

## **Key events and their effects on cycling behaviour in Dar-es-Salaam**

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The paper explores key events and investigates their effects on cycling behaviour in the city of Dar-es-Salaam, Tanzania. The objective of the study is to identify specific key events during a person's life course with a significant effect on change of travel behaviour towards cycling in relation to stage of change. Stage of change is a key construct of the transtheoretical model of behaviour change that defines behavioural readiness (intentions and actions) into six distinct categories (i.e. pre-contemplation, contemplation, prepared for action, action, maintenance, and relapse). By using a binary logistic regression model, it was possible to identify the key events that influenced change of travel behaviour among 450 daily commuters in different stages of change of cycling behaviour. Model results have shown that income generation, poor daladala (public transport) service, and harsh behaviour of daladala operators have a significant impact on changing to maintenance stage. After marriage, after child birth, past incidence of car accident on bicycle, feel shame on bicycle, fear of losing virginity among girls and shifting from small towns to Dar-es-Salaam where cars are the common mode of travel, have a significant impact on cycling especially moving from maintenance to relapse stage of cycling behaviour.

## **Fast Feelings - An experimental study of cycle helmets' effect on cycling pace and emotional reactions**

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It has been suggested that risk compensation reduces the effect of bicycle helmets. The current article tests the hypothesis that risk compensation does not occur among cyclists unaccustomed to wearing a helmet. This was investigated in a field experiment where pace and psychophysiological load was measured. The results show that routine helmet users cycle slower when the helmet is taken away, and that the change in speed was accompanied by an altered emotional state. Non-users did not change their behaviour. The results are interpreted as inconsistent with a risk compensation theory of bicycle helmets, since the observed behavioural change among routine helmet users is probably of a transient nature. The value of using HRV measures has been substantiated by introducing better control of amount of physical load.

## **A Study about Factors of Side Crash between Bicycle from Sidewalk with Vehicle**

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In Japan, around 50% of accidents between bicycles and vehicles occur at non-signalized intersections, and around 80% of accidents at small, non-signalized intersections are side crashes, with the most hazardous case being an accident between a vehicle on a narrow side road and a bicycle on the sidewalk of a wider road. Moreover, another factor in collisions is that people are allowed to cycle on sidewalks with two-way traffic; for this reason, cycling on sidewalks is more dangerous than cycling on roads. In fact, the bicycle accident rate in Japan is higher than in the United States and EU countries.

To investigate vehicle driver maneuvering and visual behavior at small, non-signalized intersections