Rail Industry Safety Notice

10 December 2009

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BALLAST REGULATOR – SYSTEM FAILURE

Background

The Rail Safety Unit (Tasmania) has recently completed an investigation into a collision between a freight train and a stabled ballast regulator. The collision was due to the ballast regulator side wing being left foul of the running line. The regulating wing restraining pin had most likely been placed in the holding cradle when regulating activities were completed, but the hydraulic controls were inadvertently leant against by a passenger travelling in the vehicle prior to the machine being stabled. Tests have shown that if the wing is left raised above the cradle when the machine is shut down, over several hours it will fall down and away from the vehicle as the hydraulic pressure drops away potentially fouling adjacent tracks.

This event had the potential to result in a serious accident and remedial action is required to either engineer out the problem or better manage the stabling of the equipment.

The photographs below highlight the following:

1. The regulating wing having dropped away from the holding cradle.

Rail Safety Unit
Department of Infrastructure,
Energy and Resources

Tasmania
Explore the possibilities

2. The position of the hydraulic controls next to the operator's seat.

Accredited Rail Transport Organisations either using hydraulically operated ballast regulators or engaging service providers who use these track machines need to be aware of the potential for this type of incident to occur. The issue of instructions to their staff or service providers to check that the regulating wing is securely restrained after the machine has been shut down is recommended. Alternatively an engineering solution to minimise the risk of the operating levers being able to be inadvertently moved needs to be considered by affected parties.

For further information contact Nick Johnston on (03) 6233 5225