DETERMINANTS OF EFFECTIVENESS OF MONITORING AND EVALUATION SYSTEMS OF AGRICULTURE RELATED NGOS IN MOROGORO MUNICIPALITY, TANZANIA

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A DISSERTATION SUBMITTED IN PARTIAL FULFILMENT OF THE REQUIREMENTS FOR THE DEGREE OF MASTER OF ARTS IN PROJECT MANAGEMENT AND EVALUATION OF SOKOINE UNIVERSITY OF AGRICULTURE. MOROGORO, TANZANIA.

ABSTRACT

The effectiveness of the M&E systems on project performance has not been adequately established. This study assessed the determinants of effectiveness of NGOs' M&E systems. Specifically, the study assessed the effectiveness of selected NGOs' M&E systems, determined the influence of human resources on effectiveness of NGOs' M&E systems and analyzed factors influencing the effectiveness of NGOs' M&E systems. The study adopted a cross-sectional and descriptive research design whereby a total of 60 respondents were interviewed. Primary data were collected using questionnaire and checklist of question. The IBM SPSS statistics software was used for data analysis where descriptive statistics including percentages and frequencies were computed. Multiple response analysis was used to analyze factors influencing the effectiveness of NGOs' M&E systems. Results generally showed that, M&E systems in the NGO studied were highly effective. However, the process of stakeholder participation in developing and updating M&E plan seemed to have challenges that could pose problems in the effectiveness of the M&E systems. The study further revealed that experience of staff and training have an influence on human resources and have a contribution towards effectiveness of M&E systems. Further, the number of M&E personnel in organizations was an important aspect for effectiveness of the M&E systems. In addition, well performing staff, organization leadership, availability of funds and stakeholder participation were found to be influencing the effectiveness of M&E systems. It is recommended that participation of staff was an important aspect in NGOs as they make significant contributions to the effectiveness of the M&E systems. There should be also clear and active line of communication between staff and management. Resource allocation and investment in improving quality and quantity of staff is important for the NGOs' M&E systems to be effective. In addition, training to staff

is very crucial and should be promoted. Lastly, the study recommends a proper participatory implementation of the existing policy in M&E plans.

DECLARATION

I, Shayo Winfrida, do hereby declare to the Senate of Soko	ine University of Agı	riculture
that, this dissertation is my own original work that was	done within the pe	eriod of
registration; and that it has been neither submitted nor being	concurrently submitte	d in any
other academic institution.		
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ACKNOWLEDGEMENTS

I would like to express my gratitude to the Almighty God for giving me good health and taking care of me throughout the course of my study.

My special and sincere thanks go to my supervisors, Dr. Emmanuel T. Malisa and Dr. Raymond J. Salanga for their professional guidance and constructive comments throughout the process of producing this dissertation. I acknowledge their endless support, cooperation and consideration.

I wish to express my gratitudes to my beloved family especially my husband Dr. Winfred Mbungu for the material and moral support. May God bless him abundantly.

I am particularly grateful to my friends Neema Kalole, Daniel W. Mashele, and fellow master students Samata Mwishee and Frida Shoshiwa for their good friendship, prayers, cooperation, and contributions to shaping my work.

I am indebted to my daughter Charity and son Ethan for their love, moral support and patience during the course of my study; may the Almighty God bless them.

My sincere gratitude should also go to SAT, RECODA and MVIWATA officials for their cooperation during data collection processes.

Lastly I thank Mr. Haule of SAT, Mr. Laizer of RECODA and Ngolisa from MVIWATA, for their assistance in the logistics for data collection. God bless them.

DEDICATION

I dedicate this dissertation to my beloved husband, Dr. Winfred Mbungu and children, Ethan and Charity, for their affection and support throughout the period of my study. This work is also dedicated to my mother Christina Kanyagha, Hellen Mbije and my father Dr. N.E. Mbije, who together laid down the foundation of my education.

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LIST OF ABBREVIATIONS

CEO Chief Executive Officer

CRS Catholic Relief Services

FGD Focus Group Discussion

IFAD International Fund for Agricultural Development

IMF International Monetary Fund

KI Key Informant

M&E Monitoring and Evaluation

MVIWATA Mtandao wa Vikundi vya Wakulima Tanzania

NGOs Non-Governmental Organizations

ODA Official Development Assistance

OECD Organization for Economic Cooperation and Development

RECODA Research Community and Organizational Development

Associates

SAT Sustainable Agriculture Tanzania

UNAIDS United Nations Programme on HIV/AIDS

UNDP United Nations Development Programme

CHAPTER ONE

1.0 INTRODUCTION

1.1 Background Information

Non-governmental organizations (NGOs') work with communities around the world to complement the efforts of governments in improving the lives of people and are increasingly regarded as the development panacea (Mercer, 1999). The universal growth of the NGO sector is inherently related with the rise of an influential consensus, spearheaded by the international financial institutions of the World Bank and International Monetary Fund (IMF), over the need for political democracy, good governance and economic liberation, the progressing of the state and the encouragement of the private sector to step into the gap, on the other (Mercer, 1999). Governments around the world have experienced tremendous changes in the last few decades including globalization, technological changes, democratization and burgeoning population which have increased pressure on many communities, particularly in developing countries. This has created a void in service delivery by many governments, such that NGOs have stepped in to offer services that governments have been unable to provide (Lehman, 2007).

The role of NGOs has increased in many communities and there has been a known rhetoric surrounding NGOs that, they are capable to deliver higher-quality services than the government to the very poorest sectors of the society, while remaining cost-effective and efficient (Vivian,1994). According to Jennings (2008), the growth of NGOs basically was a result of shifts in the 1980s that saw NGOs gain favored status among major donors as conduits for international official development assistance (ODA). However, the ability of NGOs to fulfill these widespread objectives has increasingly been questioned, prompting them to introduce a tracking mechanism to monitor and evaluate progress and outcome.

According to the World Health Organization (2006), improving performance and achieving results of any project depends on the effectiveness of the M&E processes. Although many projects have been implemented by different NGOs around the world, concerns and interests on performance and effectiveness of the projects have emerged (Micah and Luketero, 2017) from NGO practitioners, governments, citizens, donors, policy makers and people in academia (Kareithi and Lund, 2012).

In Tanzania, like in many other developing countries, calls for effectiveness and sustainability of projects implemented by NGOs have put many NGOs on the alert and have forced them to undertake rigorous and introduce measurable indicators of output, impact and capacity (Ahmed, 2004). M&E is an essential public management tool that can be used to improve the way governments and organizations achieve results. In responding to the needs by donors, NGOs are increasingly molded by procedural systems designed to assure that funds do not go astray and that they have a developmental impact. Different types of projects need different types of M&E systems. The most popular M&E systems with project managers are the ones developed on M&E matrix, based on the logical framework approach to M&E (Welsh et al., 2005).

1.2 Problem Statement and Justification of the Study

1.2.1 Problem statement

Globally, M&E systems have been in existence since the ancient times (Kusek and Rist, 2004). In recent years, M&E has become a necessary requirement for projects. M&E, although very essential on improving performance, are also very complex multidisciplinary and skill intensive process (Ronnete and Tania, 2010). In showing the importance of M&E systems, UNDP (2009) argues that, good planning; combined with effective M&E can help in improving the effectiveness of the development programmes and projects. However, the

requirement for M&E systems as a management tool to show performance has grown with a call of stakeholders for accountability and transparency (Gaarder and Briceno, 2010).

In Tanzania, the growing number of NGOs requiring M&E can be evidenced by the increasing number of advertisements looking for M&E experts and requests for expression of interest for M&E consultancies in the local daily newspapers. However, NGOs are encountered with several challenges in addition to inability to resourcefully respond to changing needs (Ronnette and Tania, 2010). Despite M&E being in use in many NGOs, studies have shown that, few organizations have confidence in M&E partly because their influence on project performance is not well understood (Nyonje *et al.*, 2012). Dobi (2012) and Njuguna (2016) reported that evaluation is still weak in most NGOs and the dedication given to M&E is not firm throughout the project cycle.

The effectiveness of M&E systems on project performance is also not sufficiently established making NGOs view the practice of M&E as an extra burden of little or no benefit at all. Therefore, this study attempted to examine the determinants of effectiveness of NGOs M&E systems using selected agriculture related NGOs' in Morogoro Municipality.

1.2.2 Justification of the study

The study is important to NGOs, donor agencies and project staff in better understanding M&E systems, for better M&E of projects, programmes and policies. In addition, findings may be used by NGOs in learning and improving project planning, implementation and management. The government also could adopt the results in planning and formulating its projects that focus on improving overall performance. The study recommendations are also helpful in strengthening the effectiveness of M&E systems in projects and programmes by

suggesting measures to avoid pitfalls that may lead to failure of M&E systems. Finally, this study helps to improve the quality of planning, management and improve the performance of the government projects and programmes complying with government strategy to improve performance for economic transformation and industrialization for human development.

1.3 Objectives of the Study

1.3.1 General objective

The overall objective of the study was to assess the determinants of the NGOs' M&E systems' effectiveness.

1.3.2 Specific objectives

The specific objectives were:

- i. To assess the effectiveness of selected NGOs' M&E systems.
- ii. To determine the influence of human resource on effectiveness of NGOs' M&E systems.
- iii. To analyse factors influencing the effectiveness of NGOs' M&E systems.

1.4 Research Questions

The study answered the following research questions:

- i. What is the effectiveness of M&E systems in NGOs'?
- ii. How human resource influences the effectiveness of M&E systems in NGOs'?
- iii. What are the factors influencing the effectiveness of M&E systems in NGOs'?

1.5 Conceptual Framework

A conceptual framework is defined as a network or a "plan" of linked concepts. It shows the relationships among relevant factors that may influence the successful achievement of goals and objectives. It helps to determine which factors will influence and how each of these factors might relate to and affect the outcomes Jabareen (2009). The conceptual framework proposed in this study is presented in Figure 1. It follows that independent variables were M&E systems components, human resources for M&E as well as factors for effectiveness of M&E systems. These variables affect the state of M&E systems and therefore the dependent variable is effective M&E systems.

This study has three independent variables of M&E that a researcher found critical in projects implementation. M&E systems have been considered as key aspect in effective implementation of the project and successful of the projects. According to Onyango (2017), M&E systems is a dire aspect for ensuring that projects are implemented successful due to its significant role in enabling the process to take place through provision of the relevant information needed in the M&E activities.

1.5.1 Human resource

Human resource is very crucial in M&E process. Human resource components include attitudes towards implementation, skill, experience together with training which play significant role towards successfulness of M&E systems effectiveness. M&E systems need skilled people who effectively perform the M&E tasks for which they are responsible (Kusek and Gorgens, 2009). M&E staff can have positive or negative effects on the M&E systems when have adequate skills in M&E can agitate robust M&E systems in the organization.

1.5.2 Factors influencing effectiveness of M&E systems

Effective M&E systems can help to recognizing promising programs or practices. They can also identify unintended, but perhaps useful, project, program and policy results. M&E systems can help managers identify program weaknesses and take action to correct them.

M&E can be used to reduce fear within organizations and governments and to foster an open atmosphere in which people learn from mistakes, make improvements and develop skills along the way (Kusek and Gorgens, 2009).

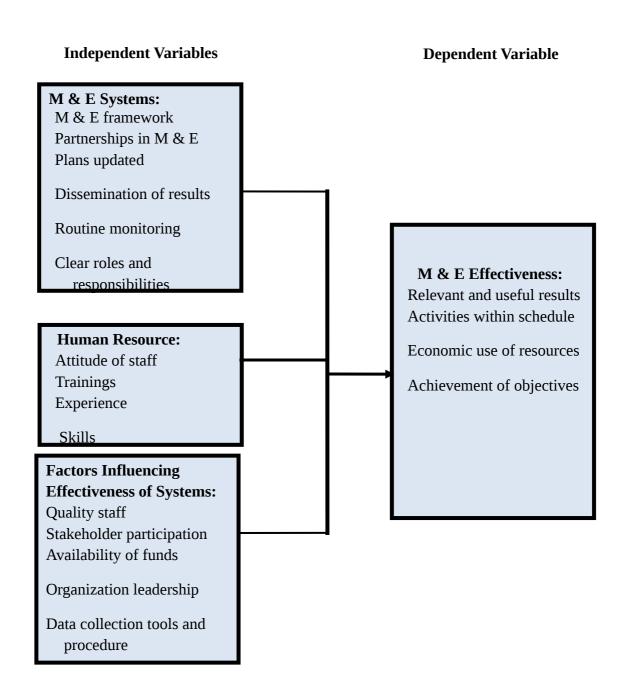


Figure 1: Conceptual framework

Source: Author (2020)

CHAPTER TWO

2.0 LITERATURE REVIEW

2.1 Definitions of Key Terms

Effectiveness: this is the degree of producing successful desired or intended result (Goldense, 2016).

Monitoring and Evaluation System: this is a set of components which are related to each other within a structure and serve a common purpose of tracking the implementation and results of a project or policy (UNDP, 2009).

Monitoring and Evaluation systems effectiveness: is the ability of the systems to produce expected goals and relevant findings and results within planned budget and schedule (OECD, 2002).

2.2 Monitoring and Evaluation Systems

Monitoring is the ongoing process by which stakeholders obtain regular feedback on the progress being made towards achieving their goals and objectives. (UNDP, 2009). While evaluation refers to a rigorous and independent assessment of either completed or ongoing activities to determine the extent to which they are achieving stated objectives and contributing to decision making (UNDP, 2009). The key distinction between the two is that evaluations are done independently to provide managers and staff with an objective assessment of whether or not they are on track (UNDP, 2009). However, the aims of both M&E are very similar: that is to provide information that can help inform decisions, improve performance and achieve planned results. M&E systems refer to all the tools, indicators and processes that will be used to measure if a program has been implemented

according to the plan (monitoring) and is having desired result (evaluation). M&E systems are often described in a document called M&E plan. M&E systems deliver regular responses on the level to which the projects attaining their goals spot likely problems stage and recommended possible solutions. It monitors the effectiveness with which the various parts of the project are being implemented and recommended improvements, appraise the extent to which the project is able to realize its general objectives and offer guidelines for the development of future projects (UNAIDS, 2008).

According to UNAIDS (2008), there are twelve components of a functional M&E namely: structure and organizational alignment form M&E human capacity for M&E systems; M&E partnerships; M&E plans; costed M&E work plans; advocacy, communication and culture for M&E systems; routine monitoring; periodic surveys; databases useful to M&E systems; supportive supervision and data auditing; evaluation and research; and using information to improve results.

2.3 Performance of Monitoring and Evaluation Systems

The structural arrangements of M&E systems are important from a number of perspectives; one is the need to safeguard the objectivity, credibility and accuracy of the M&E information that the systems produce (Mackay, 2006). Khan *et al.*, 2003, concurs that the conceptual design of M&E systems need to address issues with regard to the objectives of the systems, competent authority, credibility of information, its management, dissemination and recycling into the planning process with special emphasis on community participation. M&E systems should be built in such a way that there is a demand for results information at every level that data are collected and analyzed. Furthermore, clear roles, responsibilities, formal organizational and political lines of authority must be established (Kusek and Rist, 2004).

There is often a need for some structural support from M&E, such as a separate evaluation unit which at the very least needs one person who is the internal champion identified to make sure the system is implemented and develops. Moreover, the systems must be consistent with the values at the heart of the organization and work in support of the strategy (Rick, 2001). According to Taut (2007), self- evaluation capacity building in a large international development organization, indicates low organizational readiness for learning from evaluation. Moreover, 9 interviewees similarly described a lack of open, transparent and critical intra-organizational dialogue and a lack of formal structures and processes to encourage reflection and learning as an organizational habit. At the same time, there was rather high awareness of the potential for evaluation to be used as a tool for learning and demand voiced for such evaluations.

2.4 Role of Human Resources on Effectiveness of Monitoring and Evaluation Systems

Human resource, skills and competencies is vital for the production of M&E results. The M&E systems cannot function without skilled people who effectively perform the M&E tasks for which they are responsible. Therefore, understanding the skills needed and the capacity of people involved in the M&E systems and addressing capacity gaps is crucial in M&E systems (Kusek and Gorgens, 2009). According to Acevedo *et al.* (2010), staffing is one of the critical factors underlying project success, calibre of project staff and their commitment to overall project objectives and degree of empathy with the intended beneficiaries all contribute to the more successful projects. Human resource seems as important aspect in implementation of M&E works, UNDP (2009) emphasizes that human resource is essential for an effective M&E, they affirming that staff working should possess the required technical expertise in the area in order to ensure high-quality M&E. M&E carried out by untrained and inexperienced people is bound to be time consuming,

costly and the results generated could be impractical and irrelevant. Therefore, this will definitely impact the success of projects (Nabris, 2002).

2.5 Determinant Factors for Monitoring and Evaluation Systems Effectiveness

Mugambi and Kanda (2013) observed that M&E of community-based projects are affected by many factors which should be borne in mind when conducting M&E. It should be noted that the M&E steps are interconnected and should be viewed as part of a mutually supportive M&E systems. M&E planning should be done by those who use the information. Involvement of project staff and key stakeholders ensures feasibility, understanding and ownership of the M&E systems quickly after the project design stage. Early M&E planning allows for preparation of adequate time, resources and personnel before project implementation, it also informs the project design process itself as it requires people to realistically consider how practical it is to do everything they intend to measure.

2.5.1 Availability and level of funding

The availability and level of funding has the influence on M&E systems effectiveness therefore, project budgeting need to be clear and adequate enough for the provision of M&E activities. Kelly and Magongo (2004) reported that M&E budget should range 5 to 10 percent of total project's budget and this will give the M&E unit adequate resources to ensure its effectiveness.

However, Gitonga (2012) stated that there is no specific percentage to be allocated for M&E unit but it normally ranges from 2.5 to 10 percent depending with the overall budget of the project. Gitonga further states that the more participatory M&E is, the higher its budget. Frankel and Gage (2016) concur with Gitonga (2012) by stating that there is no

fixed formula for proportion of project's budget to be allocated to M&E but most donors and organizations recommend from 3 to 10 percent of the project's budget.

For increasing organizational performance every organization need sufficient fund and specifically fund allocation to M&E unit this will help foster performance of the M&E systems hence effectiveness of the systems. According to Chaplowe (2008), insufficient fund specifically allocated for M&E has led to poor performance of the M&E systems which leads to poor performance of the project and project failure, despite the fact that the project itself having sufficient fund. Generally, every organization should have M&E budget and that budget should not be too little to affect the accuracy and credibility of the results and it shouldn't consume much resources to the extent of interfering with other projects activities.

2.5.2 Stakeholder participation

Stakeholders in M&E are those people who have a stake in the projects and programmes. They are the ones who take decisions in using the M&E data and findings. These include; the community whose situation the programme seeks to change; project field staff who implement activities; programme managers who oversee programme implementation; funders and other decision makers who decide the course of action related to the programme; supporters, critics and other stakeholders who influence the programme environment (UNDP, 2009). UNDP (2009), found that stakeholder participation in programme, either as a central decision makers, communities affected by the programme, local level implementers, in a programme plan, design, implementation and M&E. This improves programme quality and helps to address local development needs. Furthermore, increases the sense of national and local ownership of programme activities and ultimately promotes the likelihood that the programme activities and their impact would be

sustainable. However, exactly what programme stakeholders are involved in M&E varies according to the purpose of M&E and the general institutional receptiveness to the use of participatory approaches. In each instance, programme managers must decide which group of stakeholders should be involved, to what extent and how.

The level to which different partners and stakeholders are involved at different steps in the process will vary (UNDP, 2009). Some need only be informed of the process while it would be important for others to be involved in a decision-making capacity. Because M&E has important capacity development and learning dimensions, decisions about who is involved and to what extent will it impact upon the results. In general, the greater the level of involvement the more likely it is that evaluative knowledge will be used. It is important to note that greater participation of partners or stakeholders or both often implies greater costs and sometimes can lead to a reduction in effectiveness and efficiency. Nevertheless, by strategically involving stakeholders and partners, participatory M&E can positively influence the degree of ownership of the results and sustainability. Partnering closely with key stakeholders throughout the M&E process promotes shared knowledge creation and learning, helps transfer skills and development of capacity (UNDP, 2009). The stakeholders also provide valuable feedback that can be used to improve performance and learning. In this way, good practices at the heart of M&E are continually reinforced, making a positive contribution to the overall effectiveness of development.

2.5.3 Organizational role towards effectiveness of M&E systems in organization

The organization's leaders should support and be involved in the M&E activities for the process to be effective and successful. Project managers, M&E staffs and project officers should be involved directly but the organization senior management involvement should be indirect. In fact, they should carry out some monitoring activities as part of their overall

work and from time to time monitor and evaluate their operations. Khan *et al.* (2003) found out the involvement of management in M&E activities improves the credibility of the M&E process and guarantees increased acceptance of the findings. To improve the success of the M&E systems, the management needs to support it (World Bank, 2011). According to Mark and Pfeiffer (2011), management plays a big role in designing the systems, allocation of resources, communication of results and making key decisions which affect projects and M&E activities. Their commitment to the implementation of M&E systems is therefore vital. It is through that they will ensure that adequate funds and other resources are allocated to M&E. If there is no commitment and support from organization's management, then the M&E systems will perform poorly leading to ineffectiveness.

2.5.4 Quality staff

For the effective M&E systems, organizations need quality staffs to perform roles and responsibilities of M&E. CRS (2011) explained that, responsibility of the organizations is to ensure that all staff members have a clear understanding of the project and their role in M&E; also staff capacity to implement the project M&E systems often requires significant strengthening. Even staff with extensive experience in M&E should be trained on the specific objectives, tools and protocols for each M&E activity to ensure that there is consistency and quality CRS (2011) further explained that, the management is responsible to communicate the M&E systems to all project staff develop a plan to ensure that all staff members involved in implementing the project understands the M&E systems and their responsibilities within it.

Roles include data gathering, data entry, data analysis, report writing and using data to manage the project. Each person needs to have a good overview of the M&E systems, how

it operates and his or her specific responsibilities. This will guarantee accurate data, collected in a timely manner and used to keep the project on track to achieve its stated objectives.

CHAPTER THREE

3.0 METHODOLOGY

3.1 Study Area

The study was carried out in Morogoro Municipality, in Morogoro Region. Morogoro Municipality is located in the eastern part of Tanzania, 196 kilometers West of Dar es Salaam, with a population of 315 866 (based on 2012 census). Dodoma City, which is Tanzania's capital city, is located about 260 kilometers from Morogoro. Morogoro Urban District is one of the seven (7) districts of Morogoro Region and contains the Morogoro town which administratively is called Morogoro Municipal. Geographically, Morogoro town is located at 6° 49' 15.67" South in latitude and 37° 39'40.39" East in longitude with an elevation of around 500 m above mean sea level. This study involved three selected NGOs which are working in agricultural-related activities and whose offices are located in Morogoro Municipality. The study targeted NGOs that practice M&E using a defined M&E systems. These are Sustainable Agriculture Tanzania (SAT), Research, Community and Organizational Development Associates (RECODA) and *Mtandao wa Vikundi vya Wakulima Tanzania* (MVIWATA) (Figure 2).

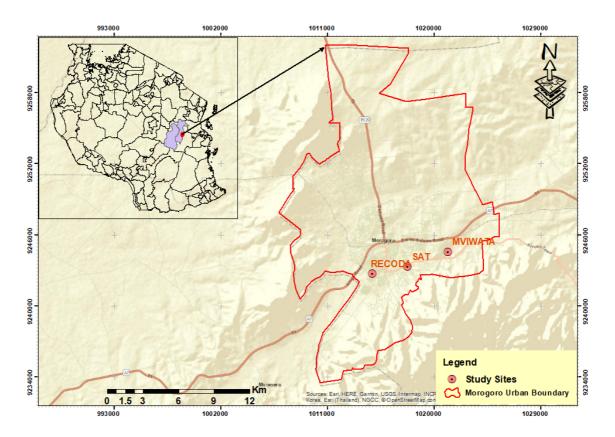


Figure 2: Location of the Study Area and Study Sites in Morogoro Municipality

3.2 Research Design

A cross-sectional research design was used in this study. According to Creswell (2014), the design allows data to be collected from multiple cases at one point in time. In this type of research design, data can be collected at a single point of time and can be used in a descriptive study for determining the relationship between variables (Babbie, 1990). Furthermore, the design approach is considered to be favourable and effective when faced with the challenge of limited resources especially time.

In addition, descriptive research design was used to describe determinants of effectiveness of NGOs' M&E systems. Descriptive research design deals with conditions or relationships that exist, opinions that are held, process that is going on, effects that are evident, or trends that are developing (Kumar, 2005). Mwangi *et al.* (2015) used descriptive statistics in a

study of factors affecting the effectiveness of M&E of constituency development fund projects in Kenya.

Muiga (2015) also used descriptive survey research design to ascertain and make assertions on how level of training of personnel, budgetary allocation, stakeholder participation, and political influence affect effectiveness of M&E of public projects. Umugwaneza and Kule (2016) used descriptive statistics in the study of role of M&E on project sustainability in Rwanda. Furthermore, Mugera and Sang (2017) also used descriptive statistics in examining the factors influencing the adoption of M&E systems among Non-Governmental Organizations in Murang'a County, Kenya.

3.3 Study Population

According to Best and Kahn (2006), "A population is defined as any group of individuals who have one or more characteristics in common that are of interest to the researcher. In view of that, the target population for the study constituted M&E staff, field officers and project managers from agriculture-related NGOs from Morogoro Municipality.

3.4 Sampling Procedure and Sample Size

Purposive sampling was used to select agriculture-related NGOs which have well-defined M&E systems within Morogoro Municipality. Based on this criterion, three organizations were selected which included SAT, RECODA and MVIWATA. Multistage sampling was employed to select respondents from the NGOs; the technique was preferred because it allows the use of both probability and non-probability sampling techniques. In this regard, organization's employees were clustered into three categories namely project managers/coordinators, M&E staff and project officers (other members); then from each cluster respondents adequate for the study were randomly selected. Another selection

criterion was gender and therefore both males and females were included in the sample. In an attempt to assess the status of NGOs' M&E systems, components of M&E systems used to measure the effective of the systems within organization. MVIWATA was also selected to represent other selected NGOs' in the analysis of objective number one; MVIWATA was selected as they had sufficient number of staff at the time research was conducted. A total of 30 respondents were used in the analysis of objective number one. According to Maas and Joop (2005), the sample size of at least 30 respondents is reasonably large in social science research studies to ensure normal distribution of the sample mean.

A sample size is basically a subset of the population and therefore it is a portion that represents a whole population (Kadam and Bhalerao, 2010). The concept of sample arises from the inability of the researchers to test all the individuals in a given population. Generally, the sample size should neither be extremely large nor too small as it should be optimal. Optimal sample size is one that accomplishes the needs of efficient representativeness, reliability and flexibility. As noted by Bailey (1994) a minimum of 30 respondents are reasonable in drawing a conclusion for a quantitative study.

In responding objective number two and number three, a total of 60 staffs were interviewed from three agriculture-related NGOs with a well-defined M&E systems. The opinions were gathered from different NGOs as the researcher aimed at seeking different opinions for the determinants for effectiveness of NGOs M&E systems. Besides the 60 respondents for questionnaire administration, four key informants were consulted for qualitative data collection. Key informants included three programme officers and one organization director.

3.5 Methods for Data Collection

Primary data were collected based on the study objectives using qualitative and quantitative methods. A structured questionnaire comprised of open and close-ended questions was developed and administered to the respondents to collect quantitative data, while for qualitative information a key informant interview guide was developed and used to collect information from programme officers and organization's Chief Executive Officers (CEOs) or directors. Data collection instruments were first pre-tested to ten (10) project officers and M&E officers from different organizations in Morogoro Municipality. Thereafter, necessary amendments to take care of omissions and restructuring were made in order to ensure validity and reliability of the instruments.

3.6 Data Processing and Analysis

The collected quantitative data were collated, summarized, coded and analyzed using IBM SPSS statistics software version 20. The qualitative data from the key informant interviews were used to supplement information from interviewed respondents. Descriptive statistics such as frequencies and percentages were computed in the analysis.

For the first objective, to determine the opinion of respondents on the effectiveness of M&E systems of the selected NGO, Likert scale was used. The scale comprised a total of 9 statements. The respondents were asked to indicate if they strongly agreed (1), agreed (2), were neutral (3), disagreed (4) or strongly disagreed (5) with each of the statements. The responses were then grouped into three categories because it could be difficult to notice difference between strongly agree and agree also strongly disagree and disagree. Another reason was to avoid repetition of words. In this regard, strongly agree and agree were grouped into disagree and neutral was left to stand alone.

To find general responses whether the systems is not effective, is moderately effective or is highly effective the cutoff point was established. The highest possible score was 45 points (i.e. 9x5); 27 was the mid score (9x3); and the lowest possible score was 9 (i.e. 9x1). Therefore, the range of scores for not effective was from 9 to 26; the score of 27 indicates moderately effective, and the range of scores for highly effective was from 28 to 45.

For the second objective, to determine the influence of human resource on effectiveness of NGOs M&E systems, frequencies and percentage distribution were used; Likert scale was also used to solicit opinions pertaining to human resource towards effectiveness of NGOs' M&E systems.

For the third objective multiple response analysis was applied to analyse factors that influence effectiveness of NGOs' M&E systems. The data analysed include respondents' responses from different agriculture-related NGOs in Morogoro Municipality.

3.7 Limitations of the Study

- i. The main limitation of this study was readiness of some NGOs to allow the researcher to conduct research in their organizations. This limitation was mitigated by reducing the number of NGOs planned to collect data from. The researcher collected data from few organizations and increased the number of respondents from those organizations.
- ii. Some respondents were not available and others did not have enough time to provide required information due to their busy schedules and prolonged the exercise of data collection. The researcher asked for permission from respondents to collect data after working hours and some of the respondents who were not able

- to fill in questionnaires under the supervision of the researcher, filled those questionnaires on their own and submitted the same to the researcher afterwards.
- iii. Lastly, some respondents were not willing to provide required information and feedback due to fear of victimization by their superiors. This to some extent resulted in some respondents not participating in the study. For those who were willing to participate, the researcher tried to explain and assured them that the information would be treated with confidentiality.

CHAPTER FOUR

4.0 RESULTS AND DISCUSSION

4.1 Socio-demographic Characteristics of the Respondents

Socio-demographic characteristics discussed include sex and education level.

4.1.1 Sex and education level of the respondents

The results included in Table 1 show that 51.7% of the respondents were male while 48.3% were female. The results indicate slight differences in sex implying that both males and females were involved in monitoring and evaluation activities amongst the selected NGOs. In respect of the education level of the respondents, 70% of the respondents had attained bachelor degree while only 30% had attained diploma. This entails that the respondents had knowledge, capacity and skills to carry out M&E activities effectively in their organizations.

Table 1: Socio-demographic characteristics of the respondents (n=60)

Category	Variable	Number	Percent
Sex	Male	31	51.7
	Female	29	48.3
Education level	Diploma	18	30.0
	Bachelor degree	42	70.0

4.2 Effectiveness of NGOs' Monitoring and Evaluation Systems

4.2.1 Statements on effectiveness of NGOs' monitoring and evaluation systems

The study findings presented in Table 2, concerning the effectiveness of NGOs' M&E systems, show that nearly all respondents (93.3%) agreed that their organization had an M&E framework that provided guidance on M&E implementation in the project. On this, key informant 1 said:

"We have an M&E plan for the whole organization and we prepare an M&E framework/plan for each project depending on the donor and project requirements. So, the implementation of M&E activities is based on project M&E framework/plan. (KI from MVIWATA, April 18, 2019).

The key informant argued further that:

"We have strategic plan which guides our implementation of projects within five years and normally that strategic plan is updated annually. From that strategic plan we produce M&E framework which responds to that five years' strategic plan for each of the projects we have and we use that framework to guide the implementation of specific projects". (KI 1, from MVIWATA, April 18, 2019).

Furthermore, the majority (93.3%) of the respondents agreed that the M&E plan had adequately addressed the organizations' data needs, while 6.7% were not sure. On this, a key informant two (2) explained:

"We have sufficient number of project officers/facilitators who are distributed equally to each project depending on diversity and nature of the project. The plan also indicates that field officers/facilitators need to go to the field at least twice in a week to collect information and make follow ups. Furthermore, we are using modern technologies of data collection, the only concern to the management and M&E unit is to ensure M&E tools match with the targeted goals". (KI 2, from MVIWATA, April 30, 2019).

Concerning the roles and responsibilities, 96.6% of the respondents agreed with the statement that the M&E plans clearly define the roles and responsibilities in a way that

warrants a functioning M&E systems. In clarification of this, M&E officer from MVIWATA said:

"M&E plan indicates what should be done and clearly defines roles and responsibilities of every staff. Furthermore, all of our plans responsibilities are well allocated to project staffs. This helps easy tracking of activities and shows who should report on the activities" (April 23, 2019).

For the quantitative sample, majority (83.3%) of the respondents agreed that M&E systems made it easy and quick to realize the agreed objectives with effective and efficient resource use key informants one (1) explained as follows:

M&E plan shows targets to be achieved, description of activities and time of activities to be done and the expected cost of all the activities, so everything is in order for us to embark the work (KI 1, from MVIWATA, April 1, 2019).

On distribution of results and findings from M&E, 70% of the respondents agreed with the statement that results and findings from M&E are usually distributed and timely received while 10% of the respondents disagreed with the statement. M&E findings and results from project implementation require to be utilized in strengthening impending activities and in planning for future interventions. Therefore, the findings need to be distributed to all stakeholders timely. The fact that 10% did not support the statement indicates that probably the M&E systems did not adequately allow timely distribution of findings from M&E. The findings are in line with that of Pius (2017), which showed that stakeholders agreed that the results and findings from M&E are distributed but not timely obtained. For those who disagreed with the statement the main reason provided was that findings were usually distributed but sometimes they delayed to distribute them. Key informant two (2) explained as follows:

"We normally distribute results and findings from M&E through weekly meetings and quarterly meetings. We also share results through emails and we have social network groups that we use as platforms to share our information. Sometimes the information distribution is delayed because of uncontrolled circumstances but the desk is always open for individual staff or any other stakeholder who is in need of the results and findings". (KI 2, from MVIWATA, April 30, 2019).

Key informant two (2) informed further that:

"We have weekly meetings on Mondays and Fridays, and we have quarterly meetings and technical meetings. All of these are used as a platform to share results and information and this is at the organization level. We distribute results and findings to other stakeholders via emails and sometimes we deliver as printed documents" (KI 2, from MVIWATA, April 30, 2019).

Study findings show that majority (93.3%) of the respondents agreed with the statement that the organization has routine monitoring that ensures project activities are implemented within schedule. On this; key informant (1) argued that:

"The framework/plan requires frequent visits to the field and project officers are responsible for it. They go to the field at least twice in a week. To make follow ups of this we introduced platforms (yammer application and whatsApp groups) for sharing reports of activities done in the field and sometimes the director goes to the field to check on activity implementation" (KI 1 from MVIWATA, April 18, 2019).

To be effective, an M&E plan ought to be regularly updated (Frankel and Gage, 2016). When asked as to whether or not they had been updating their organization's M&E plan,

73.3% of the respondents indicated that there was periodic (at 12 months' interval) updating of their organization's M&E plan. A key informant two (2) said:

"Our M&E frameworks are updated, usually on yearly basis depending on the project life span and donor requirements" (KI 2, from MVIWATA, April 30, 2019).

When asked about the process of developing and updating their organization's M&E plans, 83.3% of the respondents indicated that the process ensured stakeholders participation. However, 3.3% of the respondents had neutral opinion while 13.4 % disagreed with the statement. For those who disagreed, it mentioned that they did not even know when and how those activities were conducted within their organization and they suggested that, the process needs to be open so that all stakeholders, especially implementers, can have an opportunity to provide their contribution for improvements. According to UNDP (2009), it is important to engage stakeholders in all stages of planning, monitoring, evaluating, learning and improving; it stimulates ownership, commitment, and motivates action.

Further findings from the study point out 83.3% of the respondents were of the opinion that the M&E plans, in totality adequately describe the implementation of all components of the organization's M&E systems (Table 2). This is an important aspect of M&E systems effectiveness because, according to UNAIDS (2009), M&E plan describes the M&E systems.

Table 2: Effectiveness of monitoring and evaluation systems

Statement Agree Neutral Disagree

The organization has M&E framework / plan that provide	28(93.3)	0	2(6.7)
guidance for M&E implementation in the project.			
The M&E plan we have addresses the organizations data	28(93.3)	0	2(6.7)
needs adequately.			
The plans clearly define roles and responsibilities in a way	29(96.7)	0	1(3.3)
that warrants a functioning M&E systems within			
organization.			
M&E systems make it easy and quick to realize the agreed	25(83.3)	3(10.0)	2(6.7)
objectives with effective and efficient resource use.			
Results and findings from M&E are usually distributed and	21(70.0)	6(20.0)	3 (10.0)
timely obtained.			
The organization has routine monitoring that ensures project	28(93.3)	0	2(6.7)
activities implemented within schedule.			
The M&E plan is updated periodically (12 months interval)	22(73.3)	5 (16.7)	3(10.0)
within organization			
Usually, stakeholders participate in developing or updating	25(83.3)	1(3.3)	4 (13.4)
the M&E plan.			
The plans, in totality adequately describes the	25(83.3)	3(10.0)	2(6.7)
implementation of all components of the organization's			
M&E systems			

4.2.2 Overall opinion on effectiveness of organization's M&E systems

Table 3 presents findings on the overall opinions on effectiveness of organization's M&E systems. Majority (96.7%) of the interviewed respondents indicated that their organization has highly effective M&E systems. About 3.3% of the respondents indicated that their organization had moderately effective M&E systems. This implies that the organization M&E systems are highly effective, because all components of M&E systems within

organization are well described and adequately implemented. Key informant one (1) from MVIWATA emphasized by saying:

"In our organization we have a M&E unit; we normally prepare plans which adequately describe all components of M&E systems and which guides implementation of our activities; so I consider the MVIWATA's M&E systems to be highly effective".

Table 3: Overall opinions on effectiveness of organization's M&E systems

Organization evaluation	Frequency	Percent
Not effective	0	0.0
Moderately effective	1	3.3
Highly effective	29	96.7

The results are in line with the studies conducted by Busilie (2017) and Kamau (2017) pointed out that, high proportion of respondents show that organizations with highly effective M&E systems are those organizations corresponded with adequate descriptions and implementation of all components of M&E systems, together with sufficient and proper allocation of resources, technical expertise of staff and leadership skills.

4.3 Influence of Human Resources on Effectiveness of M&E Systems

4.3.1 Respondents profession

The findings in Table 4 regarding the respondents' professions indicate that majority of the respondents were project officers who comprised about 61.7% of the respondents. This was followed by project managers who made about 25% of the respondents and M&E staff who comprised of 13.3% of the respondents.

Study findings indicate the majority of the respondents were project officers and the reason is, because they are the ones who carry out day to day project activities. M&E unit / desks are usually small. This means that the section comprised of a few staff. M&E staff only

cross- check all the activities they had done. The number of M&E staff is determined by the size and number of projects within organization. M&E desk/unit is small because its main duty is to assess if the agreed objectives are met effectively and efficient resource use. One M&E officer was quoted as saying.

"Our work is like that of an auditor. You can have internal evaluators and external evaluators, who work to check implementation of the activities to reach the targeted goals and to gauge if they are achieved as planned with effectiveness and efficient utilization of resources. So, in practice, you do not need many workers to evaluate the project" (M&E officer from RECODA, March 28, 2019).

Table 4: Respondents profession (n=60)

Position	Number	Percent
Project manager/coordinator	15	25.0
M&E staff	8	13.3
Project officer	37	61.7

4.3.2 Working experience of the respondents

From the results, majority (71.7%) of the respondents had worked for their organizations for 1-3 years followed by 26.7% who had worked for 4-6 years while, only 1.7% of the respondents had worked for their respective organizations for a period of 7-9 years. None of the respondents had worked for more than 10 years or less than a year. The results imply that, the respondents were conversant enough with their organizations to provide valuable information about determinants of effectiveness of M&E systems within their organization. Study findings in Table 5 show that majority (71.7%) of the respondents had experience of 1-3 years, 26.7% had experience of 4-6 years and 1.7% had experience of 7.9 years. The findings imply that most of workers are still in the learning stage and hence more

capacity building needed to reach at the stage of effective use of M&E systems. One of the M&E staff insisted that:-

"M&E is still at initial stage more resources investment needed. We need to invest more on capacity building of workers to get quality staff and allocate enough budgets to the M&E activities that will results to effectiveness of M&E" (M&E staff from SAT, May 04,2019).

Table 5: Working experience of the respondents (n=60)

Years of working	Number	Percent
1-3 years	43	71.7
4-6 years	16	26.7
7-9 years	1	1.7

4.3.3 Organization's M&E unit staff

Results in Table 6 show that majority of the respondents (70%) had one M&E staff in their organization; followed by 28.3% who reported that they were having two M&E staffs and 1.7% reported that they were having three M&E staffs. These results imply that organizations/projects are having one M&E staff and this may hinder the implementation of M&E activities towards effectiveness of the project. Only one staff in the unit sometimes can be overloaded with many activities. In addition, there are no one with the same expertise within the organization to help and share ideas so as they can have good work. UNAIDS (2008) asserted that, it is important to have sufficient number of workers, committed and experienced M&E staff. M&E officer said:-

"Working alone in the unit is tricky. Sometimes, I make mistakes and I am alone no one with the same profession to correct me. In addition to that, when I am not around no one is available to take care of my duties so when I come back; I am overloaded with many activities" (M&E staff from SAT, May 04, 2019).

Table 6: Organizations' number of M&E staff (n=60)

Number of staff	Number	Percent
1 staff	42	70.0
2 staff	17	28.3
3 staff	1	1.7

4.3.4 Statements on influence of human resource on effectiveness of M&E systems

The findings in Table 7 show that 95% of the respondents agreed that, experience of staff influences effectiveness of the M&E systems in the organization and 5% disagreed with the statement. The results imply that experience of staff is significant in achieving effectiveness of M&E systems in the organizations. Mulandi (2013) indicated that experience of staff contributed to the effectiveness of M&E systems in NGOs within the Nairobi City in Kenya.

Further findings of the study, indicate that 85% of the respondents agreed with the statement that organizations' staff have positive attitudes towards the implementation of M&E while 10% disagreed and 5% were not sure with the statement. During interview one project officer from MVIWATA explained:

"We are trained and learning about the activities and implementation of M&E, therefore carrying out M&E is a part and parcel of our responsibilities" (Project officer from MVIWATA, April 10, 2019).

Key informant from MVIWATA insisted

"When you train or coach staff about the implementation of M&E and importance of it, they take it as their responsibility and not as an extra work or burden. So, our staff carries out M&E activities with a positive attitude" (KI 2, from MVIWATA, April 30, 2019).

Moreover, the results in Table 7 indicate that 90% of respondents agreed with the statement that staff skills contribute to the effectiveness of M&E systems. However, 8.3% of the respondents were not sure and 1.7% disagreed with that statement. The results imply that staff's skills are necessary to the effectiveness of M&E systems. Further findings indicate that 83.6% of the respondents agreed with the statements that organization ensures that staffs are trained on M&E regularly.

Lastly, all respondents agreed with the statement that training given to staff increase the quality of M&E human resource to perform M&E effectively. This reveals that training based on M&E needed to improve the effectiveness of M&E systems. The findings are in line with Pius (2017) who observed that the level of training given to staff influences the ability to perform M&E effectively. Moreover, Acevedo *et al.* (2010) identified that, both formal training and work experience are essential in developing evaluators.

Table 7: Influence of human resource on effectiveness of M&E systems (n=60)

Statement	Agree	Neutral	Disagree
Experience of staff influence effectiveness of the	95.0	0.0	5.0

M&E systems within organization Usually the organization staff have positive	85.0	5.0	10.0
attitudes towards implementation of M&E. Staff skills contribute to the effectiveness of M&E	90.0	8.3	1.7
systems. The organization ensures that staffs are trained on	83.6.	8.0	8.4
M&E regularly. Training given to staffs increase the quality of	100.0	0	0
M&E human resource to perform M&E effectively			

4.4 Determinants of Effectiveness of NGOs' Monitoring and Evaluation Systems

Respondents were asked about their opinion on the factors influencing the effectiveness of NGOs' M&E systems whereby their responses are summarized in Table 8. The respondents mentioned staff quality, availability of funds, stakeholder participation and organizational leadership as the key factors for the effectiveness of NGOs' M&E systems.

4.4.1 Staff quality

The highest proportion (36.8%) of the respondents mentioned staff quality as essential determinant of the effectiveness of the NGOs' M&E systems. Key informant perceived the staff quality associated with education, experience and training of individual working in the M&E. These qualities influence the ability of such person to successfully carry their M&E duties, while serving time and cost and delivering desired outputs. Explaining the role of staff quality in NGOs M&E systems, one head of M&E unit said:-

"To achieve effectiveness in M&E systems within an organization, we need quality staff, that is, M&E personnel needs to have required skills to perform M&E activities. In order to maintain the quality of M&E staff, training is very crucial" (M&E staff from SAT, May 04, 2019).

This was also echoed by one M&E staff, who said:

"In order to successfully implement organization's M&E systems, staff needs to have adequate experience, appropriate training and positive attitude towards the implementation of activities. These are some of the key qualities M&E staff needs to have and these can influence the effectiveness in the implementation of activities hence the effectiveness of M&E systems" (M&E staff from SAT, May 04, 2019).

These findings are supported by the results of a study by Kamau (2017) who stated that the quality of staff contributed by skills acquired through experience and training were the most important attributes for an effective M&E systems at the Agha Khan Foundation in Kenya. In another study (Nabris, 2002), the findings indicated that inexperienced and untrained personnel when carried out M&E activities is likely to be time-consuming, costly and results produced could be impractical and irrelevant.

4.4.2 Organizational leadership

Organizational leadership was the second most mentioned, scoring 24.8% of the responses, with regard to factors with significant influence on effectiveness of the NGOs' M&E systems. From the key informant interview, key informant two (2) remarked that:

"Effectiveness of M&E systems for organizations is determined by the type of leadership you have in the organization. Strong leadership tends to strengthen M&E systems making the organizations more successful" (KI 2, from MVIWATA, April 30, 2019).

Organizational leadership in the context of this study implies coordination of the practice of M&E systems warranting its success and management of the M&E human resource. Explaining the role of organizational leadership in M&E systems, Njama (2015) symbolically compared the organizational leadership to the central nerve on human beings to signify its importance in the effectiveness of the M&E systems.

According to the World Bank (2011), organizational leadership is important factor in the production of M&E results. Organizational leadership is fundamental in building an effective M&E human resource capacity both in quality and quantity. Furthermore, organizational leadership is a factor that has tremendous effect on the success of the M&E systems as it plays a major role from resource mobilization, disbursement and ensuring that staff are motivated and have the resources to successfully carry out their duties. Linking organizational leadership with staff quality, IFAD (2002) asserts that leadership is responsible for ensuring that project staff receives training that enhances their relevant skills and addresses any other M&E gaps that hinder project performance. Shapiro (2011) asserts that leaders need to work closely with employees and all stakeholders to ensure that they provide required support and guidance to ensure the M&E systems is effective.

Table 8: Factors influencing NGOs' monitoring and evaluation systems

Factors influencing the effectiveness of	Respo	onses
the systems	Number	Percent
Quality of staff	49	36.8
Organizational leadership	33	24.8
Stakeholder participation	26	19.5
Availability of funds	25	18.8

4.4.3 Stakeholder participation

Stakeholder participation was also mentioned to be a key factor and an important determinant in the achievement of an M&E systems and was considered important by 19.5% of the respondents. Accounting for reasons for identifying stakeholder participation as an important determinant of M&E systems effectiveness, a key informant two (2) from MVIWATA explained as follows:

"Involvement of stakeholders from the very beginning of the project with them understanding the main issues regarding the project creates a sense of ownership and embodies a buy-in effect and therefore encourages them to willingly participate in the implementation of the project activities" (KI 2, from MVIWATA, April 30, 2019).

A study done in Nakuru County's public projects, Kenya (Muiga 2015) observed that, achievement of the projects associated with effective M&E systems together with improving stakeholders' participation within organizations. The findings are also in agreement with Patton (2008) who states that stakeholders' involvement is vital for any M&E systems to be effective. In addition, Patton (2008) indicates that the involvement of stakeholders reflects the community needs and arouses people's interest in the implementation of M&E. IFAD (2002) states that stakeholders offer valuable insights on priorities and appropriate processes during the design phase and undertake some of the implementation of the project and /or M&E. Explaining the danger of ignoring stakeholders' participation, especially during the design phase, one project officer said:

"At the beginning of one of our projects which deals with credit and savings, we did not get an overwhelming response as expected from the communities. We realized the reason behind that challenge was that most people in that community were Moslems who did not believe in sharing interests coming from

credit. We then started searching for possible ways to address it. However, this could not have been a challenge if we had involved stakeholders (beneficiaries) from the designing phase" (Project officer from SAT, May 5, 2019).

This observation suggests that, in order to be successful, stakeholders should participate from project design phase through to project evaluation. UNDP (2002) noted that working closely with key stakeholders throughout the entire M&E process promotes shared knowledge creation and learning, helps in transfer of skills, development of skills and enhances ownership of results.

4.4.4 Availability of funds

Availability of fund was identified as a factor that influences effectiveness of NGOs' M&E systems by 18.8% of the respondents. The factor remains to be essential component in safeguarding the effectiveness of M&E systems. This is well implied in the following quote by one key informant, who was head of M&E unit:

"M&E profession being fairly a new field needs resource investment to hire sufficient number of professionals and improve the quality of those available in the field. Therefore, availability of funds will impact the effectiveness of M&E systems only if the funds are sufficiently allocated to the M&E unit to run and improve M&E activities" (M&E officer from RECODA, March 28, 2019).

Linking availability of funds with political will and hence leadership, one key informant had this to say:

"Availability of funds within an organization may not directly influence the effectiveness of the M&E systems because M&E systems effectiveness depends on whether or not the funds were really allocated to M&E activities. If an organization

has funds but no funds are allocated for M&E, it will be difficult for the M&E systems to be effective and achieve any form of tracking and measuring success of activities. But if an organization has funds and M&E activities are allocated adequate funds, M&E systems will certainly be effective" (M&E staff from SAT, May 05, 2019).

The observation corresponds with that of a study by Kamau (2017) that external donor are the ones contributes mostly to the M&E systems at the Aga Khan Foundation, but the estimated percentage of money used on M&E was less than 10% from the total foundation's funding. This was below the specification of World Bank (2011) which indicated allocated budget for M&E activities should not be less than 10%. An additional result was by Meredith and Mantel (2009), who mentioned that sufficient funding needs to be allocated to the implementation of M&E for its potential to be realized in a project. Insufficient financing is a major factor in poor maintenance of M&E processes which, in turn, is often cited as a reason for project failure.

From the findings above, it is clear that the four factors which influence NGOs IS&E effectiveness are interrelated. That is, availability of funds, political will and hence determined organizational leadership is imperative for staff quality to be strengthened. Organizational leadership also plays an important role in ensuring active participation of stakeholders. Therefore, it would require embracing the four key aspects as a whole in order to achieve functional and effective M&E systems, that is, adopting systems approach. According to Chikere and Nwoka (2015), systems approach involves gaining insight into the system through understanding the linkages and interactions between the elements that comprise the whole systems.

4.5 Recommendations for Improvement of the Effectiveness of NGOs' M&E Systems

Recommendations from respondents about the ways organizations could improve the effectiveness of their M&E systems. More than one third (39.5%) of the responses indicated that frequent training would help to build the capacity of workers and hence increase the effectiveness of M&E systems within their organizations. The second most mentioned attribute was increase of budget of the M&E units. Slightly more than a quarter (27.2%) of the responses suggested that the M&E units' budget needed to be increased to the levels that would suffice supporting NGOs' M&E activities. One of the respondents was quoted saying:

"The increase of budget will help to improve the frequency of capacity building of staff which improves competence of staffs on M&E issues" (Project officer from MVIWATA, April 28, 2019).

Table 9: Recommendations for improving effectiveness of organizations' M&E systems

	F	Responses
Variables	Number	Percent
Increase training	32	39.5
Increase budgeting on M&E unit	22	27.2
Improve stakeholder participation	14	17.3
Increase number of workers	13	16.0

Stakeholder participation and increase in number of workers were also mentioned as important aspects to consider in improving NGOs' M&E systems. Corresponding responses were 17.3% and 16% respectively. On stakeholder participation, the respondents recommended that there should be an improvement in the involvement of stakeholder in

order to achieve effectiveness of organizations M&E systems. Concerning the number of workers, the respondents indicated that there was generally inadequate number of workers in the M&E units. On this one project officer said:-

"One person sometimes can be overwhelmed with works; also it is not simple for that person to realize any errors occurred in work and therefore, having two or more M&E officers in M&E unit could help to reduce errors" (M&E staff from SAT, May 04, 2019).

Muiga (2015) reported similar findings that stakeholders had an influence on effectiveness of M&E of organizations. Involving stakeholders in M&E activities stimulates inclusion and fasten meaningful participation with different stakeholder groups. Improving stakeholders' participation is an important aspect for ownership by stakeholders and hence effective performance of M&E systems.

CHAPTER FIVE

5.0 CONCLUSIONS AND RECOMMENDATIONS

5.1 Conclusions

Based on the results it is clear that there were some disagreements among respondents regarding the extent to which two key components of effective M&E systems were well implemented among the studied organizations. The components are periodic updating of M&E plan and participation of stakeholders in developing and updating M&E plans. From this it can be concluded that judgments on M&E systems' effectiveness ought to be based on the performance of individual components of the M&E systems rather than unguided opinions of the organizations' staff alone. This is because the findings show that, while

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there were problems with M&E plans updating and stakeholders' participation, staff opinions were such that the selected organization's M&E systems was highly effective.

In the view of the findings, it is clear that there were high proportion of responses in organizations having staff with less years of experience in M&E field and few staff in M&E unit that had implications in the achievements of objectives of the respective organizations. Therefore, it can be concluded that adequate number of staff in M&E unit plus working experience of staff are fundamental issues regarding human resource on the achievements of M&E systems within organization and have significance in the success of projects in the organization. On the basis of the findings, the determinants of NGOs' M&E systems effectiveness include staff quality, organizational leadership, stakeholder participation and availability of funds. Therefore, it is concluded that effectiveness of NGO M&E systems is a function of the status of the mentioned factors in the respective organizations.

5.2 Recommendations

This study provides the following recommendations:

- i. In order to ensure clear judgments of M&E systems' effectiveness within organizations, staff working in the organizations need to be involved in a participatory manner and their opinions be heard as they make significant contributions to the effectiveness of the M&E systems.
- ii. There is a need for a clear and active line of communication between staff and management.
- iii. Regular on job training of staff is recommended as it is crucial for improving the quality and experience of human resources in the field of M&E.
- iv. Improving participation and active communication between staff and organizations leader is very important in strengthening judgments of M&E systems effectiveness.
- v. NGOs, donor agencies and government should focus on resource investment so as to improve the quality and quantity of human resources in the field.

vi. Proper participatory implementation of the existing policy in M&E plans should be encouraged within organizations.

REFERENCES

- Acevedo, L. G., Rivera, K., Lima, L. and Hwang, H. (2010). *Challenges in Monitoring and Evaluation*: An Opportunity to Institutionalize Monitoring and Evaluation Systems. World bank., Washington DC. 178pp.
- Ahmed, Z. U. (2004). *Accountability and Control in Non-Governmental Organisations* (*NGOs*) A case of Bangladesh. Manchester University, UK. 26pp.
- Babbie, E. R. (1990). Survey Research Methods. Wadsworth Publishing Co. Belmont (2nd Edition), Published by Creative Commons Attribution-Noncommercial-Share Alike university., South Florida, USA. 149pp.
- Bailey, K. D. (1994). *Methods of Social Research* (Fourth Edition). The Free Press, New York. 345pp.
- Best, J. W. and Khan, J. V. (2006). *Research in Education*. Pearson Education Inc., Boston 515pp.
- Busilie, J. G. (2017). Determinants of effectiveness monitoring and evaluation systems in NGOs within Kinondoni Municipality. Dissertation for the Award of M.A Degree at Open University of Tanzania, 65pp.
- Catholic Relief Services (CRS), (2011). Chapter 10: Monitoring and Evaluation (M&E). [http://www.crsprogramquality.org]. Site visited on 5/08/2019.
- Chaplowe, S. (2008). *Monitoring and Evaluation Planning*. American Red Cross and Catholic Relief Services., Washington DC. 31pp.

- Chikere, C. C. and Nwoka, J. (2015). The systems theory of management in modern day organizations- A study of aldgate congress resort limited port harcourt.

 International Journal of Scientific and Research Publications 5(9): 1-7.
- Creswell, J. W. (2014). *Research Design: Qualitative and Mixed Methods Approaches*. (Second Edition). Sage Publication Inc., California. 246pp.
- Dobi, B. A. (2012). Factors influencing adoption of Monitoring and Evaluation system for project management among NGOs in Rarieda district, Siaya County, Kenya.

 Dissertation for Award of M.A Degree at University of Nairobi, Kenya, 113pp.
- Frankel, N. and Gage, A. (2016). *Monitoring and Evaluation Fundamentals: A Self-Guided Minicourse*. University of North Carolina., Chapel hill 78 pp.
- Gaarder, M. M. and Briceno, B. (2010). Institutionalisation of government evaluation balancing trade-offs. *Development Effectiveness Journal* 3: 289-309.
- Gitonga, B. A. (2012). *Project monitoring and Evaluation, Control and Reporting*. Project Support Infromation Consultants Publication series., Nairobi. 189pp.
- Goldense, B. L. (2016). *Measuring Product Development Effectiveness*. Informa USA Inc., Florida. 72pp.
- IFAD (2002). *Managing for Impact in Rural Development: A Guide for Project M&E*.

 International Fund for Agricultural Development (IFAD), Rome. 32pp.

- Jabareen, Y. (2009). Building a conceptual framework: Philosophy, definitions and procedure. *Qualitative Methods International Journal* 4: 49-62.
- Jennings, M. (2008). Surrogates of the State: NGOs, Development and Ujamaa in Tanzania. Kumarian Press., H- Africa. 262pp.
- Kadam, P. and Bhalerao, S. (2010). Sample size calculation. *International Journal of Ayurveda* 1(1): 55-57.
- Kamau, M. P. (2017). Factors influencing performance of monitoring and evaluation systems in non-governmental organization projects: A case of Aga Khan Foundation in Nairobi, Kenya. Dissertation for Award of M.A Degree at University of Nairobi, Kenya, 90pp.
- Kareithi, R. N. M. and Lund, C. (2012). Review of NGOs perfomance. *South African Journal of Science* 755: 1 8.
- Kelly, K. and Magongo, B. (2004). Assessing country level capacity for HIV/AIDS programme monitiring and evaluation the case of Swaziland. *Proceeding of the third African Evaluation Assocciation Conference*, Cape Town, South Africa. 1 4. December 2004. 98pp.
- Khan, S. K., Kunz, R., Kleijnen, J. and Antes, G. (2003). Five steps to conducting a systematic review. *Royal Society of Medicine Journal* 3: 118 121.

- Kumar, R. (2005). *Research Methodology: A Step By Step Guide for Beginners*. (2nd Ed.), Sage Publication., New Delhi, India. 332pp.
- Kusek, J. Z. and Rist, R. C. (2004). Ten Steps to a Results-Based Monitoring and Evaluation Systems: A Handbook for Development Practitioners. World Bank., Washington DC. 268pp.
- Kusek, J. Z. and Gorgens, M. (2009). *Making Monitoring and Evaluation Systems Work: A Capacity Development Toolkit*. World Bank., Washington DC. 466pp.
- Lehman, G. (2007). The accountability of NGOs in civil society and its public spheres. *Critical Perspective on Accounting Journal* 18: 645 – 669.
- Maas, C. J. and Joop, J. H. (2005). Sufficient sample sizes for multilevel modeling. *Methodology Journal* 1(3): 86 92.
- Mackay, K. (2006). Institutionalization of Monitoring and Evaluation Systems to Improve

 Public Sector Management. Evaluation Capacity Development. World Bank.,

 Washington DC. 21pp.
- Mackay, K. (2007). How to Build Monitoring and Evaluation Systems to Support Better Government. World Bank., Washington DC. 172pp.
- Mark, K. and Pfeiffer, J. R. (2011). *Monitoring and Evaluation Capacity Development*.

 The world Bank Group., Washington DC. 42pp.

- Mercer, C. (1999). Reconceptualizing state society relations in Tanzania: Are NGOs 'making a Difference'? Royal Geographical Society Journal 31(3): 247 258.
- Meredith, J. R. and Mantel, S. J. (2009). *Project Management: A Managerial Approach*, *Seventh Edition*. John Wiley and Sons Inc., New Jersey. 607pp.
- Micah, N. J. and Luketero, S. W. (2017). Monitoring and evaluation systems and perfomacne of non-governmental based maternal health projects in Bungoma South Sub-County, Kenya. *European Sciencific Journal* 13(23): 11 37.
- Mugambi, F. and Kanda, E. (2013). Determinants of effective monitoring and evaluation of strategy implementation of community based projects. *International Journal of Innovative Research and Development* 2(11): 67 73.
- Mugera, A. N. and Sang, P. (2017). Examining the factors influencing the adoption of monitoring and evaluation systems among non-governmental organisations in Murang'a County, Kenya. *Journal of Management and Business Administration* 2: 28 36.
- Muiga, M. J. (2015). Factors influencing the use of monitoring and evaluation systems of public projects in Nakuru County. Dissertation for the Award of MSc. Degree, at University of Nairobi, Kenya, 72pp.
- Mulandi, N. M. (2013). Factors influencing performance of monitoring and evaluation systems of non-governmental organizations in governance: A Case of Nairobi,

- Kenya. Dissertation for the Award of M.A Degree at Nairobi University in Kenya. 82pp.
- Mwangi, J. K., Nyang'wara, B. M. and Ole Kulet, J. L. (2015). Factors affecting the efectiveness of monitoring and evaluation of constituency development fund projects In Kenya: A Case of Laikipia West Constituency. *Journal of Economics and Finance* 6 (1): 74 87.
- Nabris, K. (2002). *Monitoring and Evaluation, Civil Society Empowerment*. Passia Publications, Jerusalem. 55pp.
- Njama, A.W. (2015). Determinants of effectiveness of a monitoring and evaluation systems for projects: a case of amref kenya wash programme. Dissertation for Award of MSc. Degree at University of Nairobi, Kenya, 108pp.
- Njuguna, P. K. (2016). Factors influencing the performance of monitoring and evaluation systems In non-governmental organizations funded educational projects in Murang'a County, Kenya. Dissertation for Award of M.A Degree at University of Nairobi, Kenya, 71pp.
- Nyonje, R. O., Ndunge, K. D. and Mulwa, A. S. (2012). Monitoring and evaluation of projects and programs:a handbook for students and practitioners. *Aura Books* 7: 123 456.
- OECD (2002). *Glossary of Key Terms in Evaluation and Results Based Management*.

 Organization for Economic Cooperation and Development, France. 38pp.

- Onyango, C. E. (2017). Assessing the effectiveness of monitoring and evaluation systems in the implementation of county government Projects; A case of Kilinganya County. Dissertation for the award of M.A at Nairobi University, Kenya, 75pp.
- Patton, M. (2008). *Developmental Evaluation*: Appliying Complexity Concepts to Enhane Innovation and use. The Guilford Press., New York. 323pp.
- Pius, G. (2017). Factors influencing effective monitoring and evaluation systems. A case study of health related NGOs in Arusha City. Dissertation for the Award of M.A Degree at Open University of Tanzania, 63pp.
- Rick, J. (2001). *Practical Guidelines for the Monitoring and Evaluation of Capacity Building: Experiences from Africa*. International NGOs Training and Research centre., Oxford. 42pp.
- Ronnete, E. and Tania, A. (2010). *Implementing a Government –Wide Monitoring and Evaluation Systems in South Africa*. World bank publications., 37pp.
- Shapiro, J. (2011). *Monitoring and Evaluation*. CIVICUS., Johannesburg S.A. 51pp.
- Taut, S. (2007). Studying self evaluation capacity building in a large international development organization. *American Journal of Evaluation* 28: 45 59.
- Umugwaneza, A. and Kule, J. W. (2016). Role of monitoring and evaluation on project sustainability in Rwanda: A case study of electricity access scale-up and sectorwide approach development project. *European Journal of Business and Social Sciences* 5(7): 159 177.

- UNAIDS (2008). *Organizing Framework for a Functional National HIV Monitoring and Evaluation Systems*. World Bank Publication, Geneva. 20pp.
- UNAIDS (2009). *Twelve components Monitoring and Evaluation Systems Assessment*. World Bank Publications. Geneva. 36 pp.
- United Nations Development Programme (UNDP) (2009). *Handbook on Planning, Monitoring and Evaluation for Development Results*. UNDP., New York.

 232pp.
- Vivian, J. (1994). NGOs and sustainable development in Zimbabwe: No magic bullets.

 *Development and Change 25: 167 193.
- Welsh, N., Schans, M. and Dethrasavon, C. (2005). *Monitoring and Evaluation Systems Manual (M and E Principles)*. *A publication of the Mekong Wetlands Biodiversity Conservation and Sustainable Use Programme*. The World

 Conservation Union, Thailand. 35pp.
- WHO (2006). Global Strategy on Diet, Physical Activity and Health: A Framework to

 Monitor and Evaluate Implementation. World Health Organization, Geneva.

 30pp.
- World Bank (2011). Monitoring and Evaluation Capacity Development. [http://go.worldbank.org/1FASV17EC0]. Site visited on 5/08/2019.

APPENDICES

Appendix 1: Questionnaire for Organization's member

Section One: Background Information

1.	Sex 1. Male 2. Female []
2.	Education level 1. Primary education 2. Secondary school education 3. Diploma
	4. University 5 Never attended school 6. Others
3.	Marital status 1. Married 2. Widowed 3. Separated 4. Single
	· · · · · · · · · · · · · · · · · · ·

Section Two: Effectiveness of Organizational M&E Systems

In these questions the researcher seeks to establish an understanding of the effectiveness of organization M&E systems in the selected area.

Keys: 1-strongly agree, 2- agree, 3-not sure, 4-disagree, 5 - Strongly disagree

Statement	1	2	3	4	5	Remarks
The organization has M&E						
framework / plan that provide						
guidance for M&E						
implementation in the project.						
The M&E plan we have						
addresses the organizations						
data needs adequately.						
The plans clearly define roles						
and responsibilities in a way						
that warrants a functioning						
M&E systems within						
organization.						
M&E systems make it easy						
and quick to realize the agreed						
objectives with effective and						
efficient resource use.						
Results and findings from						
M&E are usually distributed						
and timely obtained.						
The organization has routine						
monitoring that ensures project						

activities implemented within				
schedule.				
The M&E plan is updated				
periodically (12 months				
interval) within organization				
Usually, stakeholders				
participate in developing or				
updating the M&E plan.				
The plans, in totality				
adequately describes the				
implementation of all				
components of the				
organization's M&E systems				

Section Three: Human Resource in M&E Systems

1.	W	hat is your position in the project?		
	b) c)	Project manager/coordinator M&E staff Organization's member Others (mention	[2

2. Do you have any experience in M&E?

[]

2)	Yes		
a)	165	ſ)
h)	No	Ĺ	J

- 3. How long have you been working here?
 - a) 1 -3 years
 - b) 4-6 years
 - c) 7-9 years
 - d) 10 and Above years
- 4. How many staffs do you have in M&E unit?

In these questions the researcher seeks to establish the influence of the human resource on effectiveness of organizations M&E systems within the selected area.

Keys: 1-strongly agree, 2- agree, 3-not sure, 4- disagree, 5- strongly disagree

Statement	1	2	3	4	5	Remarks
Experience of staffs influence						
effectiveness of the M&E systems						
within organization						
Usually the organization staff have						
positive attitudes towards						
implementation of M&E.						
Staff skills contribute to the						

effectiveness of M&E systems.			
The organization ensures that staffs are			
trained on M&E regularly.			
Training given to staffs increase the			
quality of M&E human resource to			
perform M&E effectively			

Section Four: Factors Influencing the Effectiveness of M&E Systems

1.	In your opinion what are the factors that influence the effectiveness of M & E
	systems?
2.	What are the factors would you consider as the biggest challenge hampering
	effectiveness of your organization's M &E systems?
3.	What recommendations would you give to help improve organization's M&E
	systems

Thank you for your participation

Appendix 2: Checklist for Program manager/ officer

1.	Do you have M&E plan/framework in your projects?
2.	What is so special about M&E that it should be at the heart of a working
	organization?
3.	Do employees of the organization obtain feedback after carrying out project
	activities?
4.	What factors would you identify as the main determinants of the effectiveness of an
	M&E systems for projects?

4.	What would you identify as the biggest challenge hampering the performance of
	your M&E systems?
5.	What recommendations would you give to help improve organization's M&E
	systems?

Thank you for your participation

Appendix 3: Checklist for CEO / Director of organization

1.	Do you have an M&E framework/ plan for your organization?
2.	Are there M&E frameworks / plans for each project you in your organization?
3.	Please explain the existing link between individual projects' M&E plans and your
	Organization's strategic objectives.
4.	What factors would you identify as the main determinants of the effectiveness of an
	M&E systems for projects?
5.	What would you identify as the biggest challenge hampering the performance of
	your M&E systems?

6.	How often are framework/ plan reviewed/updated?
7.	How have various (relevant) stakeholders participated in developing the M&E
	plans?
8.	What human capacity development policy strategy does your organization have to
	operationalize your M&E systems?
9.	What recommendations would you give to help improve organization's M&E
	systems

Thank you for your participation