Uganda Study Protocol

Speak Up!

**Historical Accident Rates**

WHO data suggest the rate of road deaths in Uganda matches that in Kenya (about 30 per 100,000). Historical data on accident rates for public service vehicles in Uganda is currently not available. The total number of PSV accidents for the years 2014 and 2015 will be calculated once the project baseline data has been cleaned and analyzed.

**Sample Size**

Expected sample size is 3,000 vehicles:

- 650 buses (36-67 passengers)
- 2,350 coasters (15-35 passengers) and taxis (14 passengers)

According to numbers provided by the Transport Licensing Board (TLB) of the Ministry of Works and Transport (MoWT), as of June 2016, 771 buses are operational in the country, 695 of which have routes that begin or end in Kampala. Many taxis are unlicensed.

Based on interviews conducted by project staff with the stage managers in the Kampala taxi parks, a rough estimate for the taxis in Kampala that meet the recruitment criteria is 1,908. In addition to this, there are about 785 taxis in the additional towns selected for recruitment that serve destinations other than Kampala.

If during recruitment the project is unable to reach the desired sample size with the number of towns selected, additional towns will be added.

**Recruitment Strategy**

Vehicle recruitment will be conducted in taxi and bus parks located in five towns that represent the highest volumes of taxi and bus traffic across each of the four regions in Uganda (north, east, west and central):

1. Kampala (central region)
2. Mbale (eastern region)
3. Lira (northern region)
4. Mbarara (western region)
5. Fort Portal (western region)

Vehicles are recruited according the following criteria:

1. they must carry 14 passengers or more
2. they must reach highway speeds (80 km/h)

The randomization mechanism is the license plate of the vehicle.

**Control group**: license plate ending in an even number
**Treatment group:** license plate ending in an odd number

A phased recruitment rollout will begin in Kampala at a small taxi park to ensure there are no significant challenges with the survey instruments and workflows. For the first week of vehicle enrollment, the project manager, project officer, or the field supervisors will be present on site. For the remaining period of enrollment, supervision is expected to be as follows:

- Lira (North) and Mbale (East): One Field Supervisor managing one team of four enumerators
- Fort Portal (West) and Mbarara (West): One Field Supervisor managing one team of four enumerators
- Kampala (Central): Two Field Supervisors managing 2 teams of 6 enumerators

The field supervisors will be in daily contact with the project manager throughout enrollment. If additional towns are added to increase vehicle recruitment, then changes in staffing will be made to ensure that proper protocols will be followed.

At the point of recruitment, a short survey is administered to the drivers, in which information about the vehicle, the driver, and the route is collected.

Vehicle enrollment is expected to begin in October, 2016. It is anticipated to take between 6-8 weeks to reach the desired sample size.

**Treatment**

Enumerators will place eight stickers in buses and coasters and four stickers in taxis at the time of enrollment.

The many different languages in Uganda have proven to be the greatest challenge to the sticker design and messaging. The project name, *Speak Up!*, was selected after regional focus groups suggested this English phrase was well-understood throughout the country.

Given the different languages spoken throughout the regions of Uganda, and the difficulty in knowing which vehicles travel through which reasons on a consistent basis, the research team designed eight unique stickers: two with messages in each of the four primary local languages, for a total of eight unique designs. All stickers also include the English translation and the “Speak Up!” tag line. Taxis will receive four of these stickers (one in each local language), and buses and coasters will receive two stickers in each language for a total of eight.
<table>
<thead>
<tr>
<th>Image</th>
<th>Message in English</th>
<th>Local Language to be Used*</th>
</tr>
</thead>
<tbody>
<tr>
<td>Injured Mother with crying toddler in front of crashed taxi</td>
<td>A reckless driver can get you killed! Tell him to slow down, now!</td>
<td>Luganda</td>
</tr>
<tr>
<td>Boy crying in front of crashed bus</td>
<td>Your family needs you! Tell the driver not to be careless with your life.</td>
<td>Luganda</td>
</tr>
<tr>
<td>Little girl crying in front of crashed taxi</td>
<td>Don’t let an overspeeding driver make an orphan of your child Demand a safe ride.</td>
<td>Luo</td>
</tr>
<tr>
<td>Two people shouting</td>
<td>You have the power to stop a reckless driver! Use your voice!</td>
<td>Luo</td>
</tr>
<tr>
<td>Woman shouting</td>
<td>Don’t keep quiet during an unsafe ride. Use your voice to avoid an accident!</td>
<td>Runyakitara</td>
</tr>
<tr>
<td>Woman yelling at taxi driver</td>
<td>Your life or a driver’s phone call? You deserve a safe journey – demand it!</td>
<td>Runyakitara</td>
</tr>
<tr>
<td>Injured woman in front of taxi</td>
<td>Don’t be crippled by a reckless driver! Tell him to stop overspeeding!</td>
<td>Swahili</td>
</tr>
<tr>
<td>Crowd of people looking at accident</td>
<td>The passengers should have said something... Speak up now, before it is too late!</td>
<td>Swahili</td>
</tr>
</tbody>
</table>

*Message translations are currently being finalized.*

The printing of the stickers will cost 600 UGX ($0.18 USD) per sticker. The cost of printing the envelopes is 950 UGX ($0.28 USD) per envelope.

Eight stickers with one envelope will be given to buses and coasters. Total cost per bus/coaster = 5,750 UGX ($1.72 USD).

Four stickers with one envelope will be given to taxis. Total cost per taxi = 3,350 UGX ($1.00 USD).
**Lottery Protocol**

A lottery will be conducted each Friday. Ten license plate numbers from the database of recruited vehicles will be randomly selected and contacted by project staff. The selection will be random, but proportional to the number of vehicles enrolled in each region so that winners are represented geographically.

The selected vehicles will be inspected to ensure that all stickers are in the correct place and undamaged. Inspections will be conducted by enumerators hired and trained by the project team. Inspections will take place locally, at one of the drivers’ association offices in the town where the vehicle was enrolled.

If the vehicle passes inspection, the driver, conductor, and vehicle owner will each be transferred 150,000 Uganda Shillings (about $45 USD) via mobile money. 150,000 UGX is the approximate amount of weekly earnings for the average taxi driver in Uganda.

Assuming four draws per month and 100% compliance, the lottery will cost 18,000,000 UGX ($5,321 USD) per month.

**Source of Accident Data**

Accident data is collected from the Uganda Police Force’s 127 district and division level stations. Enumerators use tablets to fill out a Survey CTO form for each accident entry. The information collected includes:

- the region
- the police station where the accident was recorded
- the Traffic Accident Registry (TAR) number
- date
- time
- location
- number of PSVs involved
- type of PSV involved
- registration plate number
- cause of accident
- nature of accident
- number if injuries
- number of fatalities

Two photos are also taken and uploaded to the Survey CTO form of the accident entry in the TAR.

**Quality Control**

A random selection of accident reports will be drawn from across the data collected from the regional police stations. Project staff will verify the accuracy of each accident entry by comparing the data entered into the survey with the picture of the original report. Additional quality checks are planned.