

The impact of transport company safety climate on truck crashes

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Abstract

Research has shown that although trucks are involved in fewer crashes per million kilometres than the general New Zealand public, they are involved in a disturbingly high proportion of fatal crashes. Truck drivers differ from car drivers in many ways, one of which is the fact that they can be influenced by the pressures, beliefs, instructions and policies of the transport company in which they work. Therefore, the safety culture or climate of the transport company could have a large impact on the way truck drivers drive. As no published research could be found on the impact of safety culture on truck drivers' crash rates, a questionnaire survey of 378 drivers was conducted. The questionnaire measured the truck drivers' perceptions of safety climate, crash record, speed choice, and propensity to commit violations, along with a number of other variables. Although there was no direct relationship between the drivers' perceptions of safety climate and crash involvement, safety climate was significantly correlated with a number of other variables strongly correlated with crash involvement. The correlations amongst the main variables are discussed, along with the implications of this research.

Introduction

Road safety is a major problem facing most countries, including New Zealand. In 1998 there was a total of 502 people killed on New Zealand's roads. This equates to 13.3 deaths per 100,000 people and 2.2 deaths per registered vehicle (LTSA, 2001). These rates are considerably higher than a large number of comparable countries, such as: Australia (9.4 and 1.5 respectively) and Germany (9.5 and 1.6 respectively), but are lower than third world countries, such as South Korea (22.7 and 8.0 respectively) and China (22.5, no figures available per registered vehicle) (LTSA, 2001).

One obvious risk factor for being crash involved is the amount of time an individual spends on the road (Parker, Reason, Manstead and Stradling, 1995a; West, Elander and French, 1993). As professional drivers spend more time on the road than average, we would expect them to be involved in more crashes than the general

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