Release Date: 04/27/2020
Revision Number: 01
Revision Date:01/07/2021

Brake Rotor Adjustment Procedure

Document Number	Model	Serial Number Range	Part Number
12-80027	520Y / 520M	All Units	N/A

⚠ WARNING

Before making repairs or adjustments set the parking brake, turn off engine, and remove ignition key.

Always disconnect the negative battery cable from the battery when working with electrical components. Always work in a manner that does not put safety at risk!

⚠ WARNING

Safety glasses must be worn during installation. Ear (hearing) protection must be worn when using air or power tools.

Installation Notes: *Right and left hand orientation referred to in these instructions is determined as if facing forward from the operator station.*

Installation Time (estimated) *1 hour*

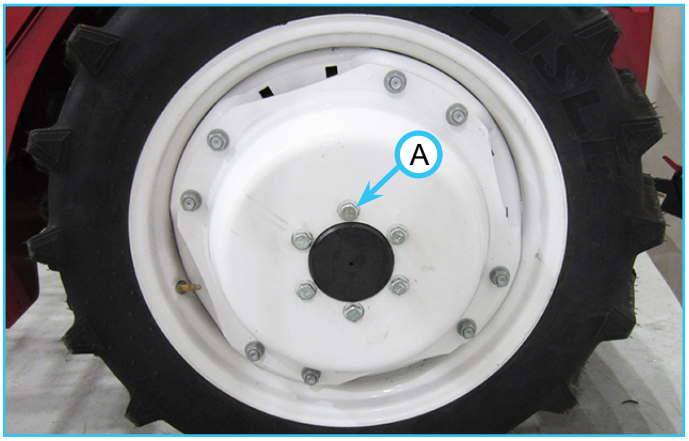
Tools Required: 3/8” wrench, 3/8” socket, 9/16” wrench, 9/16” socket, 1/2” wrench, 1/2” socket, 13/16” wrench, 13/16” socket, Ratchet, Torque Wrench, Jack, Jack stands

1. Park the tractor on a level surface.
2. Engage the parking brake and shut off the engine.
3. Remove the key from the ignition switch.

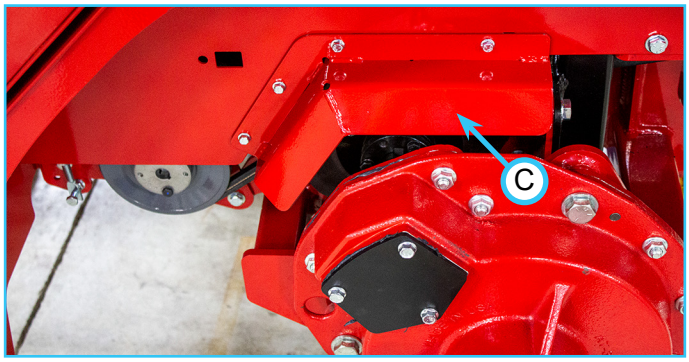
⚠ WARNING

Ensure that the tractor is securely supported when the wheels are lifted off of the ground. Failure to secure the tractor properly can result in personal injury or death.

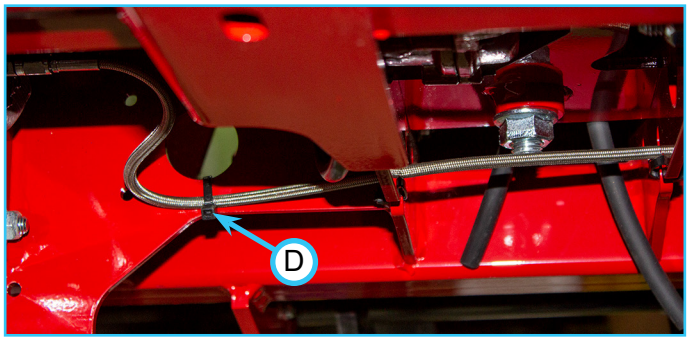
4. Using a jack and jack stands lift the rear of the tractor, raising the rear wheel approximately 2 inches off of the ground.
5. Remove the rear wheel by removing the six 9/16” wheel stud bolts (A).



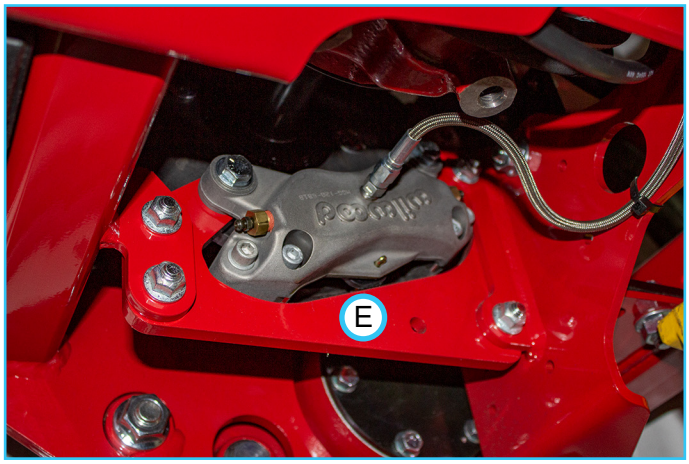
6. Remove the wheel from the hub.
7. Remove the rotor cover (C) from the inner fender by removing the four 1/4” bolts.



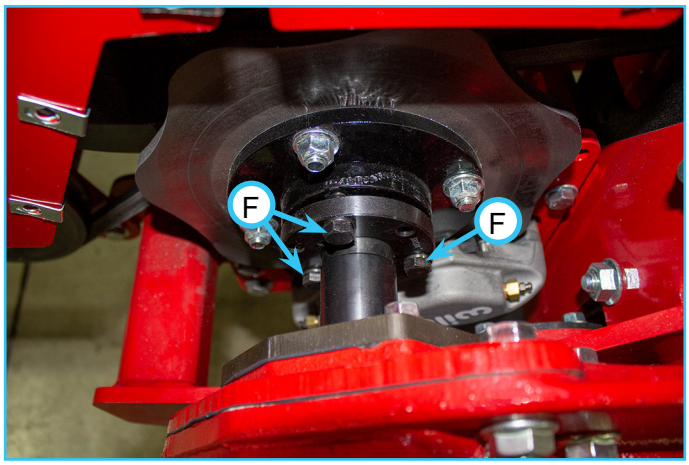
8. Remove the cable tie (D) securing the brake line to the frame.



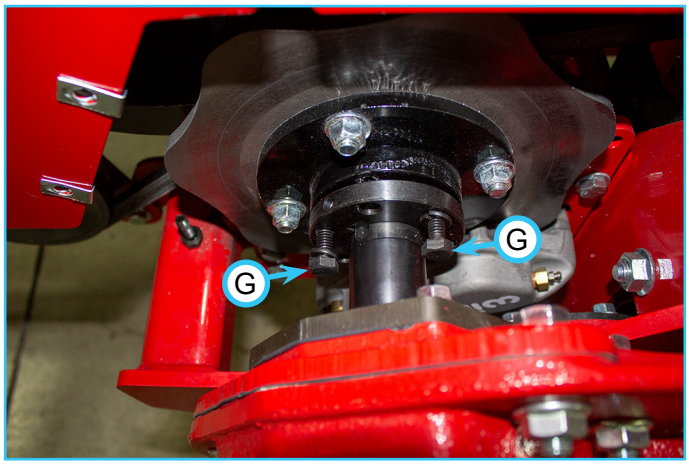
9. Remove the brake caliper from the rotor by removing the caliper mounting bracket (E).



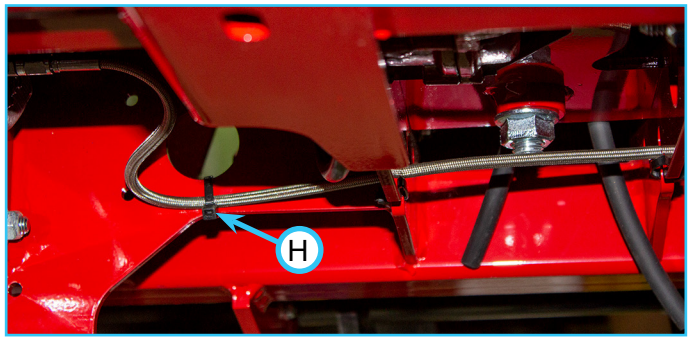
10. Compress the caliper pistons completely.
11. Remove the three 5/16” bolts (F) securing the hub to the rotor mount.



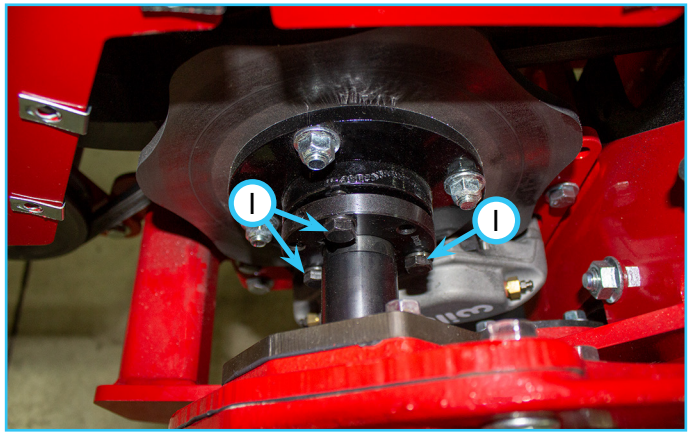
12. Install two of the bolts (G) into the threaded holes. Using rotating quarter turns between the two bolts to remove the hub from the rotor.



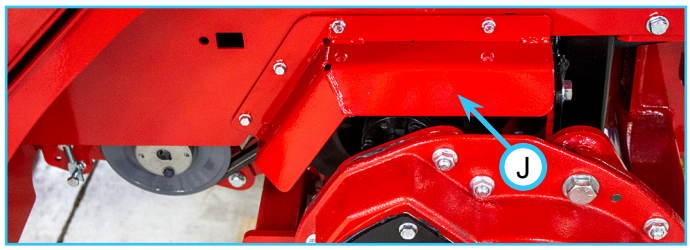
13. Loosen the hub from the rotor so that the hub moves freely on the axle.
14. Re-install the caliper over the rotor. Secure the caliper mounting bracket in place using four 3/8” bolts.
15. Torque the 3/8” bolts to 31 ft-lbs (42 Nm).
16. Re-install the cable tie (H) securing the brake line to the frame.



17. Position the rotor against the inner brake pad.
18. Push the hub into the rotor as far as possible. Ensure that the mounting holes are aligned. Light tapping with a dead blow hammer may be required.
19. Apply blue thread locker and install the three 5/16” bolts (I) through the hub. Allow the hub bushing to pull the rotor to the correct position. Torque the mounting bolts to 192 in-lbs (21 Nm).

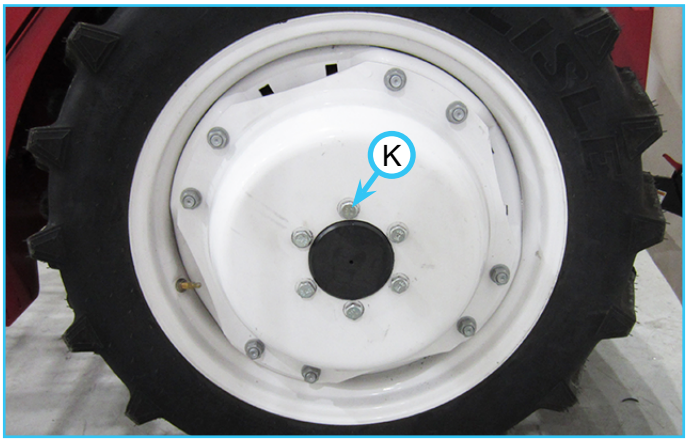


20. When the hub bushings installed rotate the drive hub to ensure the brake pads are not contacting the rotor.
21. If contact is made repeat the process.
22. Install the rotor cover (J), secure it in place with four 1/4” bolts.



23. Torque the 1/4” bolts to 100 in-lbs (11Nm).

24. To install the wheel position the wheel against the hub aligning the mounting holes.
25. Install the rear wheel by installing the six 9/16” wheel stud bolts (K).



26. Torque the 9/16” wheel stud bolts 130 ft-lbs (176 Nm).
27. Before starting and moving the tractor check the brake fluid. Cycle the brakes and ensure that they feel firm.
28. Repeat the procedure or the other rear brake as required.

END OF PROCEDURE