

**ez-SHV+**

SDI to HDMI  
Converter with  
Display and Scaler

Operation manual

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# 01. ez-SHV+

(SDI to HDMI Converter with Display and Scaler)

Lumantek's ez-SHV+ is an SDI to HDMI converter with Display and Scaler.

The ez-SHV+ does more than just converting. Through its 2.7 inch TFT-LCD, it displays the video input.

The display also shows an eye pattern for video quality monitoring, the resolution of incoming video and approximate cable length relative to the quality of the video.

## Features

### ① Inputs & outputs

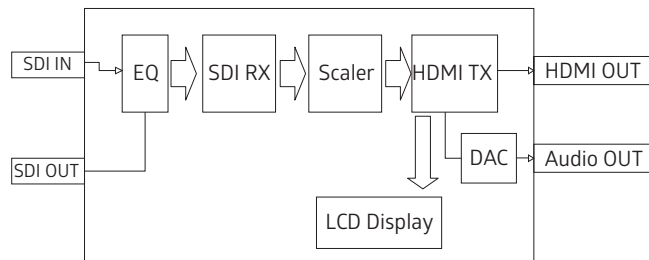
Input: 1 x SD/HD/3G-SDI (BNC 75Ω)  
Output: 1 x SD/HD/3G HDMI (Type A)  
1 x SD/HD/3G-SDI loop (BNC 75Ω)  
1 x Analog audio stereo

### ② Supports SD/HD/3G

### ③ TFT-LCD Display (2.7 inch)

### ④ Push switch for mode change

## Diagram



## 02. Interface

### Specifications



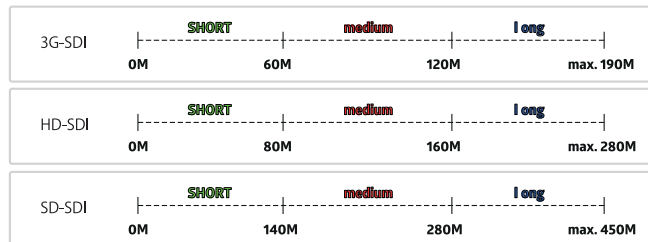
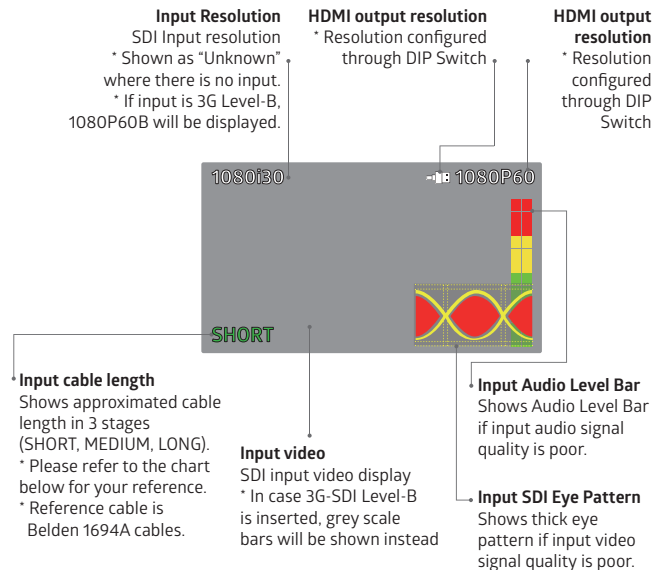
## 02. Interface

### DIP Switch Settings

<p><b>VIDEO OUT</b></p> <p>1 2 3 4</p> <p>480i59.94</p> <p>576i50</p> <p>720p50</p> <p>720p59.94</p> <p>720p60</p> <p>1080i50</p> <p>1080i59.94</p> <p>1080i60</p> <p>1080p23.98</p> <p>1080p24</p> <p>1080p25</p> <p>1080p29.97</p> <p>1080p30</p> <p>1080p50</p> <p>1080p59.94</p> <p>1080p60</p>	<p><b>VIDEO OUT : Video output resolution (Position 1, 2, 3, 4)</b></p> <ul style="list-style-type: none"> <li>- 720x480i@59.94 (DIP SW : 1111)</li> <li>- 720x576i@50 (DIP SW : 0111)</li> <li>- 1280x720p@50 (DIP SW : 1011)</li> <li>- 1280x720p@59.94 (DIP SW : 0011)</li> <li>- 1280x720p@60 (DIP SW : 1101)</li> <li>- 1920x1080i@50 (DIP SW : 0101)</li> <li>- 1920x1080i@59.94 (DIP SW : 1001)</li> <li>- 1920x1080i@60 (DIP SW : 0001)</li> <li>- 1920x1080p@23.98 (DIP SW : 1110)</li> <li>- 1920x1080p@24 (DIP SW : 0110)</li> <li>- 1920x1080p@25 (DIP SW : 1010)</li> <li>- 1920x1080p@29.97 (DIP SW : 0010)</li> <li>- 1920x1080p@30 (DIP SW : 1100)</li> <li>- 1920x1080p@50 (DIP SW : 0100)</li> <li>- 1920x1080p@59.94 (DIP SW : 1000)</li> <li>- 1920x1080p@60 (DIP SW : 0000)</li> </ul>
<p><b>RATIO</b></p> <p>5</p> <p>Full</p> <p>Letter</p> <p>PillarBox</p>	<p><b>RATIO : Video output screen ratio (Position 5)</b></p> <ul style="list-style-type: none"> <li>- FULL 16:9 (DIP SW : 1)</li> <li>- Letter 4:3 or Pillar Box (DIP SW : 0)</li> </ul>
<p><b>BRIGHTNESS</b></p> <p>6</p> <p>Dark</p> <p>Bright</p>	<p><b>BRIGHTNESS : LCD brightness (Position 6)</b></p> <ul style="list-style-type: none"> <li>- Dark (DIP SW : 1)</li> <li>- Bright (DIP SW : 0)</li> </ul>

## 02. Interface

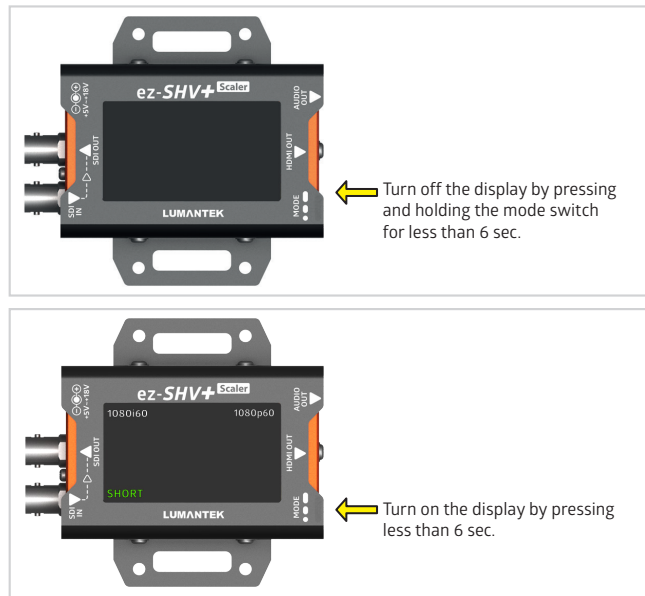
### LCD Displays



## 02. Interface

### LCD Displays

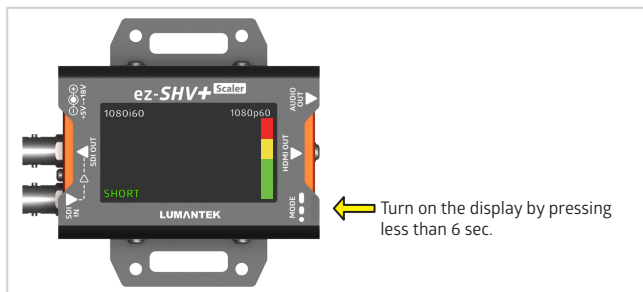
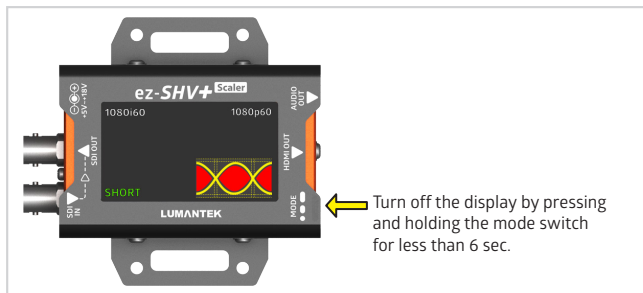
#### ① LCD Display ON/ OFF



## 02. Interface

### LCD Displays

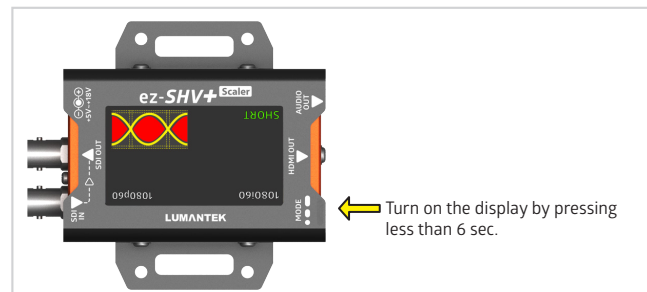
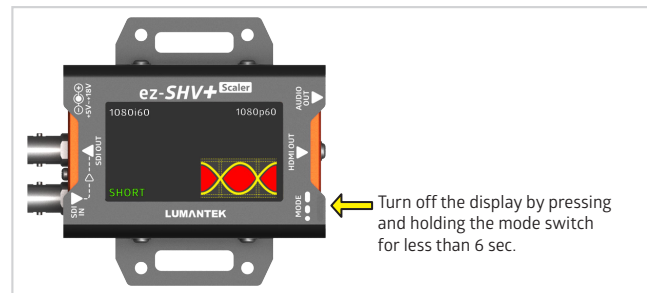
#### ② SDI input eye pattern ON/ OFF



## 02. Interface

### LCD Displays


#### ③ LCD monitor rotation (by 0 or 180 degrees)



# 02. Interface

## LCD Displays


### ④ ON/OFF HDMI mirrored output for teleprompter



HDMI Output

Please TURN OFF the LCD Display first.  
TURN ON the mirrored output  
application by pressing the mode  
switch for more than 6 seconds while  
the LCD OFF.

\*Please refer to page 00 for the LCD  
Display ON/OFF  
\*Supports only HD resolutions



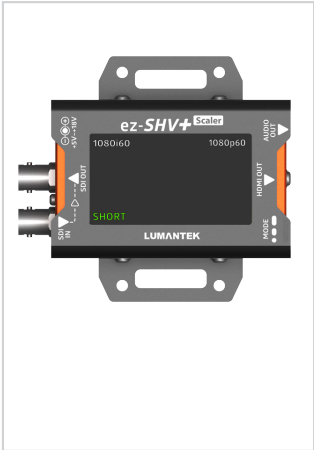
HDMI Output

Please TURN OFF the LCD Display first  
TURN OFF the mirrored output  
application by pressing the mode  
switch for more than 6 seconds while  
the LCD OFF.

\*Please refer to page 00 for the LCD  
Display ON/OFF  
\*Supports only HD resolutions

# 03. Product Configuration

### ez-SHV+



### AC to DC adapter



## 04. Technical Specifications

### Data Input

SDI Video Input: SD/HD/3G-SDI (BNC 75Ω) x1

Video Formats:

- 720x480i@59.94/60
- 720x576i@50
- 1280x720p@50/59.94/60
- 1920x1080i@50/59.94/60
- 1920x1080p@23.94/24/25/29.97/30
- 1920x1080p@50/59.94/60  
(3G-SDI Level-B not supported)

### Data Output

SDI LOOP Output: SD/HD/3G-SDI (BNC 75Ω) x1

Audio Output: Stereo Jack x1

HDMI Video Output: SD/HD/3G (HDMI Type A) x1

Video Formats:

- 720x480i@59.94 (DIP SW : 1111)
- 720x576i@50 (DIP SW : 0111)
- 1280x720p@50 (DIP SW : 1011)
- 1280x720p@59.94 (DIP SW : 0011)
- 1280x720p@60 (DIP SW : 1101)
- 1920x1080i@50 (DIP SW : 0101)
- 1920x1080i@59.94 (DIP SW : 1001)
- 1920x1080i@60 (DIP SW : 0001)
- 1920x1080p@23.98 (DIP SW : 1110)
- 1920x1080p@24 (DIP SW : 0110)
- 1920x1080p@25 (DIP SW : 1010)
- 1920x1080p@29.97 (DIP SW : 0010)
- 1920x1080p@30 (DIP SW : 1100)
- 1920x1080p@50 (DIP SW : 0100)
- 1920x1080p@59.94 (DIP SW : 1000)
- 1920x1080p@60 (DIP SW : 0000)

### Connections

Power : DC Power Input (DC Jack) x1

DIP Switch : (6 Pole) x1 Video In/Out

Resolution, Video Output Ratio, LCD

Brightness

MODE : (Push Switch) x1 LCD ON/OFF,

Menu Selection

### Display

2.7 inch TFT LCD : Input Video Display,

Input SDI Eye Pattern, In/Output Video

Resolution Display, Input Cable Length,

Audio Level Meter

### Electrical

Power Input: DC +5V to +18V

Power Consumption: 3W(max.)

Operation Temperature: 0~45°C

### Physical

Dimension: 86.3x57.2x26.6 (mm)(include connector)

Weight: 0.3 kg(typ.)(0.66lbs)



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