



Fore Scout

Core Extensions Module: Flow Collector

Configuration Guide

Version 1.0.2



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About the Documentation

- Refer to the Technical Documentation page on the Forescout website for additional documentation: <https://www.Forescout.com/company/technical-documentation/>
- Have feedback or questions? Write to us at documentation@forescout.com

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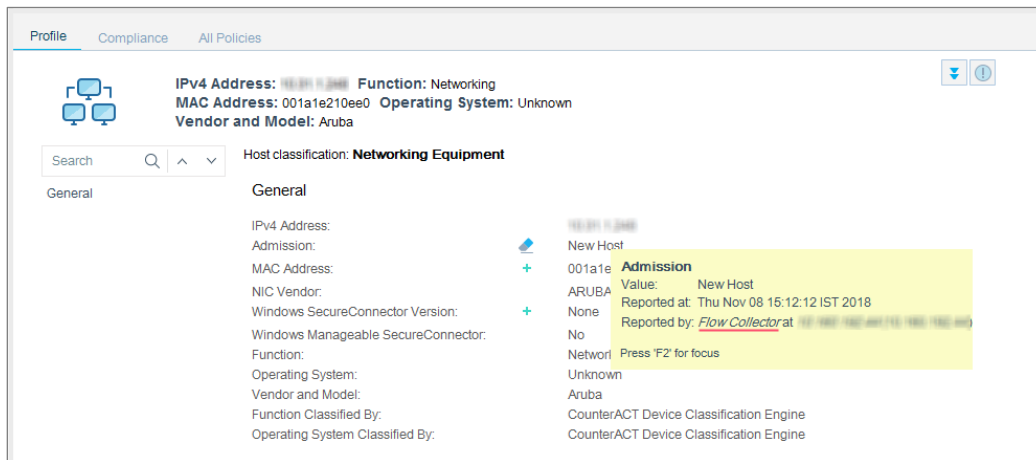
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About the Flow Collector

The Flow Collector is a component of the Forescout® Core Extensions Module. See [Core Extensions Module Information](#) for details about the module.

The Flow Collector analyzes the traffic flows exported by network devices, such as switches, firewalls, and routers. It reports flow session data that is used to resolve endpoint properties and that can be used to map visualized traffic patterns. Other Forescout modules can also use flow session data.

The Flow Collector can detect endpoints or endpoint property values that the Forescout Packet Engine might not learn. This capability is relevant in large scale deployments where the Packet Engine is limited in its ability to detect activity in remote sites and branch offices. Use of the information reported by the Flow Collector improves visibility and speeds the detection of new endpoints.



How It Works

The Flow Collector audits data from any of the following sources:

- *Flow Exporters* - switches, routers and other networks devices that report traffic flow data
- *Other Flow Collectors* - TAPs (Test Access Points) and third-party flow collectors, such as Stealthwatch, that enable centralized reporting of flow data

The Flow Collector filters the information and applies heuristic logic to enable the Forescout platform to report endpoint properties and session information.

Deployment Scenarios

Forescout 8.1 is configured to collect traffic data in one of the following ways:

- Distributed Traffic Collection
 - Appliances analyze traffic for the endpoints they manage.
- Centralized Traffic Collection

One or more designated Appliances analyze the network traffic and extract and distribute the endpoint properties and session information to the Appliances that manage the relevant endpoints.

What to Do

This section describes what to do to begin working with the Flow Collector.

1. Verify that you have met system requirements. See [Requirements](#).
2. If the legacy NetFlow Plugin is running, see [Integrate with or Replace the NetFlow Plugin](#).
3. [Configure and Test the Flow Collector](#).
4. [Create Custom Policies](#). (Optional)

Requirements

This section describes system requirements, including:

- [Forescout Requirements](#)
- [Supported Flow Protocols](#)
- [Networking Requirements](#)
- [Port Availability](#)

Forescout Requirements

The Flow Collector requires the following Forescout release:

- Forescout version 8.1.

Supported Flow Protocols

The Flow Collector supports the following protocols, with or without Flexible NetFlow technology:

- NetFlow v5
- NetFlow v9
- IPFIX
- sFlow

Networking Requirements

Enable the flow protocol on Layer 3 network devices in the network segments of interest. Flow exporting network devices that are in these segments must be configured to report flow data to the CounterACT device that monitors the segment.


Port Availability

To support flow data communication to Forescout 8.1:

- Ensure that the communication ports are open on enterprise firewalls.
- Define exceptions for these ports in the Virtual Firewall action.

You can configure the Flow Collector port assignments. By default, the flow exporting network devices use the following ports to communicate with the Flow Collector.

- For NetFlow v9: port 4729 UDP
- For IPFIX: port 4739 UDP
- For sFlow: port 6343 UDP

 *If the NetFlow Plugin is running, ensure that it is not configured to use any of the ports used by the Flow Collector. See [Integrate with or Replace the NetFlow Plugin](#).*

Configure and Test the Flow Collector

Flow Collector version 1.0 is installed with Forescout 8.1, but it is disabled by default. After it is enabled, it produces session data that can be accessed by other components.

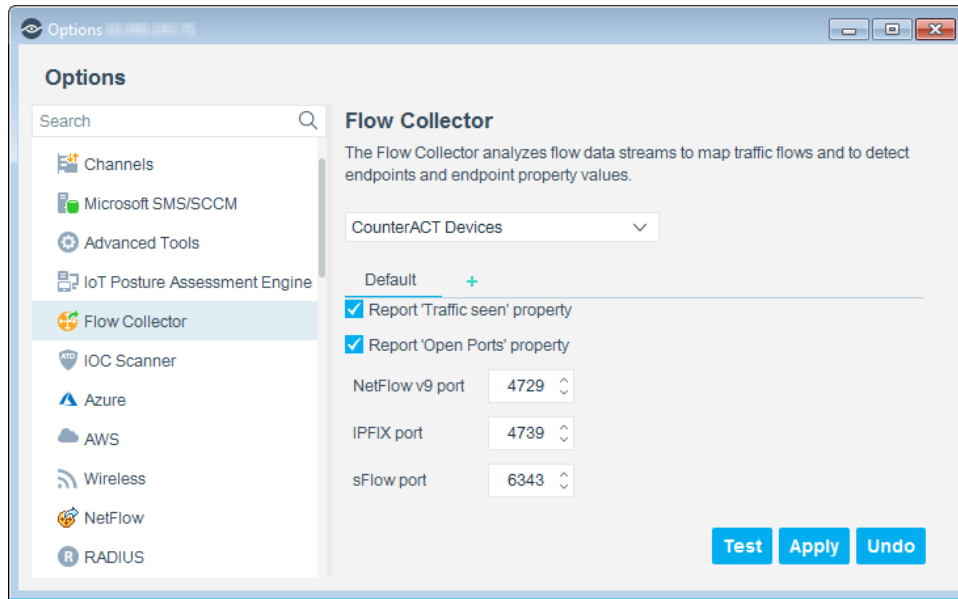
Configure the Flow Collector

In the configuration window, select:


- which properties the Flow Collector reports
- which ports to use for communication with network devices


To configure the Flow Collector:

1. In the Console, select **Tools** > **Options** and then select **Flow Collector**.



2. If you are configuring the Flow Collector on an Enterprise Manager, you can select specific devices for each configuration.
3. In some situations, such as when a switch is not defined to Forescout 8.1, the traffic flows to or from endpoints might only be discovered by the Flow Collector and not by any other method. You can configure the Flow Collector to report properties that may otherwise not be reported:
 - **Report 'Traffic seen' property**
 - **Report 'Open Ports' property**

 *For other properties that can be detected by the Flow Collector, see [Properties Resolved When Used in Policies](#).*
4. For each supported flow protocol version, define the port to be used by the Flow Collector for communication with network devices. See [Port Availability](#).

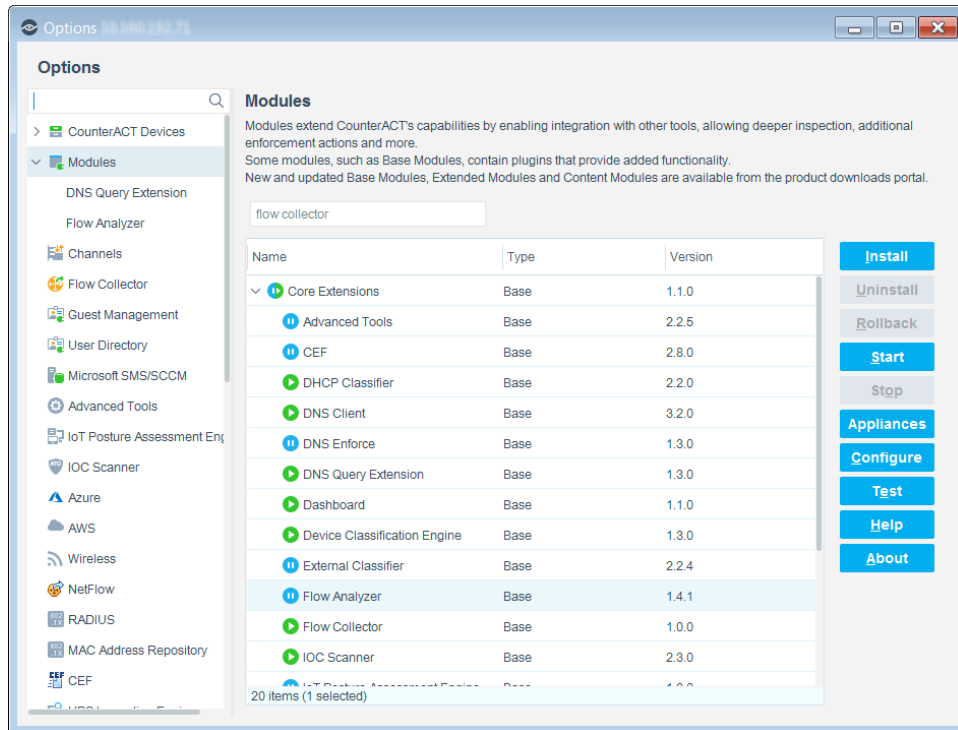
 *If the NetFlow Plugin is running, ensure that it is not configured to use any of the ports used by the Flow Collector. See [Integrate with or Replace the NetFlow Plugin](#).*
5. Select **Apply** to save the configuration.

Verify That the Plugin Is Running

After installation, verify that the plugin is running.

To verify:

1. Select **Tools>Options** and then select **Modules**.
2. Navigate to the plugin and select **Start** if the plugin is not running.

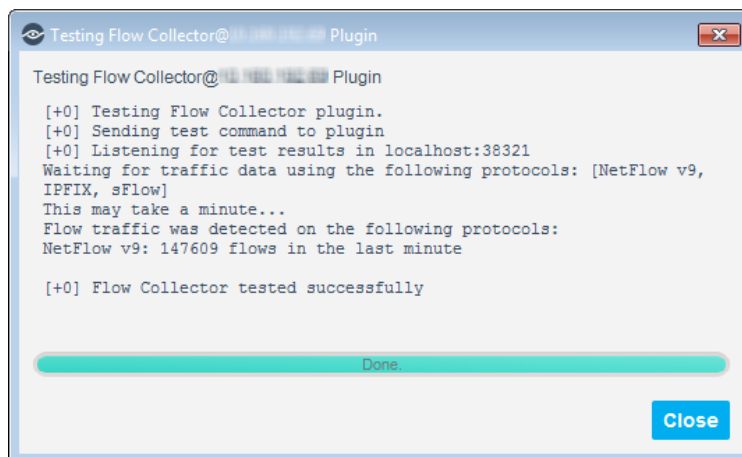


Test the Flow Collector

Test the plugin to ensure that traffic flows are detected.

To test the Flow Collector:

1. In the Options navigation pane, select **Flow Collector** and then **Test**.
2. If you are working on an Enterprise Manager, you can select specific devices for the test.
3. Run the test.



Integrate with or Replace the NetFlow Plugin

With the availability of the Forescout Flow Collector, the legacy NetFlow Plugin is deprecated. The Flow Collector provides more accurate and stable traffic flow detection and more scalable bandwidth capabilities than the NetFlow Plugin. For networks running the NetFlow Plugin with flow protocol v5 or higher, it is recommended to configure and enable the Flow Collector, and then stop and uninstall the NetFlow Plugin.

If both plugins run concurrently, ensure that they use different ports.

To ensure that the NetFlow Plugin uses a different port:

1. In the Console, select **Tools > Options** and then select **Modules**.
2. In the Modules pane, select **NetFlow** and select **Configure**. The NetFlow configuration pane opens.

The screenshot shows the NetFlow configuration interface. At the top, there is a dropdown menu labeled 'CounterACT Devices' with 'Default' selected. Below this is a '+' icon. The main configuration area includes several sections: 'Enable detection based on NetFlow' (unchecked), 'NetFlow Import Parameters' (Port for NetFlow communication: 2055, Protocol for NetFlow communication: UDP), 'Open Ports' (Use NetFlow data to resolve Open Ports property: unchecked), and 'NetFlow Exporters' (Use NetFlow data exported by devices in Switch table: checked, Use NetFlow data exported by devices with specified IPs: unchecked). At the bottom, there is a table with 'From' and 'To' columns and 'Add', 'Edit', and 'Remove' buttons.

3. Ensure that the **Port for NetFlow communication** field does not contain any of the ports used by the Flow Collector. By default, these are ports 4729, 4739 and 6343.

Create Custom Policies

Forescout *policies* are powerful tools for automated endpoint access control and management.

Information reported to Forescout 8.1 is stored in a *property*. Property values are displayed in Console views and can be evaluated and examined by Forescout *policies* to trigger management and remediation *actions*.

The Flow Collector reports information to Forescout 8.1 that is used to resolve existing properties. These properties can be included in Forescout policies – increasing the accuracy, granularity, and reach of policy-based management.

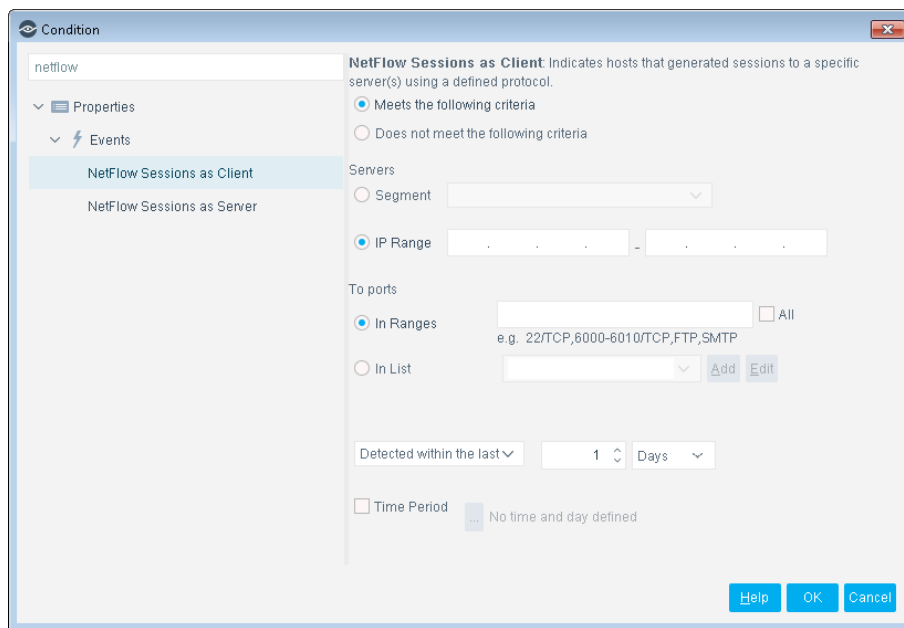
For more information about working with policies, select **Help** from the policy wizard.

To create a custom policy:

1. Log in to the Console.
2. Select the **Policy** icon from the Console toolbar.
3. Create or edit a policy.

Properties Resolved When Used in Policies

Two of the properties provided by the Flow Collector are only resolved when used in a policy.




To access these Flow Collector properties:

1. Navigate to the Properties tree from the Policy Conditions dialog box.
2. Expand the Events folder in the Properties tree.

The Flow Collector provides the following properties:

Property	Description
NetFlow Sessions as Client	The server target with which this endpoint initiated a session. The session is detected whenever traffic is seen. You can define matching conditions based on the server-side IP address port and the session protocol.
NetFlow Sessions as Server	The client that initiated a session with this endpoint. The session is detected whenever traffic is seen. You can define matching conditions based on the client-side IP address, port and the session protocol.

 *These properties are also reported by the NetFlow Plugin. If both plugins are running, they overwrite each other.*

Properties Not Requiring Policies

The Flow Collector resolves the following properties if they are selected in the Flow Collector configuration window:

- Traffic seen
- Open Ports

See [Configure the Flow Collector](#).

Core Extensions Module Information

The Forescout Core Extensions Module provides an extensive range of capabilities that enhance the core Forescout solution. These capabilities enhance detection, classification, reporting, troubleshooting, and more. The following components are installed with the Core Extensions Module:

Advanced Tools Plugin	DNS Enforce Plugin	NBT Scanner Plugin
CEF Plugin	DNS Query Extension Plugin	Packet Engine
DHCP Classifier Plugin	External Classifier Plugin	Reports Plugin
Dashboard Plugin	Flow Analyzer Plugin	Syslog Plugin
Device Classification Engine	Flow Collector	Technical Support Plugin
DNS Client Plugin	IOC Scanner Plugin	Web Client Plugin
	IoT Posture Assessment Engine	

The Core Extensions Module is a Forescout Base Module. Base Modules are delivered with each Forescout release. Upgrading the Forescout version or performing a clean installation installs this module automatically.

Additional Forescout Documentation

For information about other Forescout features and modules, refer to the following resources:

- [Documentation Downloads](#)
- [Documentation Portal](#)
- [Forescout Help Tools](#)

Documentation Downloads

Documentation downloads can be accessed from the [Forescout Resources Page](#), and one of two Forescout portals, depending on which licensing mode your deployment is using.

- **Per-Appliance Licensing Mode** – [Product Updates Portal](#)
- **Flexx Licensing Mode** – [Customer Portal](#)

 *Software downloads are also available from these portals.*

To identify your licensing mode:

- From the Console, select **Help > About Forescout**.

Forescout Resources Page

The Forescout Resources page provides links to the full range of technical documentation.

To access the Forescout Resources page:

- Go to <https://www.Forescout.com/company/resources/>, select **Technical Documentation**, and search for documents.

Product Updates Portal

The Product Updates Portal provides links to Forescout version releases, Base and Content Modules, and eyeExtend products, as well as related documentation. The portal also provides a variety of additional documentation.

To access the Product Updates Portal:

- Go to <https://updates.forescout.com/support/index.php?url=counteract> and select the version you want to discover.

Customer Portal

The Downloads page on the Forescout Customer Portal provides links to purchased Forescout version releases, Base and Content Modules, and eyeExtend products, as well as related documentation. Software and related documentation only appear on the Downloads page if you have a license entitlement for the software.

To access documentation on the Forescout Customer Portal:

- Go to <https://Forescout.force.com/support/> and select **Downloads**.

Documentation Portal

The Forescout Documentation Portal is a searchable, web-based library containing information about Forescout tools, features, functionality, and integrations.

To access the Documentation Portal:

- Go to https://updates.forescout.com/support/files/counteract/docs_portal/

Forescout Help Tools

Access information directly from the Console.

Console Help Buttons

Use context-sensitive *Help* buttons to access information about tasks and topics quickly.

Forescout Administration Guide

- Select **Forescout Help** from the **Help** menu.

Plugin Help Files

- After installing the plugin, select **Tools** > **Options** > **Modules**, select the plugin, and then select **Help**.

Online Documentation

- Select **Online Documentation** from the **Help** menu to access either the [Forescout Resources Page](#) (Flexx licensing) or the [Documentation Portal](#) (Per-Appliance licensing).