

Introduction

The DVS400 extends the distance between any computer supporting single-link DVI-D and a monitor or projector with a compatible DVI input.

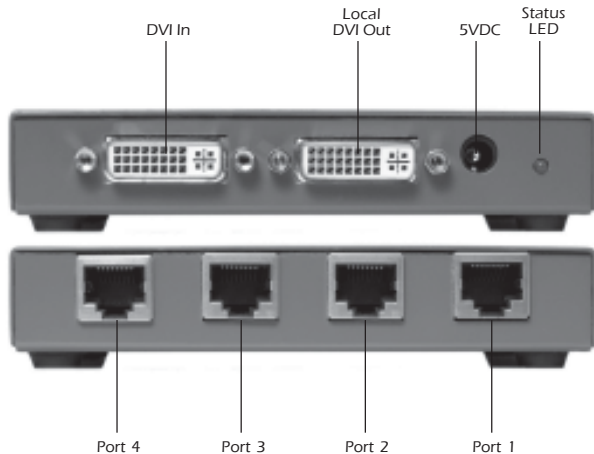
Features

- Supports Mac and PC DVI-D
- Resolutions up to 1920 x 1080
- No degradation of video quality
- LEDs indicate power and loss of clock signal
- External power supplies
- Silent fanless operation
- Perfect Image Quality at all Resolutions.
- Automatic EDID learning for the support of any DVI monitor.

Applications

- Call Centers (co-locate user's computers).
- Industrial (protection against pollution).
- Information Terminals & Kiosks.
- Airports (air traffic control, passenger information systems).

Front and Rear View



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Smart Audio Video Integration

Quick Start Guide

DVS-400



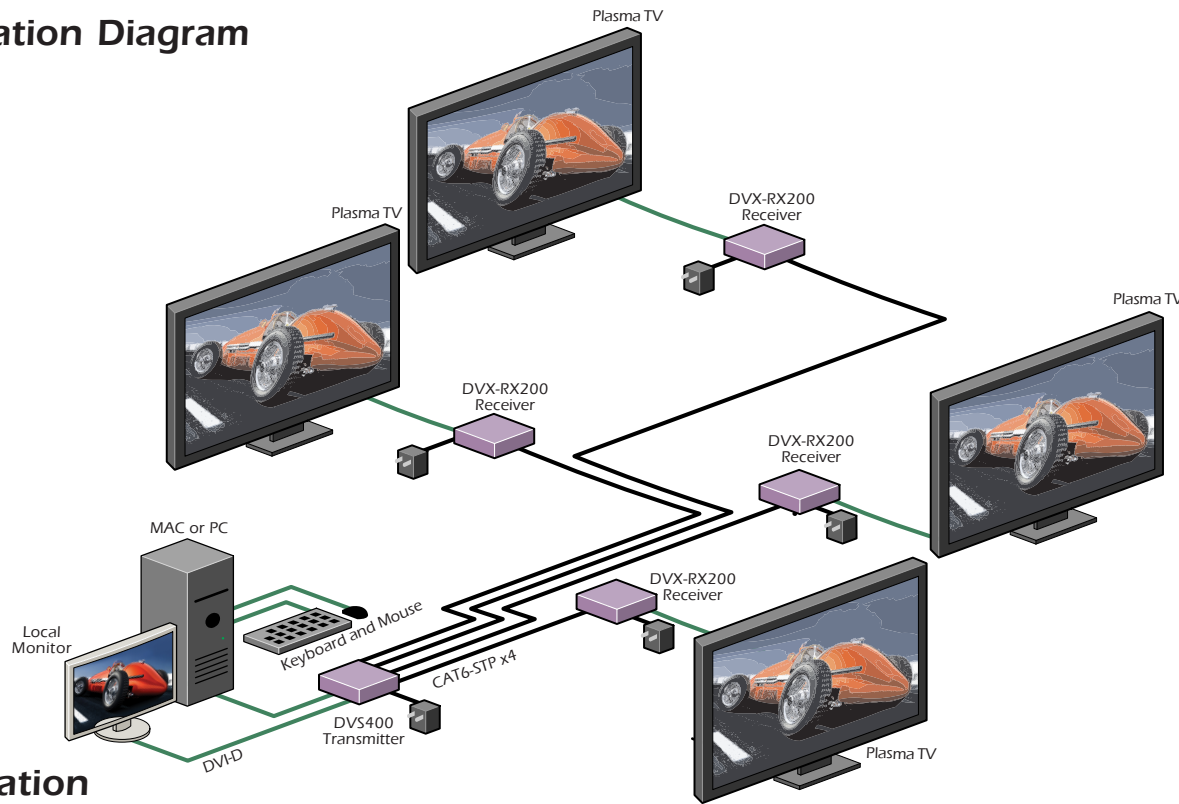
The DVS-400 extends and splits any single-link DVI-D signal 4 ways up to 220 feet using CAT 6 STP shielded cables. (Includes automatic DDC Learning)

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Installation Diagram



Installation

1. Turn off computer and monitor.
2. Connect DVI male to male cable between the computer and the transmitter.
3. Connect monitor or projector to the local loopback DVI port on the transmitter.
4. Turn on the monitor.
5. Plug in one of the power transformers and connect it to the transmitter.
6. Remove the monitor from the local loopback DVI port on the transmitter and connect it to the DVI port on the receiver.
7. Connect a shielded CAT6 cable between port 1 on the transmitter and port 1 on the receiver.
8. Plug in the other power transformer and connect it to the receiver.
9. Turn on the computer.

EDID Learning Explained

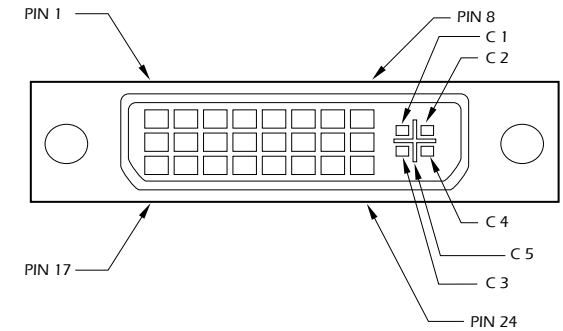
The Display Data Channel (DDC) is a digital connection between a computer display and a graphics adapter that allows the display to communicate its specifications to the adapter.

The Extended Display Identification Data (EDID) is a data structure provided by a computer display over the DDC to describe its capabilities to a graphics card.

The DVS400 does not continue the DDC across the CAT6 STP links and contains its own EDID at the video source input. Therefore, the EDID on the DVS400 is used in place of the actual monitor's EDID. In order for the computer to output at the correct resolutions and refresh rates for a specific monitor, the DVS400 must be loaded with the monitor's EDID.

On power-up the DVS400 reads and stores the EDID of the DVI monitor connected to the local loopback port. If the local loopback port is disconnected during power-up, the stored EDID will not be modified.

Technical Specifications Input/Output Signal



| Pin # | Signal | Pin # | Signal |
|-------|-------------------------|-------|-------------------------|
| 1 | T.M.D.S Data 2- | 16 | Hot Plug Detect |
| 2 | T.M.D.S Data 2+ | 17 | T.M.D.S Data 0- |
| 3 | T.M.D.S Data 2/4 Shield | 18 | T.M.D.S Data 0+ |
| 4 | T.M.D.S Data 4- | 19 | T.M.D.S Data 0/5 Shield |
| 5 | T.M.D.S Data 4+ | 20 | T.M.D.S Data 5- |
| 6 | DDC Clock | 21 | T.M.D.S Data 5+ |
| 7 | DDC Data | 22 | T.M.D.S Clock Shield |
| 8 | Analog Vert. Sync | 23 | T.M.D.S Clock+ |
| 9 | T.M.D.S Data 1- | 24 | T.M.D.S Clock - |
| 10 | T.M.D.S Data 1+ | | |
| 11 | T.M.D.S Data 1/3 Shield | C1 | Analog Red |
| 12 | T.M.D.S Data 3- | C2 | Analog Green |
| 13 | T.M.D.S Data 3+ | C3 | Analog Blue |
| 14 | 5VDC 1.6A | C4 | Analog Horz Sync |
| 15 | GND | C5 | Analog Ground |

Resolutions

Supported by the internal EDID configuration

| Resolution | Refresh Rate |
|-------------|--------------|
| 640 x 480 | 85 Hz |
| 800 x 600 | 85 Hz |
| 1024 x 768 | 85 Hz |
| 1152 x 870 | 75 Hz |
| 1280 x 768 | 75 Hz |
| 1280 x 960 | 60 Hz |
| 1280 x 1024 | 60 Hz |
| 1600 x 1200 | 60 Hz |
| 1920 x 1080 | 60 Hz |