

## BPF1302-1.0-07

### 13.3" Wide Color Gamut Open Frame Buttondeck



2-Years Warranty

CE/FCC  
Certification

Industrial Design

#### Product Overview

Pixel Works Industry's 13.3 inches Flat Touch Buttondeck adopts industrial grade component like LCM and Touch chip. With high performance performance, which comply with high level electrical static discharge testing and support touch even surface covered by lot of water or other liquid. To comfortable players, wireless charger are embedded into openframe buttondeck. and to be sure the safety of machines, fusion were set up and cover glass tempered to be a high leve vandal resistance. Hexagon pattern share the unique original design to player with more immersion and exciting.



#### Features & Benefits

- ESD 30KV Air discharge, Class A.
- P-Cap water resistance, powered by PWI
- Wireless charger with UL certificated PCB
- Wide color gamut 90%(CIE 1931 )
- Wide view angle with 400cd/m<sup>2</sup> brightness
- LED life time 50000 hours
- Hexagon pattern of cover glass, unique design



#### Applications

- Gaming

## 1. Specification 13.3-Inch BPF1302-1.0-07



|                                                                                                     |                               |                                                                                                       |
|-----------------------------------------------------------------------------------------------------|-------------------------------|-------------------------------------------------------------------------------------------------------|
| LCD Panel<br>Parameters                                                                             | Display Technology            | Active matrix TFT LCD, LED backlight                                                                  |
|                                                                                                     | Aspect Ratio                  | 16:9                                                                                                  |
|                                                                                                     | Active Display Area (H × V)   | 293.4 × 165mm (H × V)                                                                                 |
|                                                                                                     | Native Resolution             | 1920 × 1080@ 60Hz                                                                                     |
|                                                                                                     | Response Time (Typ.)          | 25ms                                                                                                  |
|                                                                                                     | Display Colors                | 16.7M                                                                                                 |
|                                                                                                     | Luminance (Typ.)              | 400cd/m <sup>2</sup>                                                                                  |
|                                                                                                     | Contrast Ratio (Typ.)         | 800: 1(Typ.)                                                                                          |
|                                                                                                     | Viewing Angle (Typ.)          | Horizontal (left/right) CR≥10 89° /89°<br>Vertical (up/down) CR≥10 89° /89°                           |
| Touch Screen<br>Parameters                                                                          | Touch Technology              | Projected Capacitive (P-Cap)                                                                          |
|                                                                                                     | Surface Treatment             | Physical Tempered<br>Optional: Anti-Glare                                                             |
|                                                                                                     | Window view area              | 294.5 × 166.1mm                                                                                       |
|                                                                                                     | Thickness(Total)              | 4.5mm                                                                                                 |
|                                                                                                     | Light Transmission            | ≥85%                                                                                                  |
|                                                                                                     | Response Time                 | ≤10ms                                                                                                 |
|                                                                                                     | Touch Screen Interface        | USB-B                                                                                                 |
|                                                                                                     | Touch Point                   | 10                                                                                                    |
|                                                                                                     | Case/Bezel Color              | Cover glass: Black with Hexagon; Case: Nature                                                         |
| Overall<br>Parameters                                                                               | Mounting Options              | Customization                                                                                         |
|                                                                                                     | Outline Dimension (W × H × D) | 693.4 × 249 × 42.8mm                                                                                  |
|                                                                                                     | Power Supply                  | Input voltage DC 12V                                                                                  |
|                                                                                                     | On Screen Display (OSD)       | Auto, Up, Power, Down, Menu                                                                           |
|                                                                                                     | I/O                           | Video: DP & DVI-I, Touch: USB (Type B), DC-in: ELR-02V, DC-out: Micro-Fit(for Wireless charger power) |
|                                                                                                     | Power Consumption             | 45W (Max.)                                                                                            |
|                                                                                                     | Operating Altitude            | ≤3000m                                                                                                |
|                                                                                                     | Temperature                   | Operating: 0°C to 50°C, storage: -20°C to 60°C                                                        |
|                                                                                                     | Humidity (non-condensing)     | 20% to 85%, @40°C, Non-condensing                                                                     |
| Certification & Compliance                                                                          |                               |                                                                                                       |
| FCC,CE, CISPR 11/EN55011, EN 303 417 V.1.1.1 2017-09, EN 62311, ETSI EN301 489-1, ETSI EN 301 489-3 |                               |                                                                                                       |
| Warranty                                                                                            |                               |                                                                                                       |
| 2 years                                                                                             |                               |                                                                                                       |

## 2. Package information

|                                                  |                                         |
|--------------------------------------------------|-----------------------------------------|
| Carton Box Dimensions<br>(2 units in one carton) | 830 X 240 X 370mm                       |
| Weight                                           | Net weight: 9.6kg; Gross Weight: 10.9kg |

## 3. Order information

| Model          | Part Number | Description                                                                                        |
|----------------|-------------|----------------------------------------------------------------------------------------------------|
| BPF1302-1.0-07 | 1M13002     | 13.3 inches, 400nits, P-cap, Open frame, DPI&DVI, USB-B, 12V DC, Wireless Charger, Hexagon pattern |

## 4. Optional Computer Modules and Accessories

| Optional Computer Modules and Accessories |             |             |          |
|-------------------------------------------|-------------|-------------|----------|
| Model                                     | Part Number | Description | Optional |
|                                           |             |             |          |

## 5. Document information

| Approved by | Reviewed by | Prepared by |                                                                   |            |
|-------------|-------------|-------------|-------------------------------------------------------------------|------------|
| Chen        |             | Hu          |                                                                   |            |
|             |             |             |                                                                   |            |
| Item        | Version     | Date        | Description                                                       | Changed by |
| 1           | V1.0        | 2023-12-04  | First Release                                                     | Hu         |
| 2           | V1.1        | 2024-01-30  | Revise base on sample                                             | Hu         |
| 3           | V1.2        | 2024-3-16   | Add more details specification as per customer requirement        | Hu         |
| 4           | V1.3        | 2024-9-26   | Add third part test report                                        | Luo        |
| 5           | V1.4        | 2024-10-05  | Update 2D drawing, Delete the third part test report base on V1.3 | Luo        |

**Tel:** (86) 0755-23771343

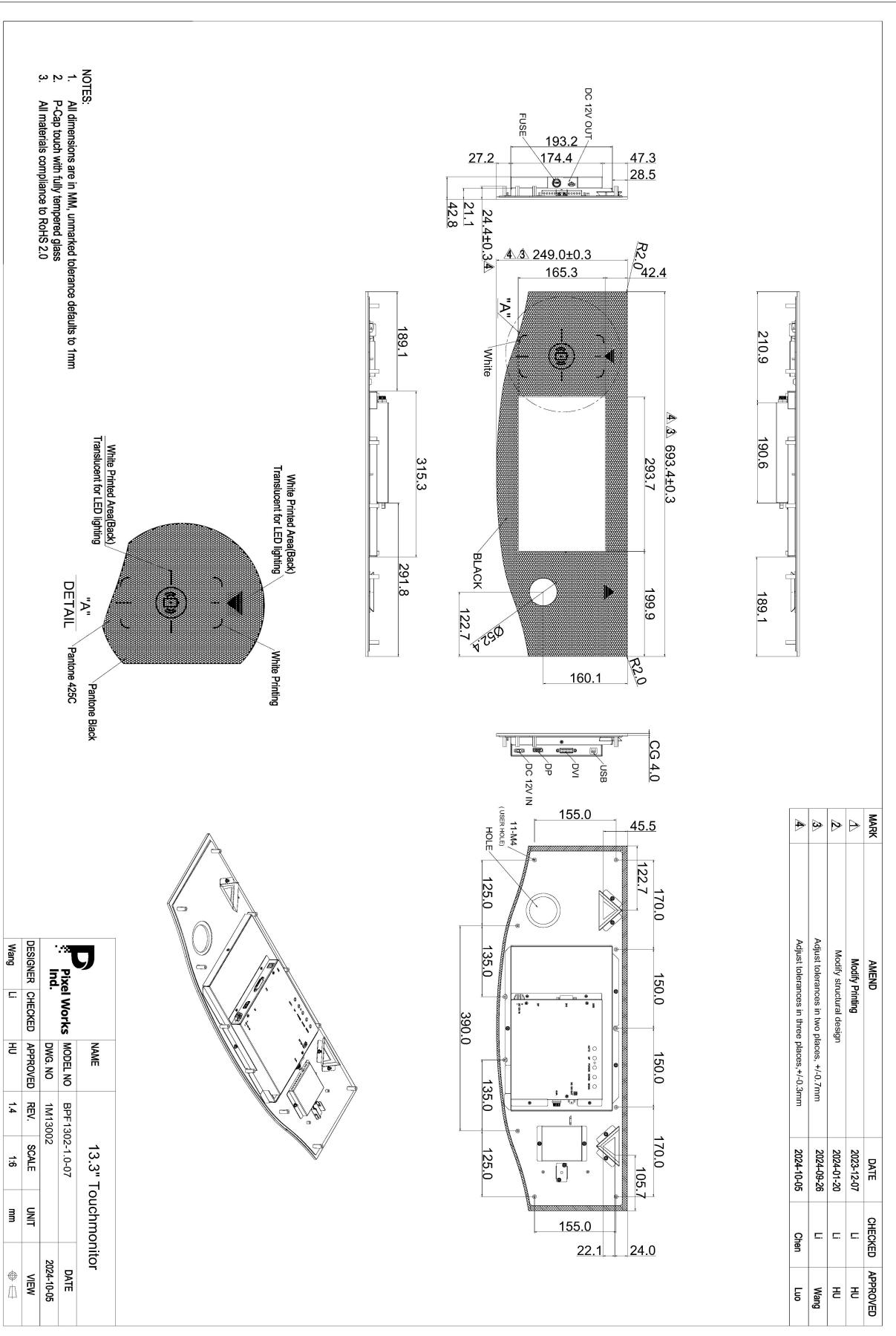
**E-mail:** info@pixelworksind.com

**Website:** <http://www.pixelworksind.com>

Go to [www.pixelworksind.com](http://www.pixelworksind.com) for more products and information, or contact us.

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## 6. Mechanical Drawing



## 7. Firmware Version



- (1) AD/B FW verion: V1.0
- (2) Touch screen FW version: 1.0

## 8. Video Signal Specification



(1). Input Singal & Interface

| Applicability | Input Signal | Type               | Description                     |
|---------------|--------------|--------------------|---------------------------------|
| √             | DP           | Type               | Digitial RGB                    |
|               |              | Signal Format      | Display port TM 1,2 and 4 lanes |
|               |              | Connector          | Display port                    |
|               |              | Maximum resolution | 3840 X2160 / 60Hz (594MHz)      |
| N/A           | HDMI         | Type               | Digitial RGB                    |
|               |              | Signal Format      | TMDS Single Link                |
|               |              | Connector          | HDMI 19Pin Standard             |
|               |              | Maximum resolution | 3840 X2160 / 60Hz (594MHz)      |
| N/A           | VGA          | Type               | Analog RGB                      |
|               |              | Signal Format      |                                 |
|               |              | Connector          | D-SUB                           |
|               |              | Maximum resolution | 1920 X1080 / 60Hz (148.5MHz)    |
| √             | DVI-I        | Type               | Digitial RGB                    |
|               |              | Signal Format      | TMDS single link                |
|               |              | Connector          | DVI 24+5                        |
|               |              | Maximum resolution | 1920 X1080 / 60Hz (148.5MHz)    |

(2) Resolution supported

Display Port & DVI-I

| Applicability | Resolution @ Refresh rate | H-Frequence (KHz) | V-Frequence (Hz) | Pixel Frequence (MHz) |
|---------------|---------------------------|-------------------|------------------|-----------------------|
| N/A           | 640 X 480 @60Hz           | 31.47             | 59.94            | 25.175                |
| N/A           | 800 X 600 @60Hz           | 37.88             | 60.32            | 40.000                |
| N/A           | 1024 X 768 @60Hz          | 48.36             | 60.00            | 65.00                 |
| √             | 1360 X 768 @60Hz          | 47.65             | 59.93            | 84.620                |
| √             | 1366 X 768 @60Hz          | 47.72             | 60.02            | 85.800                |
| N/A           | 1280 X720 @60Hz           | 45.000            | 60.000           | 74.250                |
| N/A           | 1280 X 960 @60Hz          | 60.000            | 60.000           | 108.000               |
| N/A           | 1280 X 1024 @60Hz         | 63.98             | 60.02            | 108.500               |
| √             | 1600 X 900 @60Hz          | 60.00             | 60.00            | 118.250               |
| N/A           | 1600 X 1200 @60Hz         | 75.000            | 60.000           | 162.000               |
| N/A           | 1680 X 1050 @60Hz         | 64.67             | 59.88            | 119.000               |
| √ Preferred   | 1920 X1080 @60Hz          | 67.50             | 60.00            | 148.500               |

Display Port & HDMI Only

| Applicability | Resolution @ Refresh rate | H-Frequnce (KHz) | V-Frequnce (Hz) | Pixel Frequnce (MHz) |
|---------------|---------------------------|------------------|-----------------|----------------------|
| N/A           | 2560 X 1440 @60Hz         | 88.79            | 59.95           | 241.50               |
| N/A           | 3200 X 1800 @60Hz         | 111.09           | 59.98           | 373.25               |
| N/A           | 3840 X 2160 @30Hz         | 67.50            | 30.00           | 297.00               |
| N/A           | 3840 X 2160 @60Hz         | 133.31           | 59.99           | 533.25               |

## 9. On Screen Display (OSD) Specification

### (1) On Screen Display (OSD) Key Function

| No. | Function | Description          |
|-----|----------|----------------------|
| 1   | AUTO     | Exit/ Return Key     |
| 2   | UP       | Up/Left arrow        |
| 3   | POWER    | Power on/ off        |
| 4   | DOWN     | Down/ Right arrow    |
| 5   | MENU     | Active OSD main menu |
|     | LED      | Blue: ON, Red: OFF   |

### (2) OSD Menu Specification

| Main Menu | Sub Menu      | Setting Range               | Defalut value |
|-----------|---------------|-----------------------------|---------------|
| Color     | Brightness    | 0-100                       | 50            |
|           | Contrast      | 0-100                       | 50            |
|           | Backlight     | 0-100                       | 60            |
|           | Color Temp    | 6500K,7500K, 9300K, User    | 6500K         |
|           | Gamma         | off, G1.8, G2.0, G2.2, G2.4 | G2.2          |
| Function  | Aspect Ratio  | Full, 4:3, 16:9             | Full          |
|           | Over Scan     | On, Off                     | Off           |
| OSD       | OSD H Postion | 0-100                       | 50            |
|           | OSD V Postion | 0-100                       | 95            |
|           | Transparency  | 0-100                       | 5             |
|           | Language      | English, 中文                 | English       |
|           | OSD Rotate    | Off, 90,180,270             | Off           |
|           | Reset         |                             |               |
| Audio     | Volume        | 0-100                       | 51            |
|           | Mute          | Off, On                     | Off           |
| Advance   | Hue           | 0-100                       | 50            |
|           | Saturation    | 0-100                       | 50            |
|           | Sharpness     | 0-100                       | 50            |
|           | PCM           | Native, User                | Native        |

(3) OSD user menu



(4) OSD buttons photos



## 10. LED strip specification (No LEDs)



(1) LEDs general specification

N/A

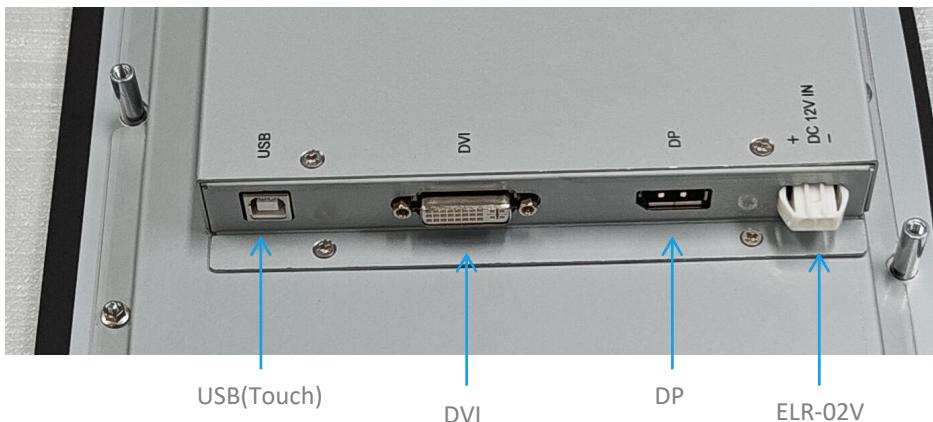
(2) LEDs electrical specification

N/A

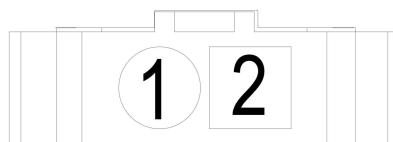
**(3) LED Direction**

N/A

## 11. External I/O connector pin assignment

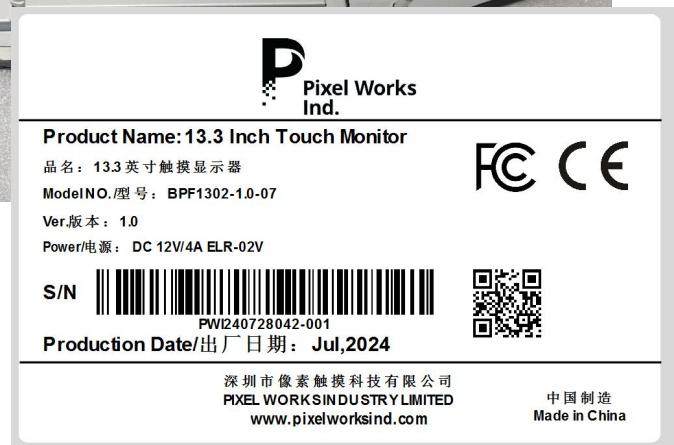
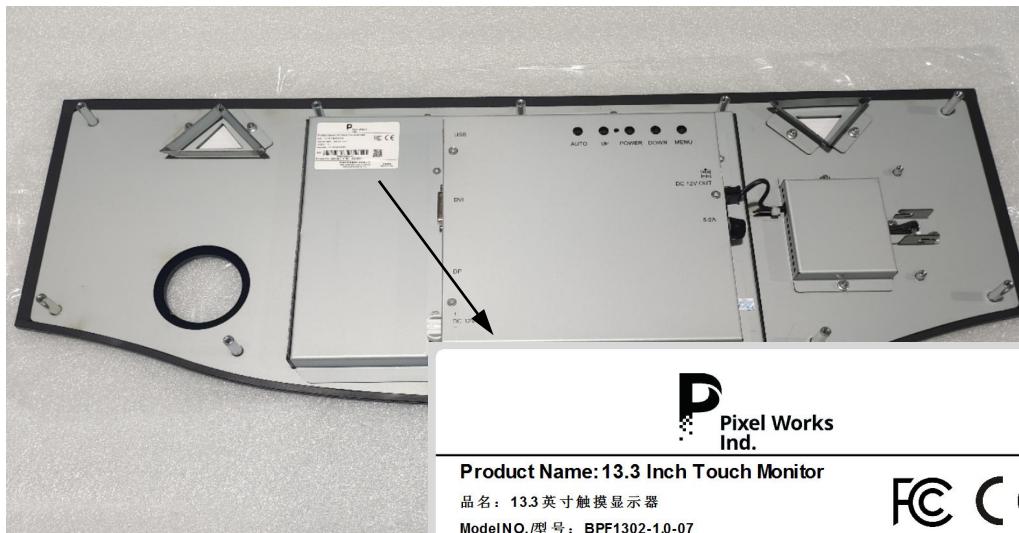


**(1) DC Connector ELR-02V**



| No | Defination | Note |
|----|------------|------|
| 1  | +12V       |      |
| 2  | -GND       |      |

## 12. Product Label



## 13. Packing

### (1) Paper box Label



|                                           |                                               |
|-------------------------------------------|-----------------------------------------------|
| <b>P</b><br>Pixel Works<br>Ind.           | PIXEL WORKS INDUSTRY LIMITED<br>深圳市像素触摸科技有限公司 |
| <b>Net Weight/净重</b><br>Unit/单位: KG       |                                               |
| <b>Gross Weight/毛重</b><br>Unit/单位: KG     |                                               |
| <b>Carton Size/外箱尺寸</b><br>长 X 宽 X 高 (CM) |                                               |
| <b>Carton No./Total</b><br>箱号/箱数          |                                               |

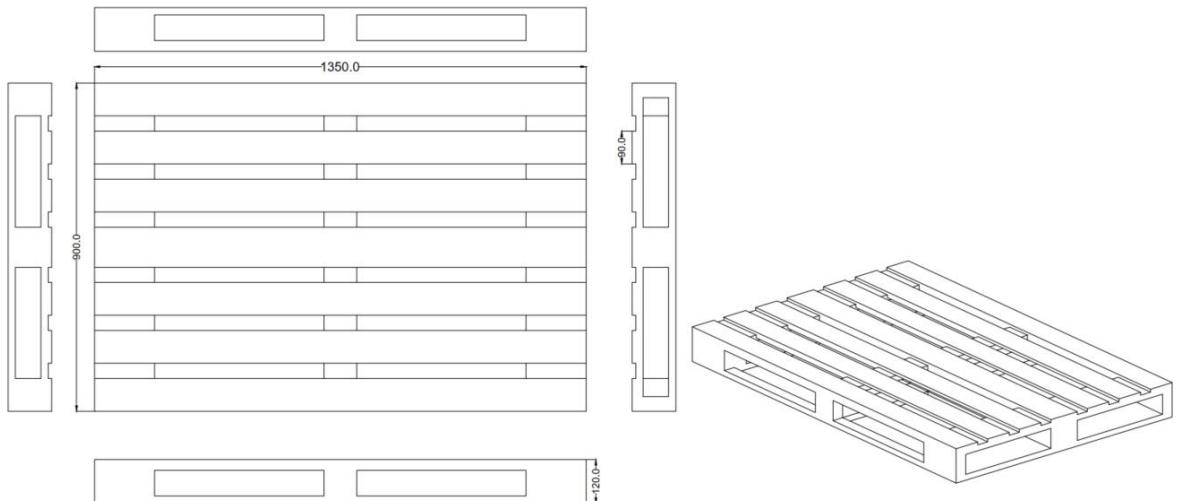
| Product List In Paper Carton<br>纸箱内产品清单信息 |                                                                                                                                    |                  |      |
|-------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------|------------------|------|
| Product No.:                              | 产品型号                                                                                                                               |                  |      |
| Quantity:                                 | 数量                                                                                                                                 | Version:         | 版本   |
| Product Certification:                    | CE/FCC                                                                                                                             | Production Date: | 生产日期 |
| Attachment:                               | 附件                                                                                                                                 |                  |      |
| Manufacture:                              | <b>P</b><br>Pixel Works<br>Ind.<br>深圳市像素触摸科技有限公司<br>PIXEL WORKS INDUSTRY LIMITED<br>www.pixelworksind.com<br>中国制造<br>Made in China |                  |      |

**(2) Packing assymble**

2 units per carton

**(3) Pallet assymble**

**A. Pallet Spec**



**B. Pallet Assymble**



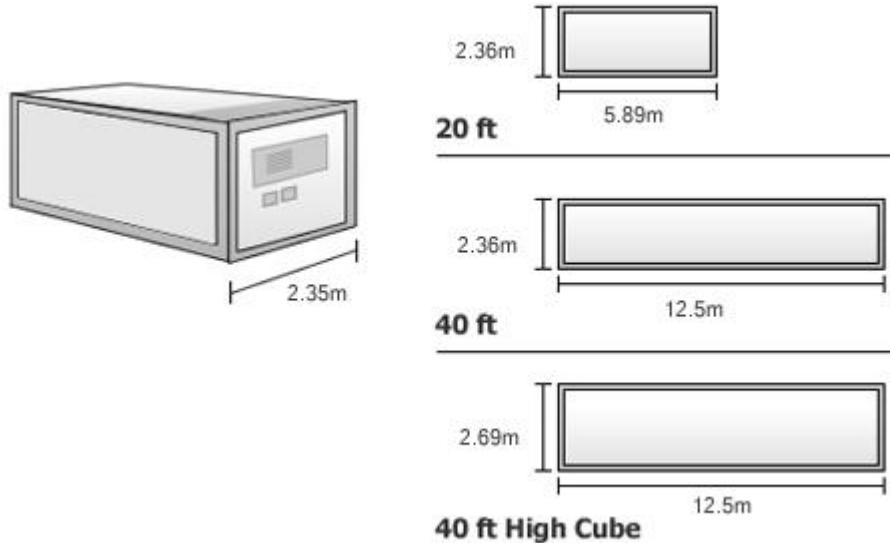
**C. Pallet and shipment information**

| No | Item(Ship type)    | Specification |                   |            | Note         |
|----|--------------------|---------------|-------------------|------------|--------------|
|    |                    | Qty           | Dimension(mm)     | Weight(kg) |              |
| 1  | Packing box        | 2units/box    | 830 X 240 X 370mm | 10.9       |              |
| 2  | Air(Pallet)        | 20units       | 1350X900X950      | 235        | Max.2 layer  |
| 3  | High Cubic(Pallet) | 20+20 units   | 1350X900X1900     | 470        | Max. 2 layer |

## 14. Container loading



### A. 20 and 40 ft container



### B. Container and shipment information

| No | Size    | Quantity             |           | Note                |
|----|---------|----------------------|-----------|---------------------|
|    |         | Pallet(Layer: WXHXL) | Max. Unit |                     |
| 1  | 20ft    | 4X2                  | 320       | Pallet double stack |
| 2  | 40ft HQ | 8X2                  | 640       | Pallet double stack |



## Liability of IP Infringement

The design on LHA3201-2.0-07 is Aurze Gaming America, INC.'s request. Pixel Works Industry Limited hereby DO NOT warrant that nothing is the usage of LHA3201-2.0-07, nor Aurze Gaming America, INC.'s use of it will infringe or constitute a misappropriation of the Intellectual Property rights of a third party.



## Change for Enhancement

This is the first version send to Aruze Gaming, and have no change right now.

any further change will be list in this area and make an Engineering Change Request to client before execute action.

## 15. General Precautions



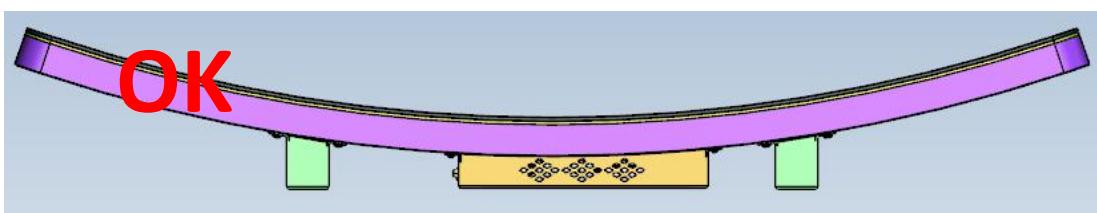
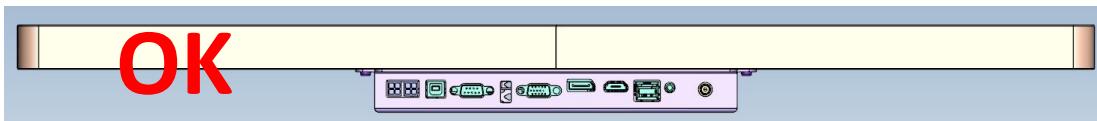
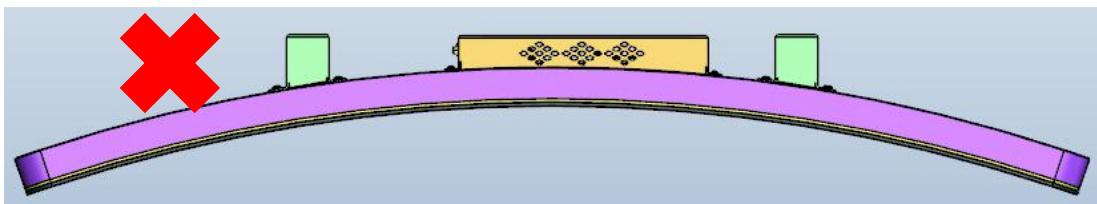
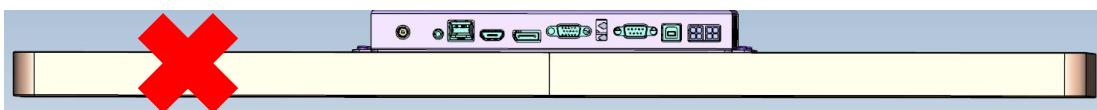
### Handling

- Do not put this monitor face down
- Do not twist or bend the display
- Use all mounting holes
- Do not scratch or push the panel surface as the polarizer might be damaged
- Wipe off water or other liquids immediately from the panels surface

### Storage

- Do not put this monitor face down
- Do not leave the monitor in high temperature, and high humidity for a long time.
- It is highly recommended to store the monitor in controlled temperature from 0°C to 35°C and relative Humidity of less than 70%.
- Do not store the TFT-LCD module in direct sunlight.
- This Product is not designed water-proof. Please avoid from water or moisture place.

## DO NOT PUT MONITOR TOP FACE DOWN



**FCC Caution:**

This device complies with part 15 of the FCC Rules. Operation is subject to the following two conditions: (1) this device may not cause harmful interference, and (2) this device must accept any interference received, including interference that may cause undesired operation.

Any changes or modifications not expressly approved by the party responsible for compliance could void the user's authority to operate the equipment.

NOTE: This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to Part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates, uses and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

- Reorient or relocate the receiving antenna.
- Increase the separation between the equipment and receiver.
- Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.
- Consult the dealer or an experienced radio/TV technician for help.

To maintain compliance with FCC's RF Exposure guidelines, This equipment should be installed and operated with minimum distance between 20cm the radiator your body: Use only the supplied antenna.