

Haivision

Release Notes

Kraken 2.0.1

New Features and Enhancements

Kraken 2.0.1 release brings a number of fixes:

- Fixes a potential interoperability issue with Delta encoders
- Fixes an API issue for Output Stream settings

Fixed Issues

API

KRAK-1026 Setting an Output stream to anything but AUTO for the Network Interface will cause the API response to be broken and contain empty XML elements.

Transcoding

KRAK-1023 Interoperability with Delta encoder: The output video may become smeared and unusable, forcing the user to restart the transcoder session.

Known Issues and Limitations

API

KRAK-845 DELETE /apis/kraken/configurations/configuration-`{id}` for a non-existing `{id}` returns 200.

WORKAROUND: Use GET to verify the existence of the configuration following DELETE.

KRAK-844 PUT /apis/kraken/configurations/configuration-`{id}` returns 200 for an invalid request payload. There is no impact on Kraken.

WORKAROUND: Verify the response payload for an empty `<response />` instead of the status code.

KRAK-440 The REST API call to create (save) a configuration does not give the user the option to set it as default.

WORKAROUND: The user must first create the configuration, and then make a PUT configuration call setting `<default>` set to 1.

KRAK-195 Starting an active stream via API can result in an error.

```
{noformat}<response>
```

```
<error>
```

```
<code>1004</code>
```

```
<message>Failed to update resource</message>
```

```
</error>
```

```
</response>{noformat}
```

There is no impact to the active stream.

Appliance Model

KRAK-651 When switching from DHCP to static IP addressing, users may notice that the DNS settings are reverted after a reboot.

WORKAROUND: Perform the network configurations using the console UI.

KRAK-408 Kraken cannot be shut down from the web UI.

WORKAROUND: The shutdown command is available from the console UI. You may either open an SSH session or connect a keyboard and monitor to the appliance.

CUI

KRAK-749 The shortcut for terminal close (CTRL+X) conflicts with nano exit command. If pressed while in nano, the terminal window will close.

WORKAROUND: Use another editor such as vi to edit files.

KRAK-688 The console UI does not allow configuring secondary network interfaces. The CUI is designed as a basic tool to bring up the web UI. All necessary configuration tools for Kraken to be customized further are available in the web UI, including secondary network interface configuration.

KRAK-458 Unable to exit SSH session by logging out of console UI. When logging out of CUI, the user is presented with the CUI login screen and no options to close the SSH session.

WORKAROUND: To be able to log out of the SSH session:

1. Press CTRL+\ (control + backslash)
2. Clear up the screen using # clear; reset

KRAK-391 System-wide messages appear on the menu. While the console UI is displayed, a user may notice system-wide messages appear on portions of the screen. Depending on the window size, the message may obscure some of the CUI objects.

WORKAROUND: Clear the message by pressing a cursor key.

General

KRAK-679 The SAP announcement baseline interval in Kraken has been set to 1000ms. It is a higher frequency than what is given in the RFC documentation for SAP. This was done to assure compatibility with VLC Media Player's SAP listener.

KRAK-533 Traffic controller drops all packets at 400kbps video 720kbps default ceiling. The traffic shaper on the Kraken is unable to handle this configuration. The resulting impact is that the queue discipline drops 100% of the packets. A viewer will not be able to tune into this stream.

WORKAROUND: A user may decide to manually adjust the shaper ceiling to 734kbps to get an output, however this no longer guarantees 720kbps ceiling. If the encoded content bitrate is smooth and predictable, this may be an option.

Installation / Upgrade

KRAK-848 If network configuration has not yet been performed, it is possible the dynamic stream routing is non-functional.

WORKAROUND: Perform the network configuration or re-apply the existing configuration without changes. Reboot the server.

KRAK-455 Scriptlet failed error during Kraken software-only installation. The following log entry is made in the hai-install log file:

```
warning: %post(hai_web-mod_ssl-1:2.2.15-50.el6.i686) scriptlet failed, exit status 127
```

This is a normal part of the installation process. No action should be taken by the user.

KRAK-699 Kraken servers that have a hostname which is not registered with the local DNS and not a fully-qualified domain name will fail when upgrading from 1.2-beta3.

WORKAROUND: Ensure that the Kraken server's hostname is a fully-qualified domain name prior to updating. The CUI or the web UI can be used to configure this.

Licensing

KRAK-959 After updating to Kraken 2.0, the system must be relicensed.

WORKAROUND: Apply a valid Kraken 2 license.

KRAK-465 License update may take a few seconds to commit.

WORKAROUND: After pasting in the license string, click 'Apply'. If you find that you are unable to start a transcoding session, please wait a few seconds for Kraken to finish updating.

Security

KRAK-773 A vulnerability exists for physically proximate attacks which allows sudo authentication bypass when the battery is drained. See CVE-2013-1775 for further details.

Transcoding

KRAK-1018 Streams from Dell R630 units transcoding 16 HD H.264 streams at once may play slower when compared to the source

KRAK-1017 When under their maximum licensed load, HD HEVC streams from Dell R430, R620, and R630 units may have slight macro blocking when compared to the source

KRAK-1015 CC data is not detected in HEVC streams by VLC

KRAK-1012 HEVC encoder starts dropping frames when encoding resolutions and framerates higher than 720p30

KRAK-1004 A/V sync is off by 0.6 seconds when played through Makito X Decoder

KRAK-986 Kraken Cannot Handle Makito Stream Switch from ADTS to LATM

KRAK-869 Non-monotonic output timestamp intervals may be possible when transcoding Mako or Makito encoded interlaced content.

KRAK-867 60FPS Kraken outputs with audio enabled may not decode properly in HaiPlay.

KRAK-837 Vortex MPEG2 source streams may not be properly transcoded by Kraken. The output may contain corruption.

KRAK-836 The MTU setting in Kraken does not alter transport stream cell sizes. It only alters the payload size of the network frames.

KRAK-831 Stuttering occurs on all outputs following an overloaded encoder, even after the excess streams are stopped.

WORKAROUND: After the excess streams are stopped, the remaining streams must be restarted.

KRAK-819 Piranha HM2ED captions transcoded by Kraken are not detected in VLC.

KRAK-814 Limitation: Kraken produces a bitrate higher than target for output framerates 5 or less. Packets can be dropped if the traffic shaper is enabled.

KRAK-812 When transcoding a MJPEG stream, Amino A140 may drop frames more often than InStream and VLC

WORKAROUND: Force a low output framerate, such as 5 FPS.

KRAK-790 Transcoding COM1000 streams may cause decoders to display errors such as audio and video stutters or artifacts.

KRAK-479 Dueling traffic shapers may cause stuttering video on constant-buffer decoders. Kraken's traffic shaper has the ability to adjust outbound traffic flow based on the needs configured in the transcoder definition. There are cases where Kraken is reducing an already reduced flow originating from an upstream encoder. For constant-buffer decoders, this may result in stuttering video since it is not receiving packets in the time frame it is expecting.

WORKAROUND: If possible, increase the decoder's buffer length. On certain decoders, this adjustment is done automatically after a few seconds. Another alternative is to disable redundant traffic shapers.

KRAK-255 TTL setting is not respected for TCP outputs. If an output uses TCP in conjunction with a non-default TTL setting, the TTL setting is ignored. UDP streams are not affected by this issue and will be transmitted with the correct TTL value.

Web UI

KRAK-880 In rare occasion, a false error message indicating failure to commit configuration may be shown when saving network settings. The settings are usually committed properly. The server can be rebooted for the new settings to take effect.

KRAK-842 Upgrading Kraken with the web UI is not supported in Internet Explorer 7 and 8.

WORKAROUND: If possible, use any of the following alternatives:

- * Internet Explorer 9
- * Google Chrome
- * Mozilla Firefox

KRAK-603 'Upgrade Complete' notification may not appear at the end of a large upgrade.

WORKAROUND: If the web UI displays the 'starting installation...' message for 45 minutes or longer, click on 'Status' to check the current installed build. If this has been updated to the latest version, reboot the system and continue normal use. Otherwise, log into the web UI and try the upgrade procedure once more.

KRAK-493 A long password consisting of 33 or more characters will cause a lockout. The web UI will no longer be accessible and the user will not be able to undo the changes.

WORKAROUND: Reset the password as following:

1. SSH to the Kraken
2. vi /opt/haivision/usr/www/shadow
3. Replace contents with haiadmin:\$1\$QXweUNgf\$v2ZCVc25ZIAICQCZD9OIm1:14697:0:99999:7:::

KRAK-327 URL textboxes have no character limit. It is possible to enter very large strings in the web UI URL fields when defining stream elements. In such cases, the summary table may become distorted.

KRAK-326 The Notes textbox does not enforce character limit. The web UI may abandon committing the change if entering lengthy notes.

WORKAROUND: Avoid very large notes when editing streams, inputs, or outputs.

