# **MOPIC 3D System User Manual**

MOPIC's 3D System delivers an absolute immersive experience through MOPIC's precise eye-tracking technology best suited for a single user.

Please refer to User Manual for instructions and optimal immersive experience



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### **Prior to Use**

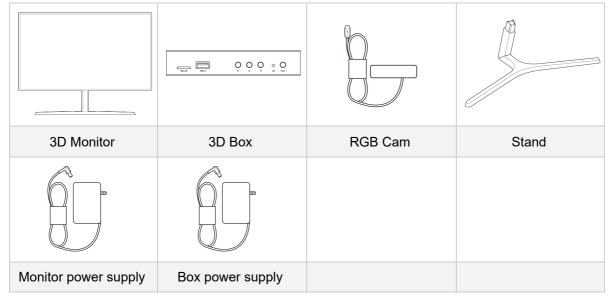
#### Caution

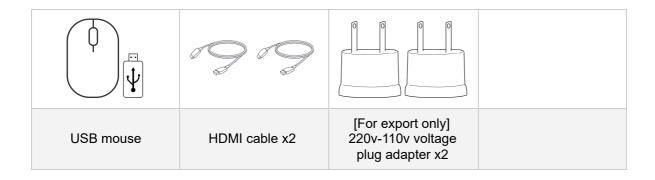
- The warranty becomes null and void in case of damage or injury caused by use of non-authorized components and/or modifications
- The display may get damaged if force is applied on it by hand or via other means
- If the front screen including the attached film gets damaged or removed, 3D immersive experience may become hindered or impossible
- If cables are used that are not supported or tested by MOPIC, the monitor may fail to work or exhibit static
- Illustrations in the manual may look different from actual items and accessories
- Do not apply foreign matters such as oil and lubricants to screws and alike, during assembly (doing so may cause damage)
- Applying excessive force while tightening screws may cause damage. The warranty becomes null and void in case of the damage due to excessive force
- Carrying the monitor upside down by holding the monitor base may cause the monitor to separate from the base and result in product damage and/or personal injury
- When lifting or moving the monitor, please refrain from touching the display as force applied in the process may cause damage
- Power cords provided may be inapplicable to certain regions

### **Items and Accessories**

Please reach out to the seller in case of missing items and accessories.

\* Illustrations in the manual may look different from actual items and accessories as they become obsolete for improvements.



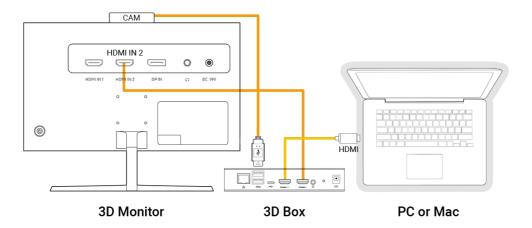


### **Connections**

### **Connecting Cables**

As the diagram below shows, please connect the PC or Mac to 3D Monitor, and RGB Cam to 3D Box.

\* Illustrations in the manual may look different from actual items and accessories as they become obsolete for improvements

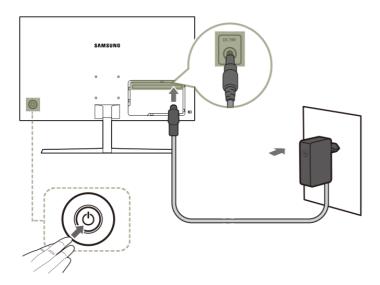


### **Connecting Power Supplies**

Please connect power supplies per instructions below.

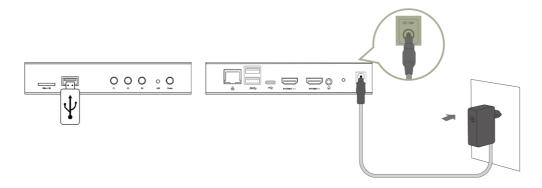
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#### **3D Monitor**



- 1. Connect the Monitor power cable to the DC 19V terminal on the back of the Monitor
- 2. Connect the Monitor power cable to the power socket
- You may turn the device ON/OFF by pressing the JOG button on the back of the display
- The power supplies may change as products become obsolete for improvements

#### 3D Box



- 1. Insert the USB flash drive that contains contents into the USB 3.0 terminal located on the front of the box
- 2. Connect the box power cable to the DC12V terminal on the back of the box
- 3. Connect the box power cable to the power socket
- 4. Press the POWER button on the front of the box to turn on the box
- The specifications of the provided adapter may differ depending on the product standard.
- You may use FAT32 format USB flash drives only.

### How to Use

# Proper eye-tracking operations and the optimal distance between MOPIC 3D Monitor and the user

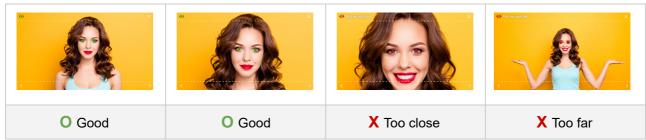
Mplayer3D through the RGB camera tracks the user's eyes in real time and simultaneously adjusts 3D contents to provide the most optimal immersive experience. Please ensure whether eye-tracking operations are functioning properly at the optimal distance, per instructions below.

#### Proper eye-tracking operations

Please click on ( ) in the upper right-hand corner of the main screen displayed through Mplayer 3D. The user will then be able to confirm whether the eye-tracking operations are functional by checking their eyes are being tracked in green.

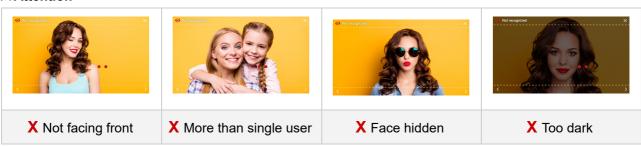
For proper eye-tracking operations, please ensure that the single user's front face is fully captured within the dotted orange boundaries on the screen.

#### Optimal distance between MOPIC 3D Monitor and the user



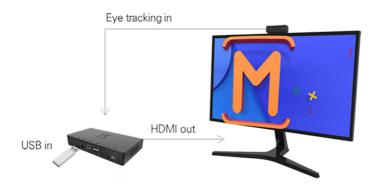
The user can enjoy the most optimal immersive experience when the distance between MOPIC 3D Monitor and the user is about 60 cm (24 inches) apart. The user's head and shoulder should fall within the dotted orange boundaries on the screen, as the pictures below show.

#### **X** Attention

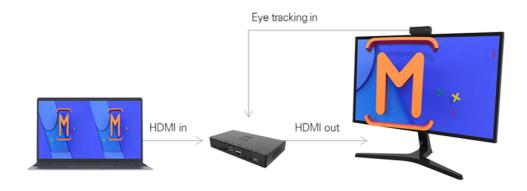


### Main Ways to Enjoy MOPIC 3D System

#### 1. Viewing 3D contents (mp4 files only) from the 3D Box only



#### 2. Viewing 3D contents from PC or Mac through the 3D Box



#### 1. Viewing 3D contents (mp4 files only) from the 3D Box only

Please enjoy 3D contents per instructions below



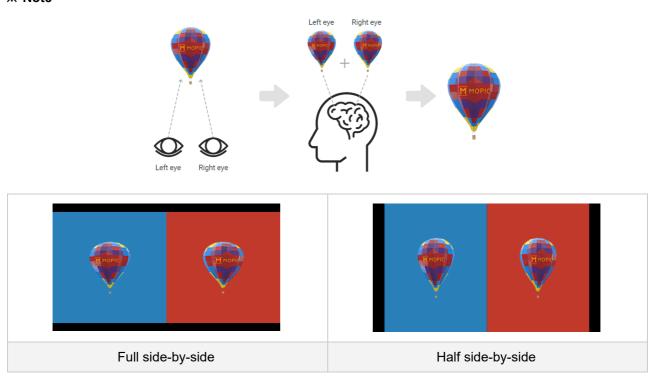
- 1. Insert the USB flash drive that contains contents (mp4 files only) into the USB 3.0 terminal.
- 2. Click and generate 3D contents on the application main screen. Pressing the F1 button on the box will play the first contents and the rest will follow in sequence

#### **X Limitations**

- For ease of use, please connect a mouse to the box
- 3D contents format: Full SBS (Side By Side) or Half SBS, in mp4 file only

- Recommended 3D contents codec: H.264/MPEG-4 AVC, Bitrate: 26 Mbps
- Recommended USB flash drive: Sandisk USB flash drive with less than 32GB storage, no SSD, and FAT32 format, only

#### **X Note**



Side-by-side 3D contents refer to the normal display divided into two halves, a left view and a right view, each occupying one-half of the original display area. Each view displays the contents from a slightly different perspective, corresponding to the left and right eye of the viewer.

The images need to be separated in the side-by-side format for MOPIC 3D System to process and place two halved views on top of each other, creating immersive contents for users to experience.

#### **Buttons on 3D Box**



Button	Description
POWER	Turn the box on or off by pressing the POWER button
F1	Play 3D contents within the box (prior to the contents being played) or return to the main screen (while the contents are being played)
F2	Upon 1st press: convert to 'HDMI In' mode (prior to the contents being played & while the contents are being played) Upon 2nd press: return to the main screen (while the contents are being played)
F3	Force-refresh 3D contents within the box (in case the contents are changed) or convert between 2D and 3D Contents (while the contents are being played)

#### **Buttons on Mplayer3D Screen**

Mplayer3D screen buttons appear after a click on the middle section of the bottom of the screen



Button	Description
3D ↔ 2D	Convert between 2D and 3D contents
NORMAL ↔ BLACK	Convert between Normal and Noiseless* images
DEPTH	Push out 3D contents farther
LOOP ON ↔ LOOP OFF	Repeat selected 3D file of the entire 3D contents
HSBS ↔ FSBS	Convert between Half Side-By-Side / Full Side-By-Side
CAMERA PLAY↔CAMERA HOLD	Turn on and off eye-tracking
X	Hide buttons on the screen

<sup>\*</sup>Noiseless: Pressing the noiseless button would show less afterimages albeit darkened, in case of less than ideal settings



Left Click on the Mouse	Pause
Right Click on the Mouse	Escape

#### 2. Viewing 3D contents from PC or Mac through the 3D Box

Please enjoy 3D contents per instructions below



- 1. Connect the PC or Mac to the 3D Box
- 2. To activate the HDMI In mode, please click on the HDMI button on the application main screen or press the F2 button on the front of the box
- 3. By viewing in full screen mode, you can enjoy the 3D contents from your PC or Mac

#### **\*Attention**

- 3D contents in the PC or Mac must be in half or full SBS (Side By Side), though the file format can be free
- 3D contents must be in full screen mode

#### **Buttons on 3D Box**



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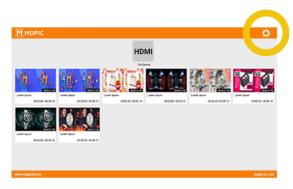
## **Basic Troubleshooting**

### To Adjust 3D Settings

The product has been pre-adjusted.

Please adjust 3D settings that cater to the most optimal 3D immersive experience

#### 1. Click on 3D Settings



Click on ( O) to reset the 3D settings

#### 2. Angle



Move the cursor to the left or right until the black line becomes parallel to the red line

\*The red line does not need to be placed right in the middle of the black lines, as long as they are in parallel

#### 3. Alignment



Move the cursor to the left or right until the floating objects on the screen show no 'afterimage', then click on (

SAVE

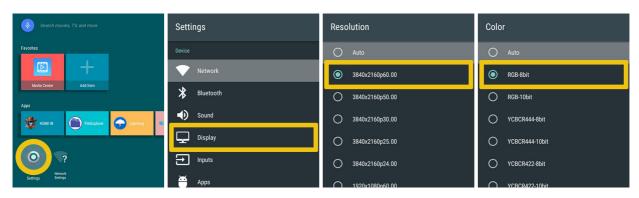
) to complete 3D settings

\* The white floating object in the middle must become the most protrusive 3D image of all, while the other objects on the right and left show little or no afterimage



\*The alignment bar is divided into three zones, blue (60), yellow (65), and red (70) that help measure and deliver the most optimal 3D immersive experience. Please ensure to move the cursor from far left to far right across all three zones multiple times to find the most optimal alignment point, as you will find at least three optimal points across the three zones.

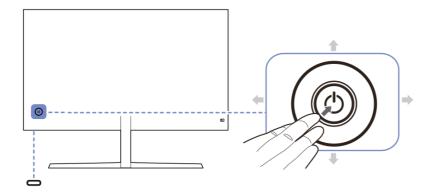
### To confirm 3D Box settings



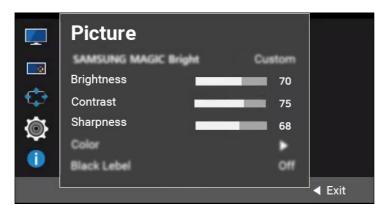
- 3D box main page > Settings > Display > HDMI > Resolution > 3840\*2160 60hz
- 3D box main page > Settings > Display > Color > RGB 8bit

\*Note: the product has been pre-adjusted at optimal 3D box settings. Please refrain from adjusting the display setting as it may deliver poor quality 3D immersive experience.

### To confirm 3D Monitor settings



 Click on the JOG button on the back of the Monitor for a few seconds > Upward Arrow Key > Display Settings



• brightness 70 / contrast 75 / sharpness 68

\*Note:The product has been pre-adjusted at optimal 3D monitor settings. Please refrain from adjusting the monitor setting as it may deliver poor quality 3D immersive experience

For further details, please visit our FAQ page

# **Specifications**

# 3D System Specifications

MODEL NO.		U28A750
MAKER		MOPIC CO., LTD.
Components		3D Monitor, 3D Box (Mplayer3D), RGB Camera
	Dimensions	28inch (653*376*50 mm)
	Product weight	4.7kg
3D Monitor	Resolution	3840*2160 (4K)
	Screen Orientation	Horizontal
	Aspect Ratio	16:09
	os	Android 7
	USB	2x USB2.0 Host, 1x USB3.0 Host, 1x USB Type-C
	Power	DC 12V/3A
	Ethernet	1000M High performance Ethernet (RTL8211E), RJ45 interface
3D Box	HDMI IN / OUT	Adopt Toshiba TC358749XBG bridge device / HDMI 1.4 and 2.0
	Dimensions	155*105*35 (mm)
	Product weight	550g
	Video format	Mp4 (F/H side-by-side, top-bottom)
RGB Camera	Dimensions	140 * 80 * 70 mm
	Product weight	0.250 kg
	Resolution	1920*1080