



CVSA Brake Safety Week is Next Week!

CVSA roadside inspections across North America next week will concentrate on Brake Safety. In addition to the focused inspections, the enforcement officers will be providing education materials and demonstrations to drivers about air brake systems.

Have You Checked Your Brakes Today?

Out of adjustment air brakes and brake system defects constitute the major defect areas resulting in commercial vehicles being placed out of service during roadside inspections. Poorly adjusted or defective air brakes reduce the braking capacity for large vehicles and further inhibit their stopping distance. Under ideal conditions, the braking capacity of commercial vehicles is twice as far as that for cars and other smaller vehicles. This increases the risk to other users of the road and the driver (or his/her passengers) of the vehicle itself. In order to reduce the out of service rate for brake defects, a more comprehensive campaign has been developed, called Operation Air Brake. This Selective Traffic Enforcement Program (STEP) model has been used successfully in other areas of traffic concerns (most notably seat belt usage), and it is expected that a campaign using this model will be effective in addressing the issue of brake defects.

What a driver should expect during a brake inspection next week.

- Operation Air Brake Inspection Procedure
- Inspection Items
- Driver's License
- Registration
- Low Air Warning Device
- Pushrod Travel (Adjustment)
- Brake Linings/Drums
- Air Loss Rate (If leak detected)
- Tractor Protection System

Operation Air Brake Inspection Procedure

STEP 1: Choose the Inspection Site

STEP 2: Safety Considerations

STEP 3: Check Air Brake Mechanical Components

STEP 4: Check Steering Axle Air Brake Mechanical Components

STEP 5: Check Brake Adjustment

STEP 6: Build the Air Pressure to 90 - 100 PSI

STEP 7: Check the Air Brake ABS System (If Applicable)

STEP 8: Test Air Loss Rate

STEP 9: Test Low Air Pressure Warning Device

STEP 10: Check the Tractor Protection System

STEP 11: Finalize paperwork, and provide the results to the driver (i.e. out-of-service, etc.)

NOTE: All inspections are to be identified as a Level IV inspection.

What can you do as a driver to make sure that your brake system is adjusted properly and ready for service?

Professional drivers typically will maintain a space cushion between them and the vehicles in front of them. When applying the brakes they will usually apply the brakes with 15% to 25% air application. Only in a defensive action will a driver apply the brakes with greater than 60% air application. These braking incidents are referred to as “**Panic Stops**” or “**Rapid De-acceleration Occurrences**”. Analysis reflects that most professional drivers will require less than 6 of this type of brake application per 1,000 miles driven.

Most International trucks are equipped with a “*Stroke Sensitive*” automatic adjuster. This type of slack adjuster adjusts the brakes on the return stroke. This adjustment occurs only when the application is greater than 60%. The better the driver, the less opportunity for automatic brake adjustment. To ensure that the brakes are always in adjustment, we recommend the following:

An automatic slack adjuster will adjust approximately ½ inch with every 10 full brake applications. Including this procedure as part of your pre-trip inspection will ensure that your brakes are always fully in adjustment. In the event of a roadside inspection, repeat this process while waiting your turn in line for the inspection process. This will ensure that you are not red tagged due to a slack adjuster “Out of Service” condition. After completing this procedure and the brakes are still not adjusted or are inspected and found out of service then it indicates there is a problem with the adjuster, with the adjuster’s installation, or with related foundation brake components.

AS A DRIVER DO NOT TRY TO MANUALLY ADJUST AN AUTOMATIC SLACK!

