

Drivers are the first line of defense

I'm sure your drivers are pretty well trained as drivers. They spend most of their work life in or around our companies' greatest assets, our trucks. Most training dollars are spent on making sure they operate the vehicle safely and economically. In fact, as you are no doubt aware, drivers are the biggest variable in the operating costs (such as fuel, tire consumption) of a fleet. Their driving style also impacts maintenance costs (brakes, clutches) and ownership costs (vehicle life, insurance costs). That puts the driver or operator front and center of an efficiently run fleet.

Well I want to open up another can of worms. The driver is potentially the first line of defense as a full fledged member of the maintenance department too. The pre-trip inspection as it was conceived was an operational inspection (answering the question does it work?) that has all the hallmarks of a basic PM. In fact with some training and support the pre-trip could be a full boat pm inspection. If you add in topping off the oil, brake fluid and antifreeze it looks more and more like a maintenance activity.

In the test for a CDL in California, for example, all areas of the truck are covered for your power unit (extra areas for busses). In fact the candidate must pass the pre-trip inspection before even taking the written or road tests. These areas include the front of truck (lights etc.), front wheels, front brakes, front suspension, driver/fuel area, under vehicle, coupling system, rear of vehicle (lights etc.), rear wheels, rear brakes, rear suspension, engine compartment, gauges, cranking, air brakes, steering play and a few other areas. These checks while quick might mean the difference between a truck on the side of the road waiting for help and an unhappy customer and a happy customer with on-time, safe, delivered product. This is not to mention the safety aspects and the potential reduction of serious safety exposures.

Your PM system is 3 Ps: Prevent failure, Postpone failure and Predict failure. Small tweaks in the already mandated inspection can improve your identification of deterioration. How much effort is put into training the driver to see like a master mechanic? Remember the better the inspector the longer lead time you have to fix the problem before failure. A good inspector will see and report problems before they are even really problems, when they are cheap and easy to fix.

I can imagine a serious effort to transfer some of the knowledge of the master mechanic to the driver with the idea that the pre-trip inspection is fully a PM and is managed by the CMMS (Computerized Maintenance Management System). The driver is trained to detect impending failure even if the symptoms are subtle.

I see an ongoing class from all the fleet experts designed to upgrade the driver's inspection skills. Imagine the driver being able to tell the condition of the tires almost as well as the tire specialist. I could see a few fewer road calls for tires. Using photos, videos and descriptions the knowledge is continually passed on. Once someone is trained the actual inspection will not take any longer. Oh and to make it work better why don't we borrow the aircraft check list (which could be another whole topic)

In industry the involvement of operators to this kind of activity has been growing. The formal name is TPM (Total Productive Maintenance). In its limited maintenance role the operators take over basic maintenance. In the field we call basic maintenance TLC (Tighten, Lubricate and Clean). It turns out that in a factory 75% of all breakdowns are related to problems in one of these three areas. I don't know any research on fleets but I'll bet those 3 causes are at the top of our chart too.

The maintenance role is only one of the roles taken over by TPM operators. The factories that adopt TPM have also adopted another role. The operator becomes the advocate for unit health and is vigilant against misuse. They don't abuse their unit and will not allow anyone else (including maintenance) to abuse their unit either.

I think the operator is the key to a new world in Fleet Maintenance Management.

For the MD pre-trip inspection training booklet with details of how and what to inspect please visit:

<http://www.mva.maryland.gov/Resources/DL-152.pdf>

For the CA DOT Pre-trip form visit: <http://www.dmv.ca.gov/forms/dl/dl65prt1.pdf>

Joel Levitt, Director International Projects JLEVITT@LCE.COM
Life Cycle Engineering | 4360 Corporate Road Office | Charleston, SC 29405
843.744.7110
Mobile +1-267-254-0061
www.LCE.com