RULE THE NITE™

BOOGEY LIGHTS

Family Owned Motorsports Lighting Since 1989!

INSTALLATION GUIDE

Corvette Z06 LED Light Kit

IMPORTANT! No two installation scenarios are the same. Accent lighting is highly subjective. Not everyone shares the same lighting or installation quality goals. Some folks are OK with twisting wires together, others want to solder and heat shrink them. Some folks are OK with running wires where they may be seen or unprotected to save money/time, others want a tidy, clean install so they wrap plastic split-loom around all exposed cables. Some folks are OK with mounting their LED strips to whatever surface they can find, others want to take the time necessary to build out appropriate mounting surfaces to provide the best lighting effect on their vehicle and maximize the longevity of their lighting system. The point is it's not possible to provide all the materials necessary for all installation scenarios on all types of vehicles to meet everyone's quality goals. Our light kits provide the essential components needed for a high-quality, functioning lighting system. Installation of our light kit to your specific vehicle will however likely require additional items to make it look, fit and work the way you want. This is particularly the case with electrical wiring, switching functionality and mounting surfaces for the LED strips. We have created a list of additional items you may need. Here's the link: **https://www.boogeylights.com/other-items-you-might-need/** . While we offer them for sale you can also find these items locally. We urge you to review this information before starting your install.

BENCH TEST YOUR LIGHTING COMPONENTS FIRST!

We know this takes a few extra minutes, but we STRONGLY suggest you bench test your lights AND your controller / switches on a table before doing anything further. Test all of them. While we test every light strip and controller before shipping, bench testing your lights will eliminate the possibility of any problems with the lights or controller before mounting. It also lets you know everything is working properly. Also, the process of bench testing gives you an opportunity to understand the wiring system without interference from other wires, connectors and cables. You can use any 12vdc battery to do this (e.g. car battery, motorcycle battery, lawn tractor battery or 12vdc power supply). If you're not sure how to bench test, download this pdf: https://docs.boogeylights.net/?wpdmdl=1305 . We also have a video: https://www.boogeylights.com/how-to-bench-test/ . Bench testing takes an extra 10 or 15 minutes. It's simple to do and can potentially save you hours of time and frustration down the road.

Did we mention the importance of bench testing every LED strip and controller first?

THIS IS A GUIDE. NOT A 'HOW-TO'. It's simply not possible to provide detailed instructions for all installation scenarios. Far too many variables. The information in this manual is intended to be used as a guide. It is not a detailed step-by-step how-to installation manual. We do not spell out every single step along the way. We cover the essential steps related to installing this kit. Beyond that we assume the installer has the skills, knowledge and tools necessary to do the work using the information we provide here as a guide. You may need to vary your installation and/or make adjustments based on your vehicle. If you're unsure about how to do the installation – particularly the electrical components – we urge you to seek assistance from someone who has those skills.

YOU MUST HAVE AN UNDERSTANDING OF 12V POWER. An essential skill with installation of any Boogey Lights LED product is knowing how to correctly wire the product to a 12vdc circuit. This includes understanding the importance of having a properly sized fuse at the power source, polarity, how to properly seal an electrical connection, using properly sized wire gauge for the load, measuring voltage and measuring the additional amperage draw you're adding. If you are uncertain or unfamiliar with any of these concepts, we urge you to ask someone who has the knowledge to assist you. Electricity is unforgiving.

3M TAPE & ADHESION PRIMER. All Boogey Lights® LED strips have 3M Tape backing affixed to them. This 3M Tape is designed to make a more-or-less permanent bond between the LED strip and the mounting surface. When properly prepared, 3M Tape can be affixed to polyethylene, polypropylene, ABS, PET/PBT blends, concrete, wood, glass, metal and painted metal surfaces. To make this bond you must prepare the mounting surface. You do this by first cleaning the surface with isopropyl alcohol (50/50 mixture with water) and then painting on 3M Adhesion Primer. YOU CANNOT SKIP THIS STEP. The promoter acts as a primer that ensures maximum adhesion. Our lighting kits include a small bottle of 3M Adhesion Primer. Simply use a clean, dry cloth to apply it to the mounting surface.

Using Acetone on Heavy Oiled or Greasy Surfaces. For situations where you are affixing Boogey Lights® to a surface where heavy oils or grease are present, a "degreaser" solvent such as acetone may need to be used first. If you use acetone (or any other degreasing solvent) you must still apply the 3M Promoter. Acetone is not a replacement for primer. In addition, if you use acetone to clean a heavy oiled or greased surface, you must follow up with an alcohol cleaning to help ensure any residue or film from the acetone is removed. This is because acetone (and most other degreasing solvents) will thin the promoter as well as break down the adhesive in the tape greatly reducing the tape's stickiness. Any surface first cleaned with acetone must also be cleaned with alcohol and then thoroughly dried before painting on promoter.

The Corvette sits low to the ground making it difficult to access the bottom of the car to properly mount this lighting system. As you'll see in the photos, we use a pit to gain access under the car. Having the ability to lift the car is very helpful. Some might say it's even essential.

THE LED LIGHT KITS

This product has three possible LED light kits. You can install any one or all of them on your car. It's up to you. We include some diagrams of these layout locations further along in this guide. We also include a wiring plan diagram as well. The layout for each light kit configuration is as follows:

UNDER-GLOW

- 2 - 73" low profile LED strips. One mounted on each side of the car. These LED strips are mounted inside an aluminum channel with diffuser over top (included).
- 2 - 18" low profile LED strip mounted under the rear bumper.
- 1 - 38" low profile LED strip mounted under the rear bumper.
- 2 - 16" low profile LED strips mounted in rear wheel air vents.
- 1 - 52" Heavy Duty LED strip mounted under the front bumper.

The **HEAVY DUTY LED STRIP** in this kit has a 32" power lead. In most cases you will need to extend the power lead anywhere from 3' to 5' each. We include extra power lead for this purpose.

Side LED Mounting

These LED strips are mounted inside of the supplied mini-t12 aluminum channel with plastic diffuser. The aluminum channel is first mounted to the bottom of the car using 3M tape w/3M adhesion primer. Then, the LED strip is mounted to the aluminum channel. Lastly, the plastic diffuser snaps into that channel. **It's important to seal both ends with Lexel or similar silicon to hold those plastic diffusers in place**. If you don't do this, those plastic diffusers will come off. We use the aluminum channel because the LED strip is close to the edge of the car that if you didn't use the channel, you would be able to see the side view of the LED strip which isn't a good look. See photos.

Front Bumper

The front bumper area uses one 52" long heavy duty led strip which is mounted to a piece of 2" x .5" L Channel . The L Channel is riveted to the bottom of the car and the HD LED strip mounts to that piece of L Channel. This is important because the mounting surface on the front of the car has ridges in it. You can't mount the HD LED strip directly to that surface. The strip needs a smooth flat surface which is why we use the L channel. See photo. Important to use the heavy duty LED strip for this location because the car's low stance means the strips in the front are most likely to get hit by debris.

Rear Bumper

Like the front bumper, we first mount (rivet) a piece of 2" x .5" plastic L channel to the bottom of the car. In this case though we smooth or taper down the edges of that L channel first (see photos) so the contour matches the flow of the plastics on the bottom of the car. We include a couple of photos of this. Once the L channel is secured, then mount the Low Profile LED strip directly to that piece of L channel.

Engine Air Intake Scoops

We like to mount the LED strips on the inside of the outside wall of the scoop facing inward towards the car vs on the top shining downward. This way the glow reflects off the side of the car better (in our view). You can do it either way. Here too dry mounting is a good way to see how the lights look in the mounting location you've chosen before permanently mounting the LED strip. See photo.

ENGINE LIGHT KIT

This kit has 4 LED strips.

- 2 – 14" low profile LED strips
- 1 – 12" low profile LED strip
- 1 – 22" low profile LED strip

The two 14" LED strips mount to the 2 cross member supports in the engine bay. The 22" strip mounts under the front support. The 12" mounts under the rear. See diagram. The power leads for all four strips drop down on the driver's side of the car and attach to the 18awg feeder cable.

INTERIOR FOOT WELL LIGHT KIT

This kit has 2 LED strips:

- 1 – 18" LED strip for the driver's side.
- 1 – 16" LED strip for the passenger's side.

We include some 2" x .5" black plastic flat bar with the kit to use for mounting these two LED strips in the foot wells. The plastic flat bar is secured to the top of each foot well using rivets and then the LED strip is mounted to that plastic flat bar. The plastic flat bar with the .5" lip should be mounted facing forward with the LED strip up against that .5" lip. We do this to block the light coming from the side of the LED strip so it can't be seen looking into the foot well; only the glow from the LED strip shining downward can be seen. We connect both power leads together and then run one power lead through the firewall to the controller mounted in the battery compartment.

THE WIRING PLAN

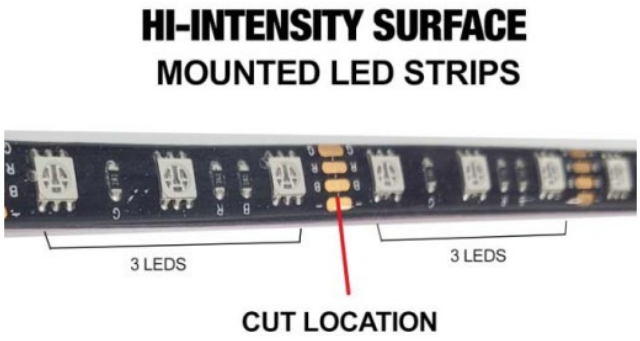
The LED controller is mounted in the battery compartment which is in the front of the vehicle. You'll have to open the 'frunk' and remove the plastics that cover the battery compartment to gain access to this area.

We prefer to run two feeder cables from the controller downward from the battery compartment to outside of the car. One of those cables is routed to the rear of the car where all the LED strips in that area connect to the feeder cable. The other connects to the LED strips in the front of the car. If you are installing the interior foot well lights too, we pull the power lead through the fire wall and connect it to the controller directly. We have a diagram of this wiring plan at the end of this guide. We include a separate wiring diagram for the switches/controller purchased with your kit.

All power lead wires should be wrapped in split loom.

CUTTING YOUR LEDS

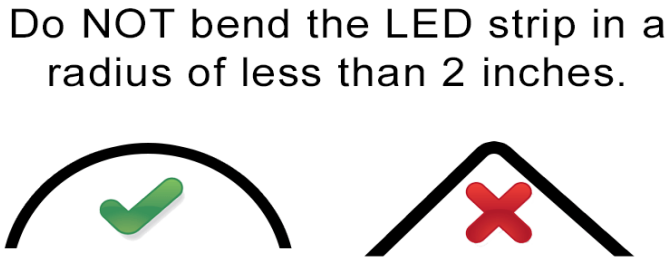
If you need to cut your LED strip you can do so as long as you cut in the proper location – which is every three LEDs as shown in the below photo. Cutting incorrectly could damage your lights and is not covered by the warranty. If you cut the strip, be sure to seal the cut end. You can also use silicone found at your local hardware store. If you do need to cut your LED strip, we strongly suggest doing so BEFORE you mount the strip to your car. **NOTE: Heavy Duty LED strips CANNOT be cut. LOW PROFILE only.**



The LED strip can be cut one time on the copper solder pad where indicated; between the cluster of 3 LEDs. Important to cut in the center of the copper pads. Once cut, the end must be sealed using silicon, liquid electrical tape or even heat shrink to stop water intrusion from damaging the strip.

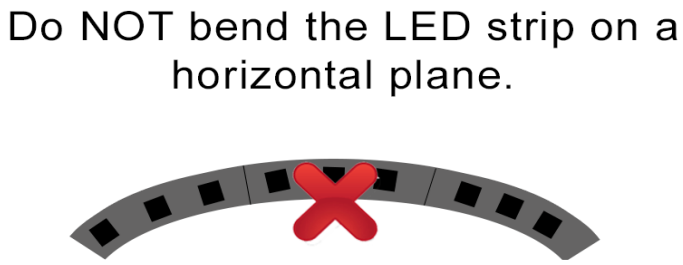
MOUNTING THE LED STRIPS

Once you have your LED strips cut (if necessary) and you know where you are going to attach them, follow these steps:



- The area where you are mounting the LEDs has to be clean: free of all dirt, oil or anything that might affect the LED from sticking. You only get one opportunity to mount the LEDs so it's critical the area be prepared properly.

- Use alcohol to clean the area where you are going to mount the LED strip. Be sure to let the alcohol dry completely before proceeding to the next step. (Note: Do not use acetone or similar cleaner without reading the section "A Word About 3M Tape & 3M Promoter" further on in this document).



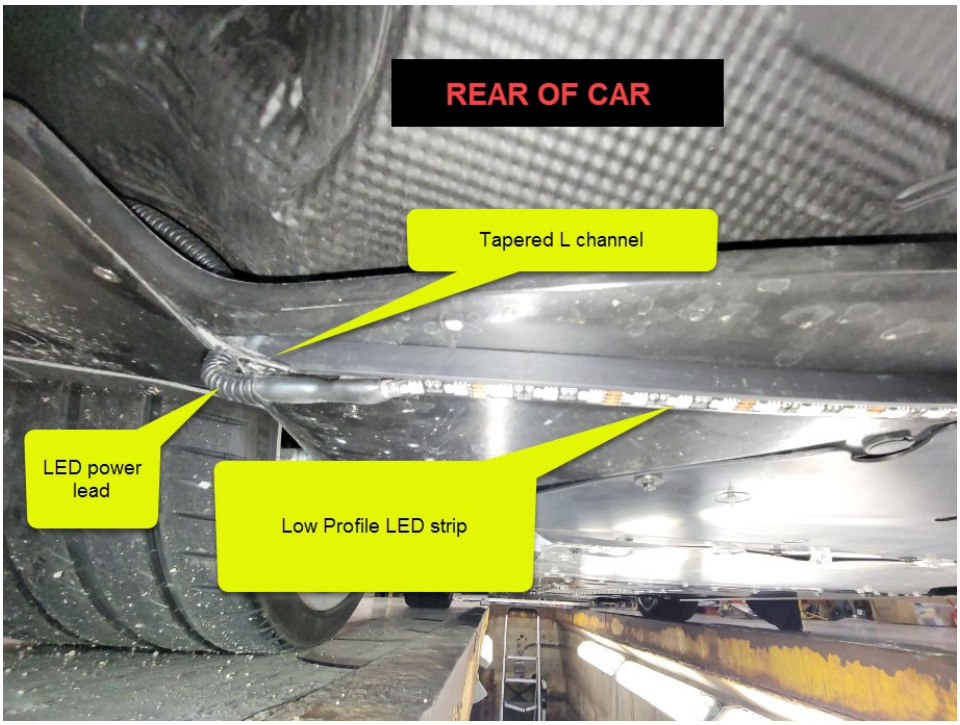
- Next, use the 3M Adhesion Promoter supplied with your kit to "paint" on the promoter where you are going to mount the LED strip. See the note below (on page 6) about the proper way to use promoter. ***This is an important step. Do not bypass.*** Allow the promoter to dry for 30-60 seconds.

- Peel off the red backing tape that protects the 3M adhesive tape on your LED strip. Be careful not to let the tape touch anything. The 3M backing tape on these LED strips are one-use only. They cannot be reused.

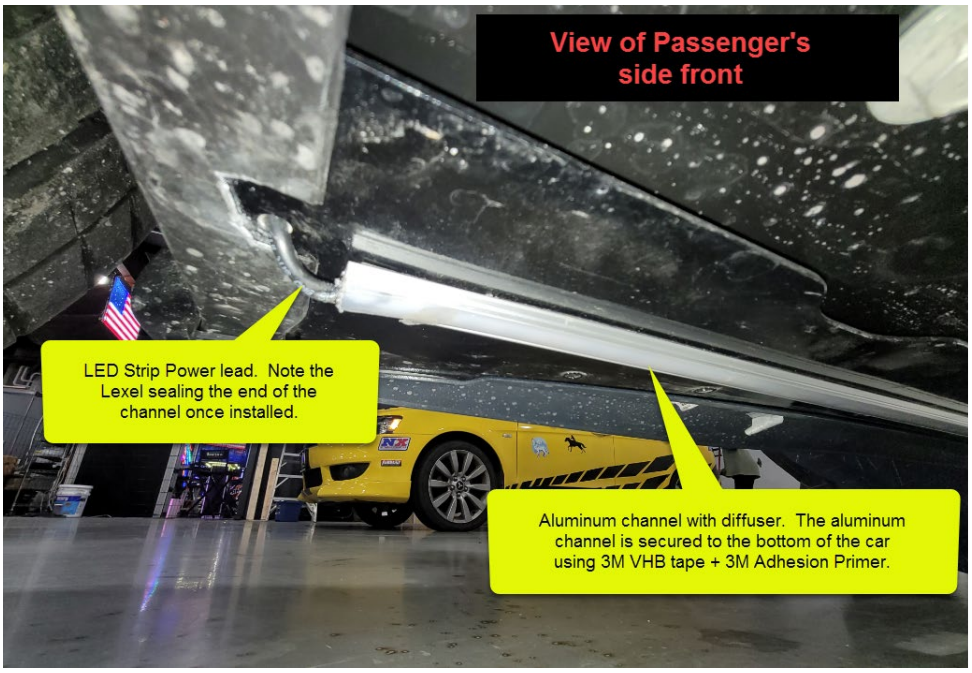
- Carefully push the LED strip to the area you have prepared. You will want to apply only enough pressure to the strip to make sure it is firmly mounted. *You only get one opportunity to do this.* Once the LED strip touches a properly prepared surface that has been promoted, that LED strip will be very difficult to remove. Moreover, if you do remove the LED strip, the strip cannot be used again without adding another layer of 3M adhesive tape to the back. DO NOT press too hard as too much pressure can damage the LEDs and connecting wires in the strip. Also, do not pull, stretch or twist the LED strip. Too much tension on the strip will also damage the LEDs such that some of the LEDs in the strip will not illuminate. The strip must be mounted flat against a single continuous mounting surface, in a straight line. Really important that the ENTIRE STRIP be stuck to the mounting surface and that you NOT attempt to span across multiple mounting surfaces.

- Secure all power leads. Do not leave the power lead cable hanging. Doing so will place too much stress on the LED strip itself causing it to fall off or fail where the power lead connects to the LED strip. Be sure to wrap all power leads in split loom to avoid chaffing.

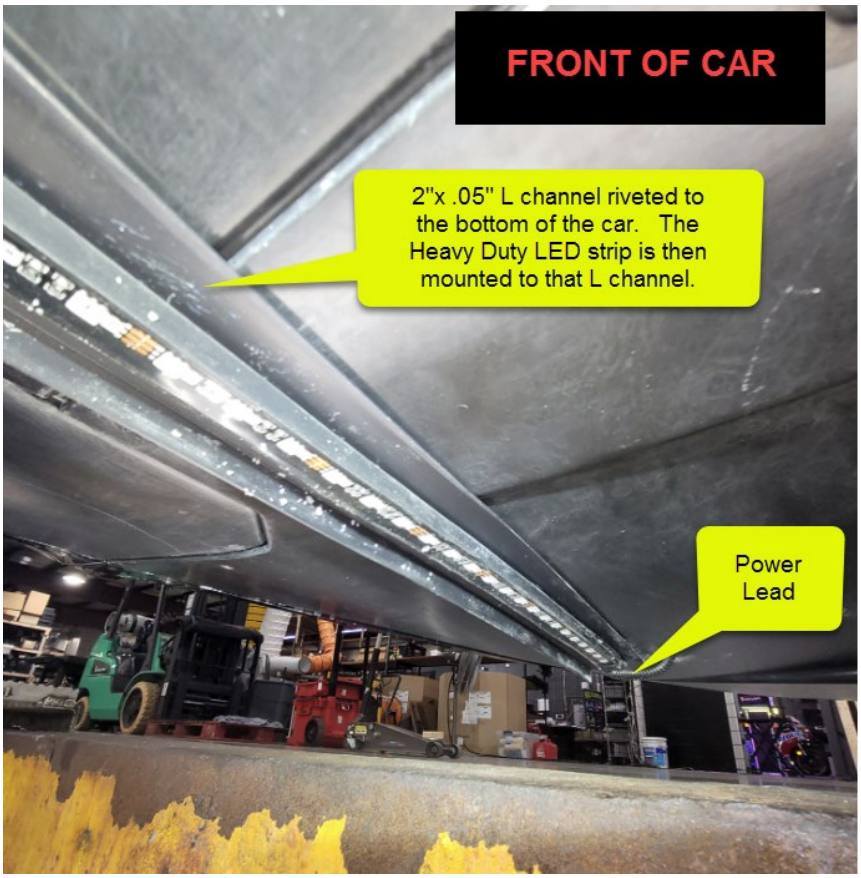
INSTALLATION DIAGRAMS ON FOLLOWING PAGES

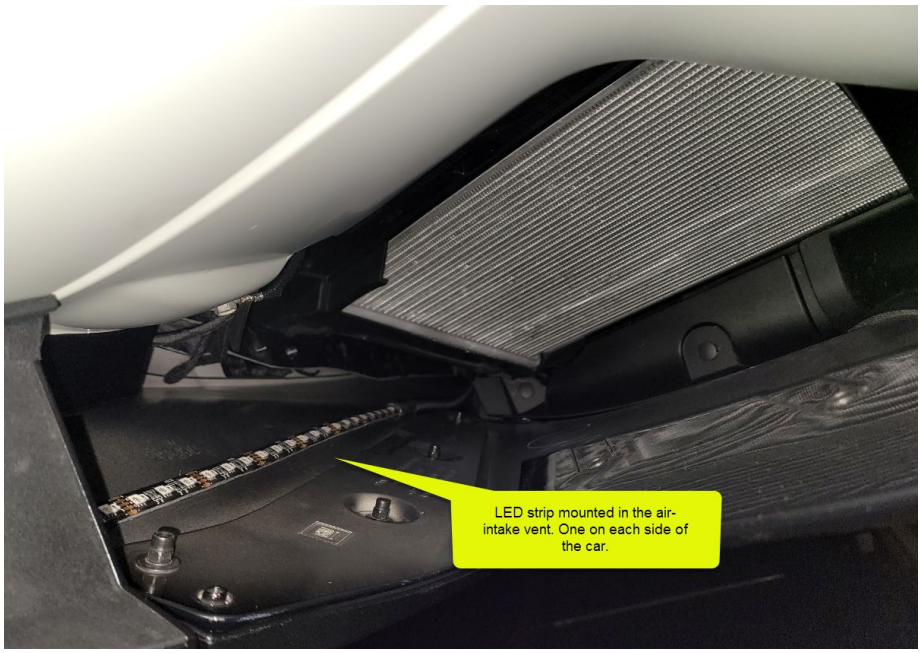

REAR OF CAR
Tapered L channel
LED power lead
Low Profile LED strip

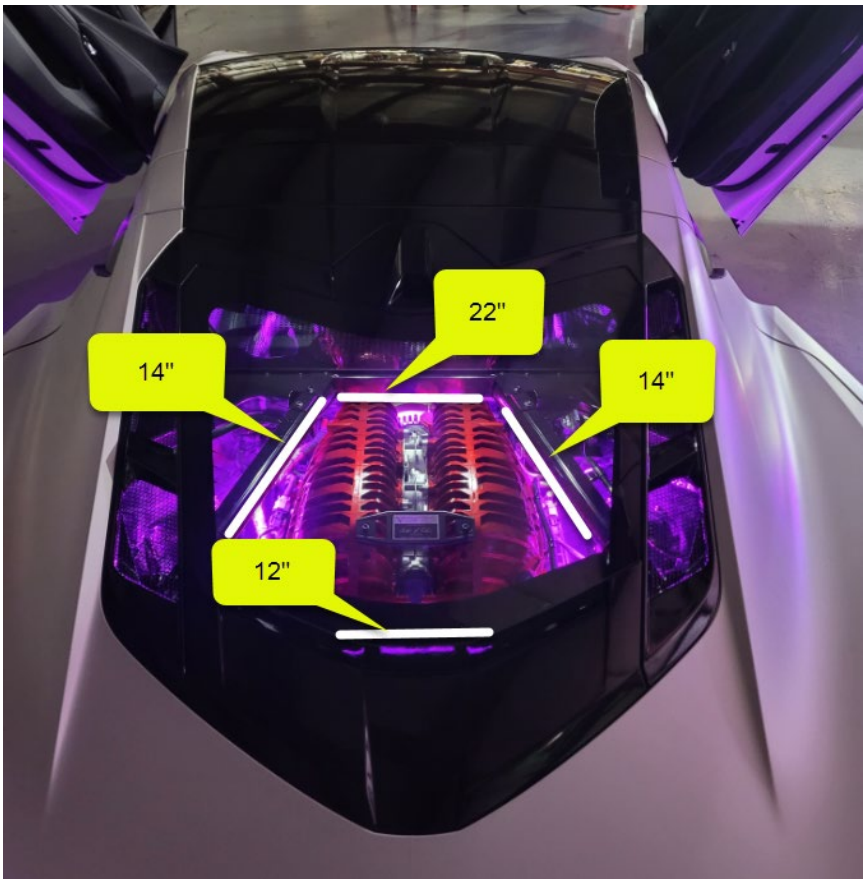

Low Profile LED strip mounted to 2" x .5" L channel
2" x .5" plastic. We taper the edge to match the contour of the plastics.


View of Passenger's side front
LED Strip Power lead. Note the Lexel sealing the end of the channel once installed.
Aluminum channel with diffuser. The aluminum channel is secured to the bottom of the car using 3M VHB tape + 3M Adhesion Primer.

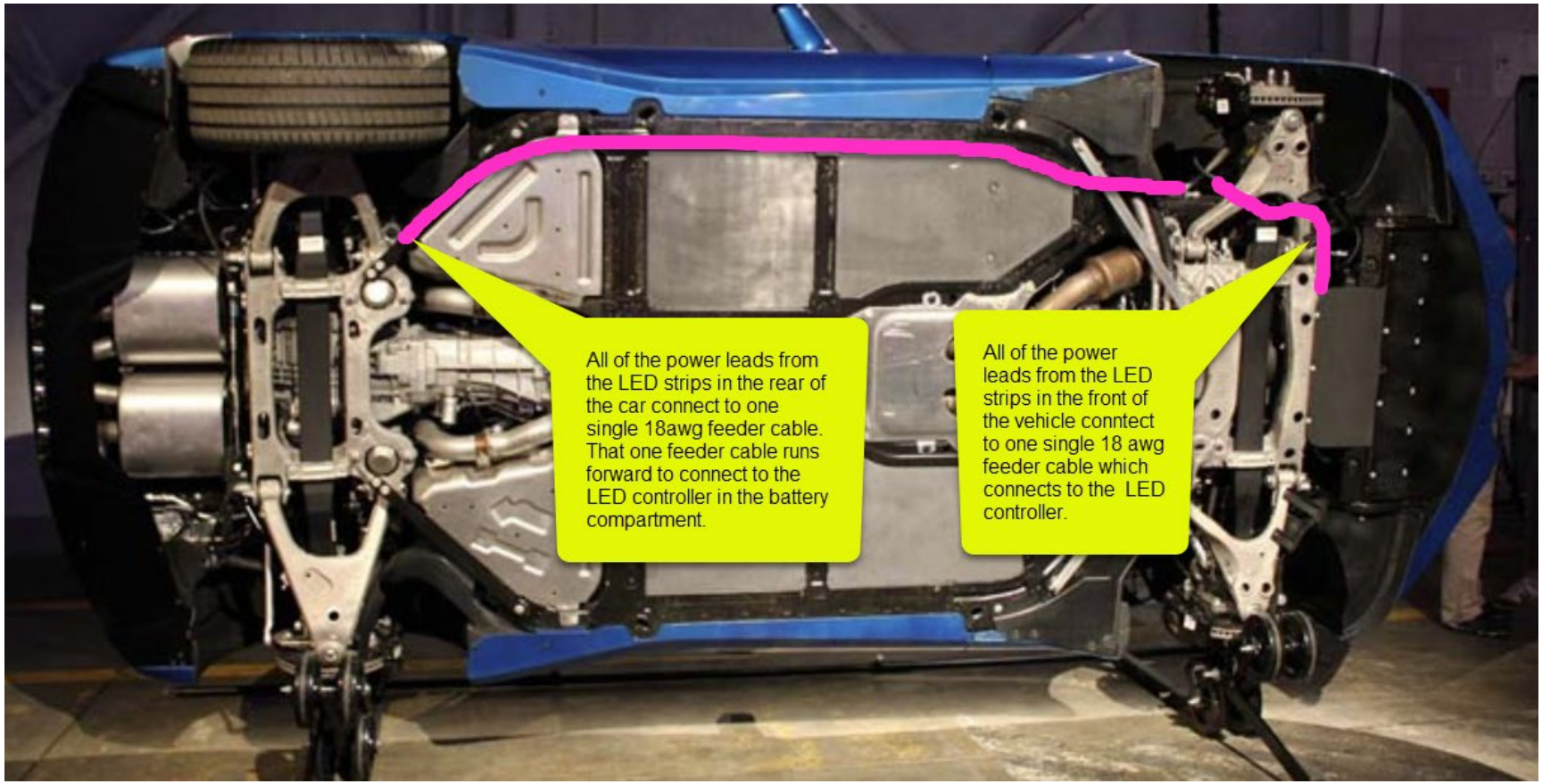

Passenger's Side View
Power Lead
Aluminum channel with Diffuser secred to the bottom of the car.


FRONT OF CAR
2"x .05" L channel riveted to the bottom of the car. The Heavy Duty LED strip is then mounted to that L channel.
Power Lead


LED strip mounted in the air-intake vent. One on each side of the car.


22"
14"
14"
12"


Foot well LED strip is mounted to 2" x .5" plastic flat stock which is secured to the top fo the footwell.



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Additional Resources

- Product Page: https://www.boogeylights.com/z06-corvette-under-glow-led-light-kit/
- How to Videos: https://www.boogeylights.com/how-to-videos/
- Troubleshooting: https://www.boogeylights.com/trouble-shooting-guide/
- Installation Resources: https://www.boogeylights.com/installation-resources/
- How to Bench Test: https://docs.boogeylights.net/?wpdmdl=1305
- Amperage Data: https://docs.boogeylights.net/?wpdmdl=1137
- Quick Search: https://www.boogeylights.com/quick-find/
- GEN2 LED Controller Wiring Diagrams + Operating Info: https://docs.boogeylights.net/?wpdmdl=1163
- GEN2 RF Wireless Remote Operating Info: https://docs.boogeylights.net/?wpdmdl=1164
- GEN2 Bluetooth APP Operating Info: https://docs.boogeylights.net/?wpdmdl=1169
- GEN2 Bluetooth APP Quick-Start: https://docs.boogeylights.net/?wpdmdl=1167

Support

- Phone: 800.847.1359 (M-F, 9-6 Eastern)
- Text: 859.955.8155
- Open a Support Ticket: https://www.boogeylights.com/email-us/
- Online: 24/7 resources at https://www.boogeylights.com/installation-resources/
- How to Make a Warranty Claim: https://www.boogeylights.com/make-a-warranty-claim/

Warranty

The Boogey Lights® warranty requires an original sales receipt from Boogey Lights or an authorized dealer. It covers product replacement only, not labor or other costs. Full details: https://www.boogeylights.com/warranty/.