

EV Source - Complete Vacuum Assist Kit

Thanks for your purchase of the *EV Source* Vacuum Assist Kit. This set of components has been carefully chosen to provide you with practical, functional means of providing vacuum assist in a vehicle that does not have a vacuum source, or insufficient vacuum. If installed properly, this kit should provide a lifetime of service. Please carefully read these instructions to ensure that everything is installed correctly.

1. The kit should come with the following items:
 - i. Vacuum Pump
 - ii. Vacuum Reservoir (includes vacuum switch and gauge)
 - iii. Tubing, 6ft
 - iv. Rubber Mounting Studs
 - v. Push-on terminals (2)
 - vi. Ring terminal (1)
 - vii. Hose clamps (4)

Ensure that all components are in the kit.

2. Find a solid mounting point within the vehicle to mount the reservoir. Strut support towers are a good choice. Drill holes for the mounting studs, and secure the reservoir to the vehicle.
3. Determine a location for the vacuum pump. Try to locate the pump as close to the reservoir as possible. Use the rubber mounting studs to help isolate vibrations from the pump. If possible, mount the pump with the mounting plate facing downwards. Use the rubber isolating studs to mount the pump.
4. Determine the length of tubing required between the check-valve (black barbed) on the reservoir to the brass barbed fitting on the pump. Cut the provided tubing to this length, and connect these two points placing the provided clamps on the tubing before connecting to the fittings. Determine the length of tubing required between the brass fitting on the reservoir to the brake booster on the vehicle. Cut the tubing to this length and connect these two points, again remembering to place the clamps on the tubing before connecting.
5. Tighten the clamps.
6. Route wire (not provided) from a fused 12V source capable of 10A to the switch on the vacuum reservoir. Choose a power source that provides power only when the vehicle ignition is "On". Make sure the power source is fused with a 10 amp fuse.
7. Crimp one of the provided terminals onto the power supply wire after stripping off approximately 3/16" of insulation from the wire. Connect to the "COM" terminal on the switch.
8. If the reservoir is close enough to the pump, the original red wire from the pump can be used to connect to the switch on the reservoir. Otherwise, an extension wire will have to be used. Route the red wire of the pump to the switch on the reservoir. Crimp the other provided terminal onto the pump wire, again stripping off about 3/16" before crimping. Connect this terminal to the "NO" terminal on the switch.
9. Connect the other pump wire to the vehicle chassis. Find a location as close to the pump as possible. Crimp the provided ring terminal onto the wire after stripping off appropriately 3/16" of insulation from the wire.
10. Test the installation by turning on the ignition. Verify that the pump powers on immediately,

and that vacuum on the gauge rises to approximately 21 inHG. Check the brake pedal and verify that the pedal is being assisted (it should be easy to depress the pedal completely). Once the pedal is depressed a couple times, the pump should turn back on. If this is the case, the system is properly installed. If the pump does not turn off, check all the joints to make sure they are connected well. Watch the gauge to see if the vacuum is maintained. If the gauge visibly goes down within a few minutes with no depression of the brake pedal, there is a leak in the system. Attempt to track down leaks by listening for hissing near any of the joints, and ensuring good, tight connections.

IMPORTANT DISCLOSURES

While all efforts have been made to provide the most comprehensive tutorial possible, EV Source LLC assumes no liability expressed or implied for any damage(s) occurring to your components as a result of using EV Source vacuum assist products, either due to mistake or omission on our part in the above instructions, or due to failure or defect in the EV Source vacuum assist products. **WARRANTY** The products in this kit are guaranteed for 12 months from the date of delivery to the final user against defects in materials or workmanship. During this period, they will be repaired or have parts replaced provided that: (I) the product is returned to EV Source LLC; (II) the product has been purchased by the end user and not used for hire purposes; (III) the product has not been **misused**, handled carelessly, or other than in accordance with any instructions provided with respect to its use. This guarantee does not confer rights other than those expressly set out above and does not cover any claims for consequential loss or damage. This guarantee is offered as an extra benefit and does not affect your statutory rights as a consumer.