



Analyzer User Guide

Release 9.10

Notices

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Documentation conventions

The following documentation conventions are used in this guide:

Describing interactions with the UI

You can interact with products by using different input methods: keyboard, mouse, touch, and more. So in most parts of the user documentation, generic verbs have been used that work with any input method. In cases where input-neutral verbs do not work, mouse-specific verbs are used as the first choice, followed by touch-specific verbs as the second choice.

See the following table for examples on how you can interpret the different input methods.

Input-neutral	Mouse	Touch
Select Modify .	Click Modify .	Tap Modify .
Select Accounts > Other accounts > Add an account .	Click Accounts > Other accounts > Add an account .	Tap Accounts > Other accounts > Add an account .
To open the document in Outline view, select View > Outline .	To open the document in Outline view, click View > Outline .	To open the document in Outline view, tap View > Outline .
Select Protocols .	Click the Protocols tab.	Tap Protocols .
-NA-	Double-click the Client wizard.	Double-tap the Client wizard.
Open the Packages context menu.	Right-click Packages to open the shortcut menu.	Long tap Packages to open the shortcut menu.

Deprecated words

The following words have been replaced with new words, considering the audience profile, our modern approach to voice and style, and our emphasis to use input-neutral terms that support all input methods.

Old usage...	New usage...
shortcut menu, right-click menu	context menu
click, right-click	select
drag and drop	drag

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CHAPTER 1 Introduction to Analyzer

The purpose of this chapter is to provide a short overview on the product regarding its architecture and layout.

About Analyzer

Analyzer is a powerful Network Traffic Analyzer that captures the traffic on the IXIA ports and provides a lot of statistics, measurements, diagrams, and application viewers to help you debug network problems. It is built as an APTIXIA module and it provides an API to enable other applications to control the network capture.

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CHAPTER 2 Analyzer Navigation

This chapter provides a description of the Analyzer Graphical User Interface, allowing you to easily navigate through the application, by using:

[Main Window below](#)

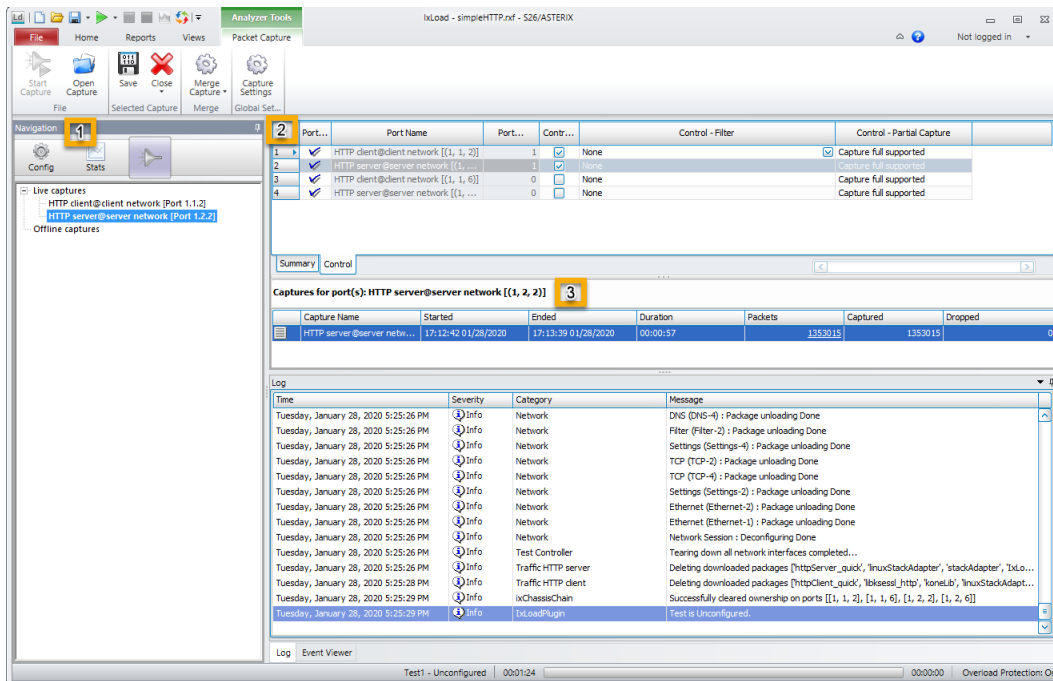
[Menus and Tool Bars on page 5](#)

[Opening a Capture in Analyzer on page 9](#)

Main Window

The main window consists of four main panels, as shown in the following figure:

- *Navigation View*– Contains the details of the Live and Offline captures.
- *Common View* – Contains view specific tabs. It contains more detailed information than the main list, and makes available various statistics related to the main list selection.
- *Capture for Ports View* – Contains detailed packet information of the ports.



Section	Fields/Controls	Description
1. Navigation View		Provides details on both Live and the Offline captures.
2. Common View	Port State	The current state of the port, Up or down.
	Port Name	The name of the port present in the test.
	Port Captures	Signifies the number of captures per port while configuring manually.
	Control - Enable	Select this to turn on the capture for the specific port. By default, it is not selected.
	Control - Filter	Set a custom filter for the port. The filter is configured by using filter string expressions from the tcpdump application. The filter can be introduced manually or by using the Pattern Editor. By default, it is set to None . This tab is available only when the Control tab is selected.
	Control - Partial Capture	Specify the maximum amount of data that is captured for each packet. If partial capture is selected, the following message appears in Wireshark: "packet size limited during capture". By default, it is set to Capture full supported . This tab is available only when the Control tab is selected.
3. Capture for Ports view	Capture Name	The name of the capture for the test.
	Started	The start time of the capture, denoted by time and date stamp.
	Ended	The time when the capture has ended, denoted by time and date stamp.
	Duration	The duration for which the capture has successfully run.

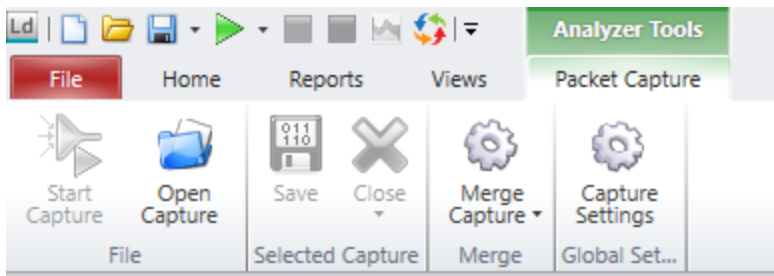
Section	Fields/Controls	Description
	Packets	The number of packets that are actually transferred from the ports to the GUI. The increase rate here is much slower than Captured . If you select, Abort packet upload , the packet transfer from port to GUI stops immediately, and only the packets which were transferred before the abort operation are present in the GUI. You have a link on the number of packets, which on selection opens up wireshark and shows you the packets in the GUI.
	Captured	The number of packets that are captured in the port. These packets are transferred slowly over time to the GUI.
	Dropped	The number of packets which the Analyzer was not able to capture on the port due to a high scale test.

Menus and Tool Bars

This section describes the Analyzer menu options and tool bar buttons:

Packet Capture Menu

List details related to Open Capture, Grid Operations, Merge Capture etc.



Reports Menu

Open Capture

Gives the option to open an existing Capture.

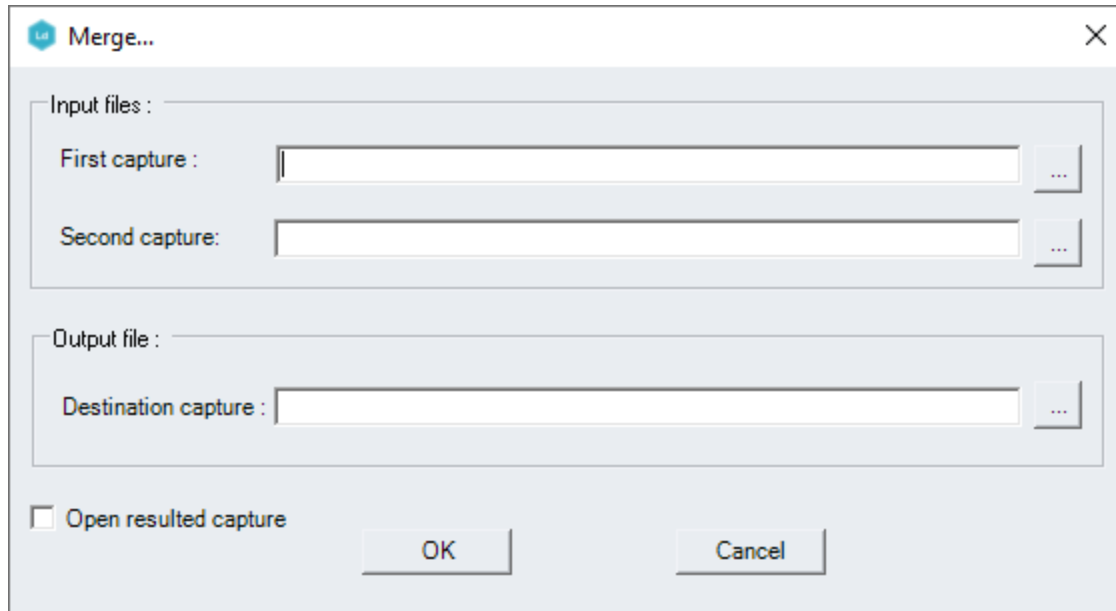
Save and Close




Save button allows you to save the current opened capture(s). Close button allows you to close the selected capture.

Close All allows you to close all displayed captures.


Merge Capture

Analyzer has the option of merging two captures.



1. Type the path to the first file to merge in the **First capture** field. Alternatively, you can select  to indicate the file's location.
2. Type the path to the second file to merge in the **Second capture** field. Alternatively, you can select  to indicate the file's location.
3. Type the path for the result file in the **Destination capture** field. Alternatively, you can select  to indicate where you want the file to be saved.
4. Optionally, you can select **Open resulted capture** to automatically open the result file after the merging process is complete.

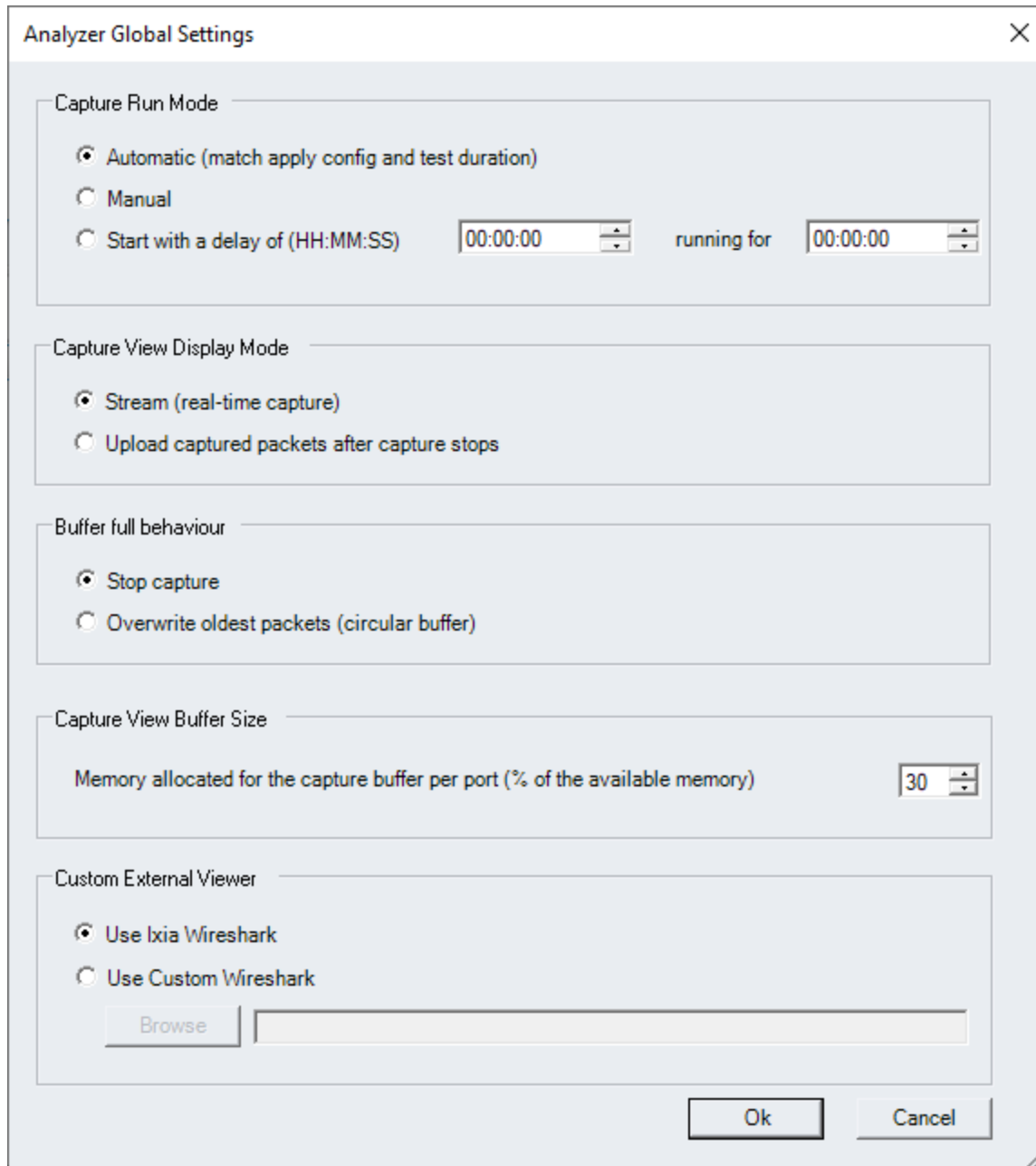
Select **OK** to merge two files.

 **Note:** Two captures of different types cannot be merged. Both of them must be, for example, Ethernet, or both ATM, and so on. Also, the result file cannot exceed 4 GB.

Capture Settings

Capture Settings allows you to configure the following global parameters for Analyzer:


- Capture Run Mode,
- Capture View Display Mode
- Buffer full behavior
- Capture View Buffer Size
- Custom External Viewer



The screenshot shows the "Analyzer Global Settings" dialog box with the following configuration:

- Capture Run Mode:** Automatic (match apply config and test duration), Manual, Start with a delay of (HH:MM:SS) [00:00:00] running for [00:00:00]
- Capture View Display Mode:** Stream (real-time capture), Upload captured packets after capture stops
- Buffer full behaviour:** Stop capture, Overwrite oldest packets (circular buffer)
- Capture View Buffer Size:** Memory allocated for the capture buffer per port (% of the available memory) [30]
- Custom External Viewer:** Use Ixia Wireshark, Use Custom Wireshark [Browse] []

Buttons: Ok, Cancel

Section	Fields/Controls	Description
 Note: The settings can be changed only after the test is stopped and Release configuration per port is complete.		
Capture Run Mode	Automatic (match apply config and test duration)	Starts the capture automatically once the test start.
	Manual	Manually capture packets throughout the duration of the test. Need to select Start Capture to start capturing packets.
	Start with a delay of (HH:MM:SS) ... running for ...	Configure the exact time after which the capturing of packets needs to start and also mention for how long the capture needs to take place, by mentioning the duration in Hour, minutes and seconds.
Capture View Display Mode	Stream (real-time capture)	The transfer of captured packets starts immediately from the ports to the GUI.
	Upload capture packets after capture stops	The transfer of the captured packets to the GUI starts only after the capture has stopped in the port.
Buffer Full behavior	Stop capture	When the memory buffer is full on the port, stop capturing any more packets from the test.
	Overwrite oldest packets (circular buffer)	When the memory buffer is full on the port, replace the oldest packets with the newer ones.
Capture View Buffer Size	Memory allocated for the capture buffer per port (% of the available memory)	The size of the memory buffer for capturing packets per port.
Custom External Viewer	Use Ixia Wireshark	Use the Ixia wireshark version which gets installed, when you install IxLoad.

Section	Fields/Controls	Description
	Use Custom Wireshark	Use the custom wireshark version pre-installed in your computer. Navigate to the required path and select the .exe file.

Opening a Capture in Analyzer

To open a capture in Analyzer:

1. Select **File > Open** in the main menu, or click the **Opentool** bar button. The Open...dialog opens.
2. In the Files of type list, select one of the two options:
 - *Capture file (*.cap)* – used to open an existing capture
 - *Live capture file (*.lcap)* – used to open a live capture that is being performed by using the application with which the Analyzer is integrated.
3. Browse for the capture file, select it, then click **Open**. The capture displays in the Analyzer main view.

You can have more than one capture opened at a time in Analyzer and navigate between them by selecting the corresponding capture.

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