_
name\\directory_2_name.
```

7. Click Next.

If Genesys WFM is selected, the Workforce Genesys WFM screen displays. If not, the Installation Progress screen displays and you can skip to Step 9.



The screenshot shows the 'Workforce Genesys WFM' screen within the 'Installer Wizard' window. The window has a blue header with the Genesys logo and the text 'AN AUCATEL-LUCENT COMPANY'. Below the header, the title 'Workforce Genesys WFM' is displayed in a pink box. The main area contains five input fields with labels: 'Enter the base URL for the Genesys WFM Web Service' (Base URL: http://myserver/Genesys_WFM), 'Enter the Genesys application name for the WFM application' (Application name: WFM_Server), 'Enter the numeric user ID for the Genesys WFM Web Service' (User ID: 0), 'Enter the time interval (in milliseconds) for polling the Genesys WFM service' (Polling interval (ms): 1800000), and 'How many hours of forecast data should be harvested per poll?' (Number of hours to harvest: 24). At the bottom, there are four buttons: 'Cancel' (with a red X icon), 'Back' (with a blue left arrow icon), 'Next' (with a blue right arrow icon), and 'Install' (with a blue circular arrow icon).

Figure 17: Workforce Genesys WFM Screen

8. Enter the Genesys WFM parameters:

- Base URL
- Application name
- User ID
- Polling interval (ms)
- Number of hours to harvest

Note: For Workforce Advisor installations connecting to Genesys WFM, the server running WA must be able to access your Genesys WFM installation.

To verify this access, from your WA server machine, ping the following locations:

1. The server name or IP address specified in your base WFM URL;
2. The host name of your Genesys WFM instance, as it appears in your WFM server's Configuration Manager application.

Your WA server must have access to all WFM servers in your WFM installation, each by its associated Configuration Manager host name.

9. Click Next.

The Installation Progress screen displays.

10. Click Show Details.

The Installation Progress screen displays. Installation progress displays on the Output tab. Any errors display on the Errors tab.

11. If no errors display, close the Finished popup.

The Output tab displays the message **Build Successful** along with the total time taken for the deployment, or if errors display, you can diagnose them in the Errors tab. Delete the directory into which the installer has written product files and, after diagnosis, reinstall the files.

12. Mandatory step: After the installation is finished, remove the SQL Server installation script from the customer's environment.

End of procedure

Automated Installation Options

In addition to installing CCAdv/WA by entering all properties in the installer UI screens (*normal* mode), two automated installation modes are also available: *semi-silent* and *silent*.

- Semi-silent mode pre-populates all values in the installer UI. The user will be able to review these values and make corrections if necessary.
- Silent mode is similar to semi-silent mode, except that no UI is displayed. Installation will proceed without confirmation, and will exit automatically with log output being written to file.

Specifying Input Properties

For both semi-silent and silent installation modes, all required properties for the installation options, including installation targets, passwords, and so on, must be present in a property file named `ant.install.properties`. This file must be located in the same directory from which the installer will be run.

An initial template can be generated by running the installer in normal mode, and then supplying values for the targets and other installation options. The installer will save these values (excluding passwords) in a file named `ant.userinstall.properties`. The input property file can then be obtained by copying this file to `ant.install.properties`, and then modifying the installation options as required for the specific configuration.

In order to reduce the risk of revealing sensitive information, password values are not written by the installer to the properties file. When the installer creates the `ant.userinstall.properties` file, password properties are created and commented out. For example:

```
#cp.database.password=
```

Once the `ant.userinstall.properties` file has been copied to `ant.install.properties`, you must locate the necessary password properties, uncomment them, and then add the actual password values. For example:

```
cp.database.password=supersecurepassword
```

Performing a Semi-Silent Installation

Semi-silent installation is enabled by running the installation jar with the `ant.install.properties` file present in the installer directory. No other changes are required.

Performing a Silent Installation

The silent installation mode is enabled by adding the `swing-auto` parameter when running an installation jar on the command line. For example, to perform a silent installation of CCAdv/WA, open a command prompt, navigate to the directory containing the installer jar, then run the following command (using the proper version number for “<version>”):

```
java -jar ccadv-wa-installer-<version>.jar swing-auto
```

Note: (Note that the `ant.install.properties` file must be present in the same directory.)

The installer will then run, using the values in the `ant.install.properties` file, and upon exit will indicate success or failure with a message and error codes. A successful installation will look similar to the following:

```
$ java -jar ccadv-wa-installer-<version>.jar swing-auto
Loading self extractor...
```

Install Successful.

A failed installation will look like the following:

```
$ java -jar ccadv-wa-installer-<version>.jar swing-auto
Loading self extractor...
Install Failed.
```

After the installer has been run, these additional files will be present containing log and installer output information:

```
ant.install.log
installation-output.log
```

In the case of installation failure, the `installation-output.log` file can be consulted for further information. (Possible reasons for failure include a missing input properties file, incorrect property values—for example, database passwords—or any other error that would cause a failure during normal installation mode.)

Troubleshooting Installation Errors

Table 1 on [page 35](#) describes parameter validation errors that you may encounter at the end of installation.

Table 1: Installation Error Messages

Error Message	Cause
<pre>[java] Failed to connect to the database using connection URL: [java] jdbc:sqlserver://192.168.xx.yy:nnn;DatabaseName=ys_eadb;use r=sa;password=very_secure_pwd;selectMethod=cursor [java] The following exception was thrown: com.microsoft.sqlserver.jdbc.SQLServerException: The TCP/IP connection to the host 192.168.xx.yy, port nnn has failed. Error: "Connection refused. Verify the connection properties, check that an instance of SQL Server is running on the host and accepting TCP/IP connections at the port, and that no firewall is blocking TCP connections to the port.</pre>	<p>Wrong database server name / IP address or port number</p>

Table 1: Installation Error Messages (Continued)

Error Message	Cause
<pre>[java] Failed to connect to the database using connection URL: [java] jdbc:sqlserver://192.168.xx.yy:nnnn; DatabaseName=NotAPlatformDB; selectMethod=cursor; user=sa; password=very_secure_pwd [java] The following exception was thrown: com.microsoft.sqlserver.jdbc.SQLServerException: The TCP/IP connection to the host 192.168.xx.yy, port nnnn has failed. Error: "connect timed out. Verify the connection properties, check that an instance of SQL Server is running on the host and accepting TCP/IP connections at the port, and that no firewall is blocking TCP connections to the port."</pre>	Wrong database name
<pre>[java] Exception while connecting: Login failed for user 'badUserId'. [java] url used: jdbc:sqlserver://192.168.xx.yy:nnnn; DatabaseName=ys_eadb; se lectMethod=cursor; user=badUserId; password=very_secure_ password</pre>	Wrong database user name or password



Chapter

3

Other Considerations

This chapter describes how to change and (re)configure other system parameters and settings. It includes the following sections:

- [Formatting Alert Messages Sent by Advisors, page 37](#)
- [Changing the XMLGen Connection after Installation, page 40](#)
- [Installing the XML Generator as a Service, page 40](#)
- [Installing and Configuring Apache, page 41](#)
- [Latency Getting to the Login page, page 41](#)
- [Disabling Performance Monitor and the Workforce What-If Tool, page 41](#)
- [Installing Services under Windows 2008 Server, page 42](#)

Formatting Alert Messages Sent by Advisors

You can format the messages for threshold violation alerts and alerts about offline peripherals for Contact Center Advisor (CCAdv), as well as threshold violation alerts for Workforce Advisor (WA). You may want to shorten the text to accommodate the smaller screens of pagers.

The template files for message bodies are available after either XMLGen or WA is installed.

Note: If you format the CCAdv alert messages after installing CCAdv, you must restart XMLGen.

If you format the WA alert messages after installing WA, you must restart Geronimo.

The list of properties you could add with descriptive text appears in [Table 2](#).

Table 2: Message Properties

Description	Property
A comma-separated list of distribution lists to which an e-mail about an alert was sent.	<code>\${distribution.list.names}</code>
The name of the application group related to an element that caused the alert. There may not be one.	<code>\${application.group.name}</code>
Alert types: Business, or Technical.	<code>\${alert.type}</code>
The name of one call center, possibly the only call center, associated with the alert.	<code>\${call.center.name}</code>
A list of comma-separated names of all contact centers associated with the alert.	<code>\${call.center.name.list}</code>
The subject including an application in CCAdv, a contact group in WA and a peripheral.	<code>\${alert.element.name}</code>
A metric's value.	<code>\${alert.value}</code>
The display name of the metric whose threshold violation caused the alert. There may not be one.	<code>\${alert.metric.name}</code>
The value entered on the System Configuration page, called "Threshold Trigger Delay Rate (minutes)" in that page. This may not be appropriate for some of these alerts. For example, a technical alert about a PG being offline is reported as soon as it is detected, not after a delay.	<code>\${alert.delay.minutes}</code>
The alert's start date and time.	<code>\${alert.start.time}</code>
How long the alert is/was active.	<code>\${alert.duration.minutes}</code>
The alert's status: active or expired.	<code>\${alert.active.status}</code>
The name of the geographic region related to the element that caused the alert. There may not be one.	<code>\${geographic.region.name}</code>
The name of the reporting region related to the element that caused the alert. There may not be one.	<code>\${reporting.region.name}</code>
Name of the operating unit related to the element that caused the alert. There may not be one.	<code>\${operating.unit.name}</code>

To format alert messages, change any of the text in the template except the text between the brackets “{}”.

CCAdv Message for an Alert Concerning a Threshold Violation

This is located in:

c:\advisors\conf\templates\AlertThresholdViolation_EmailTemplate.txt

Contact Center Advisor has detected the violation of a business alert to which you are subscribed. You are receiving this alert because the threshold below has remained outside the acceptable range for longer than the defined time period of \${alert.delay.minutes} minutes.

This alert affects the Geographic Region \${geographic.region.name}, Reporting Region \${reporting.region.name}, Operating Unit \${operating.unit.name}, and the Contact Center: {call.center.name.list}.

It involves the application \${alert.element.name} in the Application Group \${application.group.name}.

Metric violated was: \${alert.metric.name}.

Current metric value: \${alert.value}.

Threshold violation was first detected at: \${alert.start.time}.

The alert has been active for: \${alert.duration.minutes} minutes.

The alert's status is: \${alert.active.status}.

CCAdv Message for an Alert Concerning an Offline Peripheral

This is located in:

c:\advisors\conf\templates\AlertOther_EmailTemplate.txt

Contact Center Advisor has detected the violation of a \${alert.type} alert to which you are subscribed.

This alert affects the following contact center(s):
\${call.center.name.list}.

It involves the element (peripheral/application/etc):
\${alert.element.name}.

Alert was first detected at \${alert.start.time}.

Alert status: \${alert.value}.

The alert has been active for: \${alert.duration.minutes} minutes.

The alert's status is: \${alert.active.status}.

WA Message for an Alert Concerning a Threshold Violation

This is located in:

c:\advisors\conf\templates\AlertThresholdViolation_EmailTemplateWU.txt

Workforce Advisor has detected the violation of a business alert to which you are subscribed. You are receiving this alert because the threshold below has remained outside the acceptable range for longer than the defined time period of \${alert.delay.minutes} minutes.

This alert affects the Geographic Region \${geographic.region.name}, Reporting Region \${reporting.region.name}, Operating Unit

```

${operating.unit.name}, and the Contact Center:
${call.center.name.list}.
It involves the contact group ${alert.element.name} in the Application
Group ${application.group.name}.
Metric violated was: ${alert.metric.name}.
Current metric value: ${alert.value}.
Threshold violation was first detected at: ${alert.start.time}.
The alert has been active for: ${alert.duration.minutes} minutes.
The alert's status is: ${alert.active.status}.

```

Changing the XMLGen Connection after Installation

For XMLGen you can change the database connection data after installation. The XMLGen files are:

- xmlgen/hibernate.app.cfg.xml
- conf/xmlgen_properties.xml

Installing the XML Generator as a Service

Procedure: Installing XML Generator as a service

Start of procedure

1. Run the Windows service as a user who has these permissions:
 - a. Permission Log In as a Service. Services are installed to be run under the Windows local system account. This account is restricted from network I/O by Windows design.
 - b. Permission to write to the directory on the network.
2. Either:
 - Navigate to the installation folder in Windows Explorer, then execute the file [CCA Home]\XMLGen\InstallXMLGen.bat (which completes this procedure);
 - Open a Command prompt window, and continue from Step 3.
3. Change the directory to XMLGen installation.
4. Run the command: installXmlgen.

End of procedure

Procedure: Removing XMLGen as a service

Start of procedure

1. Either:
 - Navigate to the installation folder in Windows Explorer, then execute the file [CCA Home]\XMLGen\UnInstallXMLGen.bat (which completes this procedure); or,
 - Open a Command prompt window, and continue from Step 2.
2. Change the directory to XMLGen installation.
3. Run the command: `uninstallXmlgen`.

End of procedure

Installing and Configuring Apache

See the *Performance Management Advisors 8.0 Advisors Platform Deployment Guide* for details of Apache configuration.

Latency Getting to the Login page

Consider raising the `ThreadsPerChild` setting to 1024 if Apache log files on the Web server show:

- [warn] Server ran out of threads to serve requests.
Consider raising the `ThreadsPerChild` setting
- [notice] Child 5068: All worker threads have exited.
- [notice] Child 5068: Child process is exiting

Disabling Performance Monitor and the Workforce What-If Tool

By default, the Performance Monitor and Workforce What-If tool are enabled. To disable these features, run the following statement against the Contact Center Advisor database:

```
UPDATE [callcenter01].[CONFIG_PARAMETER] SET PARAM_VALUE = 'false'  
WHERE PARAM_NAME = 'enableSnapshot'
```

Installing Services under Windows 2008 Server

For installations on Windows 2008 Server, the Administrator installing the Advisors components and the Apache Web server should have permissions to install an NT service.

If for some reason granting this access is not possible, you can create shortcuts to the service installers that you may run as an Administrator.

To install the Platform Geronimo NT service, create a shortcut for the `InstallAdvisorsServer.bat` file.

To install the XMLGen NT service, create a shortcut for the `InstallXMLGen.bat` file.

To install Apache (including its NT service), create a short cut for the MSI installer.

Once you have created a shortcut, right click on the shortcut, and use the `Run as administrator` option to install the NT service for that component.



Supplements

Related Documentation Resources

The following resources provide additional information that is relevant to this software. Consult these additional resources as necessary.

Performance Management Advisors

- *Performance Management Advisors 8.0 Platform Deployment Guide* describes how to install and configure the Advisor Platform.
- *Performance Management Advisors 8.0 Frontline Advisor Deployment Guide* describes how to install and configure Frontline Advisor.
- *Performance Management Advisors 8.0 Cisco Adapter Deployment Guide* describes how to configure and install the Cisco Adapter.
- *Performance Management Advisors 8.0 Genesys Adapter Deployment Guide* describes how to configure and install the Genesys Adapter.
- *Performance Management Advisors 8.0 Contact Center Advisor & Workforce Advisor Deployment Guide* describes how to configure and install Contact Center Advisor Workforce Advisor.
- *Performance Management Advisors 8.0 Contact Center Advisor & Workforce Advisor Administrator User's Guide* describes how to configure your enterprise hierarchy and set up threshold rules/goals and users.
- *Performance Management Advisors 8.0 Contact Center Advisor User's Guide* describes how to personalize your display of information for monitoring and root cause analysis.
- *Performance Management Advisors 8.0 Workforce Advisor User's Guide* describes how to personalize your display of information for monitoring and root cause analysis.
- *Performance Management Advisors 8.0 Frontline Advisor Administrator User's Guide* describes how to perform administration functions for Frontline Advisor.
- *Performance Management Advisors 8.0 Frontline Advisor Manager User's Guide* describes how to perform manager functions for Frontline Advisor.

- *Performance Management Advisors 8.0 Frontline Advisor Agent Advisor User's Guide* describes how to perform agent functions for Frontline Advisor.
- *Performance Management Advisors 8.0 Alert Management User's Guide* describes how to manage the actions taken to resolve alerts and use the database to learn and repeat successes.
- *Performance Management Advisors 8.0 Resource Management User's Guide* describes how to maintain skill levels and agents.
- *Performance Management Advisors 8.0 Performance Monitor User's Guide* summarizes how to personalize your display of information for monitoring.
- *Performance Management Advisors 8.0 Workforce What-If Tool User's Guide* describes and gives examples of scenarios that illustrate how to adjust resource levels to achieve optimal outcomes.

Genesys

- *Genesys Technical Publications Glossary*, which ships on the Genesys Documentation Library DVD and which provides a comprehensive list of the Genesys and computer-telephony integration (CTI) terminology and acronyms used in this document.
- *Genesys Migration Guide*, which ships on the Genesys Documentation Library DVD, and which provides documented migration strategies for Genesys product releases. Contact Genesys Technical Support for more information.
- Release Notes and Product Advisories for this product, which are available on the Genesys Technical Support website at <http://genesyslab.com/support>.

Information about supported hardware and third-party software is available on the Genesys Technical Support website in the following documents:

- [Genesys Supported Operating Environment Reference Manual](#)
- [Genesys Supported Media Interfaces Reference Manual](#)

Consult these additional resources as necessary:

- *Genesys Hardware Sizing Guide*, which provides information about Genesys hardware sizing guidelines for Genesys releases.
- *Genesys Interoperability Guide*, which provides information on the compatibility of Genesys products with various Configuration Layer Environments; Interoperability of Reporting Templates and Solutions; and GPlus Adapters Interoperability.
- *Genesys Licensing Guide*, which introduces you to the concepts, terminology, and procedures relevant to the Genesys licensing system.

For additional system-wide planning tools and information, see the release-specific listings of System Level Documents on the Genesys Technical Support website, accessible from the [system level documents by release](#) tab in the Knowledge Base Browse Documents Section.

Genesys product documentation is available on the:

- Genesys Technical Support website at <http://genesyslab.com/support>.
- Genesys Documentation Library DVD, which you can order by e-mail from Genesys Order Management at orderman@genesyslab.com.

Document Conventions

This document uses certain stylistic and typographical conventions—introduced here—that serve as shorthands for particular kinds of information.

Document Version Number

A version number appears at the bottom of the inside front cover of this document. Version numbers change as new information is added to this document. Here is a sample version number:

80fr_ref_06-2008_v8.0.001.00

You will need this number when you are talking with Genesys Technical Support about this product.

Screen Captures Used in This Document

Screen captures from the product graphical user interface (GUI), as used in this document, may sometimes contain minor spelling, capitalization, or grammatical errors. The text accompanying and explaining the screen captures corrects such errors *except* when such a correction would prevent you from installing, configuring, or successfully using the product. For example, if the name of an option contains a usage error, the name would be presented exactly as it appears in the product GUI; the error would not be corrected in any accompanying text.

Type Styles

[Table 3](#) describes and illustrates the type conventions that are used in this document.

Table 3: Type Styles

Type Style	Used For	Examples
Italic	<ul style="list-style-type: none"> Document titles Emphasis Definitions of (or first references to) unfamiliar terms Mathematical variables <p>Also used to indicate placeholder text within code samples or commands, in the special case where angle brackets are a required part of the syntax (see the note about angle brackets on page 47).</p>	<p>Please consult the <i>Genesys Migration Guide</i> for more information.</p> <p>Do <i>not</i> use this value for this option.</p> <p>A <i>customary and usual</i> practice is one that is widely accepted and used within a particular industry or profession.</p> <p>The formula, $x + 1 = 7$ where x stands for . . .</p>

Table 3: Type Styles (Continued)

Type Style	Used For	Examples
Monospace font (Looks like teletype or typewriter text)	<p>All programming identifiers and GUI elements. This convention includes:</p> <ul style="list-style-type: none"> The <i>names</i> of directories, files, folders, configuration objects, paths, scripts, dialog boxes, options, fields, text and list boxes, operational modes, all buttons (including radio buttons), check boxes, commands, tabs, CTI events, and error messages. The values of options. Logical arguments and command syntax. Code samples. <p>Also used for any text that users must manually enter during a configuration or installation procedure, or on a command line.</p>	<p>Select the Show variables on screen check box.</p> <p>In the Operand text box, enter your formula.</p> <p>Click OK to exit the Properties dialog box.</p> <p>T-Server distributes the error messages in EventError events.</p> <p>If you select true for the inbound-bsns-calls option, all established inbound calls on a local agent are considered business calls.</p> <p>Enter exit on the command line.</p>
Square brackets ([])	<p>A particular parameter or value that is optional within a logical argument, a command, or some programming syntax. That is, the presence of the parameter or value is not required to resolve the argument, command, or block of code. The user decides whether to include this optional information.</p>	<p>smcp_server -host [/flags]</p>
Angle brackets (< >)	<p>A placeholder for a value that the user must specify. This might be a DN or a port number specific to your enterprise.</p> <p>Note: In some cases, angle brackets are required characters in code syntax (for example, in XML schemas). In these cases, italic text is used for placeholder values.</p>	<p>smcp_server -host <confighost></p>



Index

Symbols

[] (square brackets)	47
< > (angle brackets)	47

A

Adapters	12
Advisors Platform	12
alert messages	37
angle brackets	47
Apache Server	12
Aspect eWFM	31
audience, for document	8
automated installation	33

B

brackets	
angle	47
square	47
browser co-residency	11

C

Cisco ICM database	25
commenting on this document	8
contact groups	12
conventions	
in document	46
type styles	46
creating linked servers	25

D

data source names	27
document	
audience	8
conventions	46

errors, commenting on	8
version number	46

E

e-mail alerts	27
email templates	11

F

Flash player	12
font styles	
italic	46
monospace	47

I

installation errors	34
installation prerequisites	
prerequisites, installation	12
installation troubleshooting	35
installer contents	13
intended audience	8
italics	46

J

Java Development Kit installation	24
JDK installation	12

L

linked servers	25
----------------	----

M

metric graphing database	13, 15, 23
monospace font	47

P

prerequisites 12

R

reconnection 27
reconnection attempts 27

S

semi-silent installation 33, 34
silent installation 33, 34
SQL Server 12
square brackets 47
Store snapshots field 23

T

troubleshooting 34
type styles
 conventions 46
 italic 46
 monospace 47
typographical styles 46

V

version numbering, document 46

W

Workforce Advisor e-mail notifications 30
Workforce IEX TotalView 30
workforce management data 30

X

XML Generator installation 25