REPORTING ON ROAD SAFETY WITH DATA

Mombasa, Kenya

Introduction

Dealing with road safety in our cities starts with accepting we have a problem. However, we then need to understand it with precision. As Mombasa shows, data is a crucial resource that should underpin urban design and policy.

Selina Makokha, Surveillance Coordinator for the Bloomberg Initiative for Global Road Safety in the County Government of Mombasa, is in charge of examining road crash data and producing data reports for stakeholders in the road safety system network.

In 2023, she and her colleagues produced the first Mombasa Annual Safety Report, based on data from road fatalities and injuries for the 2019-2022 period. With a team of data collectors and records from the police and hospitals, the report gives comprehensive information on road safety in the city.

Public health

Injury and fatality, particularly amongst young people, place a burden on public resources like hospitals. In this sense, road safety should be understood in public health terms as well.



Selina Makokha speaking at an event Photo source: Selina Makokha Not unlike the rest of the continent, Mombasa is losing many young people to road fatalities. According to Selina, about 70% of public-school learners travel by foot and 93% of fatalities are amongst pedestrians. Young people are clearly a priority given that "road safety is the leading killer for people between 15 and 29", she emphasises.

The report showed that the majority of victims are pedestrians and motorcyclists, specifically public motorcycle taxis called 'boda bodas'. This is why she went on to also include two smaller reports that focused on each group separately.

Numbers tell important stories

Close cooperation with a diverse range of actors, especially the police, is needed according to Selina, and she invests significant efforts in building strong relationships.

She also highlights the crucial financial and technical support of Bloomberg Philanthropies and John Hopkins University as well as the strong commitment of her colleagues to drive long-term change.

Selina has an impressive track record on quantitative research. She holds a master's degree in population studies from the University of Ghana and has worked on big data sets in different sectors, including peace and security and migration in other parts of Africa.

Information for the report is collected using various methods, including crash counts, direct observation and speed cameras. Selina and her team also use GIS coordinates to identify key roads and areas of concern, while John Hopkins International Injury Research Unit produces findings on risk factors such as speeding, helmet use and seatbelt use.

Both the crash and observational data take into account other variables such as age and gender.

Selina is conscious of the need to translate this into accessible formats so a wider audience can engage with the findings. She says that with additional funding, she would want to turn it into accessible booklets for children and other vulnerable users, using cartoons and accessible language that illustrate that the numbers represent actual lives.



Lessons learnt

Selina reflects on the practical application of the report and says that taking results seriously even when they contradict conventional theory and practice is essential.

She says many were surprised for example that fatalities were often found near foot bridges.
Rather than blaming people for not using the bridges, she says "infrastructure must take into account how pedestrians think" and plan for what users require in real life.

While the report follows guidelines and variables used by the World Health Organisation (WHO), Selina believes it is important to adapt the system to the local context.

Specifically, she says that they are unable to verify the cause of a crash as the analysis is done after the fact. Therefore, they qualify the finding as 'suspected cause of crash'.

While this goes beyond the WHO recommendation, Selina explains, "most local authorities find it useful". To make the data even more complete, this year her team is working to further link records from hospitals and the police.

Selina and her team are now working to finalise the report from 2023. She says one of the key lessons has been that much work must happen between reports being published. It is not just about collating and publishing the data, but about using it to train all stakeholders including engineers, transport authorities and disseminating it widely.

