Extended Abstract Nguyen et al

Reducing distracted driving behavior among university students: the effectiveness of an empowerment-based intervention in Cambodia and Vietnam

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Abstract

Distracted driving is a common risky behavior associated with young motorcycle drivers in Cambodia and Vietnam. This abstract aims to explore the impact of the *Safety Delivered* program, using an empowerment-based intervention for university students to reduce distracted driving behavior. AIP Foundation launched *Safety Delivered*, with support from The UPS Foundation, in 4 universities in Phnom Penh (Cambodia), 4 universities in Hanoi and 6 universities in Ho Chi Minh City (Vietnam). The program used multi-faceted trainings, peer-to-peer education, and awareness raising activities. These interventions were successful, leading to substantial improvements in student knowledge, attitudes and behavior at target sites.

Background

Road traffic injury is the leading cause of death for young people aged 5-29 (WHO, 2018). Motorcycles account for 75% and 67% of all road traffic fatalities in Cambodia and Vietnam, respectively (Cambodia National Road Safety Committee, 2018; Vietnam National Traffic Safety Committee, 2016). Many risky behaviors contribute to motorcycle crashes, including distracted driving. Mobile phone use is greatest among the young, and the use of mobile phones while driving increases the risk of road crash by four times (WHO, 2018). Young drivers are more likely to be vulnerable to distraction, given their relative inexperience and are more likely to engage in risky behaviors, such as using a mobile phone whilst riding (Truong et al., 2016).

To assess distracted driving, AIP Foundation conducted a baseline assessment in Cambodia and Vietnam, finding that 82% of university students used a mobile phone while riding and 63% displayed high-risk distracted driving behavior. Aiming to address these findings, AIP Foundation established *Safety Delivered*, working with young, inexperienced motorcycle drivers in Cambodia and Vietnam.

Safety Delivered theorizes that youth play an important role in road injury prevention among their peers, by being role models, talking and advocating (WHO, 2007; Youth for Road Safety, 2012). Therefore, a key component was the recruitment and training of Young Ambassadors for Road Safety (YARS) and the subsequent implementation of distracted driving campaigns. Over 2017-2018, YARS activities included: university based peer-to-peer education, youth dialogue, and community events to address distracting driving, reaching 189,489 students, as well as local stakeholders and Government.

Methodology

The impact of *Safety Delivered* was measured using cross-sectional knowledge, attitude, and behavioral surveys, utilizing a self-reported structured questionnaire, conducted twice: pre- and post-intervention. Representative samples for surveys were obtained through a systematic random technique based on the given sampling frame of total population size of undergraduate students from the first to fourth year of 14 intervention universities. A total of 1943 and 2095 students participated in the baseline and end-line survey, respectively.

Extended Abstract Nguyen et al

Results

Students exposed to *Safety Delivered* who demonstrated high knowledge of laws related to mobile phone use while driving was 60.3%, significantly higher than that of unexposed students, at 16.6%. Similarly, 61.3% of students exposed had high knowledge of what constitutes distracted driving, compared to 45.6% of those unexposed. Students displayed positive attitudes toward reducing distracted driving behavior, increasing from 54.4% at the baseline survey to 60.3% at the end-line survey. Students who were reported using mobile phones while riding made a statistically significant decrease from 82.4% to 71.8%. Students showing high-risk distracted driving behavior reduced substantially from 63.4% to 45.8%.

Conclusions

Overall, *Safety Delivered* has successfully engaged university students in improving their knowledge and attitude, reducing distracted driving behavior. Although the rate of students displaying distracted driving behaviors remains high, demonstrated behavioral changes of this complex target group is still positive and remarkable – especially given the short period of campaign implementation. This suggests that similar approaches can be applied for future interventions to improve and sustain road safety action plans among young people.

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