

Trek Bed Motor Replacement – 2004 Trek
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Hi All,

I've recently replaced the motor on my 2004 Trek bed. I want to send along some info to anyone who wondered what the bed and motor assembly looks like when all the façade is removed and a basic course on how to replace the motor. I have the classic kitchen coach with the bed in the front over the living room.

Tools needed...3/8 inch open end wrench, 3/8 inch socket with at least a 6inch extension, power driver with 6 inch square end screwdriver, 7/8 inch open end wrench and a Phillips 8 inch screwdriver (driver or manual) and a flashlight.

The motor on the 2004 is located on the curbside of the coach attached to the wall near the ceiling. The techs told me that on the 2003, some of the motors are located in the bed itself on the driver side front edge of the bed.

There are four attachment points for the belt system of the bed, two on the curb side and two on the street side. On the street side, the belts merely move over a roller and shaft as the bed moves up and down. The action area for the bed system is located on the curb side which includes the motor assembly and belt take up pulleys. The take up pulleys are used to take up and store the belt when the bed is raised

The pictures illustrate the curb and street side mechanisms. Running the length of the bed on the curb side, at the ceiling and behind a valance, are a motor located in the middle with two shafts running from the motor to the edge of the bed assembly. The shafts are attached by bolts to the motor drive assembly and rest in a bearing assembly at the ends of the wall at the ceiling. The pictures clearly show the assembly.

If possible, lower the bed onto the lowest stops, the replacement will be much easier!

To begin the replacement process as done by the Tech at Wildwood, remove the lights and the electric outlet cover from the top valance. The lights can be unplugged at the opening were they are removed by quick disconnects and placed aside. Unscrew the electrical outlet from the valance. The high shelf by the bed is an ideal place to store all screws during disassembly so they don't get misplaced.

Next, look inside the openings where the lights where removed and you will see at least one screw per opening holding the upper valance in place. The screw(s) can be awkward to remove and this is where you need the square screwdriver extension. Use a flashlight to see the screws. On my coach, there were two screws in two locations...one that actually held the valance and one that missed the metal backing and was abandoned (guess it was a Friday).

After removing all the screws, pull the upper valance towards you parallel to the ground and it should slide off the inner vertical valances and free. Once it is free, you must then disconnect the main light quick disconnect and set the upper valance aside. You will then be able to see the entire motor and belt assembly.

If you must work on the entire bed assembly, repeat the same process for removing the upper valance on the street side.

Next, remove the outer vertical valances on the fore and aft portions of the window. This will expose the belt assembly all the way to where it attaches to the bed. You do not have to remove the inner vertical valances to access any bed assembly. Once the vertical valances are removed you will next remove the plastic belt covers spanning the width of the coach just in front of and aft of the bed at the ceiling. These plastic covers are held in place with three screws and are somewhat fragile...be careful when you remove these pieces. Once those covers are removed, the entire bed raising and lowering assembly is exposed.

To replace the motor you may first have to move the bed up and down slightly to release the tension in the lifting belts. **This can be a tricky maneuver so be careful.** The techs that did my coach scared themselves a little when the bed dropped down one inch onto the bed stop!!! Now you are ready to remove the motor.

First remove the bolts that attach the two shafts to the motor gearbox. Don't attempt to remove the motor from the wall bracket at the wall mounting point. Those six bolts are impossible to reach at this point and there is no reason to remove them. You will be removing the motor from that bracket at the motor gearbox by four easily accessible bolts. Now is the time to remove those four bolts.

At the end of the shafts that span from the motor to the wall are a bracket roller assembly and a bearing assembly. These must both be unbolted to continue the process. Once free, the roller assembly bracket can be slid down the belt and rested on top of the inner valance. **Be careful not to twist the belts.** Once the bearing assembly is free it now gets difficult. A split shaft would have helped immensely, but the engineers didn't go that route so now you have to remove the shaft from the motor using brute force and finesse. The motor will be free to "wiggle" and the shafts will have "some" fore and aft play, but not enough to be removed from the motor gearbox. The techs that did my coach slid the bearing end of the shaft towards the middle of the coach until the shaft had enough clearance to come off the motor gearbox assembly. It was a difficult process with care taken not to bend the shaft or break the motor gearbox assembly. I wish there was an easier way, but they and I didn't see one. I think the roof to the coach was assembled at the factory after the bed assembly was installed, so it's tough to access this area now.

After replacing the motor, just reverse the entire process to put it all back together. Ensure your belts are not twisted and take up the belt slack when you reattach the shafts to the motor.

Now that I have seen how it all works, I feel confident I could do it myself. Not a real difficult process, just time consuming. I would allow 5-6 hours for the entire job, especially if working by you self. Also, my bed would still move up and down by physically lifting it, there was no binding in the side channels.

The attached pictures should provide a good idea of how the system works and how it is put together. I can't say my coach is representative of others, but I think the basic belt operating system is the same in all newer Treks. I hope this will save someone the time and expense of a repair facility trip.

Trek Bed Curb side Overview



Trek Bed Curbside Motor Close up



Trek Bed Curb side



Trek Bed Curb side Reinstall Motor & Shaft



Trek Bed Curb side Front Roller



Trek Bed Curb side Rear Roller



Trek Bed Driver side Overview

