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Owners Manual BVR400 II SYSTEM
4 CH DVR System
V1.0

WELCOME STATEMENT & WARNINGS

Congratulations and thank you for purchasing the RYDEEN BVR400 II 4 CH DVR System. We hope you will enjoy using this exciting product and trust that it will make your driving experience more enjoyable and hassle-free.

Please read this Owner's Manual carefully before using this product. If you have any further questions about your BVR400 II operation, feel free to call RYDEEN, Toll Free at 1-877-777-8811 (within USA only) for product support, or visit our website:www.rvdeenmobile.com.



M WARNINGS **M**



- THE FOLLOWING INSTRUCTIONS ARE INTENDED FOR AUTHORIZED RYDEEN MOBILE INSTALLERS ONLY.
- PROFESIONAL INSTALLATION BY AUTHORIZED RYDEEN RETAILER REQUIRED TO BE COVERED UNDER WARRANTY.
- **EXCESSIVE SHOCK** due to dropping any components in the system or subjecting it to excessive shock and vibrations may cause malfunction and is not covered by warranty.
- The Control Box of the BVR400 || System IS NOT WATERPROOF. Avoid exposing it to rain or other forms of excessive moisture.
- Water damage is not covered under the warranty.
- CAN BUS Vehicles: There is NO NEED TO CUT AN ORIGINAL VEHICLE WIRE YOU MUST SPLICE WIRE ONLY AND OBTAIN POSITIVE POWER (+12V).
- YOU MUST CHECK BEHIND BUMPER FOR ANY METAL BRACKETS OR INTERNAL BRACES BEFORE DRILLING.
- The use of Rydeen BVR400 IISystem should never replace normal operational and safety precautions needed for reversing a vehicle. Caution should always be taken in ANY vehicle operation.

MAIN SPECIFICATIONS

Item	Specification		
01.Video format	Video format file: MOV		
02.The recorder mode	Cycling recording		
03.Video trigger mode	Acc On start-up , G-Sensor trigger recording		
04. Video resolution	D1(640x480/30FPS)		
05.Storage medium	Micro SD/MMC(Maximum support to 32GB SDHC)		
06.Storage timing	8 GB SD card for dual video recording at same time		
07.Video timing	1.5 min cycling		
08. Image mode	11 Image modes		
09. Image selection	Cycle switching image mode (4 modes) by a hardware switcher		
10. Sleep mode	Goes to sleep mode when ACC is powered OFF		
11.G-Sensor file storage capacity	30% of card capacity (G-sensor sensitivity is adjustable by rolling the knob on the G-sensor box)		
12.Rated Current	3-300mA		
12.Working voltage	9-36V DC		
13.Storage temperature	-10℃-60℃		
14.Working temperature	-20℃-70℃		
15.Working environment humidity	45~80%RH		

WHAT'S IN THE BOX



Host (1 set)



Cameras set (front, rear, left & right)



3.5mm Microphone (1set)



Video extension line (1 set)



G-sensor Box (1set)



Camera extension cables (4set)



Remote & SD card (1set)



Button Switcher (1 set)



Manual (1 pc)

- 1. The picture may be slightly different from the actual product.
- 2. According to the product configuration you choose different, parts may be added, refer to the actual product.

CONTROL BOX INTRODUCTION





Video interface

Video out - Car video output, reversing camera for navigation Video input or other display devices

Video - Video sync output (field type) or other video sources

- Front view Front camera video input
- Rear View Rear camera video input
- Left view Left camera video input
- Right view right camera video input

Power supply interface

- ACC-ACC: Key ignition power input (+ 12 V, when key is in the RUN position)
- BAT-BAT: Constant Battery power input DC + 12V at all times
- Monitor Trigger Monitor trigger signal (+12V Output trigger)
- Ground GND Chassis ground (-). Or Negative battery post
- Front High Beam signal input to trigger the BVR400 II display (ON/OFF). Quick pulse of the voltage will activate the display function.
- Rear Trigger: Reverse light signal input (+)
- Left Trigger: left turn signal input (+)
- Right Trigger: Right turn signal input (+)
- 3.3 V-DC 3.3V Volt Camera output

(Note: Please use cameras which have a 3.3V working voltage)

Button descriptions

- Micro SD-Supports up to 32G SD Card (video 15 minutes to pack a video file)
- Playback (Long press) to enter playback mode
- Time (long press) to enter the time setting mode; continuous short press
- [Time] key can be set separately time format: Y/M/D/MIN/S
- Delete In the Playback state, press and hold to delete the current recording file
- Protection -In the playback mode, (long press) can protect (or unprotect) the current recording file from being overwritten or deleted
- Exit In Playback mode, (Long press) you will exit Playback mode
- In the time settings mode, (long press) exit and save the current time setting
- Start In the playback mode, press the [Start] key to start playback of the current recorded file, monitor is on (not recorded), press [Start] key to start recording
- Stop During playback, press the [Stop] key to stop playback
- Press [STOP] key to stop the recording
- ◄ In the time setting mode, press [◄], the time setting will decrease by "1" In playback mode, press [◄] to select the previous recording file
- When playback is in progress and playback is in progress, press the {1} key once, and the 1X (1X) speed will be played back, 2x (2x), 4x (4x), 8x
- ▶ In the time setting mode, press [▶] key, the time set value will increase by "1" In the playback mode and not starting playback, press the [▶] key to select the next recording file 2X, 4X (4X), 8X (8X) speed playback in 1 × (1X) speed while playback is in progress and playing.

REMOTE CONTROL

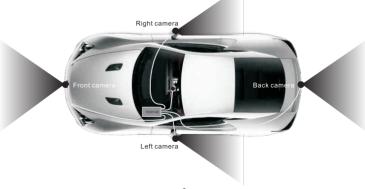


Attentions before usage:

- Before you try to use remote control, please remove the battery isolation PVC film.
- (2) The product has an infrared remote control receiver, when operating, please point the remote at the receiver.
- (3) When the control voltage or batteries are old, the remote's operation will slow or stop working, please replace the old batteries
- (4) When replacing the batteries, please use the CR2025 button cell battery only and insure the battery has been installed in the correct direction. (+ to +)

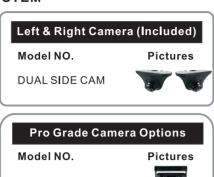
Icon	Function / Description	Icon	Function / Description
DVD	Video switching button		Left(bigger) & Rear & Right images
	Front view full screen		Left & Rear & Right(bigger) images
	Rear view full screen	PB	Playback
	Left view full screen	TIME	Time settings Delete files
0	Right view full screen	6	Lock and unlock files
	H-type image mode	EXIT	Exit from the current menu
	4-image split display		Play video Start recording
	Front & Left & Right images	0	Stop Playback or Recording
	Left and right images		Fast backward Next
	Rear & Left & Right images	•	Fast forward Rewind

WIRING DIAGRAM OF CAMERA INSTALLATION



CAMERA OPTIONS FOR THE SYSTEM







internal microphone. In such usage NO NEED to use the supplied microphone.

Attached: left and right turn indicator trigger line search method

Left & right turn indicator trigger line position



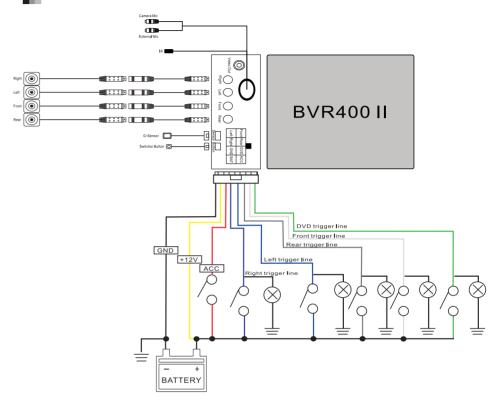
Left & right turn indicator trigger line testing methods





- 1. Turn Indicator trigger line position: The turn indicator lamp trigger line can be located near the center console, in the bottom left under dash or at the switch in the steering column.
- 2. Turn indicator trigger line testing methods: Use a multimeter with the black probe connected to the body or Ground of the vehicle. Turn the Ignition key **ON**. Turn **ON** the left or the right turn indicator and probe the wires for voltage with the RED probe of the meter in order to test harness voltage, The trigger wire should show 12 Volt (+) **only when the turn indicator has been initiated for that direction.** Do this to find the right and left trigger wires.

WIRING DIAGRAM ILLUSTRATIONS



Power supply and trigger wiring diagram:

- 1. The blue line: connected to DVD display trigger line;
- 2. The black line: GND, wire, to connect the negative Battery cable or any stable chassis ground:
- 3. The yellow line: BAT+12V, connect The Battery (+) Cable or any 12 V+ wire that is ON at all times:
- 4. The red line: ACC, Power with the key in the RUN position. Connect to +12V wire that is ON **Only** with the key in the RUN position;
- 5. The orange line: Positive Right turn indicator input (+);
- 6. The pink line: : Positive Left turn indicator input (+);
- 7. The green line: connect to the reversing positive trigger from the reverse lights (+).

System Startup display modes:

- 1. The Image is always be showing reverse mode for a set period of time before automatic shutdown
- 2. Remote boot display: No image will be shown on startup
- 3. Double flash boot display: Start up screen for 15 seconds and then changes to other video input. (If Any)

PREVIEW OF THE SYSTEM WITH CAMERA IMAGES IN SPLIT SCREEN

When driving

front, rear, left, right, four way image on display



When steering: left and right image on display

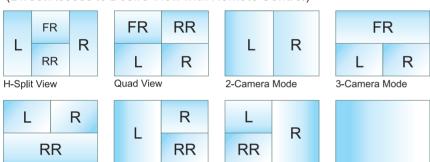


1 Camera Mode (4 options)

MONITOR VIEW OPTIONS

(Direct Access to Desire View with Remote Control)

Left Turn Mode



Right Turn Mode

TROUBLE SHOOTINGS

Solutions for common problems

3-Camera Mode

- 1. Screen, NO display: check to insure the screen cable is properly connected and terminal connection is not loose.
- 2.One camera has NO display: check to see if the road camera power supply is OK and if any camera could have been damaged during installation. Check all camera connections.
- 3. The system does not start: look to see if the power indicator light is bright, if not bright, please check the power cable connection to be sure they are secure and wired correctly.
- 4.The SD card suddenly cannot be recognized by the system: Please format the SD card on a computer and reinstall it in the system

Other problems

- 1. No video (screen without red dots):
- .The SD card is full, not formatted or corrupted;
- ☐ .The SD card is not inserted in place;
- ☐ .Did not press the OK key, start recording.
- 2. Does not display (no image display DVD host):

 ☐ .Check the 32P host jack to insure it is plugged in correctly
- . Oneck the 32F host jack to insure it is plugged in correctly.

 ☐ .The system starts normally wait 15 seconds and the lights should be flashing;
- ☐ .The machine is booting, wait 15 seconds before entering the main interface;
- ☐ .The blue screen. Host DVD trigger line is connected, and check whether the 12V output is present.

One Year Limited Warranty

Rydeen North America Inc. (a manufacturer of RYDEEN" products) warrants this product (BVR400 II System) only to the original purchaser as described by the following:

Warranty Period

Rydeen warrants this product for a period of three (3) years from the original purchase date.

Warranty Coverage

This warranty covers all defects in material and workmanship except as specified below.

- 1. <u>Installation by anyone other than an authorized RYDEEN retailer voids the warranty.</u>
- 2. Any products distributed outside of the USA by Rydeen North America Inc. (RYDEEN) or which is not purchased in the USA or Canada unless the product is purchased through the USA Military Exchange Service.
- 3. Any product(s) which are purchased from an unauthorized retailer (in store or online).
- 4. Any products in which the serial number label or the model number label are removed, torn, modified or replicated.
- 5. Any damage defects or malfunctions resulting from any of following:
 - When defect occurs during shipment of product (freight carrier's responsibility).
 - b) Installation or removal of product.
 - Accidents, act of nature, misuse, abuse, neglect, unauthorized product modification or failure to follow product owner's manual instructions.
 - d) Any repair or attempt to repair without RYDEEN authorization.
 - e) Any other cause which is not related to product defect.
 - f) Any cosmetic damages due to normal wear and tear.
 - g) Any consumable items (such as fuse or batteries).

If any problems develop with your RYDEEN products during or after the Limited Warranty Period, or if you have any questions regarding the operation or installation of the product, you should contact your RYDEEN retailer. If the problem or your question is not handled to your satisfaction, please contact Rydeen Customer Service Department at 1-877-777-8811 (within the USA only) Monday-Friday between 9:00 AM to 4:00 PM Pacific Standard Time or visit www.rydeenmobile.com.