Malarpon HDMI pass thought-32

Malarpon HDMI EDID Emulator Passthrough User Manual

Model: HDMI pass thought-32

1. INTRODUCTION

The Malarpon HDMI EDID Emulator Passthrough is designed to maintain the Extended Display Identification Data (EDID) of a monitor active, even when the monitor is turned off, disconnected, or when operating a system in a headless configuration. This device helps prevent issues such as desktop rearrangement, resolution changes, and signal loss when switching between displays or accessing systems remotely. It supports resolutions up to 1920x1200 at 59Hz.

2. KEY FEATURES

- **Bi-directional EDID Emulation:** The device can detect the direction of HDMI (Sink and Source auto-detection), supporting both forward and reverse connections.
- **Headless Operation Support:** Keeps the EDID active, allowing the operating system to detect a connected display even when no physical monitor is present or turned off.
- **Stable Signal Transmission:** Features gold-plated HDMI connectors for reliable signal integrity.
- **Plug and Play:** No driver installation is required for operation.
- **Resolution Support:** Maintains resolutions up to 1920x1200@59Hz.

HDMI Interface

HDMI can be connected to an external monitor Rear-end female head can be connected to the monitor line to achieve good order in multi-screen display.

Image 2.1: Overview of the Malarpon HDMI EDID Emulator, highlighting its convenient, stable, and bi-directional design for ease of use and reliable performance.

3. COMPATIBILITY

The HDMI EDID Emulator is compatible with a wide range of devices and systems, ensuring stable display configurations across various setups.

- **Compatible Devices:** Laptops, Desktop PCs, Monitors, Mac mini, Raspberry Pi, NUC, Jetson Nano, AV receivers.
- **Applications:** HDMI KVM switches, HDMI splitters, HDMI extenders, LCD TV walls, projection systems, LED screens.
- **Operating Systems:** Works with various operating systems including Windows (e.g., Windows 8.1, Windows 10), macOS, and Linux-based systems.

Stable signal, compatible with multiple devices

Model	hdmi双向-1200P
Display name	2408WFP
Default resolution	1920x1200 60Hz
Support resolutions	1920x1080 50/60H2 1680x1050 60Hz 1600x900 60Hz 1366x768 60Hz 1280x1024 60Hz 1280x800 60Hz 1024x768 60Hz 800x600 60HZ

Image 3.1: The HDMI EDID Emulator supports a variety of devices and systems, including notebooks, headless PCs, HDMI switchers/splitters/KVMs, LCD TV walls, and projectors.

Image 3.2: The emulator offers plug-and-play functionality, stability, and wide compatibility with devices such as Mac computers, AV receivers, and monitors.

4. Setup Instructions

Follow these steps to set up your Malarpon HDMI EDID Emulator:

1. **Identify Connection Point:** Determine where the EDID emulation is needed. This is typically between your source

device (e.g., PC, laptop) and your display device (e.g., monitor, TV, KVM switch).

2. **Connect the Emulator:** Plug the HDMI EDID Emulator directly into the HDMI output port of your source device, or into the HDMI input port of your KVM switch/splitter where the monitor would normally connect.

3. **Connect HDMI Cable:** Connect an HDMI cable from the other end of the emulator to your display device (monitor, TV, etc.). If using a KVM switch, connect the emulator to the KVM's monitor output, then connect the monitor to the KVM.

4. **Power On Devices:** Ensure all connected devices (source, display, KVM if applicable) are powered on. The emulator does not require external power.

5. **Verify Display:** Confirm that your display is showing the correct resolution and that the system recognizes the display as active.

Image 4.1: The HDMI EDID Emulator connected between a laptop and an external monitor, demonstrating a common setup for maintaining display settings.

5. OPERATING INSTRUCTIONS

The Malarpon HDMI EDID Emulator operates automatically once connected. Its primary function is to ensure consistent EDID information is provided to your source device.

- **Preventing Desktop Rearrangement:** When a monitor is turned off or disconnected, operating systems often rearrange open windows. By keeping the EDID active, the emulator prevents this, maintaining your desktop layout.

- **Headless Server Operation:** For servers or PCs running without a connected monitor, the emulator ensures the system boots and operates at a specified resolution (e.g., 1920x1200), allowing for remote access without display issues.

- **KVM Switch and Extender Stability:** When using KVM switches or HDMI extenders, the emulator helps accelerate display negotiation and prevents signal drops or resolution changes when switching inputs or extending signals over long distances.

- **Dummy Plug Functionality:** The emulator can act as a dummy plug. Connect it to a monitor once to capture its EDID, then remove the monitor. The emulator will continue to report the captured EDID to the source device.

Image 5.1: The emulator in typical home and office scenarios, ensuring stable display configurations for laptops connected to single or multiple external monitors.

6. TROUBLESHOOTING

- **No Display/Black Screen:**
  Ensure the emulator is securely connected. Try connecting the source directly to the monitor to confirm the source and monitor are functional. If using a KVM or splitter, test without it first.

- **Desktop Rearrangement Still Occurs:**
  Verify that the emulator is correctly inserted between the source and the point where the display signal is interrupted (e.g., KVM, or directly at the source if the monitor is frequently turned off). Ensure your system's display settings are configured to the desired resolution.

- **Incorrect Resolution or Distorted Image:**
  The emulator is designed for 1920x1200@59Hz. If your monitor's native resolution is different, or if you require a specific refresh rate, ensure the emulator matches these specifications. Some systems may require a reboot after connecting the emulator to properly detect the EDID.

- **Audio Issues (e.g., Capped at 48Khz):**
  While the emulator passes through video and audio, some users have reported audio bandwidth limitations (e.g., capping at 48Khz). This device prioritizes stable video EDID emulation. If high-fidelity audio is critical, consider

alternative audio routing.

- **Intermittent Signal Drops:**
  Check all HDMI cable connections for looseness or damage. Test with different HDMI cables. Ensure the emulator is not subjected to excessive heat or physical stress.

7. SPECIFICATIONS

Model Number	HDMI pass thought-32
Product Dimensions	1.6 x 0.5 x 0.8 inches
Item Weight	1.41 ounces
Connector Type	HDMI
Supported Resolution	Up to 1920x1200@59Hz
Manufacturer	Malarpon

8. WARRANTY AND SUPPORT

Malarpon products are designed for reliability and performance. For any questions, technical assistance, or support regarding your HDMI EDID Emulator, please refer to the seller's contact information or the platform where the product was purchased. Please retain your proof of purchase for any warranty claims.