



## Wren Suspension Fork Damper Replacement Instructions

There are videos on <https://wrensports.com/tech-resources> that show how to service the Wren fork including damper replacement.

1. The damper is contained inside the right leg of the fork with the blue lockout lever on top. Lock the fork using the blue lockout lever. Remember this position for the lever so you can reassemble it later.
2. For safety, release all air from the air spring (left leg). Remove the QR axle.
3. Using a 2 mm allen wrench, remove the bolt from the center of the blue lockout lever on top of the fork. There is a very small ball under the lever and under the ball is a very small spring. **Carefully** lift the lockout lever off the fork watching that you do not lose the ball. The spring may stay in the detent, but you should remove it as you will be turning the fork upside down next. A small allen wrench will pick the spring out.
4. Turn the fork upside down. At the bottom of the same leg, locate the red rebound knob. **Turn the knob to the middle of its range until you can see a small hole on the side.** Do not force the knob beyond its stops. **Do not remove the knob if in the fully open or closed position.** Insert a 1.5 mm allen wrench into the hole and unscrew the bolt until the knob slides off the shaft. It is not necessary to take the bolt completely out.
5. Using a 9 mm socket, remove the rebound fitting from the dropout. This fitting also contains the adjustment shaft. Be sure not to lose the rubber O-ring and washer. The O-ring may stay in the bottom of the dropout. Remove it if it does and place on the rebound fitting up against the washer.
6. Turn the fork back upright and locate the 27 mm silver nut on top of the upper leg (this is actually the top of the damper). This nut is very low profile and care needs to be taken that the wrench or socket is firmly engaged. Loosen and completely unscrew the nut. Remove the damper from the upper leg. Do not remove the red cap under the damper.
7. Now you are ready to insert the **new** damper. First, you must slowly pull the lower rod of the damper out so that it will reach the bottom of the stanchion when installed. If the damper is locked, you must unlock it by using the blue lockout lever or a 5 mm wrench on the fitting on top of the damper and turning counter-clockwise. Now slowly pull the rod out until it stops.
8. Insert the new damper into the upper leg and slowly push down until the threads engage in the top of the upper leg. Hand tighten the damper. Now loosen the 3 - 1.5 mm allen bolts in the top cap of the damper. Use a pin wrench to slightly loosen the cap. Place the blue lockout lever back on the damper and set the lockout by turning the lever **clockwise a full 360° and continue past 360° to the lockout position you want. The factory setting is 6 o'clock. Remove the lever and tighten the cap. Now tighten the 3 - 1.5mm allen bolts in the cap. This will fix the lockout position.** Keep the damper locked throughout this process. Now tighten the 27 mm silver nut to 12.5 Nm with a torque wrench.
9. Turn the fork back upside down and reassemble the rebound fitting. First, look into the hole on the bottom of the drop out and ensure the shaft of the damper is centered in the hole. There is a slight depression on the inside of the dropout that the shaft sits in. By inserting an allen wrench through the hole into the shaft, you can gently move the shaft to center it while gently pushing in on the dropout. The shaft should sit in the depression and stay centered. Now thread the rebound fitting into the shaft. Tighten the 9 mm nut to 5 Nm with a torque wrench.

10. Now you must lineup the dimple on the shaft, the hole in the collar and the allen bolt in the red rebound knob so that the allen bolt tightens through the hole in the collar and into the dimple on the shaft. Look through the hole in the collar to locate the dimple on the shaft. If you don't see the dimple, slowly turn the shaft only, while looking for the dimple to appear. A small amount of the shaft extends beyond the fitting to allow you to turn it. Once everything is lined up, slide the rebound knob onto the fitting and use a 1.5 mm allen wrench to tighten snugly. The allen bolt should thread well into the knob. If the bolt tightens almost immediately, you have tightened on the collar, not into the dimple. It is **important** that you take the time to do this step correctly. Do not over tighten, just a snug fit. If too tight, the shaft will not turn properly. When tightened correctly, the red rebound knob will turn smoothly. If the knob is hard to turn, back off the allen bolt **slightly**. The allen bolt has loctite applied to it. Over time this could wear off and new loctite should be applied.
11. Now turn the fork back upright and reassemble the blue lockout lever from step 3. Notice that there are 6 small holes on top of the damper. Three have small allen bolts visible and 3 are open. **Lightly** grease the spring and insert into one of the open holes. **Lightly** grease the ball and place the ball on top of the spring.
12. Next, place the blue lockout lever on top of the damper in the lockout position you set in step 8. Insert the allen bolt and tighten snugly with a 2 mm allen wrench. Do not over tighten. Reapply loctite to this bolt, if necessary.
13. Damper replacement is complete. Remember to refill the air spring and reset your sag before riding.

