

BOYO®

VTC700RQ-2 / VTC700RQ-4

USER MANUAL

2.4GHz Digital Wireless Recordable
Rearview Camera with 7" Color LCD Monitor

2.4GHz Digital Wireless Recordable
Rearview Camera with 7" Color LCD Monitor



Model: VTC700RQ-2 / VTC700RQ-4

EU Environmental Protection

Waste electrical products should not be disposed of with household waste. Please recycle where facilities exist. Check with your local authority or retailer for recycling advice.



Version 2.2

Please read this user manual carefully before using this product.
Failure to understand operation procedures may result in injury.
* The pictures are for reference only, please refer to real subjects.

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Foreword

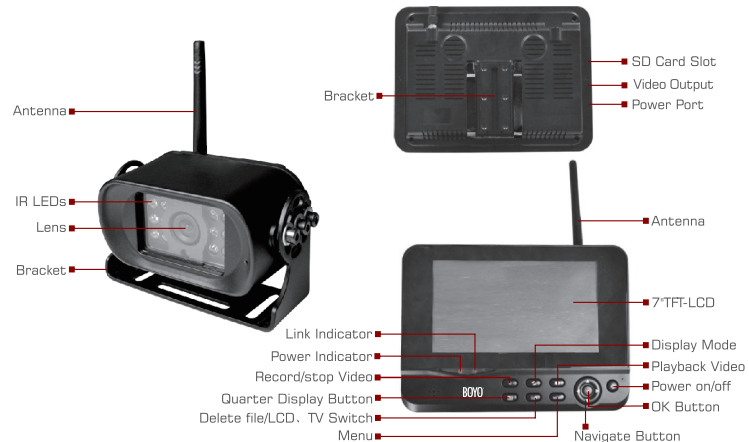
CONGRATULATIONS. The Rearview Camera, when used as described, will give you years of dependable service in your car, truck, RV, or mini-van. We have taken numerous measures in quality control to ensure that your product arrives in top condition, and will perform to your satisfaction.

Packing list



※ The pictures are for reference only, please refer to real subjects.

Structure



Installation

These installation instructions do not apply to all vehicles. They are meant as only as a general guide to big vehicle makes & models. For specific questions, contact your vehicle manufacturer. Consult your local motor vehicle laws on the use of this product. Do not attempt this if you are not knowledgeable with electrical installation practices.

◆ Setup: Camera pairing

1. Press the POWER button on the monitor for 3 seconds, the power indicator will illuminate.
2. This equipment has paired successfully out of factory. If not display image you need to pair again.



Wireless Camera Pairing Easy Step

VTC700RQ - Display Pairing option Step
Press Menu Key Button Main Unit >
go to Camera Setup >
go to Pairing > Select camera channel >

Pairing.....
Long press the PAIR button on TX for 2 seconds
52

Follow the below step by step instruction



🔊 Prompt

If the code is not matched successfully, "code matching failed" will appear. Please match the code again.

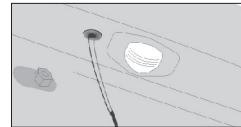
◆ camera Installation:



1. You may mount the camera near the top of the license plate with screws.



2. Drill six holes: one hole for the camera's power wire and five holes for installation of the camera.



3. Insert the power wire of the camera into the supplied grommet and then pass the power wire into the vehicle.

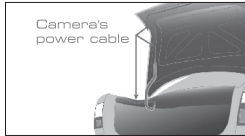


4. Install the camera with five screws supplied and adjust the camera to a proper angle.

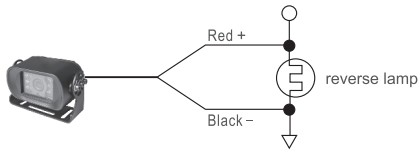
Notice

- ※ The product is not suitable for mini vehicles. For specific vehicle such as container car or container truck, please consult your local vehicle garage for installation.
- ※ Some vehicle may have a hole available to pass the wire through, you do not need to drill a hole.
- ※ Before drilling those holes, you must check out and make sure no other components too close to your augille. Before drilling, we strongly recommend you to remove electrical parts or fuel system behind the vehicle door and clear the surroundings to avoid unexpected damages.

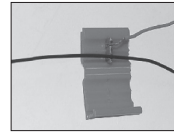
camera power wire connection:



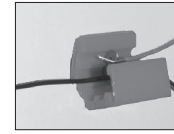
1. Once you have located the reverse light circuit, you need to route the power wire to that location. You must securely fasten the power wire to prevent it from being caught on by vehicle component such as the trunk hinge. Never route the cable outside the vehicle.



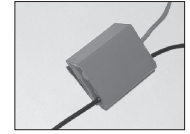
2. The camera is equipped with Reverse Voltage Protection, please make sure that the Red wire is connected to positive (+) and the Black wire is connected to negative (-).



Insert the existing wire to be tapped.



Insert the wire to be attached.



Crimp tap and then close lock

3. Wrap In-Line wire connectors over the camera power wire.

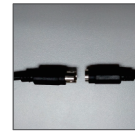
monitor installation:



1. Fastening the suction holder to the interface of the monitor back.



2. Peel off the backing paper of the suction holder and suck it on the front window of vehicle.



3. Connect power of the monitor: Reference to the connection way of the camera power wire, and connect the trigger line correctly, then insert it into the socket of monitor:



4. Power on and the power indicator lights blue, adjust brightness, contrast and orientation for image of the monitor:

Trigger wire installation:

A How to install the trigger wire

1. connecting the corresponding female jack first to the monitor male part
2. red/black power wire for the monitor power 9-32V
- 3- 4 different trigger wires to different camera power source

B Four different color labeled trigger wires

- White- camera 1 back-up; Green-camera 2 left;
- Yellow-camera 3 right; Blue- camera 4 toybox inside/front view

C Trigger wire functions

1. Turn signal: when turning light signal is pulsed on, left-side camera (camera2)/ right side camera (camera 3) is activated accordingly.
2. Rear image: when back-up, the rearview camera image will automatically be activated.
3. Trigger video stay: when set left and right side camera, the triggered video will stay on 3 seconds after pulsing on.

option installation:

For better transmission effect, please connect the optional 2m antenna to the wireless camera/monitor. The 2m antenna is sucked on the tail of truck.



Operations

1. After successful pairing, Monitor will have five related responses as below.

- A .When installed camera and monitor -turning on, Reverse camera displays as full screen.
- B .While turning left-the triggered left camera image shows on monitor as full screen.
- C .While turning right -the triggered right camera image shows on monitor as full screen.
- D .If neither turning left nor right, the system will be returned as 4ch system.
- E .When back up, no matter right or left camera is triggered, always shows the backup camera as full screen.

Press the **[F4]** button to switch between four display modes:



Four pictures



One picture



One large picture and three small pictures



One large picture and three small pictures

2. Press the **[F5]** button to enter cyclic mode display. Five cyclic intervals are available: 5s, 10s, 15s, 20s, and 30s and can be set under "System".

	Successfully insert the card	V	The camera is the current camera
C1 C2 C3 C4	Camera name		Video recording status
	Signal intensity		

3.Video recording

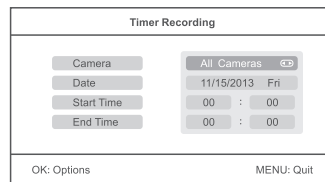
Manual Recording:

- A .In the real-time monitoring status, press the **[Left]** or **[Right]** buttons to select the camera for video recording as the current camera.
- B .Press the recording/stopping **[F5]** button on the device.
The recording icon is displayed on the screen, indicating that recording starts.
- C .Press the **[F5]** button on the device again to stop recording.

Timer Recording:

Set the recording start/stop time through the "Timer Recording" menu. The device automatically records according to the set start/stop time. After recording, it automatically saves the video. Specific steps are as follows:

- A .Press the MENU button to enter setting interface;
- B .Press the **[Left]** or **[Right]** button to select "Record" and press the OK button to enter;
- C .Press the **[Up]** or **[Down]** button to select "Timer Recording" and press the OK button to enter;
- D .Press the **[Up]** or **[Down]** button to select "New Schedule" and press the OK button to enter:



Press the **[Up]** or **[Down]** button to select; Press the **[Left]** or **[Right]** button to adjust; Press the OK button to confirm and exit;

E. After setting, the device automatically records according to the set start/stop time.

4. Playback the video

A. Under the status of real-time monitoring, press the playback key (⏮) on the equipment to enter the following interface:

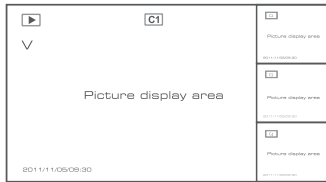
B. Press key ▲, ▼ on the equipment to select folders;

C. Press OK key and enter the folders;



D. Press key ▲, ▼ to select videos to be played back

E. Press OK key to playback the video:



Press ◀, ▶ key for fast backward and fast forward;

Press OK key again to pause the video;

Press MENU key to exit the play mode.

5.Delete the video

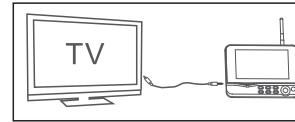
A. Under the playback mode, press (⏮) to select videos or folders to be deleted;

B. Press the delete key on the equipment to delete (⏻)

! Attention

Folders can be deleted when they are empty.

6. Video are able to be output from the monitor to bigger display device, such as TV or other screen with a RCA video input. When the connection is successful, Press the (⏻) button to switch display between the monitor/TV and the receiver.



Switching to NTSC TV system...

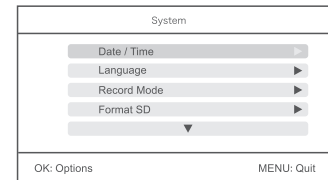
※ If the image does not display on TV, Please check the video cable is fully inserted into the monitor.

System setting

Under the status of real-time monitoring, press the "MENU" key on the equipment to enter the setting interface:



Press ◀, ▶ key to choose "system setting", and press OK key to enter the interface of system setting:

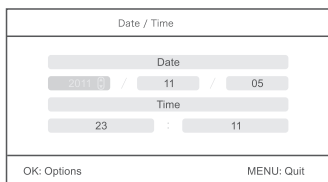


Press ▲, ▼ to choose items, and press OK key to enter.

Date/Time	Set system time and date;
Language	Set system language;
Video recording mode	Stop the video recording or replace the most previous video recorded when the storage medium is fully occupied;
Format SD	Format the storage medium or not;
Video storing device	Display the storage capacity
Display items	Whether the signal intensity, SD status, camera names, etc. are displayed on the display screen and video recorded;
TV system	Choose system;
System information	Check the system information
System upgrade	System upgrade;
Scanning period	Set interval time displayed in cycle on the camera monitoring screen;
Factory reset	Recover the factory setting or not;
Brightness	Adjust the brightness of LCD screen;
Power-saving mode	Adjust the power-saving mode;

◆ Date/Time

Press OK key to enter the setting interface of time and date:



Press ◀, ▶ to select items to be changed;
 Press ▲, ▼ key to change;
 Press OK key to complete the change;
 Press the MENU key to exit the setting interface of time and date.

◆ Language

1. Press OK key to enter the setting interface of language;
2. Press ▲, ▼ to select appropriate language, and press OK key to complete the setting and exit from the interface.

◆ Video recording mode

1. Press OK key to enter the interface of video recording mode;
2. Press ▲, ▼ to choose "Ordinary" or "Overwriting", and then press OK key to complete the setting and exit from the interface.

🔊 Prompt

Ordinary: The camera will stop recording automatically when the SD card is fully occupied;

Overwriting: The system will delete the most previous videos automatically when the SD card is fully occupied to clear enough storage space to ensure this recording.

◆ Format SD

1. Press OK key to enter;
2. Press ▲, ▼ to choose "Cancel", "Enter";
3. If "Enter" is selected, press OK key to enter formatting:






4. After the formatting is completed, the hint "formatting finished" will prompt.

◆ Video storing device

1. Press OK key to enter, and the storage capacity can be displayed.
2. Press OK key to complete the setting and exit from the interface.

◆ Display items

1. Press OK key to enter;
2. Press ▲, ▼ key to select;
3. Press OK key to check whether the item displays. If the item is displayed, the icon behind will appear ✓
RSSI: Icon of signal intensity. Icon: 
SD status: Whether the SD card is inserted. Icon: 
Video camera: Camera name. Icon: 
4. Press the MENU key to complete the setting and exit from the interface.


◆ TV system

1. Press OK key to enter;
2. Press ▲, ▼ key to select;
3. Press OK key to complete the setting and exit from the interface.

◆ System information

1. Press OK key to enter and check the information;
2. Press the MENU key to exist.

◆ System upgrade

1. Press OK key to enter;
2. Press ▲, ▼ key to choose cameras to be upgraded;
3. Press OK key to adjust;
4. Press the key to upgrade ;
5. Press OK key to enter or press the MENU key

◆ Scanning period

1. Press OK key to enter;
2. Press ▲, ▼ key to select;
3. Press OK key again to complete the setting and exit from the interface.

◆ Factory reset

1. Press OK key to enter;
2. Press ▲, ▼ to choose "Cancel", "Enter";
Cancellation: cancel Restore Defaults
Affirm: Restore Defaults
3. Press OK key to complete the setting and exit from the interface.

◆ Brightness

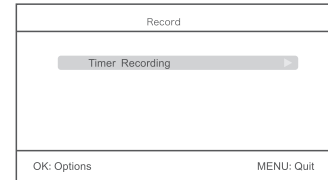
1. Press OK key to enter;
2. Press ◀, ▶ to adjust;
3. Press OK key to complete the setting and exit from the interface.

◆ Power-saving mode

1. Press OK key to enter;
2. Press OK key to enter;
3. Press ▲, ▼ key to select;
4. Press OK key to complete the setting and exit from the interface.

Recording setting

1. Under the status of real-time monitoring, press the MENU key on the equipment to enter the setting interface:
2. Press the key ◀, ▶ to choose "Recording Setting";
3. Press OK key to enter the following interface:



◆ Preset video recording

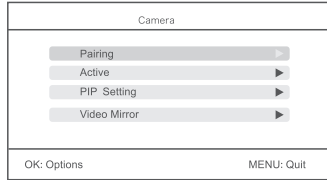
Set the beginning and ending time of video recording, and the equipment will make video recordings in accordance with the set time. After the recording, the video will be saved automatically (see its specific steps in the operation part of "Preset video recording").

Playback the video

See its specific steps in the operation part of "Playback the video"

Camera setup

1. Under the status of real-time monitoring, press the MENU key on the equipment to enter the SETTING interface;
2. Press ▲, ▼ key to choose "Camera setup";
3. Press OK key to enter the following interface:

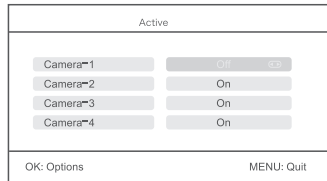


◆ Pairing

See its specific steps in the installation part of pairing

◆ Starting status

1. Press ▲, ▼ to choose "starting status", press OK key to enter;



2. Press ▲, ▼ key to choose cameras to be set;
3. Press ◀, ▶ ON" or "OFF";
4. Press OK key to complete the setting and exit from the interface.

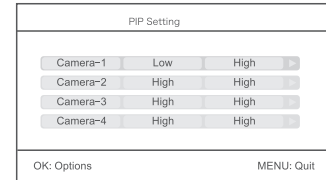
⚠ Attention

When you press "OFF", the camera will not have any reaction such as display of monitoring screen, video recording, etc.

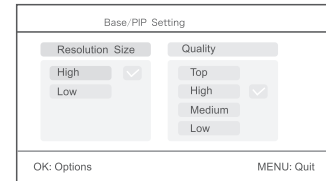
◆ PIP setting

Set the resolution ratio and pixel of video recording.

1. Press ▲, ▼ to choose "PIP setting", press OK key to enter;



2. Press ▲, ▼ key to choose cameras to be set;
3. Press OK key to enter the following interface:



Press the ◀, ▶ key to choose "resolution ratio" or "image quality"; Press ▲, ▼ to choose "Premium", "High", "Medium" or "Low"; Press OK key to complete the changes; Press the MENU key to complete the setting and exit from the interface.

◆ Image mirroring and reversal

1. Press ▲, ▼ key to choose "Image mirroring and reversal", and press "OK key" to enter;
2. Press ▲, ▼ key to choose cameras to be set;
3. Press the ◀, ▶ key to choose "left/right" or "up/down" or "left/right and up/down";
4. Press OK key to complete the setting and exit from the interface.

Prompt

Reference for recording time of 32G card: (Note: the recording time may be different due to the various recording environment and setting, so the following information is only for your reference)

1-way:	About 266 hours
2-ways:	About 133 hours
4-ways:	About 66 hours

Specifications

	Items	Value
Camera	Imaging Sensor	CMOS
	Total Pixels	640 × 480
	Horizontal View Angle	85°
	Transmission Frequency	ISM 2,400-2,483MHz
	Minimum Illumination	0 Lux (IR ON)
	IR Night Range	3m
	Modulating/Demodulating	16QAM,QPSK,BPSK
	Power Supply	+12/+24VDC
	Waterproof	IP66
	Dimensions (W × D × H)	96 × 52 × 61 (mm) (Excluding Bracket)
	Approx. Weight	440g
Receiver	LCD Screen Type	7" TFT-LCD
	Transmission Frequency	ISM 2,400-2,483MHz
	Screen Resolution	800 × 480
	Video System	NTSC/PAL
	Received Sensitivity	-72dBm@QAM, -85dBm@QPSK
	Consumption Current (Max.)	650mA
	Dimensions (W × D × H)	214 × 26 × 157 (mm)
	Approx. Weight	518g (Excluding Bracket)
	Power Supply Voltage	DC +9V~32V
	Unobstructed Effective Range (Matching)	< 130m
	SD Card	Supports to 32GB
Operating Temperature	-10°C~+50°C	
Operating Humidity (Max.)	15%~85%RH	

- ※ The actual transmission range may vary according to the weather, location, interference and building construction.
- ※ All the specifications are subject to minor change without prior notice.

FCC Information

This device complies with part 15 of the FCC Rules. Operation is subject to the following two conditions:

- (1) This device may not cause harmful interference.
- (2) This device must accept any interference received, including interference that may cause undesired operation. Changes or modifications not expressly approved by the party responsible for compliance could void the user's authority to operate the equipment.

Cautions

- The apparatus shall not be exposed to dripping or splashing and no objects filled with liquids, such as vases, shall be placed on the apparatus.
- Turn off the camera/receiver if the system is not in use.
- The camera/receiver can only be completely disconnected from the mains by unplugging the adapter.
- Do not cut the DC power cable of the apparatus to fit with another power source.
- Attention should be drawn to the environment aspects of battery disposal.