

April 2024

BRAKE SAFETY

Did you know approximately 4 million commercial motor vehicle inspections are conducted every year throughout North America? This ensures that large trucks and buses are safely operating on our roadways.

In 2023, **54,207** trucks were put out-of-service because of brake violations. Brake systems were the number 1 cause for out-of-service violations, accounting for **25%** of level I and V roadcheck inspections.

For more information on vehicle inspections, visit <u>CVSA.org</u> and check out <u>SP1980- Meritor</u> Complete Brake Job for more information on brake maintenance.

Brake Safety Tech Tips:



Brake Drums

- The max. allowable brake drum diameter is stamped/casted into the outer edge of the drum.
- 1. Place a brake drum diameter gauge inside the drum.

- 2. Take several measurements within 90 degrees of each other at the open and closed edges of the drum's friction surface.
- Replace your brake drum if...
 - Any of these measurements are 0.12-inch.
 - The brake drum is out-of-round.
- Common problems with brake drums include...
 - Grease Stained Drums, Cracked Drums, Heat Checking, Oversized Drums,
 Scored Drums, Excessive Wear and Galling, Blue Drum, Martensite Spotted
 Drums, and Polished Drums.

For more information on brake drum problems, how to measure & identify them, and Meritor replacement brake drums, check out the Meritor Drums, Hubs, and Rotors Product Catalog.



Slack Adjusters

- 1. Verify the retaining bolt or snap ring is correctly secured in the camshaft.
- 2. Check slack adjuster gear torque use a lb-in torque wrench and turn adjusting nut counterclockwise.
- Replace your slack adjuster if...
 - The torque value is less than 45 lb-in as you rotate gear, slack adjuster is operating correctly.
 - o The torque value exceeds 45 lb-in as you rotate gear.



Shoes/Linings

 Measure lining wear. Linings must have greater than 1/4 thickness at the center of the brake lining. Inspect for cracks, separation from the brake shoe table, and loose rivets.



Brake Chamber

- Verify push rod is exiting the chamber at a 90 degree angle and it returns completely after each brake application.
- Inspect the chamber bracket for cracks and damage.
- Verify the caging bolt, nut, and washer are installed, and the caging bolt is cover is secure.



Camshafts

- Check the camshafts for cracks, wear, or corrosion. Check the cam head bearing journals and splines. Replace worn or damaged camshafts. Install a new camshaft.
- The bushing wears in one direction; it is important to rotate the camshaft in all directions when checking for radical free play.
- Do not replace bushings and seals if...
 - The radical free play is less than 0.03" (0.76mm).
- Replace bushings and seals if...
 - The radical free play is more than 0.03" (0.76mm).

For more information on our **Brake Tech Tips**, check out our <u>Brake Job Critical-Review</u> <u>Components Publication</u>.

Reminder, you can find <u>Air Disc Brake</u>, <u>Brake Drums</u>, <u>Brake Shoes & Lining</u>, and <u>Hydraulic</u> <u>Brake</u> ...

- Catalogs
- Sales and Technical Publications
- Maintenance Manuals
- Product Videos

Trainings

All on our Xpress Facts Product Page.



more, our easily accessible tools are there when you need them.





For more information, visit **MeritorPartsXpress.com!**



Copyright © 2024 All rights reserved.

Our mailing address is:

Cummins-Meritor 7975 Dixie Highway Florence, Kentucky 41042

