Driverless Vehicles.

Effects on Traffic Flow & Accident Rates.

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Why are we building this model and what do we hope to learn?

Vision Statement

For people who want to see how artificial intelligence should improve almost all aspects of traffic (congestion, accident rates, travel time, etc.) the AI Traffic Model is a model that will provide such information regarding human and self-driven cars. The model will use data based on traffic accidents caused by humans while driving in various conditions such as driving under the influence of substances, using mobile devices, fatigue, road rage, and human error. Unlike current models about traffic, our model will include predictive data about artificial intelligence's effect on traffic.

In what environments does the system operate?

Super-Systems

- Other kinds of public transportation systems have an effect on road traffic
  - Buses
  - Cabs
  - Uber & Lyft
  - Subway
  - Trains
- Work Schedule
  - Rush hour
- City infrastructure
  - Road layout
- Cyclists
- Pedestrian Traffic
- Weather
- Economy

What are the major subsystems and components of the system?

Subsystems & Components

- Vehicles
  - Human, AI
- Human Subsystems
- Software
- Hardware

- Balancing Loops
- Shifting the Burden
- Reinforcing Loops
- Success to the Successful

Causal Loop Diagram