

HAMILTON

— MOTOR COMPANY —

TOYOTA T10 HEAD UNIT 5TH GEN 4RUNNER INSTALLATION INSTRUCTIONS





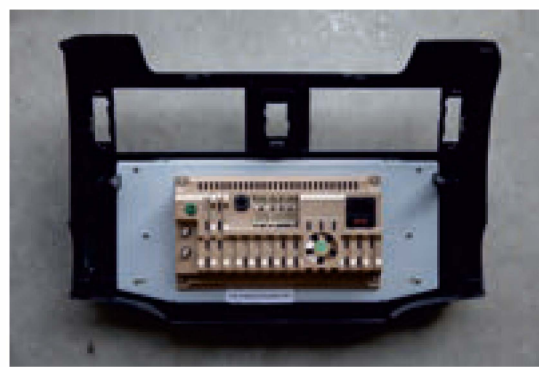
HAMILTON MOTOR COMPANY - TOYOTA 4RUNNER APPLE CARPLAY UPGRADE KIT - 5TH GEN

The 5th Gen Toyota 4Runner is one of America's most popular SUVs. It excels in reliability, looks awesome and they hold their value incredibly. However, the infotainment system from the factory is severely lacking. Our upgrade kit will reinvigorate your 5th Gen Toyota 4Runner and bring it up to parity with new, high-end SUVs.

INTRODUCING THE HEAD UNIT



FRONT VIEW



REAR VIEW

HELPFUL/NECESSARY TOOLS

Philips screwdrivers of varied sizes, or small screwdriver kit

10mm socket and driver

Prying tools (Optional, not included)

Towel or soft object to cover gear shift

INSTALLATION STEPS

STEP 1

REMOVE THE PLASTIC SIDE TRIM PIECES

Sitting inside your 4Runner, the first thing you'll need to do is remove the plastic side trim pieces. You can start with either one. Hold it with both hands pinching top and bottom. Wiggle it back and forth left to right while pulling out until it comes off. Then remove the other side.



STEP 2

REMOVE THE AIR CONTROL KNOB ASSEMBLY

Hold on to both sides. Pull one side out and away until it comes out, then do the same on the other side.

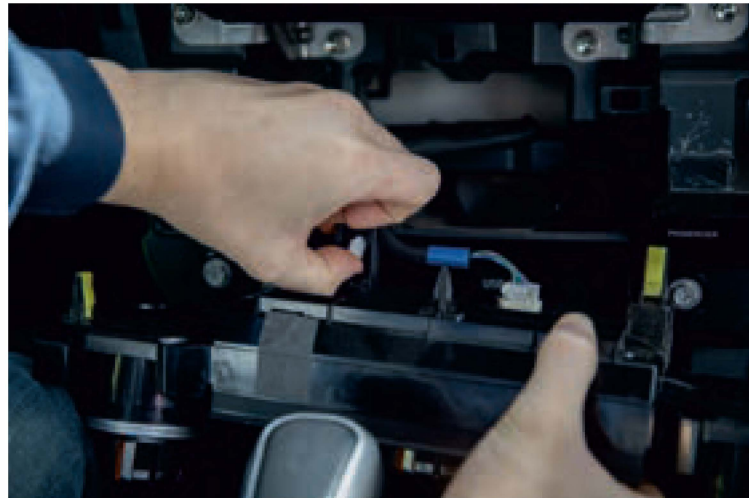


INSTALLATION STEPS

STEP 3

REMOVE THE AIR CONTROL KNOB WIRING

Squeeze on the tabs on the side of the white plastic insert and push it through the hole.



Squeeze the tab on the plug and remove it, freeing the control assembly. Set it aside.



STEP 4

REMOVE THE FOUR 10 MM BOLTS

Remove the four bolts from the silver metal tabs with a 10mm socket. These will not be used with your new unit, so bolt them back into place after the install for safekeeping.



INSTALLATION STEPS

STEP 5

PULL OUT THE OEM HEAD UNIT

Place a towel or something soft over the shifter knob. You'll see why shortly. Wiggle the head unit and faceplate assembly gently and pull out. The six tabs beneath will release. Hold on tight and don't drop the unit onto the shifter knob.



STEP 6

DISCONNECT ALL WIRING FROM THE OEM HEAD UNIT

Begin removing all of the plugs. There are small buttons/tabs on each that will push in and release the plugs. Be careful not to break them. Even though you have a towel between the screen and your gear shift, don't put weight on the unit. Also watch the metal brackets on the bottom of the head unit as they will scratch other parts of your console if they rub while you are removing the plugs. It helps to have someone supporting the head unit while working in the truck.



INSTALLATION STEPS

STEP 7

REMOVE PLASTIC PARTS AND VENTS

Remove the head unit from the vehicle and take it to a flat workspace. To do the swap, you'll need to remove the vents, the plastic around the air vent direction adjusters, hazard switch and top panel from the OEM and install them on your new Hamilton unit. Start by removing the two screws holding the plastic top panel, one on the left of the top and one on the right.

To remove the vents, use the plastic tools provided or a small screwdriver to gently pry the tabs apart from one vent at a time. They will release from the faceplate. Take your time and don't break the tabs. Unscrew the small plastic trim pieces from around the air volume dials. Remove them and put them aside for reinstall into the new faceplate.



STEP 8

REMOVE THE HAZARD WIRING HARNESS

Hazard assembly still attached to OEM unit. Plug detached from metal plate.

Gently squeeze the tabs together on the white plastic bracket, pry it away from the metal and remove it from the body of the head unit. Squeeze the prongs of the other attachment together and pull it out. Press on the tabs of the hazard switch and pull it out of the faceplate.

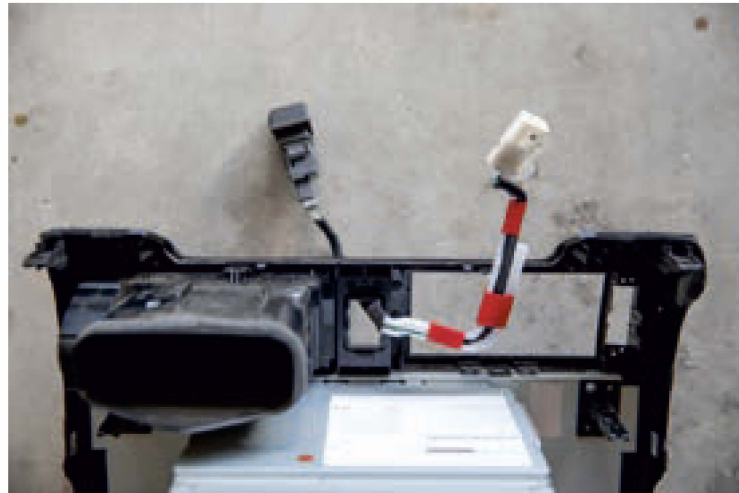


INSTALLATION STEPS

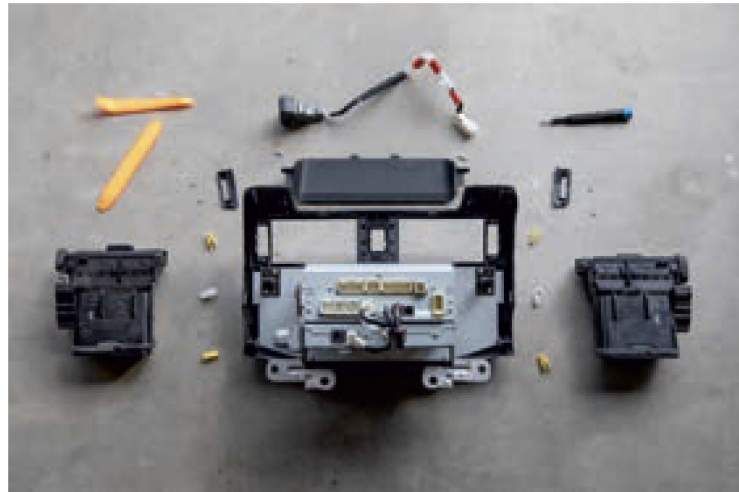
STEP 8

REMOVE THE HAZARD WIRING HARNESS

Hazard light assembly detached and ready to remove from OEM unit.



OEM Head Unit with all necessary plastic parts and hazard switch assembly removed.



STEP 9

PREPARE TO WIRE THE HEAD UNIT

This can be done on a table or work bench, and then moved into the 4Runner to install. Hamilton Motor Company provides all the wiring and harnesses you need to do the job, along with some extras that will not be used.



INSTALLATION STEPS

STEP 9

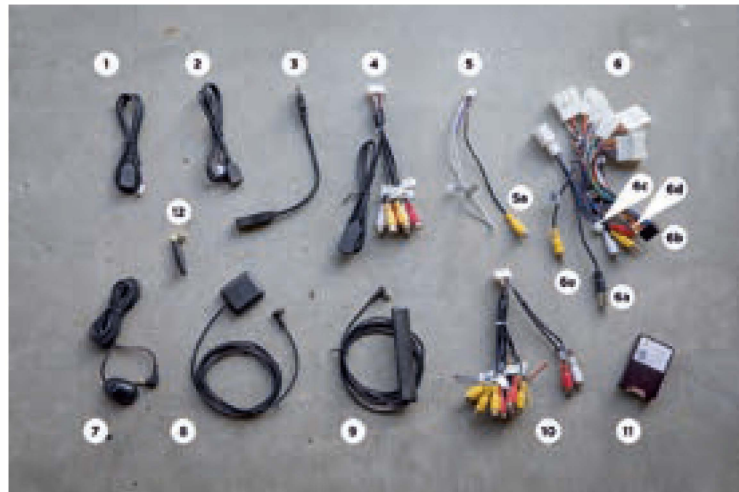
Notes:

Most folks don't use the SIM tray and instead opt to use their phone hotspot or bluetooth (this SIM tray is for an optional 4g GSM sim for the new head unit to have cell connectivity).

Two plugs on the wiring harness will not be used.

Be careful with the screen and knobs of the head unit. When working, use something soft (possibly foam block or foam packaging that came in the shipping box) to hold the faceplate and keep the knobs from pushing against your work surface. Don't let the knobs hit any surface as they can press into the glass and crack the screen.

As you start to connect your plastic wiring harness connectors, be careful to ensure that they fully seat and click together (ensure that you did not have any pins out of place that could get bent or damaged).



BOX (Contents)

USB – 4 pin

USB – 6 pin (Same wiring and functionality as the 4 pin)

USB cable that connects your OEM USB to the head unit

SIM card harness with RCA plugs and SIM Tray

Backup Camera harness

Main Harness

Optional microphone

GPS

Antenna for SIM – Use this if you want to use a SIM card.

If you will be using your phone as a hotspot, you can leave it out.

RCA connectors for subs, amps, etc.

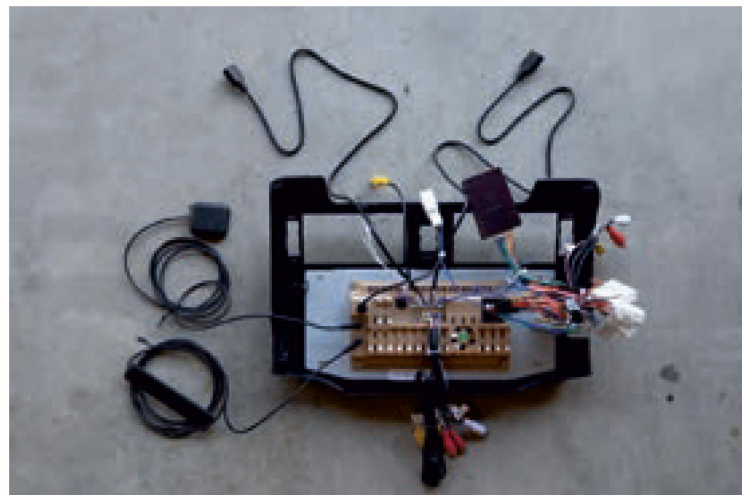
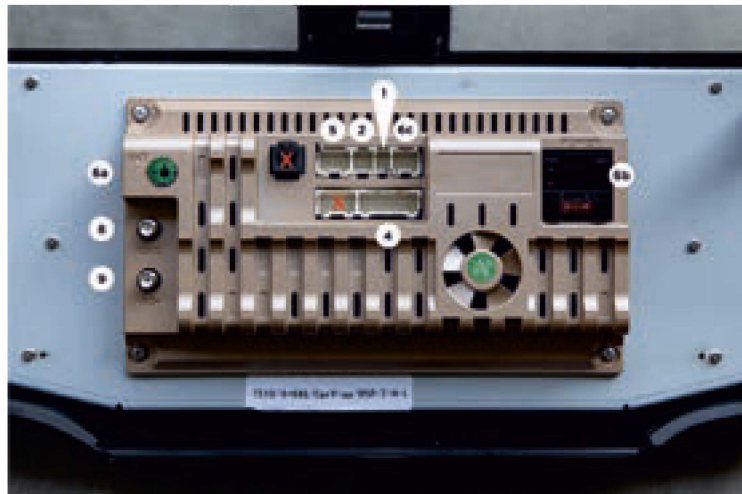
INSTALLATION STEPS

STEP 10

CONNECT WIRING HARNESSES TO THE HEAD UNIT

Wiring Guide for Head Unit:

- 1 Plug in the USB cable. Four pin plug goes into the four pin socket.
- 2 Plug in the second USB cable. 6 pin plugs go into the 6 pin socket. There is no difference in the functionality of these two.
- 3 Put this USB cable aside as it will be installed into the Vehicle later.
- 4 If you're installing the SIM harness, plug it in until you hear it click. Once again, most folks don't use a SIM.
- 5 Plug the backup camera harness into the corresponding socket. Note that 5a will connect to 6e.
- 6 Plug the black plug (6b) from the main harness into the socket marked "Power". Do not cut the zip ties. 6d, will plug into 11. Note that 6d is a wide, twenty pin white plug and is hidden in the mass of wires in the photo. The radio antenna (6a) plugs in just above the GPS and 4G. There is an 8 pin plug on the wiring harness that has two blue wires (6c). Plug that into the corresponding socket in the head unit.

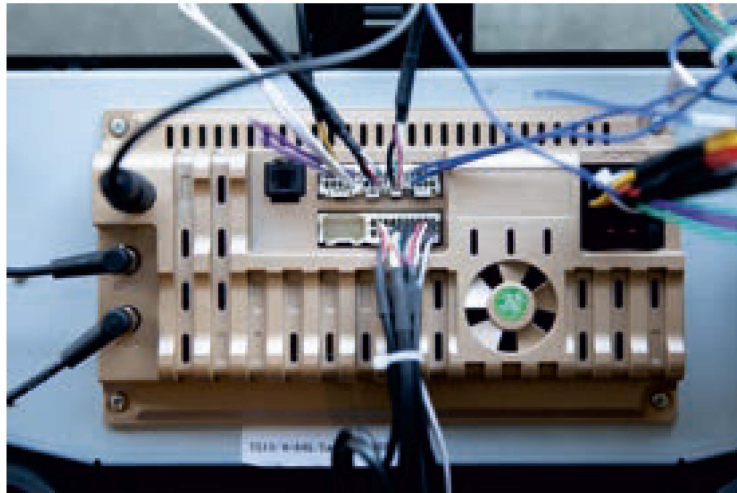


INSTALLATION STEPS

STEP 10

- 7** There are two yellow male RCA jacks. One is attached to a smaller white plug and one to a larger plug. Use the male yellow RCA from the larger harness (6e) and plug it into the yellow camera female RCA, 5a. Make sure this is the harness plug that connects into your vehicle in step 16, not one of the left over harness plugs.
- 8** You will not install part number 7. Put it aside.
- 9** The GPS cable goes to the upper GPS jack and screws on by hand. Then tighten slightly with a needle nose pliers. It will still turn at the junction for flexibility. Don't over-tighten.
- 10** The 4G antenna attaches to the plug just below the GPS. Tighten by hand, then gently with pliers. This doesn't need to be installed if you are not using the SIM. I installed mine in case I want to use it in the future.
- 11** I did not use part number 10. I believe it's for audio amplifiers and/or sub-woofers.
- 12** See step 6 if part 11 is still rolling solo. I did not use part 12.
- 13** Red X's mark sockets that did not get used in our install.

If your head unit and wiring looks like the picture below, you're ready to install the plastic parts you removed from the OEM head unit in step 7.



INSTALLATION STEPS

STEP 11

TEST THE HEAD UNIT

Before putting things back together, use your key to power your car into the "ignition on" position to test that you have things properly configured. Try putting your car in reverse (with your foot on the brake) to make sure the reverse cam comes on properly.



STEP 12

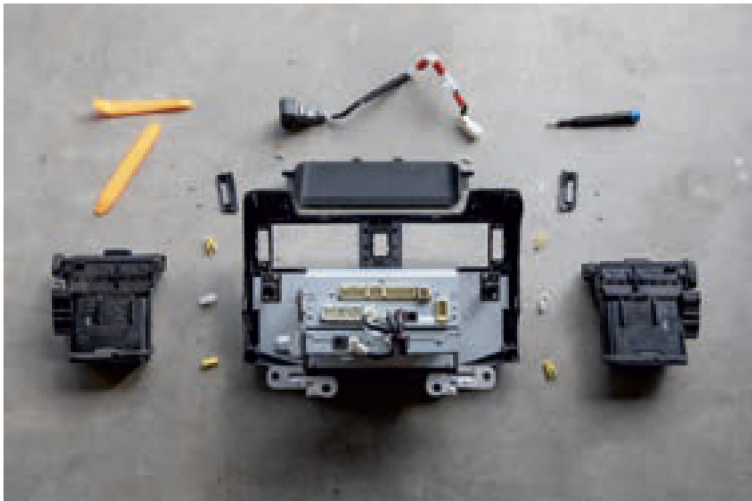
INSTALL THE PLASTIC PARTS

These parts are a direct lift from the OEM unit (shown above for reference). There are clips and a few screws holding them in that will need to be handled carefully. Take your time with the clips and don't force anything.

You will install the plastic top tray from the OEM unit, as well as the two vents and two small plastic pieces that hold the air volume adjuster dials.

Take your time on the top tray and make sure you use the correct size of screwdriver so you do not damage the screw heads or the holes they go into. There are two sets of screws from the removal of the OEM head unit. Use the larger screws for the top tray.

The hazard switch has two clips. It will only go back on one way. Arrow points up.

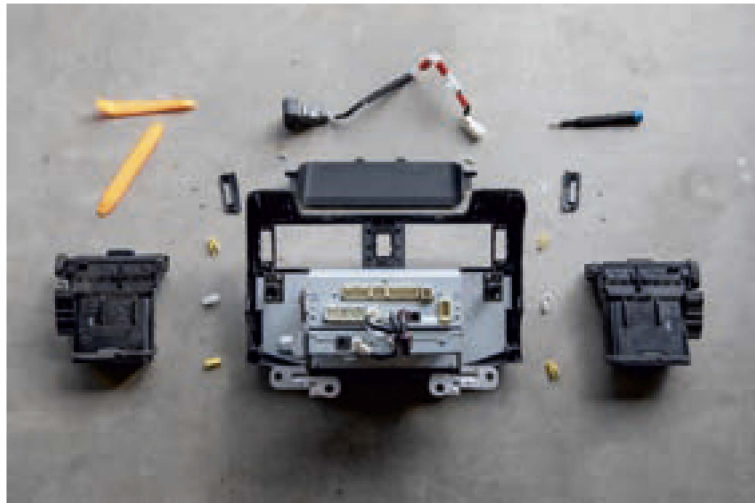


INSTALLATION STEPS

STEP 12

RH Vent goes right. LH vent goes left. Before we install the vents, you must install the small plastic outer air volume dial trims on either side of the face plate. There is a right and left side. Use the smaller screws. Two on each side. These take a bit of care to get the small pegs into the holes and the screw holes lined up. Take your time and make sure these are fitted correctly before threading in the screws.

The vents install from the rear of the faceplate, and have clips on the top, bottom and sides. Just push until all of the clips click in. You can use a small screwdriver to guide a couple of them into place.



INSTALLATION STEPS

STEP 13

REMOVE THE YELLOW AND WHITE CLIPS FROM THE OEM HEAD UNIT

Next you'll need to remove the yellow and white clips from the OEM head unit and re-install them on your new unit. Be careful and take your time so you don't break them. There are a total of six. When you snap them onto the new unit, yellows will go on top and bottom, and the white tabs go in the middle on each side. Make sure you push them all the way on until they click into place.

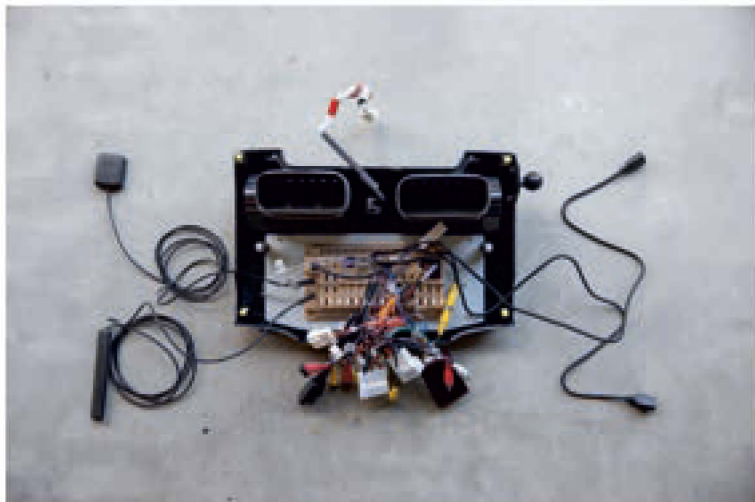


STEP 14

PREPARE TO INSTALL THE FULL ASSEMBLY INTO THE 4RUNNER

Be careful not to put pressure on the screen regardless or it may crack.

In the truck, start with the SIM if you're using one. Make sure the SIM card is flush and locked in place before closing up the SIM tray.



T10 head unit with all wiring, vents, plastic and hazard assembly installed.

INSTALLATION STEPS

STEP 15

INSTALL THE USB CONNECTOR CABLE

The USB connector cable (Part 3 that we set aside earlier) goes to the gray square plug on the truck end, and goes to either one of the USB's on the new Hamilton unit.

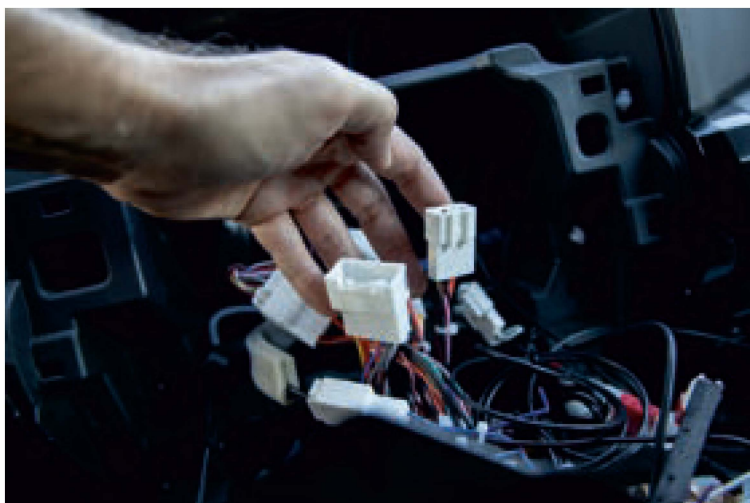
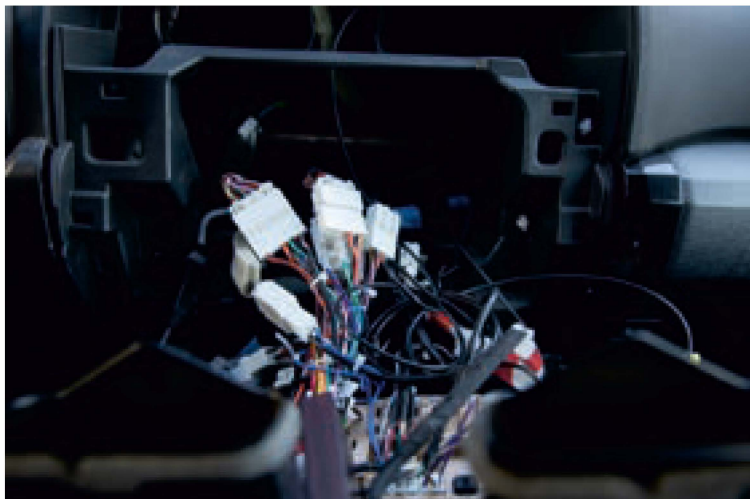


STEP 16

CONNECT THE WIRING HARNESSES TO THE TRUCK

Work from the truck to attach the harnesses. They all have different numbers of pins and sizes of plugs, so plug the ends that fit into the ends that they fit into. This should be fairly self-explanatory. There are seven white plugs open on the wiring harness, and two will not attach to anything. (See photo below) Just let those hang.

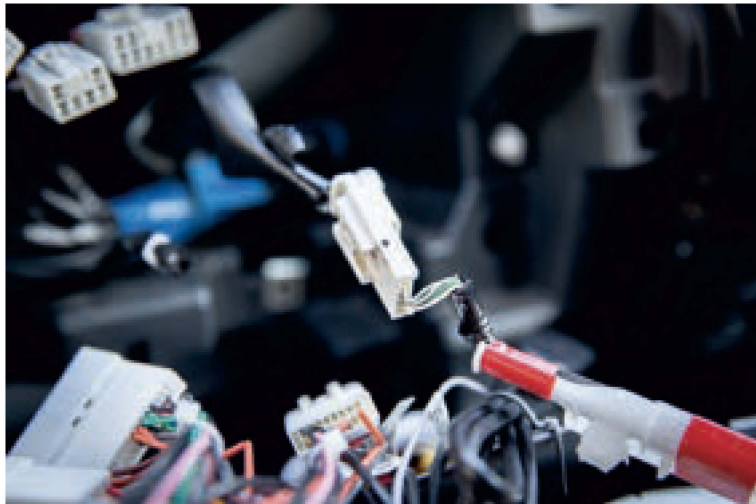
There will also be a second USB to use to attach your phone or TPMS, etc. Make sure you run that to a spot that's accessible once the dash is closed up. (Ex. you can run it into the glove box).



INSTALLATION STEPS

STEP 17

RECONNECT THE HAZARD PLUG TO THE TRUCK



STEP 18

POSITION THE GPS IN THE DASH

Run the GPS to the right behind the vent, so it's facing up. You can stick it right above the air vent.

You might consider powering the unit on once again to do a final check.



STEP 19

TIDY UP THE WIRES AND INSTALL THE HEAD UNIT

Tidy up the wires as much as you like and ease them into the cavity in the vehicle behind the head unit. Align the head unit so the six tabs go into their corresponding holes. Push the corners of the radio until it clicks into place. You'll hear 4-6 clicks. Make sure the unit feels secure and stable.



solid.

INSTALLATION STEPS

STEP 20

RE-INSTALL THE AIR KNOB CONTROL ASSEMBLY

Next, install the air control knob assembly by first reconnecting the white clip and plug that you removed when we started. Then, simply push the control assembly straight forward until it clicks into place.



STEP 21

RE-INSTALL THE PLASTIC SIDE PIECES

Set the side pieces in position and firmly push them onto the console with both hands until they click in place. Wipe off your console with a clean, dry, soft cloth (preferably a computer screen or phone polishing cloth).



After- Installation FAQ:

Q: My backup camera appears scrambled and black and white, what should I do?

A: If your backup camera is showing an array of black and white screens, instead of a proper backup camera image, head over to www.hamiltonmotorcompany.com/pages/manuals and checkout the video guide "What to do if your backup camera appears scrambled." This can be resolved in about 30 seconds.

Q: How do I configure Apple Carplay?

A: Scan the QR code included in your box or head over to www.hamiltonmotorcompany.com/pages/manuals and checkout our video guide "How to Configure Apple Carplay."