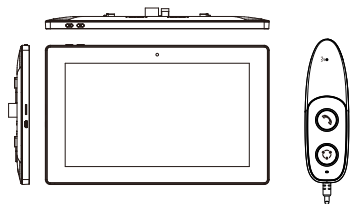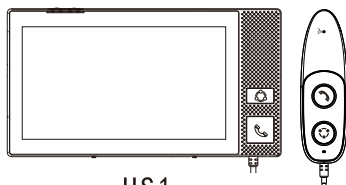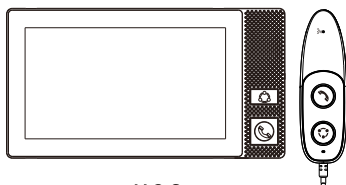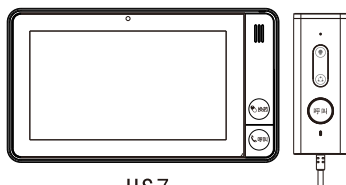# Operation Manual

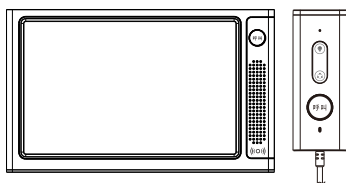## For TCP/IP with 792 system

S3

HS1

HS3

HS7

HS15

Bedside Terminal

■ Remark

Please follow the user manual for correct installation and testing. If there is any doubt please call our tech-supporting and customer center.

Our company applies ourselves to reformation and innovation of our products. No extra notice for any change. The illustration shown here is only for reference. If there is any difference, please take the actual product as the standard.

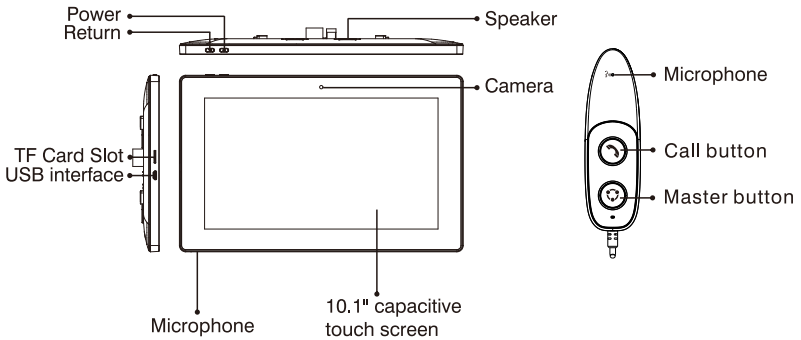*The product and batteries must be handled separately from household waste. When the product reaches the end of service life and needs to be discarded, please contact the local administrative department and put it in the designated collection points in order to avoid the damage to the environment and human health caused by any disposal. We encourage recycling and reusing the material resources.*

CATALOG

Pictures

Model:S3

Power
Return
Speaker
Camera
TF Card Slot
USB interface
Microphone
10.1" capacitive
touch screen
Microphone
Call button
Master button

Model:HS1

Power Return
Speaker
Master button
Call button
Infusion alarm interface
Microphone
Call button
Master button

Model:HS3

Speaker
Master button
Call button
Microphone
Call button
Master button

Model:HS7

Camera

Speaker

Dressing button

Call button

Flashlight

Master button

Call button

Model:HS15

Call button

Speaker

Card reader area

Flashlight

Master button

Call button
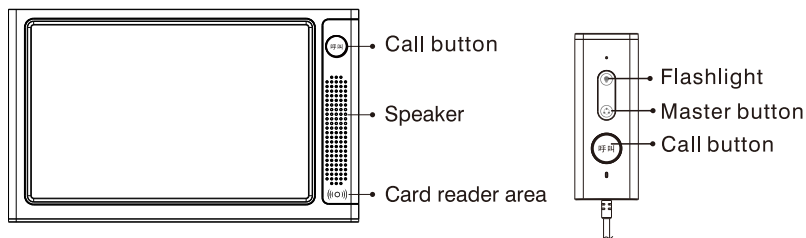
Basic Function

1. With hand-held function, bedside terminal can be used to call the nurse or remind the nurse that the infusion is completed.

2. It can call or cancel calls to the ward door terminal and the nurse terminal.

3. Multi-point capacitive touch screen can display the information on the patient. The information regarding treatment, expense and device can be viewed.

4. It has functions such as call forwarding, nursing positioning, and public announcements receiving.

5. It supports two-way high-definition video intercom (optional).

Note:

1.Buttons on Handset: press the button once to activate the corresponding state, and press it again to cancel the operation.

2.Patient information is issued by the medical care management platform, therefore, some functions can only be used after the bedside terminal obtains patient information.

Technical Parameters

Voltage: DC 12V

Rated power: 10W

Standby power consumption: 3W

Resolution: 7": 1024x600(HS1,HS3,HS7,S3)

　　　　　　10.1": 1280x800(HS15)

Operating temperature: -10℃～+55℃

Storage relative huminity: 20%～85%

Operation

2.1 Main Interface

After the bedside terminal is powered on, the system will enter the interface as shown below:

The patient information is issued by the medical care management platform, which mainly contains basic patient information, including patient information, attending doctors and nurses, and nursing information.

2.2 Call

2.2.1 Call Bedside Terminal by Nurse Terminal

After the nurse terminal calls the bedside terminal, the bedside terminal will automatically answer the call.

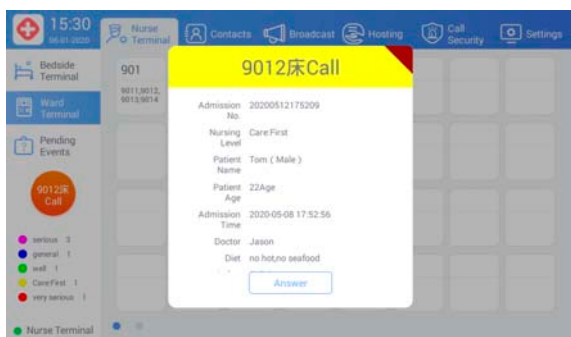The nurse can click "Hang Up" on nurse terminal to end the call.

2.2.2 Call by Bedside Terminal

After clicking "Call" icon on the bedside terminal, the ward door terminal will enter into the following interface:
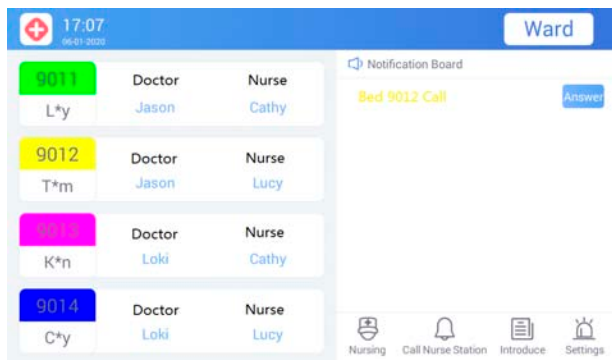
The ward door terminal can start talking with the bedside terminal after clicking "Answer" icon. To end the call, click Hang Up.

After clicking "Call" icon on the bedside terminal, the nurse terminal will enter into the following interface：

The nurse terminal can start talking with the bedside terminal after clicking "Answer" icon. To end the call, click Hang Up.

2.3 Start Nursing and Nurse Help

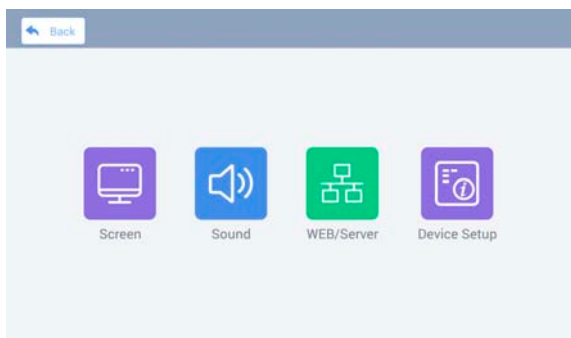Clicking "Start Nursing" icon, the system will enter into the following interface:

Nurses can click "Start Nursing" to inform other nurses about the current nursing position.By clicking "Nurse Help", the nurse can request for help from the nurse terminal through the bedside terminal.

2.4 Setup

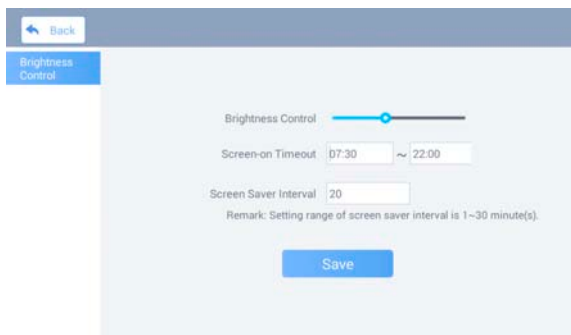Clicking "Feature" icon, the system will enter into the following interface:

Clicking "System Settings" icon, the system will enter into the following interface：

2.4.1 Brightness Control

Clicking "Screen" icon, the system will enter into the following interface:

The user can set the brightness control, screen-on timeout and screen saver interval. Click "Save" icon to save the settings.

2.4.2 Sound

Clicking "Sound" icon, the system will enter into the following interface:

The user can set the call volume, prompt volume,media volume(day),media volume(night) and night time. Click "Save" icon to save the settings.
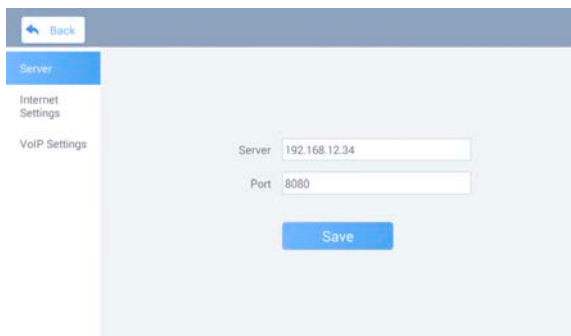

2.4.3 WEB/Server

2.4.3.1 Server

Clicking "Server" icon, the system will enter into the following interface:

Server：IP address of on-site server.

Port：Port No. corresponding to on-site server.

Click "Save" icon to save the settings.

2.4.3.2 Internet Settings

Click "Internet Settings" icon to enter into the following interface:

IP: the system will automatically display IP address of the bedside terminal.

IP address is unique.

The default Mask address is 255.255.255.0. Normally, it is unnecessary to modify. If the user would like to modify it, a keypad will pop up when clicking the setting box twice. Enter your new Mask address.
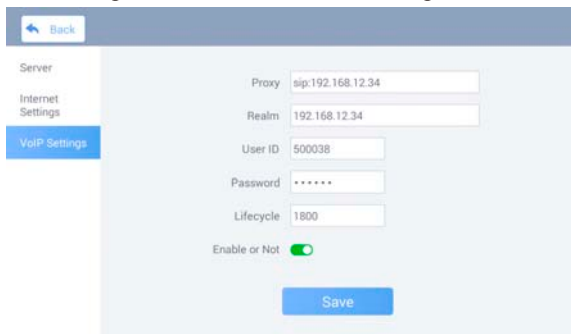
The Gateway in one system must be on the same segment.

DNS: domain name resolution address (DNS of local operator). If bedside terminal is used on the WAN, the address must be entered correctly. If it is used on the LAN, the address can be ignored.

Click "Save" to save the settings.

2.4.3.3 VOIP

Click "VOIP Settings" icon to enter into the following interface:

Proxy: URL of sip proxy server, the format is sip:ip or sip:realm name.

Realm: The realm of the device, same as IP or realm name.

User ID: Corresponding SIP account of device on management platform.

Password: Password of SIP account, automatically assigned by the administrator of sip proxy server.

To connect with SIP network phones from other manufacturers, check "Enable" and fill in "User ID" with the number registered on SIP server.

Click "Save" icon to save the settings.

2.4.4 Device Setup

2.4.4.1 Device Setup

Click "Device Setup" icon to enter into the following interface:

Ward Area No.：Code of the ward where the device is located.

Ward No.：Number of inpatient ward where the device is located.

Bed No.：Number of bed where the device is located.

Nurse Terminal ID：SIP No. of nurse terminal called by this bedside terminal.

Nurse Terminal IP：IP address of nurse terminal called by this bedside terminal.

Customer Service Center：Call group No. of ward where the device is located.

Click "Save" to save the settings.
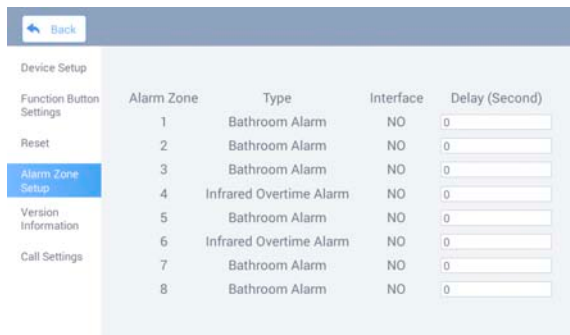
Note: The customer service center can also be obtained automatically from the server. When the ward area number, ward number and bed No. are filled in correctly and the setup information is consistent with the device information on management platform, the customer service center and other information will be obtained automatically.

← Back	
Device Setup	
Function Button Settings	Ward Area No. 9
	Ward No. 901
Reset	Bed No. 9012
Alarm Zone Setup	Nurse Terminal ID 500037
Version Information	Nurse Terminal IP 192.168.12.131
Call Settings	Customer Service Center 555
	Save

2.4.4.2 Zone

Click "Alarm Zone Setup" icon to enter into the following interface:

In this interface, the user can view the information of alarm device connected to the bedside terminal.

Alarm Zone	Type	Interface	Delay (Second)
1	Bathroom Alarm	NO	0
2	Bathroom Alarm	NO	0
3	Bathroom Alarm	NO	0
4	Infrared Overtime Alarm	NO	0
5	Bathroom Alarm	NO	0
6	Infrared Overtime Alarm	NO	0
7	Bathroom Alarm	NO	0
8	Bathroom Alarm	NO	0

(Sidebar: Device Setup / Function Button Settings / Reset / Alarm Zone Setup / Version Information / Call Settings)

2.4.4.3 Version

Click "Version" icon to enter into the following interface:

AB 720M3 V3.0.4
2020-06-01 14

(Sidebar: Device Setup / Function Button Settings / Reset / Alarm Zone Setup / Version Information / Call Settings)

The user can look over the relevant information.

Web Settings

Connect bedside terminal and PC to the network switch on the same LAN. Input IP address of bedside terminal in the web browser of PC, then input the user name and password(the default name is admin, the password is 123456) to enter into the following interface:
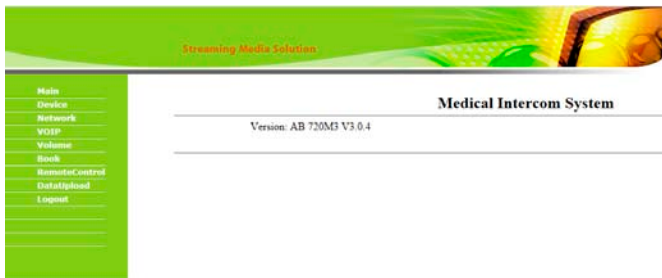
1. Device Settings:

Click "Device" icon on the interface to enter into the following interface:

Server: IP address of device server.

Server Port: Port No. of server.

Seat:The corresponding call group number set on the management platform for this bedside terminal.

Host User:The sip account of the nurse terminal connected to the bedside terminal.

Host IP:The IP address of the nurse terminal connected to the bedside terminal.

Once this is set up, check "Enable" and click the key "Submit" to enable new settings.

2. Network Settings:

Click "Network" icon on the interface to enter into the following interface:

IP: IP address should be unique in the same Network.

Mask: the default Mask is 255.255.255.0.

Gateway: it depends on network segment of IP address.

DNS: it depends on Network.

Click "Submit" icon to confirm settings.

3. VOIP:

Click "VOIP" icon on the interface to enter into the following interface:

Proxy: URL of SIP proxy server in format: sip:ip or sip: domain name.

Realm: realm of the device, generally the same as IP or domain name.

User: user name assigned by SIP server.

Password: password assigned by SIP server.

Once this is set up, check "Enable" and click the key "Submit" to enable new settings.
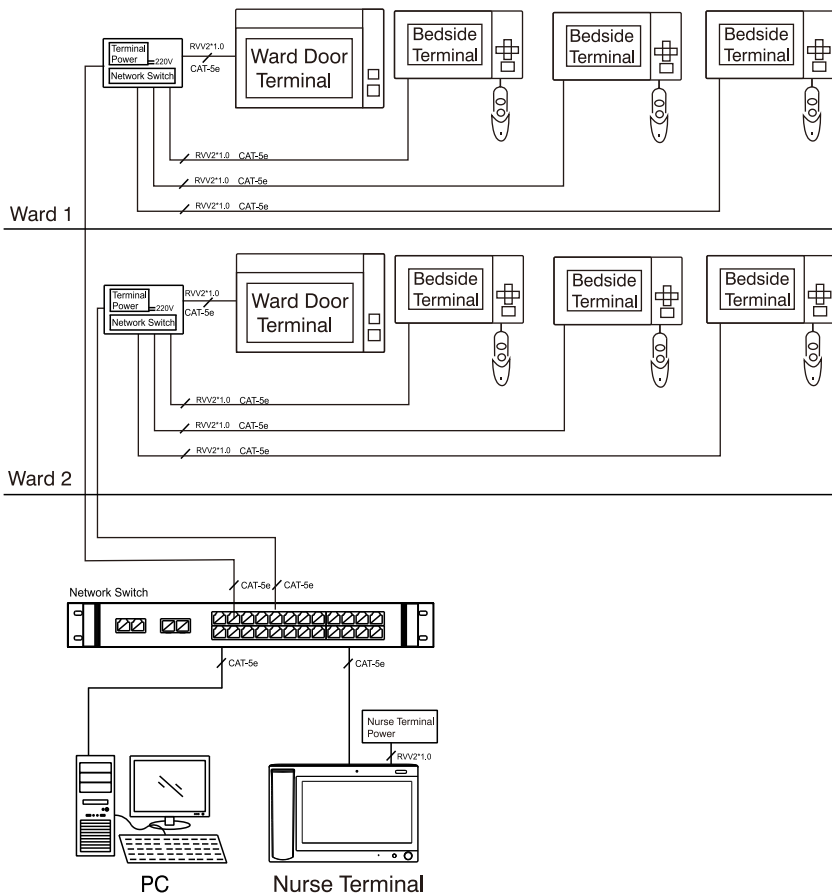
4. Logout

Click "Logout" icon on the interface to enter into the following interface:

Click "Submit" icon to log out of the system.

System Configuration

Ward 1

Ward 2

Network Switch

PC   Nurse Terminal

System Diagram
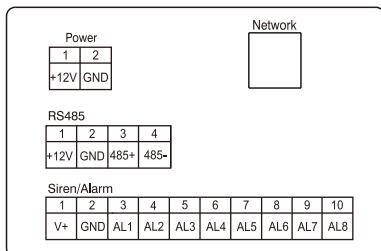
HS1 S3
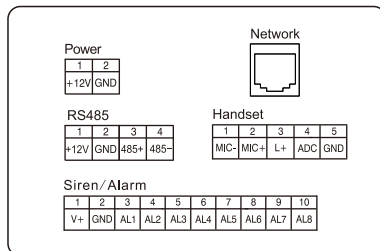
HS15
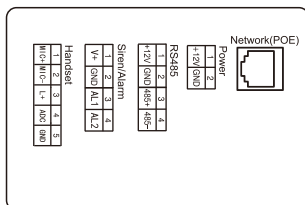
HS3 HS7

1. Power

Power input interface:connect with 12V power adapter.

Power Interface   12V Power
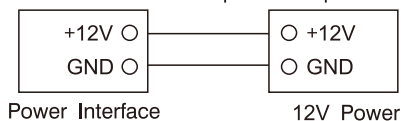
2. Network

Connect with nurse terminal, ward door terminal or other network equipment by network switch.

When bedside terminal has POE function, the interface can supply power by connecting with POE network switch. If network interface has 12V power supply, pin No. 4 and 5 of RJ45 interface should connect with +12 of power interface, and pin No. 7 and 8 should connect with GND of power interface.

CAT-5e

Network
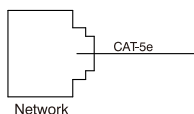
3. RS485

It can connect to other equipment with RS485 interface.

RS485 interface can output 12V/100mA power supply. If RS485 equipment to be connected doesn't require the power supply, no need to connect +12V.

```
+12V ⊕ ─────────── ⊕ +12V
 GND ⊕ ─────────── ⊕ GND
485+ ⊕ ─────────── ⊕ 485+
485- ⊕ ─────────── ⊕ 485-
```
RS485 Interface   RS485 Equipment

4. Siren/Alarm

When alarm sensor is triggered, the output power is 12V/100mA.

Each interface of alarm zone can be connected with normally-open switch, such as bathroom SOS button.

```
V+   ○ ─────────────────────────── ○
GND  ○ ─────────────────────┬───── ○   Alarm facility
AL1  ○ ────────┬──[ ⟋ ]─────┘
AL2  ○         │    Normally-open sensor
AL3  ○         │
AL4  ○         │
AL5  ○         │
AL6  ○         │
AL7  ○         │
AL8  ○ ────────┴──[ ⟋ ]───────────
```
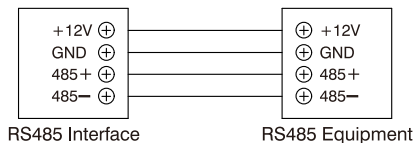Alarm   Normally-open sensor

-17-
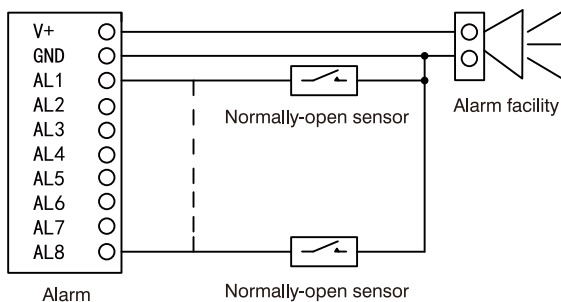
Model: S3
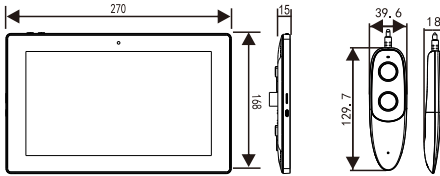
Bedside Terminal Dimensions:270*168*15mm

Handset Dimensions:39. 6*129.7*18mm
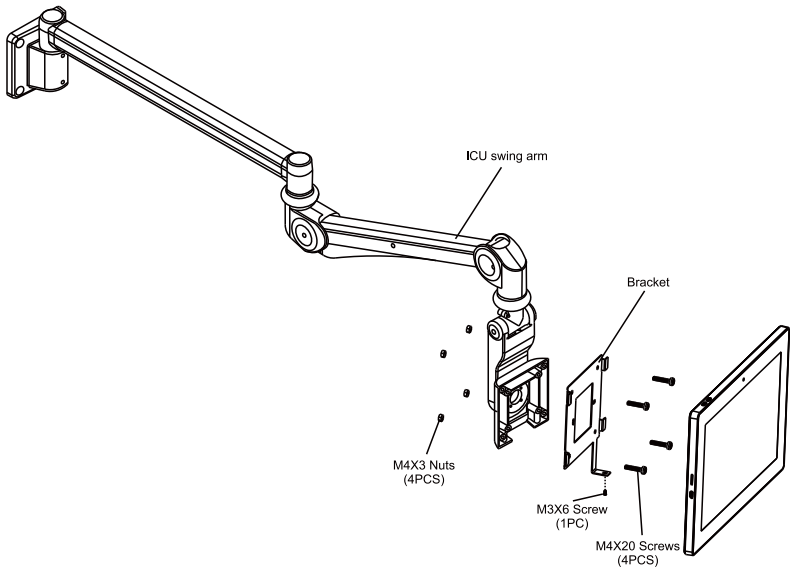
Installation method:

Step 1. Fix the bracket (the hole on the bracket is 75*75mm) to the ICU swing arm with four pieces of M4*20 screws and nuts.

Step 2. Connect the relevant cables to the bedside terminal, and then hang it on the bracket.

Step 3. Fix the bedside terminal with the screw(M3X6) on the bottom, and then debug the bedside terminal to complete the installation.

Note: The minimum load of ICU bracket must be <=0.5kg

Model: S3

Appearance dimension	Installation diagram
270 168 15 Dimensions：270*168*15mm	Bracket Screws (4PCS) Screw (1PC) Bedside Terminal Trepanning Size on Equipment Belt

Installation method:
Step 1. The trepanning size on ward equipment belt is as shown in the above diagram.
Step 2. Fix the bracket on the equipment belt.
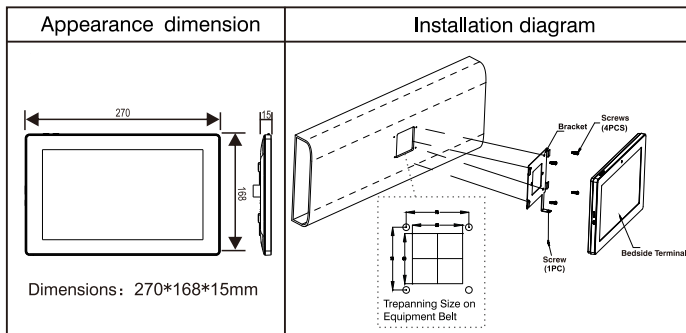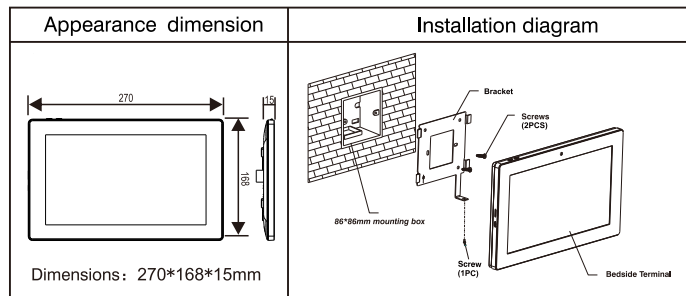Step 3. Connect the relevant cables to the bedside terminal, and then hang the terminal on the bracket.
Step 4. Fix the bedside terminal with the screw on the bottom, and then debug the bedside terminal to complete the installation.

Model: S3

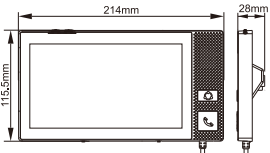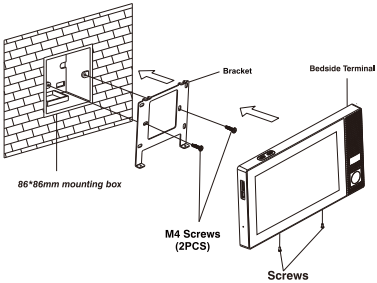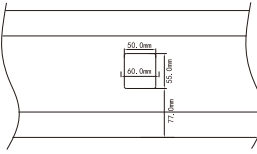| Appearance dimension	Installation diagram
270 168 15 Dimensions：270*168*15mm	Bracket Screws (2PCS) 86*86mm mounting box Screw (1PC) Bedside Terminal

Installation method:
Step 1. The hole for 86*86mm mounting box is reserved in the wall.
Step 2. Fix the bracket.
Step 3. Connect the relevant cables to the bedside terminal, and then hang the terminal on the bracket.
Step 4. Fix the bedside terminal with the screw on the bottom, and then debug the bedside terminal to complete the installation.

Model: HS1

Appearance dimension	Installation diagram
Trepanning Size on Equipment Belt	**Installation diagram**

Installation method:
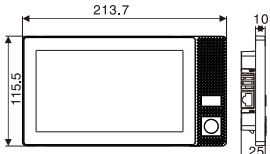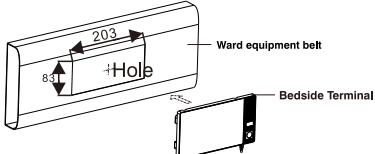
Step 1. The hole for 86*86mm mounting box is reserved in the wall. (The equipment belt doesn't need the mounting box.)

Step 2. Fix the bracket.

Step 3. Connect the relevant cables to the bedside terminal, and then hang the terminal on the bracket.

Step 4. Fix the bedside terminal with the screws on the bottom, and then debug the bedside terminal to complete the installation.
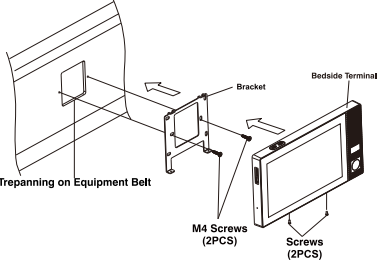
Model: HS3

Appearance dimension	Installation diagram

Installation method:

Step 1. Make a hole in the ward equipment belt. The hole should be centered at position. The hole size is 83*203 (tolerance+0.5). Since the trepanning size requires high precision, it is recommended to use a punching mold to make the hole. Clean up the burrs which are facing inward, otherwise, it will affect the product's installation.

Step 2. Connect the relevant cables to the bedside terminal.

Step 3. Press the bedside terminal firmly into the opening. After four buckles make a clear sound, check whether the terminal is installed in place.

Note: Because there are tolerances in the openings, if the bedside terminal is loose after being assembled, remove it and add EVA pads on the upper and right sides of the rear cover of the bedside terminal according to the degree of looseness. The EVA pads need to be glued from the root of the side wall on the rear cover.

Model: HS7

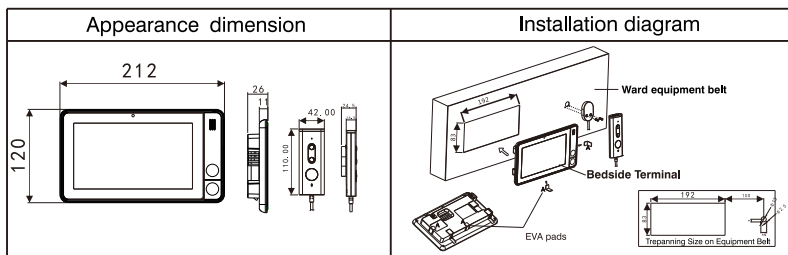| Appearance dimension	Installation diagram

Installation method:

Step 1. Make a hole in the ward equipment belt. The hole should be centered at position. The hole size is 83*192 (tolerance+0.5). Since the trepanning size requires high precision, it is recommended to use a punching mold to make the hole. Clean up the burrs which are facing inward, otherwise, it will affect the product's installation.

Step 2. Connect the relevant cables to the bedside terminal.

Step 3. Press the bedside terminal firmly into the opening. After four buckles make a clear sound, check whether the terminal is installed in place.

Note: Because there are tolerances in the openings, if the bedside terminal is loose after being assembled, remove it and add EVA pads on the upper and right sides of the rear cover of the bedside terminal according to the degree of looseness. The EVA pads need to be glued from the root of the side wall on the rear cover.
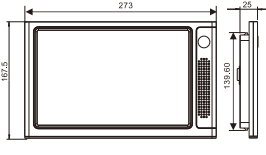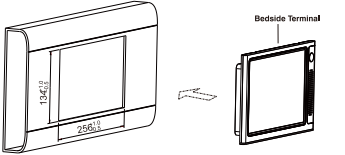
Model: HS15

Appearance dimension	Installation diagram

Installation method:

Step 1. Make a hole in the ward equipment belt. The hole should be centered at position. The hole size is 134*256 (tolerance+0.5). Since the trepanning size requires high precision, it is recommended to use a punching mold to make the hole. Clean up the burrs which are facing inward, otherwise, it will affect the product's installation.
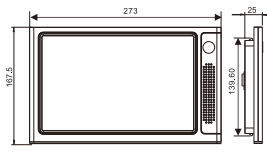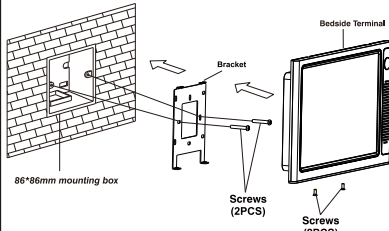
Step 2. Connect the relevant cables to the bedside terminal.

Step 3. Press the bedside terminal firmly into the opening. After four buckles make a clear sound, check whether the terminal is installed in place.

Note:
1.The thickness of the iron sheet in the opening of the ward equipment belt must be less than 1.5mm.
2.Because there are tolerances in the openings, if the bedside terminal is loose after being assembled, remove it and add EVA pads on the upper and right sides of the rear cover of the bedside terminal according to the degree of looseness. The EVA pads need to be glued from the root of the side wall on the rear cover.

Appearance dimension	Installation diagram

Installation method:

Step 1. The hole for 86*86mm mounting box is reserved in the wall.

Step 2. Fix the bracket.

Step 3. Connect the relevant cables to the bedside terminal, and then hang the terminal on the bracket.

Step 4. Fix the bedside terminal with the screw on the bottom, and then debug the bedside terminal to complete the installation.

Troubleshooting

The bedside terminal cannot start up or power off automatically.

• Check whether it has power-failure, and power it on again.

The bedside terminal display screen is too dim.

• Check whether the brightness and contrast settings of screen are correct.

No sound during the communication.

•Check whether the bedside terminal is set to silent mode or the volume is set to the lowest.

Multimedia files cannot be played normally.

• Check whether the system supports the file format. Please refer to multimedia setting for details.

Touchscreen responses slowly or cannot make calibnation.

• Take down any protective paster, since it may affect identification and input for device;
• Ensure the finger is dry and clean when clicking touchscreen;
• Restart the device to clear any temporary software error.

The temperature of device is too high.

• Long-termuse leads to high emperature. It's normal and will not affect the device's use life and performance.

Safety Instructions

In order to protect you and others from harm or your device from damage, please read the following information before using the device.

Do not install the device in the following places:
- Do not install the device in high-temperature and moist environment or the area close to magnetic field, such as the electric generator, transformer or magnet.
- Do not place the device near the heating products such as electric heater or the fluid container.
- Do not place the device in the sunshine or near the heat source. This might cause discoloration or deformation of the device.
- Do not install the device in an unstable position to avoid the property losses or personal injury caused by the falling of device.

Guard against electric shock, fire and explosion
- Do not use damaged power cord, plug or loose outlet.
- Do not touch the power cord with wet hands or unplug the power cord by pulling.
- Do not bend or damage the power cord.
- Do not touch the device with wet hands.
- Do not make the power supply slip or cause the impact.
- Do not use the power supply without the manufacturer's approval.
- Do not have the liquids such as water go into the device.

Clean Device Surface
- Clean the device surfaces with soft cloth dipped in some water, and then rub the surface with dry cloth.

Other Tips
- In order to prevent damage to the paint layer or the case, please do not expose the device to chemical products, such as the diluent, gasoline, alcohol, insect-resist agents, opacifying agent and insecticide.
- Do not knock on the device with hard objects.
- Do not press the screen surface. Overexertion might cause flopover or damage to the device.
- Please be careful when standing up from under the device.
- Do not disassemble, repair or modify the device at your own discretion. The arbitrary modification is not covered under warranty. When any repair required, please contact the customer service center.
- If there is abnormal sound, smell or fume in the device, please unplug the power cord immediately and contact the customer service center.
- When the device isn't used for a long time, the adaptor and memory card can be removed and placed in dry environment.