VE814AR

HDMI HDBaseT Receiver with Dual Output (4K@100m) (HDBaseT Class A)

ATEN VE814AR is an HDBaseT Video Receiver that is capable of receiving HDMI signals up to 100 m over a single Cat 5e/6/6a or ATEN 2L-2910 Cat 6 cable.This HDCP 2.2-compliant receiver meets the HDMI Specification, including 3D, Deep Color, the maximum data rate of (10.2 Gbps), and 4K video quality up to 100 m.

The VE814AR supports RS-232 and IR signaling pass-through, allowing you to control the HDMI source device from the remote unit (VE814AR) while granting access to the HDMI display device from the local unit (VE814AT). In addition, it supports Long Reach Mode that extends HDMI signals up to 150 m, 1080p, via a single Cat 5e/6 cable.

The VE814AR is a powerful solution for where digital signage is required, such as bars, educational spaces, and public transportation stations, allowing display of identical contents at different spots.

Features

- Extends HDMI signals to one local and two remote displays up to 100 m over a single Cat 5e/6/6a or ATEN 2L-2910 Cat 6 cable
- HDMI (3D, Deep Color, 4K); HDCP 2.2 compatible
- Superior video quality:
  • 4K up to 100 m
  • 1080p up to 150 m when in HDBaseT Long Reach Mode
- Extends Ethernet communication using the Ethernet pass-through port*
- Supports two IR channels for simultaneous IR signal transmissions, ranged from 30 KHz to 56 KHz
- ATEN EDID Technology -- when both transmitter and receiver sides are connected, VE814A adopts the EDID values of the display connected to the VE814AT for high-quality output
- RS-232 channel – allows you to connect to serial terminals or serial devices, such as touch screens and barcode scanners
- Supports wide screen format
- Built-in 8 kV/15 kV ESD protection
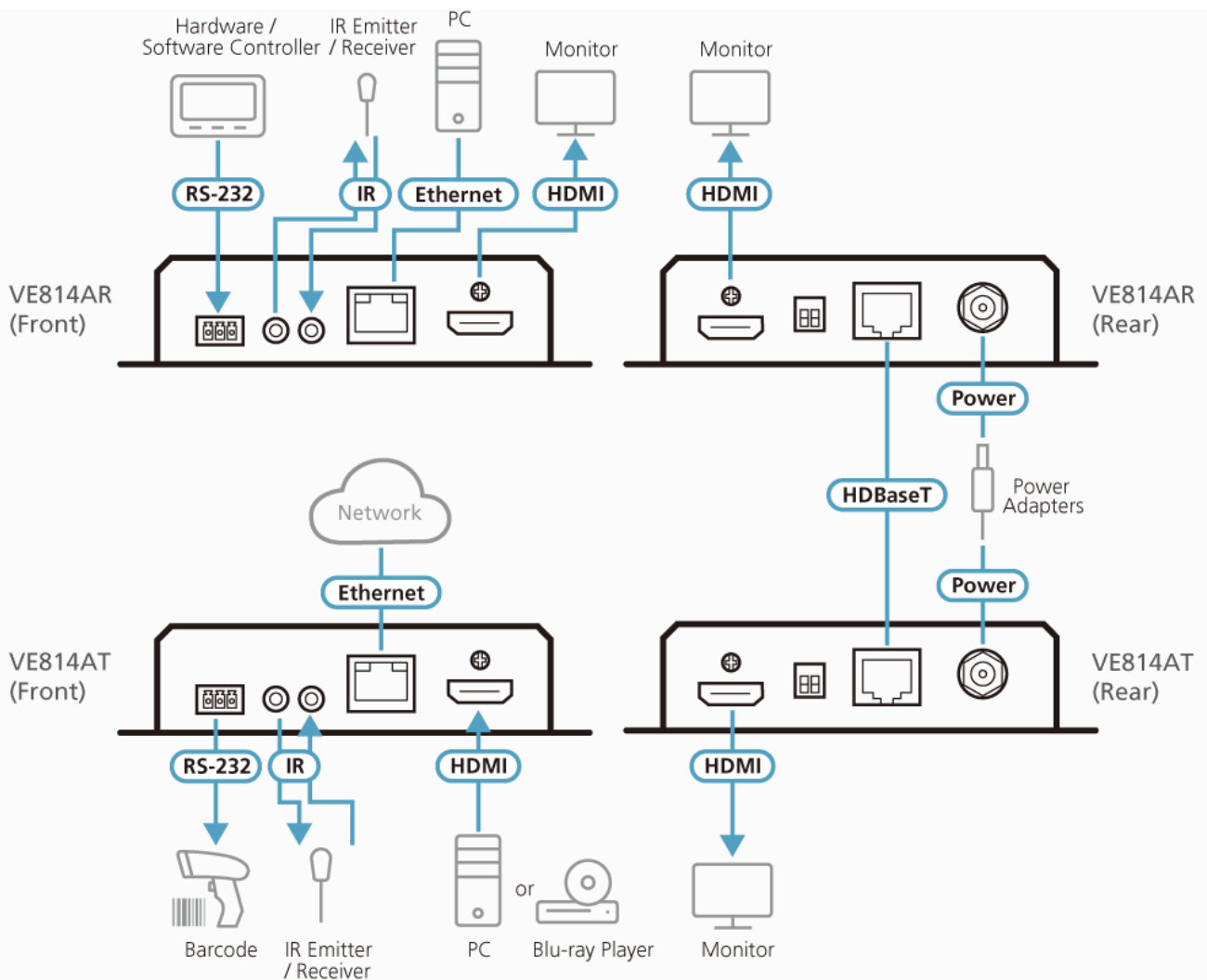- Plug-and-play
- Rack-mountable

  Note: The function is supported by VE814A-AT only.

Specification

Video Output	
Interfaces	2 x HDMI Type A Female (Black)
Impedance	100 Ω
Max. Distance	3 m
Video	
Max. Data Rate	10.2Gbps (3.4Gbps per lane)
Max. Pixel Clock	340 MHz

Compliance	HDMI (3D, Deep Color, 4K) HDCP2.2 Compatible Consumer Electronics Control (CEC)
Max. Resolutions / Distance	Up to 4K@70m (Cat 5e/6) / 100m (Cat 6a/ATEN 2L-2910 Cat6); 1080p@100m (Cat 5e/6/6a) *4K supported: 4096 x 2160 / 3840 x 2160 @ 60Hz (4:2:0); 4096 x 2160 / 3840 x 2160 @ 30Hz (4:4:4)
Audio	
Output	2 x HDMI Type A Female (Black)
Connectors	
Unit To Unit	1 x RJ-45 Female
Power	1 x DC Jack (Black) with locking
Control	
RS-232	Connector: 1 x Terminal Block, 3 pole Baud Rate: 57600, Data Bits:8, Stop Bits:1, no parity and flow control
IR	2 x Mini Stereo Jack Female (Black)
Ethernet	1 x RJ-45 Female Note: The RJ-45 ports is functional for device supporting the Ethernet port only
Switches	
Long Reach Mode Switch	1 x Slide Switch - ON/OFF
Firmware Upgrade	1 x Slide Switch - ON/OFF
Power Consumption	DC5V:7.87W:37BTU/h Note: ● The measurement in Watts indicates the typical power consumption of the device with no external loading. ● The measurement in BTU/h indicates the power consumption of the device when it is fully loaded.
Environmental	
Operating Temperature	0 - 40°C
Storage Temperature	-20 - 60°C
Humidity	0 - 80% RH, Non-Condensing
Physical Properties	
Housing	Metal
Weight	0.47 kg (1.04 lb)
Dimensions (L x W x H) with bracket	14.02 x 12.30 x 3.00 cm (5.52 x 4.84 x 1.18 in.)
Dimensions (L x W x H) without bracket	13.60 x 10.10 x 2.90 cm (5.35 x 3.98 x 1.14 in.)
Note	The VE814AR-AT supports Ethernet function and the VE814AR-ATA does not.

Diagram

Hardware / Software Controller · IR Emitter / Receiver · PC · Monitor · Monitor

RS-232 · IR · Ethernet · HDMI · HDMI

VE814AR (Front) · VE814AR (Rear)

Power · Power Adapters · HDBaseT · Power

Network · Ethernet

VE814AT (Front) · VE814AT (Rear)

RS-232 · IR · HDMI · HDMI

Barcode · IR Emitter / Receiver · PC or Blu-ray Player · Monitor

*The Ethernet port is functional for device supporting the Ethernet port only