

# PERRIN

## PERFORMANCE

### 2008+ Rear Diff Lockdown System

Thank you for purchasing the Perrin Rear Diff lockdown System. Persons experienced in the installation and proper operation of suspension systems should only perform installation of these parts. Please read through all the instructions before performing the installation.

#### **SPECIAL NOTES:**

- When installing Diff lockout bushings, keep in mind you are pressing them in by tighten the bolt and nut securing them to chassis. This needs to be done in 2 steps do to limitation on length of bolt used to press it in.

#### **Parts Included with the PERRIN Differential Lock Down:**

- (2) 2008 WRX Differential Lockout Bushings
- (4) 2008 Differential Support Lockdown Bushings
- (2) M12 Jam Nuts

#### **Installing Rear Differential Lockout Bushings**

1. Park car on level surface. Using a suitable commercial hoist or jack, raise car and support on jack stands.
2. We highly recommend removing rear muffler section of exhaust to add extra room for installing bushings. **NOTE: Some swaybars may have to be removed in order to gain access to bushings and bolts.**
3. Locate rear differential bushings pressed into rear subframe. Remove one of two 17mm nuts securing differential to bushings pressed into subframe. **NOTE: If stud comes out with nut this is ok.**
4. Remove stud from diff cover using (2) supplied Jam nuts by locking them together and unscrewing. **NOTE: A stud removal tool will also work.**

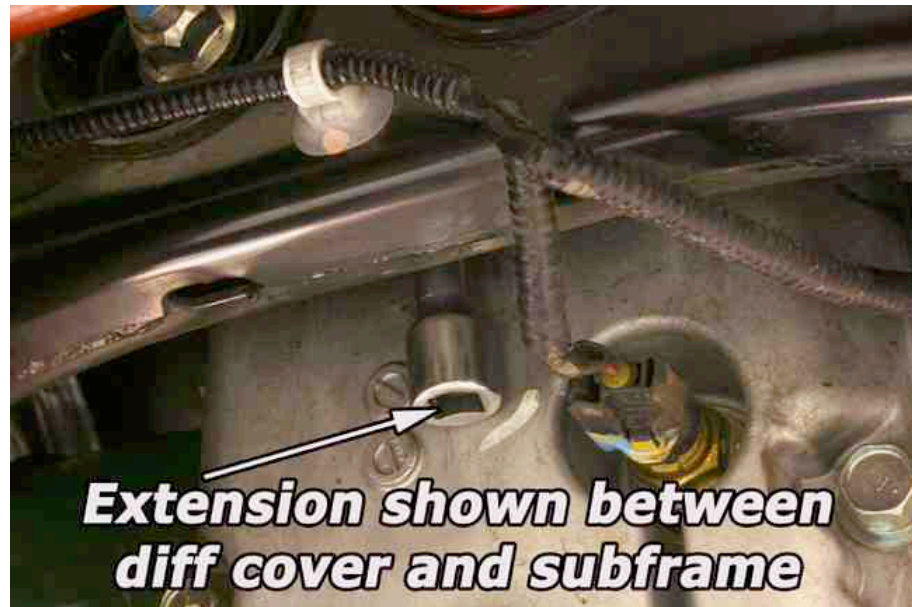


Shows nut removed, and jam nuts installed ready to remove stud from diff cover.

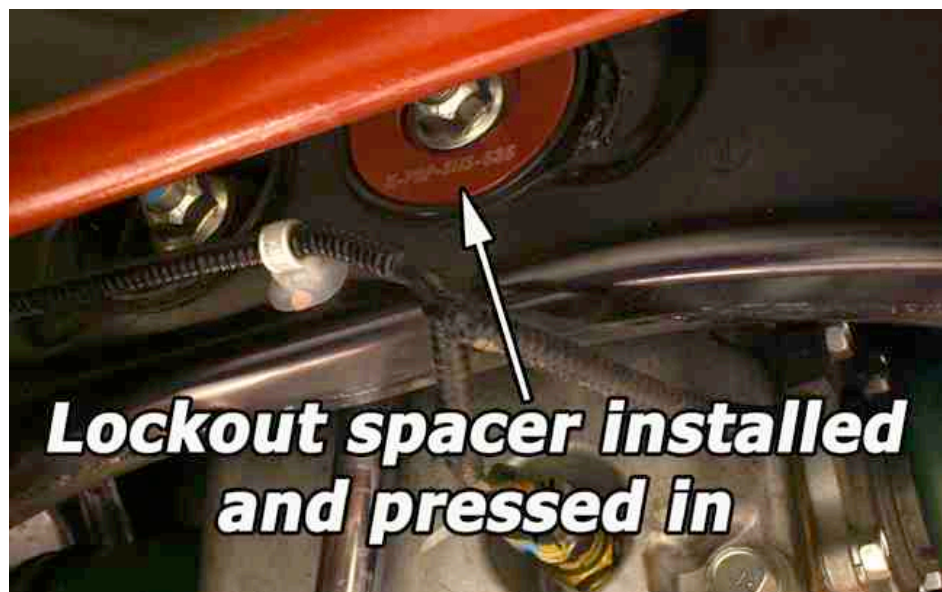
5. Remove jam nuts and reinstall OEM nut onto stud roughly 5 turns.
6. Lubricate outside of PERRIN Diff lockout with antisieze or grease.
7. Because you are using the stud and nut to press bushing into subframe the tightening of nut needs to be done done in 2 stages.
8. Align PERRIN Differential lockout bushing with PERRIN logo facing toward back of car. Lightly tap bushing into place using hammer. This is not necessary but helps keep bushing in place while doing next step.
9. With bushing held in place, thread nut and stud into diff cover roughly 5 turns.



10. Continue threading nut/stud into diff cover until differential is pulled up to subframe. You will feel the increase in tension on nut when this happens. Continue threading nut until roughly 70-ft-lbs of torque is felt on nut. **NOTE: Because you are pressing Lockout bushing into subframe using bolts, some popping may occur. When step is complete, PERRIN Lockout bushing will be sticking out from subframe .125" to .25".**
11. Remove stud and nut from differential cover. Remove nut from stud, and thread nut onto stud roughly 5 turns. Reinstall stud into diff cover as far as you can by hand.
12. Place long 3/8" extension between differential and subframe. **NOTE: This is used to keep OEM differential bushing from compressing during last step.**



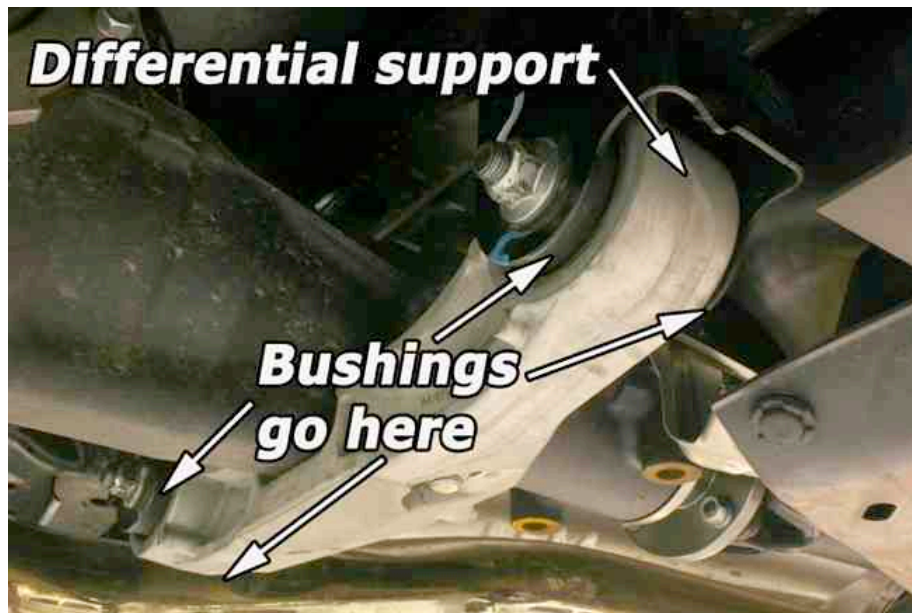
13. Tighten nut/stud into diff cover while holding 3/8" extension in place. Tighten nut to 50ft-lbs. When step is completed, PERRIN lockout bushing will be flush or slightly concave with subframe.
14. Loosen nut enough to remove 3/8" extension, and retighten nut to 50ft-lbs.
15. Follow these same steps on remaining Differential bushing.



Shows spacer completely pressed in, ready to do the same steps on remaining side.

### **Installing differential front support bushings**

16. Using high quality jack, slightly support differential.
17. Remove aluminum differential support from sub frame and differential. (2) 14mm nuts hold support to differential, and (2) 17mm through bolts and nuts hold differential support to subframe.
18. Install red urethane bushings next to OEM rubber bushings, around center mounting points. Make sure to do this to both left and right OEM bushings. **NOTE: 2 bushings install on each side of bushing.**



Shows diff support and where bushings go.

19. Reinstall differential support brace into subframe making sure red bushings stay in place.
20. Install nuts securing differential support to differential and tighten nuts to 40-ft-lbs.
21. Install bolts through subframe and differential support. Then install nuts and tighten to 40 ft-lbs.**NOTE: Wiggling diff around and jacking up diff will aid in getting bolts to pass through subframe and diff support.**
22. Remove jack supporting differential, and lower car from jackstands.
23. Take car for test drive and listen for noises. There will be some additional drivetrain noise, this is completely normal. If clunks are heard, check that all bolts are tight and take for another test drive.

**PERRIN Performance Highly Recommends These Complimentary Products:**

- PERRIN PSRS system
- PERRIN front and rear swaybars 22mm and 25mm