

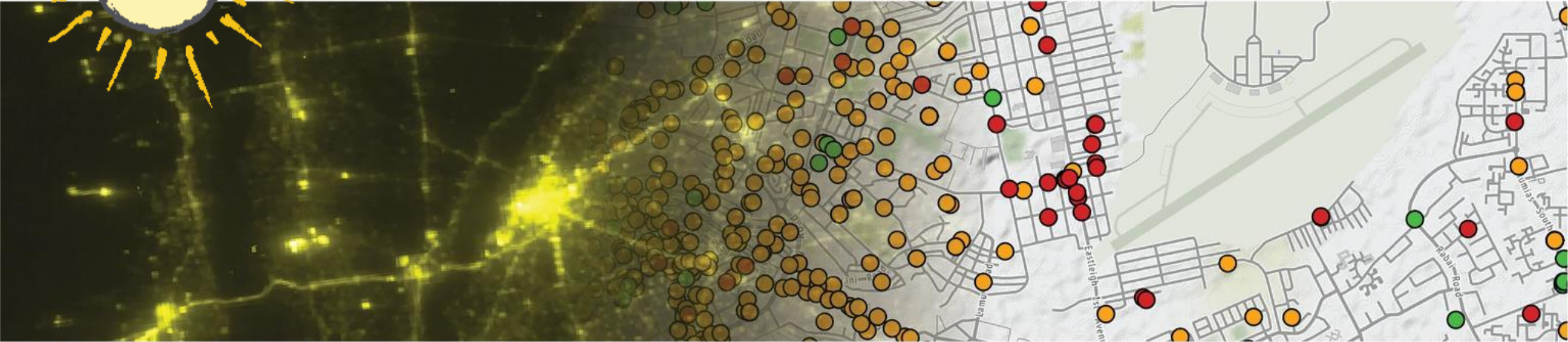


IE CONNECT FOR IMPACT

Transforming the Growth Potential
of Transport Investments

Improving Urban Mobility. The Case of Managing Public Transport Space in Freetown

Sierra Leone



Program and Intervention to be Evaluated

- **Objective:** measure the impact of improved public transport space management in urban settings on road safety, traffic flows, and public transit users' travel times, and informal traders (particularly women).
 - **Relevant components:**
 - Component 1: Data System. a). Primary - Surveys b). Secondary. The data in Sierra Leone is scarce and unorganized. The team will work with the institutions involved in this activity to develop a comprehensive database on road safety and traffic flows (both for private and public transportation).
 - Component 2: Public space management interventions and impact evaluation. The data will help in the designing of the interventions that will be implemented and assessed.
 - **Complementary interventions.** The data will be useful to design complementary interventions, if necessary.
 - **Agencies involved:** Sierra Leone Road Safety Authority (SLRSA), the Sierra Leone Police (SLP), Directorate of Science, Technology and Innovation (DSTI) and Ministry of Transport (MoTA), Ministry of Health, World Bank (WB), Global Road Safety Fund (GRSF), Statistics Sierra Leone.



Program and Intervention to be Evaluated

- **Goals:** the ultimate goal of the program is to improve traffic flows, reduce travel time, improve road safety, and improve the welfare of Sierra Leone citizens.
- **Policy Interventions:**
 - Traffic Railings
 - Pedestrian crossings
 - Lighting and signalling
 - Enforcement
 - Relocating vendors and drivers to the market and vehicle terminals (respectively)
 - Additional interventions will be defined using the data system developed under the first component of this program.
- **Target:** the interventions will be implemented in Freetown, in areas where the inappropriate use of public space creates congestion and unsafe situations for drivers, public transport passengers and pedestrians.



Map

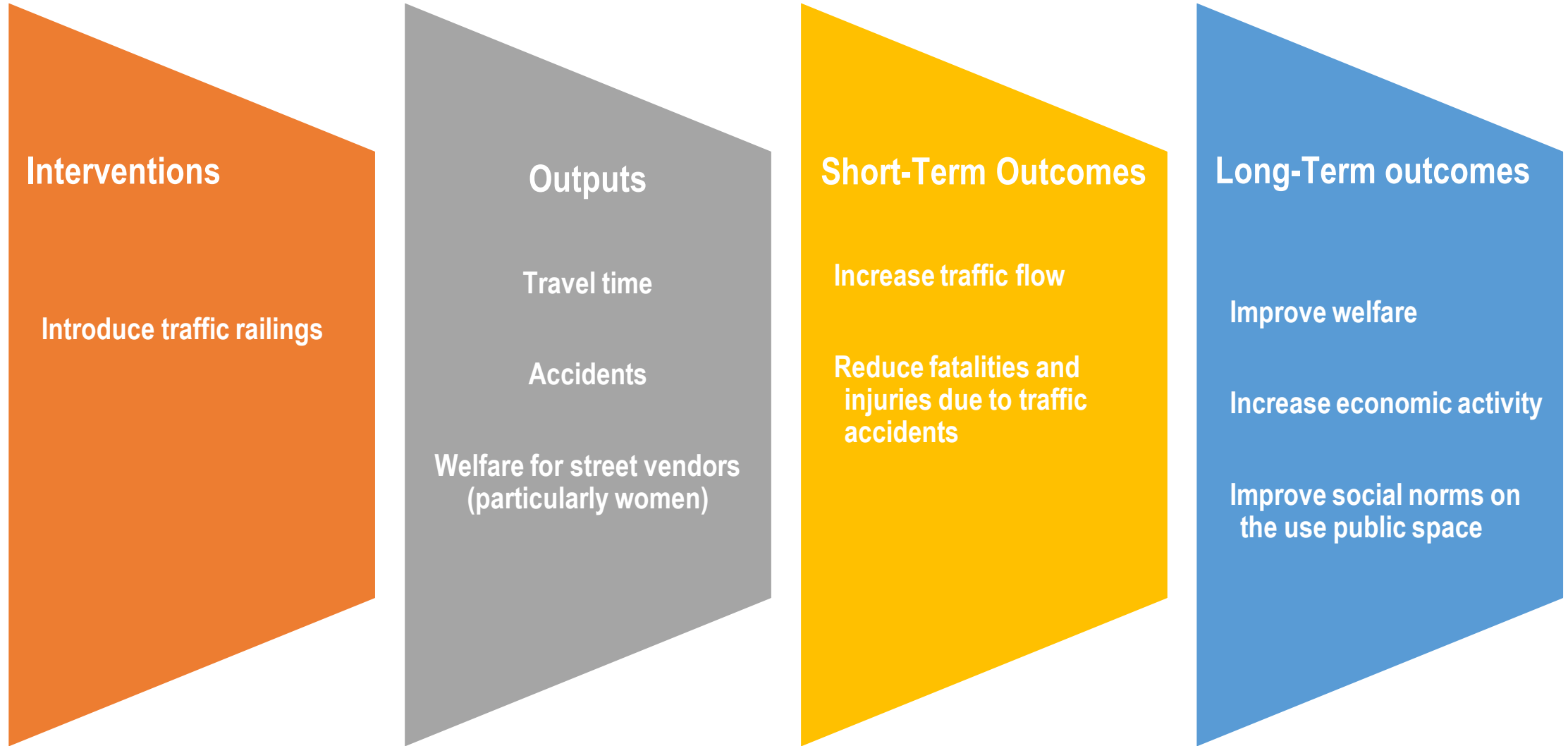


Pilot Impact Evaluation: Traffic Railings

- What is the impact of traffic railings on road safety, traffic flow, and informal vendors?



Theory of Change for Traffic Railings



Measurement Goals

- **Focus:** road safety, traffic flows and disruption in citizen's life.
 - Data will be collected at the city level, disaggregated by gender, age, disability, type of user, type of vehicle...
 - Over what period of time? The data should be gathered at least during rainy/dry season, peak/off-peak times, school/non-school periods.
 - With what frequency?
 - Traffic data: real-time (cameras installed to record speed, number of vehicles)
 - Road safety: crashes, killed, injured (Historical)
 - Pedestrians: safety perception, sex, age, source of income, (Surveys as necessary).
 - Street traders: income, type of products, age, sex, prices (Surveys as necessary)
 - Measure profitability of street vendors (with surveys as necessary)
- **What are the existing data systems:**
 - Police records with information on accidents, killed and injured due to traffic accidents yet the information is not systemized and digitized.



IE Methodology (Randomized Control Trials)

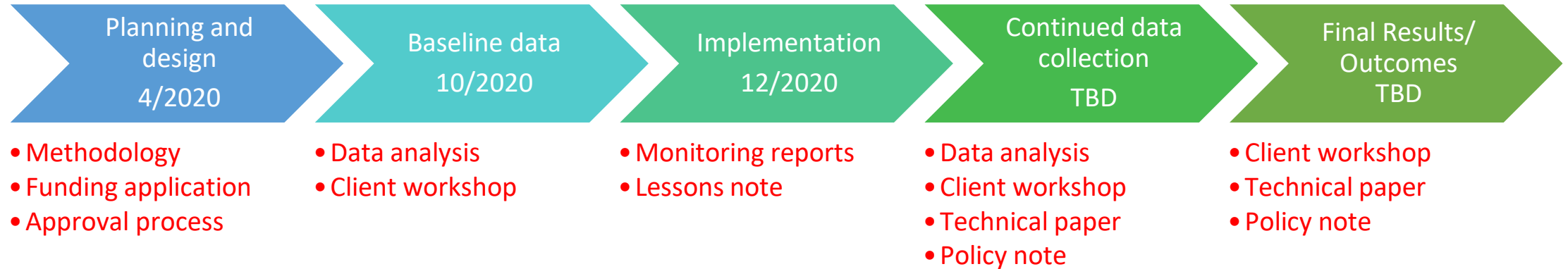


Challenges and Risks

- Resistance from the vendors and pedestrians (possible destruction of railings)
- Compliance for drivers
- Potential accidents due to speed
- Vendors relocate to nearby roads



Timeline



Team Photo



Appendix



Budget *(To be discussed, Not presented)*

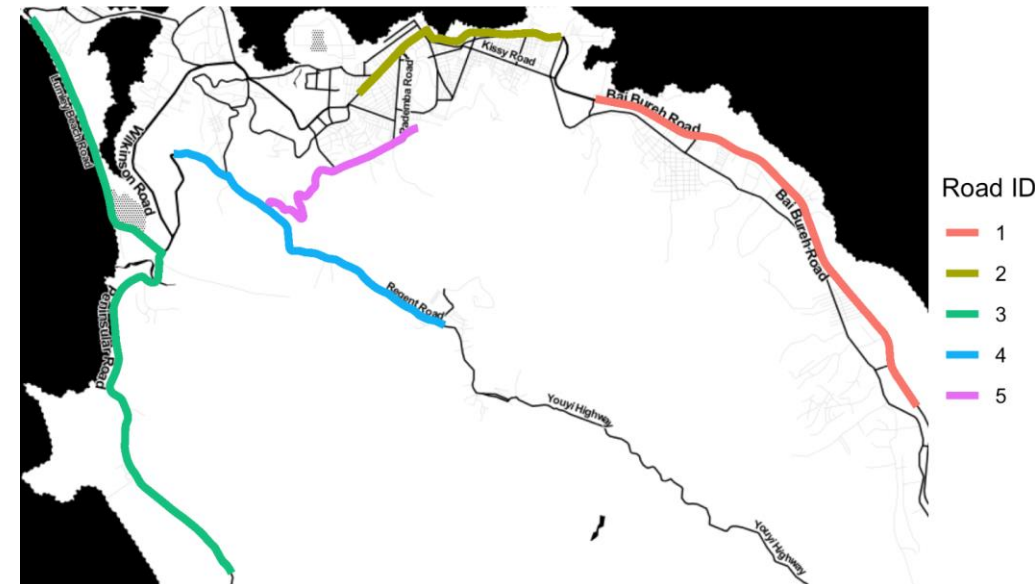
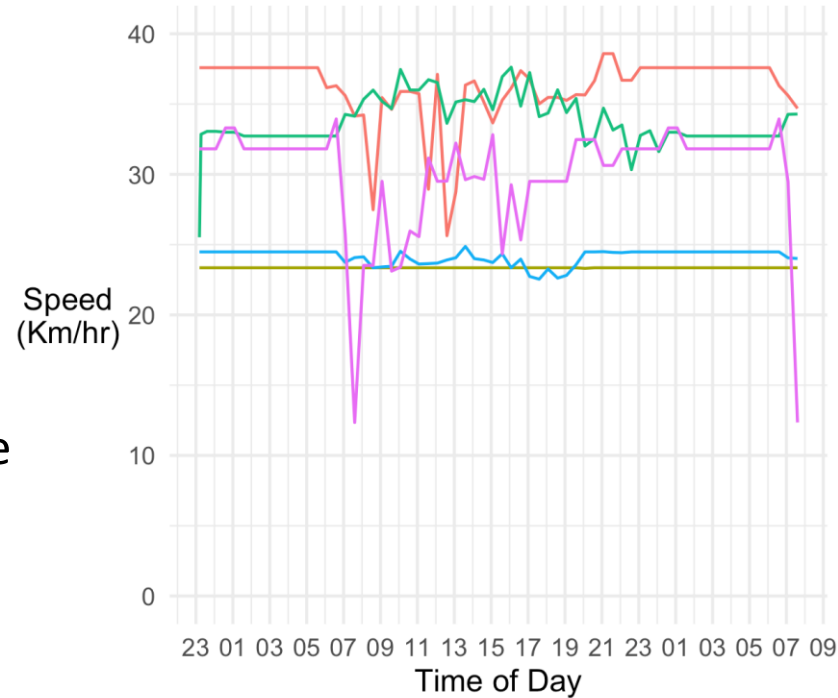
Item	Year 1	Source	Year 2	Source	Year 3	Source	Total
IE Team: concept note preparation							
Baseline survey cost							
IE Researchers: baseline survey & analysis							
IE follow up surveys							
IE Researchers: follow up survey & analysis							
IE Coordinator							
IE Dissemination workshops							
IE travel							
Total cost of impactevaluation							
Cost of intervention(s)							



Measuring Traffic Speed and Congestion



Average Speed Along Route
Data from Mapbox



- Scrape travel time data from Mapbox and Google Maps
- Explore measuring speeds from mini buses and motorcycle taxis
 - Mobile app to measure speed.
 - Install sensors to measure speed and safety information