

2024 CASE STUDY

PARTICIPATORY ACTION FOR WASH INSECURITY IN ROTA, KISUMU COUNTY, KENYA

On the photo: Bernard standing next to a collapsed toilet.

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CONTEXT

This case study is part of the Women Rise project, which is concerned with supporting women in low-and middle-income countries to build back better after the COVID-19 pandemic. The case study aims to identify an equity-to-action challenge and work collaboratively with communities and other relevant stakeholders in developing sustainable and equitable responses. To achieve this goal, the Women Rise Team – Kenya, worked with a local partner; the Community Health Support Programme (COHESU), to organize a community engagement forum in Rota village in Kisumu West Sub-County of Kisumu County in the western part of Kenya, a community facing challenges with access to safe Water Sanitation and Hygiene (WASH).

COHESU is a registered Non-Governmental Organization that works with communities to prioritize health needs and develop sustainable solutions. Through research, resource mobilization, and (in)formal training, they translate basic research into actionable strategies (<https://www.cohesu.com/our-story>). COHESU has partnered with the University of Waterloo in an IDRC-funded grant focused on women in low- and middle-income countries building back better after COVID-19 in the context of paid and unpaid work. The pre-existing strong research partnerships allowed the COHESU and University of Waterloo Principal Investigators to mobilize an integrated knowledge translation approach effectively and efficiently to address the issues identified as those most greatly impacting women and girls because of COVID-19: WASH security, food security, and teenage pregnancy. The Women Rise project is being conducted in Kisumu County, an area that borders Lake Victoria and is greatly affected by the issues identified.

Kisumu County lies between longitudes 33° 20'E and 35° 20'E and latitudes 0° 20' South and 0° 50' South with a total of 1,224,531 persons. It's divided into seven Sub-Counties. The county's topography is characterized by Kano-Plains which is a flat stretch lying on the floor of the Rift Valley and has predominantly black cotton soil which is poorly drained and unstable. The climate of the County is generally warm with minimal monthly variation in temperatures between 23°C and 33°C throughout the year. The rainfall is determined by a modified equatorial climate characterized by long rains (March to May) and short rains (September to November). The average annual rainfall varies from 1,000-1,800mm during the long rains and 450-600mm during the short rains (County Government of Kisumu, 2022).



Boats used for fishing.

Rota village (the case study community) is situated in Ojolla Sub Location, Southwest Kisumu ward in Kisumu West Sub County. Southwest Ward has a total land area of 50.4 km² and a population of 27,963. The community's main economic activity is fishing, sand harvesting and subsistence farming. Characterized by its black cotton soil, the community experiences poor drainage and instability, conditions that contribute to frequent flooding during the rainy season. Additionally, climate change has led to the rising levels of the lake, further contributing to flooding. These floods destroy homes, toilets, crops, and infrastructure. Rota also has a limited connection to piped water from the main water utility provider, Kisumu Water and Sewerage Company (KIWASCO), which has not reached a majority of the households. As a result, they use River Kisian and Lake Victoria as their main sources of water.

The Women Rise project highlighted these issues of inequitable access to water, sanitation, and hygiene from quantitative survey data. Using a participatory action approach and with a desire to embrace the CCGHR Principles of Global Health Research in partnering authentically, embracing humility, and acting on the causes of inequities (Bisung & Plamondon, 2023), the Women Rise team with COHESU as their community partner, sought to understand the challenges and priorities of the Rota community members of Kisumu County.

A community engagement forum was held on 12th March 2024, at Rota Primary school hall. In attendance were various community members, COHESU staff members, County government officers concerned with WASH, water, Building and construction, Public Works departments, the local area chief, representatives of the local political leadership, friends of the community and stakeholders from the community hospital & school.



Community engagement forum.

WHAT IS THE KTEA PROBLEM?

The equity-to-action challenge is to collaboratively mobilise resources and find solutions for the water sanitation and hygiene (WASH) challenges affecting the Rota community. The community members mentioned that they had problems with water shortages, and improper hygiene both individually and structurally owing to unreliable sewer systems and poor toilet facilities. Specifically, the community raised concerns about pit latrines that flood and collapse during the rainy seasons preventing them from having decent sanitation facilities.

Tap water from the utility is unreliable because the pipes often get damaged and burst; especially when they are near roads or construction sites, which after repair carry dirty water to various destinations. The dry season brings inadequacy of water, which means scarcity of safe water, forcing community members to buy water at Ksh 10 per 20 Litre container, and those who cannot afford it or cannot find a seller, have to collect river water which they say is unsafe. This is because people often bathe, wash clothes and even defecate in it upstream.

Another dilemma that the community contends with is the lack of water harvesting tanks in schools and hospitals, this leads to a lack of sufficient water for the children and patients i.e. tanks dry out, and even put out dirty water when they get low; lack of water in the hospitals contributed shutting down of the maternity ward as critical care could not be undertaken in the absence of water. Hospitals in certain areas lack toilets as well, which contributes to the indecent state of the facility. Water shortages also mean a lack of water to flush toilets even for people and institutions with modern ones.



A community member demonstrating a collapsed toilet.

The rainy season leads to flooding that not only renders toilets unusable and unstable, but also leads to the collapse of homes, or wet homes which later lead to diseases like pneumonia and malaria. A lack of proper drainage systems means this flood water causes plenty of damage to people's homes and properties. Many of the community members state that they weren't consulted during the construction of channelling for floods which is a problem. The permanent toilets overflow, carry waste and spread it everywhere creating septic environments that the community and its children must navigate through, this also increases the risk of waterborne diseases.

Due to the nature of flooding, water flowing from different places is very dirty and unsuitable for washing clothes, dishes and even cooking. Children are forced to navigate this polluted water to get to school, sometimes swimming, and bathing in it leading to constant diarrhoea. There is also concern about a recently opened dam that overflows and carries rubbish into their communities and wastewater from paint companies that pollute their water.

The equity implication is that the people of Rota suffer neglect from the government which is responsible for providing basic services like access to water, sanitation and facilities (roads, water pipes etc) maintenance. These issues affect all community members at large; however, some demographics are worse impacted;

1. Children are worst impacted when there is a lack of water to drink and for handwashing at school. When the roads are flooded, they face challenges getting to school. The lack of water also interferes with meal provision at school. Children also suffer from diseases like diarrhoea and malaria.
2. Household managers (mostly women) - inadequate and unsanitary water poses a challenge in undertaking chores like cleaning and washing forcing them to purchase water, yet some cannot afford it.

3. The healthcare facility - the hospital at Rota lacks a toilet with insufficient water supply which interferes with its operations and provision of health services to the community, for example, the maternity ward had to be closed because of lack of water in the facility. Recent research by WaterAid indicates that inadequate water, sanitation, and hygiene is not only a cause of preventable deaths through the spread of infectious diseases but also a looming threat to global health and an economic burden costing sub-Saharan Africa approximately \$8.4 billion yearly (WaterAid, 2024)



Flood water blocking the road.

KTEA RESPONSE

Proposed solutions by community members included the following:

- Water treatment mechanisms like water guard or aqua tabs and installation of chlorine dispensers at water points.
- Donations for children gumboots to walk through the flood water during the rainy season.
- Water storage tanks to be installed at schools and hospitals.
- Infrastructure for run-off and overflow water management - this would involve community engagement and joint effort to co-design with water engineers in channelling mechanisms that will not interfere with their daily livelihoods and help control flood water flow during rainy seasons. The community members also felt that water that was diverted, needed to be directed towards the river instead of the roads and lake, and that the river would need to be contained i.e. outlets closed to prevent overflowing water from reaching residents (government intervention).

- The concern for toilet facilities raised solutions that required better construction of latrines that could withstand floods and have better foundations taking into consideration the type of soil in the region. Because these types of latrines tend to fall outside the budgets of many of the community members, one builder suggested that the villagers get 4 to 5 homes to come together and pull their resources to build communal facilities that could last. Alternatively, some suggested adopting composting latrines that can be constructed out of floodwater reach. Along with the latrines, there was the need for the construction of more handwashing points, and health education of community members on the importance of washing hands with clean water and soap, especially before meals and after using the toilet facilities.



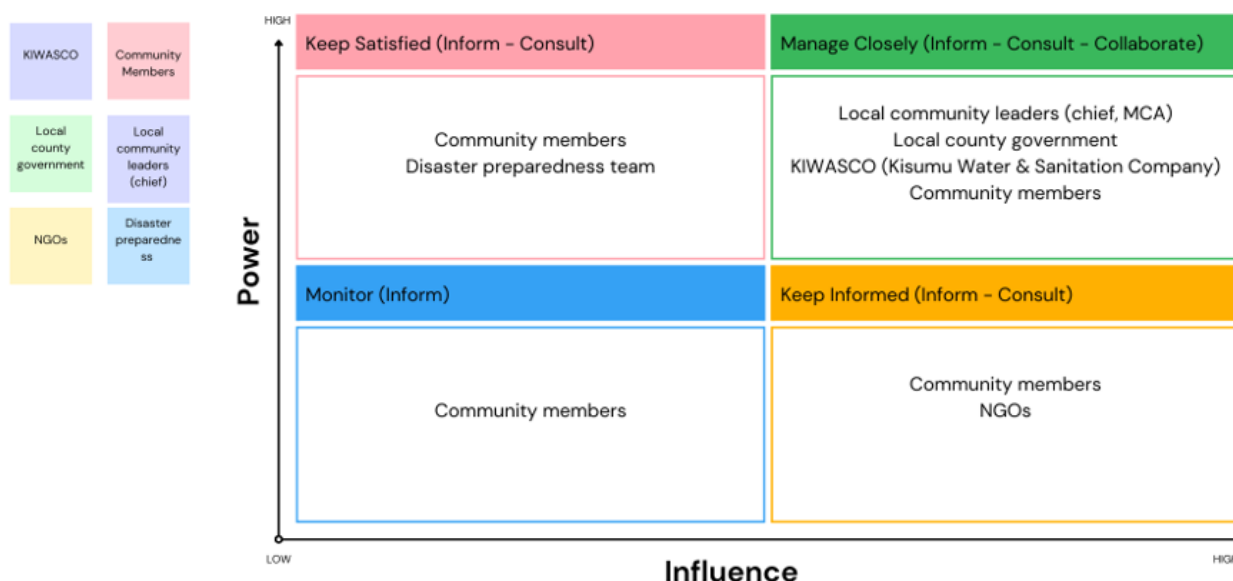
A recently constructed latrine

- Finally, on the matter of burst water pipes managed by KIWASCO, members suggested water providers have their pipes run above ground to prevent dirty water from entering the system when they burst and have community members clear stagnant water in and around the community to prevent the spread of malaria.

RECOMMENDATIONS AND NEXT STEPS

To act on the causes of inequities which hinder the community from realizing good health and well-being, the team and the community partner proceeded to map the stakeholders involved taking into consideration their levels of interest, power, and influence. Based on this analysis, strategic stakeholders, such as the Member of the Kisumu County Assembly (MCA), were selected for further engagement.

Stakeholder Mapping



The community partner managed to secure a meeting with the member of the county assembly (MCA) who among other duties, oversees approving county development plans and providing a linkage between the county assembly and the community members on public service delivery. We presented the problems and solutions put forward during the community engagement forum and the MCA promised to include in this year's budget, the construction of a four-door toilet at the local public hospital.

The team in collaboration with the community partner will also be seeking partnerships with other organizations and grants that can support in donation or acquisition of children's gumboots and water storage tanks/equipment.

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GALLERY



A sunken toilet at a homestead in the community.



Rota community members at the engagement forum.



Closed toilets rendered unsafe to use because of sinking ground.