

ABSTRACT

Introduction

Road traffic accident (RTA) is a growing public health issue, which demands prompt preventive and control measures. In developing countries like Sri Lanka, Three Wheelers (TWs) are a major contributor to the vehicle fleet of the country and to the problem of RTA.

However, this huge self-employment industry along with the drivers are being criticized and condemned by the public and the Police authorities on the major issue of road safety.

Objectives

A descriptive cross sectional study was carried out in the Urban Council (UC) area Panadura to describe the characteristics of drivers of TWs and running condition of the TW registered in Urban Council Panadura, and to determine the incidence of road traffic accidents and selected driver factors associated with them. The study consisted of three components. First and second components to describe the characteristics of the drivers of the TWs and the running condition of the TWs respectively. The third component to determine the incidence of RTA involving TWs and selected associated factors.

Methods

A pre tested interview administered questionnaire was used to collect data from drivers of TWs. The principal investigator with two trained interviewers collected the data. A check list was used by an expert in the Department of Motor Traffic to assess the running condition of the TWs.

After obtaining ethical clearance and permission from the administrative bodies data collection was started. Total of 338 drivers of TWs in 32 TW stations were eligible for the 1st and 3rd component of the study total eligible population was studied. 142 sub samples of TWs were assessed for the 2nd component of the study.

Results and Conclusions

Among 338 drivers of the TWs majority (85.5%) were middle aged males. 76.6% were married, (51%) had studied up to grade 10. Ninety seven percent were professional drivers with a mean monthly income of Rs.7500 ± Rs.5, 850 by hiring the TW. Out of the total study population 66% were alcohol users 53.6% were smokers 5.6% were illicit drug users. Only 36.4 % had regular physical activity and 96.7% engaged in some type of spiritual activity. A majority (58.9%) preferred to be with family at leisure time and 25.1% preferred company of peers.

Majority (99.4%) possessed a valid driving license and were driving for >10 years. 92.9% learnt driving TWs by themselves in less than 3 days and only 9.5% had formal learning, 42% had 6-10 years experience in driving TWs.

Majority (74%) of the TWs was self owned and all TWs had revenue license and valid insurance coverage.

53.8% worked 9-12 hours/day 6 days/ week. Habits and practices reported were drinking and driving (34.3%), smoking and driving (36.1%), listening to music (56.8%) and using mobile phones while driving to make a call (45.9%) or to answer calls (61.9%).

77.6% of TWs were in very good condition.

The incidence of RTA involving TW during past 6 months was 14.5%. Most common type of the accident was collision of the TW with another vehicle. 30.6% RTAs had taken place under normal environmental conditions including, strait dry roads during daytime.

Twenty one point three percent of RTAs were associated with driver habit of smoking, usage of alcohol, drink and driving, having a diving license for <10 years and among rented TWs. These observed associations were statistically significant at $p < 0.05$ level.

Although statistically not significant there was a, high incidence of RTA among the drivers aged less than 35 years (14.4%), unmarried drivers (20.3%), those with education below G.C.E. (O/L) (15.1 %), who listened to music while driving (15.5 %) and who used mobile phones while driving.

Recommendations

According to the findings, it is recommended to: stream line the driver training and procedures of obtaining license, increase the surveillance activities on drink and driving and using of mobile phone while driving, and to conduct health promotion programme, for physical activities and to reduce the prevalence of smoking and alcohol usage.

Key words- Road traffic accident, Three wheeler, driver.