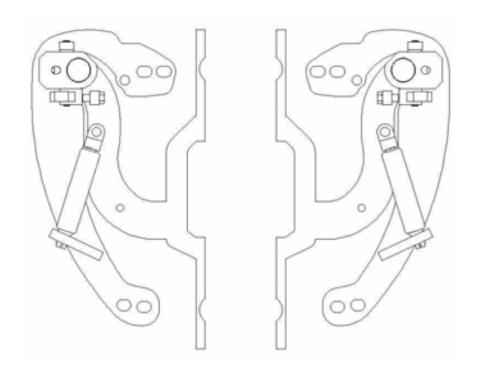




# INSTRUCTIONS

Made in USA with U.S. PATENT #6,808,223; #6,845,547; #7,140,075; #7,059,655 and other patents pending.



#### THIS KIT INCLUDES:

- > 16 M8-1.25X30MM BOLTS WITH WASHERS
- > 2 SHOULDER BOLTS WITH WASHERS
- > WIRE LOOM

- > RIGHT AND LEFT HINGE ASSEMBLY
- > 2 SHOCKS 875 PSI
- ➤ 2 PINS

## **TOOLS REQUIRED FOR INSTALLATION:**

AIR RACHET, GRINDER AND CUTTER.
> 7MM, 8MM,10MM, 11MM, 13MM, SOCKETS AND EXTENSION.
FORK AND PHILLIP'S SCREW DRIVERS
> SPACERS FOR THE DOOR GAP.
➤ 3/16 ALLEN WRENCH
➤ 1/4 TORX BIT
➤ 9/16 WRENCH
> LOCKTITE RED

OTHER TOOLS MAY BE NEEDED DEPENDING ON YOUR VEHICLE.

# (Note: The pictures on the manual are for reference only they may not match your vehicle.)

- 1) Disconnect the battery.
- 2) Remove head lights: Remove all Phillip's and plastic clips from around the wheel well. Pull on the wheel well, by the front of the car to gain access to (2) 10mm bolts securing the bumper to the fender.



Remove the clips on top of the bumper this will allow you to pull on the bumper to gain access to (1) 10mm bolt securing the head light.



Remove the 10mm bolt pull on the head light and unplug the 2 wire harnesses from the head light. Put head light aside in a safe place.



#### 3) Remove Fender:

Once the lights have been removed you will be able to remove (1), 10mm bolts that was covered by the head light.



Remove all 10mm bolts on top of the fender.



Pull on the skirt to gain access to (2) 10mm bolts located at the bottom of the fender by the door. At this time you will be able to remove the fender.





4) Loosen the door catch by opening the door and removing (4) 10mm bolt. For now let the door catch fall inside the door we'll remove it later.



5) Remove door panel: Remove (6) Phillip's screws.



Carefully remove the door panel. Use the fork to help you remove the door panel.
Once you have removed the door panel, disconnect the control panel wire harness.



6) Modify wire layout: You will need more wire slack in order for the Vertical Doors Inc. system to open all the way up. Remove the speaker this will give you access to the wire harness. Take off the closest clip to the speaker and pull the wires towards the front of the car about (4) inches. Reinstall the



plastic clip and the speaker.

Remove the foot guard and kick plate. Under the kick plate you will find a wire harness, remove the plastic clip this will allow you to pull the wires out about (1-2) inches. Now you have enough wire slack for the VDI system to open.





After gaining the extra wire slack replace the door panel, foot guard and kick plate.

7) Disconnect wires harness coming from the door. Remove plastic boot and cut it in half and place them inside. Later on the installation you will use the boot.

8) Close door and use painter's tape to secure the door in preparation for factory hinge removal.

Use a 13mm socket to remove the factory hinges.



Hint\* (You can make your spacers out of paint sticks and about 8-10 turns of blue painters tape. Add the spacers after the factory hinges have been removed.)

#### 9) Modify apron:

Place the new Vertical Doors Inc. in place and mark the apron. Remove (1) 14mm bolt and cut the section out so that the kit sits flat against the apron.

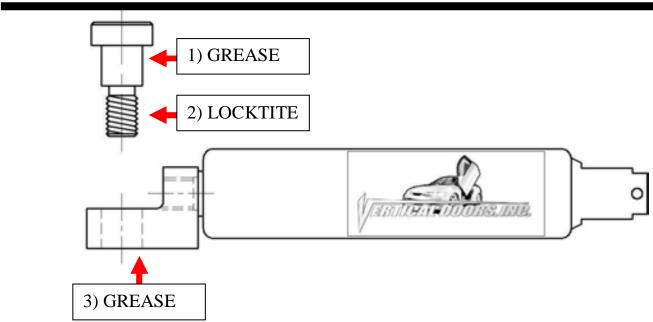
(Look at the next figure to get a better understanding of where to cut, and how it will look like when done.)



10) After you have removed the original door hinges, install the New Vertical Doors Inc. System. Make sure all mounting surfaces are flat.

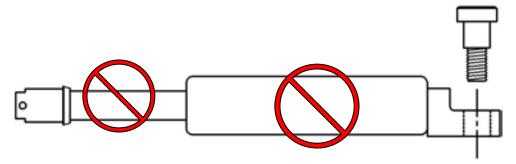
Hint\* Tighten the bolts on the door first then the bolts on the body second.





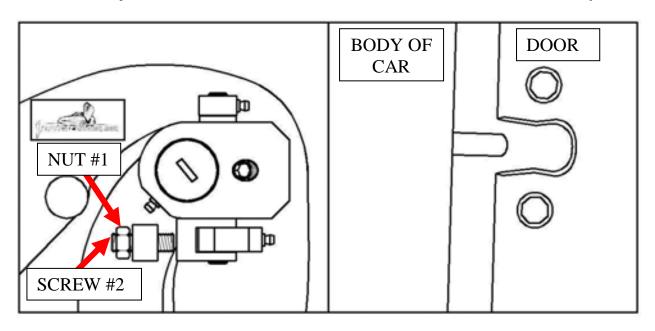
\*IMPORTANT STEP: DO NOT SKIP THIS STEP. THIS STEP IS CRUCIAL IN YOUR INSTALLATION PROCESS, IF THIS STEP IS NOT COMPLETED WHEN INSTALLING THE VERTICAL DOOR KIT; ALL WARRANTIES ARE VOIDED, AND MAY CAUSE FUTURE PROBLEMS WITH YOUR VERTICAL DOOR SYSTEM.

- 1<sup>ST</sup>, make sure you put grease on the body of shoulder bolt where the arrow is pointing.
- 2<sup>ND</sup>, make sure you put red Locktite, where the arrow is pointing, on thread of shoulder bolt.
- 3<sup>RD</sup>, make sure you put grease on the bottom side of the shock end.



# WARNING! THE USE OF ANY TYPE PLYERS, PAINT OR FOREING MATERIALS ON THE SHOCK'S BODY OR SHAFT WILL VOID THE WARRANTY.

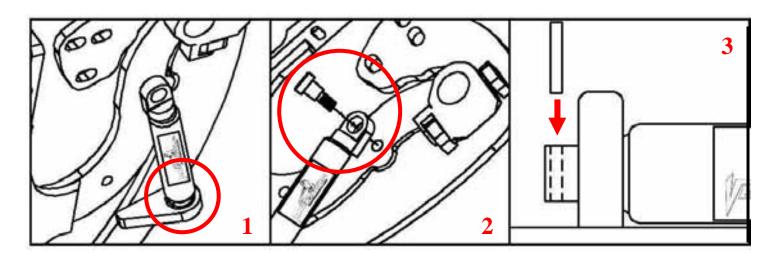
11) Once hinge is locked in place, break nut #1 then turn Allen set screw #2 on fig until it hits the block then open the door and continue to adjust until the door matches with the striker, open and



close door making sure it closes like factory.

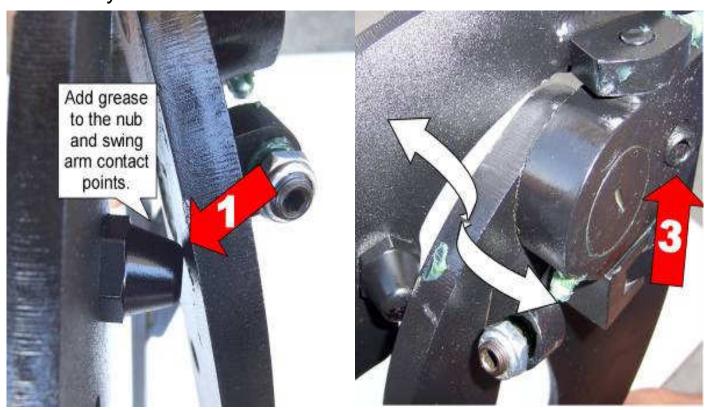
Hint\*(leave #1 nut loose until shock is installed Allen set screw will have to be re-adjusted after shock is installed.

### 12) Install the shock.



Hint\* (You will need a helper to raise the door). (Slip the spherical rod mount into the spherical ball bearing (1). Using a 1/4 Allen wrench, tighten the screw into the swing arm (2). After the shock is installed secure it by installing the pin in the bottom shock end (3).

13) After shock is installed re-install door panel and lift the door. Adjust door opening screw #3 clockwise until distance between nub and swing arm is enough so that the swing arm moves up and down freely.



Hint\* (Fine tune the Allen set screw (#2) to realigned striker with door. After the door is aligned, test door by opening and closing, lifting and lowering door several times.



Note: Do not install fender until the adjustment of the door is accurate, and the set screw is tightly secure. Also make sure everything is tight, adjustment is set and everything is Locktite.

14) You will have to open and raise the door Reinstall the boot, half to door and the other half on the apron and add included wire loom to protect exposed wires. Use black electrical tape to secure the wire loom.



15) Cut one of the Fenders as shown on the picture to make room for the new Vertical Doors Inc. system.

Note: After you have cut the fender use a sander or grinder and make sure the surface is completely flat. Use black door trim to give it a finish look.



16) Lift the door and replace the fender by reversing step 2 and 3.

Hint\*(Make sure the electrical wires don't get pinched enough to damage wires)

17) For the other side just follow steps 2-16

VERTICAL DOORS

LAMBO DOORS