



TEAM GHANA

Agencies Represented: The Environmental Protection Agency, The Ministry of Environment, Science, Technology and Innovation, and Zoomlion Ghana Ltd

Problem: Over 76% of households rely on improper waste disposal methods

Policy: National Environmental Policy, approved in 2014

Program: Source Waste Segregation Program, pilot completed

Objective: Enhance data collection and analysis to refine implementation of the solid waste separation and disposal pilot program

Funding: Public-private partnership

THE PROBLEM:

In Ghana, over 76% of households rely on improper waste collection and disposal methods. Ghana is marked by widespread littering and indiscriminate dumping of waste in drains and open spaces, and the use of wetlands and water sources as waste disposal sites. The growing economy and related life-style changes exacerbate swelling waste levels. If the population continues to increase, waste generation and related problems will remain a major challenge for the government, unless meaningful action is taken.

THE POLICY:

To comprehensively address the challenge of waste disposal and deal more effectively with the underlying causes of poor environmental sanitation, Ghana's Ministry of Environment, Science, Technology and Innovation launched a National Environmental Policy in 2012, and a revised version in January 2014. This policy promotes a holistic environmental management system, with a specific focus on improved sanitation. Key goals of the policy include the promotion of sustainable resource use and impact management, enhanced participation and coordination in environmental management, and increased access to and use of environmental information for decision making.

The Environmental Protection Agency (EPA) is the lead implementing agency operating under the direction of the Ministry of Environment, Science, Technology and Innovation, and provides guidelines and technical inputs for waste management and sanitation policy development and implementation. In 2013, the EPA began the Source Waste Segregation Program, a pilot intervention under the broad 2012 National Environmental Policy, to address the serious waste issue and related disease burden in Ghana's capital, Accra. The program intended to engage communities in the separation of different types of solid waste into color-coded bins, creating awareness around waste reduction, recycling, recovery, and reuse. Waste separation at the source would allow organic waste to be turned into compost, paper and plastics to sold to recycling companies, and bottles to be returned to beverage companies, for example. The program was originally piloted in 60 institutions within the public and civil service, and approximately 40 primary and secondary schools. Two private waste disposal companies and EPA partners, Jekorah Limited and Zoomlion Ghana Limited, were responsible for collecting the waste in different geographical areas of Accra, as well as educating staff and students how to use of the bins and monitor the program.¹

The pilot program was funded by the Government of Ghana with support from private waste management partners. In addition to the EPA, Zoomlion, and Jekorah Limited, the Ministry of Local Government also played a key role in ensuring that local authorities oversaw the infrastructure and facilities for managing waste.

¹ Implementation of Source Waste Segregation Program Begins, Government of Ghana.

<http://www.ghana.gov.gh/index.php/media-center/news/3702-implementation-of-source-waste-segregation-programme-begins>

IMPLEMENTATION PLAN AND STATUS:

Implementation of the Source Waste Segregation Program is still ongoing. The EPA has requested resources to scale up the program after a formal, third-party evaluation is completed.

The EPA has already learned several critical lessons from an initial review of the pilot program: focal persons were not fully committed to the program, there were issues with the bins, and despite training and sensitization, people were not separating waste properly. Furthermore, the private companies did not have the capacity or facilities to ensure proper collection and disposal of all separated waste: in some cases, they had to pick up and mix contents from the different bins, and re-separate it again later. Most importantly, the EPA found that the program was designed without a monitoring and evaluation framework, with insufficient data and evidence from previous programming and an inadequate understanding of behavior patterns. For example, the pilot revealed much less food waste in schools than had been anticipated; better scoping research beforehand would have shown that students in Accra often leave the campus to eat lunch, and dispose of food waste outside of school grounds. This type of research and data would have better informed the distribution of waste bins and their collection by waste management companies, which were unprepared to handle the variation in waste volumes across different sites.

Nevertheless, unforeseen challenges uncovered by the pilot program actually catalyzed greater political commitment for waste education. Now, the President of Ghana aims to make Accra the cleanest city in Africa, and the EPA is in the midst of a stakeholder engagement process to solicit inputs, ideas, and additional funding to make that goal a reality.

KEY CHALLENGES:

- The National Environment Policy and the subsequent Source Waste Segregation Program were developed without robust baseline data or a monitoring and evaluation framework. This led to incorrect assumptions about human behavior and waste disposal patterns, and a flawed program design and logistics to implement it.
- Some implementing partners had insufficient capacity to gather, process, and analyze data from field reports and community feedback. This affected decision making and impacted the delivery of the key policy outcomes, such as the provision and distribution of household bins and the development of transfer stations to collect and reroute waste streams.
- Inconsistency, incompleteness, and unreliability of data provided by key stakeholders during program implementation presented major challenges, impeding data aggregation and analysis to inform program decisions. Implementation status reports are presented periodically to the EPA Board of Directors, and implementing organizations have shared field observations during joint workshops, but there is no formal platform for sharing evaluation findings and other information with key stakeholders.
- Initial awareness campaigns and community engagement efforts did not generate the desired support and participation from all stakeholders. Efforts to raise awareness and educate the public about the importance of proper waste separation and disposal should have been sustained throughout the program.

ACCOMPLISHMENTS:

- Ghana has successfully created a broad environmental policy to provide context and impetus for more specific programming.
- The Ministry of Environment and EPA have built strong relationships with private waste management companies; many previous programs and successes would have been impossible without this collaboration.

- Many civil society organizations are implementing small-scale waste management programs in their communities, presenting opportunities for the EPA to collaborate and expand its reach.
- A number of universities and other public institutions have expressed interest in adopting the waste separation program, and the Ghana armed services has already joined, which is telling of the successful shift in public norms and culture.
- Waste separation has been discussed in the national media and at various fora, and public awareness of the issue has been raised.

WHAT'S NEXT:

- The EPA would like to do a third-party evaluation of the pilot Source Waste Segregation Program, to supplement its learning and inform the next steps for expanding the program. The procurement process for the evaluation will be done this year, funded by EPA general support funds.
- Meanwhile, the EPA seeks to build additional relationships with state and non-state actors, to both participate in the program and make the most of the available evidence and research capacity in the environment sector, enhancing their ability to draw on diverse types of quality evidence from a range of sources to effectively respond to issues of sanitation, waste management, and environmental protection.
- Currently, relevant data is primarily collected by the waste management companies and local authorities, but not integrated into one system. The EPA hopes to change that, aggregating all data into an integrated system that can be analyzed to inform future policies and programs. Ghana's new Ministry for Sanitation and Water Resources was created in 2017 to act as a focal point for data management and sanitation programs. The EPA will need to coordinate responsibilities for integrating data collection with the new Ministry, and help to define clear roles for the Ministry of Sanitation and the Ministry of Environment. The latter will continue to manage decisions regarding plastic waste, for example.
- The 2014 National Environmental Policy contains a section on waste management, but the EPA sees value in a separate policy specific to solid waste separation and disposal by households. More work is needed to conceptualize the value and content of this potential policy.

Written in consultation with Ebenezer Appah-Sampong, Deputy Executive Director, and Samuel Quaye, Program Officer, Ghana Environmental Protection Agency, Ministry of Environment, Science, Technology and Innovation, with support from Ari Gandolfo and Kelly Dale. © Results for All, July 2018. For more information, contact info@results4all.org.