

PROFESSIONAL SERIES

Date: December 02, 2022

Subject: 30mm Front Yoke Replacement Service Kit

Part Numbers Affected: 680-00536 Front Yoke Assembly
680-00536-4021 Front Yoke Assembly

PRO Z S 500 Model Affected: PRO Z 500 KW 554-S (53TIHJUN050).
PRO Z 500 KW 560-S (53TIHJUV050).

PRO Z S 700 Model Affected: PRO Z 700 KW 760-S (53TIHKUV050).

PRO Z 900 Models Affected: PRO Z 900 KW 960-S (53TIHMUV050).
PRO Z 900 EFI 960-S Sure Path (53RIHMAV050).
PRO Z 900 KW 972-S (53FIHMUY050).
PRO Z 900 KW 972-S Sure Path (53RIHMAY050).
PRO Z 900 KW 972-SD Dually (53TIHMUY050).

Serial Number Range Affected: Above Listed Models Built November 01, 2017 to October 19, 2022.
1K017Hxxxxx through 1J19NH70019

PURPOSE:

We have made an improvement for the Front Yoke Assembly used on the above listed Affected Models Manufactured from November 01, 2017 through October 19, 2022. This improved Front Yoke Assembly consist of a larger spindle shaft of 30mm from the previous 25mm spindle shaft on the **680-00536**.

This Service Kit will provide the instructions and parts for replacing a Front Yoke Assembly with a larger 30mm spindle shaft. **NOTE: Kit services one (1) side only.**

NOTE: These materials are prepared for use by trained technicians who are experienced in the service and repair of equipment of the kind described in this publication, and are not intended for use by untrained or inexperienced individuals. Such individuals should seek the assistance of an authorized service technician or dealer.

NOTE: Always wear eye protection while servicing equipment. Wear hearing protection when appropriate. Always work in a well ventilated area and follow all safety precautions when dealing with combustible materials.

NOTE: Left (LH) and Right (RH) sides are determined from the operator's position and facing in the forward direction.

759-05919 Service Kit Contents

ITEM NO.	PART NUMBER	QTY	DESCRIPTION
1	680-01434A-4021	1	30mm YOKE ASSEMBLY
2	712-04338A	2	3/4-16 HEXFLNG NUT
3	736-05033A	1	WAVE WASHER
4	741-05950	1	LOWER BRG.
5	741-0941A	1	UPPER BRG.

Instruction sheet included with kit.

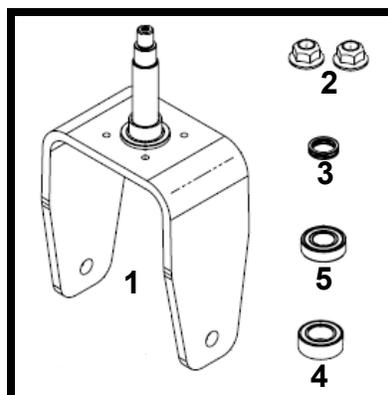


FIGURE 1

Disassembly Instructions:

1. Park the Rider on a flat level surface. Engage parking brake.
2. Disconnect the negative battery cable from the negative battery terminal.
3. Raise the front of the rider high enough to remove the yoke assemblies from the axle.
4. Place jack stands under the front axle to support the rider.

NOTE: Repair one side at a time.

5. Remove the 3/4-16 hex flange lock nut from the 3/4-16 x 9.0" hex bolt that secures the front caster wheel to the front yoke assembly. See Figure 2.



FIGURE 2

NOTE: The 972-SD Dually model will have wheel weights on the front caster wheel. Be-careful when removing the caster wheel.

6. Remove the 3/4-16 x 9.0" hex bolt from the front yoke assembly and caster wheel. Set the hex bolt and caster wheel off to the side. Discard the 3/4-16 hex flange lock nut.
7. Remove the shoulder screw and flat washer securing the axle cap as shown in Figure 3. Retain all Hardware and axle cap.

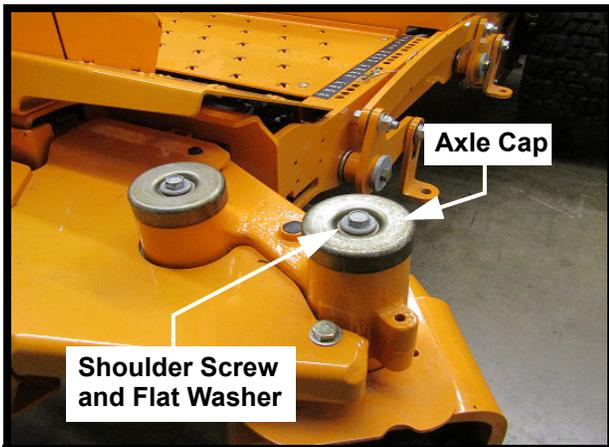


FIGURE 3

8. Remove the two (2) 5/16-18 hex flange center lock nuts from the 5/16-18 x 2.25" hex head cap screws that secure the gear cover, upper gear spacer plate, yoke steering gear, lower gear spacer plate and the wheel deflector bracket to the yoke assembly. See Figure 4.



FIGURE 4

9. Remove the wheel deflector bracket and set off to the side with the two (2) 5/16-18 hex flange center lock nuts.
10. Use a paint pen to mark the orientation of the steering gears teeth. Paint two teeth on the inner steering gear and the single tooth of the outer gear between the two inner gear teeth.

NOTE: Take pictures of orientation of the parts as they are removed for reassembly purposes.

11. Retain the yoke assembly from turning using a pry bar through the yoke while loosening the 3/4-16 top lock flange nut for removal.
12. Support the yoke assembly while removing the 3/4-16 top lock flange nut. See Figure 5. Discard the nut and wave washer located between the nut and top bearing.

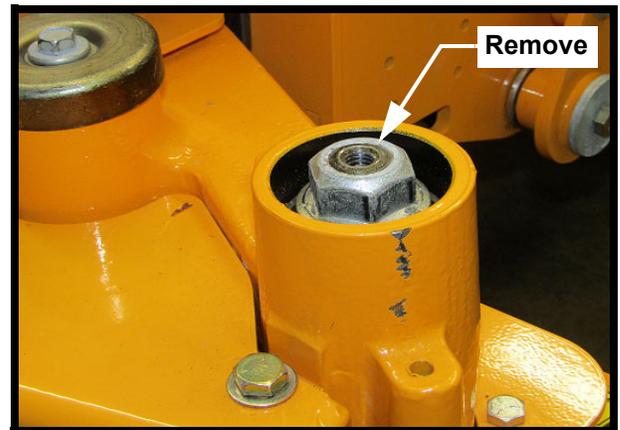


FIGURE 5

13. Lower the yoke assembly down and out of the axle assembly along with the Upper Gear Spacer Plate, Yoke Steering Gear, Lower Gear Spacer Plate.

14. Discard the yoke assembly and retain all other parts.

15. Remove the bottom bearing using a 5/16 Drift pin punch as shown in Figure 6.

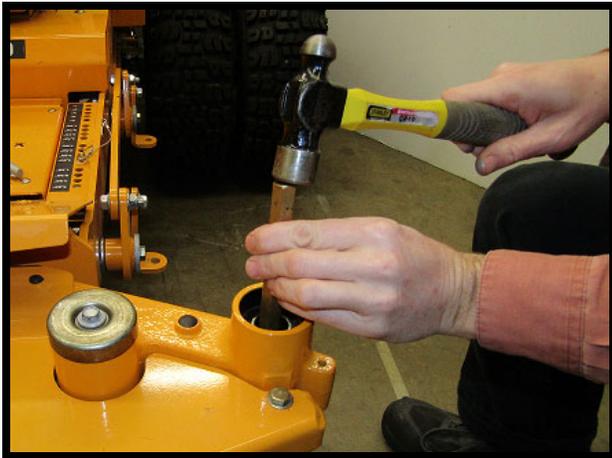


FIGURE 6

16. Remove the upper bearing in the same way as in Step 15, if needed.

Assembly Instructions:

17. Locate Item #4 (**741-05950**) Lower Bearing. Identify the bearing as being the correct bearing by installing it over the spindle shaft of Item #1 (**680-01434A-4021**). If the bearing fits all the way down to the step of the yoke spindle shaft as shown in Figure 7, you have chosen the correct bearing.

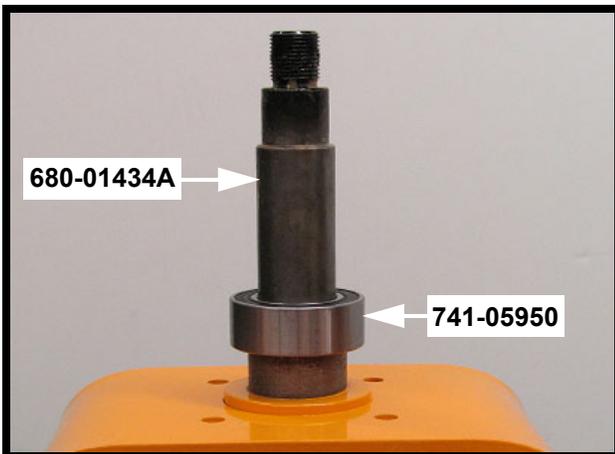


FIGURE 7

18. Install the Lower Bearing as shown in Figure 8 into the axle assembly. The use of a bearing installer may be needed.

19. Locate Item #5 (**741-0941A**) Upper Bearing. Install the Upper Bearing into the axle assembly as shown in Figure 9.



FIGURE 8



FIGURE 9

20. Gather the seven (7) items removed from the yoke assembly in Steps 8 through 13 and assemble three (3) of them onto the new Item #1 (**680-01434A**) 30mm Yoke Assembly. Refer to the order of items to be installed in Figure 10 and 11.

NOTE: For the complete order of parts assembled on the 30mm Yoke See Figure 11 on Page 4.

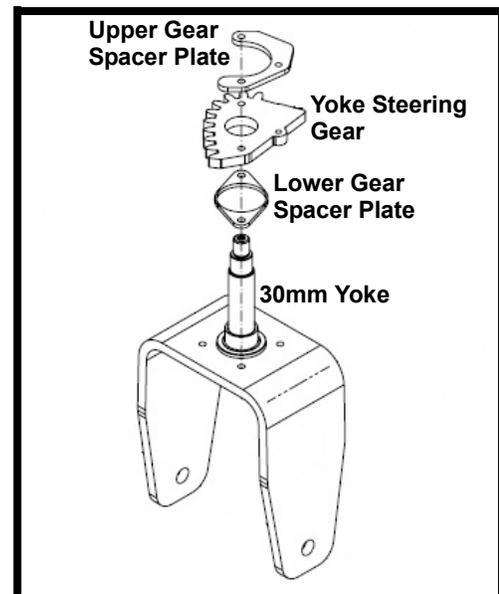


FIGURE 10

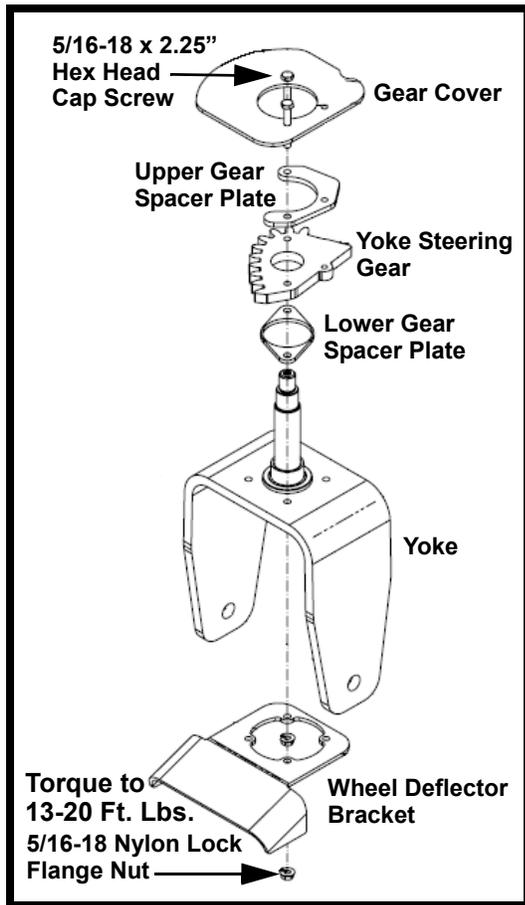


FIGURE 11

21. Install the 5/16-18 x 2.25" hex head cap screws from the top through the Gear Cover and place the Gear Cover with cap screws over the inner steering gear to hang in place as shown in Figure 12.

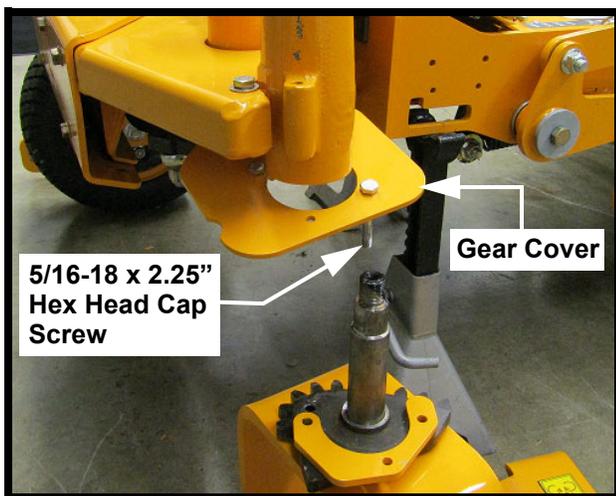


FIGURE 12

22. Install 30mm Yoke Assembly with the three (3) parts up through the lower bearing, axle assembly and out through the upper bearing while aligning the two (2) cap screws through the three (3) parts and 30mm Yoke until coming in contact with the inner steering gear.

23. Align the orientation marks made in Step 10 to align the steering gears as shown in Figure 13.



FIGURE 13

24. Locate Item #3 (736-05033A) Wave Washer and one (1) of Item # 2 (712-04338A) 3/4-16 Hex Flange Top Lock Nut.

25. Continue installing the 30mm Yoke Assembly until fully seated against the bottom bearing.

26. Place Item #3, Wave Washer over the spindle of the 30mm Yoke Assembly, then install Item #2, 3/4-16 Hex Flange Top Lock Nut on to the spindle and tread on till hand tight.

27. Use a pry bar to hold the Yoke Assembly while torquing the 3/4-16 Hex Flange Top Lock Nut to 75-90 Ft. Lbs. See Figure 14.

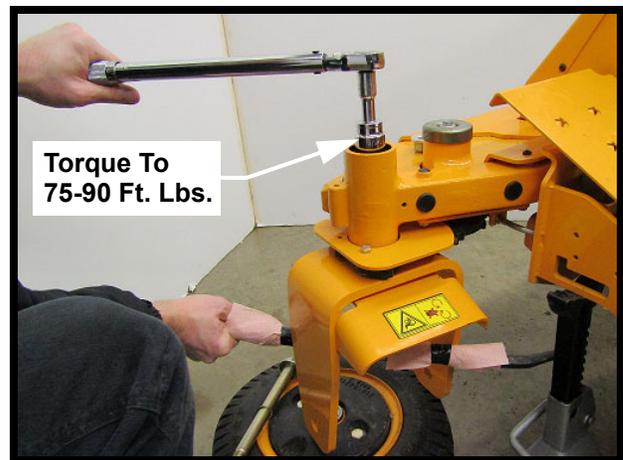


FIGURE 14

28. Install the wheel deflector bracket and secure with the two (2) 5/16-18 hex flange center lock nuts removed in Step 9.

29. Torque the two (2) 5/16-18 Nylon Lock Flange Nuts to 13-20 Ft. Lbs.

30. Install the axle cap, flat washer and secure with the 3/8-16 shoulder screw removed and retained in Step 7. See Figure 15. Torque the 3/8-16 shoulder screw to 21-32 Ft. Lbs.

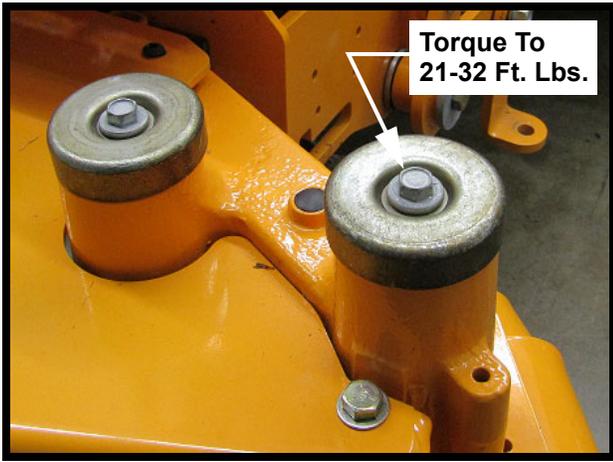


FIGURE 15

31. Install the caster wheel into the 30mm Yoke Assembly and secure in place with the 3/4-16 x 9.0" hex bolt through the front yoke assembly and caster wheel.

32. Secure the 3/4-16 x 9.0" hex bolt with Item #2 (712-04338A) 3/4-16 Hex Flange Top Lock Nut.

33. Torque the 3/4-16 Hex Flange Top Lock Nut to 75-90 Ft. Lbs.

NOTE: If this is the first 30mm Yoke Assembly being replaced, leave the rider in the supported position with jack stands to complete the replacement of the opposite yoke assembly. If not, proceed to Step 32.

34. Raise the front of the rider to remove the supporting jack stands. Lower the rider to the ground

35. Connect the negative battery cable to the negative battery terminal.

36. Perform the timing procedures using Service Kit **759-05122**.

37. Start the rider and confirm that all safety features are functioning properly.

THIS AREA LEFT INTENTIONALLY BLANK