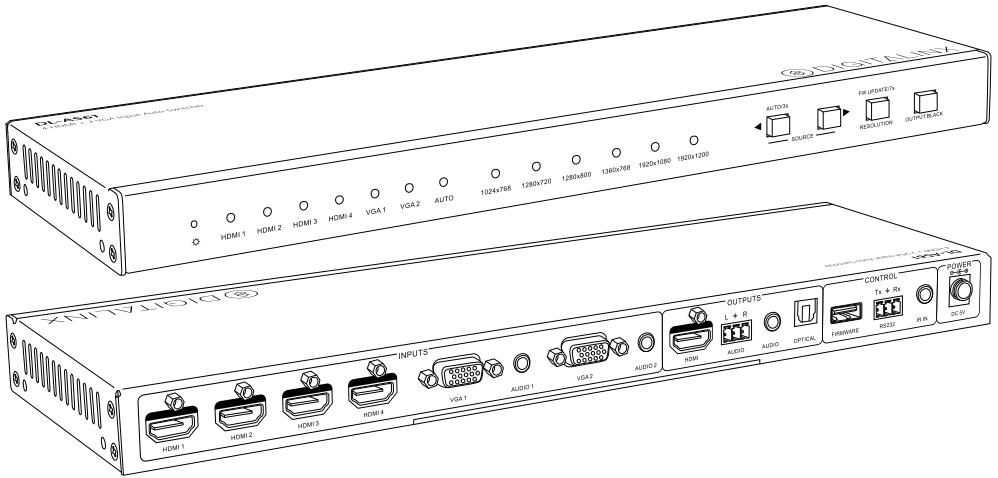


DIGITALINX

DL-AS61 Installation Guide

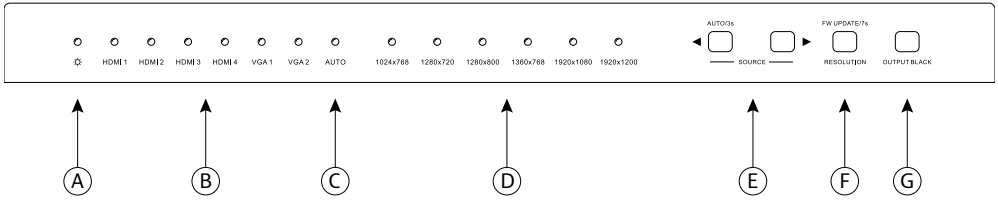


The Digitalinx DL-AS61 is a compact multi-format switcher with support for video resolutions up to UHD (3840x2160). With multiple built-in EDID settings, including an EDID pass-through option, the highest quality digital video signal will be routed directly to the display. When a VGA video signal is connected, the video signal will be scaled up to 1920x1200.

The DL-AS61 supports stereo and multichannel audio on the HDMI inputs. The analog audio paired with the VGA inputs is embedded into the digital video stream. In addition to the audio embedded in the HDMI output stream, which may be muted, the audio is simultaneously de-embedded to a digital optical audio output and two analog audio outputs: 3.5mm TRS and 3-pin removable terminal block.

The DL-AS61 features multiple methods of control. When set to Auto, the switcher will automatically switch to the newest source device added to the DL-AS61; when the active source is removed, the DL-AS61 will switch to the lowest numbered input. The DL-AS61 may be manually controlled by switching via the front panel, IR or RS232.

Front Panel



A. Power LED

- Off when there is no power to the device
- Green when the device is powered on
- Red when the device is in standby mode

B. Input LEDs

- Green for the selected video source

C. Auto-Switching LED

- Green when in auto-switching mode

D. VGA Output Resolution LEDs

- Green for the selected VGA output resolution

E. Source Selectors

- Manually select previous or next input
- To enter auto-switching mode, press and hold the previous input button for three seconds

F. VGA Output Resolution Selector

- Cycle through VGA output resolutions
- Press and hold for seven seconds to enter software update mode

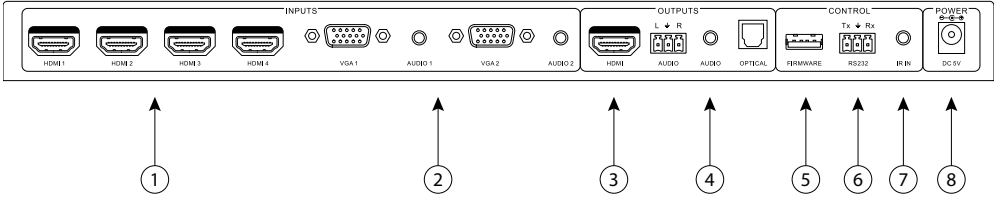
G. Output Black

- Press to turn on and off HDMI output. All LEDs except for power will turn off when output black is enabled.

Included Accessories

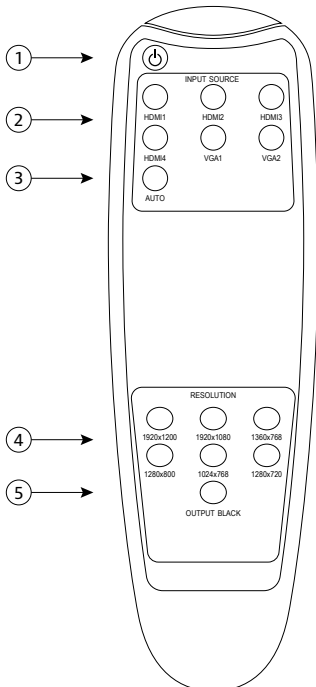
- Installation guide
- Power supply with AC adapters (AU, EU, UK, and US)
- RS232 cable
- IR receiver
- IR remote with batteries
- Rubber feet
- Mounting "L" brackets (2 ea)
- Mounting screws (4 ea)

Rear Panel



1. HDMI Inputs
2. VGA with Analog Audio Inputs
3. HDMI Output with Embedded Audio
4. Audio Outputs
 - Audio outputs are not affected when in output black mode
5. Firmware Update Port
6. RS232 Control Port
7. IR In Port
8. 5V DC Power Input

IR Remote



1. Standby Button
 - Enter/exit standby mode
2. Input Select Buttons
 - Direct selection of input source
3. Auto-Switching Mode Button
 - Enter/exit auto-switching mode
4. VGA Output Resolution Select Buttons
 - Direct selection of VGA output scaler resolutions.
5. Output Black Button
 - Turns on and off HDMI output

Installation Instructions

1. Verify all components included with the product are present before installation.
2. Turn off power and disconnect the audio/video equipment by following the manufacturer's instructions.
3. Connect an HDMI cable between the digital source and an available input on the DL-AS61.
4. Connect a VGA cable between the analog source and an available input on the DL-AS61.
5. Connect an audio cable with 3.5 mm end between the analog source and the corresponding VGA input. Audio will not pass without a video signal present.
6. Connect an HDMI cable between the display and the HDMI output of the DL-AS61.
7. Connect the appropriate audio output cable to any of the available audio output ports of the DL-AS61.
8. Connect the included RS232 cable between a control device and the RS232 port of the DL-AS61.
9. Connect the included IR receiver to the IR In port of the device.
10. Connect the included power supply to the DL-AS61 and lock the power supply to the power connector by twisting the locking collar clockwise.
11. Power on all audio/video devices.

Front Panel Control

Manual Switching:

When the DL-AS61 is in manual switching mode, the Auto Mode LED will be dark. To change inputs, press either the previous or next button.

Automatic Switching:

To enable automatic switching, press the Previous/Auto button for three seconds. The Auto Mode LED will light.

When in auto-switch mode, the DL-AS61 will switch according to the following rules:

New Input: Upon detecting a new input, the switcher will automatically select the new input.

Reboot: Once power is restored to the switcher, it will automatically reconnect the input before powered off.

Source Removed: When an active source is removed, the DL-AS61 will switch to the first available active input starting at HDMI Input 1.

RS232 Control

RS232 Settings: 9600 baud, 8 Data bits, 1 Stop bit, Parity = None

A carriage return and line feed will follow all responses.

Input Switching

Description	Command	Response
Switch to HDMI 1 Input	50701%	Switch to HDMI 1
Switch to HDMI 2 Input	50702%	Switch to HDMI 2
Switch to HDMI 3 Input	50703%	Switch to HDMI 3
Switch to HDMI 4 Input	50704%	Switch to HDMI 4
Switch to VGA 1 input	50705%	Switch to VGA 1
Switch to VGA 2 input	50706%	Switch to VGA 2
Enable auto-switching	50785%	Auto Switching
Disable auto-switching	50786%	Manual Switching

HDMI EDID Settings

Description	Command	Response
EDID Pass-through (Bypass mode)	50772%	EDID:bypass mode
1080P PCM 2ch	50773%	EDID:1080P&PCM 2ch
1080P 5.1ch	50774%	EDID:1080P&5.1ch
1080P 3D 5.1ch	50775%	EDID:1080P3d&5.1ch
1080i PCM 2ch	50776%	EDID:1080i&PCM 2ch
4K PCM 2ch	50777%	EDID:4K&PCM 2ch
Change horizontal polarity; 1 means positive polarity, 0 means negative polarity	50707%	Hpolarity:0 Hpolarity:1
Change vertical polarity; 1 means positive polarity, 0 means negative polarity	50708%	Vpolarity:0 Vpolarity:1

VGA EDID

The EDID for the VGA inputs is permanently set to 1360x768. Other resolutions will transmit properly through the DL-AS61. The built-in scaler will ensure consistent image is present between analog and digital sources.

VGA Output Scaling

Description	Command	Response
Scale Output to 1024x768	50626%	Resolution: 1024x768
Scale Output to 1280x720	50627%	Resolution: 1280x720
Scale Output to 1280x800	50628%	Resolution: 1280x800
Scale Output to 1360x768	50619%	Resolution: 1360x768
Scale Output to 1920x1080	50629%	Resolution: 1920x1080
Scale Output to 1920x1200	50620%	Resolution: 1920x1200

VGA Adjustments

Description	Command	Response
Set the VGA input brightness to xx (xx ranges from 0 to 99)	502xx%	Brightness: xx
Set the VGA input contrast to xx (xx ranges from 0 to 99)	503xx%	Contrast: xx
Set the VGA input saturation to xx (xx ranges from 0 to 99)	504xx%	Saturation: xx
Set the VGA input sharpness to xx (xx ranges from 0 to 99)	505xx%	Sharpness: xx
Cycle the color temperature for VGA input (xx = Cool, Medium, Warm, User)	50607%	Color Temperature: xx
Cycle the aspect ratio for VGA input (xx = 16:9, 4:3, auto)	50608%	Aspect Ratio: xx
Cycle the picture mode for VGA input (xx = dynamic, standard, mild, user)	50614%	Picture Mode: xx
Cycle sound mode for VGA input (xx = standard, music, movie, sports, user)	50615%	Sound Mode: xx
Auto-adjust the input parameter for VGA only	50606%	VGA Input Auto
Enable image resizing	50678%	Enter Output Position Adjust
Disable image resizing	50679%	Exit Output Position Adjust
Move the image to left	50670%	Output Position Adjust X xx
Move the image to right	50671%	Output Position Adjust X xx
Move the image up	50672%	Output Position Adjust Y xx
Move the image down	50673%	Output Position Adjust Y xx
Increase image width	50674%	Output Width Adjust xx
Decrease image width	50675%	Output Width Adjust xx
Increase image height	50676%	Output Height Adjust xx
Decrease image height	50677%	Output height adjust xx

HDMI Output

Description	Command	Response
Enable HDMI embedded audio output	50648%	Embedded Audio Output: enable
Disable HDMI embedded audio output	50649%	Embedded Audio Output: disable
Switch off audio & video output	50653%	Output black:enable
Switch on audio & video output	50654%	Output black: disable Switch to VGA2

Miscellaneous

Description	Command	Response
Exit standby mode	50697%	Wake up!
Enter standby mode	50797%	Go to standby!
Lock the front panel buttons	50604%	Front Panel lock
Unlock the front panel buttons	50605%	Front Panel Unlock
Software update	50698%	
Reset to factory defaults	50617%	Factory Reset

System Query Messages

Description	Command	Response
Get the input source	50631%	Input: xx
Get the output resolution	50632%	Resolution: xx
Get the image mode	50633%	Picture Mode: xx
Get the audio mode	50634%	Sound Mode: xx
Get the image aspect ratio	50635%	Aspect Ratio: xx
Get the brightness	50636%	Brightness: xx
Get the contrast	50637%	Contrast: xx
Get the saturation	50638%	Saturation: xx
Get sharpness	50639%	Sharpness: xx
Get the color temperature	50640%	Color Temperature: xx
Get Digital audio output status	50652%	Embedded Audio Output: enable/disable
Get video & audio output status	50655%	50655% Black screen Enable/Disable
Get the present resolution and polarity	50709%	1920x1080 Hpolarity:1 Vpolarity:0
Get the panel locked status	50754%	Front Panel Lock/UnLock
Get the EDID state	50778%	EDID:xx
Get the system version	50699%	Version Vx.x.x

FCC Statement

This equipment generates, uses and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. It has been tested and found to comply with the limits for a Class B digital device, pursuant to part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a commercial installation.

Operation of this equipment in a residential area is likely to cause interference, in which case the user at their own expense will be required to take whatever measures may be necessary to correct the interference.

Any changes or modifications not expressly approved by the manufacture would void the user's authority to operate the equipment.

Important notice:

- Do not attempt to disassemble or alter the housing. There are no user-serviceable parts inside the unit. Doing so will void your warranty.
- To minimize the possibility of equipment damage from electrostatic discharge (ESD), all source and destination equipment must be powered off during installation.
- Do not connect the device to a telecommunication outlet wired to unrelated equipment. Doing so may damage the unit or any connected equipment. Ensure all connected twisted pair cabling is straight-through (point-to-point).
- Allow proper ventilation to reduce the risk of thermal failure.

Technical Specifications

Supported Audio, Video and Control	
Maximum Video Compatibility	Deep Color 48/36/30/24 Bit at 1080p, 3D, and 4k x 2k (UHD)
VGA Scaling Resolutions	1024x768@60Hz, 1280x720@60Hz, 1280x800@60Hz, 1360x768@60Hz, 1920x1080@60Hz, 1920x1200@60Hz
Video Compliance	HDMI, HDCP
HDMI EDID	Pass-through from Display, 1080p/PCM 2ch, 1080p/PCM 6ch, 1080p3D/PCM 6ch, 1080i/PCM 2 ch, 4k@30/PCM 2ch
VGA EDID	1360x768
Embedded Audio Input/Output	Up to PCM 6 channel
Digital (Optical) Audio Output	PCM: 6 channel (5.1) at 16, 20, or 24 bit
Embedded Audio	Up to PCM 8 channel, Dolby Digital TrueHD, and DTS-HD Master Audio
Analog Audio Frequency Response	20Hz-20KHz
Analog Audio Input Impedance	>10k ohm
Analog Audio Output Impedance	50 ohm
Maximum Passive HDMI Distance	5 m (16 ft)
IR Carrier Frequency Range	33-55kHz at 5 volts
RS232 Baud Rate	9600 baud
Chassis and Environmental	
Dimensions (H x W x D)	28 mm x 350 mm x 110 mm (1.10 in x 13.78 in x 4.33 in)
Operating Temperature (Environment)	0° to +40° C (+32° to +104° F)
Operating Humidity (Environment)	20% to 90%, Non-condensing
Power	
Maximum Power Consumption	3.8 watts
Power Supply Input Voltage	100-240v AC at 50/60 Hz at 0.45 A
Power Supply Output Voltage	5V DC at 3 A
Device Regulatory	CE, FCC, RoHS
Power Supply Regulatory	CE, RoHS, UL, SGS, FCC
Other	
Standard Warranty	2 Years
Included Items	Installation guide, power supply, AC adapters (AU, EU, UK, and US), RS232 cable, IR receiver, IR remote with batteries, rubber feet, mounting "L" brackets (2 ea), mounting screws (4 ea)

Distances and picture quality may be affected by cable grade, cable quality, source and destination equipment, RF and electrical interference, and cable patches.



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