

## Installation Instructions for 63016 Electric Vacuum Pump Kit

### Installation Instructions:

1. First install the pump in a suitable location, using the rubber insulators to mount to the vehicle.
2. Next, mount the vacuum switch in a suitable location, making sure that the switch is grounded to vehicle.

**WARNING! IF SWITCH BODY IS NOT PROPERLY GROUNDED, THE ELECTRICAL CIRCUIT WILL NOT WORK PROPERLY!**



3. Run vacuum hoses as shown to the right.

**NOTE:** Switch is unidirectional. (Switch will still function if vacuum lines are reversed.)

4. Begin electrical wiring by mounting the relay in a suitable location.

**NOTE:** Relay mounting tab does not have to be grounded!

**CAUTION: WHEN INSTALLING RELAY AND VACUUM SWITCH, MAKE SURE THAT THE VACUUM SWITCH (THE SWITCH WITH THE RUBBER HOSES ATTACHED TO IT) IS NOT WIRED TO THE POSITIVE (+) SIDE. IF VACUUM SWITCH IS WIRED INCORRECTLY, THE SWITCH WILL BURN OUT AND WILL NOT WORK!**



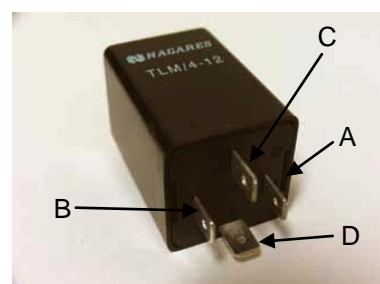
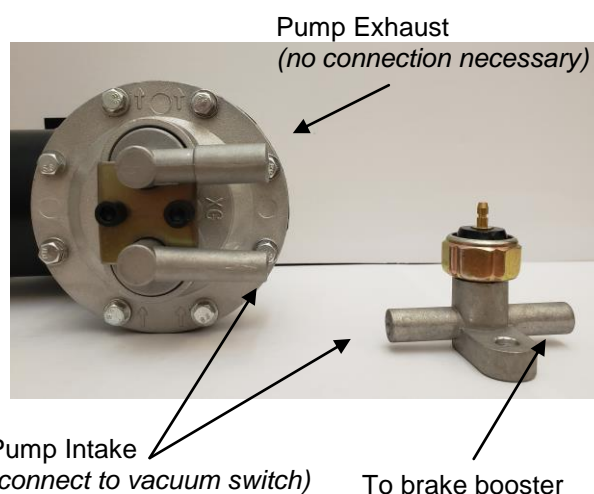
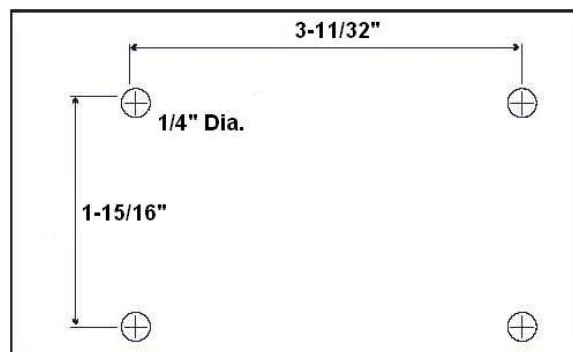
5. Next, wire the fuse to a positive (+) ignition switched power source.

- a) Positive (+) connection must be a switched source or pump will run with key off!
- b) The circuit used for connection must have a 10 amp fuse!

6. Detailed diagram of relay & proper connections: Proper connections to relay are explained in the following steps.

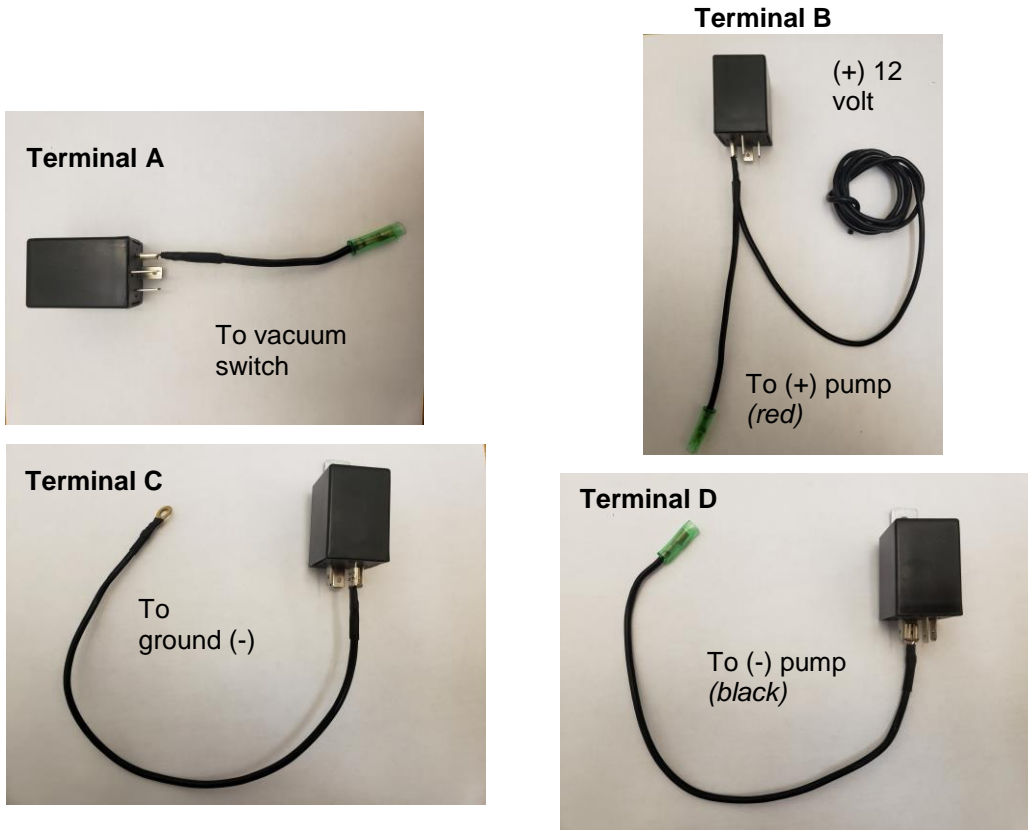
- a) To top of vacuum switch
- b) From (+) fuse, and to red (+) motor
- c) Vehicle ground, battery (-)
- d) To black (-) motor

7. The female end connector will connect to terminal B on the relay, one wire to the positive (+) switched power source (to fuse), and the last wire to the positive (+) pump motor side. See Figure 1.



**FIGURE 1**

8. Connect female terminal connector to relay terminal D, and the female bullet nose connector to the pump motor black (-) side.
9. Connect female terminal to relay terminal A and Female Bullet to top of Vacuum Switch.
10. Lastly, Connect female Terminal to Relay Terminal C and the Ring Terminal to Vehicle Ground
11. Congratulations, you have completed installation of the vacuum pump! Before you start the vehicle, review the simplified wiring diagram pictures below to make sure all of your connections are correct:



<b>TROUBLESHOOTING</b>		
<b>FAULT</b>	<b>POSSIBLE CAUSE</b>	<b>SOLUTION</b>
Pump Doesn't Work	Blown Fuse	Replace Fuse
	Switch Not Grounded	Check Wiring & Ground
	Vacuum Switch Connector Not Connected	Check Top of Vacuum Switch
Vacuum Pump Won't Stop	Vacuum Switch Failure	Replace Vacuum Switch
	Relay Failure	Replace Relay