

# User Manual for Installation & Use of Mobile DVR (SD-Card)

Before connection and use of this device, please read carefully the following statement and keep it for use in future.

## I. Attentions

- Power supply: Power supply to this device is DC8-36V, applicable to vehicles under 12V and 24V power supply, so please confirm the power supply voltage of your vehicle before installation; the external output voltage of this device is DC12V, only for power supply to video recorder, so please don't connect to any other device not specified or allowed for use to this device; in case of long time of no use, please power off the device in order to extend its service life.
- Safety: This device is for indoor use, please don't put it under moisture in order to prevent from short circuit or electric shock; external wires of this device shall be provided with sufficient interval and fire retardant sleeve pipe as protection, so as to ensure the wires are not bent or leaked due to vibration or aging; in case of any breakdown, professional technicians must be invited for repair, or you can contact the distributor, rather than self-repair.
- Installation position: Select a proper position for installation which must be resistant to splashing water or water drop, with good ventilation, far away from heat sources, and with relatively weak vibration. It is prohibited to install the device in the following positions: near to heat sink, generator or other heat sources, or anywhere under direct sunshine, dust, moisture, corrosion, strong magnetic field or mechanical vibration/ impact.
- Copyright protection: for video recording or monitoring, please ensure no breach of relevant rights of third-party; in case of no permission from our company or the proper entrusting unit, any amendment and alteration to this device may result in damage, making inconvenience to use.

## II. Front/rear Panel Definitions

### 1. Front Panel Definitions (Single SD Card with Wi-Fi)



#### 1) LED Indicator Light

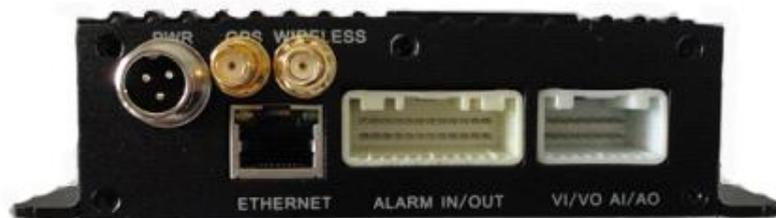
- 【PWR】 Power input status indicator: LED light indicates the system is charged

- **【ERR】** Error indicator: LED light on - indicates SD card fault; LED light off - indicates SD card is working normally.
- **【CH1-CH4】** Video indicator: Light on - indicates video input is normal. Light off - indicates video input is lost.
- **【CH1】** System upgrade indicator: LED light flashes - system is being upgraded
- **【SD1 ,SD2】** SD card indicator light: LED light on - SD card uploaded successfully; LED light off- SD card uploading failed; LED light flashes -a video is being recorded
- **【IR】** Infrared receiver, used for receiving remote control signal.

## 2) SD Card Remove & SD Card Slot

- **【REMOVE1,REMOVE2】** SD card remove button: When the device is in operation, long press the stop SD card reader button for 3 seconds, the SD card indicator light will go off, and the SD card can be taken out safely; if the SD card has not been taken out in time, it will be reloaded automatically within 15 seconds.
- SD card: slot for storing video data or upgrading software.

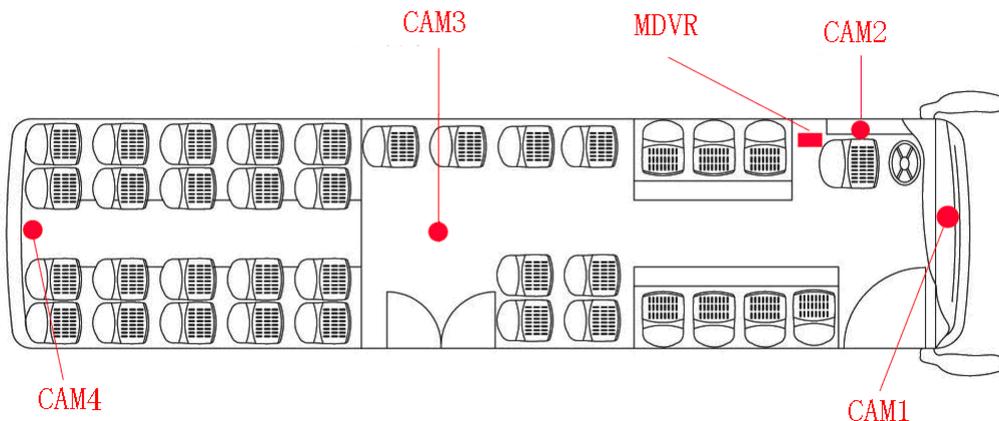
## 2. Rear Panel Definitions



- **【PWR】** Power port
- **【GPS】** GPS antenna port
- **【WIRELESS】** 3G antenna port
- **【ETHERNET】** Ethernet port
- **【ALARM IN/OUT】** Alarm input/output port
- **【VI/VO AI/AO】** Video input/Video output port; Audio input/Audio output port

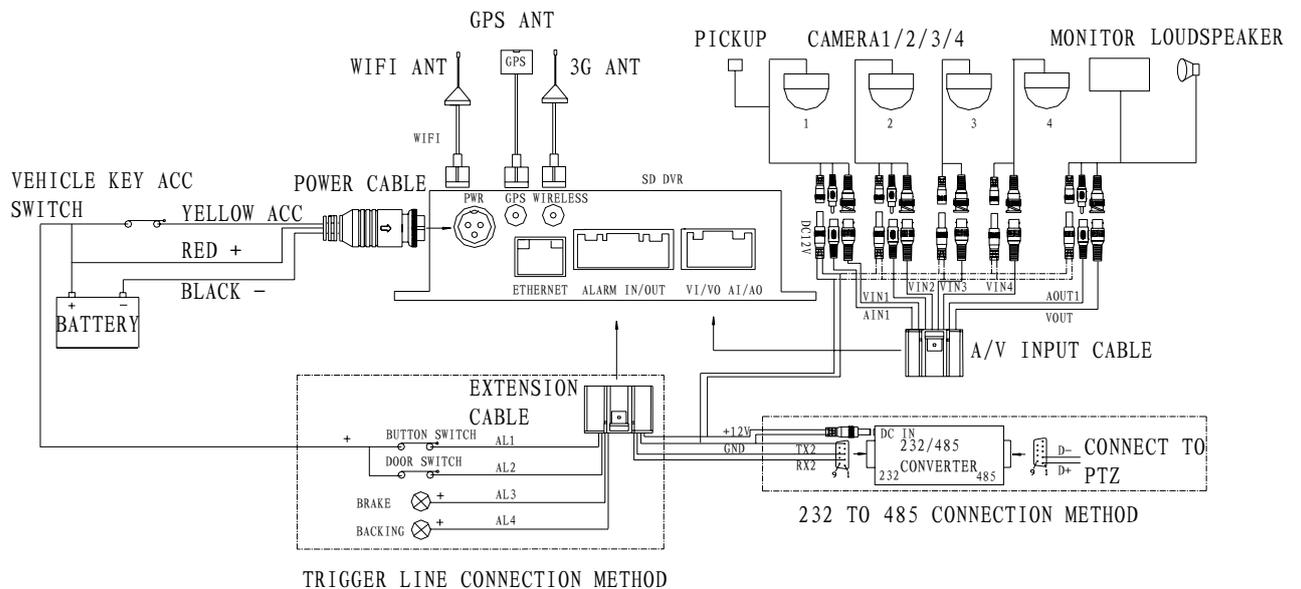
## III. Installation Diagram

The following is an indicative diagram for bus; actual installation will depend on the actual vehicle and configuration.



#### IV. Wiring Diagram

In accordance with the following diagram, properly connect external devices such as the DVR power cable, antenna and video recorder.



#### V. Fast Setup

Make sure all the external devices such as the power supply, camera, display, etc are well connected to the DVR. Insert SIM card and SD card, and then turn on vehicle key switch, start the DVR. The Power indicator light turns on, and images show up on the display after the system starts. And, it can be set by remote control.

##### 1. User Login

Press **【ENTER】** on the remote control to enter the menu. Input the administrator password to set menu. The default general user password is 000000, administrator

password is 888888.

## 2. Enter the Main Menu

Select System Setup by remote control, press OK.

## 3. Enter the System Setup

Select the Basic Setup by remote control, press OK.

## 4. Enter the Basic Setup

BASIC SETUP

DATE TYPE: YMD

TIMEZONE: GMT +08

DATE: 2011-07-25 11:30:07

IDLE TIME: 60 (s)

DEVICE NO.: 11111

MAIN INFO:

NUMBER: 123456

NAME: Jack Bauer

REMARK: NOTHING

SAVE

As the device number, company name, plate number, driver name, line number are set up, make sure the time setup, and save the settings. NOTE: The device number must be unique. It can't be the same device number for any two devices.

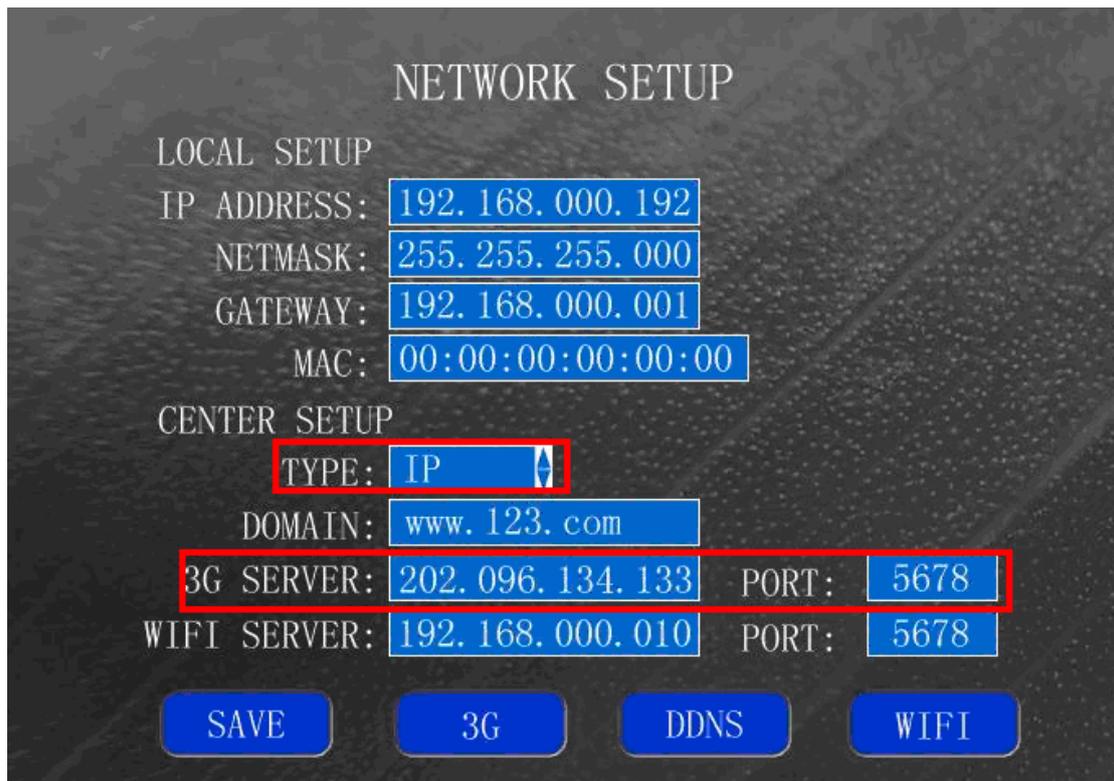
## 5. Enter the Recording Setup

The normal setting is: PAL format (China), video recording as default mode, D1 resolution, default code rate. Voice recording will be on in case of audio input or else closed. Automatic coverage is applicable to normal video recording or all video recording. Segment time is 30 minutes as default. Frame rate is normally set as 15-25 frames depending on capacity of SD card. Video channels not required should be closed at the mean while. Save the setting in the end.

## 6. Enter the Power Setup

The normal setting is ignition mode. For delayed power on/ off, the delay time is 30 minutes (up to customer requirement). Save the setting in the end.

## 7. Enter the Network Setup



Local network: ignore this item during use of 3G function.

Setting of central network:

Type: set as IP;

Domain name: This item is effective only when it is registered by domain name. (e.g., www.123.com). Those users using fixed IP can ignore this item.

Center IP: setting as the fixed IP address in the server external network (When the Connect to Internet is set on, the same address is used for registration);

Port: 5678 as default setting (requiring to be set with port mapping at router).

Wi-Fi center: Setting as the IP address in the server Wi-Fi internal network.

Port: 5678 as the default port.

## 8. 3G Setup



3G: set as on;

Type: set the type of Wi-Fi module, WCDMA (China Unicom), EVDO (China Telecom) or TD (China Mobile). Refers to the 3G format of the purchased model;

Access point: set the data access point (by default within China);

Username & password: set the username & password of Wi-Fi service (by default within China);

Linking mode: set as normal linking;

Trigger number: use a mobile phone to trigger device dial or stop dial; up to 2 mobile numbers can be set;

#### Attention:

At trigger mode, it is ok to dial the phone to trigger dial (but the 3G card should be opened with call number display) or SMS via the phone to trigger or stop dial.

Contents for SMS trigger should be as follows:

1) DIAL,11 -- trigger dial;

2) DIAL,00 -- stop dial;

SMS can also be used for some parameter setting or device reboot:

1) RBT -- reboot the device

...

Save the setting in the end.

## 9. Wi-Fi Setup

It is required when the user uses the Wi-Fi function.



Wi-Fi: On;

Encrypt: On;

Encryption type: WEP by default;

IP address, gateway and subnet mask must be identical to the segment of Wi-Fi hot spot;

SSID and security key must be identical to the setting of wireless router. Save the setting in the end.

Attention:

Please change the IP segment in the previous LAN setting to be void, so as to ensure no conflict with the Wi-Fi segment.

Save the setting in the end.

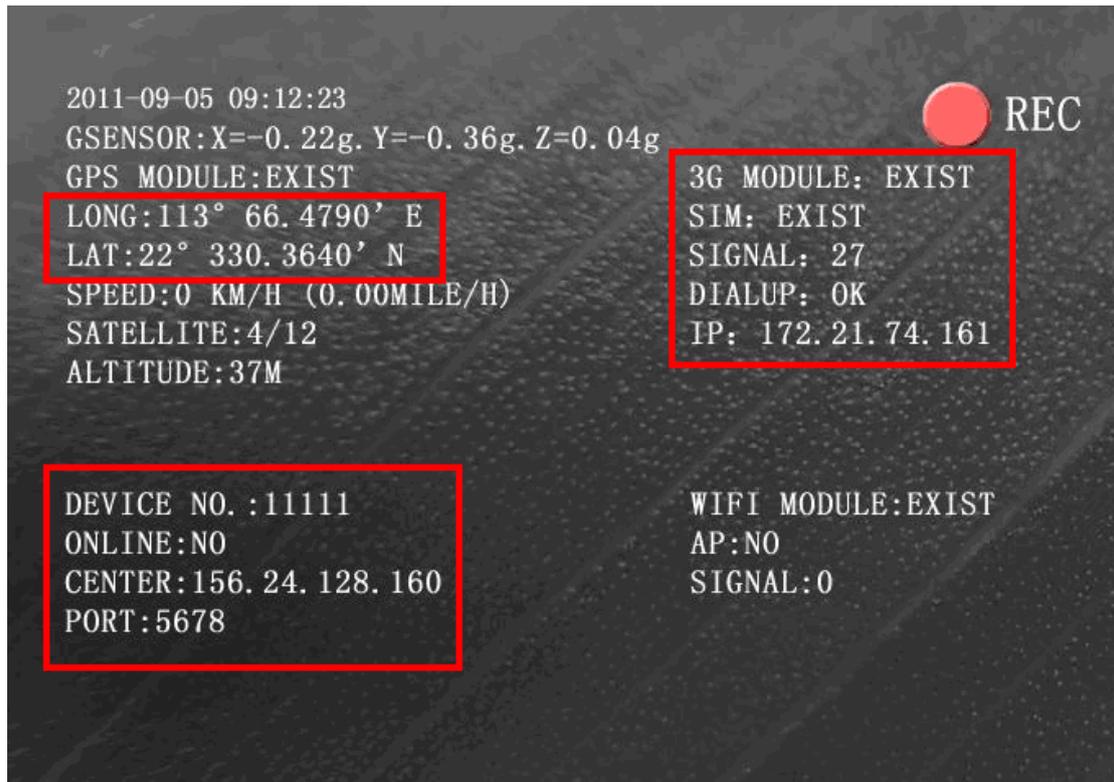
## 10. Format SD card

Enter Disc Management under the menu of Management Tools, format SD card. After formatting, the SD card will enable normal writing of video recording.

That is all the basic setting. .

## VI. Status Menu

After device installation and setting, power on the device and press the F1 button on the remote control upon display of the four monitor screens, then the device status information will be displayed.



Users may confirm the device GPS status, 3G dial status, Wi-Fi connection, online/ offline and other information via the status information.

## VII. Frequently Asked Questions

1 Q: Why is 3G transfer of data not possible?

A: The following are the possible reasons why 3G transfer of data is not working:

- 1) 3G antenna not connected;
- 2) SIM card not inserted;
- 3) The wireless-related settings in the setup menu are not correctly set.  
For example: wireless dial-up not switched on, 4G protocols setting incorrect, serial port setting not matching, etc;
- 4) The settings on the setup menu related to the central server are not correctly set. For example the central IP setting is incorrectly set;
- 5) The configuration parameters on the PC side are not correct. For example the gateway router on the PC side does not have any proper

port mapping;

- 6) The playback tool on the PC is not on;
- 7) The server software has not been running.

2 Q: What should first be done when problems related to wireless module are experienced?

A: Go straight to the screen information display or to the system information page. Press F1 on the remote control to check the dial-up status, whether the SIM card is present, whether wireless module exists, and whether the antenna is properly connected.

3 Q: Why is the device not recording video?

A: The following causes can lead to the device not recording video:

- 1) The recording mode is set incorrectly. If it is set to be the alarm recording mode, but no alarm has been triggered in that period; if it is set to be timer recording, but the current time is not within the time set;
- 2) Check the disk space. If the disk space is less than 500M, and automatic superimposed recording has been switched off at the menu setup, then recording will stop;
- 3) The ERR light on the front panel lights up. Check the system information, the disk space may indicate as 0; check if the disk drive has been inserted, or if the disk drive has been formatted;
- 4) On the menu setup, all the 4 channels indicate they have been turned off;

4. Q: Why is there no audio sound in the recording?

A: There are following possible reasons why there is no audio sound:

- 1) In the audio settings, the sound is not turned on;
- 2) The audio output cable is not connected or there is connection error;

5 Q: Why is the alarm not triggered?

A: The alarm is not triggered because of the following possible causes:

- 1) Settings on the alarm menu setup incorrect; for example, the function of specified alarm input is not switched on, or the alarm signal level setting is incorrect;
- 2) The alarm input cable is not properly connected or not connected at all;
- 3) The signal level of the alarm triggering source is incorrect;

6 Q: When the device is switched on, why does the power light not light up?

A: The following reasons can cause the power light not light up:

- 1) The voltage is not within 8V to 36V range;
- 2) The power fuse on the power cord input line has burnt out;
- 3) The ignition signal is not connected;

7 Q: Why does the ERR light lights up?

A: Under the following conditions, the ERR light lights up:

- 1) SD card and hard drive not inserted, or the SD card and hard drive have been inserted, but the system partition is not valid, so the device cannot recognize them;
- 2) Read and write error of the hard drive;
- 3) Microcontroller working abnormally;

8 Q: Why does SD card light not light up or flash?

A: The SD card light has 3 states: off, on and flashing, and they convey following messages respectively:

Off: The SD card has not been inserted or the device cannot read the SD card;

On: The SD card is present, but is not in the currently recording disk;

Flashing: The SD card is present and is also in the currently recording disk;

9 Q: Why are some channel images like black screens?

A: The phenomenon that some channel images are like black screens is due

to the following possible causes:

- 1) This channel is not connected to the video;
- 2) The camera connected to this channel is damaged or not working properly;
- 3) The cable connecting to this channel is not connected properly or damaged;

10: Why is there no GPS signal?

A: There are following possible causes why there is no GPS signal:

- 1) The GPS module is not connected or there's no signal inside;
- 2) The GPS interface is damaged
- 3) The GPS module is damaged;

11. Q: Why is the remote control not able to remote control?

A: The remote control cannot remote control because of the following possible causes:

- 1) There is no battery in the remote control, or out of battery;
- 2) The remote control is damaged;