HDMI Distribution Amplifier CAT5e Extender

ITEM NO.:   HE04SEK 1 x 4 Economic Distribution Amplifier CAT5e Extender Kit

HE04SEK extends and distributes HDMI signal to 4 remotes HDMI displays over CAT5e cable.

There is no power required for the receiver (HE01SER).

The transmission distance is up to 40M at 1080p, 70M at 720p.

It is expandable by stacking to another HE04SET or working with chainable receiver HE01SLR to get 1 in multiple out application. (1 in 5 out, 1 in 6 out, 1 in 8 out...etc.)

It's suitable for any place where one in multiple out application is needed, such as bar, business, church, conference room, school, CCTV, surveillance...etc.
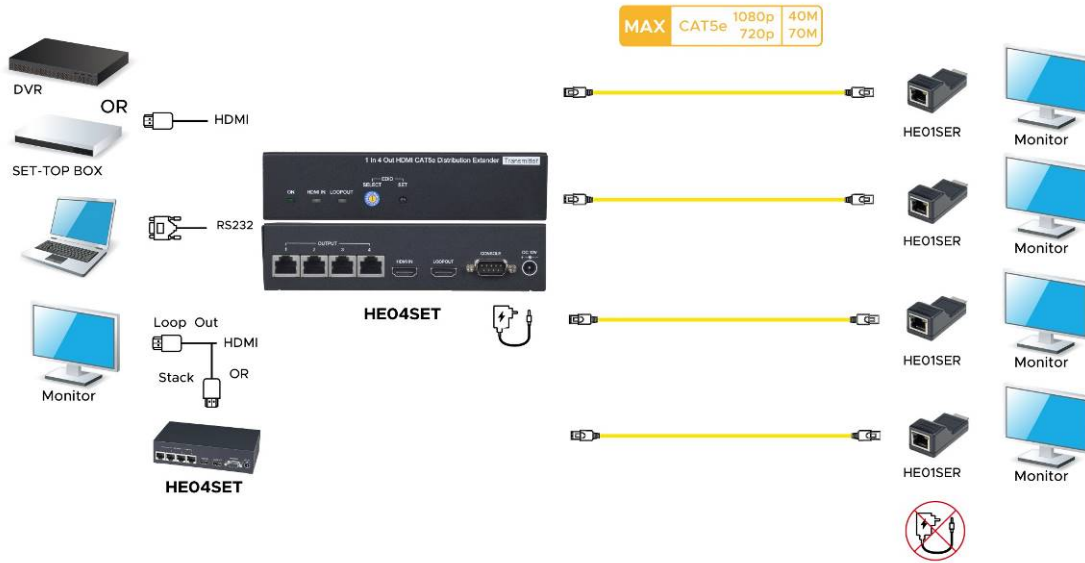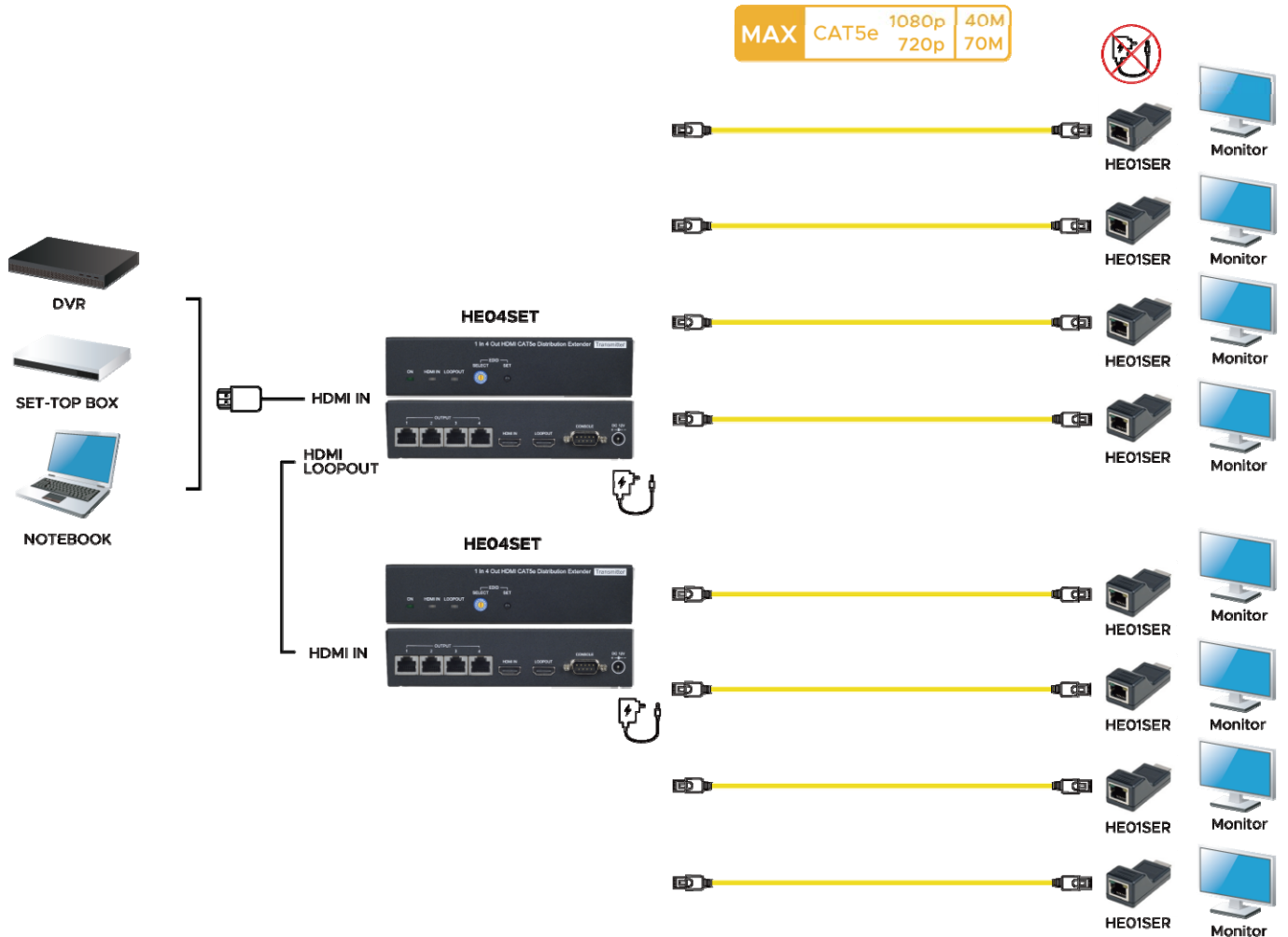

Features:

- Extends and distributes HDMI signal to 4 remote HDMI displays over CAT5e cable.

- Receiver unit no external power required.

- Supports resolution up to 1080p 60Hz.

- Transmission distance up to 40M at 1080p, 70M at 720p.

- Built-in HDMI loop out supports CEC.

- The transmitter can be stacked to another HE04SET for 1 in 8 out application.

- HDMI 1.4 compliance.

- Supports AC3, DTS, Dobly TrueHD, DTS-HD

- Supports RS232 control.

- Supports EDID management

- Optional Model: HE01SLR (Chainable Receiver)

Installation:

(1) Extends and distributes 1 HDMI source to remote 4 HDMI displays.
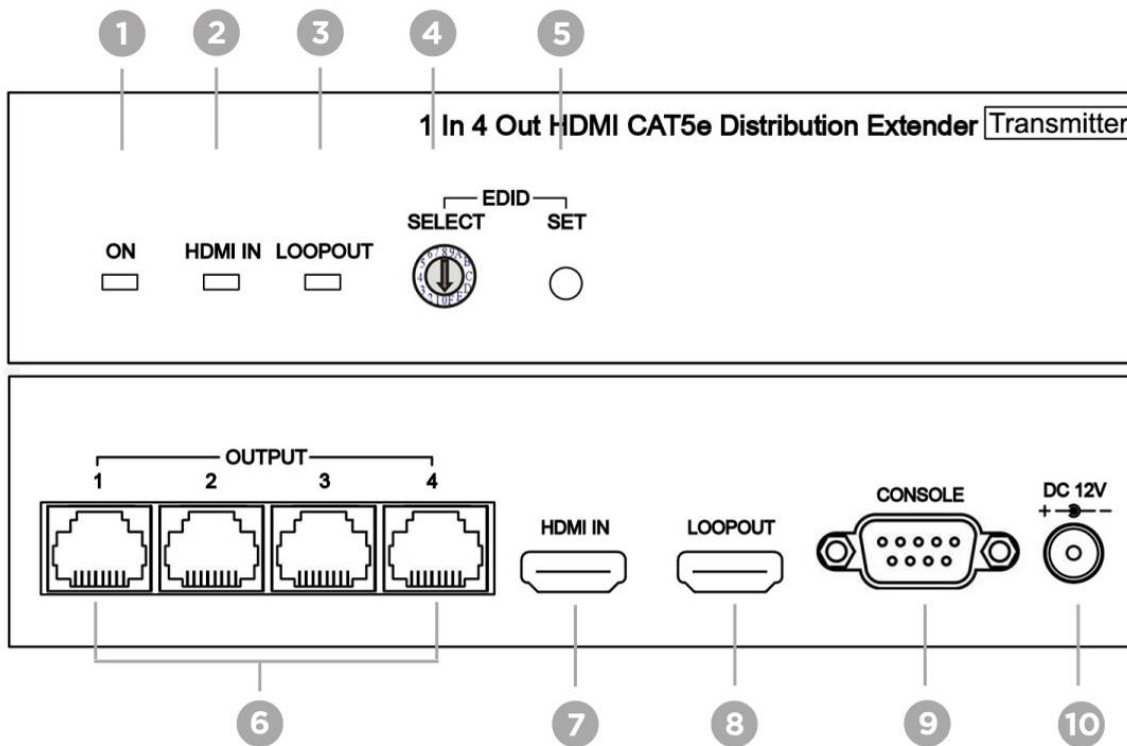

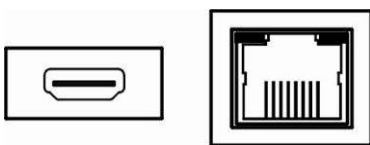(2)Stack to another HE04SET through HDMI loop out port to get configuration of 1 in 8 out.

Panel Review:

(1) HE04SET

No.	Interface	Description
1	Green LED	Green light indicates "ON" status.
2	Blue LED	Blue light indicates "HDMI IN" is connected to HDMI source.
3	Blue LED	Blue light indicates "LOOPOUT" is connected to HDMI display.
4	Rotary Switch	To select EDID by rotating the switch from 0 to F. (please refer to EDID setting)
5	SET Button	Press 1 second to copy selected EDID.
6	Output 1~4	Connects to remote receivers (HE01SER, HE01SLR) with CAT5e cables. (please refer to Note 2-4)
7	HDMI Input	Connects to HDMI source with HDMI cable.
8	Loop Out	Connects to HDMI display or another HE04SET with HDMI cable. (please refer to Note 1)
9	Console	Connects to RS232 control device with DB9(F) cable for controlling HE04SET or updating firmware. (please refer to RS232 setting)
10	Power Input	Connects to DC12V 1A adapter.

(2) HE01SER
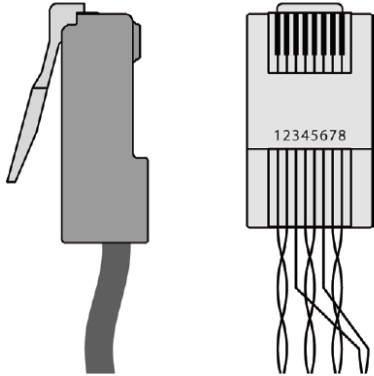

No.	Interface	Description
1	Green LED	Green light indicates receiving power and video signals.
2	Yellow LED	Yellow light indicates no signal input or receiving an unsupported format.

Notes:

1. When connect HDMI display with loop out port, please make sure HDMI cable connects to the Input 1 of HDMI display.
2. It is recommended using UTP cable.
3. When using the STP cable, the transmission distance might be shorter. (CAT6a: 25-30M, CAT7:25- 40M)
4. The cable must be straight, do not roll the cable to avoid crosstalk interference.

RJ45 Pinout

(PIN TIA/EIA-568B)

(PIN TIA/EIA-568B)	
PIN	Wire Color
1	Orange-white
2	Orange
3	Green-white
4	Blue
5	Blue-white
6	Green
7	Brown-white
8	Brown

RS232 Wiring

Hyper Terminal setting: 〔 **57600bps (8-N-1)** 〕

RS232	
Pin	Definition
2	TX
3	RX
5	GND

Note: Pins not shown in table have no connection

RS232 Command Table

Command	Description
OFF 1(Enter)	OUTPUT 1 OFF
OFF 2(Enter)	OUTPUT 2 OFF
OFF 3(Enter)	OUTPUT 3 OFF
OFF 4(Enter)	OUTPUT 4 OFF
OFF 5(Enter)	HDMI LOOPOUT OFF
ON 1(Enter)	OUTPUT 1 ON
ON 2(Enter)	OUTPUT 2 ON
ON 3(Enter)	OUTPUT 3 ON
ON 4(Enter)	OUTPUT 4 ON
ON 5(Enter)	HDMI LOOPOUT ON

EDID Table

Number	EDID	Number	EDID
0	Customize EDID #1	8	1920x1080
1	Customize EDID #2	9	1920x1200 RGB LPCM 2CH
2	1024x768	A	720p 50Hz LPCM 2CH
3	1280x720	B	720p 60Hz LPCM 2CH
4	1280x1024	C	1080p 50Hz LPCM 2CH
5	1366x768	D	1080p 60Hz LPCM 2CH
6	1600x900	E	1080p 50Hz MULTI
7	1680x1050	F	1080p 60Hz MULTI

EDID Settings

Step1:   Refer to EDID list at last page and find the number of which EDID is needed. (0~F)

Step2:   Rotate the rotary dip switch arrow ⊕ to the selected number.

Step3:   Click "SET" button, and the two blue LEDs will flash quickly.

Step4:   Wait for HE04SET to restart, and the process of EDID setting is done.

Customize EDID Settings

Step1:   Connects display and loop out port through HDMI cable.

Step2:   Press and Hold "SET" button for approximately 3 second, and the two blue LEDs will flash slowly then quickly.

Step3:   Wait for HE04SET to restart, and the process of copying EDID is done.

Caution:

1. The wiring must be away from any equipment with electromagnetic wave, i.e.: mobile phone, microwave, radio equipment, fluorescent lamp, high voltage power lines.

2. HE04SEK isn't networking device, please do not connect with Ethernet device to avoid damages.

Package Contents:

1 x HE04SET

4 x HE01SER

1 x DC12V 1A power supply

4 x Rubber cushions

2 x Screws/ Screw hole plugs

Specification:

ITEM NO.	HE04SET
Input Interface	HDMI Type A x 1
Loopout Interface	HDMI Type A x 1
Video Output Interface	RJ45x4
Resolution	Up to 1080p @ 60Hz
Transmission distance	Up to 40M at 1080p, 70M at 720p
RS232 Interface	DB9(F)
RS232 Baud Rate	57600 bps
Power Supply	DC 12V 1A
Max. Power Consumption	96W (0.8A)
Temperature	Operation: 0 to 70℃, Storage: -20 to 125℃, Humidity: up to 95%
Dimension (mm)	167 x 101 x 40
Weight (g)	460

ITEM NO.	HE01SER
Resolution	Up to 1080p @ 60Hz
Distance	Up to 40M at 1080p, 70M at 720p
HDMI Connector	Type A
Power Consumption	320mA
Temperature	Operation: 0 to 55℃, Storage: -20 to 85℃, Humidity: up to 95%
Dimension (mm)	57.5 × 24 × 20.2
Weight (g)	20