Influence Of M&E Training On Sustainability Of Disaster Emergency Preparedness Program In Uasin Gishu County

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Abstract

Disasters have become a typical occurrences all around the globe. Certainly, their frequency has grown as economic growth, technological sophistication, and vulnerability to disadvantaged groups has risen. Natural calamities are predicted to cause the deaths of one million people worldwide per decade. There is minimal evidence that M&E of disaster response operations leads to better results in terms of more effective practice. As such, the aim of this research was be to determine the influence of M&E training on sustainability of disaster emergency preparedness program in Uasin Gishu County. This study adopted theory of Sustainability. This study used an explanatory research design. Because of the limited number of workers, a census survey will be used; this research target population will be 52 workers of the Disaster Emergency Preparedness Program and M&E in Uasin Gishu County. Questionnaires was used to collect data. Data analysis process will begin with questionnaire editing. Collected data were coded into Statistical package for social science (SPSS) for analysis. Descriptive statistics such as frequency distribution, percentages, means and standard deviations were calculated, and data presented in form of tables. Inferential statistics used were regression model. The study findings revealed that M&E training has a positive significant effect on Sustainability of disaster emergency preparedness programs (β_2=0.363, p=0.000<0.05). The study also concluded that there exist a strong, positive and statistically correlation between M&E training on sustainability of disaster emergency preparedness program in Uasin Gishu County Kenya. M&E of disaster response efforts leads to better outcomes in terms of improved practice. Determine the extent recovery program activities have built sustainability and resilience in a community post-disaster. Assess community

resilience in disasters by developing linked conceptual and computational models of community functioning and resilience after a disaster.

Keywords: Monitoring And Evaluation, Training, Sustainability Disaster Emergency, Preparedness, Program.

Introduction

Sustainability is a crucial concept for understanding global challenges such as economic development, societal development, and natural resource management (Arslan, Khan, Latif Komal, & Chen, 2022). International development agencies (IDA) face a significant challenge in sustainability, which was identified as a critical problem in the IFAD Strategic Framework 2007-2010. Projects are actions that range from formulating a vision, scope, and labor effort to executing and evaluating individual or institution's goals. Monitoring and evaluation are essential processes for long-term project effectiveness, with sustainability benchmarks and barometers being vital. Capacity development is a purposeful process where individuals, organizations, or society establish, strengthen, or preserve capacity over time (Nyauma, 2022). The United States, UK, and Canada are major donors to developing countries, with the American Evaluation Association in the United States and the first African Monitoring and Evaluation association in 1998 (Kibukho, 2021). Australia is among the world's leaders in incorporating M&E systems into development projects and disaster preparedness initiatives. Kenya's disaster preparedness is fragmented, with government agencies often preferring reactive measures. Coordination is difficult due to political and institutional interests, which may outweigh the benefits of collaboration and partnerships. Disasters are becoming increasingly prevalent worldwide, and 73% of organizations globally are failing in disaster preparation (Bendell, 2022). In Uasin Gishu County, natural disasters and man-made ones continue to affect societies and villages more often, mainly affecting underdeveloped counties due to insufficient readiness, rising populations, and weak infrastructures. Project monitoring and evaluation have generated insufficient outcomes, leading to failed projects and eventual collapse. This study sought to determine the influence of M&E training on sustainability of disaster emergency preparedness program in Uasin Gishu County.

Theoretical Framework Theory of Change

According to theory of change, Monitoring & Evaluation is at any level of involvement introduced, even if tasks are already defined and planning is ahead of time. A program strategies, policies, events, or projects are significant areas of involvement. This theory describes how efforts that result in a succession of outcomes eventually contribute to the desired impact. The change theory may be useful to identify present requirements and opportunities, as well as what steps can be taken to shift to the desired side. As per Davies (2018), the theory of change was established in the 1990s in reaction to the program theory in order to provide a solution to the evaluation theory's issues. The idea is applied in providing answers to complicated societal concerns. As a result, it provides guidance on the project's strategy, which will be tested and defined through M&E.

Monitoring is primarily concerned with the frequent assessment of change occurring within project components and the surrounding environment resulting from project incorporation (Muchelule, 2018). Similarly, theory of change is a paradigm explaining how certain interventions results in the expected or observed consequences. The theory of change, often

known as the result chains or attributing logic, displays a set of assumption and connections defining the perceived link and is extremely relevant to surveillance, capacity building, training, and data use.

This idea is particularly significant to this topic since programs and initiatives must be established on solid concepts. When applied effectively, theory of change may lead to the creation of realistic objectives, and a knowledge of tactics for a Monitoring & Evaluation course (Reinholz & Andrews, 2020). Therefore, the theory is applicable in this study in investigating the influence of M&E training on sustainability of disaster emergency preparedness program in Uasin Gishu County.

Methodology

The study adopted Explanatory research design. The target population for this study was 52 M&E and disaster preparedness staff at Uasin Gishu County. A census survey was adopted. The main researched instruments was questionnaires.

Data analysis process will begin with questionnaire editing. Collected data were coded into Statistical package for social science (SPSS) for analysis. Descriptive statistics such as frequency distribution, percentages, means and standard deviations were calculated, and data presented in form of tables. Inferential statistics used were regression model as given;

$$y = \alpha + \beta_1 x_1 + \varepsilon_i$$

y represent sustainability of disaster emergency preparedness program

α represent constant. β_1 represent the coefficient of the monitoring and evaluation training.

x_1 represent monitoring and evaluation training

ε represent error term

Analyzed data will be presented in form of frequency tables.

Findings Response Rate

A total of 52 questionnaires were issued to the respondents, and total of 47 were fully filled and returned for analysis. This represented a 90.4% questionnaire response rate. According to Kothari (2010) when the rate is 75%, then it is appropriate to continue with the study.

Descriptive Analysis for M&E Capacity Building

The objective of the study was to determine the influence of M&E training on sustainability of disaster emergency preparedness program in Uasin Gishu County. Table 1 presents the study results.

Table 1

Descriptive Analysis for M&E Training

		SD	D	UD	A	SA	Mean	Std.
1. There is continuous M&E training and development to acquire skills	F	2	1	5	20	19	4.13	0.99
	%	4.3	2.1	10.6	42.6	40.4		
2. There is training to the public on emergency preparedness	F	2	2	16	9	18	3.83	1.13
	%	4.3	4.3	34	19.1	38.3		
3. There is frequent special training in M&E training	F	3	1	7	16	20	4.04	1.12
	%	6.4	2.1	14.9	34	42.6		
4. Qualified personal are employed	F	3	6	3	22	13	3.77	1.18
	%	6.4	12.8	6.4	46.8	27.7		
5. Technical skills are huge determinants on how best M&E is done	F	11	2	1	14	19	3.60	1.61
	%	23.4	4.3	2.1	29.8	40.4		

The study results from Table 1 revealed that that majority 39(83.0%) of the respondents agreed that there is continuous M&E training and development to acquire skills. On contrary to that, 3(6.4%) of the respondents disagreed that there is continuous M&E training and development to acquire skills. Further, the results also showed in terms of mean and standard deviation that the respondents agreed that there is continuous M&E training and development to acquire skills (Mean=4.13, Standard deviation=0.99).

Also, 27(57.4%) of the respondents agree that there is training to the public on emergency preparedness. However, on the other hand 4(8.6%) of the respondents disagreed that there is training to the public on emergency preparedness. Further, the results also showed in terms of mean and standard deviation that the respondents agree that there is training to the public on emergency preparedness (Mean=3.83, Standard deviation=1.13).

Further, 36(77.6%) of the respondents agreed that there is frequent special training in M&E training. On contrary to that, 9(8.2%) of the respondents disagreed that there is frequent special training in M&E training. Further, the results also showed in terms of mean and

standard deviation that the respondents agree that there is frequent special training in M&E training (Mean=4.04, Standard deviation=1.12).

Furthermore, 35(74.5%) of the respondents agreed that qualified personal are employed. On contrary to that, 9(19.2%) of the respondents disagreed that qualified personal are employed. Further, the results also showed in terms of mean and standard deviation that the respondents agree that qualified personal are employed (Mean=3.77, Standard deviation=1.18).

Finally, 33(70.2%) of the respondents agree that technical skills are huge determinants on how best M&E is done. However, on contrary 13(27.7%) of the respondents disagreed that technical skills are huge determinants on how best M&E is done. Further, the results also showed in terms of mean and standard deviation that the respondents agree that technical skills are huge determinants on how best M&E is done (Mean=3.68, Standard deviation=1.156).

The study results showed that majority of respondents agreed that M&E training has an influence on sustainability of disaster emergency preparedness program's in Uasin Gishu County, Kenya. This implies that there is continuous M&E training and development to acquire skills. Also, there is training to the public on emergency preparedness.

Linear regression model of M&E training and Sustainability of disaster emergency preparedness programs

The linear regression analysis models the relationship between M&E training and Sustainability of disaster emergency preparedness programs. The results are shown in Table 2, 3 and 4

Table 2

Regression Model Summary of M&E training

R	R Square	Adjusted R Square	Std. Error of the Estimate
.491[a]	.241	.224	.84054

The results of the linear regression in Table 2 indicated that R^2 =0.241 and R = 0.491. R value of 0.491 gives an indication that there is a positive relationship between M&E training and Sustainability of disaster emergency preparedness programs. The R^2 indicates that explanatory power of the independent variables is 0.241. This means that about 24.1% of the variation in Sustainability of disaster emergency preparedness programs is explained by the regression model. This gives implication that the employed data for regression model were accurate.

Table 3

Model Fitness Results of M&E training

	Sum of Squares	df	Mean Square	F	Sig.

Regression	10.109	1	10.109	14.309	.000[b]
Residual	31.793	45	.707		
Total	41.902	46			

From the study results in Table 3 the F-statistics (F = 14.309) was significant at p=0.000 thus confirming the fitness of the model. The F test provides an overall test of significance of the fitted regression model. The F value indicates that the variables in the equation are important hence the overall regression is significant.

Therefore, there is statistically significant relationship between M&E training and Sustainability of disaster emergency preparedness programs. This means that the independent variable (M&E training) was a significant predictor of the dependent variable (Sustainability of disaster emergency preparedness programs).

Table 4
Regression Analysis Coefficients of M&E training

	Unstandardized Coefficients		Standardized Coefficients		
	B	**Std. Error**	**Beta**	**t**	**Sig.**
(Constant)	2.905	.329		8.839	.000
M&E training	.363	.096	.491	3.783	.000

From Table 4 the results it illustrated that M&E training has a positive significant effect on Sustainability of disaster emergency preparedness programs (β_2=0.363, p=0.000<0.05). This gives an implication that a unit increase in M&E training will cause a 0.363 increase in Sustainability of disaster emergency preparedness programs. Thus, the regression equation model as follows;

Y= 2.905 + 0.363X_2 …………………………………………………Equation 1

H$_{02}$: M&E training has no significant effect on Sustainability of disaster emergency preparedness programs in Uasin Gishu County, Kenya. The regression results in Table 4 indicate that there is significant relationship between M&E training Sustainability of disaster emergency preparedness programs in Uasin Gishu County, Kenya and with a beta coefficient of 0.363 and significance of (p= 0.000). The study rejected the null hypothesis.

Conclusion of the study
The study concluded that M&E training has a positive and significant effect on the sustainability of disaster emergency preparedness programs in Uasin Gishu County. This suggests that M&E training help to improve the effectiveness of disaster preparedness programs by ensuring that they are well-planned, implemented, and monitored. M&E training

help to ensure that programs are designed to meet the specific needs of the community. It help to identify and address any gaps or weaknesses in programs. It help to build capacity within the community to manage and sustain programs over time.

Recommendations

The study recommends that policymakers should invest in M&E training for disaster preparedness programs. This can be done through a variety of means, such as providing funding for training programs, developing training curricula, and making training mandatory for all staff involved in disaster preparedness.

Disaster preparedness programs should be designed to be sustainable. This means that programs should be aligned with community needs, have a clear budget and funding plan, and build capacity within the community to manage and sustain programs over time. M&E should be integrated into all aspects of disaster preparedness programs. This includes monitoring and evaluating program planning, implementation, and outcomes.

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