

4K/HDR HDMI to HDBaseT™ 1x2 Distribution Amplifier AT-HDR-CAT-2



The Atлона **AT-HDR-CAT-2** is a high dynamic range (HDR) distribution amplifier with one HDMI® input and two HDBaseT™ outputs. Each output transmits 4K/UHD video @ 60 Hz with 4:4:4 chroma sampling plus support for HDR formats, multi-channel audio, control signals, and power up to 130 feet (40 meters) or 1080p up to 230 feet (70 meters) over Category 6/6A cable. The HDR-CAT-2 features sophisticated integration capabilities designed for commercial AV distribution applications including HDMI pass-through, audio de-embedding, EDID management, CEC display control, RS-232 and IR control extension, remote power for receivers, and HDBaseT link testing. It offers compatibility with any TCP/IP or RS-232 control system and is housed in a low-profile enclosure with external universal power supply. The HDR-CAT-2 is ideal for sending HDR and 4K/60 4:4:4 content to AT-HDR-EX-70C-RX receivers.

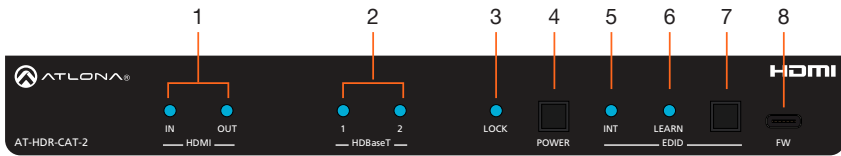
Package Contents

- 1 x AT-HDR-CAT-2
- 4 x 5-pin captive screw connectors
- 1 x 2-pin captive screw connector
- 1 x 48 V / 1.25 A power supply
- 1 x AC cord
- 1 x Pair rack mount ears
- 4 x Feet w/ rubber grips



IMPORTANT: Visit <https://www.atlona.com/product/at-hdr-cat-2> for the latest firmware updates and User Manual.

Front Panel Descriptions



1 HDMI Indicators

Displays the status of the **HDMI IN** and **HDMI OUT** ports. When connected to a source or display (sink) device, respectively, the LED indicator will be blue.

2 HDBaseT Indicators

Displays the status of the HDBaseT OUT ports. When connected to an HDBaseT receiver, with an active sink, the LED indicator will be blue. If no active sink is connected, or the sink is powered off, then the indicator will not be illuminated.

3 Lock

This LED will be blue when the unit is locked.

4 POWER

Press this button to power-on or place the unit into standby mode.

5 INT

This LED indicator will be blue when the unit is using an internal EDID.

6 LEARN

This LED indicator will flash when a downstream EDID is being read into memory.

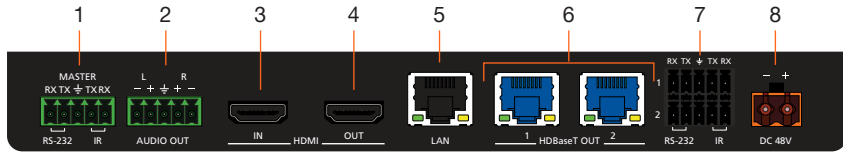
7 EDID

Press this button to switch between the internal (INT) and learned (LEARN) EDID modes.

8 FW

Connect a USB Type-A to USB-C cable from this port, to a computer, to update the firmware. Refer to the AT-HDR-CAT-2 User Manual for more information.

Rear Panel Descriptions



1 RS-232 / IR (MASTER)

Connect a control system or other DTE device to this port to control the AT-HDR-CAT-2.

2 AUDIO OUT

Connect the included 5-pin captive screw connector to this port and connect it to an audio amplifier, such as an AT-GAIN-60. Refer to the AT-HDR-CAT-2 User Manual for more information.

3 HDMI IN

Connect an HDMI cable from this port to a source device.

4 HDMI OUT

Connect an HDMI cable from this port to an HDMI input on a local display or an additional AT-HDR-CAT-2 unit.

5 LAN

Connect an Ethernet cable from this port to the network.

6 HDBaseT OUT

Connect Ethernet cables from these ports to PoE-compatible receivers.

7 RS-232/IR 1 / 2

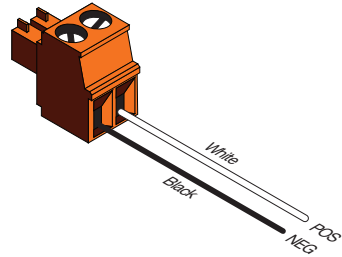
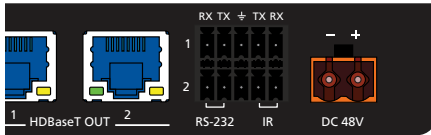
Connect a control system or other DTE device to these ports for pass-through zone control. Each of these ports uses the associated HDBaseT OUT port. This allows RS-232 command data to be sent to a display (sink) device connected to a PoE-compatible receiver.

8 DC 48V

Connect the included power supply to this power receptacle.

Power

1. Locate the included orange captive-screw block, and loosen the screws to allow room to insert the copper wiring.
2. Wire the included power supply to the block, as shown below. Do not use high-torque devices, when securing the wires to the captive-screw terminal block, as this may damage the screws and/or block.



Installation

1. Connect an HDMI cable from a source to the **HDMI IN** port.
2. Connect an HDMI cable from the **HDMI OUT** port to a local display.
3. Connect up to two Ethernet cables from the **HDBaseT OUT** ports to compatible PoE-capable receivers. Refer to the table below for information on maximum cable length and supported resolutions.



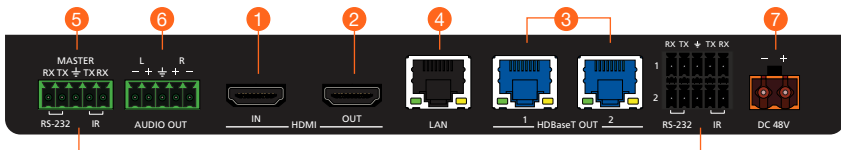
IMPORTANT: Stranded or patch cable is not recommended due to performance issues. Shielded cables are strongly recommended to minimize signal noise and interference.

Cable	4K/UHD - Feet / Meters		1080p - Feet / Meters	
HDMI	15	5	30	10
CAT5e/6	115	35	200	60
CAT6a/7	130	40	230	70

4. Connect an Ethernet cable from the **LAN** port to the Local Area Network (LAN). This step will be required in order to access the built-in web server.
5. Connect the included power supply to the **DC 48V** connector and connect the power cord to an available electrical outlet.

Optional

6. Connect an RS-232 or IR cable from the control system to the RS-232/IR ports. Refer to the AT-HDR-CAT-2 User Manual for more information.
 - **MASTER RS-232/IR**
Connecting to this port will provide direct control of the AT-HDR-CAT-2. Control can be performed using either RS-232 or electrical IR.
 - **RS-232/IR 1 and RS-232/IR 2**
Each of these ports is associated to the respective **HDBaseT OUT** port. This allows RS-232 pass-through zone control of a display (sink) device that is connected to a PoE-compatible receiver. Control can be performed using RS-232 or electrical IR.
7. Connect an audio output device to the **AUDIO OUT** port. Refer to the AT-HDR-CAT-2 User Manual for more information.



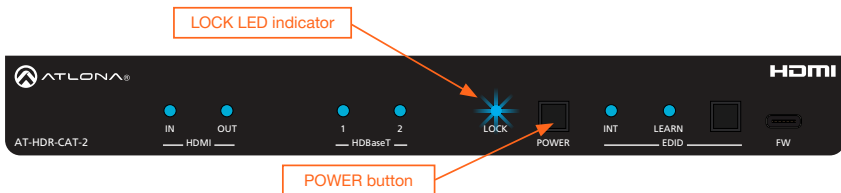
IP Configuration

The AT-HDR-CAT-2 is shipped with DHCP enabled. Once connected to a network, the DHCP server (if available), will automatically assign an IP address to the unit. If the AT-HDR-CAT-2 is unable to detect a DHCP server within 15 seconds, then the unit will use a self-assigned IP address within the range of 169.254.xxx.xxx/16. If this occurs, refer to the AT-HDR-CAT-2 User Manual for more information.

Use an IP scanner, along with the MAC address on the bottom of the unit, to identify the unit on the network. If a static IP address is desired, the unit can be switched to static IP mode.

Switching the IP mode using the Front Panel

1. Make sure the AT-HDR-CAT-2 is powered.
2. Connect an Ethernet cable between the LAN port of the AT-HDR-CAT-2 and the Local Area Network (LAN).
3. Press and hold the POWER button for approximately 15 seconds. Release the POWER button once all the front-panel LED indicators begin to flash. The number of flashes will indicate the currently selected IP mode. Refer to the table, below.



POWER button flashes	Description	
Two	Static IP mode	IP address: 192.168.1.254 Netmask: 255.255.0.0 Gateway: 192.168.1.1
Four	DHCP mode	

Switching the IP mode can also be performed using commands or the built-in web server. Refer the AT-HDR-CAT-2 User Manual for more information.

Accessing the built-in Web Server

The AT-HDR-CAT-2 includes a built-in web server, which allows easy management and control of all features. Follow the instructions below to access the web server.

1. Make sure that an Ethernet cable is connected between the **LAN** port on the AT-HDR-CAT-2 and the network.
2. Launch a web browser and enter the IP address of the unit.
3. The AT-HDR-CAT-2 **Register** page will be displayed.
4. Create a username and password.
5. Click the **Register** button.
6. The **Login** page will be displayed.
7. Enter the username and password that was created during the registration process.
8. Click the **Login** button.
9. Refer to User Manual for more information on using the built-in web server.

Warranty

To view the product warranty, use the following link or QR code:

<https://atlona.com/warranty/>.



English Declaration of Conformity

The English version can be found under the resources tab at:

<https://atlona.com/product/at-hdr-cat-2/>.



Chinese Declaration of Conformity 中国RoHS合格声明

由SKU列出於:

<https://atlona.com/about-us/china-rohs/>.



The terms HDMI, HDMI High-Definition Multimedia Interface, and the HDMI Logo are trademarks or registered trademarks of HDMI licensing Administrator, Inc.