KVM切换器说明书
note:
材质：100g白卡
尺寸：120*180mm
折页方式：装订版

🟥 185C

LCD KVM智能控制平台
产品用户手册

用户手册

USER MANUAL

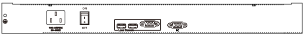
产品功能

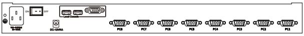
KVM是Keyboard、Video、Mouse的缩写，即集键盘、鼠标、显示于一体的智能切换控制平台。KVM主机切换系统，即用单台或数台KVM将多台主机连接在一起，实现单用户使用控制平台（一套键盘、鼠标、显示器）来控制多台主机的功能。

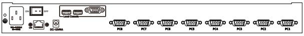
本系列KVM控制平台具有提高效率、使用简单、易于管理、节约成本、环保节能 等特点，其高度为标准1U,符合19”上架结构，节省机柜85%以上使用空间。

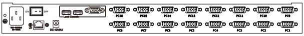
本系列KVM控制平台支持SUN、IBN、HP、DELL、宝德、浪潮、曙光、联想等原装服务器和研华、研祥、CRESUN、大众、威达、艾讯等各类工控机，支持DOS、Winow 2000、WinXP、Win7、LINUX、NOVELL 等多种操作系统。

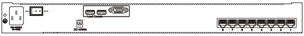
产品示意图

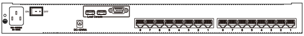

VGA接口（单口）

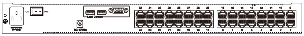

VGA接口（8PC）

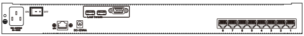

VGA接口（8PC）支持远程管理

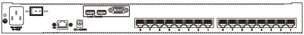

VGA接口（16PC）支持远程管理

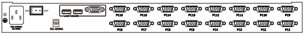

CAT5/6接口（8PC）


CAT5/6接口（16PC）

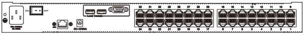

CAT5/6接口（32PC）


CAT5/6接口（8PC）支持远程管理


CAT5/6接口（16PC）支持远程管理



VGA接口(16PC)



CAT5/6接口(32PC)支持远程管理

产品特征

1、整合多种规格显示器/鼠标/键盘/智能切换器
2、卓越的视频效果，最佳分辨率可达（详见参数）
3、支持密码保护以及搜索PC服务器名字
4、LCD液晶显示屏调节功能，导轨带自动锁定装置
5、支持完整的DDC功能，未切换计算机也能侦测屏幕型号
6、抽拉式安装设计，可以调整长度以适应机架空间
7、可支持堆叠连接多台设备，最多可管理256台计算机
8、无需额外软件，并可通过热键，或OSD屏幕菜单功能以选择切换计算机主机
9、99键键盘和TouchPAD触摸滑动鼠标
10、支持各种服务器操作系统:Dos/Windows系列、Linux、Unix、MacOS8.6/9/10xSUN Solaris 8/9

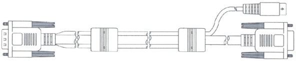
详细规格

性能参数		产品规格	
		17.0"系列	19.0"系列
液晶显示	显示屏类型	SXGA LED	SXGA LED
	显示屏大小	4:3 17英尺	4:3 19英尺
	可视面积(mm)	340(H)×270(V)	376.32(H)×301.06(V)
	分辨率	1280×1024	1280×1024
	色彩显示	16.7M	16.7M
	亮度	300(cd×m2)	300(cd×m2)
	对比度	1000:1	1000:1
	像素间隔	0.264(H)×0.264(W)	0.264(H)×0.264(W)
	使用寿命	LCD MTBF >50000H, 背光源MTBF:30000H	LCD MTBF >50000H, 背光源MTBF:30000H
	功率	25W	25W
键盘	键盘设计	99键	99键
	兼容性	IMB/AT,支持Microsoft Windows9X,/Me/nt/2K/XP	IMB/AT,支持Microsoft Windows9X,/Me/nt/2K/XP
	键盘接口	USB	USB
	使用寿命	＞1.000.000次	＞1.000.000次
鼠标触摸板(2个按键)	硬件接口	USB	USB
	操作系统	支持Microsoft Windows9X/Me/nt/2K/XP	支持Microsoft Windows9X/Me/nt/2K/XP
	使用寿命	＞1.000.000次	＞1.000.000次
电源输入	DC12V 4A 48W		
外壳颜色	黑色烤漆		
外壳材质	镀锌电解板/铝合金		
净重/毛重		(13.8/18.5KG)/(15.4/20.1KG)	
尺寸(W×D×H)(mm)		435×580×44.5MM	
机柜安装深度	600mm-810mm(选用适当的挂耳)		
工作温度	0-60度		
储藏温度	-20-65度		

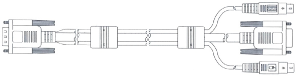
安装步骤

请按照安装示意图和以下的操作步骤进行安装：

1、请确定即将进行连接的所有设备的电源已关闭，包括原来已有设备的电源也已关闭。
2、使用一套KVM线缆，将KVM后面端口用KVM专用线缆与服务器连接起来。
3、a) 对于USB连接头，将线材一个VGA与KVM后面VGA连接，另一端，将线材的VGA与服务器VGA连接，线材USB与服务器USB接口连接。



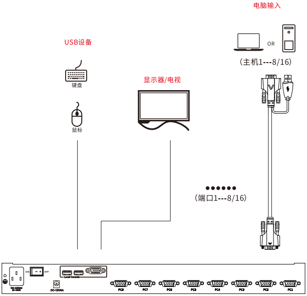
b)对于PS/2连接头，将键盘、鼠标和显示器连接头分别插入主机的对应端口



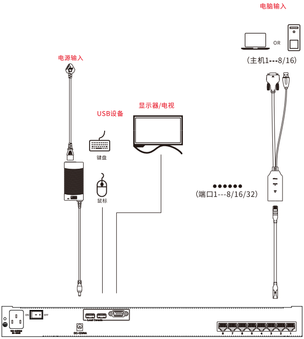
4、备注：重复步骤2和3，继续连接其他主机。
5、对于所有二阶设备，将电源转换线缆一端插入电源插口，另一端插入AC电源
6、开启第一节设备电源。
7、开启所有主机电源。

备注：电源开启顺序要求，首先开启服务器，然后开启KVM电源。

安装示意图



VGA接口示意图



CAT5/6 接口示意图

切换方法

8 端口系列:

主机1-8:直接面板上$\underset{1}{\circledcirc}$ ··· $\underset{8}{\circledcirc}$,直接切换/OSD热键切换

16端口系列:

主机1-16:直接面板上$\underset{1}{\circledcirc}$ ··· $\underset{16}{\circledcirc}$,直接切换/OSD热键切换

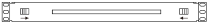
32端口系列:

主机1-32:直接面板上$\underset{1}{\circledcirc}$ ··· $\underset{32}{\circledcirc}$,直接切换/OSD热键切换(双位键:例如:1号端口为01,10号端口为10以此类推)

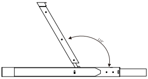
LCD KVM 产品使用说明

1、操作步骤

1) 使用前请再次确认:液晶KVM智能控制平台已经安全接地,KVM信号线、电源线已经正确连接。
2) 按箭头方向释放前面板锁扣(见下图)。



3) 翻开面前板,LCD显示屏可以翻开至110度,使用时请调整至最佳可视角度,便于操作和使用(见下图)。



4) 按下LCD液晶屏上的OSD电源开关,LCD液晶屏电源指示灯变成绿色,液晶屏开始工作,此时可使用键盘、鼠标触摸板进行正常操作。

2、OSD(屏幕显示菜单)

主菜单---提供8个菜单进行操作,详情如下:

主菜单	功能
01 LANGUAGE	OSD语言选择
02 PORT NAME EDT	编辑端口名称
03 PORT SEARCH	通过端口名称可快速搜索
04 USER SECURITY	更改密码,增减用户
05 ACCESS LIST	确定用户访问权限
06 HOTKEY	更改热键
07 TIME SETTINGS	更改自动扫描时间间隔
08 OSD MOUSE	更改鼠标指针速度

3、显示最佳效果调节

LCD OSD 菜单功能说明

1) POWSW:打开或者关闭电源
2) UP:图标上移/右移/增大OSD中选择调节的参数值
3) DOWN:图标下移/左移/减少OSD中选择调节的参数值
4) MENU:进入OSD菜单/确认
5) AUTO/EXIT:自动侦测设置显示参数值/退出

4、初始热键

通过键盘的操作,可轻松、快捷的切换到对应的视口。

双击 Caps Lock + Space = OSD菜单

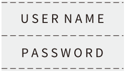
双击 Caps Lock + S = 自动扫描

双击 Caps Lock + 1 0 1 ··· 1 0 8 / 1 1 6 = 选择服务器端口

双击 Caps Lock + ↑ / ↓ = 上/下端口

注:请勿使用小键盘区数字键。

5、登陆窗口



USER NAME

PASSWORD

注:

预设状态为管理员:

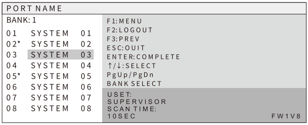
用户名:“00000000”

密　码:“00000000”

端口名称

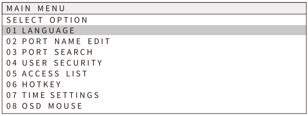
第一页显示当前端口名称和已选端口,以及操作提示。

OSD菜单



```
PORT NAME
BANK:1              F1:MENU
01  SYSTEM  01      F2:LOGOUT
02* SYSTEM  02      F3:PREV
03  SYSTEM  03      ESC:OUIT
04  SYSTEM  04      ENTER:COMPLETE
05* SYSTEM  05      ↑/↓:SELECT
06  SYSTEM  06      PgUp/PgDn
07  SYSTEM  07      BANK SELECT
08  SYSTEM  08      USET:
                    SUPERVISOR
                    SCAN TIME:
                    10SEC                FW1V8
```

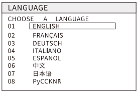
主菜单



```
MAIN MENU
SELECT OPTION
01 LANGUAGE
02 PORT NAME EDIT
03 PORT SEARCH
04 USER SECURITY
05 ACCESS LIST
06 HOTKEY
07 TIME SETTINGS
08 OSD MOUSE
```

5、1 语言

OSD菜单支持8种语言(英语,法语,德语,意大利语,西班牙语,简体中文,日语以及俄语)预设的语言是英语。(见下图)

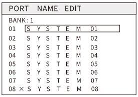


```
LANGUAGE
CHOOSE   A   LANGUAGE
01       ENGLISH
02       FRANÇAIS
03       DEUTSCH
04       ITALIANO
05       ESPANOL
06       中文
07       日本语
08       PyCCKNŇ
```

6、编辑端口名称

第一栏为层级号码,第二栏为端口选择清单

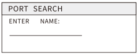
使用键盘或鼠标悬着端口。端口选择后,您可以按住Enter键或者移动指针点击端口名称。按住PgUp键或PgDn键选择前一层级或下一层级。按住Enter键编辑端口名称。按住Esc键取消更改或者按住Enter键完成编辑。(见下图)



```
PORT   NAME   EDIT
BANK:1
01    S Y S T E M   01
02    S Y S T E M   02
03    S Y S T E M   03
04    S Y S T E M   04
05    S Y S T E M   05
06    S Y S T E M   06
07    S Y S T E M   07
08 ×  S Y S T E M   08
```

7、端口搜索

通过端口名称查找计算机.输入“*”将显示所有的端口名称。



```
PORT SEARCH
ENTER   NAME:
```

8、用户安全机制

用户级别：管理员和用户。可以设置一个管理员和8位用户。
按住Enter 键进行编辑。左上角的“S”代表管理员，“1-8"代表用户。名称和密码最多可输入8个字符（A~Z和0~9）。(见下图)

```
USER SECURITY
   NAME              PASSWORD
S  00000000          00000000
 1
 2
 3
 4
 5
 6
 7
 8
```

9、访问列表

只有管理员可以设置访问列表。第一栏是端口名称，第二栏为服务器/计算机名称列表最后一栏为每位用户的访问权利。使用Enter键或鼠标左键可以更改每个端口的访问权限。“X”代表访问无效，“O”代表访问有效。(见下图)

```
ACCESS  LIST
BANK:1               1 2 3 4 5 6 7 8
01  [SYSTEM    01]  [0] 0 0 0 0 0 0 0
02  SYSTEM     02    0 0 0 0 0 0 0 0
03  SYSTEM     03    0 0 0 0 0 0 0 0
04  SYSTEM     04    0 0 0 0 0 0 0 0
05  SYSTEM     05    0 0 0 0 0 0 0 0
06  SYSTEM     06    0 0 0 0 0 0 0 0
07  SYSTEM     07    0 0 0 0 0 0 0 0
08  SYSTEM     08    0 0 0 0 0 0 0 0
```

10、热键

只有一些键盘也许没有安装所有的特殊按键，请确保您选择的按键可以进行操作。(见下图)

```
HOTKEY
 SELECT  HOTKEY:
 Scroll  Lock
 Number  Lock
[Caps  Lock          ]
 Left  Ctrl
 Right  Ctrl
 Left  Alt
 Right  Alt
 Left  Win
 Right  Win
```

11、扫描时间

通过端口名称查找计算机。输入“×”将显示所有的端口名称。
扫描时间可设置10-99秒。

```
TIME   SETTINGS

 SCAN   TIME:
[10] SEC
```

使用保养

为了延长机器的使用寿命，及减少不必要的资源浪费，正确使用KVM请做如下工作：
1) 按下LCD液晶屏上的电源开关，LCD液晶屏电源指示灯由绿色变成红色，表示液晶屏关闭。
2) 合上LCD液晶屏面板，将其面板锁定。
3) 将控制平台推入机柜，当完全推入后将控制平台面板侧面锁扣紧。

常见问题解答

1、问题：屏幕无图像
  1) 如果电源指示灯灭；检查电源线是否连接牢固。
  2) 如果电源指示灯显红色：检查视频电缆连接是否牢固，同时检查计算机是否开启或在待机状态。
  3) 电源指示灯显绿色：检查行同步是否超出范围。
  4) 屏幕色差情况下，可尝试按屏幕下方的AUTO按键，识别设备。

2、问题：鼠标/键盘失灵
如果检查键盘的Num LOCK 的指示灯没有闪亮而显示屏正常：检测电脑主机是否死机，检测鼠标/键盘线与主机的接口是否连接牢固。

3、问题：图像不稳定（杂波、抖动等等）
检查计算机刷新频率是否与本机匹配

必须使用指定本机配线操作设备

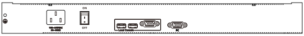
产品使用环境

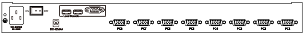
工作温度	0～60度
工作温度	5%～90%
储存温度	-20～65度

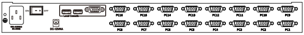
Instruction

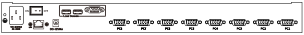
The KVM is the abbreviation of Keyboard, Video and Mouse. It merge the keyboard/mouse/display into one intelligent switch control platform. The KVM main engine switch system, connect multiple computers with Single Or several KVMs to enable users to use a single control platform(a set of keyboards, mice, monitors) to control the functions of managing multiple computers. The features of this KVM switch series is efficient, easy to use and easy to manage. Cost saving, protect the environmental and save the energy, etc. Its height is standard 1U, suitable for the 19-inch rack structure, saves more than 85% of the cabinet space.
This KVM series control platform support SUN, IBN, HP, DELL, Power Leader, inspur, SHUGUANG, Lenovo and other original system and Advantech, EVOC, CRESUN, Volkswagen, Vivitar, Axiom and other industrial control computer. Also support DOS/Winow2000/WinXP/Win7/LINUX/NOVELL operation system.

Schematic Diagram

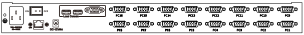

VGA interface (single port)


VGA interface (8PC)

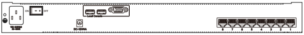

VGA interface (16PC)



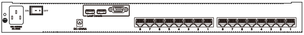
VGA interface (8PC) supports remote management



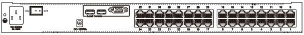
VGA interface (16PC) supports remote management



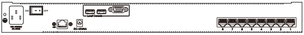
CAT5 / 6 interface (8PC)



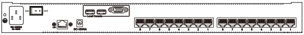
CAT5 / 6 interface (16PC)



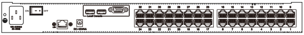
CAT5 / 6 interface (32PC)



CAT5 / 6 interface (8PC) supports remote management



CAT5 / 6 interface (16PC) supports remote management



CAT5 / 6 interface (32PC) supports remote management

Product Features

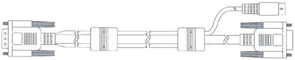
1. Integrate multiple specifications of display / mouse / keyboard / intelligent switch
2. Excellent video effect, the best resolution can be achieved (see parameters for details)
3. Support password protection and search PC server name
4. LCD LCD screen adjustment function, guide rail with automatic locking device
5. Support the complete DDC function, can detect the screen model without switching the computer
6. Pull-out installation design, the length can be adjusted to suit the rack space
7. It can support stacking multiple devices and can manage up to 256 computers
8. No additional software is required, and the host computer can be switched by hotkey or OSD screen menu
9. 99-key keyboard and TouchPAD touch sliding mouse
10. Support various server operating systems: Dos / Windows series, Linux, Unix, MacOS8.6 / 9 / 10xSUN Solaris 8/9

Specification

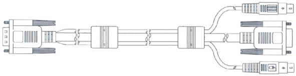
Performance parameters		Product specification	
		17.0" series	19.0" series
LED display	Display type	SXGA LED	SXGA LED
	Display size	4:3 17 inches	4:3 19 inches
	Visible area (mm)	340 (H) ×270 (V)	376.32 (H)×301.06 (V)
	Resolution	1280×1024	1280×1024
	Color display	16.7M	16.7M
	Brightness	300(cd×m2)	300(cd×m2)
	Contrast	1000:1	1000:1
	Pixel spacing	0.264 (H) ×0.264(W)	0.264 (H) ×0.264(W)
	Working life	LCD MTBF >50000H, Back lightMTBF:30000H	LCD MTBF >50000H, Back lightMTBF:30000H
	Power	25W	25W
Keyboard	Keyboard design	99 keys	99 keys
	Compatibility	IMB/AT,support Microsoft Windows9X,/Me/nt/2K/XP	IMB/AT,support Microsoft Windows9X,/Me/nt/2K/XP
	Keyboard connector	USB	USB
	Working life	>1.000.000 times	>1.000.000 times
Mouse touchpad (2 keys)	Hardware connector	USB	USB
	Operation system	Support Microsoft Windows9X,/Me/nt/2K/XP	Support Microsoft Windows9X,/Me/nt/2K/XP
	Working life	>1.000.000 times	>1.000.000 times
Power input	DC12V 4A 48W		
Shell color	Black paint		
shell texture	SECC/aluminum alloy		
Net weight/rough weight		(13.8/18.5KG)/(15.4/20.1KG)	
Dimension (W×D×H)(mm)		435×580×44.5MM	
Cabinet installation depth	600mm-810mm (select the appropriate hanger)		
Working temperature	0-60℃		
Storage temperature	-20-65℃		

Product Feature

Please follow the installation diagram and the following steps to install:
1. Make sure that the power of all the devices to be connected is turned off, including the power of the existing devices.
2. Use a set of KVM cables to connect the KVM rear ports to the server with KVM special cables.
3. For the USB connector, connect a VGA cable to the VGA behind the KVM, and at the other end, connect the VGA cable to the server VGA, and the USB cable to the server USB interface.



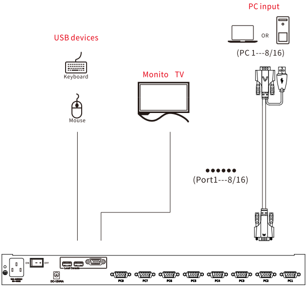
b) For PS / 2 connectors, plug the keyboard, mouse, and monitor connectors into the corresponding ports on the host



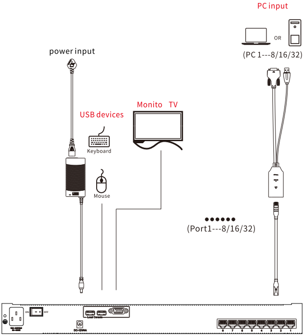
4. Note: Repeat steps 2 and 3 to continue to connect to other hosts.
5. For all second-order devices, plug one end of the power conversion cable into the power socket and the other end into the AC power supply
6. Turn on the power of the first section.
7. Turn on the power of all the hosts.

Note: The power-on sequence requires that the server be turned on first, then the KVM power.

Installation Diagram



VGA interface diagram



CAT5 / 6 interface diagram

Swith Mode

8 port series:

Host 1-8: Keys on the panel ◎ 1 ··· ◎ 8 , which can be directly switched or OSD hot key switch

16 port series:

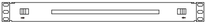
Host 1-16: Keys on the panel ◎ 1 ··· ◎ 16 , which can be directly switched or OSD hot key switch

32 port series:

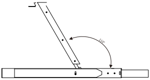
Host 1-32: Keys on the panel ◎ 1 ··· ◎ 32 , which can be directly switched or OSD hot key switch(Two-digit key: for example: port 1 is 01, port 10 is 10, and so on)

LCD KVM Product Instruction

1. Operation step
   1) Please confirm again before use: the KVM intelligent control platform has been safely grounded and the KVM signal cable, power cable are properly connected.
   2) Release the front lock catch in the direction of the arrow. (Refer the picture)



3) Open the front tablet, The LCD display can be flipped to 110 degrees, please adjust the display to the best viewing angle for easy operation and use. (Refer the picture)



4)Press the OSD power button on LCD monitor, when the LCD power indicator light turns green, the monitor start to work, and you can use the keyboard, mouse touchpad for normal operation.

2. OSD (monitor display menu)

Main menu--- Provide 8 menus for operation, details are as follows:

Main menu	Function
01 LANGUAGE	OSD language choosing
02 PORT NAME EDT	Edit the interface name
03 PORT SEARCH	Search by computer name quickly
04 USER SECURITY	Alter the user pass word and add/reduce user
05 ACCESS LIST	Setup access rights
06 HOTKEY	Alter the hotkey
07 TIME SETTINGS	Alter the auto-scan interval
08 OSD MOUSE	Alter the movement speed of the mouse

3. Adjust to the best display visual effect

LCD OSD menu function description.
1) POWSW: turn on or off the power.
2) UP: shift up/right/ the icon Increase the parameter value of the selected adjustment in the OSD.
3) DOWN: shift down/left the icon reduce the parameter value of the selected adjustment in the OSD.
4) MENU: enter OSD menu/ensure.
5) AUTO/EXIT: detect setting display parameter value automatically/exit.

4. Initial hotkey

Switch to the corresponding view interface easily and quickly by the keyboard operation.

Double click [Caps Lock] + [Space] = OSD Menu

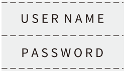
Double click [Caps Lock] + [S] = Auto Scan

Double click [Caps Lock] + [1][0][1] --- [1][0][8] / [1][1][6] = Select serve port

Double click [Caps Lock] + [↑] / [↓] = Up/Down port

Note: Do not use the numeric keys in the keypad area.

5. Login window



USER NAME

PASSWORD

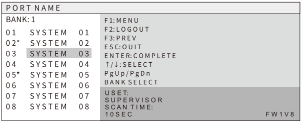
Note:

The default state is administrator:
Username: "00000000"
Password: "00000000"

Port Name

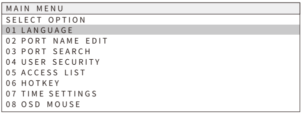
The first page displays the current port name and the selected port, as well as operation prompts.

OSD Menu



```
PORT NAME
BANK: 1                 F1:MENU
01    SYSTEM  01        F2:LOGOUT
02*   SYSTEM  02        F3:PREV
03    SYSTEM  03        ESC:OUIT
04    SYSTEM  04        ENTER:COMPLETE
05*   SYSTEM  05        ↑/↓:SELECT
06    SYSTEM  06        PgUp/PgDn
07    SYSTEM  07        BANK SELECT
08    SYSTEM  08        USET:
                        SUPERVISOR
                        SCAN TIME:
                        10SEC              FW1V8
```

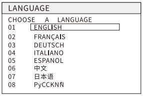
Main Menu



```
MAIN MENU
SELECT OPTION
01 LANGUAGE
02 PORT NAME EDIT
03 PORT SEARCH
04 USER SECURITY
05 ACCESS LIST
06 HOTKEY
07 TIME SETTINGS
08 OSD MOUSE
```

5.1. Language

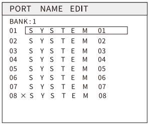
OSD menu support 8 languages (English, French, German, Italian, Spanish, Chinese, Japanese, Russian) the initial language is English. (Refer the following picture)



```
LANGUAGE
CHOOSE  A  LANGUAGE
01      ENGLISH
02      FRANÇAIS
03      DEUTSCH
04      ITALIANO
05      ESPANOL
06      中文
07      日本语
08      PyCCKNŇ
```

6. Edit the interface name

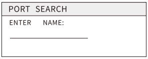
The first column is the hierarchy number. The second column is the selection list of interfaces.
Use the keyboard or mouse to suspend the interface. After the interface selection, you can press the Enter button or move the cursor to click the interface name. Press the PgUp button or PgDn button to select the previous level or the next level. Hold down the Enter bottom to edit the interface name. Hold down the Esc bottom to cancel or hold down the Enter complete the edit. (Refer the following picture)



```
PORT  NAME  EDIT
BANK : 1
01   S Y S T E M   01
02   S Y S T E M   02
03   S Y S T E M   03
04   S Y S T E M   04
05   S Y S T E M   05
06   S Y S T E M   06
07   S Y S T E M   07
08 × S Y S T E M   08
```

7. Search the interface

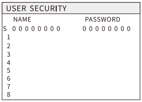
Search the computer by the interface name. Enter the “ × ” will display all the interface name.



```
PORT  SEARCH
ENTER    NAME:
______________
```

8. User security

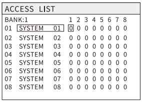
User level: Administrator and user. You can setup an administrator and eight users.
Hold down the Enter bottom to edit. The "S" in the upper left corner represents the administrator; “1-8” represents the user. The name and password can't be entered more than 8 characters (A~Z and 0~9). (Refer the following picture)



```
USER SECURITY
   NAME              PASSWORD
S  0 0 0 0 0 0 0 0   0 0 0 0 0 0 0 0
 1
 2
 3
 4
 5
 6
 7
 8
```

9. Access list

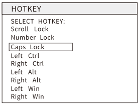
Only the administrator can setup the access list. The first column is the interface number. The second column is the server/computer name list; the last column is the access rights of each user. Use Enter bottom or left mouse bottom to alter the access rights for each interface. "X" means the access is invalid; "O" means the access is valid. (Refer the following picture)



```
ACCESS  LIST
BANK:1                 1 2 3 4 5 6 7 8
01  SYSTEM   01        O O O O O O O O
02  SYSTEM   02        O O O O O O O O
03  SYSTEM   03        O O O O O O O O
04  SYSTEM   04        O O O O O O O O
05  SYSTEM   05        O O O O O O O O
06  SYSTEM   06        O O O O O O O O
07  SYSTEM   07        O O O O O O O O
08  SYSTEM   08        O O O O O O O O
```

10. Hotkey

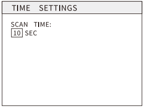
Only some keyboard might not install all the special keys, so please ensure that the button you selected can be operated. (refer the following picture)



```
HOTKEY
SELECT  HOTKEY:
Scroll  Lock
Number  Lock
Caps  Lock
Left  Ctrl
Right  Ctrl
Left  Alt
Right  Alt
Left  Win
Right  Win
```

11. Time setting

Search the computer by the interface name. Enter the “ × ” will display all the interface name.
The scan time can be set from 10 to 99 seconds.



TIME SETTINGS

SCAN TIME:
10 SEC

Maintenance

In order to extend the life of the machine and reduce unnecessary waste of resources, please do the following work:

1) Press the power switch on the LCD monitor, the power indicator light of the LED monitor will turn from green to red; it means the monitor was off.
2) Close the LCD monitor, lock its tablet.
3) Push the control platform into the cabinet, and then lock the side of the control platform tablet.

FAQs

1.Q: Nothing displayed on the monitor
A: 1) If the power indicator light is off; check the power cable connection fit or not.
2) If the power indicator light is red;Check the video cable connection fit or not, check whether the computer is on or standby.
3) If the power indicator light is green, check if the line synchronization is out of range.
4) When the monitor has chromatic aberration,try to press the AUTO button that under the monitor to recognize the device.

2.Q: The mouse/ keyboard doesn't work.
A: If the indicator of the Num LOCK of the check keyboard is not flashing and the monitor is normal, then check if the connection between the mouse cable and keyboard cable is well.

3.Q: The monitor display instability .(clutters and shakes)
A: Check if the computer refresh rate matches this machine.

Please use the specified local wiring to operate.

Using Environment

Working temperature	0～60℃
Working humidity	5%～90%
Storage temperature	-20～65℃