

Bendix Brakes B.B.A. 95-08 August 1995

Drum Brake Hardware – Making Dollars and Sense

"If it ain't broke – don't fix it."

Although it would take an historian or literary scholar to determine where and when this statement was first

used, the speaker probably wasn't referring to brake hardware. Unfortunately, when it comes to performing drum brake service, too many technicians follow this advice.

Most major brake manufacturers recommend replacing the hardware every time the friction is replaced. However, industry sales figures indicate that hardware is replaced in less than 1 in 4 brake jobs.

Installing new brake hardware with every job is the cheapest insurance against problems and comebacks that a techni-

cian can get. It is also one of the easiest add-on sales to any brake job, when the vehicle's owner is educated. The following facts can be used when selling brake hardware:

 The various springs used in a drum brake system are subjected to constant application and release of tension, which over time weakens their rebound ability. As the typical driver applies his brakes 70 times per day (25,000 times per year) and with the average time between drum brake services being 3 - 4 years, these springs are expanded and

released as many as 100,000 times between brake jobs. Unfortunately, unless the spring is actually broken or misshapen, it is difficult to determine the degree of wear of the component.

• A typical drum brake can generate more than 400° F under normal usage. Admittedly, heat plays less of a factor on drum brake systems than disc brake systems; nonetheless, it can be a factor. Upon cooling, the components return to the ambient temper-

ature. This constant cycle of heating and cooling can contribute to the weakening of the springs' tensile strength and rebound ability.

 Although the drum brake is enclosed, the components are subject to external conditions such as moisture from puddles and atmospheric humidity and caustic road chemicals,



which can cause rust, leading to "freezing" of self-adjusting components which must be free to move in and out in order to work properly. Yet another potential problem area is the stretching of the self-adjusting cables, which can lead to mis-adjusted brakes.

Among the problems caused by fatigued or faulty hardware are brake drag (which can lead to overheating), drum damage, low pedal, uneven braking, premature shoe wear and noise. In addition, the operation of the rear brakes directly affects the front brakes. Any deficiency in the rear

brakes will result in added responsibility on the front brakes, which could lead to problems there.

Rather than follow the mindset of "If it ain't broke – don't fix it" when it comes to hardware, do your customers an added service (and yourself a favor) by recommending and installing new hardware every time you replace the friction.

Replacing drum brake hardware makes sense. And that can lead to dollars and cents for you and your shop!

