

TURN ON AUX—important

The AUX in function on the car must be activated for the Audio to work on this interface. The Driver of the car must select AUX when using CARPLAY or Android Auto.

To activate AUX you need to access the ENGINEERING MENU . (Utube video to activate AUX for NTG4.5: https://youtu.be/_ye5006r1IY)

Alternatively if the car has USB or Music interface connector for audio you can use a USB to AUX converter (not provided in the kit) and then connect the 3.5mm jack cable attached to the T Harness to this converter.

INSTALLATION

1–Set dip switches according to screen size (unplug power if changing these)

2-Remove original radio and connect new T wire harness. Make sure you move the fibre optic cable from the original connector to the new one. Connect the USB and video cables. If adding an aftermarket camera see below.

3-Remove the Grey LVDS connector from the radio and connect it to the new LVDS connector. The other side of the new LVDS is connected to the radio.

4–Attach the wifi antenna. Fit as far away from the black box as possible and not attached to any metal.

The 3.5mm jack cable is not needed unless you are using an AMI converter instead of the cars original AUX

After correct installation you will be able to switch between the original Mercedes screen and Carplay by long pressing the “C” button on the I drive knob controller ,or on some car models the return button on the left side steering wheel buttons.

5-Go to the SETUP menu and check the systems settings. Language, Display, Audio &Microphone, RHD, Reverse camera

MICROPHONE SETTINGS

The Microphone settings may need to be adjusted to prevent echo . Check the sound of handsfree calling and receiving before handing car to user.

See FAQ section

AFTERMARKET REVERSE CAMERA CONNECTION

For manual transmission cars you will need to connect the Purple wire (Back/ Reverse detect) to a 12v reverse feed or reverse lamp.

In Carplay box Settings—Reverse-Reverse Camera– Aftermarket... REVERSE LINE DETECT ON

For Automatic transmission cars you do not need to connect this wire as the Reverse will be detected by the CANBus.

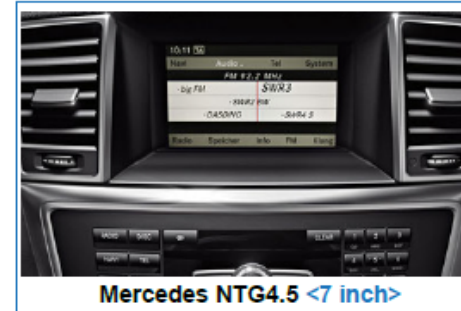
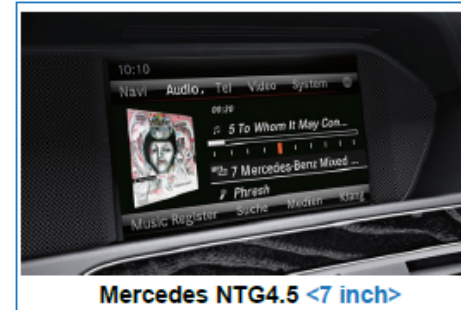
In Carplay box Settings—Reverse-Reverse Camera– Aftermarket... REVERSE LINE DETECT OFF

FRONT CAMERA

The front camera will switch on automatically after R to Drive gear is selected. The view time can be adjusted in settings.

Car Compatibility Chart

Car Models	Specific Models	Production Year	Specific Models	Screen Size
A-Class	W176	2012 ~ 2014	- COMAND APS NTG 4.5 and AUDIO 20	5.8 inch 7 inch
CLA-Class	C117	2014 ~ 2015	- COMAND APS NTG 4.5 and AUDIO 20	5.8 inch 7 inch
B-Class	W246	2012 ~ 2014	- COMAND APS NTG 4.5 and AUDIO 20	5.8 inch 7 inch
C-Class	W204	2011 ~ 2014	- COMAND APS NTG 4.5 and AUDIO 20	5.8 inch 7 inch
SLK-Class	R172	2012 ~ 2014	- COMAND APS NTG 4.5 and AUDIO 20	7 inch
E-Class	W212	2012 ~ 2014	- COMAND APS NTG 4.5 and AUDIO 20	5.8 inch 7 inch
CLS-Class	W218	2011 ~ 2014	- COMAND APS NTG 4.5 and AUDIO 20	7 inch
SL-Class	R231	2012 ~ 2014	- COMAND APS NTG 4.5 and AUDIO 20	7 inch
GLK-Class	X253	2012 ~ 2014	- COMAND APS NTG 4.5 and AUDIO 20	5.8 inch 7 inch
ML-Class	W166	2012 ~ 2014	- COMAND APS NTG 4.5 and AUDIO 20	7 inch
G-Class	X166	2012 ~ 2014	- COMAND APS NTG 4.5 and AUDIO 20	7 inch
GL-Class	W447	2013 ~ 2014	- COMAND APS NTG 4.5 and AUDIO 20	7 inch



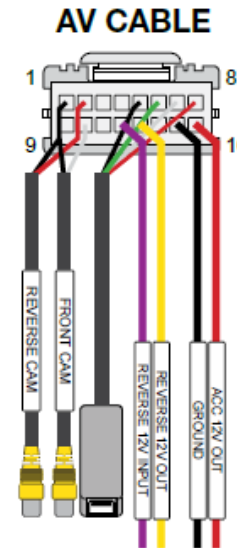
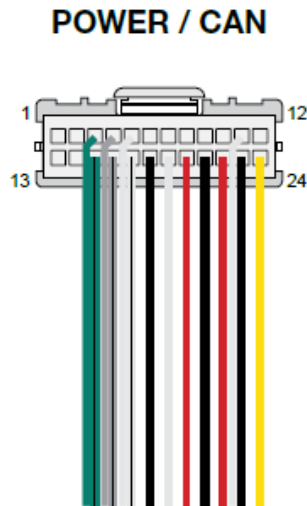
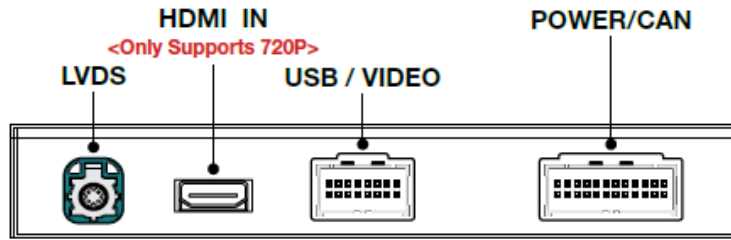
DIP Switch Settings



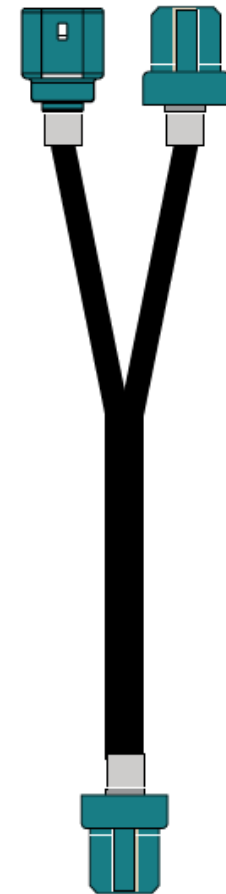
PIN	ON (▼)	OFF(▲)
1	External Microphone	OEM Microphone
2	Used Default "OFF(▲)"	
3	Selection of car mode	
4		
5	ON (▼) <5.8 Inch 400 X 240>	
6	ON (▼) <7 Inch 800 X 480>	
7	Used Default "OFF(▲)"	
8	Used Default "ON (▼)"	

No.3	No.4	No.5	No.6	Year	Car Model	Code Name	Screen Size
ON (▼)	OFF(▲)	ON (▼)	OFF(▲)	2011 ~ 2014	A-Class	W176	5.8 inch
					B-Class	W246	5.8 inch
					C-Class	W204	5.8 inch
					E-Class	W212	5.8 inch
					GLK-Class	X204	5.8 inch
ON (▼)	OFF(▲)	OFF(▲)	ON (▼)	2012 ~ 2014	E-Class	W212	7 inch
					CLS-Class	W218	7 inch
					GLK-Class	X204	7 inch
					ML-Class	W166	7 inch
					G-Class	W463	7 inch
					GL-Class	X166	7 inch
					SLK-Class	R172	7 inch

Body Connector specifications



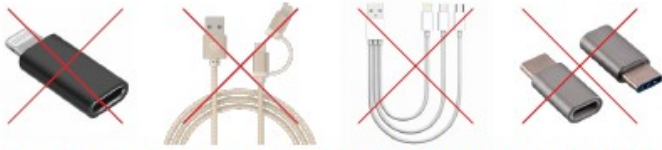
LVDS Cable



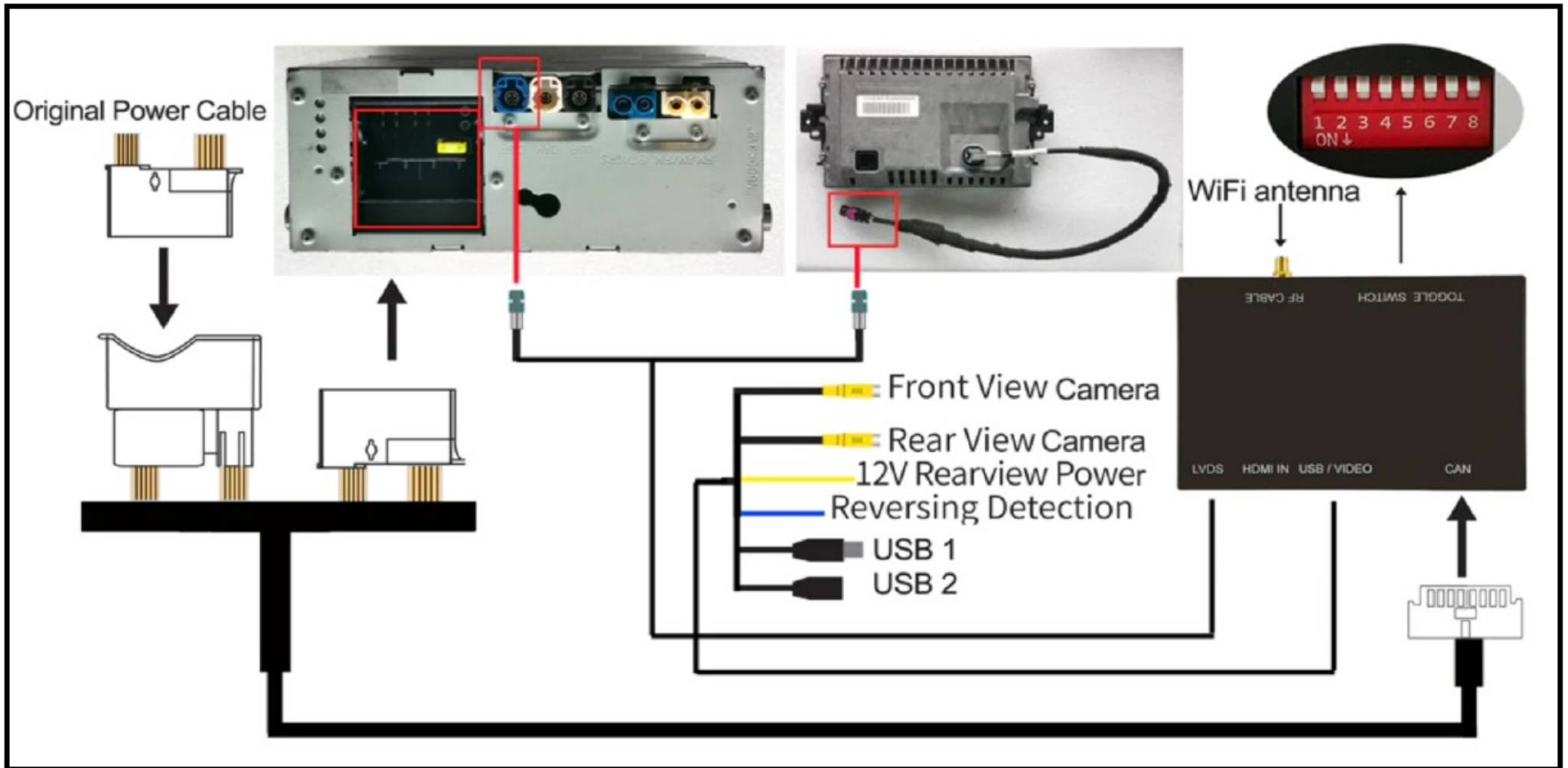
Power / Can Cable			
1	USB1_flag	13	HWCF2_IN_CTL
2	IR_IN	14	BT_RF_C
3	CAN_3_HIGH	15	CAN_3_LOW
4	CAN_2_HIGH	16	CAN_2_LOW
5	CAN_1_HIGH	17	CAN_1_LOW
6	GND	18	GND
7	MIC_IN_N_Car	19	MIC_N
8	MIC_IN_P_Car	20	MIC_P
9	A_R_AMI	21	Audio GND
10	A_L_AMI	22	A_R_AUX_CAR
11	A_L_AUX_CAR	23	GROUND
12	Audio_GND	24	BATTERY POWER INPUT

AV CABLE			
1	CVBS_GROUND	9	
2	REVERSE_CAM_VIDEO_INPUT	10	FRONT_CAM_VIDEO_INPUT
3		11	
4	GROUND_SHIELD	12	REVERSE_12V_INPUT
5	USB_GND	13	REAR_12V_POWER_OUT
6	DATA +	14	
7	DATA -	15	GROUND
8	5V POWER	16	12V(ACC)_OUT

Full Installation Diagram



We recommend using for each phone manufacturer genuine cable
Please. Never using "Adapter Type and Multi cable"



User Interface

Airplay (Apple i-phone mirroring) <WIFI>



It is connected by wifi signal

- Turn on the wifi on the i-phone
- Select Carplayxxxxxx (The wifi name might be different) and connect
- Select "Air play" in the "i-Phone Control Center"
- The smart phone screen will be copy on the car screen

WireAuto (Android Auto) <Cable>



Apple Carplay Wireless,Cable



WirelessDev Setting (Bluetooth)



Wireless Carplay Settings (Bluetooth)

※ Only (Apple i-Phone)

USB Player (Media,Music)

HDMI IN PUT



Android Mirroring <Cable>



Setup <Please Check Next Page>



Front Camera

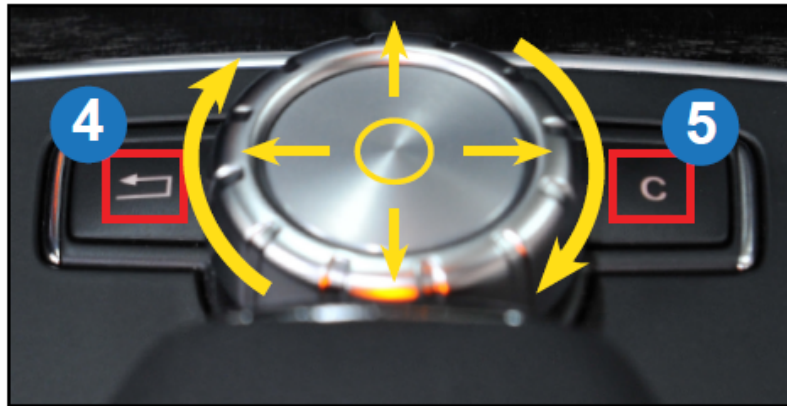


When it installed front view camera
The user can check front view camera image with it

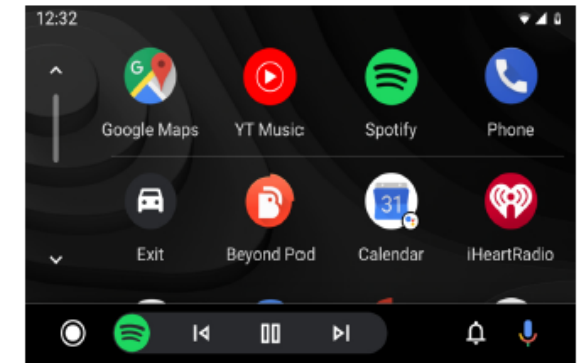
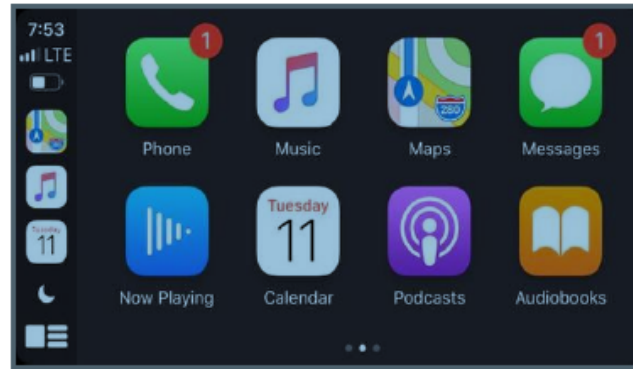
Activation by original buttons

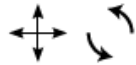










Steering Wheel Button



NTG4.5 OEM Buttons



Button	Function	Operation	Remarks
1	Changing Modes	Press the button 3 seconds	Order : OEM → Car Play
		Press the button short time	Return to the OEM mode in any modes.
	Move the pointer Select	Turn the dial	Apple Car Play Function 
		Press the dial	Google Android Auto 
3	Answer Phone Call	Press the button	Apple Car Play Function  Google Android Auto 
4	Reset	Press the button 5 seconds	Apple Car Play Function 
	Go back	Press the button	Google Android Auto 
5	Changing Modes	Press the button 3 seconds	Order : OEM → Car Play
		Press the button short time	Return to the OEM mode in any modes.
2	"Siri" "Google Assistant"	Press the button 3 seconds	Apple Car Play Function 
			Google Android Auto 

Settings <System>



Language — English Italian Spanish Turkish Chinese

Display — Brightness Contrast Chromaticity Saturation

Audio

- Volume — 0 — 18
- EQ — [5 frequency sliders] — You can adjust sound the frequencies to make it
- Loudness — ON OFF
- Mic Echo PreConfig — Default
- Microphone Volume — 0 — 24
- Microphone OP — 0 — 6
- Microphone PGA — 0 — 30
- Microphone Delay — 0 — 30
- AEC quality — 0 — 2

Wifi Channel(reboot required)

It function is stable wireless Carplay You can improve wireless connection by change wifi channel.

- 6 — 2.4Ghz — Basic wifi channel
- 36 — 5 Ghz — It's a global channel in the United States.
- 149 — 5 Ghz — It's a chinese channel.

Reverse

- Reverse Camera — Original — Original = OEM Rear view Camera
Aftermarket — Aftermarket = External Rear view Camera
- Reverse Line Detect — ON OFF
- Reverse Display Track — ON OFF
- Reverse Display Radar — ON OFF
- Front View Time — 0 — 10 — When you shift gear 'from R to D' or 'from P to D', it just works automatically during the activation time you selected
- Reverse Full Screen — ON OFF

Settings <System>



Right Drive ON OFF ON = Left Steering Wheel
OFF = Right Steering Wheel

Camera Mirror ON OFF

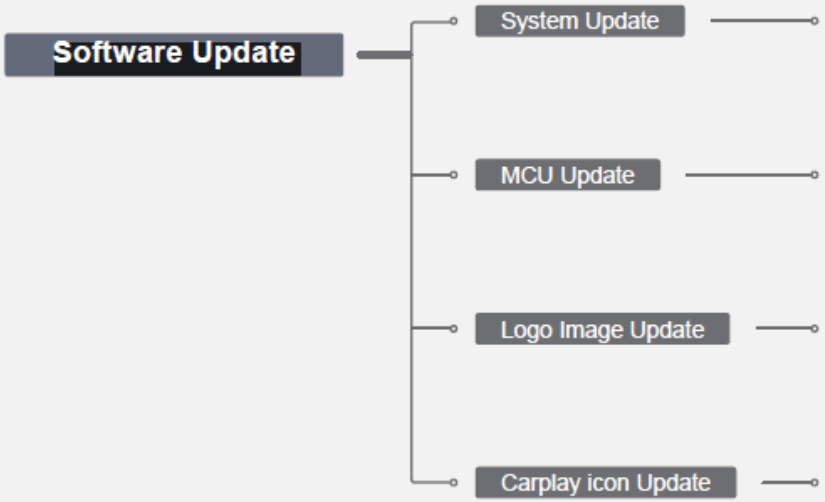
Switch L/R Key to D/U Key ON OFF

Wheel key swap

- No swap
- Swap
- Invalid

Carplay Left Scrap 0 10

Carplay Left Scrap 0 10



- Copy the update file "ISPBOOOT.BIN" to the root directory of USB storage.
 - Plug in the USB storage on the carplay box USB port
 - Select the "System update" or Press the BACK button 5sec "It will be restart and start update automatically"
Please. Never power off the box on updating

- Copy the update file "Upgrade.bin" to the root directory of USB storage.
 - Plug in the USB storage on the carplay box USB port
 - Select the "MCU update"
Please. Never power off the box on updating

Logo Image file format
 File Name : "no logo.bmp" Size : 800 x 480
 - Copy the update file "no logo.bmp" to the root directory of USB storage.
 - Plug in the USB storage on the carplay box USB port

Carplay icon Image file format
 File Name : "no cp_back.png" Size : 250 x 250
 - Copy the update file "no logo.bmp" to the root directory of USB storage.
 - Plug in the USB storage on the carplay box USB port

Q: When switching to Carplay or Android the screen displays no signal, a blank screen , abnormal screen or no response ?

A—Check the LVDS wiring is connected as per the wiring diagram.

A-Check that the pins in the LVDS connectors are not bent or not making contact

A-Check that the dip switch setting is correct. Try changing them . Make sure you unplug the box power each time a pin is changed.

Q: I don't have any sound ?

A—make sure the cars original MOST fibre optic cable has been moved to the new connector on the T harness

A-Activate the AUX from the cars engineering menu. Select AUX on cars audio settings.

A-If its not possible to activate the AUX you will need a AMI to AUX converter cable

Q: Unable to connect with wireless Carplay ?

A—make sure Carplay and wifi is turned on on the mobile phone

A-Clear the Bluetooth devices from the cars menu and the phone . Then pair and connect again

A-On the main menu select Wireless Dev , rest the Bluetooth then pair

A-Check and restore Mobile network on phone.

A-Check that the mobile phone Siri permissions are all turned on.

A—Check the wifi antenna is connected and not attached to Metal or the black box itself. (fit away from the black box)

Q: When I call someone , the caller can hear himself in an echo or I am very faint.

A—Adjust the mic volume of the car to normal use

A-in Audio settings menu set the “Mic Echo PreConfig” to C and Loudness off. Switch ign off and on.

A— fine tune Microphone delay and Microphone OP

A-Suggested Audio volume 13, Microphone volume 12, AEC quality 2

A— to increase volume that caller hears increase Microphone PGA and Volume

Q: The steering wheel buttons do not work?

A—In settings turn on “Enable Wheel Key”