# **User Guide**





## **IMPORTANT SAFETY INSTRUCTIONS:**

- Please read User Guide before using this product.
- Please keep User Guide for future reference.
- Please read the cautions to prevent possible danger and loss of property.

## **MAIN FEATURES:**

- 3D LUT for Accurate Color Reproduction.
- Gamma Selection
- Quad Link Square Division and Quad Link 2 Sample Interleave (2SI)
- With HDR;
- Compare Color Space & Gamma (Side by Side)
- SDI and HDMI cross conversion;
- Integrated recording info. display;
- Various Markers
- Various camera assist function: Scan, Aspect, H/V Delay, Check field, Zoom, Freeze, Waveform, Vector Scope, Time Code, etc.
- High resolution: 1920×1200;
- Wide voltage: DC 7-24V;
- High brightness: 500cd/m²;
- High contrast: 1000:1;

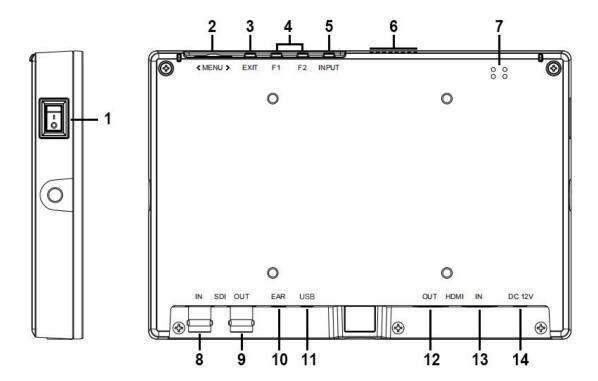
# **CAUTIONS:**

- Please do not place the display screen towards the ground.
- Please avoid heavy impact or drop onto the ground.
- Please do NOT use chemical solutions to clean this product. Please wipe with a clean soft cloth to maintain the brightness of the surface.
- Please do not block any vent hole.
- Please follow the instructions and trouble-shootings to adjust the product. Other improper adjustment may result in damage. Any further adjustment must be performed or conducted by a qualified technician.
- Please unplug the power and remove the battery if long-term no-use, or thunder weather.

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# 1. PRODUCT DESCRIPTION



- 1. Power ON/OFF: "○" is power OFF; "|" is power ON.
- 2. MENU Dial: Turn the dial to adjust volume;

Menu function: press to activate menu displayed on screen when power on.

Option function: select option via dialing to the left or right.

Confirm function: press to confirm after option selected.

- 3. EXIT: return/exit; Volume off/on.
- 4. F1, F2, User-definable buttons.

Default functions: (function customized to meet your needs)

F1 Waveform F2 Scan

- 5. INPUT: Circularly switch among of SDI and HDMI.
- 6. Fan cooling holes.
- 7. Speaker.
- 8. SDI input interface.
- 9. SDI output interface.

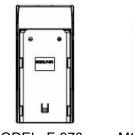
- 10. Earphone jack.
- USB (3D-LUT load). 11.
- 12. HDMI output interface.
- 13. HDMI input interface.
- 14. DC 12V power input.

# 2. DV BATTERY MOUNT PLATE

# Standard mounts process



Following three types of battery plates are suitable for this device, model F970 & LP-E6.



MODEL: F-970

MODEL: LP-E6

**DV Battery Mount Plate:** 

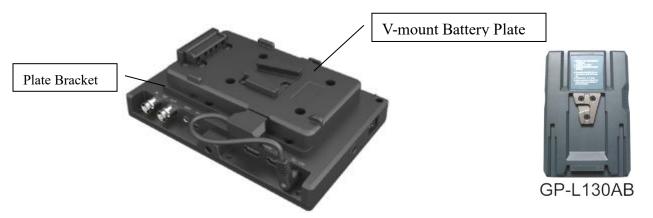
# **DV Battery Mount Plate Specification:**

Model F970 for battery of SONY DV:

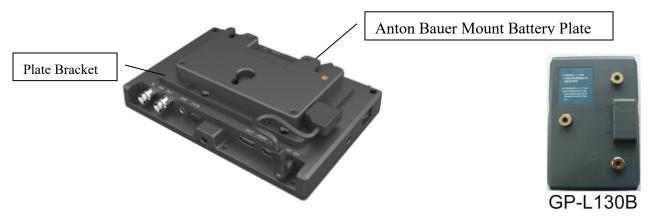
DCR-TRV series, DCR-TRV E series, VX2100E PD P series, GV-A700, GV-D800 FD/CCD-SC/TR3/FX1E/HVR-AIC, HDR-FX1000E, HVR-Z1C, HVR-V1C, FX7E F330.

Model LP-E6 for battery of Canon DSLR: 5D Mark II/5D Mark III/EOS7D/EOS60D;

**V-mount battery plate (optional):** Please refer to GP-L130AB type battery specifications.



Anton Bauer mount battery plate (optional): Please refer to GP-L130B type battery specifications.



## 3. MENU SETTING

Before setting the functions, please make sure the device is connected correctly.

## 3-1. Shortcut keys:

#### 3-1-1. the image menu

Dialing to the left or right when power on, brightness will appear at the bottom of the screen, then press the dial to switch among of brightness, sharpness, contrast, saturation, volume, tint, MENU and Exit. User can adjust the value of the selected option via the dial.

#### 3-1-2. F1-F2 2 user-definable function buttons:

Long press any F1-F2 key for 3-5 seconds to pop-up shortcut menu directly. As shown in Figure (default menu button in white font).

Select option via dialing to the left or right.

Press to confirm option as default, then press EXIT to exit.

Functions of F1-F2 buttons can also be customized: Center Marker, Aspect Marker, Check Field, Underscan, Scan, Aspect, DSLR, Freeze, H/V delay, Peaking, False Color, Exposure, Histogram, Level Meter, Waveform and Time Code.

Note: Time code is only available under SDI mode.

F1-F2: 2 user-definable function buttons

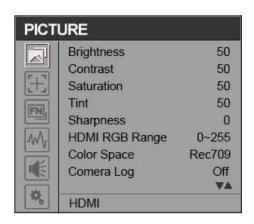
**Default function:** 

F1 Waveform F2 Scan

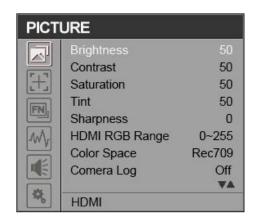
Center Marker Aspect Marker Check Field Underscan Scan Aspect DSLR Freeze H/V Delay Peaking False Color Exposure Histogram Level Meter Waveform **TimeCode** 

# 3-2. MENU Operation

When power on, press "MENU" on the device. The menu of function setting will display on the screen.

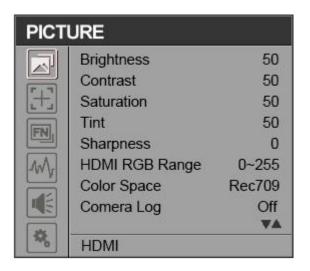


Dialing left or right toselect a menu, then press to confirm. The menu icon presently selected is shown highlighted.



Dialing left or right to change the setting, then press **"MENU"**to confirm the setting. Press **EXIT** to return.

#### 3-2-1. Picture



#### 3-2-1-1. **Brightness**

Use this setting to choose the brightness from 0-100.

#### 3-2-1-2. Contrast

Use this setting to choose the contrast from 0-100.

#### 3-2-1-3. **Saturation**

Use this setting to choose the saturation from 0-100.

#### 3-2-1-4. **Tint**

Use this setting to choose the tint from 0 to 100.

#### 3-2-1-5. **Sharpness**

Use this setting to choose the sharpness from 0 to 100.

#### 3-2-1-6. HDMI RGB Range

Use this setting to choose one of the HDMI RGB Range presets:

[0~255], [16~235].

#### 3-2-1-7. Color Space

Use this setting to choose one of the color space presets: Rec709, EBU, Native, SMPTE-C.

#### 3-2-1-8. Camera Log

Use this setting to choose one of the camera Log modes:

-[Off]: Sets off Camera Log.

-[Def. Log]

Use this setting to choose one of the Camera Log modes:

SLog2ToLC-709, SLog2ToLC-709TA, SLog2ToSLog2-709,

SLog2ToCine+709, SLog3ToLC-709, SLog3ToLC-709TA,

SLog3ToSLog2-709, SLog3ToCine+709.

-[User Log]

Use this setting to choose one of the User Log modes (1-6).

Pease install the User Log as following steps:

The User Log must be named with .cube in the suffix. Please note: the device only support the format of User Log: 17x17x17, Data order is BGR, Table order is BGR.If the format does not meet the requirement, please use tool "Lut Tool.exe" to transform it. Naming the User Log as User1~User6.cube, then copy the user Log into USB flash disk (Only support USD2.0 versions). Insert the USB flash disk to the device, the User Log is saved to the device automatically at the first time. If the User Log is not loaded for the first time, the device will pop up a prompt message, please choose whether to update or not.

#### 3-2-1-9. Gamma

Use this setting to choose one of the Gamma tables:

[Off], [1.8], [2.0], [2.2], [2.35], [2.4], [2.6], [2.8].

Note: Gamma mode can be only activated while HDR function closed.

#### 3-2-1-10. **HDR**

Use this setting to choose one of the HDR presets:

[Off], [ST 2084 300], [ST 2084 1000], [ST 2084 10000], [HLG].

#### 3-2-1-11. Back Light Mode

Use this setting to choose one of the Back Lights modes:

- -[Standard]:The default brightness is 100 cd/m<sup>2</sup>.
- -[Outdoor]: The default brightness is 500 cd/m<sup>2</sup>.
- -[Custom]: Adjusts the level of the back light from 0 to 100.

Note: Only available under [Custom] mode to adjust the level of the back light.

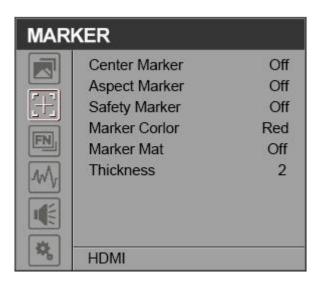
#### 3-2-1-12. **Color Temp**

Use this setting to choose one of the color temperature presets:

[5500°K], [5600°K], [6500°K], [7500 °K], [9300 °K], [User].

Note:Only available under "User" mode to adjust Color Bias and Gain.

#### 3-2-2. Marker



#### 3-2-2-1. Center Marker

Use this setting to display a center marker on the screen.

#### 3-2-2. Aspect Marker

Use this setting to choose the aspect ratio of the marker:

[OFF], [16:9], [1.85:1], [2.35:1], [4:3], [3:2], [1.3X], [2.0X], [2.0X MAG].

#### 3-2-2-3. Safety Marker

Use this setting to set off the safety marker or choose the one of the safety markers:

[95%], [93%], [90%], [88%], [85%], [80%].

#### 3-2-2-4. Marker Color

Use this setting to choose which color of marker is displayed on the screen.

#### 3-2-2-5. Marker Mat

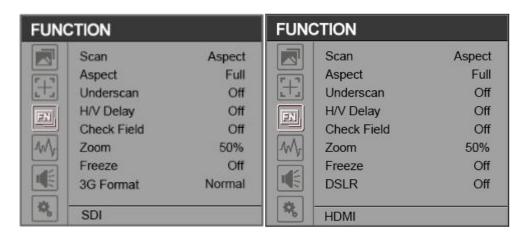
Use this setting to darken the outside of the aspect marker. It can be selected from 0-7 (Step value is 1).

#### 3-2-2-6. Thickness

Use this setting to choose the thickness of marker from 0-7 (Step value is 1).

#### 3-2-3 Function

SDI Mode HDMI Mode



#### 3-2-3-1. Scan

Use this setting to choose one of the scan modes:

[Zoom], [Aspect], [Pixel To Pixel].

Options can be adjusted only under scan mode.

#### 3-2-3-2. **Aspect**

Use this setting to choose one of the aspect presets:

[Full], [16:9], [1.85:1], [2.35:1], [4:3], [3:2], [1.3X], [2.0X], [2.0X MAG].

#### 3-2-3-3. **Underscan**

Use this setting to set off or open the underscan function.

## 3-2-3-4. H/V Delay

Use this setting to choose one of the H/V modes:

[OFF], [H], [V], [H/V]

#### 3-2-3-5. Check Field

Use the check field modes for monitor calibration or to analyze individual color components of an image. In Blue, Green and Red check field modes, only the selected color will be shown.

#### 3-2-3-6. **Zoom**

Use this setting to choose zoom scale from 10%-90%(Step value is 10%).

#### 3-2-3-7. Freeze

Choose [Off] or [On] to freeze or unfreeze the current image on the screen

#### 3-2-3-7. **3G Format**

Use this setting to choose one of the 3G Format modes: [Normal], [GBRA444 10Bit], [YCbCrA444 10Bit],

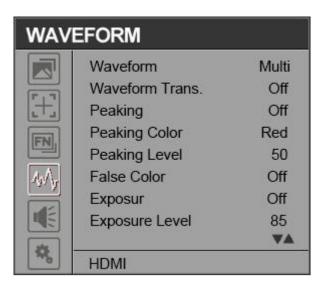
[YCbCrA422 12Bit], [GBR444 12Bit], [YCbCr444 12Bit].

#### 3-2-3-8. **DSLR**

Use this setting to choose one of the DSLR modes:

[Off], [5D2], [5D3].

#### 3-2-4. Waveform



#### 3-2-4-1. Waveform

Use this setting to activate or deactivate Waveform. It also can be choose one of the waveform modes:

[Multi], [Y], [YCbCr], [RGB], [RGB Full].

#### 3-2-4-2. Waveform Trans

Use this setting to choose the intensity of the WaveformTrans:

-[Off]: The background of waveform is shown at black.

-[25%]: The background of waveform is shown at 25% intensity.

-[50%]:The background of waveform is shown at 50% intensity.

#### 3-2-4-3. **Peaking**

Use this setting to activate or deactivate the Peaking function.

#### 3-2-4-4. **Peaking Color**

Use this setting to choose one of the peaking colors:

[Red], [Green], [Blue], [White].

#### 3-2-4-5. Peaking Level

Use this setting to adjust the level of peaking from 0-100.

#### 3-2-4-6. **False Color**

Use this setting to activate or deactivate the False Color function.

#### 3-2-4-7. **Exposure**

Use this setting to activate or deactivate the Exposure function

#### 3-2-4-8. Exposure Level

Use this setting to adjust the level of exposure from 0-100.

## 3-2-4-9. **Histogram**

Use this setting to choose one of the histogram modes:

[Y], [RGM], [Color].

Select [Off] under Waveform option can deactivate the histogram.

#### 3-2-4-10. Time Code

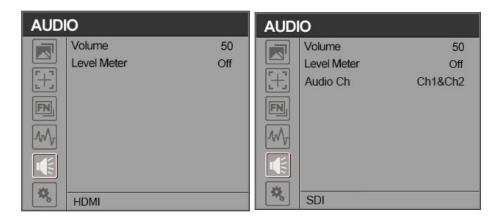
Use this setting to activate or deactivate the Time Code. It has two modes of time code to be selected: [LTC], [VITC].

Note: Time code is only available under SDI mode.

#### 3-2-5. AUDIO

#### **HDMI Mode**

#### **SDI Mode**



#### 3-2-5-1. Volume

Use this setting to adjust the volume from 0-100.

#### 3-2-5-2. Level Meter

Use this setting to activate or deactivate Level Meter function. Note: Default as on under waveform [Multi] function.

#### 3-2-5-3. Audio Ch

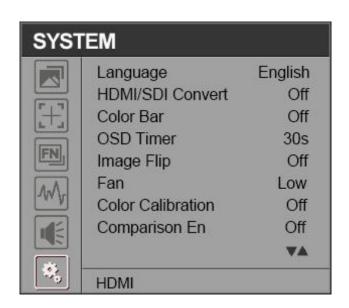
Use this setting to choose one of the Audio Ch modes:

[Ch1&Ch2], [Ch3&Ch4], [Ch5&Ch6], [Ch7&Ch8], [Ch9&Ch10],

[Ch11&Ch12], [Ch13&Ch14], [Ch15&Ch16].

Note: Only available under SDI mode.

#### 3-2-6. SYSTEM



#### 3-2-6-1. **Language**

Use this setting to choose one of the Languages: English, Chinese.

#### 3-2-6-2. HDMI/SDI Convert

HDMI/SDI cross conversion function can realize signal transmits from SDI input to HDMI output and from HDMI input to SDI output.

Use this setting to activate or deactivate the convert function.

#### 3-2-6-3. Color Bar

Use this setting to activate or deactivate the Color Bar function. It has two modes to be chose when activated: [100%], [75%].

#### 3-2-6-4. **OSD Timer**

Use this setting to choose the display time of OSD: [10s], [20s], [30s].

#### 3-2-6-5. **Image Flip**

Use this setting to activate or deactivate the Image Flip function. It has three modes to be chose: [H], [V], [H/V].

#### 3-2-6-6. **Fan**

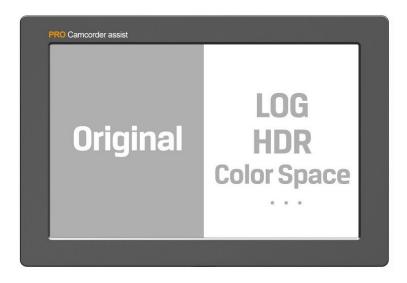
Use this setting to choose the strength of fan: [Low], [High].

#### 3-2-6-7. Color Calibration

If the device needs to be calibrated color, please operate as following:

- Connect the device with the PC via HDMI interface.
- Make sure the device and color calibration equipment to work more than 30 minutes.
- After the previous step, activate the Color Calibration function of the device and color calibration software to calibrate the color (See the document "CMS Color Calibration Process' for details).
- It will generate a document "lcd.cube" after calibrated, then copy this document to USB flash disk.
- Insert the USB flash disk to the device and save the document.
  This document "lcd.cube" will be found under Color Space Option.

# 3-2-6-8. Comparison En



Use this setting to activate or deactivate the Comparison En function.

Activate this function, the screen displays the comparison of Original image and customized image, as shown.

#### 3-2-6-9. Reset

Select the Reset option, dialing the "Menu" knob to reset automatically.

# 4. ACCESSORIES

# Standard:



1.	Folding sun shade cover 1	
2.	HDMI A/C cable1 piece	
3.	Shoe mount	1 piece
4.	VESA battery plate 1 piece	
5.	Battery plate( F970, LP-E6)	2 piece
6.	Battery Plate bracket 1 pie	
7.	12V DC adapter	1 piece
8.	Manual	1 copy

# Optional:



1.Anton Bauer mount	1 piece
2. V-mount	1 piece
3. Battery	1 piece

#### 5. PARAMETERS

Panel	7"
Aspect Ratio	16:10
Physical Resolution	1920×1200 (324ppi)
Brightness	500 cd/m <sup>2</sup>
Contrast	1000: 1
Viewing Angle	170°/ 170°(H/V)
Input Voltage	DC 7-24V
Input Signal	3G-SDI, HDMI, USB (3D-LUT load)
Power Consumption	≤12W
Operating Temperature	-20°C~60°C
Storage Temperature	-30°C~70°C
Dimension (LWD)	182×124×22mm
Weight	405g

# 6. TROUBLE SHOOTING

#### 1. Only black-and-white display:

Check whether the color saturation is properly setup or not.

#### 2. Power on but no pictures:

Check whether the cables of 3G-SDI and HDMI are correctly connected or not. Please use the standard power adapter coming with the product package. Improper power input may cause damage.

#### 3. Wrong or abnormal colors:

Check whether the cables are correctly and properly connected or not. Broken or loose pins of the cables may cause a bad connection.

#### 4. When on the picture shows size error:

Press "MENU  $\rightarrow$  FUNCTION  $\rightarrow$  Underscan" to zoom in/out pictures automatically when receiving HDMI signals

#### 5. Other problems:

Please press "MENU" button and choose "MENU→SYSTEM→ Reset →ON"

Note: due to constant effort to improve products and product features, specifications may change without notice.