Effect of Training Evaluation Methods on Employee Performance in Public Service, Kenya

Fibian Masinde and Dr. Lydia Maket

School of Business and Economics, Moi University, Kenya

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ABSTRACT

The purpose of this study was to examine the effect of training evaluation on employee performance in Public Service at the Ministry of Transport and Infrastructure, Kenya. The specific objectives were; to determine the effect of diagnostic and formative training evaluation methods on employee performance. This study was grounded on Kirkpatrick's Four Levels of Evaluation model, Organizational Elements model and Task-contextual model. The study adopted explanatory research design and used questionnaires to collect data. The target population of this study was all the Ministry of transport HR department staff working in top, middle and lower management levels (340) who deal directly with HR and personnel functions at the Ministry. To determine the sample size, the Krejcie and Morgan table (t table) was applied to give a sample size of 181 employees who were randomly selected to participate in the data gathering exercise and to provide the necessary information for the study. A pilot study was conducted to reduce obscurity of questionnaire items and enhance data integrity. The findings revealed 8.1% of the variability in employee performance was accounted for by the combined effects of longitudinal training evaluation, summative training evaluation, formative training evaluation, and diagnostic training evaluation, which is a small portion of the variance. Coefficients of determination showed that a one-unit increase in diagnostic training evaluation was associated with an estimated increase of 32.0% (β=0.320, p=0.001) units in employee performance; a one-unit increase in formative training evaluation was associated with an estimated increase of 33.4%, (β=0.334, p=0.007) units in employee performance. The study concluded that diagnostic evaluation and formative evaluation had significant positive effects on employee performance (p=0.001<0.05) and (p=0.001<0.05), respectively. The study recommended for the need to strengthen the diagnostic evaluation and enhance formative training evaluation practices; this would help reinforce learning and provide employees with valuable feedback to enhance their performance.

Keywords: Training evaluation, Diagnostic evaluation, Formative evaluation, Employee performance

INTRODUCTION

Training is a pivotal aspect of organizational development, aimed at equipping employees with the requisite skills and knowledge to fulfill specific tasks towards achieving common goals (Olaniyan & Oyoo, 2018). It serves to enhance employees' knowledge, skills, and abilities (Almohaimmeed, 2017), encompassing various methods such as on-the-job or off-the-job, within or outside the organization. The effectiveness of training is contingent upon factors like employee motivation, perceived support from the work environment, and the ability to apply newly acquired knowledge and skills in their roles (Elnaga & Imra, 2013). Training evaluation, on the other hand, is the systematic process of assessing the efficacy of a training program in meeting its

intended objectives (Asim, 2013). It involves evaluating impact, effectiveness, and outcomes to ascertain the success of the training initiative (World Bank, 2020).

This evaluation can encompass measuring performance impact, knowledge acquisition, and attitude changes, offering insights for program improvement (Simons & Richardson, 2012). Evaluation occurs at various stages, including before, during, and after the training intervention (Short, 2019), providing feedback crucial for enhancing both individual and organizational performance. Effective training evaluations offer valuable feedback to stakeholders such as facilitators, participants, management, and relevant authorities (Chan, 2016), cascading into assessments of individual and organizational performance (Meyer *et al*., 2013). Performance, in this context, refers to the degree of task accomplishment within an individual's job, reflecting their fulfillment of position requirements based on achieved results (Meyer & Allen, 2012). Given the significance of employees as organizational assets, investing in their training is imperative to optimize job performance (Kirigia, 2017).

Training evaluation serves to measure and assess program effectiveness, facilitating necessary adjustments for improvement (Mano *et al*., 2012). It involves gathering data on participants' knowledge and skills pre- and post-training, alongside changes in performance and behavior, to gauge the training's impact. By evaluating training, organizations ensure programs effectively enhance employee performance and achieve desired outcomes. Moreover, training evaluation aids in identifying areas for improvement and refining training quality (Gusdorf, 2017). It is instrumental in gauging employee response to training and its alignment with objectives, as well as determining the need for further training (Oostrom *et al*., 2015). As employee performance directly contributes to organizational objectives, evaluating training effectiveness is crucial for ensuring organizational success (Rauch, 2018).

This evaluation process also plays a pivotal role in enhancing morale and motivation among employees, thereby boosting overall performance and productivity (Gebhardt, 2020). By providing feedback, training evaluation fosters continuous improvement in training programs, ultimately contributing to organizational effectiveness. In Kenya's public sector, addressing the issue of employee performance is crucial, highlighted by studies indicating widespread underperformance among civil servants (World Bank, 2018; Institute of Economic Affairs [IEA], 2020). Factors such as resource constraints, inadequate training, and low motivation contribute to this issue. To counteract these challenges, the government has implemented training programs aimed at improving employee performance.

However, the effectiveness of these initiatives remains uncertain, with doubts regarding the ability of Human Resource (HR) professionals and line managers to accurately measure performance improvements resulting from training evaluations. This necessitates collaborative efforts between HR Development (HRD) professionals and line managers to design, deliver, and evaluate training interventions effectively (World Bank, 2018). Evaluations should focus not only on the reaction and learning outcomes of training but also on the application and implementation of newly acquired knowledge to improve employee performance (Yusoff et al., 2016; Imran & Tanveer, 2015).

Despite the recognized importance of training evaluation, barriers such as lack of support, resources, time, and expertise hinder its implementation (Mburu et al., 2017). The Ministry of Transport and Infrastructure in Kenya exemplifies this challenge, despite having training programs in place. While studies show that a significant proportion of public sector employees report effective knowledge transfer after training, there emains a gap in understanding the contextual effectiveness of different training evaluation methods and their impact on employee performance (IEA, 2020).

Existing research indicates a positive correlation between training evaluation and various aspects of employee performance, including motivation, engagement, satisfaction, and retention (Mwaniki & Gachathi, 2018; Mwangi, 2019; Kinyanjui & Kariuki, 2014). However, there is need for further exploration into the specific mechanisms through which training evaluation influences employee performance. This study aimed to address this gap by examining the effect of training evaluation methods on employee performance at the Ministry of Transport and Infrastructure in Kenya. By doing so, it aims to provide insights into how organizations can optimize training programs to enhance employee performance effectively.

Objectives

The objectives of this study were:

i. To determine the effect of diagnostic training evaluation on employee performance at the Ministry of Transport and Infrastructure.

ii. To establish the effect of formative training evaluation on employee performance at the Ministry of Transport and Infrastructure.

LITERATURE REVIEW AND HYPOTHESES DEVELOPMENT

Training evaluation methods and Employee performance

Training evaluation is integral in assessing the effectiveness of training programs and their impact on employee performance, enabling organizations

to identify strengths, weaknesses, and areas for improvement (Smith & Brown, 2021). Studies have consistently demonstrated a positive relationship between training evaluation and employee performance. For instance, research by Smith and Brown (2021) found that organizations conducting rigorous training evaluations experienced higher employee performance levels compared to those that did not.

Further insights into the impact of evaluation methods on employee performance were provided by Johnson et al. (2020), who discovered that incorporating behavioral assessments and feedback into training evaluations led to improved performance outcomes. This underscores the importance of evaluating the practical application of training in real work scenarios for enhancing employee performance. Moreover, a meta-analysis conducted by White et al. (2019) confirmed a significant and positive correlation between training evaluation and performance outcomes. This suggests that evaluating training programs contributes to enhancing employee performance, emphasizing the significance of systematic evaluation processes.

Empirical evidence from Otuko, Chege, and Musiega (2013) supports these findings, as their study in Mumias Sugar Company in Kenya demonstrated a positive and significant effect of training needs assessment on employee performance. This highlights the importance of understanding training requirements to tailor interventions effectively, thus improving performance outcomes. Kirkpatrick's (2008) framework further delineates the training evaluation process into four levels: reaction, learning, behavior, and results. This systematic approach helps assess various aspects of training effectiveness. The reaction level gauges trainees' responses to training, aiding in refining future sessions. The learning level measures acquired knowledge against predetermined objectives, facilitating adjustments for enhanced learning outcomes.

The behavior level assesses changes in behavior resulting from training, emphasizing the practical application of acquired skills. Finally, the results level analyzes the overall impact of training on organizational outcomes, aligning training goals with business objectives. Thus, a comprehensive approach to training evaluation, encompassing both qualitative and quantitative methods, is essential for optimizing employee performance. By identifying training needs, assessing learning outcomes, and evaluating behavioral changes and organizational results, organizations can effectively enhance employee performance and achieve strategic objectives.

Diagnostic training evaluation and Employee performance

Diagnostic training evaluation (DTE) is a systematic process crucial for assessing and enhancing employee performance within organizations (Simons, 2014). Acting as a bridge between identifying client needs and delivering tailored solutions, DTE plays a pivotal role in pinpointing both strengths and weaknesses, determining training requirements, and measuring program effectiveness (Nixon & Burns, 2015). This method, often overseen by external consultants, comprehensively evaluates employees' technical competencies, interpersonal skills, and work attitudes (West, 2020). Through traditional monitoring techniques and a focus on performance standards, DTE identifies deviations and root causes, enabling the development of targeted interventions to enhance organizational effectiveness (Angle & Perry, 2011).

Moreover, strategic alignment facilitates the identification of problem areas, enabling learning leaders to execute diagnostics effectively (Meyer, Allen, & Smith, 2013). Despite its significance, DTE remains an underdeveloped skill among training professionals. Research by Welch (2019) demonstrates the positive impact of DTE on employees, enhancing problem-solving skills, customer responsiveness, and organizational knowledge, thereby improving productivity and job satisfaction. Similarly, Robinson (2019) found that employees undergoing DTE reported higher morale, job satisfaction, and commitment, while experiencing reduced turnover and absenteeism. These findings underscore the importance of DTE in not only identifying training needs but also in enhancing employee skills, knowledge, and overall performance.

Thus, DTE emerges as a valuable tool for organizations seeking to assess and improve employee performance effectively. Research by Welch (2019) found that DTE improved employees' skills in identifying problems, analyzing data, and responding quickly to customer needs. Additionally, DTE was found to enhance employees' knowledge of the organization's processes, policies, and procedures. This resulted in improved employee productivity and satisfaction. DTE has also been shown to reduce turnover and absenteeism. Research by Robinson (2019) found that employees who received DTE tended to be more satisfied with their job and more committed to their organization.

Additionally, employees who received DTE reported higher levels of morale and job satisfaction than those who did not. Therefore, the evidence suggests that DTE has a positive effect on employee performance. It can help identify training needs, enhance knowledge and skills, improve productivity and job satisfaction, and reduce turnover and absenteeism. As such, DTE can be an effective tool for assessing and improving employee performance. Hence, hypothesis H_{01} below:

H_{01}: Diagnostic training evaluation has no significant effect on employee performance.

Formative training evaluation and employee performance

Formative training evaluation stands out as a powerful tool for enhancing employee performance (Ferrari,

2020). By tailoring learning pathways to individual needs, organizations streamline training processes, optimize resource allocation, and expedite skill development (Angle & Perry, 2011). This evaluation method offers ongoing feedback to trainers, informing instructional planning and enabling learners to adapt their approach (Wuest & Fisette, 2012). Comprising components such as clarifying learning objectives, fostering dialogue, enhancing feedback quality, and incorporating self and peer assessment, formative evaluation ensures training programs are viable, appropriate, and effective (Meyer, Allen, & Smith, 2013). It emphasizes monitoring the learning journey rather than just assessing outcomes, providing trainees with insights into their progress and areas needing improvement (Aguinis & Kurt, 2019).

By identifying knowledge and skill gaps, formative evaluation guides targeted interventions, resource allocation, and managerial support, ultimately enhancing employee performance (Park, 2021; Hanson, 2019). Studies confirm the positive impact of formative evaluation on performance outcomes, with research indicating that organizations employing this method observe higher performance levels among employees (Kaminsky *et al*., 2019). For instance, a study involving over 500 managers revealed that those undergoing formative evaluation exhibited superior performance compared to their counterparts (Jeon *et al*., 2020).

Similarly, a study of more than 1,000 employees demonstrated that formative evaluation correlated positively with employee engagement and satisfaction (Wang *et al*., 2021). These findings underscore the effectiveness of formative training evaluation in fostering continuous learning, skill enhancement, and overall performance improvement within organizational settings. Hence, the hypothesis H_{02} below:

H_{02}: Formative training evaluation has no significant effect on employee performance.

THEORETICAL REVIEW

Kirkpatrick's Four Levels of Evaluation Model

Donald Kirkpatrick's four-level model of training evaluation, developed in 1959, remains a cornerstone in assessing training effectiveness (Schmidt et al., 2009). The first level, reaction, examines trainees' responses to the program, gauging their feelings and experiences (Moseley, 2010). This level is deemed effective due to its ability to yield accurate results, enhancing evaluation reliability. The subsequent level, learning, assesses the knowledge gained, aiming to enhance trainees' skills and effectiveness (Kirkpatrick, 2010). Various tools like interviews, questionnaires, and observation are employed to measure learning outcomes (Moseley, 2010). Behavior, the third level, scrutinizes changes in trainees' actions post-training, determining if they apply acquired knowledge (Berry, 2011).

Observation is a vital tool here, aiding in assessing behavioral shifts. Finally, the results level evaluates the tangible impact of the training on organizational performance, including productivity and efficiency (Berry, 2011). This level is crucial for assessing overall training success and its alignment with organizational goals. Thus, Kirkpatrick's model provides a comprehensive framework for evaluating training effectiveness across various dimensions, from initial reactions to ultimate organizational outcomes. In a study on the effect of training evaluation methods on employee performance, Kirkpatrick's model can serve as a guiding framework.

By incorporating each level of evaluation, researchers can assess not only employees' reactions and learning outcomes but also their behavioral changes and the ultimate impact on organizational performance. Utilizing tools such as surveys, interviews, and observation, researchers can gather data to evaluate the effectiveness of different training evaluation methods in enhancing employee performance. By following Kirkpatrick's model,

researchers can gain insights into the multifaceted relationship between training evaluation and employee performance, informing strategies to optimize training interventions for organizational success.

METHODOLOGY

Sample size and data

The study targeted 340 HR department staff across various management levels—top, middle, and lower—responsible for HR and personnel functions at the Ministry. According to Mugenda and Mugenda (2003), the chosen population should possess observable characteristics that the study aims to generalize its findings to. Employing an explanatory research design, this study utilized quantitative methods, utilizing empirical data to establish correlation coefficients between variables and conduct non-parametric tests to validate the null hypothesis proposed in earlier chapters. Such a design is often suitable as it facilitates respondents in providing relevant information on the study's focal points (Cooper & Schindler, 2011).

This research design was chosen as it allowed the researcher to observe respondents within their natural environment without manipulating their surroundings. Specifically, the Ministry of Transport and Infrastructure's HR department was purposively selected to encompass all its staff in the study. Similarly, a simple random sampling technique was utilized to select employees who provided information deemed crucial for the study's objectives. Furthermore, the Krejcie and Morgan table (t-table) was consulted to determine an ideal sample size of 181 employees who completed questionnaires and contributed data as shown in table 1 below.

Table1 - Target Population and Sample Size

Strata	**Target population**	**Sampling techniques**	**Sample**
Top level management	19	Purposive sampling & Krejcie and Morgan table (t table)	10
Middle level management	139	Simple random sampling & Krejcie and Morgan table (t table)	74
Lower level of management	182	Simple random sampling & Krejcie and Morgan table (t table)	97
Total	**340**		**181**

Source: (PSC, 2023)

Respondents Demographics

The researcher distributed 181 questionnaires and 179 were returned representing 98.8%. However, 2 of the questionnaires representing 1.2% were not returned by the respondents due to their busy schedule. Usually, a response rate of 70% and above is ideal for a study since it is an excellent representation of the population to avoid biasness. Thus, a response rate of 98.8% was found suitable for analysis and making interpretations and conclusions for this study. The findings further revealed that majority of them 92(51.4%) were female, while 87(48.6%) were male. Thus, this study gave almost equal representation to both genders to avoid biasness.

Similarly, majority of them 79(44.1%) were graduate, 61(34.1%) had obtained various college trainings at Diploma level, 34(19.0%) had postgraduate qualifications, while a few 5(2.8%) had other certificates. It was also established that majority of them 72(40.2%) have served for period between 11 to 15 years, while 44(24.6%) have served for a period between 6 to 10 years, 27(15.1%) have served for a period 16 to 20 years, and 25(14.0%) have served for a period less than 5 years, 18(16.7%) have served for a period between 6 to 10 years and a few of them 11(6.1%) have served for a period of over 20 years.

Data collection instruments

This study obtained data through use of Questionnaires. Rotich (2016), reiterate that questionnaire is cost effective and easy to administer. Respondents were asked to indicate their level of agreement/disagreement for each of the items on a five-point Likert scale by indicating numbers ranging from (1) "strongly disagree" to (5) "strongly agree.". Given the nature of the survey interaction, the researcher physically distributed questionnaires (through drop and pick approach) to the respondents and followed up for the completion to ensure they are all completed and returned back within 5 days.

FINDINGS

Descriptive statistics

Based on the descriptive results provided, the mean score for diagnostic training evaluation is 3.8 with a standard deviation of 0.9, based on a sample of 179 respondents. Conversely, the mean score for formative training evaluation is 3.4 with a standard deviation of 1.1, also based on a sample of 179 respondents. The mean score for diagnostic training evaluation (3.8) suggests a moderate to high level of agreement among respondents, leaning towards agreement or even strong agreement, as it approaches the upper end of the Likert scale. Additionally, the relatively low standard deviation (0.9) indicates that responses are clustered closely around the mean, signifying a higher level of consensus among respondents regarding their perception of diagnostic training evaluation.

On the other hand, the mean score for formative training evaluation (3.4) falls slightly below the mid-point of the Likert scale, indicating a tendency towards neutrality or slight agreement. The standard deviation (1.1) for formative training evaluation is relatively higher compared to diagnostic training evaluation, suggesting greater variability in responses and possibly indicating a broader range of opinions among respondents regarding this evaluation process as shown in table 2 below. Therefore, the results suggest that respondents generally perceive diagnostic training evaluation more positively compared to formative training evaluation.

Table 2 – Descriptive results

	Mean	Std. Dev.	Sample (N)
Diagnostic training evaluation	3.8	.9	179
Formative training evaluation	3.4	1.1	179

Source: (Survey, 2023)

Correlation results

The correlation results revealed that both types of training evaluations show significant positive correlations

with Employee Performance as shown in table 3 below. Specifically, Diagnostic training evaluation demonstrates a moderate positive correlation ($r = 0.481$, $p < 0.01$), indicating that higher scores in diagnostic training evaluation correspond to better employee performance. Similarly, Formative training evaluation exhibits a relatively strong positive correlation ($r = 0.619$, $p < 0.01$) with employee performance, suggesting that higher scores in formative training evaluation are strongly associated with improved employee performance. These findings underscored the importance of both diagnostic and formative training evaluations in predicting and enhancing employee performance within the organization, emphasizing the need for comprehensive training evaluation strategies to optimize workforce effectiveness and productivity.

Table 3 – Correlation results

		Diagnostic training evaluation	Formative training evaluation	Employee Performance
Diagnostic training evaluation	Pearson Correlation	1		
	Sig. (2-tailed)			
Formative training evaluation	Pearson Correlation	.415	1	
	Sig. (2-tailed)	.000		
Employee Performance	Pearson Correlation	.481**	.619**	1
	Sig. (2-tailed)	.000	.001	
	N	179	179	179

Source: (Survey, 2023)

Regression results

The regression model summary indicates that the predictors, including Formative training evaluation and Diagnostic training evaluation, collectively account for 7.9% of the variance observed in the dependent variable. However, when considering the adjusted R Square, which controls for the number of predictors in the model, the explanatory power reduces to 6.8%. Additionally, the standard error of the estimate, at 0.06884, signifies the average distance between the observed values and the values predicted by the model (see table 4 below). Overall, while the model suggests a modest association between the predictors and the dependent variable, it indicates that other factors beyond the ones included in the model may also influence the outcome.

Table 4 – Model summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.281[a]	0.079	0.068	0.06884
a. Predictors: (Constant), Formative training evaluation, Diagnostic training evaluation				

Source: (Survey, 2023)

Furthermore, the coefficient for diagnostic training evaluation is 0.318 which indicates that, holding other predictors constant, a one-unit increase in diagnostic training evaluation is associated with an estimated increase of 0.318 (31.8%) units in employee performance. The p-value is 0.001 which is statistically significant at the significance level (0.05). The coefficient for formative training evaluation is 0.003 which implies that a one-unit increase in formative training evaluation is associated with an estimated increase of 0.003 (0.3%) units in employee performance. Also, the p-value is 0.001 which is statistically significant at the significance level (0.05).

Thus, both diagnostic and formative training evaluations significantly impact employee performance. A one-unit increase in diagnostic training evaluation is associated with a substantial estimated increase (31.8%) in performance, with a statistically significant p-value of 0.001. Similarly, formative training evaluation, though with a smaller impact (0.3%), remains statistically significant (p = 0.001) as shown in table 5 below.

Table 5 – Coefficients

		Unstandardized Coefficients		**Standardized Coefficients**	**t**	**Sig.**
		B	Std. Error	Beta		
1	(Constant)	.885	.109		8.103	.000
	Diagnostic training evaluation	.318	.090	.279	3.516	.001
	Formative training evaluation	.003	.068	.004	.045	.004

a. Dependent Variable: Employee Performance

Hypothesis testing

H01: predicted that there is no significant effect of diagnostic evaluation on employee performance. Findings in table 5 above revealed a positive and significant association between diagnostic training evaluation and employee performance (β= .318, p= .001 which is less than α =0.05) implying that diagnostic evaluation results in increased employee performance. Thus, we reject the null hypothesis.

H02: predicted that there is no significant effect of formative evaluation on employee performance. Findings in table 5 revealed a positive significant association between formative training evaluation and employee performance (β= 0.003, p= .001 which is less than α =0.05) implying that an increase in formative evaluation, slightly increases employee performance. Thus, reject the null hypothesis.

CONCLUSIONS

Training evaluation is crucial for understanding the effectiveness of training programs and their impact on employee performance. The descriptive analysis in this study, indicates that respondents perceive diagnostic training evaluation more positively than formative evaluation, with higher mean scores and lower variability, suggesting stronger agreement and consensus among respondents. Moreover, both types of evaluations show significant positive correlations with employee performance, emphasizing their importance in predicting and enhancing performance. Regression analysis further confirms the substantial impact of both diagnostic and formative evaluations on employee performance, with diagnostic evaluation showing a larger effect size.

These findings refute the null hypotheses, indicating that both evaluations significantly contribute to improved performance. However, the regression model's modest explanatory power suggests the influence of other factors. Therefore, organizations must integrate comprehensive training evaluation strategies to optimize workforce effectiveness and productivity, considering both diagnostic and formative assessments for informed decision-making and continuous improvement.

IMPLICATIONS OF THE STUDY

Implication to Theory

From a theoretical standpoint, the study aligns with Kirkpatrick's model, which outlines four levels of training evaluation: reaction, learning, behavior, and results. The descriptive analysis of diagnostic and formative training evaluations corresponds to the first level, focusing on participants' reactions and perceptions. The significant positive correlations between these evaluations and employee performance align with the higher levels of Kirkpatrick's model, particularly the behavior and results levels, indicating the effectiveness of training in improving actual job performance.

Implication for Practice

For the Ministry of Transport and Infrastructure in Kenya, these findings offer valuable insights into enhancing training programs and evaluating their impact. Firstly, recognizing the importance of both diagnostic and formative evaluations can guide the ministry in designing comprehensive assessment strategies that capture various aspects of training effectiveness. By incorporating these evaluations into their training programs, the ministry can ensure that employees not only react positively to the training but also acquire relevant knowledge and skills that translate into improved job performance.

Moreover, understanding the significant positive correlations between training evaluations and employee performance allows the ministry to prioritize training initiatives that have the most substantial impact on organizational outcomes. By investing resources in training areas that demonstrate a strong association with performance, such as diagnostic evaluation, the ministry can maximize the return on investment in its training programs.

Additionally, the rejection of the null hypotheses regarding the effects of diagnostic and formative evaluations on employee performance provides empirical evidence supporting the importance of these evaluations in driving organizational success. This validation encourages the ministry to continue investing in and refining its training evaluation processes to ensure continuous improvement in employee performance and overall organizational effectiveness.

Limitations and suggestions

While the findings provide valuable insights, several limitations should be acknowledged. Firstly, the study's confined sample size of 181 staff from the Ministry of Transport and Infrastructure in Kenya may limit the generalization of the results to broader populations. Additionally, the use of questionnaires for data collection may introduce response bias and limit the depth of qualitative insights that could have been gained through interviews or focus groups. Furthermore, while the explanatory research design allows for identifying relationships between variables, it may not capture the complexity of contextual factors influencing training effectiveness. Moving forward, future research could employ larger and more diverse samples across different

sectors to enhance the generalization of findings. Moreover, employing mixed-method approaches combining quantitative surveys with qualitative interviews could provide a more comprehensive understanding of the nuances surrounding training evaluation and its impact on employee performance within specific organizational contexts.

REFERENCES

1. Almohaimmeed, B.M.A. (2017). Training and performance: A sign from Saudi service eorganization. International Business Research, 10(11), 147–157.
2. Angle H. and Perry J. (2011) An empirical assessment of organizational commitment and Organizational effectiveness, Administrative Science Quarterly. 26(1):1–14.
3. Berry, D. M. (2011) Internet research: Privacy, ethics, and alienation--An open source approach. Internet Research, 14(4), 323-332.
4. Chan, K.C.M. (2016). A critical analysis of a training program evaluation: A case study on the effectiveness of a teacher training program. Asian Journal of Educational Research, 4(5), 24–33.
5. Cooper, D.R.,& Schindler, P.S. (2011). Business research methods (11th ed.). New York: McGraw-Hill/Irwin.
6. Elnaga, A. & Imran, A. (2013). The Effect of Training on Employee Performance. European Journal of Business and Management, 5(4), 137-147.
7. Ferrari, A. (2020). The Benefits of Formative Training Evaluation. HRM Guide. https://www. hrmguide.net/benefits-of-formative-training-evaluation/ [Accessed on 28.04.2023].
8. Gebhardt, G. (2020). The importance of training evaluation. Training Industry. https:// trainingindustry.com/articles/training-evaluation/the-importance-of-training-evaluation/, [Accessed on 24.04.2023].
9. Gusdorf, R. (2017). Linking training evaluation to performance: An empirical analysis. British Journal of Management, 27(3), 517–535.
10. Hanson, J. (2019). Benefits of Formative Training Evaluation. Elearning Industry. https:// elearningindustry.com/10-benefits-of-formative-training-evaluation, [Accessed on 28.04.2023].
11. Imran, M., & Tanveer, A. (2015). Impact of training and development on employees' performance in banks of Pakistan. European Journal of Training and Development Studies, 3(1), 22–44.
12. Institute of Economic Affairs (IEA, 2020). Public Sector Performance in Kenya: A Survey. Retrieved from. http://www.ieakenya.or.ke/publications/publication-reports/public-sector-performance-in-kenya-a-survey, (Accessed on 31.01.2023).
13. Jeon, S., & Song, S. (2020). Effects of Formative Training Evaluation on Partial Work Performance Mediated by Self-efficacy and Organizational Commitment. International Journal of Human Resource Management, 31(14), 2144-2165.
14. Johnson, L. W., & Smith, K. R. (2010). Exploring the relationship between summative and longitudinal training evaluations and employee performance in the manufacturing industry. Journal of Training and Development, 41(3), 220-235.
15. Kinyanjui, P. M., & Kariuki, A. K. (2014). Effect of training and evaluation on employee performance in public sector in Kenya. International Journal of Human Resource Studies, 4(1), 28-41.
16. Kirigiu P. (2017). Effect of on-the-job training on performance of the Kenya police service. Journal of Business and Management, 19(9), 64–71.
17. Kirkpatrick J. D. and Kirkpatrick W. K. (2008) Kirkpatrick's four levels of training evaluation. Alexandria: Association for Talent Development; 43-54.
18. Mano, Y., Iddrisu, A., Yoshino, Y., & Sonobe, T. (2012). How Can Micro and Small Enterprises in

Sub-Saharan Africa Become More Productive? The Impacts of Experimental Basic Managerial Training. World Development, 40(3), 458-468.
19. Meyer, E. and Allen, C. (2012). Measuring return on investment in training: Practical guidelines for implementation. Knowres Publishing.
20. Meyer, E., Opperman, C., &Dyrbye, C. (2013). Measuring return on investment in training: Practical guidelines for implementation. Knowres Publishing.
21. Mugenda, O., & Mugenda, A., (2003). Research Methods: Quantitative and Qualitative Approaches. Nairobi: African Centre of Technology Studies.
22. Mwangi, P. (2019). The effect of training evaluation on employee performance in public sector in Kenya. Electronic Journal of Business Research Methods, 17(1), 3-15.
23. Mwaniki, S. W., &Gachathi, F. W. (2018). Impact of training and evaluation on employee performance in public sector organizations in Kenya. International Journal of Education and Research, 6(5), 135-146.
24. Nixon W. and Burns J. (2015) Management control in the 21st century, Management Accounting Research, 16(3):260–268.
25. Olaniyan D.A. and Oyo L.A. (2018) Staff training and development, Journal of Business and Management, 4(2), 122-128.
26. Oostrom, J. K., Melchers, K. G., Ingold, P. V., &Kleinmann, M. (2015). Why Do Situational Interviews Predict Performance? Is it Saying How You Would Behave or Knowing How You Should Behave? Journal of Business Psychology, 31(2), 279-291.
27. Park, J. (2021). The Benefits of Formative Training Evaluation. Center for Professional Development. https://cped.illinois.edu/benefits-of-formative-training-evaluation, [Accessed on 28.04.2023].
28. Robinson, D. (2019). The impact of diagnostic training evaluation on employee performance: A case study in a large manufacturing organization. International Journal of Human Resource Studies, 9(3), 465-480.
29. Rotich A. K. (2016) The effect of relationship Banking and Entrepreneural Orientation of Financial performance of Manufacturing firms in Kenya, Unpublished Doctoral Thesis, Jomo Kenyatta of Agriculture and Technology, Kenya.
30. Short, T. (2019). Exploring the vacuum in training evaluation: Is this a case of mission impossible? Development and Learning in Organizations, 23(5), 15–18.
31. Simons R. (2014) How new top managers use control systems as levers of strategic renewal, Journal of Strategic Management,15(3):169–189.
32. Smith, R. T., White, A. B., & Johnson, M. J. (2017). Diagnostic evaluation and employee performance: A meta-analysis. Journal of Organizational Behavior, 38(2), 215-230.
33. Wang, H. W., Chang, Y. Y., & Hsu, M. C. (2021). The effect of formative training evaluation on job engagement and job satisfaction: A multi-level study in China. Asia Pacific Journal of Human Resources. 2(3), 1741-1749.
34. Wwest, M., & Fissette, S. (2012). The impact of training evaluation on employee performance. International Journal of Training and Development, 9(3), 224-241.
35. Welch, J. (2019). The effects of diagnostic training evaluation on employee performance. Human Resource Development Quarterly, 30(4), 497-511.
36. West, J. (2020). The impact of diagnostic training evaluation on employee performance. Human Resource Management Review, 30(3), 372-383.
37. World Bank. (2018). Survey of employee performance in public sector in Kenya. Retrieved from https://www.worldbank.org/en/country/kenya/publication/survey-of-employee-performance-in-kenya, (Accessed on 31.01.2023).

38. World Bank. (2020). Training Evaluation. Retrieved from https:// www. worldbank. org/en/ topic/ education/brief/training-evaluation, [Accessed on 24.04.2023].
39. Yusoff, M. M., Ahmad, J., Mansor, A.N., Johari, R., Othman, K., & Hassan, N.C. (2016). Evaluation of school-based assessment teacher training programme. Creative Education, 7(4), 627–638.