Control Keyboard

Operating Instructions

INDEX

Ⅰ. Keyboard Overview

The keyboard is used for controlling the intelligent Speed dome and pan/tilt. This is the main device between operator and device in the monitoring system. It can be regarded as the main control keyboard, and as the vice-control keyboard.

1. Liquid Crystal Display the LCD display board is regarded as the operation interface between operator and device. It is intuitionist, convenient, understandable and abundant-information.

2. Proportion Joystick[1] (Options: PTZ control joystick --- Control Keyboard and PT control joystick --- Control Keyboard)

   It is convenient, good-handling and flexible-controlling on using this joystick to operate high-speed dome and pan/tilt.

3. The lock function of the keyboard can avoid unauthorized users to operate the keyboard.

4. Provide RS485 control output signal and also offer the standard RS232 control signal.

Ⅱ. Intelligent Keyboard Technical Parameters

1. Communication baud rate: 1200 bps; 2400 bps; 4800 bps; 9600 bps
2. Protocol: Company protocol, HJS, PELCO_D, PELCO_P, SAMSUNG
3. Data Format: N, 8, 1
4. Power input: AC/DC 9V—12V
5. Max controlled Speed dome camera: 1024[2]
6. Power: 5W

Ⅲ. Intelligent Keyboard Drawing
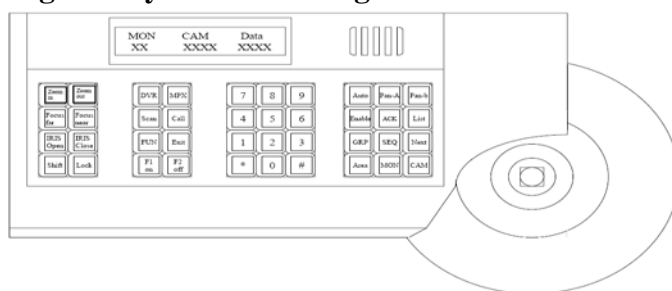
3.1 Intelligent Keyboard Connection

Insert one end of keyboard data line into keyboard port B on the right of its back panel. Insert the other end into wire box. The picture is as below:

---
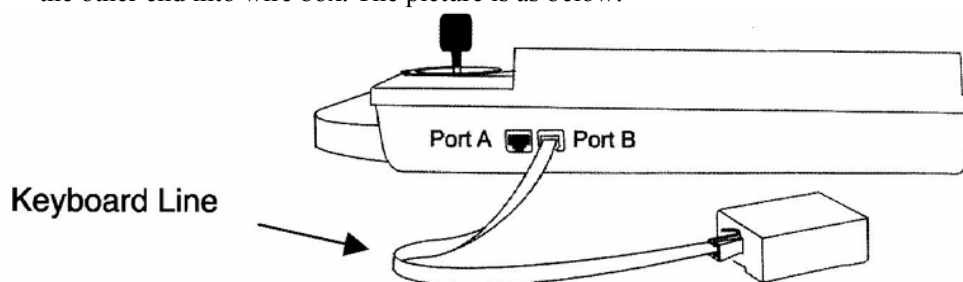
[1] Proportion Joystick: The speed of the joystick is a direct ratio to the running speed of the Speed dome.

[2] The keyboard can set up to 1024 sole addresses. However, it does not control 1024 Speed dome cameras directly. The strength and weakness of the RS485 control signal determines the Speed dome quantity. It can control up to 1024 Speed dome cameras through signal compensation devices. The RS485 can control 256 Speed dome cameras at most if it has no signal compensation.

Wire Box Inner Function Picture
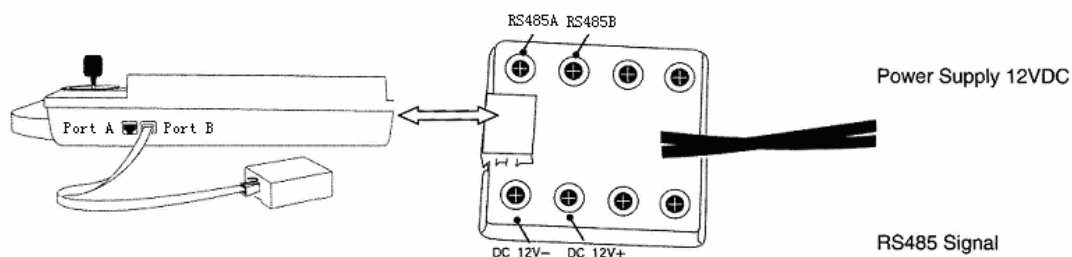
3.2 keyboard Connection with Speed Dome Camera
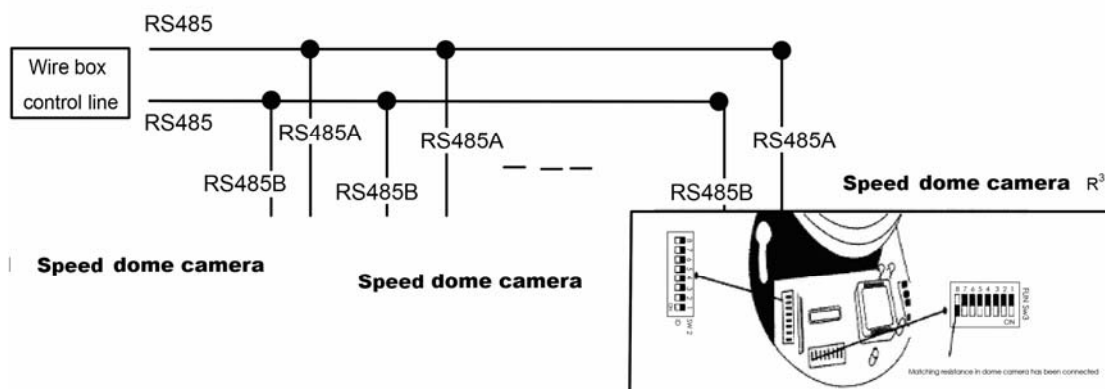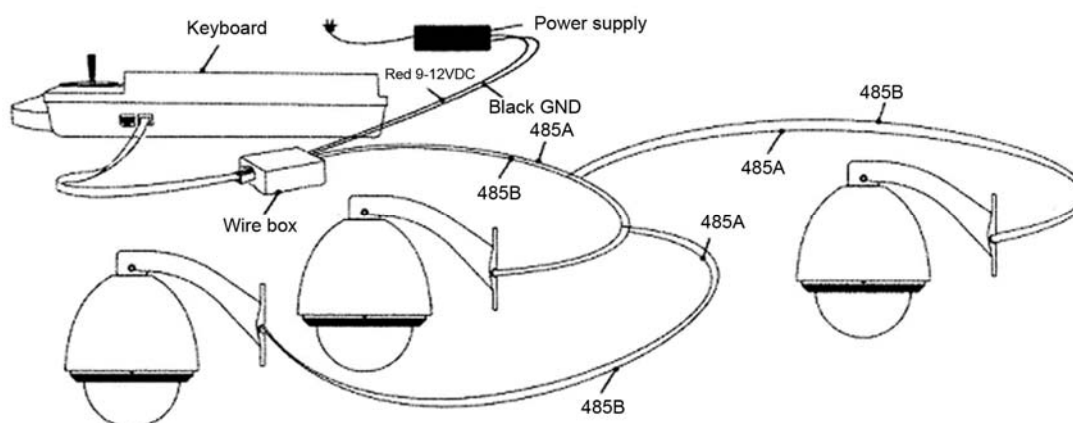
⚠ When Speed dome camera is furthest away from the control keyboard, Please set switch of matching resistance as ON status.

[3] R is on behalf of matching resistance. The farthest Speed dome from the control center should be set as its matching resistance in order to minimize RS485 bus reflection and disturbance. The 8th bit of SW3 shows ON status which means the BUS matching resistance has been connected.

Ⅳ．Function Key
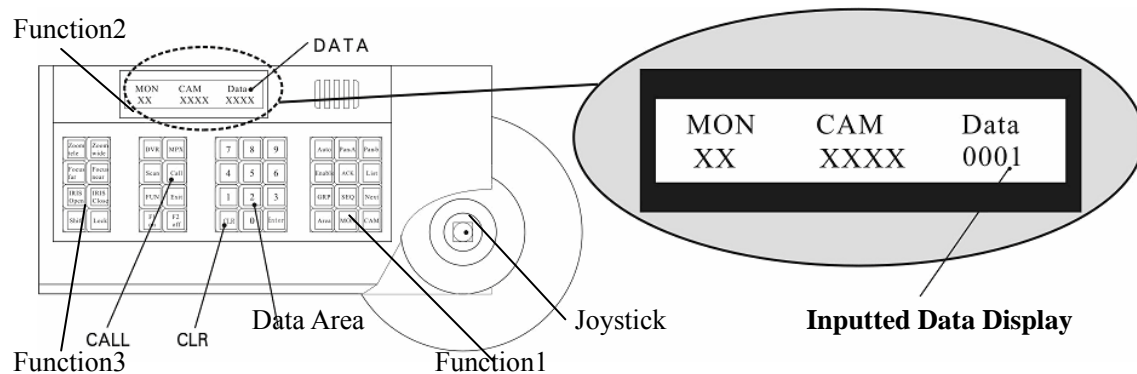
◇ Joystick: Control Speed Dome Camera running: Up, Down, Left, Right, Left-up. Left-down, Right-up, Right-down, camera lens zoom in and zoom out.

joystick can't control Speed dome camera lens zoom in and zoom out. Other functions are the same.

◇Function Area 1: Speed Dome Camera Selection and Auto Scanning Control

◇Number Area: Data Input, Clear and Confirmation

◇Function Area 2: Menu Turning, Exit and Preset Position Set

◇Function Area 3: Speed Dome Camera Lens Control and Keyboard Lock and Unlock

◇Data Display Area: Data Display

Function Key Explanation is As Below:

AUTO key: Finish Speed dome camera auto action

Pan-A key: Set the starting point of Speed auto scanning

Pan-B key: Set the starting point of Speed auto scanning

Enable key: Alarm on set[4]

ACK key： Speed dome camera menu function confirmation

List key: Speed   dome camera menu function selection

CAM key: Speed dome camera address selection

CLR key: Clear the inputted number on the DATA displays area.

Press CLR to delete when inputted number is wrong or need to input it again

ENTER key: When you press the ERTER key, the inputted number in the Data area or selected function is in operation immediately.

Scan key: Adjust Speed dome camera pattern tour function

Call key: Adjust Speed dome camera preset position function

F1 Key: Keyboard menu cursor up.   **F2 Key:** Keyboard menu cursor down.

FUN key: Press the FUN key to select menu items circularly.

EXIT key: Exiting from current menu and return to former menu.

---

[4] This function is only for the high speed dome with alarm linkage, not for the Speed dome camera.

Lock key: After pressing this key, input the password 6688, the keyboard is under locked status.

Open the keyboard by inputting 6688

SHIFT key: Such as <SHIFT>+<AUTO>stands for pressing the SHIFT key and AUTO key.

SHIFT+AUTO key: Start up 360° scanning. SHIFT+ Scan key: Set preset position.

Other keys such as GRP, SEQ, NEXT, AREA, DVR, MPX are designed for our other terminal device.

Camera Lens control

Zoom in: Press <ZOOM in> key/joystick makes a veer rotation

Zoom out: Press <ZOOM out> key/joystick makes a retrorse rotation

Focusing Far: Press<FOCUS far> key

Focusing Near: Press<FOCUS near> key

IRIS open: Press<IRIS open> key

IRIS close: Press<IRIS close> key

Ⅴ.Keyboard Parameters Setting

> ⚠ The intelligent keyboard baud rate and communication protocol should be consistent with that of the Speed dome camera.

5.1 Keyboard Parameters Set

Press the FUN key two times until LCD displays:

> 2. Keyboard setup

Press the ENTER key into keyboard set up menu. Press the FUN key to enter the submenu. Press the EXIT key to exit to the main menu.

5.1.1 Keyboard ID No Set[5]

Press the ENTER key on keyboard screen "keyboard setup " until LCD displays:

> 1.Old Keyboard ID:XX ────────► Current keyboard ID No.
> New Keyboard ID:00 ────────► Input New ID No.

Input the number (0-16), press ENTER for confirmation. New ID will be in effect immediately **ID:00 Main Control Keyboard[6],ID:1-16 Vice Control Keyboard[7].**

[5.] Keyboard ID is used to set multi controlling keyboards when a series of V6 Cameras are required to be controlled. A group of speed domes can be supported by one main control keyboard and 16 vice control keyboards.

[6]. Main control keyboard: Its ID is 00. It enjoys priority when several keyboards are in control. Only one of several keyboards can be set as main control keyboard. ID must be sole, not repeated.

[7]. Vice control keyboard: ID is to be 01-16 keyboard

> ⚠ The default keyboard ID number is No.00. This is also the ID number for the Speed dome camera. Verify the keyboard ID, if the ID No. is not set correctly you will not be able to control the Speed dome camera.

5.1.2 Keyboard Baud Rate Set

Press the FUN key until LCD displays:

| 2. Old Baud Rate: XXXX |
| New BAUD RATE: 0000 |

→ Current baud rate
→ Input new baud rate
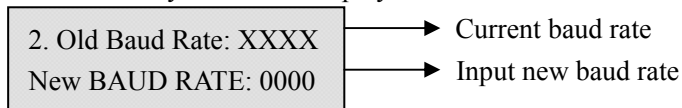
Optional baud rate: 9600, 4800, 2400, and 1200

Default baud rate: 9600bps.

Input your required baud rate in DATA area, and press the ENTER key for confirmation.

New Baud rate is in effect immediately.

5.1.3 Key-press Sound Set

Press the FUN key until LCD displays:

| 3. Current sound: ON |
| Your selections: |

→ Displays current set
→ Select Sound preference
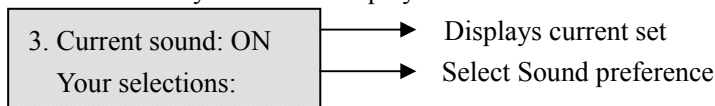
Press <F1/ON> key showing "ON"; turns in the sound function. Press the Enter key for confirmation.

Press <F2/OFF> key showing "OFF"; turns off the sound function. Press the Enter key for confirmation.

The default sound status is open.

5.1.4 Matching Resistance (150Ω) SET[8]

Press the FUN key three times until LCD displays:

| 4. Match Resistor: OFF |
| Your selections: |

→ Displays the current set
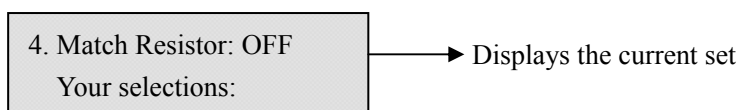
Press <F1/ON> key showing "ON"; this will place suited resistance between RS485D+ and D-,
Press <F2/OFF> key showing "OFF"; this will separate suited resistance from RS485D+ and D-,
Press the ENTER key for confirmation. The default status is open.

5.1.5 Keyboard Protocol Set

Press the FUN key four times until LCD displays:

| 5）Protocol: HJS |
| New Protocol- |

→ Displays the current set
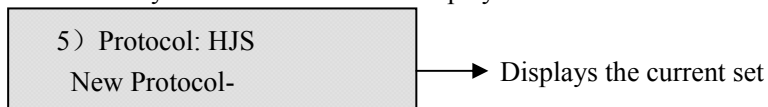
Press "1" key showing "HJS" protocol, press "ENTER" for confirmation.
Press "2" key showing "PEL-D", PELCO-D[9]protocol, press "ENTER" for confirmation.
Press "3" key showing "PEL-P", PELCO-P protocol, press "ENTER" for confirmation
Press "4" key showing "SAMSUNG", SAMSUNG protocol, press "ENTER" for confirmation
default protocol is the HJS Protocol.

---

[8]. Sometimes, matching resistance should be set at the control center in order to avoid reflection and disturbance from RS-485 communication signal and other signals.

[9]. PELCO-P, PELCO-D, SAMSUNG protocol: The keyboard can be used together with other high speed domes. When using a HJS Camera, please adopt the HJS protocol.

5.1.6 Keyboard Test

Press the FUN key until LCD displays:

> 6.keyboard Test

Press the ENTER key for confirmation, a blank screen will appear. Press any key except the <EXIT> key, the relative name will display on the screen.

Press <EXIT> to leave the testing status and return to the main menu.

> ⚠ If the keyboard test does not display the correct Keyboard protocol, the keyboard may be damaged.

5.1.7 Max Vice Control Number Set[10]

Press the FUN key until LCD displays:

> 7. MAX Slave ID: 00
> Input new ID:00   → Default Setting

Input number (00-16), Press "ENTER" for confirmation.

> ⚠ If the keyboard is set as: 01, 02…16, it will be considered as the total vice control keyboard quantity separately.

5.1.8 Max Alarm Set [11]

Press the FUN key until LCD displays:

> 7. MAX alarm ID: 00
> Input new ID: 00   → Default setting

Input number, the biggest alarm input terminal number is 239. Press "ENTER" for confirmation.

> ⚠ If the keyboard is set as:000, 001…239, the total relative quantity for alarm input terminal will be in operation.

---

[10] When there are two or more than two keyboards in one system, please use the main control keyboard to set the total desired vice keyboard quantity should be set (16 vice control keyboard at most). If the vice keyboard quantity are not set, the vice keyboards will not control camera dome. The number desired to input should be more than or equal to the total actual vice control keyboard quantity.

[11] You should set the total alarm input terminal quantity for our company alarm dome camera if such dome camera is adopted. The number desired to input should be more than or equal to the total actual our company alarm input terminal quantity. One dome camera has 4 alarm input, i.e. 59 alarm dome camera can be connected with the keyboard at most.

VI. Intelligent Keyboard Operation

The startup interface is general operation menu after the keyboard is connected to the power supply.

LCD displays as follows:

```
MON   CAM   DATA
01     0001  0000
```

6.1 Keyboard Communication Address Set

Input any number within "1-1024" (Speed dome camera address) in DATA area, Press <CAM> key. The relative number will display on CAM area.

6.2 Keyboard Control for Speed Dome Camera

Operating keyboard joystick in different directions, Speed dome camera will do relative movement. The joystick move scope is direct proportion with the running speed of Speed dome camera. (0.4^{o} /S-280/^{o} S)

⚠	When the "DATA" column does not show "0", the "DATA" column displays the address of the Speed dome camera.
	When the "DATA" column shows "0", the "CAM" column displays the address of the Speed dome camera.

(Take Our company protocol for example to operate Speed Dome Camera)

6.3 Auto Scanning (2 Points Scanning 360 °Scanning)

Input time, then press PAN-A

DATA   Input time, then press PAN-B


```
MON      CAM      Data
XX       XXXX     0001
```

Inputted data Display

Joystick
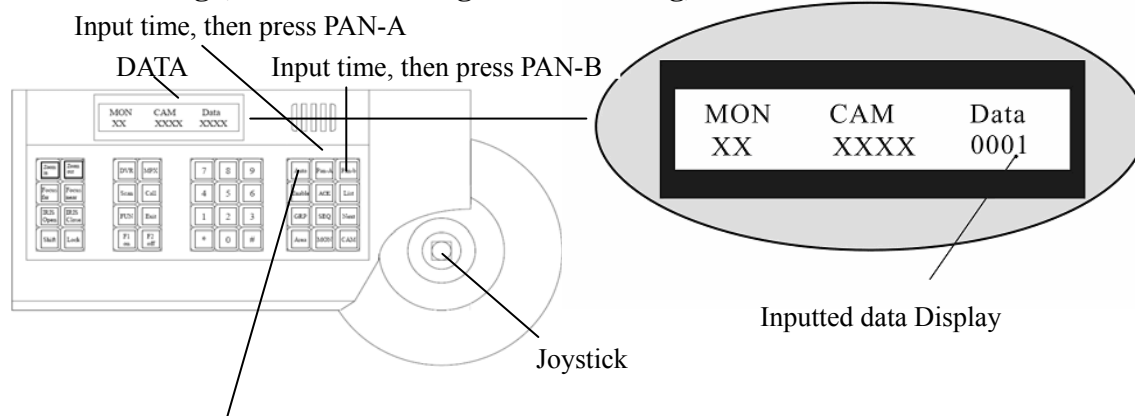
Input operating speed at data area then press AUTO

A. 2 Points Scanning[12]

The operator can also run a simple point-to-point scan (also called back-and-forth scanning). To do this, set Preset Point A first (at the same time set the dwell[13] time at Point A), and then set Present Point B (at the same time set the dwell time at Point B). Finally execute an outer command to scan between points A and B.

[12.] 2 points scanning: it means scanning between two points. The speed is: Grade 1, Grade 2…Grade 64 (from slow to fast). Press CLR key on the keyboard DATA area to delete value on DATA column.

1. To set Point A. Move the joystick to the desired position.
2. In the Main Menu enter a dwell time for Point A. Example: If Dwell time is 2 seconds the keyboard displays:

```
MON   CAM   DATA
00         0001   0002
```

3. Press the "PAN A" key.
4. To set Point B, move the joystick to the desired position.
5. In the Main Menu enter a Dwell time for Point B.
6. Input the grade Speed (1-64) and Press the "AUTO" key.

   This will start up 2 points Scan.

B. 360° Scanning[14]

The Operator can also start an auto cruise scan. This scan will rotate 360°from the desired position.

Press CLR key on the keyboard DATA area to delete value on DATA column.

1. In the Main Menu, input desired cruise group No.

Example: Desired Group No. is 4 the keyboard displays:

```
MON   CAM   DATA
00         0001   0004
```

2. Press Shift + Scan to place PTZ into cruise scanning.

OR

1. Move the joystick to desired position.
2. Input the running speed (1-64) and then input Shift+ AUTO key.

```
/!\   Shake the joystick to stop auto scanning.
```

6.4 Set Preset Position

   1. Press CLR to clear the number in the data area.

   2. Enter the Preset Position Number you wish to set. You can set up to 128 Preset Positions.

   Ex. Set Preset Position No.1, the keyboard displays:

```
MON   CAM   DATA
00         0000   0001
```
   ← Displays the Preset
   Position Number(1-128)

   3. Adjust the Speed camera to the desired position including location, camera zoom, focus and iris.

   4. Press Shift+ Call for final confirmation.

[13] Dwelling time: Can set dwelling time at one preset position: 1S, 2S…60S

[14] 360°scanning: 360°scanning at one preset position, speed is: Grade 1, Grade 2… Grade 64 (from slow to fast)

6.5 View Preset Position

1. Preset CLR to clear the number in the data area.
2. Input the address of Speed dome in the Data area, press down<CAM>key and show it in DATA area.
3. Input the preset position you would like to view.

Example: View preset position NO.5

MON	CAM	DATA
00	0000	0005

Displays the Preset Position Number (1-128)

4. Press the CALL key. The dome will move to the Preset Position NO.5

⚠ After pressing the CALL key , Speed dome camera will run to the preset position you would like to view at Grade 64(280°/S) speed.

6.6 Preset Position Parameter Set for Speed Dome (HJS protocol has this function) [15]

Press the FUN key until LCD displays:

1) speed dome Setup
Number: 0000

→ Press Enter key
Press CLR to delete previous data. Input required
Speed address code XXXX (1-1024) for control.
Press Enter for confirmation

Press ENTER key into preset position set of Speed dome camera.

⚠ The below menu is submenu. Press FUN into submenu after entering this main menu.

6.6.1 Preset Position Speed and Dwell Time Set

Speed dome camera has the capacity to set up to 128 preset positions through the **keyboard .It can set a running speed at e**ach preset position from 0.4/s to 280/s(1-64grades)and dwell time from (1-60 seconds).

Note: Speed can rotate at low speeds and at fast speeds. Its speed can be divided into 64 grades. 1 is the lowest speed and 64 is the fastest speed.

To get to the Main Menu Press Exit until the screen displays:

MON	CAM	DATA
01	0001	0000

1．In the Main Menu, Press the FUN key once. Keyboard displays:

```
1) speed dome Setup
   Number: 0000
```

2. Enter the correct Speed Dome Unit and Press Enter.
Example: Preset Position for Speed Dome   Keyboard displays:

```
1) speed dome Setup
   Number: 0003
```
◄——————Displays the Speed Dome
Address (1-1024)

3. Now the Keyboard displays:

Running speed
(1-64) ——►
```
1) Position: 0000
   Speed: 00 Time: 00
```
◄———— Preset position (1-128)

◄——— Dwell time (1-60)

Press F1 key on the keyboard to move the cursor up and down
4. Press CLR key to delete previous data before programming to a new preset position.
5. Enter desired Preset Position and Press Enter.
6. Press F1 to get to Speed. Using the number keys enter the desired running speed.
7. Press F1 to get to Time. Using the number keys enter the desired dwell time.
    For example: Set the running speed of preset position NO.6 as Grade 64(fastest speed),
    dwelling time is 5 seconds. Set the running speed of preset position NO.2 as Grade 10,
    dwelling time is 10seconds.
    1. Press the FUN key once.
    2. Press CLR to clear the data.
    3. Input 06(Note: Setting the Preset Position NO.6) press the Enter Key to Confirm.
    4. Press the F1 key to move the cursor to Speed:00←
    5. Input 64,press Enter
    6. Press the F1 key to move the cursor to Time:00←
    7. Input 05,press Enter
    8. Press F1 to move the cursor back to 1. Position:001←
    9. Press CLR to delete 0006
    10. Input 02,press Enter
    11. Press the F1 key to move the cursor to Speed:64←
    12. Press CLR to delete 64
    13. Input 10,press Enter
    14. Press the F1 key to move the cursor to Time:05←
    15. Press CLR to delete 05
    16. Input 10,press Enter

⚠ Do not forget to press ENTER to confirm each Preset Position. Not doing so will
result in lost information and the setting will not be effective.

6.6.2 Patten Tours Set [16]

keyboard can set pattern tour groups for the Speed speed dome camera. Before setting the Pattern Tours please set all preset positions in advance. If the preset positions are not set the pattern tour will default to the pattern tour parameter. Note: Speed can set 8 cruise groups.

1. Press the FUN key once, keyboard displays:

```
1)   speed dome Setup
    Number: 0000
```
← Enter the correct Speed Dome Unit (1-1024)
And Press Enter
Example: Set Speed Dome Unit 02

2. keyboard displays:

```
2    Position: 0000
    Speed: 00 Time: 00
```

3. Press the FUN key once, now the keyboard displays:

```
2. Add pre_position
   Group Number: 0
```
← Enter the Group
Number (1-8)

4. Input a Group number using the number keys, press Enter, keyboard displays:

```
Add:
```

5. Input a desired Pattern Tour for the Group. You can set up to 16 Preset Positions in one Group.
   Example: Desired pattern tour of 6 Preset Positions. The sequence is Preset Position No.1-2-3-4-5-6-

   The keyboard displays:

```
Add: 1→2→3→4→5→6→
```

6. Press Enter to confirm Pattern tour.
   Note: When completed, Press F2 to close and exit. To Start the Scan: In the Main Menu enter the Group Number and Press SCAN.

◇ This dome can set 8 cruise groups with a Max of 16 cruise points. Each group (1-128 points at any preset position).
◇ Set the preset position at each of the cruise groups.
◇ Dwell time at each preset position can be customized at a different time (1-60 seconds).
◇ The speed to each preset position can be different (1-64 grades)
◇ Default cruise group will auto scan by starting at preset position point No.1 to preset position point No.16.

[16] Pattern tours: Layout different preset position for Speed dome camera as one group, make Speed camera scan as set route in advance. The running speed and dwell time of each preset position can be programmed.

Two pattern tours styles can be used:
  A. To-and-form Scanning

1-2-………..-16-1-2……-16-1-……Making an auto circle scanning by points.

Press EXIT key and exit to default status of the keyboard.

Input cruise Number adjust key SCAN into to-and-from scanning (as the above route)

B. Cruise Scanning

1-2………15-16-15-………-2-1-2-…………-15-16-15-…………Make an auto cruise scanning. Press EXIT key and exit to default status of keyboard. Then input cruise group No and then input Shift + Scan. Into cruise scanning (as the above route).

⚠️ If a point is not set or is deleted after being set, there will not be any scanning to these points.

Select: →Add the preset position to cruise.

Press the ENTER key for confirmation after adding a preset position. Press F2 exit when setting is finished.

Please set Speed preset position parameter before setting its pattern tours. If not setting Speed preset position, Speed dome camera will operate default preset position parameter when it runs its pattern tours.

6.7 Guard Location Set

The guard location is an important position that the Speed camera will come back to automatically when there is no operation for a defined period. The user can set a guard location and control the waiting time to the guard location, starting and stopping（1-255S）before allowing the camera to return to the guard location.

Use the keyboard to set the guard location and its waiting time.

Turning the Guard Location On/Off and Setting delay time to Guard Location.

1. To set the guard location to start or stop (recognizes this action as a Switch):

ON: Start   OFF: Stop

Press F1   ON   Startup the guard location

Press F2   OFF   Stop guard location

Example: Press F1 ON to start up guard location. Dome will rotate to set position within XX seconds.

2． In the Main Menu screen, press the FUN key once, LCD displays：

```
1)   speed dome Setup         ←——— Displays Current Speed
     Number: 0000                    Dome address
```

3. Press Enter to Confirm

4. Press the FUN key three times, LCD displays:

```
4) Watch Position
Time: 000 Switch
```

5. Input the desired waiting time using the number keys:
   Example: After inputting time: 05 press Enter.

> 4) Watch Position
> Time: 005 Switch

6.8 Guard Location Parameter Set

1. When the keyboard is under default (Main Menu) status, press the FUN key once, keyboard displays:

> 1) speed dome Setup
> Number: 0000

2. Press Enter to confirm.
3. Press the FUN key two times, keyboard displays:

> 3. Press Enter Key TO
> Setup Watch Position

4. Move the joystick/rocker to the target position you would like to set as the Guard Location.
5. Press Enter to set the Guard Location.
   The position is set as the guard location.

> ⚠ After inputting the waiting time: ××, press the ENTER key. Press F1 (ON) to start up the Guard Location. The dome will rotate to set position within ××seconds.

6.9 Intelligent Keyboard Menu Set for Speed Dome

Press the FUN key four times, keyboard will display:

Press the FUN→5) dome menu
                    Data: 0000:   Press Enter key.
   5 Dome menu
Data: 0000 →Press CLR to delete previous data, input required address of Speed Dome(1-1024), press Enter key.

Operating menu see below for reference:

Operating Key	Function
SEQ	Dome menu cursor up
MON	Dome menu cursor down
AREA	Dome menu cursor left
CAM	Dome menu cursor right
ENTER	Enter function menu
ENABLE	Exit function
ACK	Confirmation
LIST	Select
EXIT	Keyboard function menu exit to upper menu

Speed dome camera menu set should consult Speed dome camera manual.

VII. Auxiliary Function Set

⚠ The auxiliary function is used with our other products. It is not used with the Speed dome camera.

7.1 Wash Brush Set[17]

Press FUN until LCD display as below:

3) Wash

Number: 0001 OFF→ Set "Wash Brush" open by pressing down "F1/ON"key, Set "Wash Brush" close by pressing down "F2/OFF"key.

7.2 Heating Set[18]

Press FUN until LCD display as below:

4) Warm

Number: 0001 OFF→ Set "Heating" open by pressing down "F1/ON"key, Set "Heating" close by pressing down "F2/OFF"key.

7.3 Auxiliary Switch 1 Set

Press FUN until LCD displays as below:

5) Auxiliary#1

Number: 0001 OFF→ Set "Auxiliary Switch 1" open by pressing down "F1/ON"key, Set "Auxiliary Switch 1" close by pressing down "F2/OFF"key.

---

[17] This Function is used for the frontal terminal device with the wash brush function only.

[18] The fan and heater in the Speed speed dome camera is always under auto temperature control status. This function will auto start when the temperature reaches higher point or lower point.

7.4 Auxiliary Switch 2 Set

Press FUN until LCD display as below:

6) Auxiliary #2

Number: 0001 OFF→ Set "Auxiliary Switch 2" open by pressing down "F1/ON"key, Set "Auxiliary Switch 2" close by pressing down "F2/OFF"key.

7.5 Proportion Joystick

> ⚠ This function has been set well before the keyboard leaves the factory. The speed of the joystick is a direct ratio to the running speed of the Speed dome. If it is not a direct ratio; reset the keyboard joystick parameter.

Press the FUN key until LCD displays:

8) Joystick Set

Tilt: 000 Pan: 000→Display Joystick value (Up, Down, Left, Right)

8.1 Set Joystick middle value (dwelling time)

When stop on the middle part, set joystick middle status by pressing "AUTO" key.

8.2 Set joystick up limit value

Move the joystick to top (up), set its upper limit value by pressing "ACK" key.

8.3 Set joystick down limit value

Move the joystick to bottom, set its lower limit value by pressing "LIST" key.

8.4 Set joystick left limit value

Move the joystick to left side, set its left limit value by pressing "PAN-A" key.

8.5 Set joystick right limit value

Move the joystick to right side, set its right limit value by pressing "PAN-B" key

8.6 Set joystick retrorse limit value (limited for PTZ keyboard)

Move the middle pillar of joystick to the bottom extrorsely, set its retrorse limit value by pressing "SEQ" key.

8.7 Set joystick veering limit value (limited for PTZ keyboard)

Move the middle pillar of joystick to the bottom veer, set its veering limit value by pressing "NEXT" key.

See below chart for setting reference.

Operating Key	Function
SEQ	Set joystick anticlockwise limit value
NEXT	Set joystick clockwise limit value
PAN_A	Set joystick left limit value
PAN_B	Set joystick right limit value
ACK	Set joystick up limit value
LIST	Set joystick down limit value
AUTO	Set joystick middle value

VIII. LOCK Keyboard

Press down the LOCK key, LCD displays:

```
Please enter your
Password:
```

Input password: 6688 (This password is set by the factory and can not be modified). Once entered, keyboard will be in locked status. It shows:

Key is locked

Password:

When the keyboard is locked the users cannot operate the keyboard.

To unlock the keyboard input the password: 6688 then press the ENTER key for confirmation.

The keyboard will go back to the last screen before it was locked.

IX. Exception Handles

Exception phenomena	Possible reason	Relative solution
No display on the screen when the power is on	**1.**Power supply is not connected properly **2.**Watt is not enough	**1.**Check connection of power line **2.**See if power supply is AC/DC 9V-12V
No way to control designated dome or high speed dome	**1.**Protocol is not correct **2.**Baud rate is not correct **3.**Controlled address is not correct **4.**The polarity of control line is not correct	**1.** Check if the keyboard protocol accords with that of dome or high-speed ball or not. **2.** Check if the baud rate of the keyboard accord with that of dome or high-speed ball or not. **3.** The number in CAM or DATA area can't accord with the object address.
No Bi sound when pressing key	Key-press sound is closed	Start up key-press sound in the keyboard set
Other phenomena		Back to manufacturer for maintenance

⚠ When using the keyboard to control other dome cameras, keeping the keyboard setting (Baud rate, protocol, address) consistent with the dome camera. Some dome camera addresses have a +1 difference the does not.

Ⅹ. Key-press Function

HJS Protocol Operating

Key	Function
Call	Adjust preset position
Shift + Call	Set preset position
Pan _A	Limited Site A
Pan _B	Limited B
Auto	Line Scan (scanning between two points)
Shift _Auto	Panel Scanning (Mode Scanning)
Scan	Start up the perambulate group
Shift + Scan	Start up intercourse perambulate group
CAM	LCD show CAM area address

PELCO_D PELCO_P Protocol Operating

Key	Function
Call	Adjust preset position
Shift + Call	Set preset position
MPX	Clear preset position

SAMSUNG Protocol Operating

Key	Function
Call	Adjust preset position
Shift + Call	Set preset position
AUTO	Line Scan(scanning between two points)
Scan	Panel Scanning（Mode Scanning）
54+ Call	Start auto

ⅩⅠ.Keyboard Spare Parts List

Parts	Quantity	Unit
Manual and Operating Instructions	1	PCS
Keyboard	1	PCS
12VDC Power Supply	1	PCS
Data Line	1	PCS
Wire Box	1	PCS
Glove	1	PCS
M3*20 Screw	2	PCS
Double-side Adhesive Plaster	1	PCS

ⅩⅡ.Keyboard Menu Frame

FUN	Menu roll
ENTER	Enter Submenu
EXIT	Exit Menu

Keyboard displays when it is under default status

```
MON    CAM    DATA
01     0001   0000
```

- Speed domes Number:0001
- Keyboard setup
- Wash Number:0001 OFF
- Wash UP Number:0001 OFF
- Auxiliary #1 Number:0001 OFF
- Auxiliary #2 Number:0001 OFF
- Matrix menu Press enter to menu
- 8)Joystick Set M:000 M:000 M:000

Speed domes submenu:

1. Position:000
   Speed: 00 Time: 00

2. Add pre…position
   Group Number: 0

3. Press Enter key to
   Setup Watch Position

4. Watch Position
   Time: 000 Switch

5. Dome menu
   Data: 0001

Keyboard setup submenu:

1. Old Keyboard ID: 00
   New Keyboard ID: 00

2. Old Baud Rate: 9600
   New Baud Rate: 0000

3. Current Sound: ON
   Your Select

4. Match Resistor: OFF
   Your Select

5. Protocol:
   New Protocol:

6. Keyboard test

7. MAX SLAVE ID:
   Input new   ID:

8. MAX ALARM ID: 000
   Input new   ID: