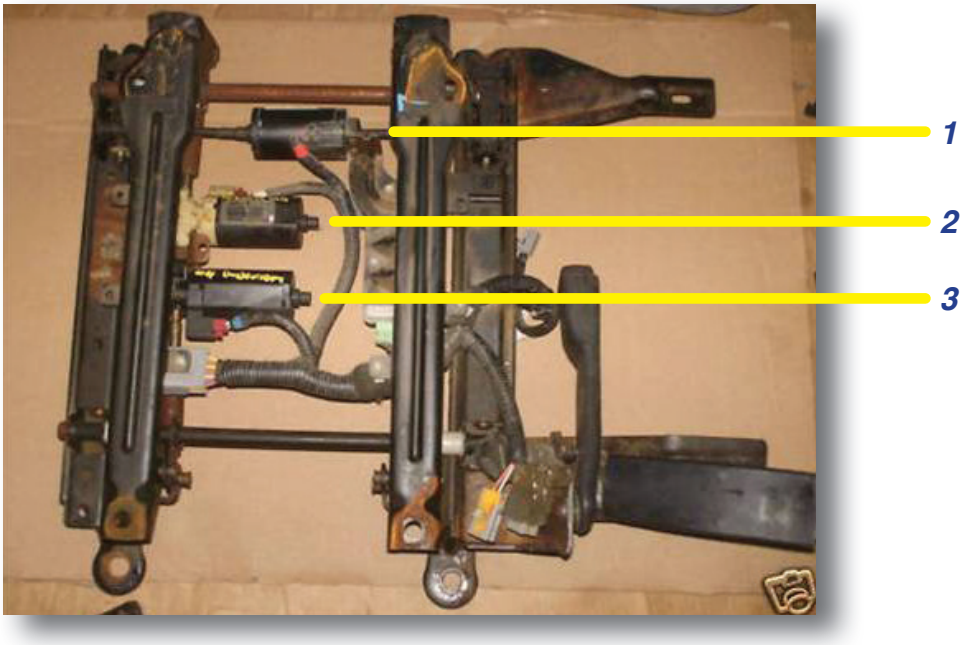
2002 – 2009 RAM TRUCK

Vertical Adjustment Motor Replacement



1. Forward/Backward Motor

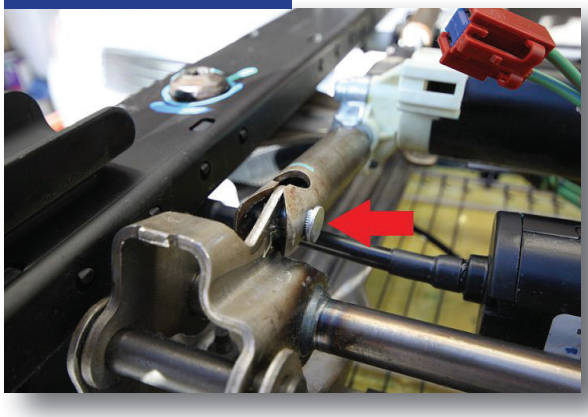
2. Front Vertical Lift Motor has white plastic and metal gear case cover. My replacement (DOD1) does not have white plastic but does have metal gear case cover.

3. Rear Vertical Lift Motor has all black plastic. The shaft is slightly longer than the front vertical lift motor. My replacement (DOD2) looks similar with all black plastic and correct shaft length.

STEP 1

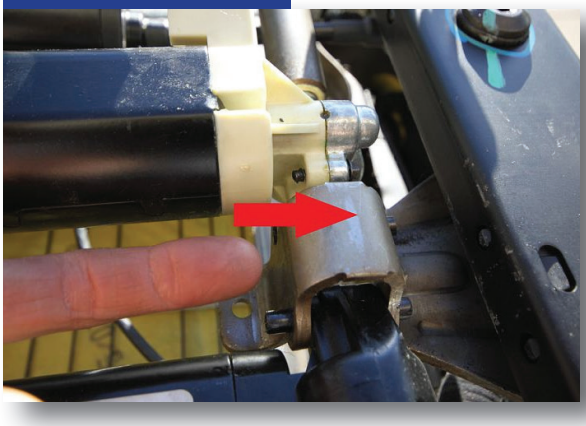
Remove the power seat assembly from the truck.

STEP 2



Remove the knurled ¼" pin – This pin attaches the tube nut to the seat frame lever. One method is to use a pair of Channel locks and a big flat blade screwdriver. Another is a hammer and punch.

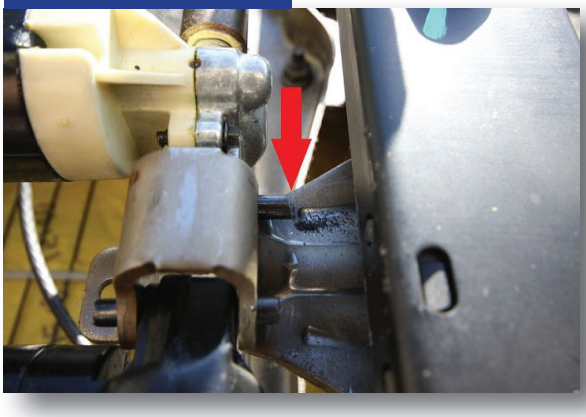
STEP 3



*Remember to read the **whole step** before proceeding!*

The roll pin can be removed towards the center of the seat but is extremely hard to do. One way to do this is by clamping vise grips on the pin and then hammer on the vise grips to move the roll pin. The other option is to drive the roll pin as if installing it. I suggest using a hammer and drive punch to prevent hammer strikes on the motor housing. The roll pin is too long to be completely removed this way, so it will has to be driven far enough in to allow the motor to pull out. If you still can't get enough clearance to remove the motor, some of the pin has to be trimmed off. Use a cut off wheel, dremel tool, or hacksaw to cut 3/16" off the roll pin. The cut will be made between the motor housing and the seat track. The roll pin is reused so don't discard it. The picture in step 4 shows what the pin looks like when trimming.

STEP 4



Shows the roll pin after 3/16" is cut off at the end.

Remove the roll pin – If the roll pin could be driven in far enough for motor removal, pull the roll pin out the opposite direction. If you had to trim it, finish hammering out the roll pin using a drift bar, punch, bolt or whatever will fit inside the hole without getting stuck. The roll pin should fall out.

STEP 5

Remove the motor – This should just pop right out. Do not throw out. The tube nut needs to be removed in the next step.

You are spinning the tube nut towards the cut end. Keep the tube nut and discard the shaft. I have a video of this posted under install instructions on my website at ***www.2men1garage.net****.*

STEP 6

Prepare the tube nut for removal. The tube nut will not unscrew from the threaded shaft. It's prevented from doing so by a bushing held in place with a constant section ring (thick circular piece of wire inside the bushing. The constant section can be removed by prying it out with a screwdriver, but is extremely difficult to do. The easiest way is to cut the shaft off the motor and unscrew the tube nut from the cut off shaft. Cut the shaft right at the motor housing using a cut off wheel or dremel tool. After the shaft is cut off, you need to make a slot in the end of the shaft which will help unscrew the shaft from the tube nut. Using the cut slot, take a screwdriver to turn the shaft out of the tube nut.

Cut the shaft here.

Cut a notch to help unscrew the shaft from the tube nut.

STEP 7

Remove the left hand threaded nut, bushing and washer from the new motor and screw the tube nut onto the shaft. Coat the shaft with white lithium grease. Slide the washer then bushing over the shaft end and thread the nut (left hand thread) onto the tube. If the tube is too narrow to get a socket in, you can slightly spread the ends to get a thin wall ¼" deep drive socket over the nut. Once the nut is tight, you can clamp the ends back to the normal distance.

STEP 8

Install motor – First smooth out the roll pin with your grinder. This will make it easier to hammer in or you could use the other side. Put the motor in place and hammer the roll pin in gently. Use a drive punch along with a hammer to do so. Not using a drive punch could result in damage to the motor housing. Do not use a ¼" bolt, because the motor tends to twist more than normal. The roll pin is slightly oversized, thus a much tighter fit. If the roll pin is too damaged, a ¼" sized roll pin can be bought at a home supply store.

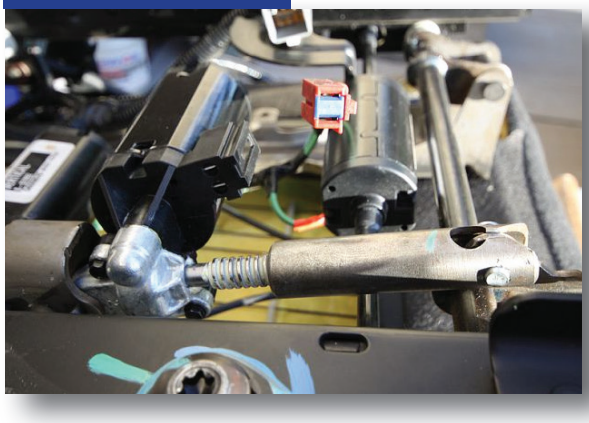
STEP 9

Prepare and attach the tube nut to your seat frame and secure with the ¼ inch knurled pin. Be careful if hammering the knurled pin in place, you don't want to bend the lever on the seat assembly. Use a socket to support the backside of the lever when hammering. Some customers have used channel locks to clamp the pin in place.

STEP 10

Plug in motor – You can use dielectric grease on the connections. Plug the harness connection into the motor. Finished motor installation picture is shown below.

STEP 11



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with any issues.