The Road Toll in WA - what’s going wrong?

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Institution of Engineers

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**Road Rules**

- There are 1.5 million road safety experts in WA, all with a good solution for someone else to do
- Cemeteries are places for people who thought “it isn’t going to happen to me”
- The dumbest person you know can get a drivers license
- 95% of drivers think they’re better than average
WA Road Safety Forecast

Source: BITRE January 2011, Road Deaths Australia

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WA Transport Future

Perth increases
2010 – 2020

- Population 13%
- Road freight 34%
- Traffic delays 28%
- Congestion costs 69%

Australian Metropolitan Transport Indicators (increases)

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External Observations

➤ SUN Strategy
   • Vision Zero, Sustainable Safety
   • Safe Systems

▪ Achievements
   • UK 40% – 50% reduction in fatalities
   • Nearly zero child pedestrian deaths in London

▪ Initiatives
   • 20mph (30km/h) targeted London speed zones
   • Self Explaining Roads
   • UK £1000 max. fine for mobile phone use

➤ Another ‘Silver Bullet’?
“Productivity … isn’t everything, but in the long run it’s nearly everything”
- Saul Eslake quoting Paul Krugman

“Sustained growth requires sustained technological progress. The rate of growth of output per capita is eventually determined by the economy’s rate of technological progress”
- Innovation - policies, programs and projects
- More effective media campaigns
- ITS
- Better informed decision systems
- More skilled staff

SAFEWAY2SCHOOL
A Holistic approach from door to door

1) The way to the bus stop
- Safety area

2) At the bus stop
- Light when children are close
- Communication between bus/road users
- Navigation and information for bus drivers

3) Entering
- Warning sign on the bus
- V2V communication
- Door safety
- External speakers
- Passenger detection
- In-vehicle communication

4) During the trip
- Seat belt reminder
- Alco breath test
- Registrant seat
- Information addressed to child exit

5) Exiting
- Warning signs on the bus
- V2V communication
- Door safety
- External speakers
- Passenger detection
- In-vehicle communication

6) At the bus stop
- Light when children are close
- Communication between bus/road users
- Navigation and information for bus drivers

7) The way from the bus stop
- Safety area

8) Final destination
- Arrival notification to parents

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SAFEWAY2SCHOOL System Architecture

Children
- Mobile phones
- VRSU transmitters
  Wireless communication by radio

Traffic leaving for children and school bus drivers

Inventory tool

Mobile communication (GPRS/GSM)

School buses
- Driver Support System
  Bus unit (BU)

Road users
- "Intelligent" bus stop

Parents
- Home computer
  (e-mail notification)
- Mobile phone

Municipality Office
- Office computer
  Safety priorities
  Infrastructure database

Traffic Control Centre

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**Haddon Factors**

<table>
<thead>
<tr>
<th>Holistic stage</th>
<th>Human (H)</th>
<th>Vehicle (V)</th>
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</table>
More Road Rules

- Doing more isn’t going to be enough
- The latest RTTF funding increase won’t be enough
- We *can* do better
  - We *must* do better
- Road safety is someone else’s responsibility
- Resources are available, *if* we’re creative