

(2016-2019)-Polaris 900 Trail w Fox 2.0" Dual Rate Spring Kit Installation

Parts included	
Front Upper Coil	2
Front Lower Coil	2
Rear Upper Coil	2
Rear Lower Coil	2
Spring Dividers	4
Billet Adapters	4
Plastic Adapters	4
Silent Crossovers 2.0"	4



Picture may vary from kit ordered

Step 1: Layout and Organize products in an area of your choosing,
Step 2: Removing the shocks from the machine

- I. First jack the unit up to where the tires about 1" off of the ground. (Placing jack stands underneath the unit is always a good idea)
- II. Second, remove the stock lower shock hardware from the unit.
TIP: Placing your feet underneath the tire, then lifting up & down will help the stock lower bolt slide out.
- III. Remove the stock upper shock hardware, then remove the shock from the machine. Continue to repeat these steps for the remaining 3 shocks.

*****THE SHOCKS ARE SIDE SPECIFIC, IF THEY ARE INSTALLED WRONG IT WILL CAUSE DAMAGE TO THE SHOCK*****

Step 3: Disassembly of the shocks

- I. Place the shock in a vice upside down.
- II. After the shock is tightened down in the vice it's time to remove the stock springs. You do this by moving the rubber bump stop down the shaft, then compress the spring and remove the spring retainer. (As seen in figure 1)



*****Tip: Be careful to not scratch the shaft when moving the bump stop down the shaft*****

Step 4: Setting preload & crossover starting points

- Now that the shocks springs are removed from the shocks and set in the vice, you will need to set the pre-load and the crossover rings to the **STARTING POINTS** provided below. You will need but then of your tape measure up to where the shock cap and shock body meet. (As seen in figure 2)

These are starting points, your end numbers will differ

Make & Model	Front Pre load	Front Crossover	Rear Preload	Rear Crossover	Front Ride height	Rear ride height
(16'-20') Polaris 900 Trail w Fox	1 ½"	5 ¼"	2"	5 ¼"	12 ½"	12"

Figure 2



Step 5: Spring installation

- With the shock still in the vice, it is time to put the Shock Therapy spring on the shock. You will need to place the springs in the correct order on the shocks. The kit should go on as listed; Plastic spring adapter (against preload collar) upper spring, spring divider, lower spring, billet adapter, stock spring retainer. Also, you will need to clock the spring ends to sit 180 degrees from each other on the spring divider (Spring dividers will have arrows).

Note: Having to compress the spring kit 3"-5" is normal



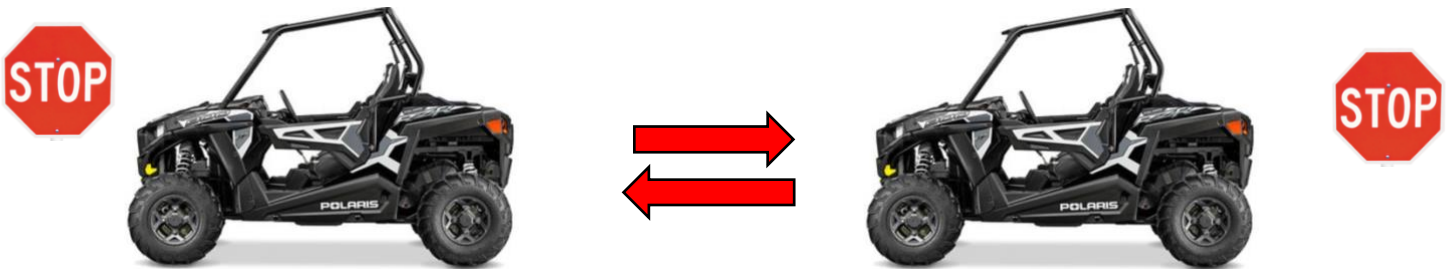
Springs sitting on arrows



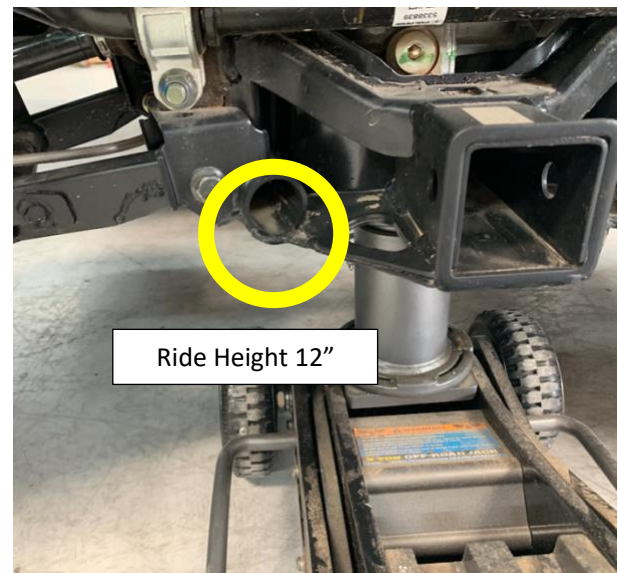
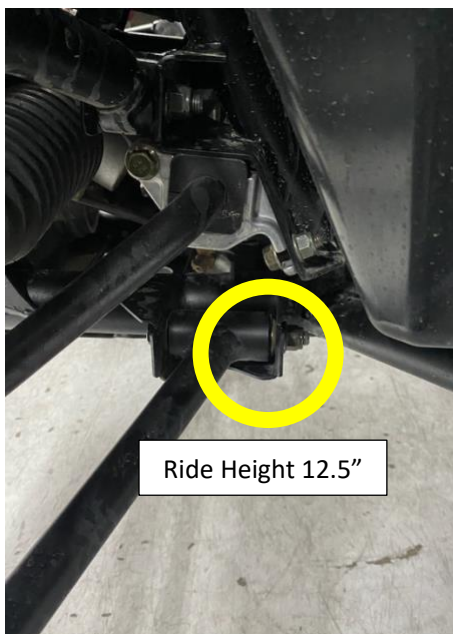
Step 6: Shock installation & Ride heights

- I. At this point all of the Shock Therapy spring should be installed on the shocks, then the shocks should be ready to go on the machine. When installing the shocks back on the machine you will need to use the stock hardware.
- II. Once the shocks are installed, the suspension will need to be settled and ride heights checked. **This will need to be set with the driver and passengers in the machine, you will need to match the weights noted in your order.** To settle the suspension, the unit will need to be driven back and forth while then stopping. After you have you done this the drivers and passengers will stay in the machine while a someone measures for you.

*****Note: Pushing up and down on the unit will not settle the suspension the way it is needed & measuring without weight in the machine will result in an in accurate ride height*****



- III. In the front you will measure on the driver side lower control arm, the tab farthest back closest to the fire wall. For the rear you measure on the driver side next to the hitch. (As seen in the figures below)



*****You will most likely have to make a PRELOAD adjustment to reach proper ride heights*****

Step 7: Ride height adjustments

- I. Now that you have measured the ride height for the first time you may need to make an adjustment to the preload collars to change the ride height. If you need to lower the machine you will have release the **PRELOAD** collar **UP** the shock body. If you need to gain ride height you will have to tighten the **PRELOAD** collar **DOWN** the shock body.

In the front for every 1" the PRELOAD collar is moved up or down the shock body ride heights will change 2"

In the rear for every 1" the PRELOAD collar is moved up or down the shock body ride heights will change 1"

- II. You will need to make adjustments to the pre load until the appropriate ride height is met.

Step 8: Crossover Placement

- I. After the ride heights are set, the billet crossover that have been provided, will need to set. These are set with driver and passengers in the machine. In the front you will need to make sure you have a 1" gap between crossover and back spring divider with passengers in the machine. In the rear you will need to make sure there is a 2" gap between the crossover and the spring divider with passengers in the machine.

*****You will most likely have to adjust the crossovers*****

Step 9: Locking it down

- I. Now that you have the ride heights set and the crossovers are in the correct location you are able to lock down all the shocks back on to the machine by torquing the stock hardware to the factory specs noted in your units manual.

Common adjustments:

PRELOAD and CROSSOVER measurements are just general starting points.

After the first 500 miles you unit will take its only settle (Loose ride height) . You will need to follow steps 6-9 to reset the ride heights.

Spring Clocking, if you are springs are sitting 180 degrees from each other on the divider then you will need to clock them about 90 degrees, and continue to do so until the spring are sitting level. 180 degrees is only a starting point.

For all other question please refer to our FAQ, Email sales@shocktherapyst.com, or call 623-217-4959.
