128 TECHNOLOGY

128T Release Notes Version 4.1.6-1

Abstract

128T Release Notes

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128T 4.1.6 Release Notes

Note: The 4.1.6 release is a superset of the 4.1.5-3 release. Features and corrections in the 4.1.5-3 release are not provided in these release notes. Please refer to the 4.1.5-3 Release notes for further information.

Defect Fixes

- **I95-21979** An ethernet interface with DHCP enabled cannot be created from GUI. Validation does not pass and throws the error: "There must be at least one address configured when type is not pppoe and dhcp is disabled".
- **I95-25553** Disabling and re-enabling a service is not real time configurable and required a restart of the 128T service.
- **195-25984, 195-32181** Power outage may result in a zero byte global.init file, rendering 128T unable to start
- 195-26634 BGP routes are not updated when VLANed interface is operationally down
- **I95-28103** After a restart of the highway process, any interfaces that were managed by 128T that were not gracefully restored, now provide detailed logging information regarding their state and corresponding transition.
- **I95-28535** Unable to obtain DHCP lease after redundant interface state transitions back to operationally up
- 195-29115 service-route / max-sessions is not real-time configurable and requires a restart of the 128T service
- **I95-29741** Salt connection between Router and Conductor may not reestablish on a connection failure
- **I95-29811** Session created with a non-standard protocol (e.g. security audits performing "fuzzing") can cause flows to never be deleted and exhaust the flow table
- **195-29812** Service ping does not work with peer-connectivity set to outbound-only between 128T routers
- **I95-29821** Packet fragmentation for SVR paths is larger than configured MTU by the L4 packet header size
- **195-29990** When a KNI interface starts as operationally down, the state remains the default of unknown and never transition to down.
- **195-30002** Service route generation skipped for generation set to true if another service with the same name is set to generation false

- **I95-30078**, **I95-30268** Traffic does not switch to standby interface on management path communication failure
- 195-30315 DHCP Server fails to start after system power failure and power recovery
- **195-30327** On peer path failure, peer path may remain down if going through a nat to get to the remote peer
- **I95-30334** Shared interfaces can operate with both interfaces on each HA nodes as active (each acting in standalone mode)
- 195-30354, 195-30687 admin user or 128t-admin group missing after upgrade
- 195-30383 Connection error to node may result in configuration not being applied
- **I95-30401** Asset remains in pending state on initialization if the connection is terminated during pending state operations
- **195-30448** Application module retry interval takes an extended time after a failure. With this correction, if a failure is encountered the retries will start at 60 minutes and increase exponentially for each subsequence failure after the second failure.
- **I95-30734** "worker-core packet-processing-utilization" would show 100% due to improper handling of unidirectional flows when packet-retransmission feature is enabled
- 195-30742 Incorrect packet fragmentation when first packet is a jumbo packet
- I95-30781 Warning not provided when neighborhood does not have an end port range
- 195-30833 BGP over SVR neighbor not connecting due to missing route
- **195-30934** Services with matching tenants and protocols with port ranges ending in 65535 may result in services failing.
- **195-31005** 128T does not safely handle the case where a DHCP server provides a client lease with an address of 0.0.0.0
- **I95-31200** BGP timer configuration is not dynamically configurable
- **195-31208** continuous configuration updates do to network anomalies lead to increased memory usage
- 195-31232 Highway application may fault during network port scanning of the router
- **I95-31244** When a pinhole session is restored upon failover, if the routing table is not upto-date, the packet will incorrectly be routed to the same interface from which it came from
- 195-31251 Peer intermittently does not recover after system restart
- I95-31255 Intermittently managed routers may send a "No connectivity" alarm to the Conductor
- 195-31333 highwayManager application fault during multiple interface state transitions
- **I95-31515** highwayManager application faults if no paths are available for session duplication
- **195-31570** Changing the order of custom charts can sometimes render the dashboard page inoperable
- 195-31742 routingManager application can fault when a device interface is removed
- **195-32065** NAPT translation does not work with for a service-route with a next-hop
- 195-32257 Router behind a NAT not peering after upgrade

Special Considerations

- When configuring network-interface adjacencies via the PCLI the peer field is now required. If the peer is missing the PCLI will provide a message that it is required:
- "Argument 'peer' is required"
- Prior to 4.1.5, any peering with routers that have the same IP addresses was not supported. In 4.1.5 or greater remote peers having the same IP address is now supported in one direction, with the use of "outbound-only". 128T currently does not support ALL routers having the same IP address, the same IP address support is unidirectional. For example:

The following is supported:

```
R1(172.16.1.1) --- peered --- R2 (192.168.1.1)
|----- peered --- R3 (192.168.1.1)
```

The following is not supported:

```
R1(192.168.1.1) --- peered --- R2 (192.168.1.1)
|----- peered --- R3 (192.168.1.1)
```

Caveats

I95-30103 Entering flat configuration into PCLI does not always create the configuration

Symptom: - When performing configuration using flat (or cut and paste of the complete flat configuration line) the configuration is not applied

Conditions: - When a configuration object does not previously exist and setting an attribute of that configuration object. For example in the following configuration line:

```
configure authority tenant one name one
```

if the "tenant one" configuration object does not exist, the tenant object will not be created. If it does exist then the command will set the attribute "name" to "one"

Corrective Action: - On initial creation, do not use flat configuration operations for creating the configuration.

 I95-29842 Nodes with Overlapping DHCP addresses will not be displayed when 'show peers' command is run

Symptom: Nodes with Overlapping DHCP addresses will not be displayed in the output of show peers

Conditions: After upgrading to pre 4.1.5 to 4.1.6 and if Overlapping DHCP addresses are being used in the network topology

Corrective Action: After upgrading the Conductors perform a commit operation from either the PCLI or the Conductor GUI

 I95-29733 Conductor UI may not provide an indication that a refresh is in progress (flashing blue dot)

Symptom: When selecting the Router to fresh the available versions to upgrade, the flashing blue indicator may not be present

Conditions: Shortly after both HA conductors have been upgraded and the refresh button is selected for a router

Corrective Action: N/A, no user corrective action can be performed. Waiting for a moment will result in the appearance of the solid blue dot if an upgrade is available (Note: Both conductors must be running a version greater than or equal to the target router version)

I95-29592 Conductor UI and/or PCLI may not update the asset software version correctly

Symptom: The Conductor UI and/or the PCLI may not correctly reflect the software version running on the asset

Conditions: After the asset has been upgraded

Corrective Action: If the asset is not updated after ~5 minutes after an upgrade is performed, the salt-minion will need a restart on the asset node that does not update the version. This is done with the following command on the node as the root linux user:

```
"systemctl restart salt-minion"
```

I95-29271 PCLI/Netconf subsystem may fault on exit

Symptom: PCLI or Netconf session may fault

Conditions: On session exit (either exit from PCLI or direct Netconf session exit)

Corrective Action: N/A, no user corrective action is required.

195-29134 save tech-support-info fails to create tech support file

Symptom: save tech-support-info fails with the following error message:

```
"Error: Failed to execute the 'save-tech-support-info' RPC: Fatal error creating tarball"
```

Conditions: When configuration exports have been saved with spaces it in the name of the exported configuration file

Corrective Action: Remove the saved configuration files with spaces in the name and avoid using spaces when exporting configuration. Note: Exporting configuration files with spaces in the name may be prevented in a future release.

I95-28766 Conductor PCLI shows configuration change when no changes have been performed

Symptom: Conductor PCLI may incorrectly provide an * that there is a candidate configuration change

Conditions: Unknown

Corrective Action: None, if the configuration has not changed this indicator can be ignored. A comparison can be performed with compare config running candidate

• I95-27946 Commit may fail on Conductor when node in router pair is stopped

Symptom: When performing a commit to a router where one of the nodes is offline, the commit from the Conductor may not respond or may fail. Performing a validate operation a second time may provide the following error response:

```
"X Validating...
% Error: Candidate configuration is invalid:
1. A request of type validate is already in progress"
```

Conditions: When a node in the router pair is offline.

Corrective Action: The validate operation is sent from the conductor to the nodes to verify that the configuration is correct. The validate will timeout to the node that is offline. Bring the node back online and perform the operation a second time.

• **195-27944** Network error may cause upgrade to fail and not retry.

Symptom: The following message is provided on the Conductor UI

Conditions: When upgrading the Conductor from the Conductor GUI

Corrective Action: Verify the conductor can reach the 128T repository, once verified to be accessible, perform the upgrade operation again.

• **I95-27808** sync peer addresses router force from conductor may not trigger router to send address information from peer

Symptom: When performing the following command on the Conductor PCLI, sync peer addresses router force the router may not provide the peer address information

Conditions: Unknown

Corrective Action: Perform the PCLI command on the router to update the information on the conductor.

• **I95-27722** Alarms for "Peer not reachable" may not clear and will persist after nodes are back and operational

Symptom: Alarms for "peer not reachable" provided in on the Conductor

Conditions: Unknown, seen after system upgrade

Corrective Action: NA, The alarms will clear within 15 minutes.