

Powering A Radar Detector (updated January 2015)



A Radar Detector is a necessity if you own a Corvette! Even if you stay within 8 miles per hour of the speed limit, not easy, there will be the time when you speed because you didn't see the speed limit change; you're trying to get out of a trucks blind spot etc.

You're a Target:

The one thing you can be sure, if there is a police officer around when you speed, the radar gun will be triggered! In my S10 truck I could be in the lead of a pack of cars and watch a patrol car come from the opposite direction and seldom did the radar detector signal. With the Vette, the radar gun is triggered and a warning occurs almost every time!

Installing a Detector:

I've installed radar detectors mounted to the passenger visor for an '87, '93 and '08 Vette. Even an Escort tech said with a nonmetallic roof, it's fine. I have powered the detector from the passenger visor light and the rear view mirror 12 volt switched power. Bought a new Passport Max. Great detector. It has a new, suction cup mount, however a visor mount is not available. Escort says it mounts too high on the windshield for optimum performance.

Powering the Passport Max:

When at Laguna Seca in the summer of 2013, saw there were no mirror plugs to tap for power. Thought the vanity mirror light would probably be my source of 12 volts so purchased a straight direct power cord from Escort. I was ready! That didn't work! Followed forum advice in early 2013 and powered from fuse #37 in the rear. Also there was no visor mount so had to use the Escort "Sticky Mount" supplied with the detector.

The following is a picture summary of what was done with some sticky mount issues discovered discussed at the end.

Note: ~December 2014 forum members outlined a way to tap the mirror 12 volt source using a kit from BlendMount. More complex an install then the simple method that worked for the C6, but the final result is neat and clean. Search for pics of the procedure and decide if that is the approach you want to use,

Photo Sequence

WHAT DIDN'T WORK!

Photo of visor attachment found at Laguna Seca! The bezel simply snaps on and is easily removed by prying gently. The three screws require a Torx screw driver to remove. Removed the visor and spliced into the wires going to the electrical connector. **This may be useful to use if you want to push wires under the upper molding, see note page 3.**

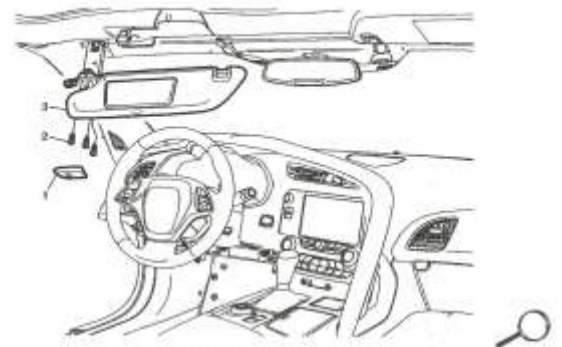


When I plugged in the detector, the power to both visors and the reading lights went out! Looked for a fuse; none was identified! The power came back after about 5 minutes. Checked and measured voltages at all connections, all was fine. Tried again, same result! For some reason the computer or circuit breaker was shutting down due to the extra 2 amps used by the detector. Perhaps the wires are small with all LED lights and the extra amps or an inrush starting current trips the breaker to protect them.

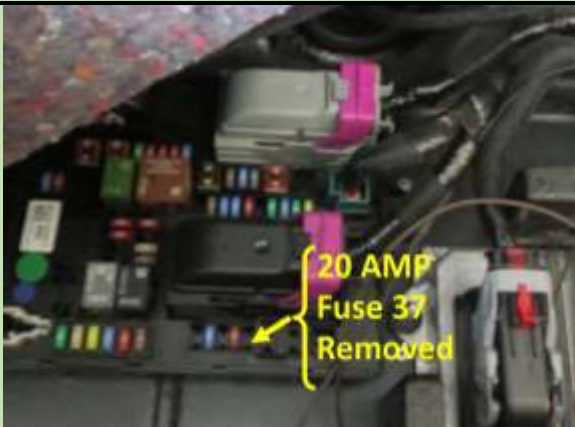
A forum comment about a person who had a mirror replaced and asked their dealer to pull power wires out for a detector when installing the new one said the dealer checked with GM. They said, don't, they are not "Tap Friendly!!" Perhaps explains why I had a problem!

As noted, in late 2014 folks have successfully taped the mirror power! Search Corvette forums for pics of their method.

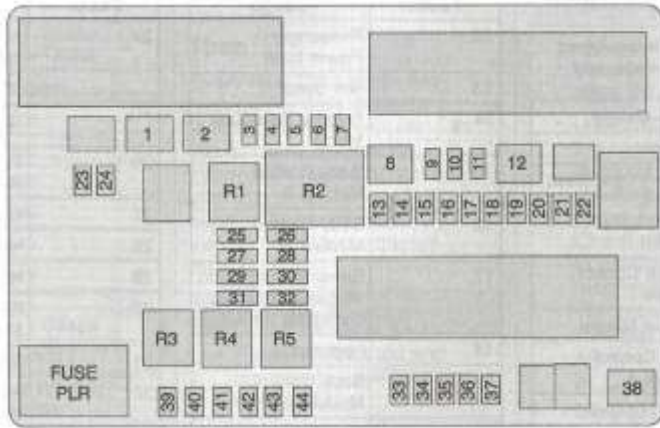
Sunshade Replacement



Callout	Component Name
1	Sunshade Retainer Bolt Cover
2	Sunshade Fastener (Qty: 3) Caution: Refer to Fastener Caution. Procedure Tilt the sunshade down toward the windshield to access fasteners. Tighten 6N·m (53 lb·in)
3	Sunshade Assembly Procedure Disconnect the electrical connector.



The detector was operating fine with the Smart Cord plugged into the console auxiliary power plug, so why not wire it to that fuse? The C7 has two fuse panels, one in the engine compartment, and one in the rear. The fuse for the auxiliary power, #37, is in the rear, under the rear cargo carpet. Strongly suggest unclipping the bottom of the right wheel cover to allow the carpet to be pulled out from under, or it could rip the corner!

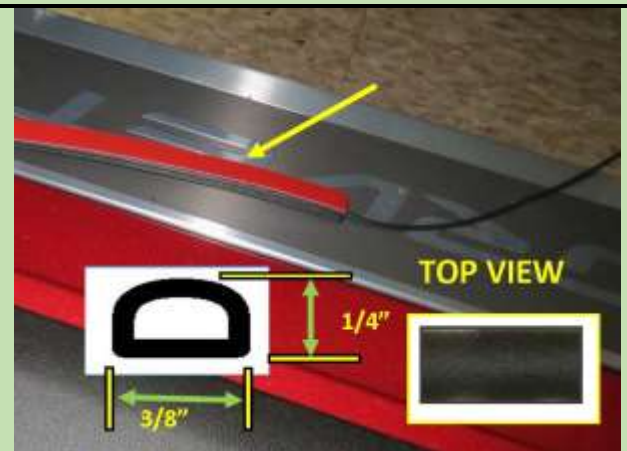


Removing the mini fuses requires a tool. There is one included in the fuse panel. It is shown schematically and labeled FUSE PLR (lower left.) Simply select the fuse desired and squeeze it with the tool, then pull upward. In this case there is a 20 amp fuse for the auxiliary power. When the fuse is removed, it is placed in one of the two fuse locations in the Add-A-Circuit device purchased to supply the detector power.



Mounting the detector high on the windshield to the right of the mirror eliminates any obstruction to road vision. However routing the wire so it is not visible, is a challenge. The first area was across the top of the windshield. It was not possible to insert the wire behind the top window trim so a piece of rubber “D” shaped hollow molding (that we use in our business) provided a good solution to hide this section of wire.

The size and shape of the “D” molding are perfect! It comes with high quality 3M adhesive so it could be attached to the underside of the existing trim on the top side of the windshield. It is not visible since that trim is about $\frac{3}{4}$ inch wide and the rubber molding is only $\frac{3}{8}$ inches wide. The wire was simply strung through a section that concealed it from the detector to the edge of the “A” pillar trim.

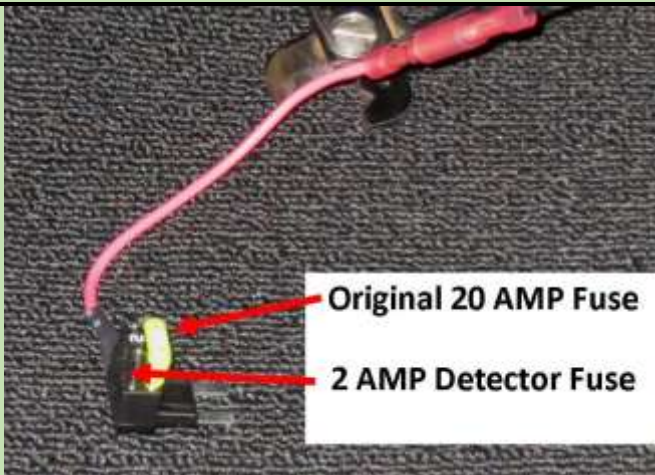


The “D” rubber molding in place under the top widow molding. It is not readily visible even when sitting in the passenger seat. *Note some folks have recently said they were able to lift the upper molding, held with clips, and routed the wires under it. They indicate removing the vanity mirror mounts, see my 1st pics.*

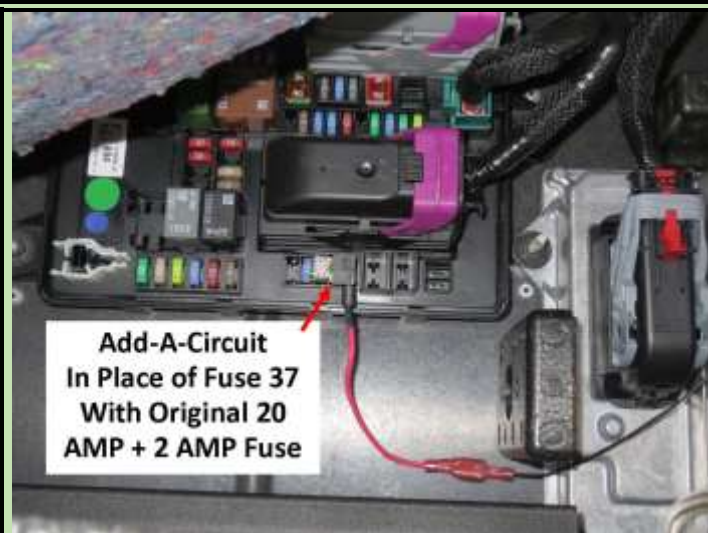
Called the car dealer service manager and asked how the "A" pillar interior trim was removed. He looked in his electronic service manual and said it is similar to other trim, it is held in with clips. He indicated you must first remove the bottom trim piece that is inside the door frame. That was good advice since that trim piece was relatively easy to remove, although it took quite a bit of pressure to release the clips. It is made of plastic covered in material. This picture shows it removed with the two top heavy duty clips and the slots they fit into in the door.



Tried to remove the "A" pillar trim. It would have required much more force than I was ready to use! However with some plastic trim tools, I was able with modest effort, to move the edge of the trim and squeeze the wire behind or between the trim pieces. It was good that the bottom trim in the door jamb was removed as that allowed the wire to be routed from the "A" pillar into the passenger area behind the inside molding. The wires were split and the 12 volt line pushed under the various pieces of molding leading to the rear fuse panel.



This picture shows an Add-A-Circuit connected to the 12 volt power wire going to the radar detector. Note, the original 20 amp fuse removed from slot # 37, goes in the fuse slots closest to where the device plugs back into the fuse panel. A 2 amp mini fuse is inserted in the other fuse holder. The pigtail wire is seen coming from that fuse. A male/female spade connector is used to connect the wires.



The Add-A-Circuit is simply plugged in the original #37 fuse location. The auxiliary receptacle remains connected to the 20 amp fuse, as it was before. The 2 amp fuse simply parallels that current path. Adding 2 amps to the current path will be easily handled. This compares with the smaller diameter wires that GM can use with the LED light circuits employed for most of the car. Perhaps that was the reason our first attempt at using the vanity mirror light circuit did not work. They may be protecting small gauge wires?

Where the ground and power wires split, in the front of the carpet in the passenger compartment, the ground wire was routed across to the console. There was a bolt that was tested for having a good low resistance ground path by using a high wattage bulb. The bolt was loosened and a spade terminal inserted between the bolt head and the captive washer.



Now the radar detector is energized when the engine starts and is not powered when it is not running. The detector can be easily removed by pressing a simple release if parking for in a questionable area (something I seldom do.)

This is a view from the front of the car. The new “sticky cup” mount works great, however it is large. Printed a C7 logo on label stock and placed it into the center of the mount! It is clearly visible! Although I preferred the visor clip for making the detector less obvious, will just have to remove it if there is any concern.



After using the Passport Max for several weeks, noticed that when going over moderately bumpy roads the unit was vibrating. It is a relatively heavy product, heavier and somewhat longer than my previous Passport 9500ix. Previously I have used a visor mount (which I liked) but Escort now says they will not offer these since the high mounting position detracts from the detector performance. In fact, for the Passport Max they do not offer a visor mount. The mounting slot is wider on this new detector and the old visor mount will not work. Result, you must use their new "Sticky" mount, which I do like, except for the vibration!

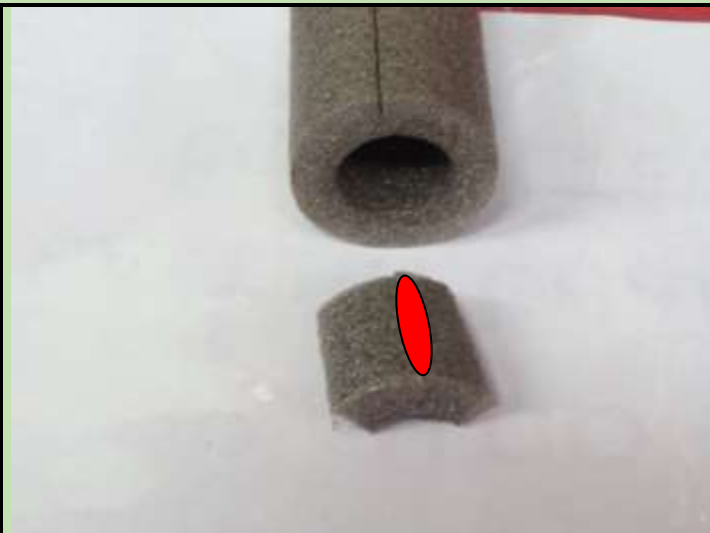
Called Escort Tech and was told they have no solution or change in their product. The tech did not mention that others have complained about it!

Found a solution that is pictured on the right!



Added a "Vibration Damper"

Note: this relatively soft material took a set and stopped working well. Replaced it with a similar size section of black, heavy wall heater hose which has worked well for 4 months.



Note: for the similar size section of black, heavy wall heater hose that replaced the soft insulation that took a set and stopped working well, had to put a small groove in the upper section with a round file to have it hold in place. See red area above.

Typed in the problem in google and sure enough there was a radar detector forum that discussed the problem. One person said they solved it with a piece of dense foam. Looked around my pile of "Stuff" and found the ideal dense foam. A small piece of $\frac{3}{4}$ inch diameter pipe insulation! The rounded shape fit into the gap between the detector and the mounting and held it in place! The amount of pressure exerted can be easily adjusted by using different length pieces! For those that remove the detector often, it is easily reinserted and no need to tape etc. It works great, solved the vibration.

Of interest, on the forum, an Escort rep said they were aware of the problem and working to solve it!!

As noted above, this relatively soft material took a set and stopped working well. Replaced it with a similar size section of black, heavy wall heater hose which has worked for 6+ months.

All was fine for over a month then when the car was parked for an hour, facing into the sun, found the detector hanging by the power cord! The Sticky Mount had let loose!

Reinstalled it, went home and parked the car in the garage. When entering several hours later found the detector, again, hanging by the power cord. This time part of the “D” molding used as a conduit along the top of the windshield was also loose.

Decided more than the 3M adhesive was needed to support the detector, especially if it came off while driving and hitting a bump!

A more secure protective device was needed.

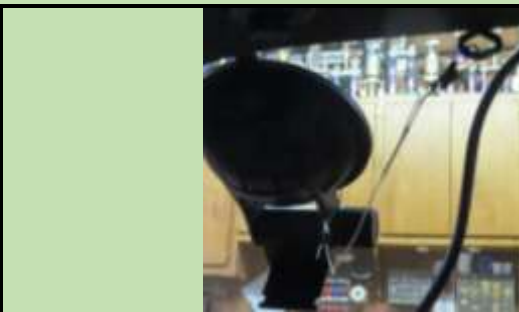


Use a small picture “screw eye” and secured it into the top molding after drilling a small hole. A very thin plastic coated wire and clasp, from a fishing lure, made a secure safety tether.

Wrapped the wire line around one of the Sticky Mount arms and secured with a small crimped sleeve made from the end of an electrical connector.



Looped Around Sticky Mount and
Connected with Crimped Sleeve



Painted the “screw eye,” the clasp and crimping sleeve flat black so they would be less obvious. The detector can still be simply slipped off the mount.

This is the finished installation with both the tether and the foam vibration damper in place.

Called ESCORT to see if others had a problem with the mount and he said not many have been reported. He did advise, in addition to cleaning the mount face and glass, to push the mount into the windshield before using the vacuum clamp. Hopefully the tether will not be needed but it is there, “just in case.” Note: after 2 months, it has stayed in place; perhaps pushing it against the windshield was the answer.



Several months after the 1st failure, on a hot day in SC, the car was parked for 1 hour in the sun, found the detector hanging from the tether! Glad I added it!

The Escort Tech Rep had sent me a “new sticky mount” when I called to inquire about the mount falling off. It does not have a knob to tighten, just a high friction load on the postponing shaft. It sticks out further into the car than the original mount.

Thought I would give the new mount a try.



Added another tether made from a fishing lure attaching very thin braded metal line. Connected the same way as the one on the original mount.

It is similar to the old mount but the sticky pad is flat, somewhat more mounting area. As instructed, pushed it against a clean window and then applied the vacuum lever. It definitely sticks further into the car than the original. Thought they may be an advantage. However it sticks out into the car further and that great leverage from the windshield made it vibrate much more!



Found the solution to get the original mount to stick and stay stuck! Used the 3M General Purpose Adhesive Cleaner shown in the pic left in the area where the suction cup mounts. Followed with the suggestion of pushing the mount against the windshield before pulling the vacuum level. Has held for over 6 months!

The secret appears to be getting the surface very clean. Perhaps alcohol or ammonia would also work.

Even though the “Sticky Mount” has held for over 6 months without falling or every being removed, still think the tether is worth the effort! Gives piece of mind!

Other Stingray PDF's Available:



Some 37 items discuss improvements or information about the Stingray function and/or esthetics. Some are minor and others, like the genuine carbon fiber side skirts, include detailed install information.

Below are the PDF's available. Click on picture (may need Ctrl pressed.) Or just copy and paste the PDF info (Blue type) into your browser. Or email me at GUttrachi@aol.com and state the title desired, shown in Yellow:

Rusty C7 Muffler

Why the C7 muffler is rusted and a simply way to make rust turn matte black.

Bottom pic rusted, top pic treated

http://netwelding.com/Muffler_Rust.pdf



Change C7 Oil

WHY change your own oil and HOW to do it

Revised, includes C7 Lifting Methods

http://netwelding.com/Changing_Oil.pdf



Latch Hatch

Window Valet Helps 2014/2015 Latch

Includes M7 Crazy Seat Memory Recall

http://netwelding.com/Hatch_Latch.pdf



C7 Carbon Fiber Side Skirts

How to install side skirts with jacking information for DIY's without lifts

http://netwelding.com/Side_Skirts.pdf



Carbon Fiber Splitter w/End Plates

How to install Splitter & Nylon bra fit

http://netwelding.com/CF_Splitter.pdf



Removing GM Plastic Film

How To Remove The Rocker Panel Film

http://netwelding.com/Rocker_Panel_Film.pdf



C7 Mirrors 2 3/8" Wider Than C6

Device assists with 8 foot garage door

http://netwelding.com/Narrow_Garage_Device.pdf



Mirror Proximity Alarm

Limit switch alarm warns when passenger mirror is too close to door frame

http://netwelding.com/Mirror_Proximity_Alarm.pdf



Making Jacking Pads for C7

Jacking Pads must 2 1/2 inch max OD. Made four. Also Hockey Puck pad and 2 1/2 inch OD x 2 inch high pads bought after installing side skirts.

http://netwelding.com/Jacking_pads.pdf



C7 Radar Power

The C7 cannot tap the mirror or sun visor for power !

http://netwelding.com/Radar_Detector_Power.pdf



C7 Belt Rattle

Passenger seat belt rattles against the seat back. The solution, add a shoulder belt pad.

http://netwelding.com/Eliminate_Rattle.pdf



Aluminum C7 Chassis and Weld Repair

The C7 has an all aluminum chassis, made from 117 welded pieces

http://netwelding.com/Aluminum_Chassis.pdf



Carbotech Ceramic Brake Pads

The Z51 has very dusty brakes. These pads help!

http://netwelding.com/Ceramic_Pads.pdf



C7 License Plate Frame;

Must Meet South Carolina Law

http://netwelding.com/License_Plate_Frame.pdf



Manage C7 Spilled Gas

Protect the side of the C7 when filling up with gas

http://netwelding.com/Manage_Spilled_Gas.pdf



C7 License Plate & Cargo Lights

LED license plate light & cargo area bulbs are brighter and whiter

http://netwelding.com/License_Plate_Light.pdf



C7 Rear Cargo Area

Rear cargo area needs storage device and rear protector

http://netwelding.com/Rear_Cargo_Area.pdf



C7 Door Panel Protector

protector plate added to prevent scuffing of door when exiting

http://netwelding.com/Door_Panel_Protector.pdf



C7 Improved Cup Holder

A solution to the cup holder spilling under hard braking or sharp turns.

http://netwelding.com/Improved_cup_Holder.pdf



C7 Wheel Chatter/Hop

Why sharp, low speed turns with cold tires causes the front tires to chatter/hop.

http://netwelding.com/Wheel_Chatter.pdf



Carbon Fiber Grille Bar

Install genuine carbon fiber grille bar overlay

http://netwelding.com/CF_Grille_Bar.pdf



Jacking a C7 Vette

Safely jacking either front only or back and front

http://netwelding.com/Jacking_A_C7.pdf



Deer Whistle Installed on C7

Do they work? Plus Install Info

http://netwelding.com/Deer_Whistle.pdf



C7 Battery Issues

Even after using a GM type charger and showing fully charged, voltages were still low!

http://netwelding.com/Battery_Issues.pdf



C7 Splash Guards

GM offers splash guards for the C7 Corvette. An easy DIY installation.

http://netwelding.com/Splash_Guard.pdf



C7 Blind Spot Mirror

Smaller rear and side windows cause C7 blind spots. Small "blind spot mirrors" help

http://netwelding.com/Blind_Spot.pdf



C7 Skid Pad Protector

After the air dam, the aluminum "skid pad" hits driveway ramps etc. Plastic protector helps.

http://netwelding.com/Skid_Pad_Protector.pdf



C7 Wheel Locks

Wheel locks, torqued to required 100 ft-lbs, help protect your expensive wheels from theft.

http://netwelding.com/Wheel_Locks.pdf



C7 OnStar Lights

The OnStar LED's in the rear view mirror, at a quick glance, look like a police car flashing light! This is a fix.

http://netwelding.com/OnStar_Lights.pdf



C7 Skip Shift Eliminator

Skip Shift Eliminator install with suggestions on jacking a C7.

http://netwelding.com/Skip_shift_Eliminator.pdf



C7 Catch Can & Clean Oil Separator

Direct inject engines like the LT1, are particularly subject to "coking." What is Coking and how to reduce the potential?

http://netwelding.com/Catch_Can.pdf



C7 Round Shift Knob

A round shift knob shortens throw.

http://netwelding.com/Shift_Knob.pdf



C7 Stingray Sill Plate

Stingray sill plate replaces original.

http://netwelding.com/Sill_Plate.pdf



C7 Nylon Bra

Nylon Bra Stops Bugs on Front and Grill.

http://netwelding.com/Nylon_Bra.pdf



C7 Clutch Fluid Change

Clutch fluid after 3000 miles gets dirty

http://netwelding.com/Clutch_Fluid.pdf



Carbon Fiber Hood Vent

Replaces Plastic Hood Vent

http://netwelding.com/Hood_Vent.pdf



Cold Air Intake

Low Restriction Air Filter & Duct

http://netwelding.com/Cold_Air_Intake.pdf



May Be Of Interest:

Engineering a ProStreet Rod

*How Our '34 ProStreet Rod Was Designed and Built
8.2 Liter Engine, 4 Wheel Disk Brakes & Coilover*

<http://netwelding.com/Engineering%20Street%20Rod%203-08.pdf>

