NCHRP 17-60

Transportation Research Board

Benefit-Cost Methodology for Behavioral Highway Safety Countermeasures

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Economics & Finance Group

HDR

Background

- In ever tighter budgetary setting, limited funds must be allocated to help deliver the greatest impact to a locality.

- Project for the Transportation Research Board (TRB) to develop an analytical framework that would help prioritize safety investments.

Project Objectives

- Develop a framework to assess the economic value of investments in <u>behavioral</u> countermeasures.

- Create a tool to implement this framework to enable local safety authorities to effectively prioritize and budget such initiatives.

Our Approach

- Combine best practices in assessing effectiveness of behavioral measures and evaluating economic value of infrastructure investments.

- Conduct comprehensive literature review and surveys to gather estimates of costs and effectiveness.

- Incorporate economic values to monetize long-term benefits.

- Develop benefit-cost metrics to help prioritize and compare investments.

- Work with final users to design and develop a valuable decision support tool.

Our Goal Today

- We would like to work with one or more jurisdictions in the region to conduct some case studies featuring the application of our framework. We are currently including the following countermeasures in our study:
  - Sobriety checkpoints
  - DWI Monitoring
  - DUI Courts and Counseling
  - Assessment and Treatment
  - Local Seatbelt Enforcement
  - High Visibility Seatbelt Promotion and Enforcement
  - Child Restraint Monitoring
  - Booster Seat Outreach
  - Automated Speed Monitoring and Enforcement
  - Cell Phone Bans and Restrictions

HDR

Benefits of Participation

- Understand the economic value of behavioral initiatives and incorporate that in the overall safety improvement planning

- Play an influential role in designing the interface and overall utility of the decision support tool

- Opportunity to lead the direction of the analytical framework that could become a standard best practice

Responsibilities

- Provide access to some baseline data related to traffic volumes and crash rates by cause
- Work with HDR analysts to define data availability and assess viability of data collection
- Help identify outcomes that would help prioritization and budgeting decisions
- Evaluate overall usability of the tool and provide feedback

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Thank You

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