

3RD-BRAKE LED 3rd Brake Light – Vanagon [80-91]

The brake lights on a Vanagon are woefully underpowered and located very low on the vehicle. This kit will supply you with everything necessary to install a modern, high mount, third brake light on any 1980-1991 Vanagon. Now the people behind you will actually see you when you stomp on the brakes.

Tools Needed

- Phillips screwdriver
- Wire crimping/stripping pliers
- Heat gun/hair dryer/lighter

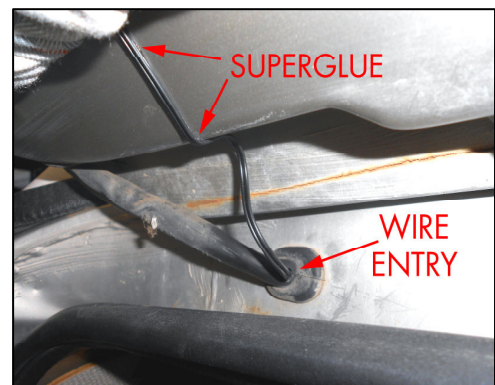
Optional Tools for Cleanest Install

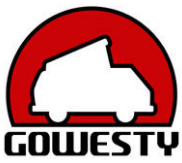
- Open barrel ("W") crimping pliers
- Super Glue
- Pick or terminal removal tool

DISCLAIMER: This kit has been designed for easy installation. However, it does involve cutting and splicing into factory wiring. The installation of this kit is not within everyone's ability. Read through these instructions carefully and decide if installing it is for you. If not, please take your vehicle to an automotive electrician. Wiring errors can be troublesome and hazardous.

INSTALLATION

1. Begin by mounting the light in the center of the rear window with the wiring exiting towards the driver's side of the vehicle. Use the alcohol prep pad to clean the inner window surface, and align the center of the light with the center screw of the curtain track. Remove the backing off of the adhesive and press the light firmly into place.
2. With the light mounted in place, begin routing the wire from the light into the window seal. A small dab of Super Glue can be used to secure the wire nicely out of the way (see image). Tuck the wire under the lip of the rear window seal and run it down the length of the window toward the driver's side to the top corner.
3. At the corner you can route the wire through the boot for the defroster wiring which is possible but can be a bit tricky and frustrating. Alternatively, you can route it as detailed below, which is not as clean but is quite a bit easier.
4. The rubber boot that connects the door to the body has a small nub protruding. Exit the wire out of the seal in line with this nub. Clip the end of this nub, and feed the wire into the opening. You can once again use Super Glue to keep the wire nicely adhered to the door and out of the way.





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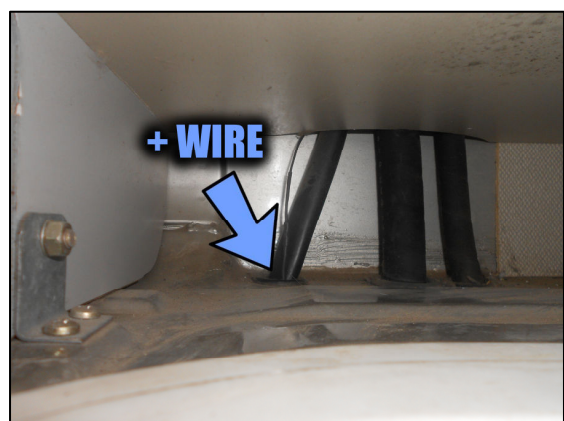
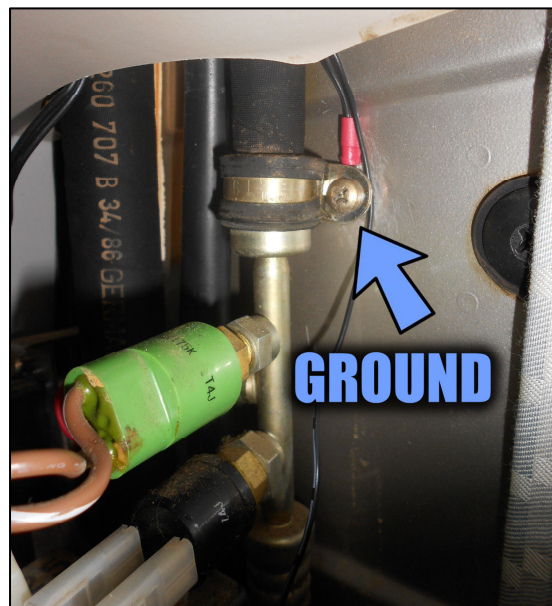
FULL CAMPERS – WITH AIR CONDITIONING

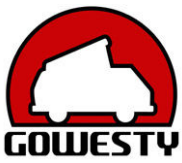
5. Exit the wire inside the van through the 2" hole in the ceiling that is accessible just above the cabinetry, in about 3" from the edge of the hatch. Run the wire down behind the rear cabinet following the path of the large black A/C hoses.

6. Inside the small rear door of the back cabinet, you will need to remove the shelf and the back panel, which covers the A/C lines.

7. Run the wire down the wall of the van following the A/C lines. There is an adel clamp holding an A/C line to the wall—ground the brake light here. **NOTE: The ground wire is solid black; the positive wire has the hashed white tracer.** To do this, split the wire ends, trim the SOLID BLACK wire to length (you should trim roughly 26" off the end). **Save the excess wire cut from the ground wire; it will be re-used next.** Strip the end of the wire, crimp the provided ring connector to the end, and ground it at this provision (see image).

8. Using the non-insulated butt connector and heat shrink tubing, connect the excess ground wire to the positive wire to extend its length. Continue the positive wire down and out of the bottom of the cabinet, then through the metal floor of the van following an A/C line through the grommet in the floor and into the compartment behind the taillight.





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FULL CAMPERS - *WITHOUT AIR CONDITIONING*

Because there are no A/C lines to follow down into the engine compartment, there are some differences to the wire routing for these vans.

9. It is recommended to ground the solid black wire at the factory ground point adjacent to the hole where the wire enters in above the cabinet. It requires a short, stubby screwdriver to access this screw. Split the wire ends and cut the ground wire (**SOLID BLACK WIRE**) to length. **Save the excess wire cut from the ground wire; it will be re-used next.** Strip the end of the ground wire, crimp on the provided ring connector, and attach it to the ground screw.



10. Using the non-insulated butt connector and heat shrink tubing, connect the excess ground wire to the positive wire to extend its length. Continue this extended wire down behind the cabinet and into the cubby area. Here you will need to drill a hole through the upholstered panel and the metal body panel to run the wire down the pillar to the rear of the taillight. Due to the space constraints of getting a drill in there, it is easiest to remove the lower shelf and make your hole just below the upper shelf. The hole through the upholstered panel should be $1\frac{1}{32}$ " , and the hole through the metal should be $\frac{3}{16}$ ". Run the positive wire out through the grommet. Remove the outer vent cover to access the wire and continue it down the pillar into the space behind the taillight. A dab of silicone where the wire runs through the grommet will seal it up and hold the wire securely in place.





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WEEKENDERS/MULTIVANS – WITH OR WITHOUT AIR CONDITIONING

11. Weekenders and Multivans have a portion of the cabinet that obscures the hole in the ceiling where the wire enters the interior of the vehicle. A little creativity with a stiff wire and some thin pliers will be required to get the wire run through to this point.



12. Once you have the wire through to the interior and accessible from the rear hatch area, split the wire ends up and clip the ground wire (SOLID BLACK WIRE) so there is about a foot of wire visible. **Save the excess wire cut from the ground wire; it will be re-used next.** Strip the end of the ground wire and crimp on the provided ring connector.



13. Using the non-insulated butt connector and heat shrink tubing, connect the excess ground wire to the positive wire to extend its length. Feed the wires back behind the cabinet so that you can retrieve them through the upper corner of the larger closet (where you have access to the rear of the curtain rod).

14. Drill a 3/16" hole for the wire grommet while leaving a space for the ground wire to be attached, as well. Use the self-drilling, self-tapping screw to attach the ground wire to the body of the vehicle and run the positive wire out through the grommet. Remove the outer vent cover to access the wire and continue it down the pillar into the space behind the taillight. A dab of silicone where the wire runs through the grommet will seal it up and hold the wire securely in place.





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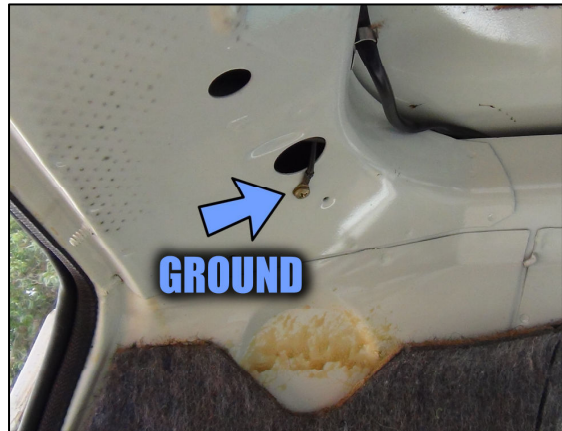
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7-PASSENGER VANS – WITH AIR CONDITIONING

15. The plastic covers at the rear of the van will need to be removed.



16. Ground the solid black wire at the factory ground point adjacent to the hole where the wire enters in above the cabinet. Split the wire ends and clip the ground wire (SOLID BLACK WIRE) to length. **Save the excess wire cut from the ground wire; it will be re-used next.** Strip the end of the ground wire, crimp on the provided ring connector, and attach it to the ground screw.



17. Using the non-insulated butt connector and heat shrink tubing, connect the excess ground wire to the positive wire to extend its length. Continue the positive wire down the wall next to the A/C lines, then through the metal floor of the van following an A/C line through the grommet in the floor and down into the compartment behind the taillight.

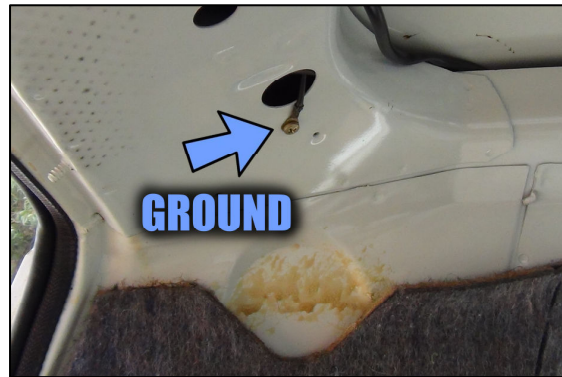




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7-PASSENGER VANS – *WITHOUT AIR CONDITIONING*

18. The headliner will need to be removed at the driver's side.
19. Ground the solid black wire at the factory ground point adjacent to the hole where the wire enters in above the cabinet. Split the wire ends and clip the ground wire (SOLID BLACK WIRE) to length. **Save the excess wire cut from the ground wire; it will be re-used next.** Strip the end of the ground wire, crimp on the provided ring connector, and attach it to the ground screw.
20. Using the non-insulated butt connector and heat shrink tubing, connect the excess ground wire to the positive wire to extend its length.
21. Drill a 3/16" hole for the wire grommet at the top of the pillar, just to the front of the indentation (see picture). Run the positive wire out through the grommet. Remove the outer vent cover to access the wire and continue it down the pillar into the space behind the taillight. A dab of silicone where the wire runs through the grommet will seal it up and hold the wire securely in place.

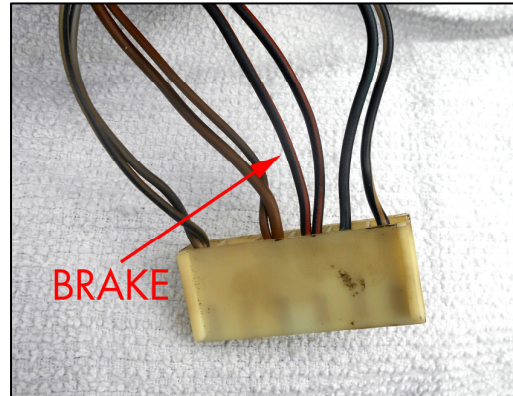




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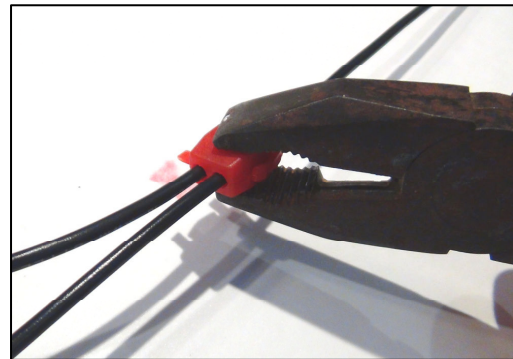
WIRING TO TAILLIGHT

22. Remove the driver's taillight assembly (four screws in each corner of the taillight), and remove the plug from the back of the taillight. Peel back the rubber boot covering the taillight connector. Feed the wire through the boot to access the wires and the plug.



23. The positive wire from the 3rd brake light needs to be added to the brake light circuit (BLACK/RED wires). You can achieve this in one of two ways, depending on tools available.

24. You can use the red wire tap included to simply tap into either one of the black w/ red tracer wires in the taillight connector.



25. A more professional way is to remove the female connector with the two black/red tracer wires from the taillight plug using a pick or terminal removal tool. Cut the female connector off and use the new, provided, non-insulated, female connector to capture both of the black/red tracer wires AND the positive wire from the 3rd brake light. Using an open barrel "W" crimper, securely crimp these in the connector, and push the new connector back into the factory taillight plug.

26. Reconnect the taillight plug into the taillight, and test for proper function. If everything works properly, re-install the taillight and any other removed components.



27. The final thing to do is adjust the angle of view. The two knobs on either side of the 3rd brake light housing can be loosened to adjust the angle; we recommend 10-15 degrees down from the horizontal.

You're done! Now start stopping more safely!