

Manual Date: 2016.10.13

Installation Manual

HDMI Interface for New Land rover Model: QHI-LVTX-LR



Specification

Car Compatibility: Range rover sports, Evoque, Vogue

with single view monitor

Components: Interface* 1ea, Sub-board*1ea

Multimedia interface Input/output spec

Input: HDMI*2, Analog RGB*1, A/V*1,

CVBS(Rear view Camera)*1, CVBS(Front camera)*1

Output: To LCD*1

Power spec

Input power: 8VDC ~ 18VDC

Consumption: 5WATT

Switch input mode

- External video sources skip function: able to control input videos on and off via DIP switches.
- Able to switch videos via the remote, button switch, and original buttons.
- Able to detect the rear view camera (back up camera) via Lamp or CAN.

Features

- Able to output high resolution video via HDMI input
- Control external videos sources (DVD, DTV) via Multi Media Touch
- Adjust external videos screen position
- Check the improved Screen Display (User Friendly Interface)
- Switch modes via original OEM button
- Supply power to connect rear view camera (Back up camera)
- Assist your parking via Dynamic PAS(Parking Assistance System), PDC(Parking Distance Control), moving parking line according movement of steering wheel

 Product exterior (Ino-san) Length-90mm (MANUANOS) (JEST) MULTIMEDIA VIDEO INTERFACE WITH CAN Height-18mm Width-140mm

5V-OUT(Power supply for Mirroring device) | HDMI-1 | HDMI-2 | MULTI | RGB-IN(RGB Navigation input) LVDS-OUT(Connection to Sub-board) | CAP T/S INPUT(Original touch cable connection) | RES T/S OUT(NOT FOR USE) | CAP T/S OUT(TOUCH CABLE CONNECTION-ONLY ITS PRODUCT) | TEST(NOT FOR USE) | LED | POWER/CAN(Power / CAN connection) | DIP S/W(DIP switch setting)

Components



Sub-board * 1ea



Bracket * 1ea (PRESETO347)



FFC * lea



POWER * 1ea (HPOWER0097)



MULTI* 1ea (HAVCAB0038)



(HLVDSC0035)



TOUCH OUT * 1ea TOUCH IN* 1ea (HTOUCH0031)



031) (HTOUCH0028) (support@car-solutions.com



RGB * 1ea (HRGBCA0018)



BUTTON * 1ea (HARETC0001)

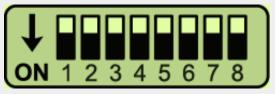


IR * 1ea (HIRCAB0002) www.car-solutions.com



RC * 1ea (REMOTE0001)

DIP SWITCH



***** ON: DOWN / OFF: UP

PIN	FUNCTION	Dip S/W SETTING	
1	RGB INPUT MUTE	OFF : RGB DISPLAY ON : Skipping RGB Mode	
2	HDMI1 MODE MUTE	OFF : HDMI1 DISPALY ON : Skipping HDMI1 Mode	
3	AV MODE MUTE	OFF : AV DISPLAY ON : Skipping AV Mode	
4	FRONT CAM MUTE	OFF : Front camera function on ON : Front camera function off	
5	NO USE (OFF)		
6	monitor setting	OFF : Default	
7	REAR MODE	OFF : OEM Rear Camera ON : External Rear Camera	
8	NO USE (OFF)		

^{*} Please make sure to disconnect the power cable of the interface and reconnect the power cable again to apply the dip switch setting whenever changing DIP switch. Otherwise, DIP switch setting will not be applied.

REMOTE CONTROL SETTING

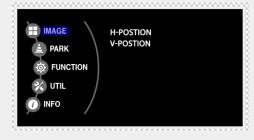


KEY	FUNCTION		
POWER & PIP	NO USE		
MENU	Activating FACTORY MENU		
ОК	Making a selection, changing image display		
A	Moving upward		
▼	Moving downward		
•	Moving leftward (If you press this button 2 seconds long, you can access the factory mode.)		
>	Moving rightward (If you press this button 2 seconds long, you can reset all the data about user environment.)		

support @car-solutions.com

www.car-solutions.com

Factory setting



Adjust a current screen position and size.

H-POSITION: Move display horizontally V-POSITION: Move display vertically



Adjust rear view camera setting.

PAS TYPE: Select type of parking guide line

- NOT USED: No use parking guide line

- PAS ON: Selecting Dynamic parking guide line

- PAS OFF: Selecting fixed parking guide line

PAS SETUP: Adjusting the position of the parking guide line





⟨H-POSITION⟩

<V-POSITION>

REAR TYPE: Choose rear camera recognition.

- CAN: By connecting to "CAN" cable of the car gear, changing to rear camera mode when shifting into reverse. (Connect "CAN" cable of the power cable to the "CAN" cable of the car gear.)
- LAMP: By connecting to the rear lamp of the car, switch to rear camera mode when shifting into rear. (Connect "Rear-C" cable of the power cable to the rear lamp of the car.)

SAFE ENABLE: If it is enable, HDMI, RGB, and A/V mode doesn't show up while driving. (Default: OFF)

RADAR ENABLE: Setting up parking distance alarm sensor. (ON/OFF)

Factory setting



Navigation & Car model setting up

NAVI MODEL: Setting up RGB Navigation.

(Default, Q-roi RGB, WP9230,

HDMI(WVGA))

HDMI MODEL: Setting up HDMI1 Navigation.

(Q-roi RGB, WP9230)

CAR MODEL: Selecting the model of car.

(Land rover, Range rover,

Discovery, Jaguar XE, Jaguar XJ,

Jaguar XF)

HDMI2 SKIP: Skipping HDMI mode when

switching modes.

AVOUT SELECT: Selecting background sound

through car AUX. HDMI1, HDMI2,

AV)



Other options setting up

CALIBRATE: Able to calibrate touch screen

REMOTE SELECT: Able to use remote control on

DVD, DTV by selecting "User" after IR memory registered.

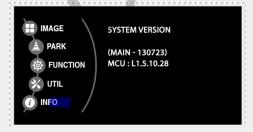
(Default, User)

IR MEMORY: Registering IR memory

(Remote control values) of DTV,

DVD.

FACTORY RESET: Factory mode reset.



System version information

How to use OEM buttons

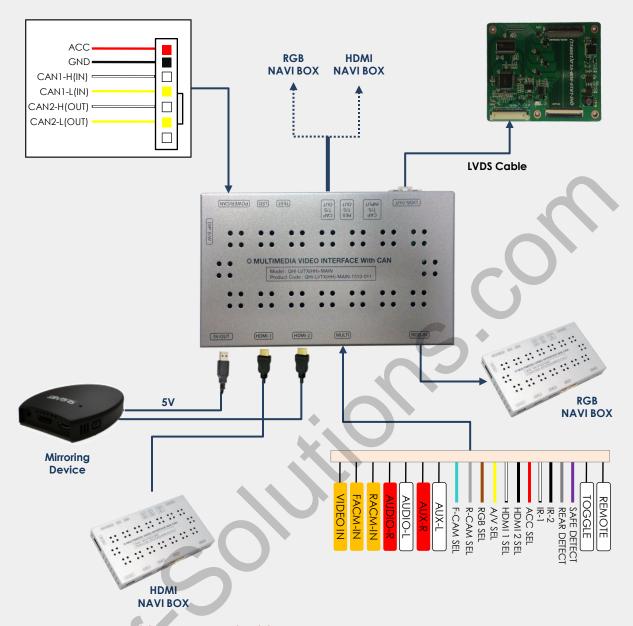


- * Able to switch modes via NAV button of car monitor.
 - * Long press : Switching modes

(RGB→HDMI1→HDMI2→A/V→OEM Mode)

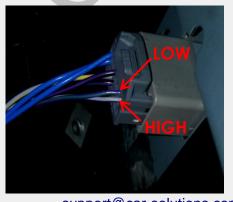
- * Short press: Switching to OEM Mode.
- * Able to switch to OEM Mode with other buttons too.

Installation Diagram



* HDMI NAVI must be connected to HDMI-1.

CAN cable connection



support@car-solutions.com

- * Find the original cable at the back side of monitor.
- CAN HIGH(#7 pin-Purple/Blue) \rightarrow Connect to CAN1-H(White)
- CAN LOW (#8 pin-Purple/Grey) \rightarrow Connect to CAN 1-L (Yellow)
- Color of cable would be different depending on Cars.



<u>Pin map</u>

www.car-solutions.com

Connection of monitor



Remove the monitor from the car.



Attach the provided bracket and sub-board on the LCD part.



Connect the original FFC cable from "FROM COMMNAD" on Sub-board to PCB part.



LCD PCB

Conginal FFC cable

Disassemble the monitor like a picture above

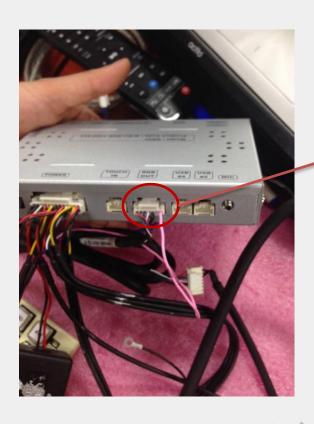


Connect the provided FFC cable from "TO LCD" on Sub-board to LCD part.

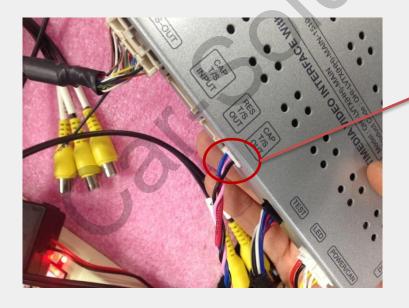


Pass the provided LVDS cable through openings of the PCB part and then connect the cable to "LVDS IN" of subboard.

Connect to Q-ROI RGB



Connect one wire into the most right pin hole of RGB Out cable. It's Q-ROI RGB Uart wire.



Connect the Uart cable*
to CAP T/S Out from QHILR15 Interface.
*The pink wire among

three wires

Trouble shooting

Q. I cannot change mode

A. Check connection of Ground cable and IR Cable. Check LED lamp is on, if not check connection of POWER cable.

Q. All I got on the screen is black.

A. Check second LED lamp of the interface is on, if not, check A/V sources connected are working well.

(Second lamp indicates AV sources connected works well.)
Check interface connection has been done well.

Q. Displayed image color is not proper (too dark or unsuitable color)

A. Press ▶ button on the remote control for 2 seconds and check how it goes, if it does not work, inform to manufacturer.

Q. I cannot watch the rear camera on the screen

A. Set the DIP switch #7 as state "ON".

Q. Set mode not appear

A. Check DIP Switch.

Q. OEM image is not displayed.

A. Check interface's LCD In/Out cable connection. If the status keeps on, inform to manufacturer.

Q. Screen only displays white color.

A. Check LCD out cable is connected well, if this status keeps, inform to manufacturer.

Q. If the original screen is shown half only after using the handle button for running the PIP function.

A. This is not because of defect but incorrect setting up. Make sure to set up the original monitor function as "split screen"

Q. If no image is shown on screen after connecting CAN wire with Park gear.

A. Go on the "FACTORY MODE", check "UTIL-Rear Select". If "LAMP", change the setting as "CAN" with the remote control. (* when connecting Rear-C wire of LAMP power cable to Backup lights, Setting should be like this / CAN: if controlling rear camera with CAN wire)

Revision History

Date	History	Page
2016.01.19	- Compatible car revision (Insert Single view monitor phrase)	2page
2016.03.08	- Q-ROI RGB Uart Connection part added	10Page

support@car-solutions.com

www.car-solutions.com