

Audit Case: Performance Audit on Floods Control Measures in Tanzania

Background

Tanzania has experienced severe flooding events which resulted in the loss of people's lives and properties as well as the destruction of infrastructures, particularly in urban centres and cities. Flooding is estimated to be the costliest hazard at the national level, causing about 62% of losses from natural disasters from 1990 to 2014.¹

Motivation

The Audit was motivated by: (a) Loss of Lives and Properties, (b) Destroyed Infrastructures Caused by Seasonal Rainfalls, (c) Loss of Crops and Damage to Farms, (d) Escalation of Poverty and Healthcare Cost, and (e) Supporting the Achievement of Sustainable Development Goals. (SDG 11.5) targeted to significantly reduce the number of deaths and people affected by floods and substantially decrease the direct economic losses relative to global Gross Domestic Product caused by disasters.

Audit Objective

The main objective of the audit was to determine whether or not the Prime Minister's Office has effectively discharged a coordination function that will ensure measures for flood control are appropriately managed by relevant authorities/institutions to minimize risks and impacts brought about by floods in the country.

Assessment Criteria

Criteria were drawn from different sources (Policies, Legislations, Guidelines, Standards, Good Practices, and Strategic Plans) to assess (a) Government Preparedness of Flood Control Measures, (b) Enforcement and Execution of Flood Control Activities, (c) Coordination in the Implementation of Flood Control Activities, (d) Monitoring and Evaluation of the Effectiveness of Floods Control Measures.

Scope of the Audit

The main audited entity was the Prime Minister's Office. The audit focused mainly on assessing the available government measures in managing flood-related risks and impacts as well as the effectiveness of actions taken in the implementation of those measures. The period covered was from July 2015/16 to June 2019/20.

Audit Methodology

(i) **Sampling:** Purposive sampling method was used to select regions and clustered them into six geographical zones namely Northern, Southern, Central, Western, Eastern, and Lake Zone. The selection of regions was based on meeting a combination of criteria including geographical location, and the presence of features that may influence the occurrence of floods in identified locations. These features include aspects related to Urban Planning,

¹ World Bank Group, Global Facility of Disaster Reduction and Recovery; August 2019

Water Management, and Infrastructure Development. In addition, the selection of regions was based on the reported frequency of occurrence of floods within the past five years.

(ii) **Data Collection:** Interviews, document reviews, and observation methods were used in the collection of audit data.

(iii) **Data Analysis:** Content analysis methods were used to analyze qualitative data collected through interviews and document reviews. Likewise, quantitative data were compiled, organized, and summarized using excel and described in frequency tables and simple bar charts.

Key Findings

Increased Number of Reported Cases of Deaths due to Floods: The Audit revealed that from the years 2016 to 2020 there has been an increase in the number of reported deaths due to floods ranging between 17 in the year 2017 and 122 deaths in 2020. On the other hand, it was found that the proportion of the number of reported deaths due to floods compared to the cases reported from all other disasters was high in the year 2017 (77%) and for the year 2020, (91%).

Insufficient Supervision of Measures for Floods Control in Urban Planning Schemes: Despite being considered in Urban Planning Schemes, this Audit noted weaknesses in the supervision during the implementation of the prepared plans for measures to control flood impacts by the respective Planning Authorities. It was further noted that even for the well-thought-out planned areas, plot allocations took place before setting up common utility services such as the construction of stormwater drainage systems.

Inadequate Number of Roads with Road-Side Drainages: Despite considering and providing measures for flood control during the planning phase of road network designs, the Audit noted that currently there are no guidelines⁶ for disaster preparedness for road and bridge structures. The Audit revealed that in all visited LGAs there were less than 500 kilometres of the road network that were provided with the side-drainages with the percentage ranging between 0.5 to 15.0 of the available total road networks that range between 297 to 1,664 Km.

Insufficient Mechanisms to Ensure Integration of Measures for Flood Control: The Audit noted that there are no formal means from which the Prime Minister's Office use to ensure the implementation of the available measures for flood control are taking place as per standard requirements of each sector.

General Audit Conclusion

Generally, this Audit noted that the Prime Minister's Office (PMO) has not sufficiently guaranteed that the government institutions have measures in place to mitigate flood-related impacts in their jurisdictional areas. Moreover, the PMO has got no mechanism in place to ensure effectiveness in the implementation of such measures at all levels of government operations.

The Audit Office is of the view that much of the observed inefficiencies in the operation of flood control activities are attributed to the lack of a guiding National Disaster and Risk Management Framework along with the established strategy for actual implementation.

ANNEXURE: Photos indicating observed conditions that causes and/or lead to flooding in the visited areas during the audit



Surveyed and developed area previously identified as a flood-prone area (2019)



Cultivated Plantation (Forest) section that led to the accumulation of sediments along Msimbazi Reiver Downstream (*Source: Google Earth Pro-Satellite Pictures, 2020I*)



Observed part of Jangwani Bridge with accumulated debris/sediments (2020)



Observed impacts due to widening of river to the nearby residential houses along Msimbazi River caused by Rainfall (Autumn Season, 2020)



Paved tarmac roadway that lacks side drainages (2020)



Sand mining along the Mbezi River that crosses along Mbezi and Kawe Wards (2020)

