

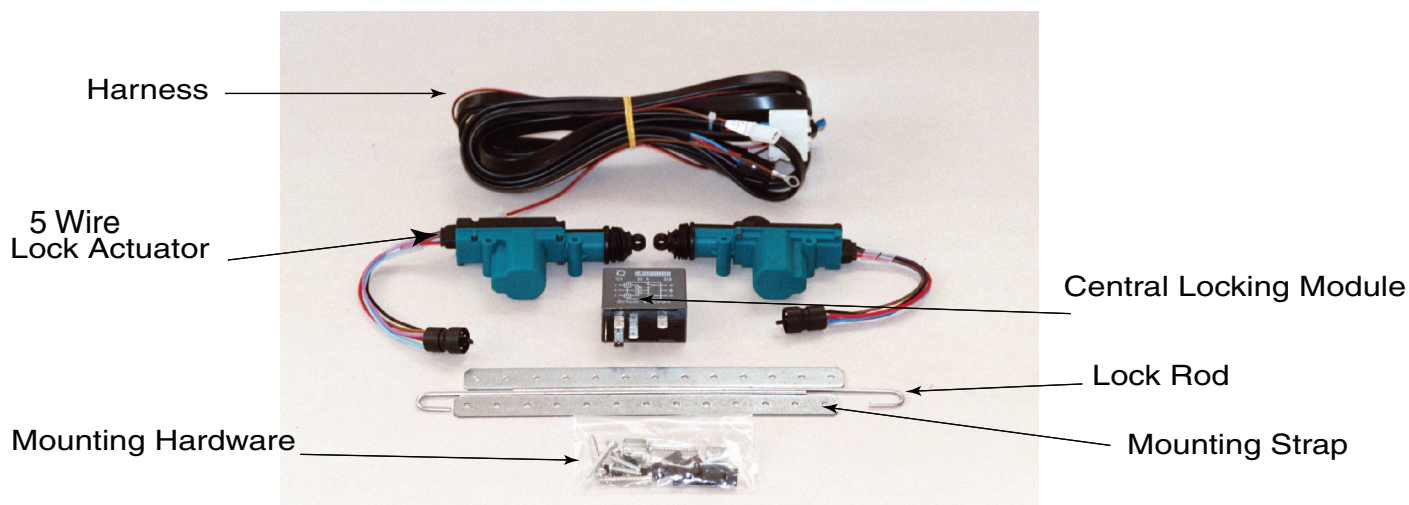
Power Door Lock Installation Typical:

The Electric-Life Central Door Locking System is a universal style and can be adapted to most passenger and light truck applications. As with any universal style system the difficulty and time needed to complete the installation may greatly vary. As with any project, it is important to first read the instructions, and put together an installation plan. Your plan should include an area that is suitable for interior work. The work area should be clean and allow you enough space to work with the doors open. You should also make sure that you have all of the proper tools to do the job right. We suggest the following:

TOOLS:

- * Screwdrivers in various sizes, both Flat and Phillips style
- * Pliers and wire cutters
- * Torx head driver set
- * Door handle removal tool (available at parts stores)
- * 3/8" Ratchet and socket set with metric and sae sockets
- * Allen wrench set
- * Wire crimpers
- * Automotive test light
- * Ruler or tape measure
- * Box and open end wrenches in various sizes
- * Electric Drill

Once you have prepared the work area, and have assembled the needed tolls, you're ready to begin. Remember patience is key to a successful installation. The installation should take about two hours under normal working conditions. Follow the instructions and you'll have power locks before you know it.



1. Begin by first removing the door and window handles. Also pay attention to where the old mechanical lock button is located. There will be a linkage rod attached between the door latch and the button. This rod is where you will attach the "lock rod" supplied with the kit.

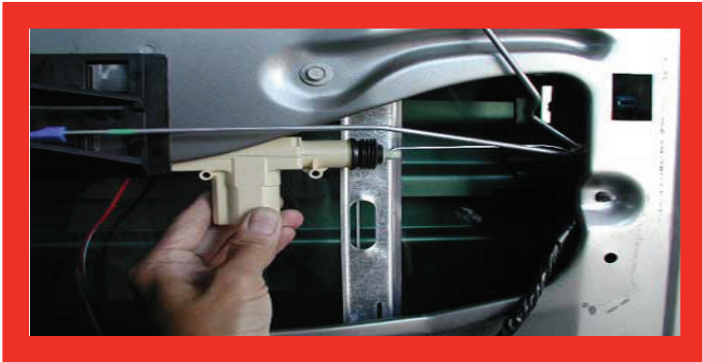
2. If the door is equipped with an arm rest, you will have to remove the armrest prior to removing the door panel. Carefully pry the trim panel from the door using a screw driver. Cover the tip of the screw driver with masking tape to prevent scratching the interior panel.

Power Lock Installation Continued:

Note! When installing a 4 door lock kit, the 5 wire actuators are mounted in the front doors, and the 2 wire actuators are mounted in the rear.

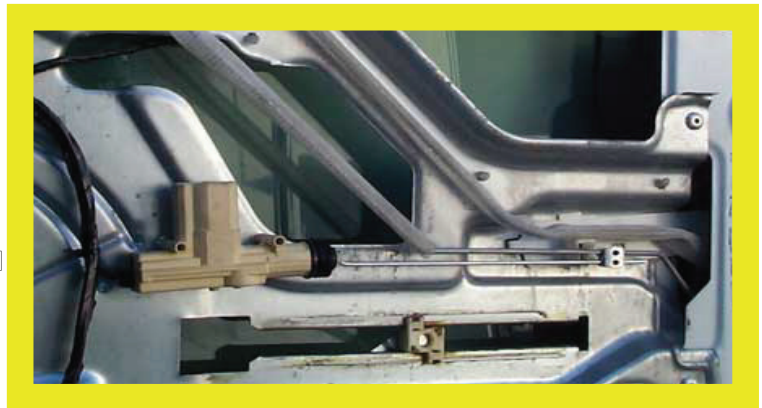
3. After having removed the door panel, remove the plastic barrier attached to the door panel. Do not throw the plastic barrier away. The plastic barrier acts as an insulator and helps to reduce road noise. Now that the door panel is exposed attach the window crank, or the window switch and run the window up and down a few times, stopping at various points in the travel. This should give you a good idea as to where you can safely mount the actuator and keep it from interfering with the operation of the window.
4. Remember to mount the actuator in a position that would allow you to connect to the original door lock linkage rod. Refer to the photos enclosed showing various actuator mounting positions. The photos were provided by A-1 Electric, and are typical of properly mounted door actuators.
5. Once you've determined the approximate location, take a mounting strap and mark off the panel where you will mount the strap. Drill a small hole and use the short self tapping sheet metal screws to attach the strap. Mount the actuator loosely to the strap and attach the lock rod. Now attach the clamp provided in the hardware kit to the lock actuator rod as shown in the actuator photos. Bend the lock rod from the actuator as shown in the photos and attach it loosely to the clamp.
6. Now it is time to set the actuator travel. This is extremely critical to proper operation! Follow the instructions provided in the kit. Once you have synchronized the actuator with the lock mechanism, it is time to tighten down all of the fasteners. After tightening down the fasteners run the window up and down a few more times to make sure that no interference exists.
7. It is time to run the wiring harness. Check to see if the door has a wire pass through that you could use. In most cases there is usually not enough room to use the original pass through, so you will probably have to drill a hole through the door and the post to run the harness. We offer a number of options for connecting the door with the post. Loom pas through come in various shapes and materials ranging from rubber tubing to billet and stainless braided tubing. Check through our catalog and see what would work best for you.
8. After running the harness through the doors and up under the dash, locate a suitable area to mount the control module. Try not to mount the module near heater outlets as hot air blowing on the module could eventually cause the module to fail prematurely. Follow the wiring diagram for connecting the harness to power and ground. At this point your ready to plug in the actuators and try the system. Use the old manual lock button and check to make sure that both locks operate simultaneously. Roll the window down and close the door. Try operating the locks by using the key in the door. Both locks should open and close when the key is turned.
9. If everything seems to be working properly, you now ready to finish the installation. If you are installing our keyless entry system, now is the time to connect the wiring as per the diagram. Mount the Keyless entry module close to the lock module in order to keep the components together. Once you have connected the keyless entry system to the lock module, check the operation of the locks using the remote provided with the kit. If you are using a keyless entry provided from another source, make sure the keyless entry has two negative pulse channels available.
10. Now that you've connected all of the components and everything is good working order, you can close everything up. A good trick to remember is to take all of the instructions and place them in a plastic bag and tape them to the bottom of one of the doors. You never know when you might need to take things apart again! Well you've finished the job, now sit back and enjoy!!!

MES Lock Actuator Installation Guide



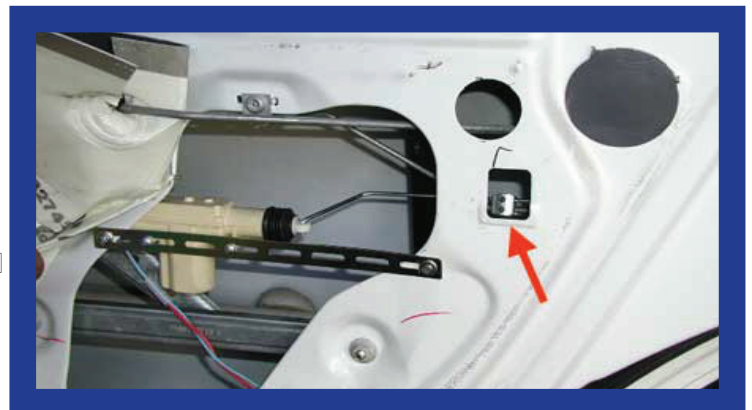
This photo shows placement of the actuator in position prior to fastening. The vehicle in the photo is a 2000 Chevy Silverado. Photos and installation compliments of A-1 Electric. A-1's installer will use the strap that is supplied in the Electric-Life door lock kit to span the hole in the door and permanently fasten the actuator in place.

The photo to the right shows an actuator mounted in a 1999 Chevy Express Van. When mounting actuators care must be taken not to interfere with the window mechanism or any other moving parts. Patience is key! Also check that the actuator does not interfere with reattachment of the door panel. All wiring should be secured, and properly connected

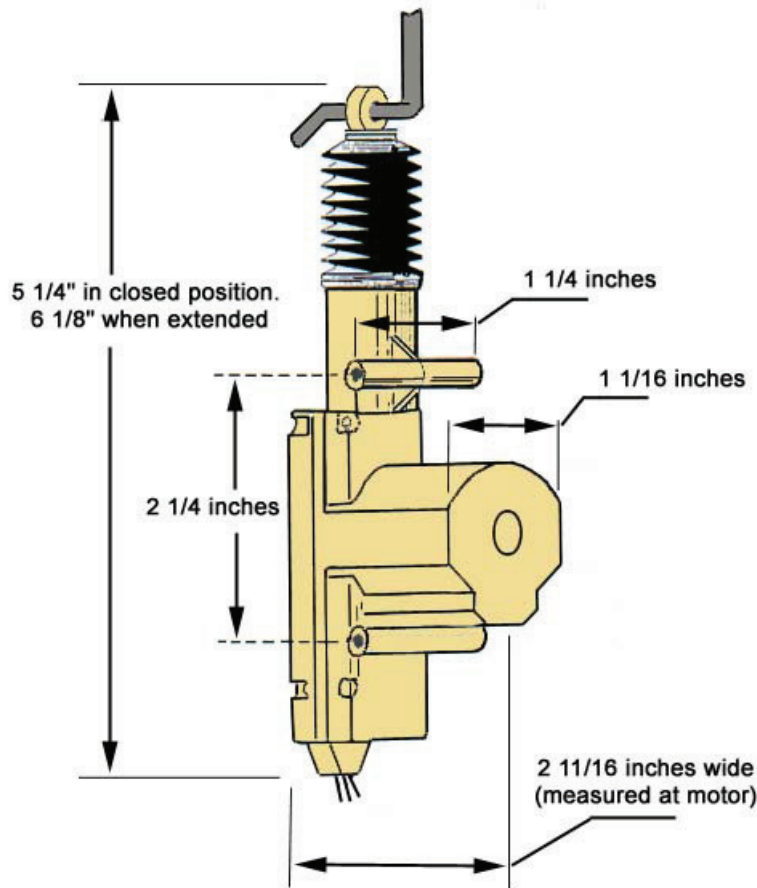


Notice how this actuator is partially fastened to the door and to the strap. You should be clear on the fact that the attachment is not as critical as the placement. Just make sure that the actuator is attached securely, and does not interfere with any other mechanism. Whenever installing an actuator inside the metal panel, extreme care should be taken with regards to window movement.

This actuator is mounted in the door access hole using the strap provided in the door lock kit. Notice! the rod mounting clamp in the square hole with the red arrow pointing towards it. The clamp should be used to attach the rod provided in the kit to the manual door lock rod, which is attached to the lock mechanism.



DOOR LOCK ACTUATOR INSTALLATION INSTRUCTIONS



NOTE! WHEN INSTALLING A DOOR LOCK ACTUATOR, THE PLUNGER HEIGHT MUST BE ADJUSTED TO INSURE PROPER LOCK OPERATION. PISTON TRAVEL FROM A FULLY RETRACTED POSITION TO ITS FULLY EXTENDED POSITION IS $\frac{7}{8}$ ". SET THE PLUNGER AT ONE HALF THE DISTANCE OF THE TOTAL TRAVEL ($\frac{7}{16}$ "). **THIS IS ABSOLUTELY CRITICAL TO PROPER OPERATION!!**

NOW LOCATE THE LEVER THAT THE MANUAL LOCK BUTTON WAS ATTACHED TO, AND MEASURE THE FULL TRAVEL OF THE LEVER. DIVIDE THAT SUM IN HALF AND SET THE LEVER EXACTLY AT THAT POSITION (**A GOOD IDEA IS TO MARK THAT POSITION WITH A MARKER IN CASE THE LEVER MOVES**). AT THIS POINT WITH THE ACTUATOR AND LOCK LEVER POSITONED ON CENTER, ADJUST THE LENGTH OF THE ATTACHING ROD TO FIT BETWEEN THE PLUNGER AND THE LEVER. ATTACH THE ROD TO THE LEVER AND ATTACH THE ROD TO THE ACTUATOR. FINALLY SECURE THE ACTUATOR TO THE MOUNTING BRACKET, AND CONNECT ALL ELECTRICAL LEADS. CYCLE THE ACTUATOR A NUMBER OF TIMES TO INSURE PROPER OPERATION, AND THAT NOTHING BINDS.

ELECTRIC-LIFE DOOR LOCK WIRING DIAGRAM

