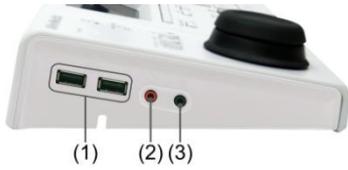


# AVerMedia® AVerDiGi System Controller Pro Quick User's Guide

## I. Hardware Introduction

### Left Side



Function	Description
(1) USB Port	2 * USB ports for connection of keyboard, mouse, or USB flash memory.

**i** The USB port of the System Controller is the same as the USB port on the DVR system, but USB of the System Controller and DVR system cannot be used at the same time.

(2) Audio Input	For audio input device connection such as microphone.
(3) Audio Output	For audio output device connection such as speaker.

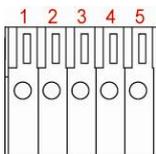
- i**
- The audio input and output device has its own power supply is necessary.
  - The audio input and output port is the same as the audio input and output port on the DVR system, but audio input and output port of System controller and DVR system cannot be used at the same time.
  - When audio input/output device has connected on the System Controller, the audio input/output port of the DVR system will be disabled.
  - After audio input/output device has removed from the System Controller, please stop recording and reboot the DVR system to enable the audio input/output port on the DVR system.

### Rear Side



Function	Description
(1) RS485 Port	For connection of Pelco-D/P PTZ camera and using RS485 to RS232 converter to connect with DVR system.

1	TX+
2	TX-
3	RX+
4	RX-
5	GND



(2) Power Supply Port	For AC power adaptor connection.
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## II. Connecting with the DVR Server

### Connecting with the DVR Server through the USB port

The following is an example of System controller installation.

1. The DVR server should be power on and DVR program is executed.
2. Plug the power cord of the System Controller into power outlet.
3. And then, plug the USB cable that is attached on the System Controller to the USB port of the DVR server.



- i** After System Controller has connected to the DVR system, please wait about 3 minutes for DVR system to automatically detect and install the System Controller.

### Connecting with the DVR Server through the RS485 port

Through the RS485 port, user can connect multiple DVR servers with the System Controller.

Before starting to make a connection, please prepare the following items:



RS232 cable



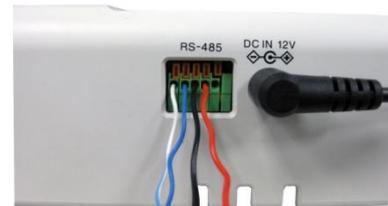
RS485 to RS232 Converter



Single core wire

(\*User can purchase from the dealer  
\*\* The RS232 to RS485 Converter needs to support **RS-485 automatic data direction control protocol**)

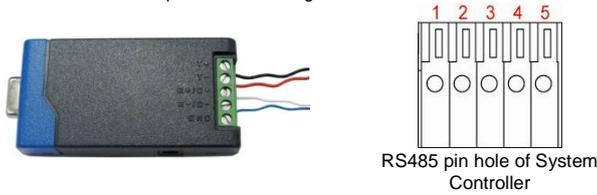
1. Cut the 4 single core wires.
2. Using the screwdriver to press down the orange tenon and insert the single core wire into the pin hole of the I/O terminal on the System Controller. When the wire is inserted in the end of the pin hole, release the orange tenon to fix the wire.



3. Set the DIP switch of the RS232 to RS485 converter at 4-wire RS485 setting.



- Using the screwdriver to lose the pin hole of RS485 to RS232 converter. And then, insert another side of single core wire into the pin hole of the RS485 to RS232 converter. Using the screwdriver to screw tight the wire. Please refer to the below table for pin-hole matching:

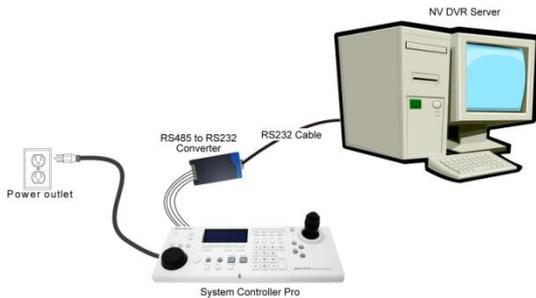


RS485 to RS232 Converter site		System Controller site	
R+	T+		1
R-	T-		2
T+	R+		3
T-	R-		4

- Connect the RS232 cable to the RS232 port of the RS485 to RS232 converter.



- Connect another side of RS232 cable to the RS232 port of the DVR server.
- Power on the System Controller.
- The following figure is an example of the installation illustrate.

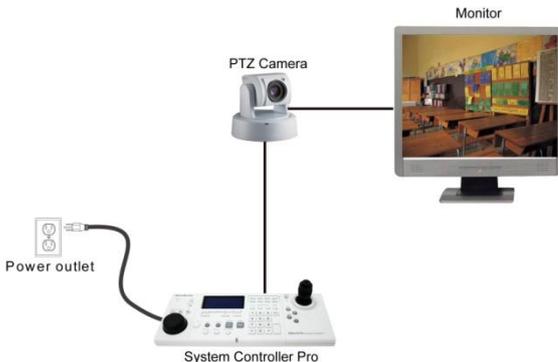


- After hardware installation has completed, please remember to enable the System Controller on NV DVR system (see also **System Setting** in NV User's Manual).

### Connect a PTZ Camera to System Controller Pro

The following is an example of PTZ camera install to System Controller Pro.

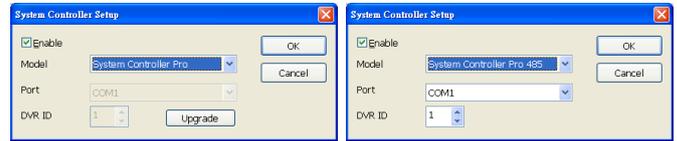
- Connect the PTZ camera to System Controller Pro through the RS-485 interface.
- Plug the power cord of the System Controller Pro into power outlet.



### III. Enabling the System Controller on DVR Server

Follow the below steps to enable the System Controller function on the DVR server.

- Start up the DVR program.
- Click **Setup**.
- Select **System**, the **System Setting** windows will appear.
- Click **Detail** that is next to the System Controller selection.
- Mark **Enable** check box to enable the function of the system controller.
- Select the **Model** as **System Controller Pro (USB connection)** or **System Controller Pro 485(RS485 connection)**.
- For System Controller Pro 485 model, user needs to select the connection **Port**. If there is more than one DVR systems are connecting with System Controller, user can assign a **DVR ID** for the DVR system as a control identity.
- Click **OK** to complete the setting.



- If the setting is complete, the LCD of System Controller should display like following figure.



### IV. Select the Operation Mode on System Controller

For System Controller to operate the DVR system normally, the connecting mode must correspond with the way of connection (USB or RS-485) between System Controller and DVR server.

#### Switching to USB DVR Mode

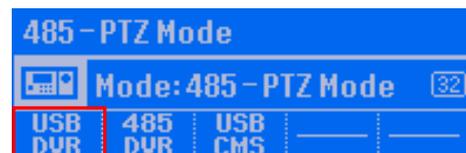
When System Controller is connected with DVR server through the **USB** port, please select the operating mode as **USB DVR** mode. The following steps describe how to switch from other operating mode to **USB DVR** mode.

- In 485 PTZ menu screen, press **CONTROLLER** button to enter Controller setup screen.
- Press **MODE** button to enter Mode setup screen.

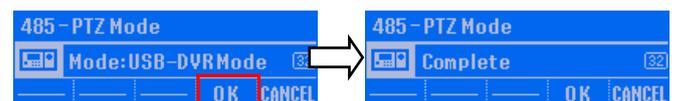


**i** If the password function is enabled, user needs to enter the password for mode switching.

- In Mode setup screen, press **USB DVR** button to switch the mode to USB DVR mode.



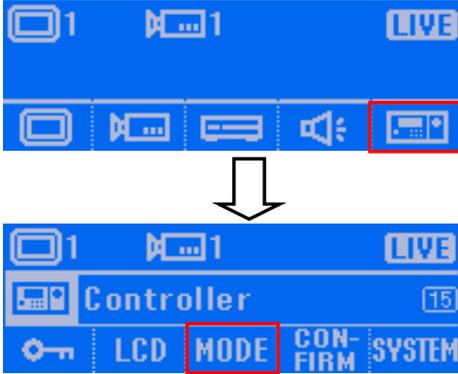
- Press **OK** button to confirm. To cancel the selection, press **CANCEL** button. When the "Complete" message appears on the LCD screen, the mode switch is completed.



## Switching to 485 DVR Mode

When System Controller is connected with DVR server through the **RS-485** port, please select the operating mode as **485 DVR** mode. If the mode is not 485 DVR mode, please follow the below steps to switch to **485 DVR** mode.

1. In main menu screen, press  button to enter Controller setup screen.
2. Press **MODE** button to enter Mode setup screen.

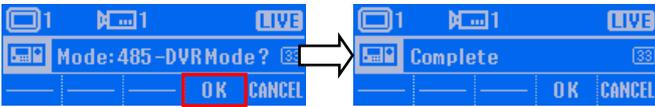


**i** If the password function is enabled, user needs to enter the password for mode switching.

3. In Mode setup screen, press **485 DVR** button to switch the mode to 485 DVR mode.



4. Press **OK** button to confirm. To cancel the selection, press **CANCEL** button. When the "Complete" message appears on the LCD screen, the mode switch is completed.



## V. Familiarizing with LCD Screen

Following will describe the information or icon that display on LCD screen.

### ■ Main Menu

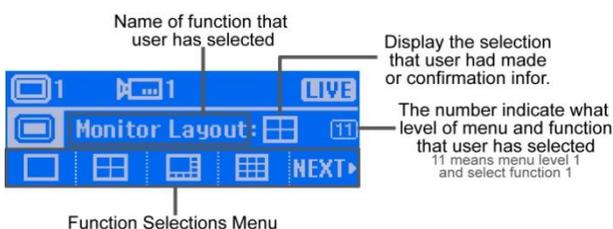
Current Select Channel Number  
1 means channel 1

Current Surveillance Mode  
Live is preview mode  
Playback is playback mode



Multi-Function Menu

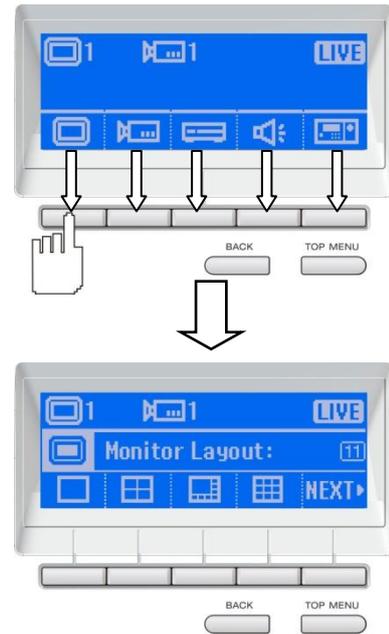
### ■ Submenu(Multi-function menu)



## VI. Operating the LCD Menu

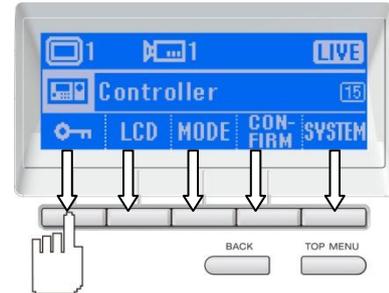
### ■ Main Menu

On the LCD screen, each function is corresponding to the button on the panel of the System Controller Pro. To select the function, press the correspond button.



### ■ Multi-Function Menu

In multi-function menu screen, press the correspond button of the selections to configure/operate.

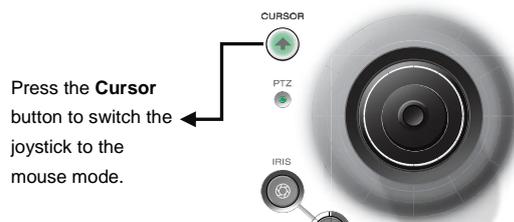


To go back to the main menu, press the **TOP MENU** button. Press the **BACK** button will go back to the previous screen.



### ■ Switching the Joystick to the Mouse mode

The joystick can switch to the mouse mode. User can use to operate the DVR system more easily.



Press the **Cursor** button to switch the joystick to the mouse mode.

**i** User can adjust the move speed of the mouse cursor on the Windows system where the DVR system installed on it. Please go to **Start > Control Panel > Mouse**.

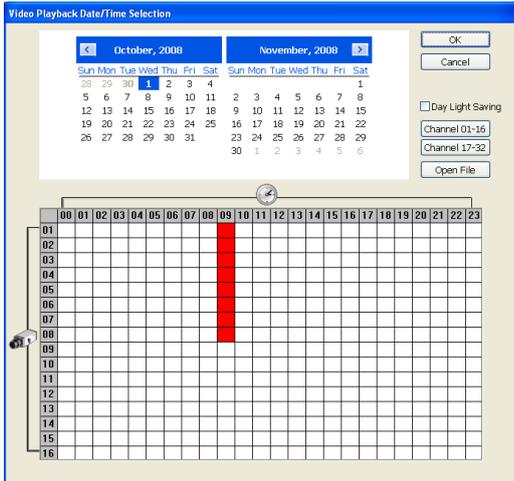
## VII. To Playback the Recorded File

To playback the recorded file on surveillance screen.

1. Press  button to switch to playback mode. The LCD screen will display "Playback" message that means the DVR is in playback mode now.



2. The playback time and date selection window will appear on the surveillance screen. Using the mouse or joystick (press the  button to switch to mouse function) to select the time and date that wants to playback.



3. After selected the time and date to playback, the DVR system will start to playback.



4. Using the Jog/Shuttle button to control the playback speed. Press  to enable the Jog/Shuttle button. To disable the Jog/Shuttle button, press  button.
  - **Jog dial (top part):** Rotate in clockwise is forward play frame-by-frame that control by user. Rotate in counterclockwise is rewinding play frame-by-frame that control by user.
  - **Shuttle ring (lower part):** Rotate in clockwise is play at increase speed of 1x, 2x, 4x, 8x, 16x, and 32x. Rotate in counterclockwise is rewinding playback.
5. To pause the playback, press  button. Press  again to start playback.

## VIII. Using the Joystick to Operate the PTZ Camera

If the camera has enabled the PTZ function, user can use the System Controller to operate the PTZ camera. Please select the PTZ camera channel before starting PTZ operation.

1. Press  button.
2. On the LCD screen will display **Camera Select** screen. 
3. Using the numeric key pad to enter the camera number (3 numbers, ex: camera 2, enter 002). After entered the camera number, press **Enter** button to confirm.

- Please select the PTZ camera before starting PTZ operation.
- When PTZ indicator  is green light up, the PTZ operation is available.

The joystick can move the camera to right, left, up, and down and also to zoom in and out of the camera.

### ✓ Panning

Move the joystick to right or left.



### ✓ Tilt

Move the joystick to up or down.



### ✓ Zoom in/out

Rotate the joystick to the clockwise side to zoom in and counterclockwise to zoom out.



### ■ To Focus the Object

Press  button to focus the object in the distance. Press  button to focus the object in nearby.



### ■ Adjusting the Brightness of the Image

Press  to adjust the image brighter. Press  to adjust the image darker.

