

The Effect of Performance Management system on Employees' Performance: The Case of Selected Public Sectors of Addis Ababa City Administration

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Abstract

Performance Management System is among the New Public Management (NPM) reform initiatives that has been adopted and implemented in Ethiopia, aiming to bring performance improvement in the public sectors and improving individuals' performance. The study examined the effects of Performance Management System on Employees' Performance in the selected public sectors of Addis Ababa city Administration. A quantitative research approach and descriptive-explanatory design were employed; and primary data were collected from employees, process owners and leaders in the selected sectors. Both descriptive statistics (Mean and Standard deviation) and inferential statistics (regression analysis) were used to see the relationship and predicting ability of performance management system on employees' Performance. The result revealed that the existence of positive and moderate relationship between components of Performance Management system and Employees' Performance in the selected sector. Moreover, Performance Management System can explain 26.9% of the change in employees' Performance ($P=0.000 < \alpha = 0.01$). Hence, the sectors should strive to effectively implement Performance Management system to enhance its' contribution in improving employees' performance.

Key-Words: Employees' Performance, Performance Management System, Public sector

1. Introduction

In the “era of Governance by Performance Management (PM), Public sectors are expected to be able to demonstrate its value and to constantly seeks new ways that fosters Performance” (Moynihan (2008:1). Performance Management system (PMS) has become the most critical elements of an organization (Kims & Kang, 2016), and its importance in improving both individual and organizational performance recognized well (Whitford & Coetsee, 2006; Palethorpe, 2011 & Yang et al. 2016). Indeed, the ultimate goal of PM is to improve

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performance and, in so doing, to achieve the objectives (Greener, 2003; Mizrahi et al., 2009; Van Dooren et al., 2010 & Anup & Nikhil, 2021).

Accordingly, organization with viable PMS can enhance employees' and organizations performance. Moreover, a well-defined PMS has a significant effect on employees' performance (Schneier et al., 2013) and organizational performance (Challa et al, 2022). On the other continuum, employees are the vital elements of any organization that should be managed and developed actively, as their performance determines the fate of the organization (Peng, 2007 & Tegene, 2008). Another scholar added that, "People are the "glue" that holds all the other assets, such as financial and physical ones, together and guides their use to better achieves results" (Mathis & Jackson, 2010 cited in Kulla & Soetjpto, 2017). Indeed, it is difficult for an organization to realize its goal without competent and motivated employees' even with perfect plans, a sound organizational structure, and finely tuned control systems, employees' performance makes the real difference in any organization. In this regard studying the factors which affect the performance of employees is crucial.

Undertaking the importance of public sectors and their influence on the day-to-day activities of citizens, studying the factors that determine the overall organizational performance of the sector is very crucial (Kassahun, 2012, cited in Challa et al, 2022). Besides, understanding the effect of PMS on performance particularly employees' performance is important and value-adding apart from other driving factors of performance. In relation to this, the study focused on four important sectors (Land Management and Development, Vital Event registration, Government Revenue, and Public service and Human resource development Office) which are expected to provide service to the citizen and employees but criticized by their poor Performance. Hence, employees' Performance determine their day to day service provision(service performance) and undertaking studies on how PMS contribute or affect their employees' Performance can give insight to stakeholders so as to work on the system. Moreover, research studies on the effect of PMS on employees' performance are limited; most research focuses on the practice and design of PM (Gao, 2015), the link between Performance appraisal and employees' performance(Trsit, 2018), Even, more studies were undertaken in private sectors (different industry); the effects of PMS on Teachers' efficiency in private school (Shahid, et al., 2014), the impact of PM on employees' and organizational performance in Tanzania private sector(Samwel, 2018). In the context of Ethiopia, research studies have been undertaken regarding Performance Management in different context and scope; the practice and Challenges of Performance Management system in Commercial Bank of Ethiopia (Abdurezak& Tigist ,2019), the effect of Performance Management practice on Employees' Performance in Jimma public institutions(Bedassa & Shimelis 2021), the effect of Performance Management System in Organizational Performance in selected sectors of Federal Bureau (Challa et al. ,2022).

On the other continuum, a mixed result evidenced in the relationship between Performance Management and Employees' Performance; positive but insignificant relationship (Zhang, 2012); a significant positive relationship (Samwel, 2018; Okeke et al., 2019) and a moderate and positive effect (Abdulai, 2019). Since, Performance of public sectors really impacts the day to

day activities of the citizen; and improving Employees Performance contribute to realize the overall objectives of Public sectors via enhancing organizational performance, much more research work is needed (Hodgkinson et al., 2017, cited in Challa et al. , 2022) to clearly understand the link between PM and Performance. Hence, the current study can provide insight on the relationship between components of PMS and EP in addition to examining the predicting effect of Performance Management System (PMS) on Employees' Performance (EP) in the context of Addis Ababa city Administration. The outputs of the study can be addition to the existing knowledge of PM.

The remaining part of the article comprises a summary of the theoretical and empirical literature on Performance, PM and employees' performance, research methods, result and discussion, and conclusion.

2. Literature Review

2.1. Theoretical Literature Review

2.1.1. Performance and Performance Management

Various Scholars (Armstrong & Baron, 2002; Chan, 2006; Armstrong, 2009 and Yang et al. 2016, DeNisi & Murphy, 2017) in the field viewed Performance Management (PM) as a way of improving Performance. Performance is the combination of all efforts, may be physical or mental or both, carried out by an individual that can go and fit somewhere in the bigger picture, might it be a team's collective performance, an organizational output, or a whole societal development(Armstrong, 2009). Moreover, Performance refers to the level of success or achievement of employees during a specified period of time in undertaking tasks against work standards, targets or predefined criteria that have been mutually agreed upon (Al Mehrzim & Singh, 2016). On the other hand, PM focuses on the entire activities undertaken to improve the overall performance of the organization including each employee and group performance in the organization (Yang et al. 2016). Similarly, Baron & Armstrong (1998) operationalized PM, as a 'strategic and integrated approach' to bring continued success to the organizations via enhancing the 'performance of the employees in the organization and capacitating teams and individual contributors while Performance is about doing the job and the results achieved from that work (Armstrong & Baron,2002).

According to Moynihan (2008:5 cited in Cepiku, 2016), PM is "a system that generates performance information via strategic planning and performance measurement practices and that provides this information to influence a range of possible decisions". Chan viewed PM, as a "strategy for improving employee performance, productivity, and effectiveness (2006: 149). With this, the main purpose of PM is to 'transform the raw potential of human resource into performance' by eliminating intermediate barriers as well as motivating employees (Kandula, 2006). Moreover, the essence of PM is capacitating and effectively managing the human elements of an organization (Cabrera & Banache, 1999, cited in Ahmad, 2012), to enhance organizational performance (Buchner, 2007) and effectiveness (Cardy, 2004, cited in Gruman &

Saks, 2011). As advocated by Muhammad et al. (2013), a successful Performance management system (PMS) can facilitate to attain organizational goals via employee performance; PMS focuses to improve the effectiveness and efficiency of the employee (DeNisi & Murphy, 2017). PMS can deeply enhance employees' performance, behavior and skills (Taylor & Peirce, 2019). Hence, having the right PMS is a concern of every organization because it is an important driver to be a front-runner in the industry by evaluating and developing employees' performance to get enhanced organizational success.

2.1.2. Performance Management Theories

Performance management theories are an important part of organizational behavior which helps to enhance employees' performance and productivity with motivation and development. Among these theories, goal setting theory, control theory, and social cognitive theory discussed under to provide little insight how PM (components) and Employees' performance are related.

Goal setting Theory

Based on Latham and Locke(1979) Goal theory, goal setting affects employee Performance in four ways; direct attention to priorities, stimulate effort; challenge people to bring their knowledge and skills to increase their chance of success; and employees are willing to unleash their potential to the fullest if goals are more challenging In short, "goal theory promotes the emphasis in performance management on setting and agreeing on objectives against which performance can be measured and managed". In general, the theory focuses on the important relationship between goal and Performance. The goal setting theory starts with simply setting performance goal motivate and inspire employee to focus on achieving predetermined goals.

Control Theory

Control theory focuses attention on feedback as a means of shaping behavior. As people receive feedback on their behavior they appreciate the discrepancy between what they are doing and what they are expected to do and take corrective action to overcome the discrepancy. Feedback is recognized as a crucial part of performance management cycle (UK Essay, 2018).

Social cognitive Theory

Social cognitive theory was developed by Bandura (1986 cited in 2018). It is based on his central concept of self-efficacy. This suggests that what people believe they can or cannot do powerfully impacts on their performance. Developing and strengthening positive self-belief in employees is therefore an important performance management objective (Armstrong, 2009).

The model for performance Management system exhibited how the system should be implemented while there is no single model universally agreed upon. Mabey et al.(1999 cited in Fatile, 2014), have prescribed the model of PMS in the form of 'performance management cycle'. This implied that PMS constituted by five major components; goal setting, performance measurement or evaluation, feedback, reward and amendment. Similarly, Agere and Jorm(2000) also identifies PMS components and prescribed public sectors to establish clear goals, measure indicators , report this information and, link this information to strategic decisions(reward,

training provision etc.) aimed at improving performance. Moreover, McDavid & Hawthorn (2005) underscored that PM cycle begins with setting clear and commonly agreed upon objectives, measure performance based on predefined objectives then provide feedback based on result, reward outcomes and finally work to improve performance. Itika(2011)also come up with a Model of PMS cycle which constituted by performance Planning, performance execution, Performance assessment ; and reward and development; understanding the mission and vision taken as a pre-request activities. On the other hand, a model by Bredrup(1995) , indicated that PM constituted by three main process i.e. Performance Planning, improving and reviewing. Finally, the study adopted Mabey et al. (1999 cited in Fatile, 2014) model of PMS cycle.

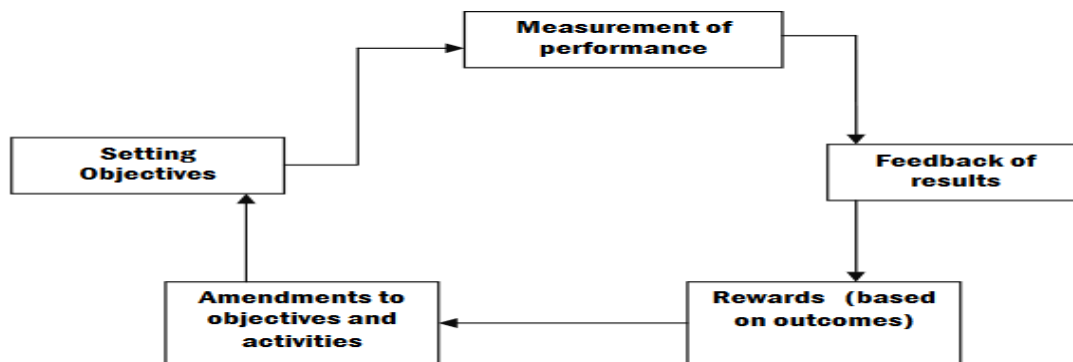


Fig1. Performance Management System Cycle (Adapted from Mabey et al., 1999:93, cited in Fatile, 2014)

2.1.3. Performance Management in the Public sector

Due to the ever growing demands of the modern society and failure of the old administrative model, Public sectors face various challenges and pressures to provide quality service. To tackle the challenges, public administration have been undergone through different reform, New Public Management (NPM) movement was among the reform initiatives. NPM reform initiatives hugely dictated by private sector ethos and corporate sector techniques to shape public sector practices (Sharif, 2002; Edigheji, 2008 cited in Solomon, 2013). In relation, PMS, as key components of NPM, have been adopted and implemented in public sectors worldwide to address concerns regarding performance in the public Sector (Ma, 2017).

Organization with viable PMS can enhance performance of employees' and the overall organizations performance. Moreover, a well-defined PMS has a significant effect on employee performance (Schneier et al. 2013; Makeri, 2014) and organizational performance (Challa et al, 2022). Though, public sectors are eager to enjoy the benefits of utilizing PMS, they fail to properly adopt and implement the system. Janes (2018) also confirmed, Public sectors are struggling to move beyond the adoption of performance measurement and management so as to create more robust performance management systems for higher levels of accountability and transparency.

Regarding African public sectors, Fatile (2014) noted that, PM has been adopted and implemented with the purpose of monitoring, reviewing, assessing performance and

acknowledging good performance but the expected result were not achieved. Mbore & Cheruiyot (2017) also added, African public sectors are failed to introduce and implement results-based management system properly. Hence, Public sectors are still unsuccessful regardless of their efforts which impact the contribution of PMS in employees' performance. Likewise, reform implementation have not brought what is expected in the public sectors of Ethiopia (Getachew & Richard, 2007), though the government adopted and implemented with the grand objectives of transforming the civil service through addressing the key challenges that hinder the performance of the civil service and improving overall performance (MOCS, 2013).

2.1.4. Employee Performance

Employees are key resources of the firm to be actively managed and developed, as their performance determines the fate of the organization (Peng, 2007 and Tegene, 2008). Mathis & Jackson (2010) added that, People are the “glue” that holds all the other assets, such as financial and physical ones, together and guides their use to better achieve results. Indeed, it is difficult for an organization to realize its goal without competent and motivated employees' even with perfect plans, a sound organizational structure and finely tuned control systems, employees' performance make the real differences in any organization.(Peng, 2007 & Tegene, 2008). Accordingly, managing and improving performance gain a paramount importance both in private and public sector organization especially in this dynamic era.

According to Daft (2000), employee performance is the ability of employees to carry out a task or achieve the objective. In relation to this employee performance at work refers to the productivity of employees at work and constituted with various employees' behaviors and actions contributed to the achievement of goal (Bernards, 2011; Shmailan, 2016). It is the most important elements of any organization as it determines the success and failure; effective employee performance is a key to the overall success of an organization. Bernards(2011 provides a framework for employees' work performance which incorporates four dimensions of behaviors and action of employee at work i.e. Task performance, contextual performance, counter productive work performance and adaptive performance.

1. Task performance refers to the ability of employee to perform task central to their job or responsibilities. This includes the ability of employee in planning and organizing work, Prioritizing, being result oriented and focus on work efficiency and quality.

2. Contextual performance refers to the behavior of employees which facilitate to perform the central job, the behavior supports organizational, social and environmental. This dimension includes behaviors like 'taking initiative', 'accepting and learning from feedback', 'cooperating with others', 'adequately expressing ideas and intentions'

3. Adaptive performance refers to the ability of employee in adapting to changes (change in work environment or work rules). It includes; Coming up with creative solutions to novel, difficult problems Keeping job knowledge up-to-date, Keeping job skills up to date, dealing with

uncertain and unpredictable work situations, Adjusting work goals when necessary able to deal with stress, difficult situations and adversities.

4. Counter productive work behavior refers to behavior that is destructive to the wellbeing of the organization. It includes excessive negativity, making problems bigger than they are, doing things that are harm the organization (e.g. not following rules, discussing confidential information), doing things that harm your co- workers or supervisors (Bernards , 2011).

2.1.5 The Effects of PM on Employees' Performance

Performance management theories such as goal setting theory , expectancy theory and control theory revealed how performance management system cycle affect employees' performance positively, if implemented well. Performance Management (PM) is viewed as a way of improving Performance (Armstrong & Baron, 2002; Chan, 2006; Armstrong, 2009 and Yang et al. 2016, DeNisi & Murphy, 2017). It is a strategy for improving employees' performance, productivity, and effectiveness whereas employees' performance is the ability of employees to achieve objectives. It is through employees' performance that organization performance can be realized. Congruently, a positive and significant effect of PMS on Employees' performance was evidenced (Israr. & Haq, 2014 and Bedassa & Shimelis 2021) and expected from the study.

2.2. Empirical Literature Review

A study by Israr. & Haq(2014), examine the effects of Performance management system on Teachers efficiency in private school by employing a Pearson correlation and regression analysis techniques and the results indicated that, performance management system significantly and positively affect teachers' efficiency. Besides, the study indicated the relative importance of performance management component in explaining Teachers efficiency.

Another study by Samwel (2018),explore the impact of performance management on employees' and organizational performance in Tanzania private sector. A cross-sectional survey design with quantitative research approach and simple linear regression analysis techniques adopted. Finally, the finding confirmed that there is a significant relationship between performance management and employee performance; and performance management and organization performance in Tanzania private sector.

Mborea & Cheruiyot (2017) study Employees' Performance Measurement and Management in the African Public Sectors. The result revealed that, African public sectors failed to introduce and implement results-based management properly hence public sectors are still unsuccessful regardless of their efforts.

Evidence revealed that various research studies have been undertaken by Ethiopian scholars and practitioners regarding Performance Management in different context such as Banking industry, private sectors, NGOs, Universities, local government and other. For instance, a descriptive research by Abdurezak& Tigist (2019), examine the practice and challenges of Employee performance Management system in Commercial Bank of Ethiopia. 136 participants were selected as a sample with stratified random sampling techniques. Finally, the research came

up with a mixed result regarding the practice PMS. Besides, Bedassa & Shimelis undertake a study in Jimma public institutions in 2021. The study examined the effect of PM practice on Employees' performance with quantitative research approach and descriptive research design; and 207 employees were participated in the study. The result confirmed that performance planning; performance training, performance appraisal, performance reward, and performance feedback have a positive relationship with employees Performance. Besides, the result affirmed that Performance training and feedback has a significant relationship with employees' performance.

In the same vein, Challa et al. (2022) conducted a research in 2022 on Result Oriented Performance Management and organization performance. The primary aim was to empirically assess the effect of performance management on organization performance in selected federal Bureaus of Ethiopia. The study employed multiple regression analysis techniques to see the effect of components of Performance Management (participation in target setting, performance indicator quality, evaluation of organizational performance, use of performance information, performance-based reward, and performance-based accountability) on organizational performance. The finding indicated that, overall performance management has a positive influence on organizational performance. This study also found components of performance management process i.e goal setting, performance measurement, feedback and reward have significant effect on performance. The authors prefer to examine the effect of PM on organization performance. Besides, the focus of the study was only on selected federal Bureau of Ethiopia.

Generally, the empirical review indicated that though research has been done in Performance management and Employees' Performance, most research focus on a single context, focus on performance appraisal, focus on the practice and the challenges of PM. Besides, limited studies were undertaken in the selected sectors (land, revenue, vital event registration and Public service and Human resource development) which hugely criticized due to their performance. Hence, the study provides insight how PMS link and affect employees' Performance in the selected research area.

2.3. Conceptual Framework

Based on theoretical and empirical literature review, the researcher came up with the study conceptual framework. Accordingly, Performance Management system (PMS) identified as a major independent variable constituted by objective setting, performance measurement, feedback and reward (Mabey et al., 1999 cited in Fatile, 2014) who prescribed the model of PMS in the form of 'Performance management cycle'. The dependent variable, employees' performance (EP) measured and constituted by task performance, adaptive performance, contextual performance and counterproductive performance (Bernards, 2011).

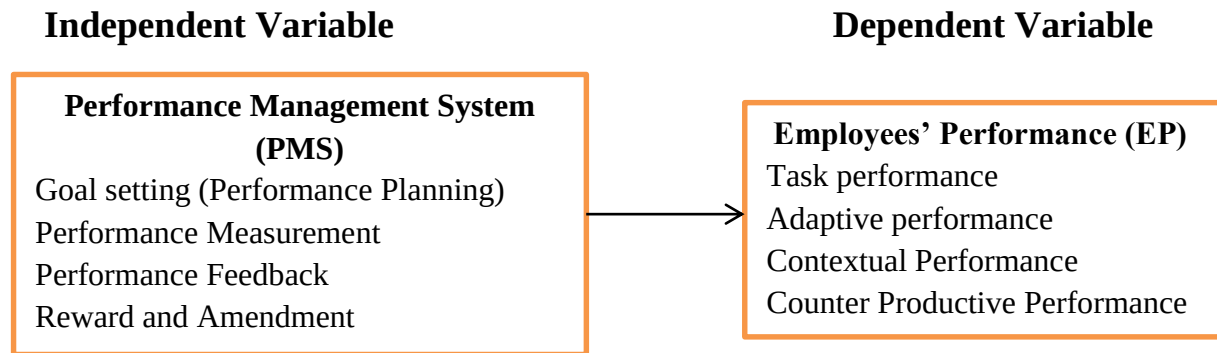


Fig 2 Conceptual framework of the study
Source: Developed based on review of Literatures

3. Research Method

3.1. Research Approach and Design

To determine the effect of Performance Management system on Employees' performance, the study employed descriptive-explanatory survey design and quantitative research approach.

3.2. Target Population

The study target populations comprise leaders, directors, process owners, team leaders and employees of Land development and Management office, Government Revenue office and Vital Event and Registration offices, and Public Service and Human resource development office in Addis Ababa city Administration.

3.3. Sampling Techniques and Sample size Determination

Both probability and non-probability sampling techniques were employed to select sample. First the researcher employed purposive sampling techniques to select sample sectors (land Development and Management office, Government Revenue office and Vital Event and Registration offices and Public service and Human resource development office) and then four sub-cities (Yeka, kolfe, Bole and Lideta) were selected randomly from eleven sub-cities of Addis Ababa city Administration. Finally, participants were selected with simple random sampling techniques from the selected four sectors with in the four sub-cities.

The sample size was determined by the finite population correction factor formula, $n = \frac{Z^2 P(1-P)D}{E^2}$. Therefore, 678 employees were taken as a sample in the study.

Where the notations are:

- Z= the Z value (or Z-score) that is the corresponding value for anticipated confidence level. Recommended value of Z-score for social rating is 1.96 to give a confidence level of 95%.

- P = anticipated proportion that have been measured from the whole population to make sure that the sample is representative. With reference to sampling for the social rating tool in various outreach studies turned out to be 33%; in estimating a minimal sample size the recommended P value is 0.33. (Levine et al., 2005)
- D= design effect, it reflects the sample design error with D. We deploy three-Stage sampling techniques for this assignment: in the first stage, we select sectors; in the second stage we select sub-cities, third stage we select individual respondents. Hence, our value for the notation D (Design Error) is 3.
- E=precision (or margin of error). In most social scales & statistical studies E is kept at 5%.

3.3. Data and Data collection Instrument

With regard to the instrument of data collection, structured questionnaires with five point likert scale were designed based on the research objectives. The questionnaire comprises five parts; the first part includes the general instruction; the second part focus on respondent demographic profile whereas third section include issues directly related to PMS cycle which also constituted by four construct i.e. goal setting, Performance measurement, feedback , reward and amendment; and the last section includes questions related to employees performance constituted by Task performance, contextual Performance, counterproductive and adaptive Performance. questions related to Employees' performance adopted with little modification Then, questionnaire was translated in Amharic language to make it appropriate and convenient for respondent and to get reliable data.

Furthermore, 30 questionnaires were disseminated to test the reliability and Cronbach's Alpha values for major constructs were calculated. The result indicated that all construct have Cronbach's Alpha value greater than 0.7. George & Mallery suggested that Cronbach's alpha values 0.9 or higher indicate excellent reliability, values ranging from 0.8 to 0.89 indicate good reliability, values ranging from 0.70 to .79 indicate acceptable reliability, values ranging from 0.6 to .69 indicate questionable reliability, values ranging from 0.5 to 0.59 indicate poor reliability, and values less than 0.5 indicate unacceptable reliability. Hence, Cronbach's Alpha value of the constructs (goal setting=0.86, performance measures= 0.75, feedback = 0.84 and reward=0.94) are above the range of acceptable reliability. Besides, based on the input from the pilot test little modification were made on questionnaire which ensure its validity.

Prior to the real data collection and dissemination of questionnaires, the researcher visited each study area and communicate with the leaders of the selected sectors to get permission and facilitation during the data collection. Four data collectors were appointed for dissemination and collection of questionnaires i.e. one data collectors assigned for one sub-city (four sectors).As the research sites are four sectors i.e. Land development and Management office, Government revenue, vital event registration office and Public service and Human resource Development office in four sub-cities (kolfe, Lideta, Yeka and Bole). All the necessary support and

supervision for the data collectors were provided by the researcher throughout the data collection period. This ensures the quality and reliability of data obtained from the fieldwork.

Finally, inappropriately completed questionnaires discarded from the onset and about 622 questionnaires were found valid for the analysis out of 678 questionnaires.

3.4. Methods of Data Analysis

Both descriptive and inferential statistical analysis techniques were used for analysis purpose. First, the data collected via questionnaire were encoded in to Statistical Software for social science (SPSS). Then simple statistics like percentage, mean, weighted mean and standard deviation were used. Finally, simple regression analysis techniques were employed to test the predicting ability of independent Variables i.e. on components of PMS (goal setting, performance measures, feedback and reward on dependent variables.(employees performance); simple regression model: $Y = \beta_0 + \beta x + e$

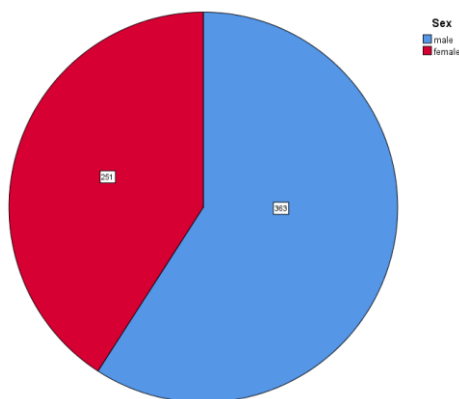
Regression question of the stud for the study; $EP = \beta_0 + \beta PMS + e$

Where Y =Predicted value i.e. Employees' Performance

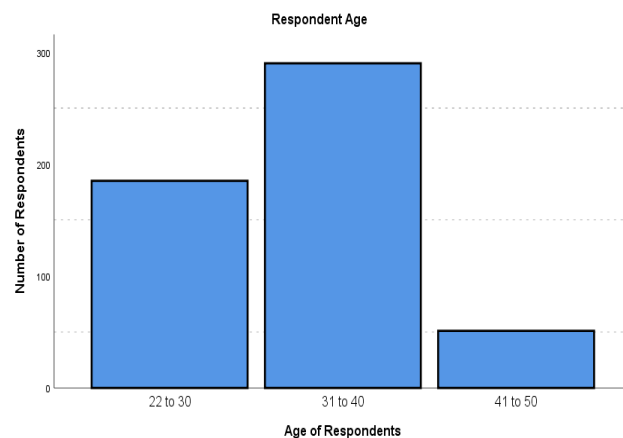
β_0 = the value of Y when other parameter set to zero(Y-intercept), βx = the regression coefficient (β) of the independent Variable (PMS) and e= model error

4. Result and Discussion

4.1. Demographic Profiles of the Respondent



Graph1. Respondents Sex

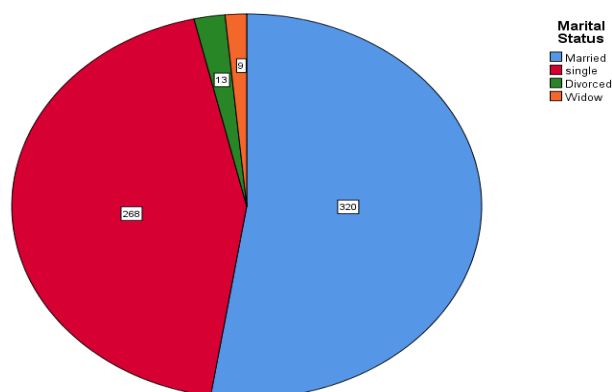


Graph2: Age of Respondents

To get the required data, 678 questionnaires were disseminated in the selected sectors and four sub-cities of Addis Ababa city and 622 found valid. Hence, the response rate is 91%.

The pi-chart above depicted that 363 (59.1%) Male and 251(40.9%) Females were participated in the study. Regarding respondents' age distribution, the above bar-graph portrayed that from the total respondents, 185(35.2%), 290(55.1%), and 51(9.7%) of respondent fall between the age group 22 to 30, 31 to 40 and 41 to 50 years respectively while 96(15.4%) of the participant fail to indicate their age. From the data, we can deduce that more

than half of the respondents age fall under the age group 31 to 40. Similarly, a Pi-chart below depicted that out of 622 respondents, 320 are married, 268 are single, 13 are divorced and 9 are widow.



Graph 3: Respondents Marital status

The Table comprises information on respondent education level and work experience. Regarding education, 306 participants which represent 50.1% of the respondent have university degree, 199(32.6%) of the respondents have second degree and 67(11%) have third degree and 39(6.4%) possess diploma as the highest education level they attended. Thus, majority of the study participants have university degree. Similarly, from the total respondent, 144(23.4%), 227(36.9%), 138(22.4%), and 107(17.4%) have a work experience ‘five years and below years, 6 to less than 11 years, 11 to 15 years and above 15 years. The result revealed that 75% of (472) the respondent have adequate experience (above five years).

Table1: Respondents education and work experience

Education Status	Diploma	39	6.3	6.4	6.4
	First Degree	306	49.2	50.1	56.5
	Second Degree	199	32.0	32.6	89.0
	Third Degree	67	10.8	11.0	100.0
	Total	622	98.2	100.0	
Work Experience	less than or equal to 5 years	144	23.2	23.4	23.4
	6 to less than 11 years	227	36.5	36.9	60.2
	11 to 15 years	138	22.2	22.4	82.6
	above 15 years	107	17.2	17.4	100.0
	Total	622	100.0		

Source: Survey Data, December 2022

4.2 Descriptive Statistics for Performance Management and Employees' Performance

Table 2: Descriptive Statistics

Variables	N	Minimum	Maximum	Mean	Std. Deviation
Goal setting	594	1.00	5.00	3.5084	.82606
Performance Evaluation	588	1.00	5.00	3.2609	.71655
Feedback	586	1.00	5.00	3.0849	.80943
Reward and amendment	599	1.00	5.00	3.0918	.88407
Employees' Performance	538	1.25	5.00	3.4402	.55746
Valid N (listwise)	488				

Source: SPSS output (2023)

The Table 2 presented descriptive result including Mean, Standard deviation, minimum and; maximum number of observation of major construct and the dependent Variables; and the result revealed that the mean value of the elements of PMS including the dependent variables fall within the minimum and maximum value which reflects a good level of consistency. Moreover, all the three construct of independent variable (PMS) having an average mean score value equal 3.287; goal setting (**Mean score=3.508 & SD=0.826**) and Employees' Performance(**Mean score=3.44 & SD=0.557**) which is near to agreement response(4) while performance evaluation (**Mean score=3.261 & SD=0.7166**), feedback (**3.085 & SD=0.809**), reward and amendment(**Mean score=3.09& SD=0.884**) have a mean score near to undecided response(3).Hence, the mean value indicated that majority of the respondent unable to decide on the existence of proper performance measurement, feedback and reward mechanisms in the selected sectors of Addis Ababa city Administration.

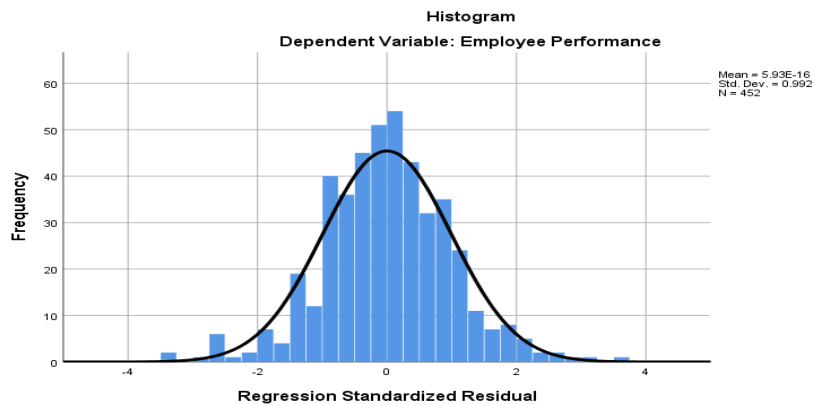
4.3. Assumption checking for simple Regression

Table3. Correlation Matrix

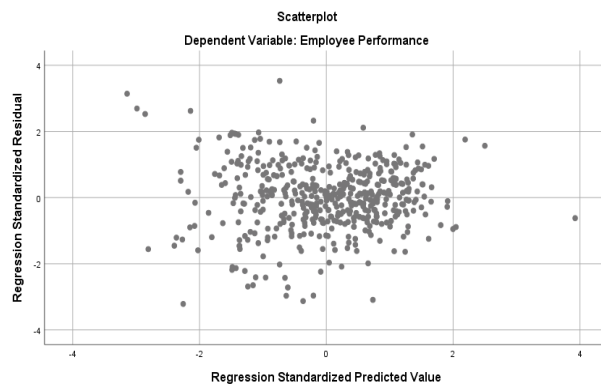
		EP	Age	DF	DD	SDD	TDD	5YD	6 to 10D	11 to 15 D	GS	EE	FB	RA
Pearson Correlation	Employee Performance(EP)	1.000												
	Age	.045	1.000											
	Dummy for Female(DF)	-.006	-.023	1.000										
	Degree Dummy(DD)	.070	.052	.265	1.000									
	2 nd Degree Dummy(SDD)	-.053	-.063	.178	-.792	1.000								
	Third Degree Dummy(TDD)	-.024	.019	.128	-.294	-.351	1.000							
	Less than 5Yrs dummy(5YD)	-.001	-.012	.045	.062	.035	-.149	1.000						
	6 to 10Yrs dummy(6 to 10D)	-.034	-.047	.001	.050	-.067	.027	-.562	1.000					
	11 to 15 dummy(11 to 15D)	.040	.065	-.045	-.118	.041	.116	-.346	-.582	1.000				
	Goal setting(GS)	.464	.030	.002	-.116	.104	.015	-.066	-.001	.065	1.000			
	Performance Evaluation(PE)	.422	.013	.041	-.019	.001	.027	-.019	-.032	.055	.613	1.000		

Sig. (1-tailed)N=488	Feedback (FD)	.508	.032	.062	-.048	.039	.012	.009	-.018	.011	.643	.644	1.000	.
	Reward and Amendment(RA)	.445	.011	.102	.050	-.043	-.010	.068	-.086	.030	.480	.456	.707	1.000
	Employee Performance(EP)	.												
	Age	.199	.											
	Dummy for Female(DF)	.457	.332	.										
	Degree Dummy(DD)	.092	.159	.000	.									
	second DegreeDummy(SDD)	.155	.113	.000	.000	.								
	third Degree Dummy(TDD)	.327	.358	.007	.000	.000	.							
	less than 5Yrs dummy(5YD)	.490	.411	.195	.121	.253	.002	.						
	6 to 10Yrs dummy(5 to 10D)	.259	.187	.495	.169	.102	.303	.000	.					
	11 to 15 dummy(11 to 15D)	.224	.109	.195	.012	.216	.014	.000	.000	.				
	Goal setting(GS)	.000	.286	.486	.013	.024	.384	.106	.495	.108	.			
	Performance Evaluation(PE)	.000	.402	.215	.360	.491	.303	.360	.271	.148	.000	.		
	Feedback (FD)	.000	.270	.119	.182	.230	.407	.433	.369	.415	.000	.000	.	
	Reward and Amendment(RA)	.000	.420	.026	.171	.208	.427	.098	.051	.281	.000	.000	.000	.

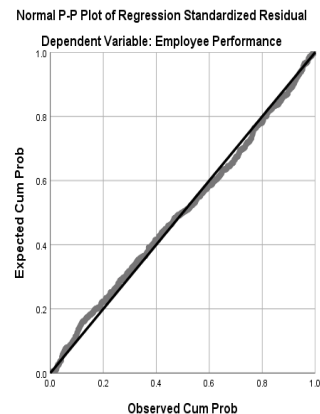
Linearity and Homoscedasticity



The above graph presented the frequency distribution of the standardized residuals compared to a Normal distribution, the normality curve indicated that many of the residuals are fairly close. Moreover, the histogram is bell shaped which lead to infer that the residuals are normally distributed. Thus, no violations of the assumption normally distributed error term.



Graph: Scatter plot



Graph: Normal P-P Plot

The assumption of homoscedasticity examined by plotting predicted value and residuals in the scatter plot. Homoscedasticity refers to whether the residuals are equally distributed, or tend to bunch together at some values or spread far apart at other values. From the scatter plot presented below, the points in the plot shows almost equally distributed above and below zero on the X-axis, and to the left and right of zero on the Y-axis. This implies that data satisfies the assumption of homoscedasticity.

Residuals are the difference between the observed value of dependent variables and the predicted value. The points in the P-P plot follows almost the straight line drawn from bottom left to the right top, the point which followed the straight line indicated that residuals have a linear relationship with the predicted dependent variables. Hence, the data satisfies linearity assumption. Based on the examination of the information presented above, there is no significant violation of the assumptions of multiple linear regressions.

4.4. Relationship between Performance Management System and Employees' Performance

According to Chon (1988), Pearson Correlation Coefficient (PCC) is a statistical measure calculating the linear relationship between two variables in a model and used as an estimation of the entire population. Based on his analysis, Correlation coefficient(r) equal to 1 or -1 reflects strong correlation and $r=0$ means there is no correlation. Besides, the correlation coefficient with in the domain of $r= 0.10$ to 0.29 weak relationship, $r =0.30$ to 0.49 moderate relationship and $r=0.05$ to 1.0 strong relationship between two variables.

When we see the relationship between the demographic variables sex, age and education and the dependent variable (Employees' performance), Pearson correlation coefficient in the coefficient matrix in Table3 above reflected that there is no statistically significant relationship i.e. sex (female dummy; $r= -0.06$), age ($r= 0.045$), education (Degree dummy $r= 0.07$, 2nd degree dummy $r= -0.05$ and dummy for 3rd degree $r=-0.02$) with P value greater than 0.01. Hence, the result indicated that, all demographic variables for the study have no significant relationship with

Table5. ANOVA Table

Model		Sum of Squares	Df	Mean Square	F	Sig.
1	Regression	41.657	1	41.657	178.958	.000 ^b
	Residual	113.129	486	.233		
	Total	154.786	487			
a. Dependent Variable: Employee Performance						
b. Predictors: (Constant), PMS						

The model summary table presents R and R², adjusted R², std. Error and sig. F change value presented. Besides, the ANOVA table presents sum of square, degree of freedom (df), Mean Square and level of significance. Henceforth, discussion and interpretation made based on the results presented in Tables 4 and Table5.

According to Ozili(2023), in social science research, the value of R square fall in between 0.1 to 0.5, is acceptable if explanatory variables are statistically significant and the sample is large. Accordingly, the value of R² is 0.26.9 with P-value=0.000<0.01. Besides, R² value (R²=26.9%) in the model summary indicated that, the overall model of the study can explain 26.9 % of change in EP. This implies statistically significant and moderate contribution of PMS in predicting employees' performance with 1% level of significant. The F-value in the ANOVA table revealed that the overall model is statistically significant with F (1, 486) = 26.9%, P=0.000< α =0.01. The results from the regression concur with other research findings such as Israr &Haq (2014) who confirmed significant and positive effect of PMS on teachers' Performance. In short, the result revealed that PMS in selected sectors of AACA have positive and moderate effect on employees' performance.

4.3.5. Regression Coefficient Analysis

Table6. Regression Coefficients

		Unstandardized Coefficients		Standardized Coefficients	t	Sig.	Collinearity Statistics	
Model		B	Std. Error	Beta			Tolerance	VIF
1	(Constant)	2.060	.105		19.680	.000		
	PMS	.428	.032	.519	13.378	.000	1.000	1.000

a. Dependent Variable: Employee Performance

Source: SPSS output (2023)

The above coefficient table presents Unstandardized and Standardized Coefficients of Beta (B), t-value, sig. value among others. When we see sig value Independent variable (PMS) and constant (p-value= 0.000< α =0.01) were statistically significant to predict EP. Standardized β coefficient of PMS= 0.512, indicated a 1% change in PMS can explain 0.52 change in EP.

Finally, based on unstandardized Beta coefficient, here is the operational model of study is

EP= 0.52PMS+ +2.06; where Y=Employee performance, EMS= Performance Management System and EP=Employees' Performance and **β_1** , is coefficient of PMS.

In general, the overall result revealed the existence of positive and moderate relationship between components of PMS i.e. goal setting, performance evaluation, feedback, reward and amendment and EP in the selected sectors of Addis Ababa city Administration. Besides, PMS can predict 27.2% of change in EP in the sectors. Hence, the sectors should strive to effectively implement Performance Management system to enhance its' contribution on improving employees' performance.

5. Conclusion

Performance Management System is among the New Public Management (NPM) reform initiatives that has been adopted and implemented in Ethiopia, aiming to bring performance improvement in the public sectors and improving individuals' performance. The study examined the effects of Performance Management System on Employees' Performance in the selected public sectors of Addis Ababa city Administration. A quantitative research approach and descriptive-explanatory design were employed; and primary data were collected from employees, process owners and leaders in the selected sectors. Both descriptive statistics (Mean and Standard deviation) and inferential statistics (regression analysis) were used to examine the relationships and predicting ability of performance management system on employees' Performance.

The finding indicated that, Employees' performance have statistically significant and moderate relationship with components of PMS cycles (goal setting $r= 0.450$, $P= 0.000<0.01$), performance evaluation ($r=0.389$, $P=0.007\leq 0.01$), feedback and reward($r= 0.486$, $P= 0.000<0.01$). Moreover, PMS can explain 27.2% of the change in employees' Performance ($P=0.000< \alpha =0.01$). Accordingly, the overall model of the study can explain 27.2% change in employees' Performance with ($F(4, 483) = 26.9\%$, $P=0.000< \alpha =0.01$) 99% confidence interval. Generally, the result indicated that Performance Management system components (goal setting, performance evaluation, feedback, reward and amendment) have a moderate relationship with employees' Performance; and PMS can explain 26.9% of change in EP with 99% confidence interval. Hence, more emphasis should be given to strengthen performance management system cycle in the sector so as to boost its contribution in improving employees' performance.

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