



TORSION SPRING INSTALL IN TEAM SECONDARY CLUTCH

1. Remove the side panel and remove (2) T40 Bolts
2. Remove the snowmobile drive belt.
3. Remove the secondary clutch with a 15mm socket.
4. HEAT helix bolts and remove the (4) T27 bolts, remove helix from secondary.
5. Compress secondary spider with clutch compression tool and remove retaining ring with snap ring pliers. Remove spring/ spider and tool. Remove roller bearing if you have one. Remove delrins if you have them. Leave the spring cup in the bottom.
6. Attach rollers to tri-roller spider for secondary with washer and e-clip (flat side of roller out towards washer, contoured side goes inward)
7. Set the spider in clutch



8. Put helix with dot towards X on clutch, screw one screw in holding helix



9. Put the helix in zero position/starting position on angle. Sheave with helix and turn it clockwise.
10. Mark the clutch on the side so you know where the starting position is. Align them with the X's and dots.



11. Undo helix out of secondary.

12. Line up your two marks on the clutch sheaves

13. Make a mark on your clutch that you will be drilling, this is to be lined up with your number one hole in the spider. (see picture below)



14. Make sure to separate your clutch halves and prepare to drill on a drilling surface. Take tri roller spider out. Line up your mark with the spring cup and drill a $\frac{1}{4}$ " hole.



15. Assemble by putting your spring cup down. If using a lightweight spring cup drill a $\frac{1}{4}$ hole in it.
16. Put spring through the cup and clutch.
17. Put your torsion spring in hole position 2 see below picture. Align the notches of spider with the key slot when compressing.



18. Compress spring with compressor. Don't forget the circlip for spider when compressing.

19. Attach the circlip and make sure seated properly.

20. At this point when in hole number 2 on spider your marks should look like this if they do not, there is something wrong.



21. Put helix in with dot should be lined up with X when lining up the the bolts for helix. It will have torsion on it so rotate clutch while putting in a helix bolt to hold it
22. Install helix bolts
23. When completed the lines on the side of the clutch should be very close if not dead on.



24. Put secondary on the snowmobile and reinstall plastic parts/ belt and torque secondary bolt.

25. Go put a smile on your face by riding your snowmobile.

The spider is an adjustment tool, it can have different torsion on it with the different holes. Number one being the least and number 4 the greatest. We recommend hole number 2. If you are having difficulty or need adjustment help please contact us at 208-853-5550 or shoot us an email at parts@carlscycle.com

