

Wonderware

ArchestrA Log Viewer™ User's Guide

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Welcome

You use the ArchestrA Log Viewer to view messages logged to the Wonderware Logger. You can view this document online or you can print it, in part or whole, using the Adobe Reader.

Documentation Conventions

This documentation uses the following conventions:

Convention	Used for
Initial Capitals	Paths and file names.
Bold	Menus, commands, dialog box names, and dialog box options.
Monospace	Code samples and display text.

Technical Support

Wonderware Technical Support offers a variety of support options to answer any questions on Wonderware products and their implementation.

Before you contact Technical Support, refer to the relevant section(s) in this documentation for a possible solution to the problem. If you need to contact technical support for help, have the following information ready:

- The type and version of the operating system you are using.
- Details of how to recreate the problem.
- The exact wording of the error messages you saw.

- Any relevant output listing from the Log Viewer or any other diagnostic applications.
- Details of what you did to try to solve the problem(s) and your results.
- If known, the Wonderware Technical Support case number assigned to your problem, if this is an ongoing problem.

Chapter 1

Overview

You can use the The ArchestrA Log Viewer to view messages logged to the Wonderware Logger. The Wonderware Logger is a system service that records messages from ArchestrA-enabled components. For example, the ArchestrA Log Viewer records the date and time when ArchestrA components start and any error conditions that occur.

ArchestrA System Management Console

The ArchestrA Log Viewer is part of the ArchestrA System Management Console (SMC) suite of utilities to manage the ArchestrA environment. The SMC is a snap-in to the Microsoft Management Console (MMC).

Both the MMC and the SMC utilities provide documentation. For more information, click **Help** on the **Action** menu. The first Help book shown provides information about the MMC utility in general. SMC utilities are represented by books below the MMC.

Common features of the MMC are described only if required to explain ArchestrA Log Viewer functionality.

Note: Aspects of the ArchestrA Log Viewer user interface may appear differently when installed on computers running different versions of Microsoft Windows. Also, the version of the MMC installed on your computer may affect the content and behavior of the ArchestrA Log Viewer user interface.

Wonderware Logger and ArchestrA Log Viewer

The Wonderware Logger and ArchestrA Log Viewer utilities are automatically installed on any computer when you install an ArchestrA-enabled component.

Caution: Do not disable the Wonderware Logger service at any time.

The Wonderware Logger is a background process that stores messages in the system log file. You can manually start the Wonderware Logger or configure it to start automatically.

- Automatic means the Wonderware Logger starts when the computer starts.
- Manual means you must start the Wonderware Logger from the System Services utility in the Windows Control Panel.

You can also customize which messages you want to log with the ArchestrA Log Flag Editor. See the ArchestrA Log Flag Editor *User's Guide* for more information.

Note: Always check logged messages before calling technical support.

You use the ArchestrA Log Viewer to view messages sent to the Wonderware Logger. You can customize the format of this utility. For more information about customizing the Log Viewer, see "Configuring the ArchestrA Log Viewer" on page 26.

To start the ArchestrA Log Viewer

- 1 Click Start, point to Programs, and then point to Wonderware.
- 2 Click ArchestrA System Management Console. The ArchestrA System Management Console appears with the Log Viewer listed in the left pane.
- 3 Double-click **Log Viewer** to expand its groups. The **Local** group is listed beneath the **Default Group**.

Chapter 2

Using the ArchestrA Log Viewer

You use the ArchestrA Log Viewer to view messages sent to the Wonderware Logger. By using the filter, mark, find, time range, and other functions of the ArchestrA Log Viewer, you can simplify and specify the messages that are shown.

Also, you can use the ArchestrA Log Viewer to save logged messages to a file and view logged messages previously saved to a file.

Troubleshooting Problems using the ArchestrA Log Viewer

You can use the ArchestrA Log Viewer as a diagnostic tool to gather more information about a problem. After installing an ArchestrA-enabled program, you can view logged messages to determine whether all processes are functioning properly.

The Archestra Log Viewer highlights error messages in red. Error messages indicate malfunctioning processes. The Archestra Log Viewer highlights warning messages in yellow. A warning message indicates a major system event.

To troubleshoot problems

- **1** Gather as much information about the process that is malfunctioning.
 - For example, assume you attempted to deploy an object in the IDE and a message was shown stating the deployment was not completed.
- **2** Note the function you attempted and the message you received.
- **3** Open the ArchestrA Log Viewer. On the Windows **Start** menu, point to **Programs**, point to **Wonderware**, and then click ArchestrA System Management Console (SMC).
- **4** In the SMC, select ArchestrA Log Viewer, and then the node the IDE is located on.
- **5** Look for red and yellow messages. Also, use the information you collected about the failed process to search for clues in the logged messages.
- **6** Find or filter data. Do any of the following:
 - On the View menu, click Find to single out messages by message text or other category of data.
 - On the View menu, click Filter to reduce the number of shown messages based on message, time range, or terminal session criteria.

Configuring the Wonderware Logger Storage Options

You can specify the location of the files containing the Wonderware Logger messages and other options related to Wonderware Logger storage.

Caution: If you change the **Store Log Messages In This Path** setting, you may no longer be able to view previously logged messages. Before changing this setting, you should **Export** the current messages to a log file. This path must be on your local hard drive.

To configure Wonderware Logger storage options

- 1 In the ArchestrA Log Viewer, select an Wonderware Logger node.
- 2 On the Action menu, click Configure. The Configure dialog box appears.
- **3** Click the **Storage** tab.
- **4** In the **Store Log Messages in this Path** box, change the location of your logged files.

5 Limit the quantity of messages and the amount of disk space used to store messages with two additional storage page options:

Delete Log Messages older than _ days.

Limit the total disk space used for storing log messages to _ MB.

The Wonderware Logger deletes messages beginning with the oldest ones first. These two options perform an **OR** operation. In other words, when either setting is encountered, messages are deleted. If your computer has a large hard drive, you can set these options at or near their maximum allowed values (365 days, 10 GB disk space).

6 Click **OK** to save the new configuration or **Cancel** to revert to the current settings.

Searching for Messages

You can use either the **Find** or **Go To** dialog box to locate a message.

- **Find** is a general search function based on five categories of criteria that map to column headings in the message window.
- **Go To** is a search function based on bookmarks you previously set. For instructions about using the **Go To** dialog box, see "Using Bookmarks" on page 11.

Note: The **Process ID** and **Thread ID** categories require numeric data; the others accept alphanumeric characters. You can use both AND and OR operations (multiple categories on multiple rows) to perform complex search functions.

To find a message

- 1 On the View menu, click Find.
- 2 On the first row, choose a category you can use to logically isolate a particular set of messages. Double-click the category box in the data entry window and type the desired criteria. After typing search data, click outside of the category box to exit edit mode. You can repeat this step over multiple categories to perform an AND operation. In other words, the search function finds only those messages that meet all criteria.
- **3** To add another row of criteria, right-click anywhere in the data entry window and click **Add**. Columns perform an **OR** operation. In other words, the search function finds those messages that meet the criteria on one row or the criteria on other rows.
- 4 To remove criteria you have entered in a category box, right-click the box and click **Clear Field**. To remove an entire row, right-click the row and click **Delete**. To remove all search criteria, click the **Clear All** button.

- **5** After you have set search criteria, click the **Find Next** button. The first message that meets your criteria is highlighted in the message window.
- **6** Click **Find Next** again to move to the next message that meets the criteria.
- **7** Click **Cancel** to close the dialog box.

Using Bookmarks

You can apply labels to individual messages so that you can easily find them. These labels are called bookmarks. They differ from marks in that bookmarks are associated with specific messages while marks are messages added below the message that is currently last in the log. For more information, see "Marking the Message Log" on page 14.

You cannot enter duplicate bookmark names, and a message can have only one bookmark.

The message window can display a **Bookmark** column, which is initially hidden by default.

To show bookmarks

- 1 Right-click the column header of the message window and click **Show**.
- 2 In the Choose Columns dialog box, click Bookmarks in the Columns Hidden box, click the Show button to move it to the Columns Shown box, and then click OK.
- **3** The **Bookmark** column is added at the far right of the column header. Click and drag it to another position if you want. When the text of a bookmark in the **Bookmark** column is partially obscured, point to it to display the entire bookmark like a tooltip.

You can set bookmarks in two ways: adding a regular bookmark that you can name, and setting a fast bookmark that is named for you.

To add a regular bookmark

- 1 Right-click the message, and then click Add Bookmark on the Bookmark submenu.
- 2 In the **Add Bookmark** dialog box, either accept the default name (Bookmarkx where x is a number in an ascending sequence) or change it with something more descriptive. You can change the bookmark name in the **Bookmarks** dialog box at a later time.
- **3** Click **OK** to set the bookmark or **Cancel** to terminate the process.

To set a fast bookmark

- 1 Right-click the message and click **Fast Bookmark** on the **Bookmark** submenu. A default naming sequence is applied to the message (Bookmarkx where x is a number in an ascending sequence). Alternatively, you can set a fast bookmark by selecting the message and clicking the **Fast Bookmark** icon on the toolbar.
- **2** Change the bookmark name to something more descriptive, if necessary, in the **Bookmarks** dialog box at a later time.

Note: You cannot go to bookmarked messages that are currently hidden by a filter. If you cannot find the desired message, remove the filter and try again.

To find a bookmarked message

- 1 On the View menu, click Go To.
- **2** In the **Go To** dialog box, enter the name of the message's bookmark by typing it in the box or selecting from the list.
- **3** Click **Go To**. The **Go To** dialog box remains open.
- **4** Use the **Previous** and **Next** buttons to go to the nearest bookmarked message above and below, respectively.
- **5** When you are done searching, click **Close**.

Note: Bookmarks are not saved when you quit the ArchestrA Log Viewer application. To mark your message log more permanently, use the **Mark** command on the **View** menu.

To manage bookmarks

- 1 On the **View** menu, click **Bookmarks**. The **Bookmarks** dialog box appears.
- **2** You can manage current bookmarks and create new ones. The bookmark list shows the current set of bookmark names and associated **Message No.** (the same number as the **No.** column in the message window). The bookmark list provides several functions.
- **3** For example, to rename a bookmark, select it, press **F2**, and then type the new name.
 - Each bookmark must have a unique name. You cannot bookmark two messages with the same name.
- **4** To go to a bookmarked message, double-click on the message from the list or select it and click **Go To**.
- **5** To remove one or all bookmarks from your logged messages, select a message and click **Remove**, or click **Remove All**.

- **6** To add a new bookmark, select the message you want to bookmark in the message window and click **Add**. This function is comparable to a fast bookmark. Rename it by pressing **F2**.
- **7** When you are done, click **Close**.

Marking the Message Log

Marks are messages you can insert into your message log to designate events or segments of messages. They differ from bookmarks in that marks are messages added below the message that is currently last in the log while bookmarks are labels associated with existing messages. For more information, see "Using Bookmarks" on page 11.

You can create marked messages in two ways: adding a regular mark that you can name and adding a fast mark that is named for you.

To add a regular mark message

- **1** On the **View** menu, click **Mark**. The **Mark** dialog box appears.
- **2** Either accept the default name (Mark) or overwrite it with something more descriptive. You cannot change the marker name at a later time.
- **3** Click **OK** to add the marker message to the end of all logged messages.

To add a fast mark message

◆ Click the **Fast Mark** icon on the toolbar. A marker message with the default name (Mark) is added to the end of all logged messages.

Filtering Messages

During normal operations in an ArchestrA environment, many messages are logged to the Wonderware Logger. If a program is malfunctioning or some component has been configured outside of acceptable ranges, the number of messages can increase significantly. You can reduce the number of messages being shown in the message window with the **Filter** dialog box.

Use filtering to display a subset of all logged messages based on specified criteria. The **Filter** dialog box provides three sets of criteria you can use to reduce the number of messages shown. You can use one or more of these sets of criteria at a time to help troubleshoot problems in the ArchestrA environment.

Note: Filtering does not delete logged messages, but only affects the display of messages in the message window. To view all logged messages again, disable the filter by clicking the **Enable/Disable Message Filter** icon on the toolbar or clearing the **Show Time** and **End Time** check boxes. You can enable the filter at a later time because the filtering specifications are still set in the background.

To filter messages based on message characteristics

- 1 On the View menu, click Filter.
- 2 On the **Filter** dialog box, select the **Messages** page. The first column in the data entry window is **Type**. There are two possible types of criteria: **Show** and **Hide**. When a row is type **Show**, messages that meet the criteria set are shown in the message window. When a row is type **Hide**, messages that meet the criteria set are not shown in the message window. All other columns in the data entry window map to columns shown in the message window. The first row in the data entry window is not editable and cannot be deleted, although you can disable it by clearing the check box.

To add filtering criteria

- 1 Click the **New Filter** icon. A new **Show** type row appears.
- **2** Click the **Type** box to switch to **Hide** type.
- **3** Double-click a category, and type filtering criteria.
- Add another row by right-clicking a category header and clicking **Add** on the shortcut menu. The new row is added and the category box is set to edit mode automatically.
- **5** When you are finished typing the filtering criteria, click outside of the box.

To filter messages based on multiple criteria, use more than one category box in a row or more than one row. Data rows perform an AND operation that filters messages that meet both criteria. Data columns perform an OR operation that filters messages that meet either criteria.

To delete a row

◆ Select a row and click the **Delete Filter** icon.

To delete all rows

◆ Click the **Delete All** button.

To remove filter criteria

- 1 Right-click in the box and click Clear Field.
- **2** Click **OK** to set the filtering criteria and close the **Filter** dialog box.

--Or--

3 Click **Cancel** to close the **Filter** dialog box without setting filtering criteria.

Note: After you have set filtering criteria, you can switch filtering on and off with the **Enable/Disable Message Filter** icon on the toolbar. Enable the filter to show only the messages that match the filtering criteria. Disable the filter to show all logged messages.

To filter messages based on a time range

- **1** On the **View** menu, click **Filter**. The **Filter** dialog box appears.
- **2** Select the **Time Range** page.
- **3** To filter based on a start time, select **Messages On** in the **From** box. The date and time options appear.
- **4** Click in any field and type the target date.

-Or-

- **5** Click the arrow in the **date box** to display a calendar of the current month. Use the right and left arrows to select the target date.
- **6** Select the **Time Box** and scroll up or down.
- 7 To filter based on an end time, select **Messages On** in the **To** box. The date and time options appear. Use same steps described in steps 4 and 5.
- **8** Click **OK** to set the filtering criteria and close the **Filter** dialog box.

The message window immediately shows messages based on this time range criteria. If you use a **From** setting, the **Start Time** check box in the time header is automatically selected and the new filter settings are shown. If you use a **To** setting, the **End Time** check box in the time header is automatically selected and the new filter settings are shown.

To filter messages based on a terminal session

- 1 On the View menu, click Filter.
- 2 On the **Filter** dialog box, select the **Terminal Sessions** page. The first column in the data entry window is **Type**. There are two possible types of criteria: **Show** and **Hide**. When a row is type **Show**, messages that meet the criteria set are shown in the message window. When a row is type **Hide**, messages that meet the criteria set are not shown in the message window. The first row in the data entry window is not editable and cannot be deleted, although you can disable it by clearing the check box.

To add filtering criteria

- **1** Click the **New Filter** icon. A new **Show** type row is shown.
- **2** Click the **Type** box to switch to **Hide** type.
- **3** Double-click the **Session ID** box and type filtering criteria.

—Or—

4 Add another row by right-clicking a column header and clicking **Add**.

The new row is added and the box is set to edit mode automatically. When you finish typing the filtering criteria, click outside of the box.

To filter messages based on multiple sessions

◆ Use more than one row. Data columns perform an **OR** operation to filter messages that meet either criteria.

To delete a row

♦ Select the row and click the **Delete Filter** icon.

To delete all rows except the first one

◆ Click the **Delete All** button.

To delete session filtering criteria

- **1** Right-click in a **Session ID** cell and click **Clear Field** from the shortcut menu.
- **2** Click **OK** to set the filtering criteria and close the **Filter** dialog box.

Note: After you set filter criteria, you can switch filtering on and off with the **Enable/Disable Message Filter** icon on the toolbar.

Purging Messages

Logged messages are purged automatically according to parameters set on the **Storage** page of the **Configure** dialog box. You can use the **Purge** dialog box to remove messages before reaching those limits. For more information, see "Configuring the Wonderware Logger Storage Options" on page 9.

Caution: You cannot undo the **Purge** function. Several ArchestrA Log Viewer functions like **CTRL+R** clear the messages shown in the message window, but have no effect on the messages logged to the Wonderware Logger. If you want to simply clear the ArchestrA Log Viewer's message window, do not use **Purge. Purge** actually deletes the messages from the Wonderware Logger.

To purge existing messages from the Wonderware Logger

- 1 From the Action menu, click Messages, and then Purge. The Purge dialog box appears.
- **2** Select the option you want.
 - --Or--
- 3 Select **Purge All Log Messages** to clear all messages from the Wonderware Logger.
- **4** Select **Purge Log Message Created Before** to clear all messages from the Wonderware Logger before a specified date and time.

Caution: In the next step, after you click **OK**, you cannot reverse this process.

- Click **OK** to execute the type of purge you selected.You are prompted to create a log file of the messages to be purged.
- 6 Click **Yes** to create a backup file or **No** to continue with the purge. Do one of the following:
 - If you click **Yes**, the **Create Back-Up As** dialog box appears. Set the path and file name for the backup file and click **Save**.
 - If you click **Cancel**, the purge is executed without making a backup file.

Chapter 3

The ArchestrA Log Viewer User Interface

The ArchestrA Log Viewer is a MMC snap-in that belongs to a the SMC. This section describes the ArchestrA Log Viewer user interface.

Note: Aspects of the ArchestrA Log Viewer may vary in appearance when installed on computers running different versions of Microsoft Windows. Also, the version of the MMC installed on your computer may affect the appearance of the ArchestrA Log Viewer.

The MMC Console

The MMC hosts the ArchestrA Log Viewer user interface. From the MMC, you use the ArchestrA Log Viewer to view and manage messages sent to the Wonderware Logger.

This book describes how to use the ArchestrA Log Viewer only. It describes functions of the MMC if they are required to explain the ArchestrA Log Viewer. For more information about the MMC, click **Help** on the MMC **Action** menu.

The ArchestrA Log Viewer user interface changes depending on which item is selected in the console tree or message window. For example, the **title bar** shows the name of the item selected from the console tree, and the **status bar** shows either the condition of the item selected in the console tree or a brief description of the menu bar command you point to.

Menu Bar

The MMC controls menu content. See MMC Help for information about menu content controls.

ArchestrA Log Viewer commands are on the **Action** and **View** menus. These menus are dynamic depending on which item is selected in the **Console Tree** or **Message Window**.

See the lists below.

Action Menu	
About ArchestrA Log Viewer	Opens a dialog box showing software version and other information
Configure	Opens a dialog box to set global parameters for your local ArchestrA Log Viewer and the Wonderware Logger you are currently connected to.
Connect	This command provides a submenu containing Local and Remote commands. Use the Local command to connect to the Wonderware Logger on your computer. Use the Remote command to open the Connect dialog box to specify a remote computer from which to view its logged messages. The remote node is always added under Default Group.
LogFlags	Starts the ArchestrA Log Flag Editor to select the types of messages logged by the Wonderware Logger.
Messages	Opens a submenu containing Export, Purge and Print commands.
	 Export: Saves all currently shown messages to another file.
	 Purge: Deletes messages from the Wonderware Logger.
	• Print: Prints current messages.

Action Men	u		
New	Opens a submenu containing Node and Node Group commands. Use these two commands to organize local and remote nodes to monitor and manage logged messages.		
	• Node: Adds a node under a node group.		
	• Node Group: Creates a new node group under which you can add and group nodes.		
Open Log File	e Opens a log file containing logged messages.		
View Menu			
Filter	Set criteria for displaying sets of logged messages.		
Find	Search through messages according to specified criteria.		
Go To	Go to a message based on its bookmark name.		
Bookmarks	Manage bookmarks in your message log.		
Mark	Add a marker line after the last message. Enter explanatory text for setting the mark in that position.		
Choose Columns	Customize the column headings in the message window.		

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Toolbar

The ArchestrA Log Viewer **Toolbar** gives quick access to frequently used commands. The toolbar is dynamic depending on which item is selected in the console tree or message window. Here is a list of all possible **Toolbar** icons.

Icon	Icon Name	Description
4	Back	Jump backwards through previous selections in the console tree. Helpful if you have hidden the console tree.
Ŷ	Forward	Jump forward through previous selections in the console tree. Helpful if you have hidden the console tree.
Ē	Up One Level	Select the next item up in the console tree. Helpful if you have hidden the console tree.
1	Show/Hide Console Tree	Toggle the console tree on and off.
×	Delete	Delete the selected item in the console tree.
₽	Refresh	Update the messages in the message window.
B	Export List	Export the console tree as an ASCII (.txt) file.
₽	Help	Open help for the MMC, the ArchestrA Log Viewer and other SMC utilities.
*	Filter	Set filtering criteria for viewing only certain logged messages.
7	Enable/Disable Message Filter	Toggle filtering on and off.
44	Find (Ctrl+F)	Search for a logged message.
	Fast Bookmark	Set a bookmark for the highlighted message.
8	Fast Mark	Mark sections of messages for special purposes.

Icon	Icon Name	Description
₿	Export	Export all messages currently shown in the message window.
3	Print (Ctrl+P)	Allows you to print all messages shown in the message window.
۵	Print Preview	Show messages as they would be printed. This icon is the only access to this function.

Note: You can click the MMC **Customize** command on the **View** menu to add and remove icons on the toolbar.

Console Tree

The console tree is the hierarchical structure shown in the left pane of the SMC. It shows the items available to the console, such as the Default Group, the Local node, remote nodes, and a log file folder. Other items can include folders, snap-ins, controls, web pages, and other tools.

If the Local node is part of a Galaxy, the Galaxy is shown as a group. All platforms in the Galaxy are automatically shown beneath the Galaxy group.

- You can rename the Default Group.
- You can delete nodes from the Default Group.
- You cannot rename the Local node, the Galaxy group, nor any platform nodes.
- You cannot delete the Local node, the Galaxy group, nor any platform nodes.
- You cannot add or remove nodes in the Galaxy group.

The contents of the message window change as you select items in the console tree.

Details Pane

The details pane has four main elements.

Element	Description
Description Bar	Shows the name of the item selected in the console tree. This element is hidden by default. Click Customize on the View menu to display it.
Time Header	Shows the time range set in the Filter dialog box. To enable each time setting, Start Time and End Time , select the check box. To disable either time range setting, clear the check box.
Column Header	Shows descriptive titles for each shown column. You can rearrange the headers by clicking and dragging. To further customize headers, click Choose Columns on the View menu.
Message Window	Shows all logged messages, just those messages determined by filtering criteria, or just messages contained in a log file. To view details of a specific message, double-click it.

Shortcut Menus for ArchestrA Log Viewer

A shortcut menu is a set of commands that appear when you right-click an item in the user interface. The ArchestrA Log Viewer provides several shortcut menus in the console tree and message window areas. The shortcut menus are dynamic depending on which item is in focus, which item you right-click, and which commands apply to the item.

The same commands in shortcut menus are sometimes shown in the menu bar. Some dialog boxes also use shortcut menus, and those commands do not appear on the menu bar. For more information about individual dialog boxes, see "Configuring Dialog Boxes" on page 29.

Note: The MMC also provides commands for shortcut menus. See MMC Help for descriptions of those commands.

Shortcut Keys

The following table lists shortcut keys you can use to issue Log Viewer commands.

Shortcut Associated Menu Key Command Description		Description
ALT+F2	Bookmarks on the View menu	Opens the Bookmarks dialog box.
CTRL+A		Selects all messages in the message window.
CTRL+C	L+C Copy on Shortcut Copies the selected menu in text box or messages to clipboar on selected message	
CTRL+F	Find on the View menu	Opens the Find dialog box to search messages in the message window.
CTRL+F2		Sets or removes a bookmark.
CTRL+G	Go To on the View menu	Opens the Go To dialog box to choose a bookmark to go to.
CTRL+P	Print on Messages submenu of the Action menu	Prints displayed log messages.
CTRL+R		Clears the message window by setting and enabling the current time as the Start Time for the filter.
CTRL+SH IFT+F2		Removes all bookmarks in the message window.
DELETE	Delete on the Action menu	Deletes the selected Node or Node Group from the console tree.
ENTER	Details on shortcut menu on selected message	Opens the Message Details dialog box for the selected message.

Shortcut Key	Associated Menu Command	Description
F2		From the console tree , renames the selected node group.
		From the message window , goes to the next bookmark.
		In Bookmarks dialog box, puts selected bookmark in rename mode.
F5	Refresh on the Action menu	Refreshes the message window.
SHIFT+F2		Goes to the previous bookmark.

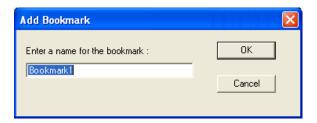
Configuring the ArchestrA Log Viewer

See the following dialog boxes to configure the ArchestrA Log Viewer.

Adding Bookmarks

You can insert a bookmark to return to a message later.

- **1 Right-click** a message in the message window.
- 2 On the Bookmark menu, click Add Bookmark. The Add Bookmark dialog box appears.



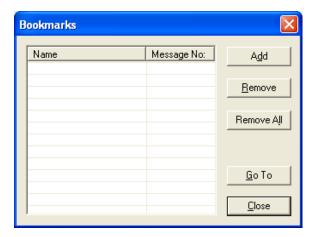
- **3** Accept the default name or create your own.
- 4 Click OK.

You cannot enter the same bookmark name for more than one message, and each message can have only one bookmark.

Managing Bookmarks

Manage bookmarked messages in your message log.

1 On the View menu, click Bookmarks. The Bookmarks dialog box appears.



- **2** Do any of the following:
 - **Rename** a bookmark by selecting it and pressing **F2**.
 - **Go to** a message by double-clicking the bookmark in the list or by selecting it and clicking the **Go To** button.
 - **Add** a bookmark to the list that is associated with the message selected in the message window. The new bookmark is given a default name; press **F2** to rename it.
 - **Remove** the selected bookmark from the list.
 - **Remove All** bookmarks from your logged messages.
- 3 Click Close.

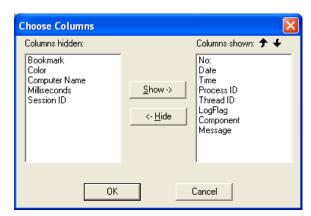
Managing Columns

Manage columns in the **Message** window or in the **Message Details** window.

1 On the View menu, click Choose Columns.

--Or--

2 Right-click a column heading, and click **Show.** The **Choose Columns** dialog box appears.



To show a column

◆ Select a column name in the **Columns hidden** box and click **Show**.

To hide a column

♦ Select a column name in the **Columns shown** box and click **Hide**.

To shift the position of a column

◆ To move a column left or right, select a column name in the **Columns shown** box and click the **Up** or **Down** arrow.

Note: These settings are saved to your user profile, and are shown on subsequent uses of the ArchestrA Log Viewer.

Configuring Dialog Boxes

Use this dialog box to set global parameters for your local ArchestrA Log Viewer and Wonderware Logger.

The Configure dialog box has two pages: ArchestrA Log Viewer and **Storage**.

Changes to settings on the **Storage** page of this dialog box affect the Wonderware Logger you are currently connected to, including any Wonderware Loggers located on remote computers.

Caution: If you intend to change storage parameters for your local Wonderware Logger, ensure that you are connected to it (select **Local** in the console tree). Also, be careful when changing default values on either page of this dialog box (such as the total disk space allowed for storing messages). Changes to these values can impact overall system performance.

For more information about configuring the ArchestrA Log Viewer, see "Configuring the Wonderware Logger Storage Options" on page 9.

To Open the dialog box, click **Action**, and then click **Configure**. The **Configure** dialog box appears.



ArchestrA Log Viewer Page

The ArchestrA Log Viewer tab has the following options:

• Check for new log messages every ... milliseconds: Set how often your local ArchestrA Log Viewer checks for new messages logged to the Wonderware Logger you are connected to. The default value is 1000 ms, the minimum is 100 ms, and the maximum is 3600000 ms (1 hour).

Caution: Setting a very small millisecond interval can impact system performance.

- **Enable Live Scrolling**: Enable or disable live scrolling in the message window.
 - When live scrolling is enabled and you are viewing the end of the shown logged messages, a new message that appears on-screen causes the message at the top of the message window to disappear from view.
 - When live scrolling is disabled, you must scroll down to see new messages appended to the list of messages.

- **Keep** ArchestrA Log Viewer **Always on Top of Other Windows**: Keep the ArchestrA Log Viewer on your screen when you switch programs or windows.
- Cache Only ... Messages in the View: Set the maximum number of messages stored in cache.
- Show Only the First ... Characters in the Message Column: Set the maximum number of characters for any message in the Message column. The maximum is 8,192.

Storage Page

Click the **Storage** tab on the **Configure** page to open the **Storage** page.



The **Storage** tab has the following options:

 Store Log Messages in this Path: Set the path to the folder for all logged messages.

WARNING! In the next step, if you change the path, you will no longer be able to view messages previously logged to files in the current path. Before changing this path, we recommend that you first export all messages to a file. Use the Export command on the Messages submenu of the Action menu to create the export log file (.aaLGX extension). Then, you can view those messages by clicking Open Log File on the Action menu and opening the export log file.

- **1** Either type the path
 - --Or--
- **2** Browse to explore. Network drives are not selectable. Click **OK**.
- **3 Delete Log Messages Older Than ... Days**: Type the number of days after which logged messages are deleted, beginning with the oldest ones. Default value is 0 days (unlimited), maximum is 365 days.

WARNING! In the next field, if you set the value to zero (0) it could compromise the integrity of the components of the application running on that computer.

• Limit the Total Diskspace Used for Storing Log Messages to ... MB: Type the size limit (in megabytes) of disk storage allowed for all logged messages. The maximum value is 10000 (10 GB).

Note: The **Delete Log Messages Older Than ... Days** and **Limit the Total Diskspace Used for Storing Log Messages to ... MB** parameters operate as an OR function. When either condition is met, logged messages are deleted, beginning with the oldest.

Viewing Remote Wonderware Logger Messages

You can view messages stored by a Wonderware Logger on a remote computer.

After you connect to the remote Wonderware Logger, you can use the **Filter, Find,** and other ArchestrA Log Viewer functions to customize the messages.

The ArchestrA Log Flag Editor does not work with remote Wonderware Loggers.

To connect to a remote Wonderware Logger

1 Click the **Action** menu, point to **Connect,** then click **Remote**. The dialog box appears.

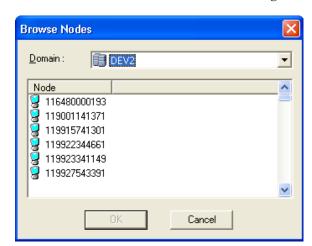


2 Type a remote computer name in the text	box.
--	------

—Or—

3 Choose one from the drop down list.

--Or--



4 Click Browse. The Browse Nodes dialog box appears.

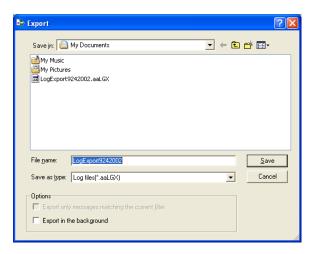
- 5 Select one of the nodes and click **OK**. Your selection appears in the **Computer Name** field of the **Connect** dialog box.
- **6** Click **OK** to establish the connection and display messages from that Wonderware Logger.

Exporting Log Messages

You can export the currently shown log messages to a log file. Log files have an .aaLGX extension. The default file name is LogExport with the current date in the format (mddyyyy) appended as a suffix. You can edit the name of a log file but not its extension.

To export log messages

1 From the Action menu, click Messages, then Export. The Export dialog box appears.



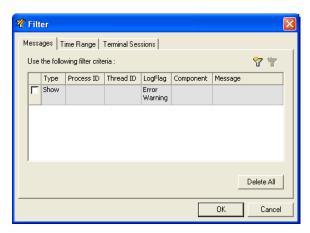
Specify the location for the log file. Create a new folder, if necessary, and then enter the file name. The ArchestrA Log Viewer provides two additional options:

- **Export only messages matching the current filter**: Export only messages that meet the current filtering criteria.
- The Export in the background option is useful when you export a large number of logged messages, which could take a long time to complete.
 - If you clear this check box, ArchestrA Log Viewer commands and functions are unavailable until all messages are exported.
 - If you select this check box, you can then use all of the commands and functions of the ArchestrA Log Viewer while export is in progress.

Filtering Messages

Filter logged messages according to criteria you select.

From the **View** menu, click **Filter**. The **Filter** dialog box appears.



Messages Page

Click the **Messages** tab to open the Messages page.

The **Messages** page has the following options:

- Each column, except **Type**, maps to a column heading in the Message Window.
- The first row (Error Warning in the LogFlag column) is not editable and cannot be deleted, although you can clear the Show check box.
- **Data rows** perform an **AND** operation (filter for messages that meet both criteria).

- **Data columns** perform an **OR** operation (filter for messages that meet either criteria).
- Use both AND and OR operations (multiple categories on multiple rows) to set complex filters.
- New Filter icon: Use to add a new row of filter criteria. After setting filtering criteria, the check box is automatically enabled for that row.
- **Delete Filter** icon: Use to remove a highlighted row of filter criteria.
- **Delete All**: Use this button to clear all filter criteria from this page.

To set a filter

- 1 Click the **check box** of a new row to toggle between **Show** and **Hide.**
- **2** Double-click a category cell to type the filter criteria.
- **3** Click outside of the cell to set that criteria.

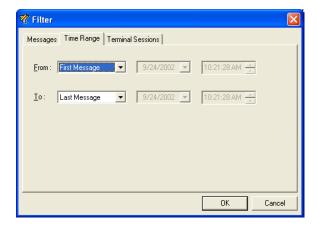
The **Messages** page also has two shortcut menus. When a category cell is in edit mode, right-click in the cell to display Microsoft® edit commands, such as copy and paste. Right-click outside a category cell to display the following commands:

- **Clear Field**: Erase the data in a category cell.
- Add: Add another row of filtering criteria.
- **Delete**: Delete a row of filtering criteria.

Use the **Enable/Disable Message Filter** icon on the toolbar to toggle on and off the filtering criteria you have set.

Time Range Page

Click the Time Range tab to open the Time Range page.



The **Time Range** page has the following options:

- From and To: Set start and end points to display Wonderware Logger messages. Select between First Message, Last Message and Messages On.
- Select **First Message** to display messages beginning with the first one stored in the current log file.
- Select **Last Message** to display messages ending with the last one stored in the current log file.
- Select Messages On to enable the beginning date and time for messages you want to display.
- To change date and time settings, scroll up or down to the target value.
- Click the **down arrow** in the **date** box to display a **calendar** in which you can select the desired **date**.



• Use the **right** and **left** arrows in the **calendar** to move between months.

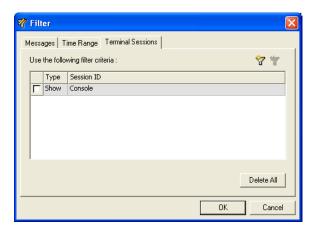
The filter specifications you configure on this page are immediately shown in the time header of the details pane.

- If you used a **From** setting, the **Start Time** check box in the time header is automatically selected and the settings on this page of the **Filter** dialog box are shown.
- If you used a **To** setting, the **End Time** check box in the time header
 is automatically selected and the settings on this page of the **Filter**dialog box are shown.

Note: This function does not delete logged messages, but only affects the display of messages in the message window of the ArchestrA Log Viewer. To view all logged messages again, clear the Start Time and End Time check boxes.

Terminal Sessions Page

Click the **Terminal Sessions** tab to display the **Terminal Sessions** page.



The **Terminal Sessions** page has the following options:

- The Session ID column maps to a column heading you can display in the message window.
- The **Type** column and its enabling check box determine whether the criteria set in the **Session ID** column is shown or not.
- The first row is not editable and cannot be deleted, but you can click or clear the **Show** check box.
- Double-click in the **Session ID** cell to type filter criteria.
- Click outside of the cell to set that parameter. Data columns perform an **OR** operation. That is, they filter for messages that meet either criteria.
- **New Filter** icon: Add a new row of filter criteria.
- **Delete Filter** icon: Remove a highlighted row.
- Delete All: Clear all filter criteria from this page.

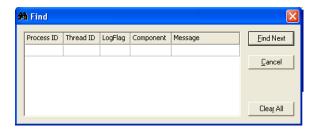
The **Terminal Sessions** page has two shortcut menus. When a **Session ID** cell is in edit mode, right-click in the cell to display Microsoft® edit commands, such as copy and paste. Right-click outside a **Session ID** cell in edit mode to display the following commands:

- Clear Field: Erase the data in a Session ID cell.
- Add: Add another row of filtering criteria.
- **Delete**: Delete a row of filtering criteria.

Use the **Enable/Disable Message Filter** icon on the toolbar to toggle on and off the filtering criteria you have set.

Finding a Message

From the **View** menu, click **Find**. The **Find** dialog box appears.



Use the five search categories, **Process ID**, **Thread ID**, **LogFlag**, **Component**, **and Message** to search through messages shown in the message window. These categories map to column headings in the ArchestrA Log Viewer message window.

Note: The **Find** function searches only through messages currently shown. If you have applied a filter, only those messages are included in your search. If you want to search all logged messages, click the **Enable/Disable Message Filter** icon on the toolbar, and then run your search. Also, if you are currently viewing messages saved in a log file, only those messages are included in your search. If you want to search runtime messages, select the node in the console tree under Default Group, and then run your search.

For more information, see "Searching for Messages" on page 10.

The **Find** dialog box has the following options:

- Data entry window: Use this window to specify search criteria. The **Process ID** and **Thread ID** categories require numeric data; the others accept alphanumeric characters. Double-click a category box to type search data. Click **Add** on the shortcut menu to specify another row of search criteria. Data rows perform an **AND** operation (search for messages that meet both criteria). Data columns perform an **OR** operation (search for messages that meet either criteria). Use both **AND** and **OR** operations (multiple categories on multiple rows) to perform complex searches.
- **Find Next**: Click to search for the first message that meets the search criteria in the data entry window. Repeat to find the next message that also meets the search criteria.
- Cancel: Click to close the Find dialog box without searching for a message.
- Clear All: Click to erase all search criteria from the data entry window.

The **Find** dialog box provides two shortcut menus. When a category box is in edit mode, right-click in the cell to show standard Windows edit commands, such as **copy** and **paste**. Right-click outside a category cell to display the following commands:

- **Clear Field**: Use to erase the data in a category box. This command is only available when you right-click in a category cell that has data.
- **Add**: Use to add another row of search criteria. The column you right-click is put in edit mode.
- **Delete**: Use to delete a row of search criteria. The row you right-click is deleted.

Going to a Specific Message

You can go to a specific message in the message window that has been bookmarked.

Note: You cannot go to bookmarked messages that are currently hidden by a filter. If you cannot find the desired message, disable filtering and try again.

For more information, see "Managing Bookmarks" on page 27.

♦ From the **View** menu, click **Go To**. The **Go To** dialog box appears.



The **Go To** dialog box has the following options:

- **Enter Bookmark Name**: Type the bookmark name or select one from the list.
- **Go To**: Click to go to the message highlighted.
- **Previous**: Highlight the previous bookmarked message.
- **Next**: Highlight the next bookmarked message.

Entering a Marker Message

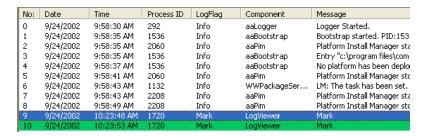
Enter a time stamped entry in the Wonderware Logger.

From the **View** menu, click **Mark**. The **Mark** dialog box appears.



The text you type in the **Enter the Marker Message to Log** box is shown in the Message column of the resulting marked message in the Wonderware Logger. The marked message becomes a time stamped entry as shown in the message window below.

Default text is **Mark**. Two marked messages are shown in the image below.

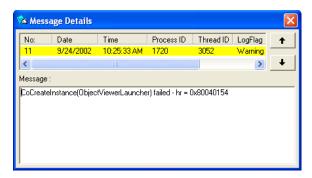


Caution: When connected to a remote node, the **Mark** command places a message in the remote computer's log file. If you do not want to make actual changes to the remote log file, use the **Bookmark** or other ArchestrA Log Viewer commands that affect only your display of those messages and do not actually affect the remote log file.

Viewing Message Details

View messages and details about messages in the Message Details dialog box.

Double-click a message in the message window to open the **Message Details** dialog box.



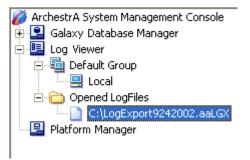
- Scroll through messages by clicking the up and down arrows.
- ◆ Click one of the five column heads, Process ID, Thread ID, LogFlag, Component, or Message to sort messages according to category.

Opening a Log File

From the **Action** menu, click **Open Log File.** The typical Microsoft® open dialog box appears. Use this dialog box to locate and open a log file of saved messages.

After you select the desired log file and click **Open**, the saved log messages appear in the message window.

The path and name of the opened log file are shown and highlighted in the console tree below **Opened Log Files**.



Note: Opening a log file does not affect the message logging process in the background, and you can view those messages by clicking **Local** or another node in the console tree.

When you are viewing an opened log file, you can do filtering, searching, printing, and exporting functions on the messages. For example, you can filter the contents of the log file and then export just that subset of messages to another log file. After you apply a filter to the contents of a log file, you must click **Refresh** on the **Action** menu to see the results.

Print Dialog Box

To print shown log messages

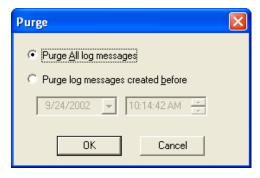
◆ From the Action menu, click Messages, and then Print. The Microsoft® Print dialog box appears.

Purge Dialog Box

Older messages are automatically purged from the Log Viewer after they exceed the maximum number of days specified with the **Delete Log Messages Older Than ... Days** option of the **Configure** dialog box. Also, you can manually delete messages from the Wonderware Logger using the **Purge** dialog box.

Caution: Export all logged messages before you purge messages from the ArchestrA Logger. The purge function deletes messages from the Logger.

1 From the Action menu, click Messages, and then click Purge. The Purge dialog box appears.



- **2** Select the messages you want to purge by doing one of the following:
 - Click **Purge All Log Messages** to delete all messages currently stored in the Wonderware Logger.
 - Click Purge Log Messages Created Before to purge messages created before a date and time you specify.
- **3** Click **OK** to purge the messages you selected.

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