Matrox™ Release Notes

Matrox Display Wall Driver for Linux®

Software version 3.01.00

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Graphics for Professionals

Overview

This document describes the current release of the Matrox Display Wall drivers (v3.01.00) for Mura IPX Series and C-Series products for Linux® operating systems.

This driver holds for the following supported display wall configurations:

- Up to 2× C680 cards

- Up to 2× C680 + multiple Mura IPX Series 4K capture cards

- Third party graphics hardware + multiple Mura IPX Series 4K capture cards

Matrox provides these notes to describe bug fixes and improvements to the software, API, and driver.

Operating system support

This release supports the following configurations and operating systems combinations.

- Up to 2 C-Series C680 standalone and up to 2 C-Series C680 + multiple Mura IPX Series 4K capture card configurations:
  - Supports the following distributions of Ubuntu®: 14.04, 14.04.1, 14.04.2, 14.04.3, and 14.04.4
    - Supports X version 1.17.2
    - Supports kernel version 4.2.x
  - Supports CentOS™ version 7.2
    - Supports X version 1.17.2
    - Supports kernel version 3.10.0

- Third party graphics hardware + multiple Mura IPX Series 4K capture card configurations:
  - Supports Ubuntu® version 16.04
    - Supports X version 1.18.3
    - Supports Kernel version 4.4.0
  - Supports CentOS™ version 7.4
    - Supports X version 1.19.3
    - Supports kernel version 3.10.0

What's new in this release

This release of the Mura driver adds support for the following features and options:

- Support for RTP, MPEG-2 TS, and SRT streaming protocol for IP decoding.

- Supports the decoding of Extio 3 Series - 4:4:4 streams (up to and including 4K30). Extio3 version 1.00.05 or later is supported.

- Support for SDP (Session Description Protocol) with RTP streaming protocol.

- Added the /ALL parameter to the NetAPI command Source.

- Support for Low-Latency decoding.

- Support for NVIDIA® third party graphics hardware.

- General stability improvements.

- General bug fixes.

Notes and limitations

Known general limitations

The following are known issues that may be fixed in a future release:

- Third party graphics hardware is supported only if one or more Mura IPX Series cards are present in the system.

- Only the following third party graphics hardware can be used for your display wall output:

  - NVIDIA® M4000 (4× NVIDIA® M4000 + sync card)

  The list of supported third party brand and models will grow over time. If you have a specific request, contact us at DWCSupport@matrox.com.

- Xinerama is unsupported.

- Console displays are unsupported with C-Series and third party graphics hardware on Linux-based controllers.

- Alpha blending is unsupported.

- The render rate may be affected if the outputs don't all use the same refresh rate.

- Some systems may exhibit bus transfer performance issues.

- Encoding on Mura IPX Series encode cards is unsupported on Linux-based controllers.

Known limitations with Mura IPX Series cards

The following are known issues while using Mura IPX Series cards.

- If static IP addressing is used, your network must have a time server for the Mura IPX Series card to function properly.

- Interlaced video is currently unsupported on Mura IPX Series.

- Hardware dip switches are currently unsupported on the Mura IPX Series cards.

Known issues and limitations with the Network API interface

The following are known issues and limitations when using the Network API interface:

- Not all Network API commands are supported in all supported display wall hardware configurations. For a complete list of supported commands, see the Capabilities functionality in the Network API.

- Alpha blending, color keying, transitions, previews, and effects are unsupported on Linux-based video walls.

- The Network API can only report modes common to all monitors.

- The `SetSourceImageOverlay` and `AddSourceTextOverlay` commands are unsupported with inputs or source applications running on the host system.

- HTTPS communication with the Network API is unsupported.

- IP source resolution information may return 0 for width and height.

- Source image overlay may not be placed in the right position and may bleed out of a window surface.

- Source text overlay doesn't scale accordingly when a window is being resized.

- Shutting down the system while streams are up on the wall is unsupported.

- For the `StartNobackground` command, the parameter `NoWindowsFrame` is unsupported.

- For the `Source` command, the parameter `/Available` is unsupported.

- Marquee text transparency is unsupported.

Driver installation

Before you begin

- Make sure the correct operating system is installed.

- Make sure you're running as root as this will be required for the installation of the drivers.

- Make sure the necessary exceptions are added to your firewall to allow network communications. The Network API uses port 23 for telnet communications.

Setting up a controller using C-Series products (with or without Mura IPX Series 4K capture cards)

1 Install and connect your C-Series C680 and Mura IPX Series cards.

2 For installation instructions, read the correct *readme* file for your operating system included in your software package.

Contact us

The Matrox web site has product literature, press releases, technical material, a sales office list, trade show information, and other relevant material. Visit us at www.matrox.com/graphics.

If you have any questions or comments about our products or solutions, contact us at www.matrox.com/graphics/contact.

You can get technical assistance by contacting Matrox technical support at dwcsupport@matrox.com.

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