Installation Manual
Video Interface for FIAT 500 Series

• Specification

Compatibility : 2016 FIAT 500 Series, Alfa Romeo 5inch

Components : Interface* 1pcs, Subboard* 1pcs

Interface Input/Output specification
Input : Analog RGB*1, A/V*1, CVBS(Rear Camera)*1
CVBS(Front Camera)*1
Output : To LCD*1

Power Spec
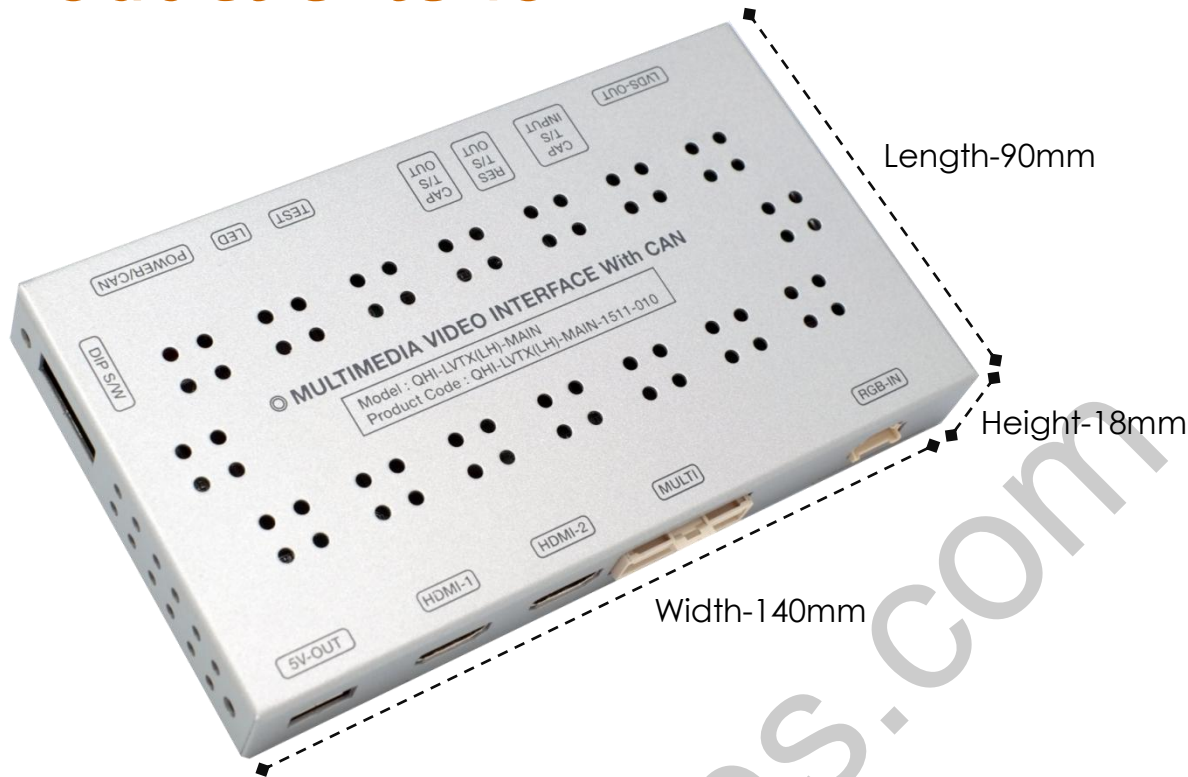Input Power : 8VDC ~ 18VDC
Consumption : 5WATT

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.
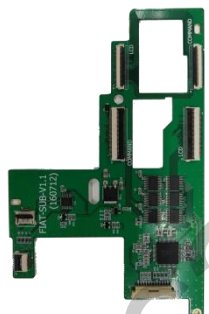
• Features

- 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 rear view camera (Back up camera)
- Offer Dynamic Pas(Parking assistance system), moving parking line based on the steering wheel movement.

• Product exterior

Length-90mm

Height-18mm

Width-140mm

MODE(Button cable) | IR(IR cable) | POWER(Power cable) | REAR(rear cable) |
RGB-IN-HDMI(Mirroring connection) | RGB-IN-NAVI(RGB Navigation) |
AV IN/OUT(AV cable | TO NAVI T/S OUT(NAVI touch cable) | LVDS-OUT(Subboard)
TEST(No use) | LED | DIP S/W(Dip switch setting)

• Components

Sub board * 1ea
(PCBSUBC0441)

Power * 1ea
(HPOWER0044)

TOUCH * 1ea
(HTOUCH0004)

NAVI * 1ea
(HRGBCA0013)

AV * 1ea
(HAVCAB0002)

LVDS * 1ea
(HLVDSC0047)

FFC * 1ea
(FFCBAL0079)

FFC * 1ea
(FFCBAL0078)

FFC * 1ea
(FFCBAL0072)

R-CAM * 1ea
(HARETC0002)

BUTTON * 1ea
(HARETC0001)

IR * 1ea
(HIRCAB0002)

Remote * 1ea
(REMOTE0001)

• DIP SWITCH

※ ON : DOWN / OFF : UP

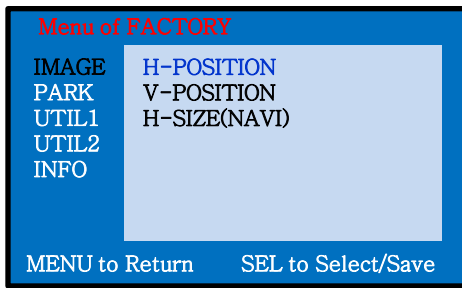| PIN	Function	Dip S/W
1	RGB mode	OFF : Display RGB(Navi) Mode ON : Skip RGB(Navi) Mode
2	AV1 mode	OFF : Display AV1 Mode ON : Skip AV1 Mode
3	AV2 mode	OFF : Display A/V2 Mode ON : Skip A/V2 Mode
4	Front camera	OFF : Display A/V3 Mode ON : Skip A/V2 Mode
5	Car model	5-OFF 6-OFF : Fiat 500c(Europe version) 5-ON, 6-OFF : Fiat 500x 5-OFF, 6-ON : Alfa Romeo 5-ON, 6-ON : Fiat 500c(Default)
6		
7	Rear Camera	ON : Aftermarket rear camera OFF : OEM rear camera
8	No use(OFF)	

※ Please make sure to disconnect and reconnect the power cable after changing the dip switch setting. Otherwise, new dip switch setting will not be applied.

• Remote Control

Key	Function
POWER & PIP	No use
MENU	Activate FACTORY mode
OK	Select, Changing image display
▲	Move up
▼	Move down
◄	Move left(Access to the factory mode if you press this button more than 2 seconds)
►	Move right (Activate the data reset if you press this button more than 2 seconds)

4

• Factory Setting

```
Menu of FACTORY

IMAGE     H-POSITION
PARK      V-POSITION
UTIL1     H-SIZE(NAVI)
UTIL2
INFO

MENU to Return      SEL to Select/Save
```
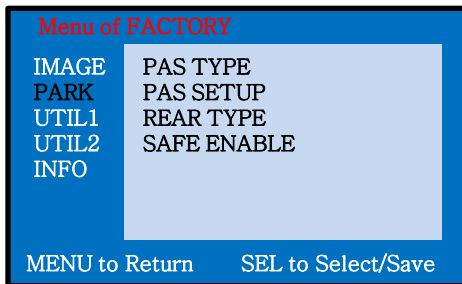
Adjust the position and size of image

H-POSITION : Move the image horizontally
V-POSITION : Move the image vertically.
H-SIZE(NAVI) : Adjust the size of navigation
image horizontally

```
Menu of FACTORY

IMAGE     PAS TYPE
PARK      PAS SETUP
UTIL1     REAR TYPE
UTIL2     SAFE ENABLE
INFO

MENU to Return      SEL to Select/Save
```
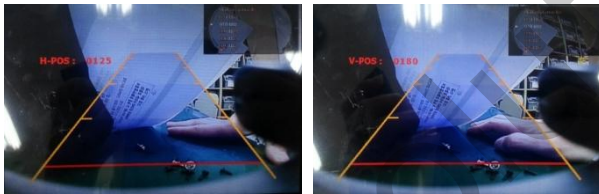
Setting for rear camera

PAS TYPE : Parking guideline setting
  - NOT USED : No use parking guideline
  - PAS ON : Selecting Dynamic parking guide line
  - PAS OFF : Selecting fixed parking guide line

RAS SETUP : adjusting the position of the parking guideline

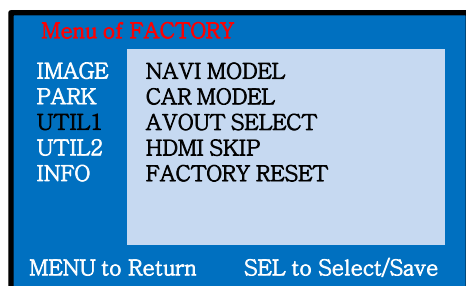〈H-POSITION〉   〈V-POSITION〉

REAR TYPE : Choose rear camera recognition
  * LAMP - Detecting the rear view camera via rear lamp (Installer must
    connect "Rear-C" cable of the power cable to the rear lamp of the car.)
  *CAN - Detecting the rear view camera by CAN signal (Installer must
    connect "CAN" cable of the power cable to the "CAN" cable of the car.)
SAFE ENABLE : Able/unable to display the image of external modes
    while driving(Default: Off)

• Factory Setting

```
Menu of FACTORY
IMAGE    NAVI MODEL
PARK     CAR MODEL
UTIL1    AVOUT SELECT
UTIL2    HDMI SKIP
INFO     FACTORY RESET

MENU to Return    SEL to Select/Save
```

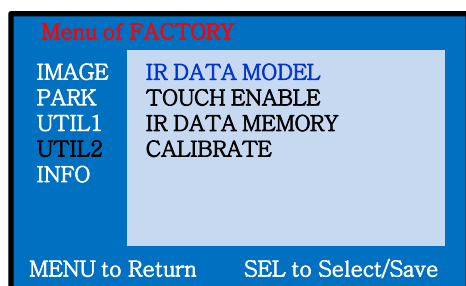## Select Navigation&Car model

NAVI MODEL : Select RGB Navigation model
CAR MODEL : No use
AVOUT SELECT : Select background mode sound
                               via Car Aux(AV1, AV2, Default)
HDMI SKIP : Able to skip HDMI mode
FACTORY RESET : FACTORY mode reset.

```
Menu of FACTORY
IMAGE    IR DATA MODEL
PARK     TOUCH ENABLE
UTIL1    IR DATA MEMORY
UTIL2    CALIBRATE
INFO

MENU to Return    SEL to Select/Save
```

Setting for other options

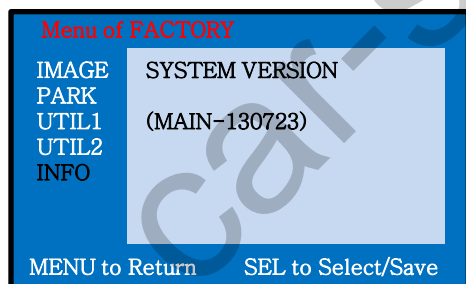**IR DATA MODEL** : Resister IR Memory of DVD, DTV
                            (Default, User)
TOUCH ENABLE : Activate/Deactivate
                         UI remote touch
IR DATA MEMORY : Enter Remote values
                            of DTV, DVD
CALIBRATE : Activate Touch calibration
※ Refer to IR manual for IR settings

```
Menu of FACTORY
IMAGE    SYSTEM VERSION
PARK
UTIL1    (MAIN-130723)
UTIL2
INFO

MENU to Return    SEL to Select/Save
```
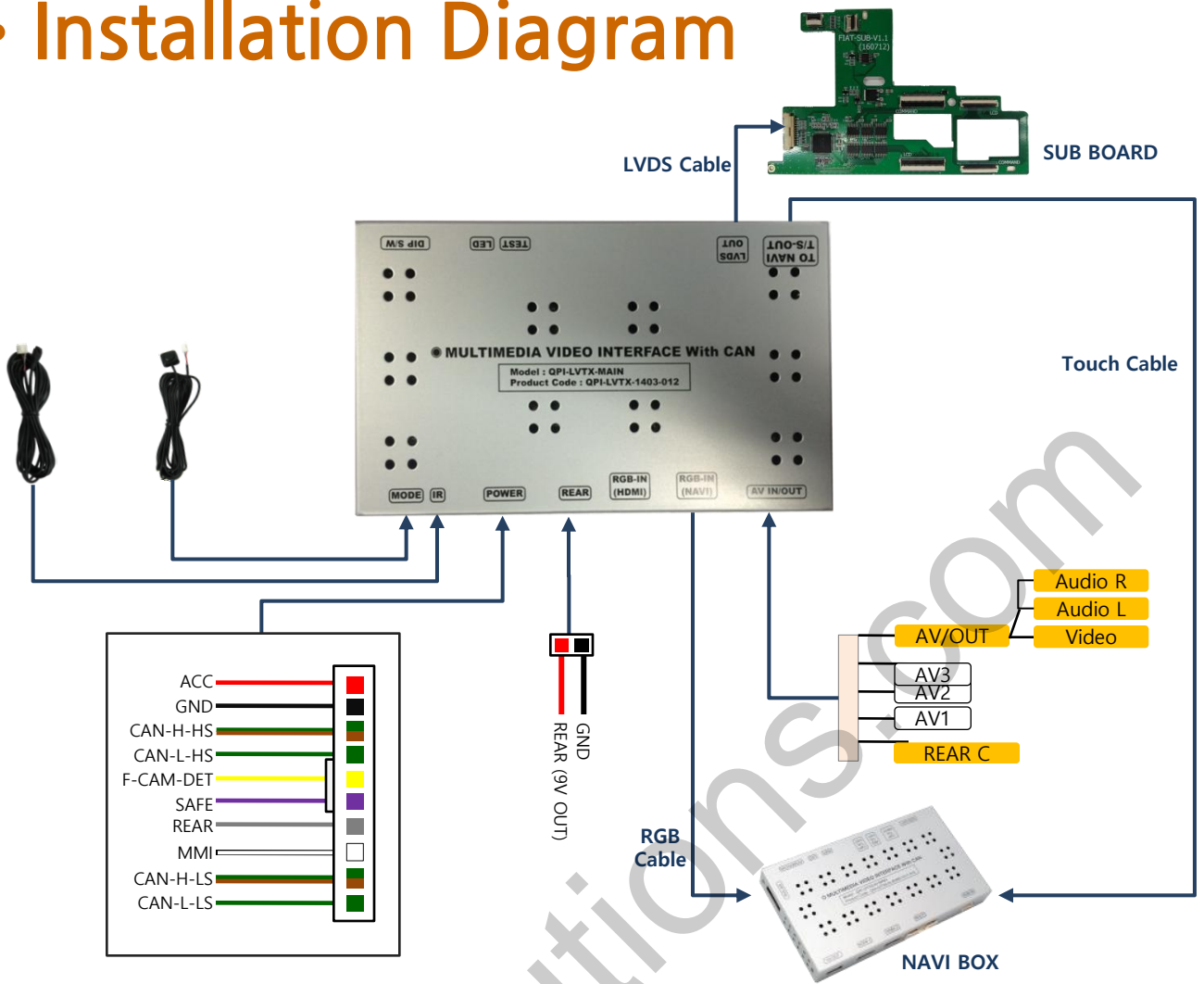
Able to check the version of product

※ Long press - Activate the front camera
　　(Front camera image will disappear 10 seconds later)

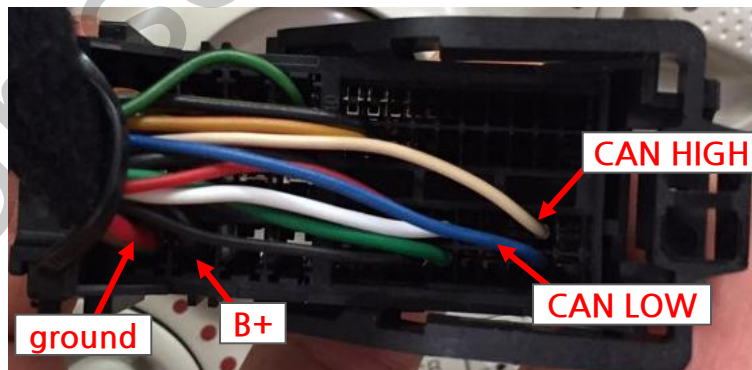※ Long Press - Mode switch (RGB→AV1→AV2→F-CAM)
　　Short Press - Return to OEM mode

※ Return to OEM mode if other buttons are pressed

• Installation Diagram

FIAT-SUB-V1.1 (160712)

SUB BOARD

LVDS Cable

MULTIMEDIA VIDEO INTERFACE With CAN
Model : QPI-LVTX-MAIN
Product Code : QPI-LVTX-1403-012

DIP S/W TEST LED LVDS OUT T/S-OUT OUT TO NAVI

MODE IR POWER REAR RGB-IN (HDMI) RGB-IN (NAVI) AV IN/OUT

Touch Cable

ACC
GND
CAN-H-HS
CAN-L-HS
F-CAM-DET
SAFE
REAR
MMI
CAN-H-LS
CAN-L-LS

GND
REAR (9V OUT)

RGB Cable

Audio R
Audio L
Video
AV/OUT
AV3
AV2
AV1
REAR C

NAVI BOX

• CAN / ACC wire connection

※ Find OEM cables behind the command

CAN HIGH
CAN LOW
ground
B+

※ Connection

- Connect Supplied CAN-H-HS wire(Green+Brown) to
  OEM CAN HIGH wire(White)
- Connect Supplied CAN-L-HS wire(Green) to
  OEM CAN LOW wire(Blue)
- Connect supplied ACC wire(Red) to OEM B+ wire(Black)
- Connect supplied GND wire(Black) to
  OEM Ground (Red+Brown)

※ *Cable position might be different based on certain car models but the color of wires is same*

• Subboard Monitor Connection

1

Disassemble the monitor

2

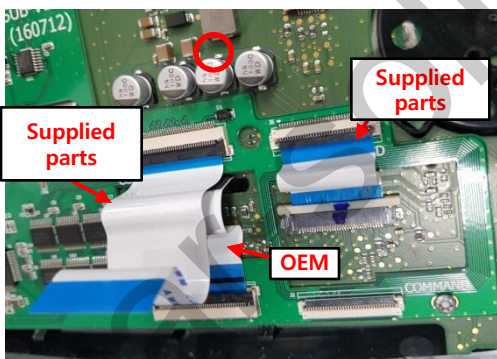Remove the original FFC cable in a circle

3

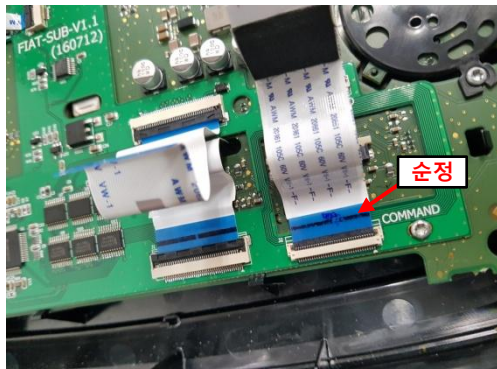Put the supplied subboard on the top of PCB board and assemble bolts in marked places (Use OEM bolts)
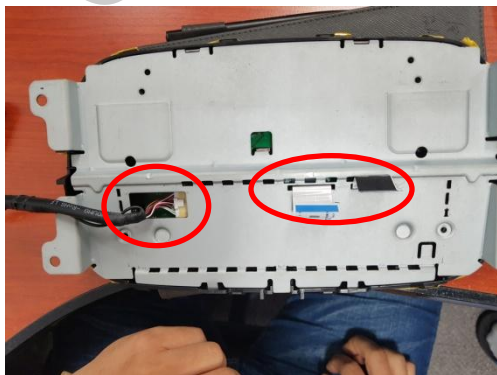
4

Connect touch cable as shown above

5

Connect FFC cable as above

6

Connect the original FFC cable which is removed from NO.**2** Instruction to the marked place

7

Take out the FFC&LVDS cables from marked holes

• 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)