

## What's New in LiveNX 9.5

- Updated the Operation Dashboard (WebUI) Flow Path Analysis Story to include SD-Access VRF/VN and SGT IPFIX fields.

WAN Applications > Application: > PATH TCP 192.168.100.100:63161 - 192.168.105.100:35184

Aug 18, 2020 09:45:00 -- Aug 18, 2020 09:50:00

Constellation Milky Way

Path Flow Constellation - Milky Way

Device Name	PA-CSR-01.liveaction.com	PA-CSR-02.liveaction.com
Site Name	Constellation	Constellation
Application	ftp-data, unknown	ftp-data
CPU Usage	2.00%	1.00%
Memory Usage	16.00%	16.00%
In Interface	GigabitEthernet4	GigabitEthernet2
Out Interface	GigabitEthernet2	Tunnel200
In QoS Policy	-	-
Out QoS Policy	-	-
Bytes In	6.43 MB	10.68 MB
Bytes Out	6.43 MB	10.68 MB
Bit Rate In	171.53 Kbps	284.69 Kbps
Bit Rate Out	171.53 Kbps	284.69 Kbps
Utilization In	-	-
Utilization Out	-	10.95 %
DSCP	-	-
Virtual Network	4099	8188 (Name)
VRF	-	-
Group Tag	4 (Employees)	4 (Employees)

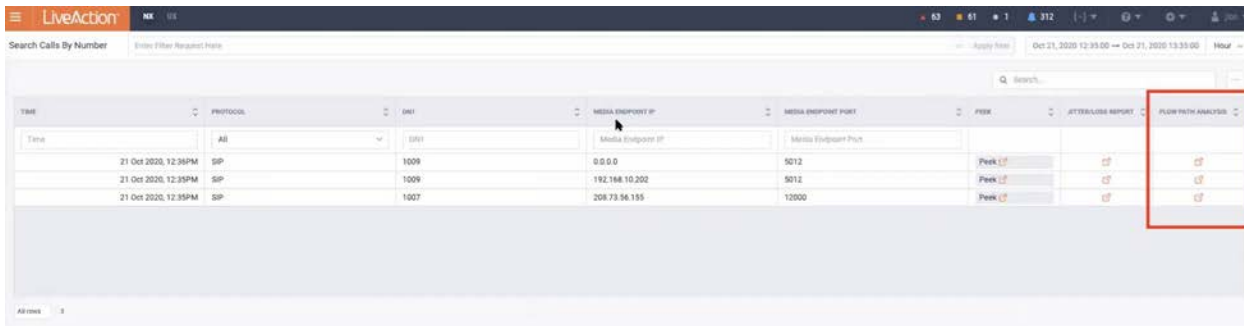
- Migrated Engineering Console's IPSLA Status Dashboard to Operations Dashboard (WebUI).

STATUS	ID	GROUP ID	TYPE	TAG	DEVICE	DESTINATION/URL	ATTEMPTS	ERROR
●		1	Jitter		RTR_Seattle	199.199.199.1	13,485	Not connected
●		2	ICMP Echo		RTR_Seattle	192.168.10.3	13,485	Success
●		3	ICMP Echo		RTR_Seattle	192.168.103.254	13,485	Timeout
●		1	Jitter		RTR_LosAngeles	199.199.1.5	23,565	Success
●		2	Jitter		RTR_LosAngeles	10.100.51.4	23,565	Not connected
●		1	ICMP Echo	Austin_JCMP_Echo	RTR_Austin	10.100.50.80	114,636	Timeout
●		1	HTTP		RTR_Louisville	http://www.google...	44,673	Timeout
●		1	Jitter		RTR-DC-MPLS	192.168.101.254	9,632	Success
●		1	Jitter		RTR-DC-MPLS	199.199.1.17	9,632	Success
●		3	Jitter		RTR-DC-MPLS	199.199.1.5	7,196	Success
●		4	Jitter		RTR-DC-MPLS	199.199.1.21	7,082	Success
●		1	Jitter	TestSLA	RTR_Madison	199.199.1.29	44,674	Not connected
●		1	ICMP Echo		RTR_London	192.168.102.254	13,485	Timeout

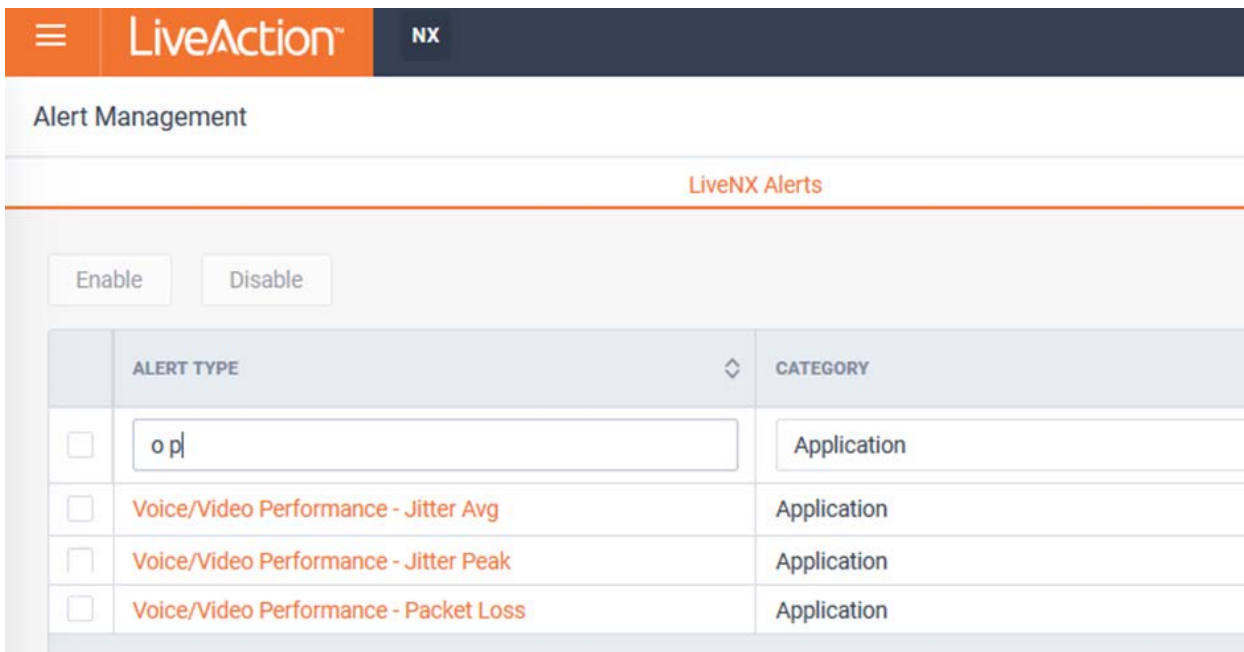
- To ensure Flow visibility of traffic on TLOC extensions in Cisco SD-WAN environments, both "WAN" and "XConn" tags will automatically be used in WAN Capacity Planning Story drill-down.

The screenshot shows the 'EDIT' dialog for interface GEO/1.888. The dialog includes fields for IP Address (10.176.8.105), Subnet Mask (255.255.255.0), Service Provider (mpls), Input Capacity (1000000 Kbps), Output Capacity (1000000 Kbps), and Label (Type Label). The Tags field contains 'vpn0' and a dropdown menu is open showing 'WAN/XConn' selected, with other options being 'None'.

- Search Call by Number Story now includes option to drill-down to Flow Path Analysis Story.



- Updated the Operations Dashboard's (WebUI) Voice/ Video Performance Alerts to:
  - Voice/ Video Performance – Jitter Avg
  - Voice/ Video Performance – Jitter Max
  - Voice/ Video Performance – Packet Loss



- Added Cisco SD-WAN Site-to-Site Performance over time Report for tracking delay, loss, and jitter over a threshold over time.

Src Site	Dst Site	Service Provider	Time In Violation Of Threshold	Total Time With Data	% Time In Violation	Longest Violation Duration
Texas	NewYork	mpls	1 day 11 hours 55 minutes	2 days 8 hours 55 minutes	63.10%	35 minutes
Texas	London	mpls	1 day 11 hours 55 minutes	2 days 8 hours 55 minutes	63.10%	35 minutes
NewYork	Texas	mpls	1 day 11 hours 55 minutes	2 days 8 hours 35 minutes	63.48%	35 minutes
London	Texas	public-internet	2 days 9 hours	2 days 9 hours	100%	2 days 9 hours
NewYork	London	mpls	1 day 11 hours 55 minutes	2 days 8 hours 35 minutes	63.48%	35 minutes
Texas	NewYork	public-internet	1 day 22 hours	2 days 8 hours 55 minutes	80.82%	2 hours 40 minutes
London	Texas	mpls	1 day 11 hours 50 minutes	2 days 9 hours	62.87%	30 minutes
London	NewYork	mpls	1 day 11 hours 50 minutes	2 days 9 hours	62.87%	30 minutes
Texas	London	public-internet	2 days 8 hours 55 minutes	2 days 8 hours 55 minutes	100%	2 days 8 hours 55 minutes
NewYork	Texas	public-internet	2 days 8 hours 10 minutes	2 days 8 hours 35 minutes	99.26%	1 day 6 hours 40 minutes

- Added Category and Alert type filtering for Alert page and Alerting Reports.

severity	site	service	description	time opened	active for	category	type
Warning	Birmingham	RTR_Birmingham1.liv...	RTR_Birmingham1.liveaction.com QoS Class VOICE Drop Rate was 6.734 Kbps	27 Oct 2020, 04:52AM	a few seconds	Device, Interface	QoS Class Drop
Warning	PaloAlto-VE-01	RTR_SanJose	RTR_SanJose QoS Class SET_DSCP_VOICE Drop Rate was 82.49 Kbps	27 Oct 2020, 04:52AM	a few seconds	Device, Interface	QoS Class Drop
Warning	Site 5	RTR_Austin.liveaction...	RTR_Austin.liveaction.com QoS Class VOICE Drop Rate was 2.47 Kbps	27 Oct 2020, 04:52AM	a few seconds	Device, Interface	QoS Class Drop
Warning	Seattle	RTR_Seattle	RTR_Seattle QoS Class VIDEO Drop Rate was 31.13 Kbps	27 Oct 2020, 04:52AM	a few seconds	Device, Interface	QoS Class Drop
Warning	LosAngeles	RTR_LosAngeles.liv...	RTR_LosAngeles.liveaction.com QoS Class VoIP-19427 Drop Rate was 0.03 Kbps	27 Oct 2020, 04:48AM	4 minutes	Device, Interface	QoS Class Drop

- Ad-hoc Report's view and table options can be saved.

Application Test Daily Executed at: Aug 21, 2020 04:00:01 EDT (GMT-04:00)

Application (Flow)

Device: All WAN Devices Interface: All WAN Interfaces Display Filter: No Display Filtering Direction: Outbound Flow Type: Basic Flow Execution Type: Time Series Sort By: Bit Rate Bin Duration: Auto Start Time: Aug 21, 2020 03:00:00 EDT (GMT-04:00) End Time: Aug 21, 2020 04:00:00 EDT (GMT-04:00) Server Name: Test Server 10a24323 Bin Interval: 5 minutes

Legend:

- youtube
- espn-video
- rtsp-video
- espn
- VoIP
- espn-browsing
- citrix-static
- outlook-web-service
- netflix
- rtsp

Total Flows: 792

View Options: Application, Total Flows, Total Bytes, Total Packets, Average Bit Rate, Save set of columns

- Scheduled reports in the Operations Dashboard (WebUI) can now be managed by administrators to change ownership or deleted.

**SCHEDULED REPORTS MANAGEMENT**

Reports not assign to active users.

Buttons: Edit, Re-assign Ownership, Delete

SCHEDULED REPORT NAME	SCHEDULE TYPE	REPORT RESULTS COUNT	REPORT OWNER
Scheduled Report Name	All	Report Results Count	Report Owner
WAN Interface Capacity	Monthly	11	User 1
WAN Interface Capacity	Monthly	24	User 1
ACFdu	Hourly	120	User 1
CbPpg	Hourly	20	John
lkma	Hourly	480	John
Wgehu	Hourly	300	John
ZsCsk	Hourly	390	David
zCmar	Hourly	800	David
ydgYC	Hourly	1200	Steve
ydfmv	Hourly	560	Steve

All Rows / 4

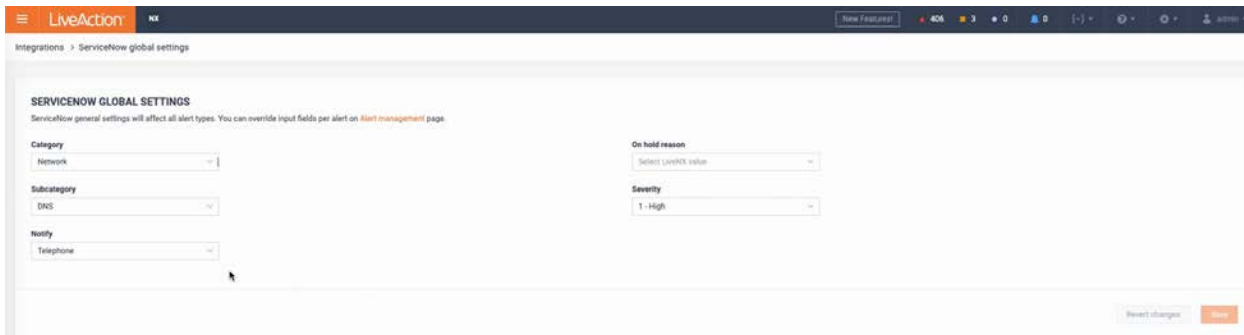
- The Operations Dashboard (WebUI) Alert history now includes a “Time Closed” column.

**Alerts** | Enter Filter Request Here | Apply filter | Oct 18, 2020 05:15:00 – Oct 19, 2020 05:15:00 | Day | Configure Alerts

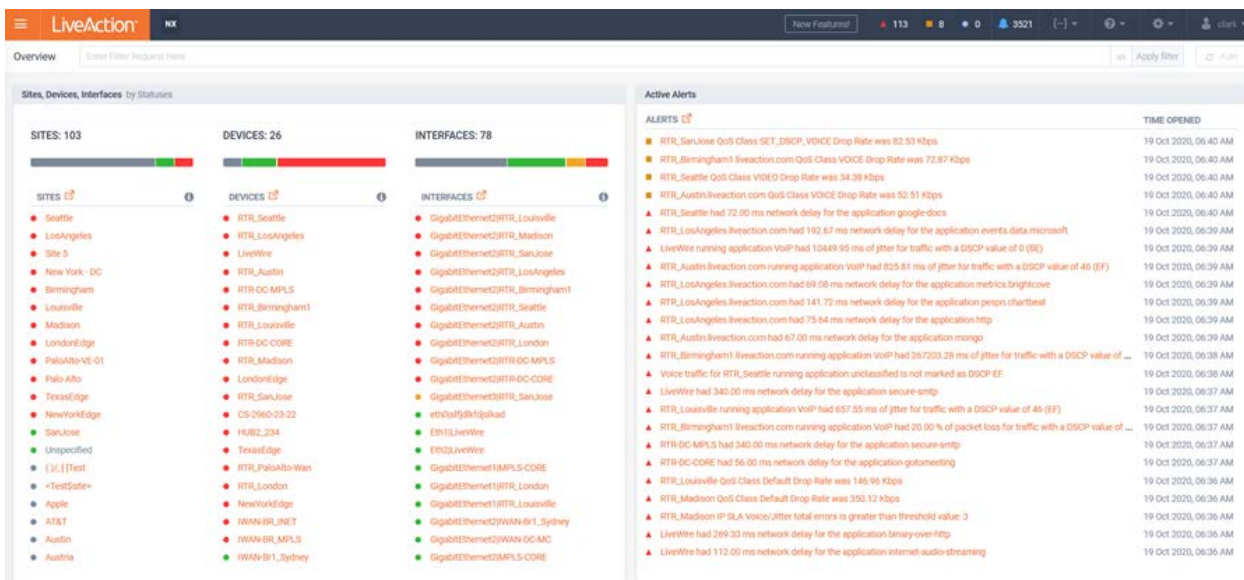
Resolve | Ignore | Acknowledge | Activate | Refresh Alerts | View Options

SEVERITY	SITE	DEVICE	DESCRIPTION	STATUS	TIME OPENED	TIME CLOSED	ACTIVE FOR	CATEGORY
Critical	LosAngeles	LiveWire	Packet loss for LiveWire running application rtp with a DSCP value of 0 (BE) returned below thresh...	Resolved	19 Oct 2020, 05:14AM	19 Oct 2020, 05:15AM	a few seconds	Application
Critical	Louisville	RTR_Louisville	RTR_Louisville QoS Class Default Drop Rate was 80.42 Kbps	Active	19 Oct 2020, 05:14AM	N/A	2 minutes	Device, Interface
Critical	Madison	RTR_Madison	RTR_Madison IP SLA Voice/Jitter total errors is greater than threshold value: 3	Active	19 Oct 2020, 05:14AM	N/A	2 minutes	Network
Critical	Madison	RTR_Madison	RTR_Madison QoS Class Default Drop Rate was 421.39 Kbps	Active	19 Oct 2020, 05:14AM	N/A	2 minutes	Device, Interface
Critical	LosAngeles	RTR_LosAngeles.livea...	RTR_LosAngeles.liveaction.com running application rtp-video had 28.19 % of packet loss for traffi...	Active	19 Oct 2020, 05:14AM	N/A	2 minutes	Application
Critical	LosAngeles	RTR_LosAngeles.livea...	RTR_LosAngeles.liveaction.com running application VoIP had 9.36 % of packet loss for traffic with...	Active	19 Oct 2020, 05:14AM	N/A	2 minutes	Application
Critical	Site 5	RTR_Austin.liveaction...	Packet loss for RTR_Austin.liveaction.com running application VoIP with a DSCP value of 0 (BE) re...	Resolved	19 Oct 2020, 05:14AM	19 Oct 2020, 05:15AM	a few seconds	Application
Critical	New York - DC	RTR-DC-CORE	RTR-DC-CORE running application rtp had 52.24 % of packet loss for traffic with a DSCP value of 4...	Active	19 Oct 2020, 05:14AM	N/A	2 minutes	Application
Critical	Site 5	RTR_Austin.liveaction...	RTR_Austin.liveaction.com running application VoIP had 129.57 ms of jitter for traffic with a DSCP...	Active	19 Oct 2020, 05:14AM	N/A	2 minutes	Application
Critical	New York - DC	RTR-DC-CORE	RTR-DC-CORE running application rtp had 27.39 % of packet loss for traffic with a DSCP value of 0 ...	Active	19 Oct 2020, 05:14AM	N/A	2 minutes	Application
Critical	New York - DC	RTR-DC-CORE	RTR-DC-CORE running application rtp had 182.89 ms of jitter for traffic with a DSCP value of 46 (EF)	Active	19 Oct 2020, 05:14AM	N/A	2 minutes	Application
Critical	Seattle	RTR_Seattle	Jitter for RTR_Seattle running application VoIP with a DSCP value of 46 (EF) returned below thresh...	Resolved	19 Oct 2020, 05:14AM	19 Oct 2020, 05:15AM	a minute	Application

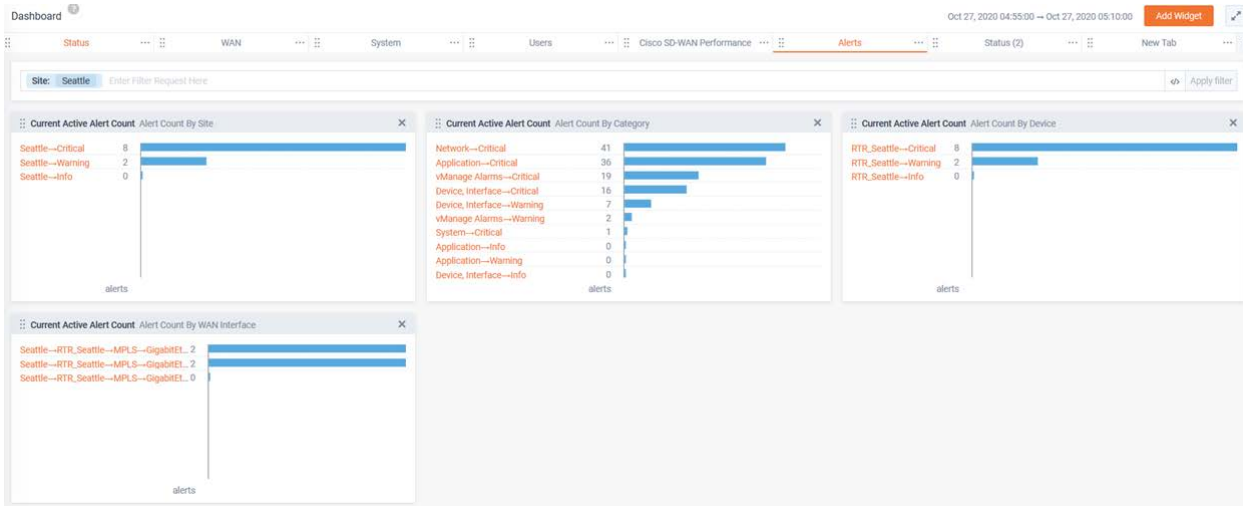
- Service Now integration options have been added to help environments that use custom Service Now templates.



- The following Alerts have been updated to drive the Operation Dashboard's (WebUI) status:
  - Low WAN Utilization
  - Application Performance – Network Delay
  - Application Performance – App Delay
  - Voice/ Video Performance – Jitter Avg
  - Voice/ Video Performance – Jitter Max
  - Voice/ Video Performance – Packet Loss
  - Interface Reachability
  - Device Reachability
  - Site Reachability



- The Operations Dashboard's (WebUI) Dashboard Alert widgets support Filters.

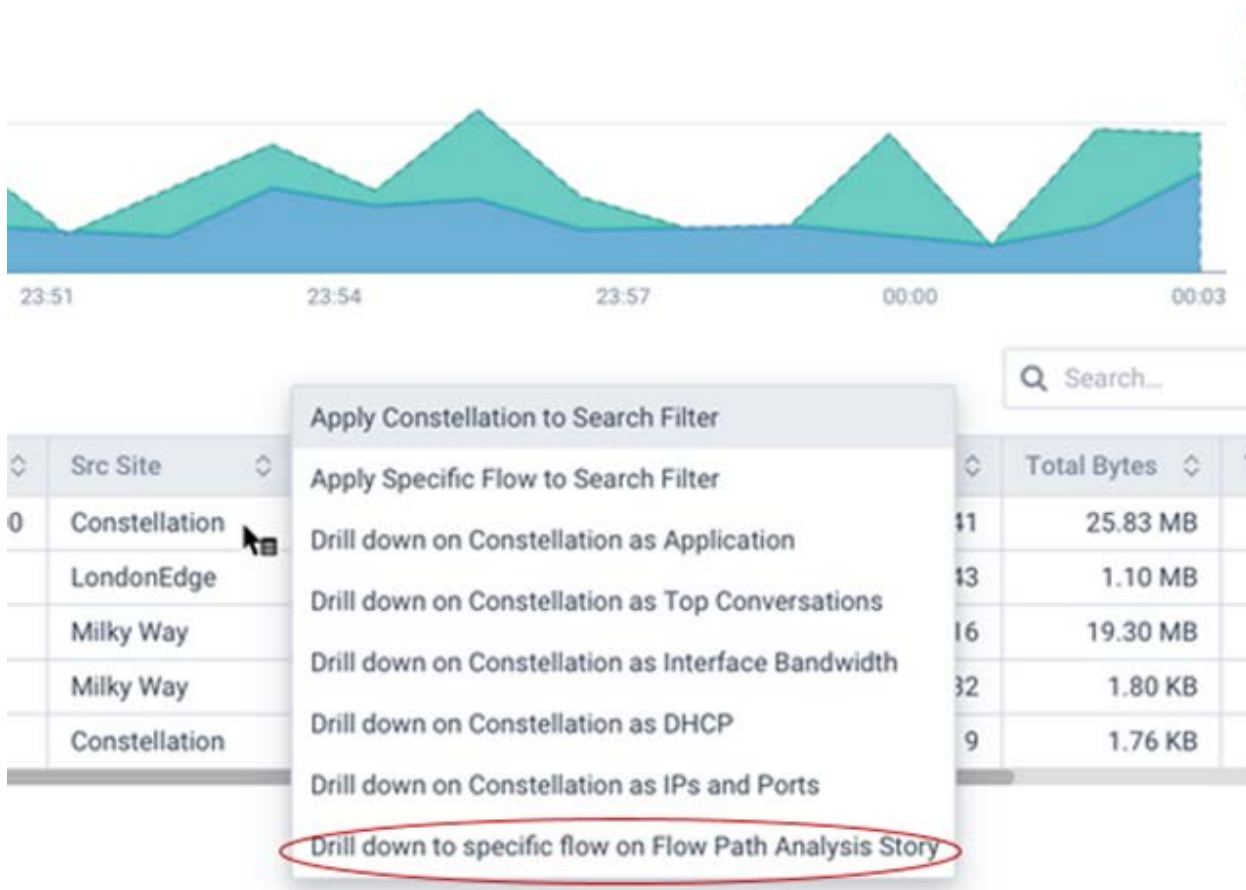


- Custom Application definitions support multi-protocol selection and include protocols ESP and AH.

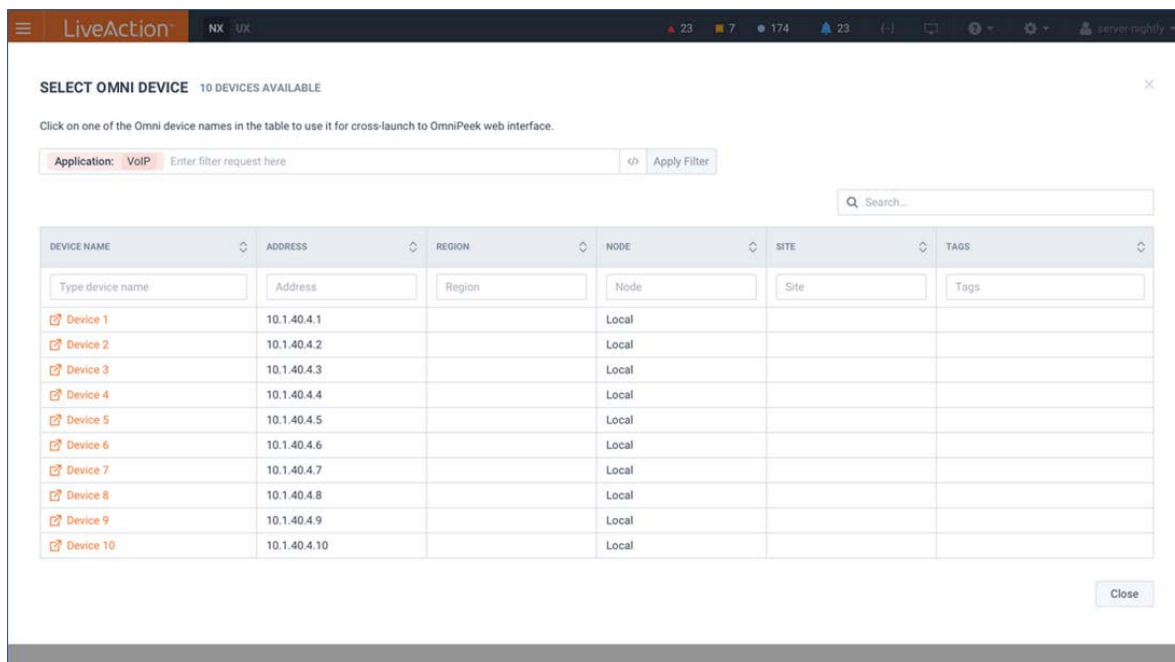
The screenshot shows the 'ADD CUSTOM APPLICATION' dialog box in the LiveAction Application Management interface. The dialog is titled 'ADD CUSTOM APPLICATION' and contains the following fields and sections:

- Name \***: A text input field containing 'CustomApp'.
- Description**: A text input field containing 'Enter Custom Application Description'.
- NETWORK ATTRIBUTES**: A section with a radio button selected.
- IP ranges**: A text input field with the placeholder 'Specify IPs or IP ranges (ex: 192.168.1.1-192.168.1.200), one per line'.
- Include applications**: A text input field with the placeholder 'Start typing for more results'.
- Layer 4 Protocol**: A section with a dropdown menu showing 'UDP' and 'TCP' selected, and a 'Select protocol' button. A counter indicates 'Added: 2'.
- Port ranges**: A text input field with the placeholder 'Specify ports or port ranges (ex: 2427-2430), one per line'.
- HTTP HOST OR SSL COMMON NAME**: A section with a radio button selected.
- HTTP host**: A text input field with the placeholder 'Enter HTTP host or SSL common name. Ex: \*.webex.com'.
- A note at the bottom states: 'You can use wildcards in host names.'
- Buttons**: 'Cancel' and 'Save' buttons are located at the bottom right.

- Added support for drill-down from Reports to Flow Path Analysis Story in the Operation Dashboard (WebUI).



- The Operation Dashboard's (WebUI) Flow Path Analysis story allows cross-launch to LiveNX Peek for LiveWire and LiveCapture packet Analysis.





- Added support for Cisco SD-WAN vEdge QoS monitoring.

