# The Effect of Employee Competence on the Relationship between Employee Age and Employee Performance in Kenyan State Corporations

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#### Abstract

A number of studies such as Omari (2014) have established that age has a statically non significant relationship with employee performance. This has initiated the need to find possible factors that may influence this relationship as age alone is not sufficient to determine employee performance. This study sought to investigate the influence of employee competence on the relationship between employee age and employee performance in Kenyan state corporations. The study was anchored on Expectancy and Human capital theories. Expectancy theory posits that, performance depends not only on the magnitude of efforts exerted but also on other factors such as individual abilities and traits. Human capital theory posits that widespread investment in human capital in terms of education and training creates in the labor force a skill base indispensable for economic growth. The philosophical foundation adopted for this study was logical positivism. A descriptive cross sectional survey research design was used to explore the relationship between the study variables. Employee performance was dependant variable, employee age was independent variable and employee competence was a moderating variable. A sample population of 384 was established using the Webster (1995) formula. The number and type of respondents were picked by use of stratified simple random sampling techniques. Primary data was collected on employee age, employee competence and employee performance using a structured questionnaire comprising a five point likert type scale. Data was analyzed by use of both descriptive and inferential statistical techniques. Both correlation and regression analysis techniques were used. Pearson Product Moment Correlation (r) was used to assess direction (positive or negative) and strength of the relationship between the study variables. Stepwise regression analysis was used to test the hypothesis that relationship between employee age and employee performance is moderated by employee competence. Results indicated that employee competence moderated the relationship between employee age and employee performance. The result implies that State corporations in Kenya, when making decisions involving employee's age, such as hiring, placement, promotion, compensation, retirement and termination, should bear in mind the fact that the influence of employee age on his or her performance is affected by his competence. They should come up with age and competence management practices to tap the full potential and enhance the performance of various age categories of their employees. The study extents the body of knowledge in age management practices. Policy makers in Kenyan State Corporations will use the findings to effectively undertake organization decisions on age and competence management practices in aligning them to policies that will enhance the corporations' prosperity through increased performance. There is need to have a similar study in private sector firms and NGOs to determine how the relationship between employee age and employee performance can be influenced by other variables and how the organizations compare with the State Corporations.

**Keywords:** Employee age, Expectancy and human capital Theory, Employee competence, Employee performance and state corporations.

#### 1. Introduction

# 1.1 Background to the study

There has been considerable academic and practitioner interest in the relationship between employee age and employee performance due extension of individual

lifespan and the fall in birth rate in developed countries leading to a high number of unemployed older people being supported by a small number of the working population (Karpinen, 2011).

Age plays an important role in a wide range of employee behaviour that determines his/her performance. Measurement of employee performance gives an indication as to the effectiveness of an organization to achieve its overall strategic goals. A

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number of studies (such as Omari 2014), have established a non-significant relationship between employee age and employee performance, implying that age alone is not sufficient to determine employee performance. Other factors such as competence, education, skills and human resource management practices have been found to affect this relationship (Swarthert, 2015).

Many studies on the relationship between employee age and employee performance have been conducted mainly in developed countries. This study has been necessitated by this fact. This is particularly important in light of the fact that age composition and structure of workforce in developed and developing countries such as Kenya are very different. That is Kenya's workforce is dominated by youth and people in the middle age bracket (Lewin, 2016). In contrast, workforce in developed countries tend to comprise a large proportion of older people (above the age of 50 years). In addition, many governments have raised concern over the rising costs of retirement benefits, pensions and social welfare benefits given to retirees and elderly citizens who contribute less to the countries' national income. This has prompted the need for organizations to consider retaining older employees a bit longer as a cost effective measure. The current study focuses on the effect employee competence on the relationship between employee age and employee performance.

The current study is based on expectancy and human capital theories. Expectancy theory posits that performance depends not only on the magnitude of efforts exerted but also on other factors such as individual abilities, traits and role perceptions influenced by factors such as skills level, education and age. Human capital theory explains that widespread investment in human capital in terms of education and training, creates in the labor force a skill-base indispensable for economic growth. This study is conducted to evaluate the relationship between employee age and employee performance as influenced by employee competence in the Kenyan State Corporations.

Employee age has been classified into, young, middle aged and older employees. The focus on State Corporations in this study has been driven by the fact that State Corporations play a vital role in the country's economic development and because there has been a concern about the missing middle in the public sector. In other words there is a large pool of employees at the lower and upper level but a relatively small number of middle level cadre (Hollyford, 2007). This number in the middle is much smaller than the number required to fill upper positions that are expected to fall vacant since the incumbents retire soon.

State Corporations play a critical role in Kenya's economic growth and development. They are formed through an Act parliament (GOK, 2012). Currently Kenya has 187 state corporations operating in different sectors of the economy such as agriculture, transport, communications, manufacturing, and trade among others

(TPPR, 2013). These corporations fall under the State Corporations Act (CAP 446) of the Laws of Kenya (GOK, 2012). Under performance of some state corporations can be attributed to old technologies, over-reliance on limited public sector financing, poor expenditure controls, underfunding, financial mismanagement, irregularities and malpractices. According to Njiru (2008), State corporations exist to; correct market failure, exploit social and political objectives, provide education, health, redistribute income or develop marginal areas. The decision making and service delivery in State corporations is also hampered by conflicting interests between management and other political actors (Obare, 2006). To make them viable, there is need to come up with strategies on age management practices to enhance employee performance.

# 1.2 Research Problem

Age determines various employee behaviors such as performance, commitment, intentions to quit, job satisfaction, and organization citizenship behavior (Boulander, 2007). Quite a number of employee issues, including hiring and placement decisions, promotion opportunities and employee productivity or performance are influenced by employee age (Dalton and Thompson, 2009). However, the extent to which employee age influences employee performance and the influence of employee talent on this relationship is a question that this study sought to address. Many studies have not established a relationship between employee age and employee performance. Scholars such as Boulander (2007) and Snell have presented conflicting arguments for and against the young and old employees.

The performance of employees of state corporations is key since it has a direct bearing on quality of service delivery to the people of Kenya. The focus on these corporations is driven by the fact that the sector makes an important contribution to Kenya's economy.

# 1.3 The Research Objective

The study sought to establish the effect of employee competence on the relationship between employee age and employee performance in Kenyan State Corporations.

#### 2. Literature Review

# 2.1 Employee Age

Based on age, inferences can be made about a person's attitude, social behavior and the determinants of his or her performance. Evaluating and comparing employee age brackets is an everyday pastime in organizations as it is important for managing employee performance (Barbara, 2006). People's beliefs, judgments and notions about age, affect a wide range of employment issues, including hiring decisions, promotion opportunities,

placement, compensation and termination. The legal working age is the minimum age required by law for a person to work in a given country or jurisdiction (Menounis, 2015). It varies with the type and nature of work. International Labor Organization put the minimum age for admission into employment or work for young persons, as eighteen years. Boulander (2007) asserts that as employees advance in age, they gain a wealth of experience and expertise that they can use to train new and younger employees. In acknowledging the wealth of experience and expertise of older workers, Maitland (2013) notes the absence of experienced older engineers with discomfort. Graham (2007) on the other hand asserts that younger workers are preferred as they are more up to date than their older counterparts as they can be trained faster and easy to adapt to changes.

Generation Jones (50-60 years) are older employees who are considered as the most affected by the HIV AIDS pandemic in the 80's and 90's, impacting negatively on their level of performance (William, 2004). Generation X (39-49 years) are middle age employees who are associated with high levels of skepticism and a reputation for innovation, improving their performance. Generation Y (21-38 years) are younger employees who are associated with new and higher levels of technology known as the digital and computer era. For the purpose of this study, Generation Y was captured from 18 years as this is the minimum age of employment in Kenya.

# 2.2 Employee Competence

Competencies are a way to address both the technical skills of a job and the more difficult-to-define behavioral expectations of a job – sometimes referred to as the "soft skills." But, there is nothing soft about these skills and a well-defined set of competencies can help an organization better evaluate and measure employee performance (Armstrong, 2008). Conceptualization of competence reflects a holistic approach, integrating and relating to attributes and context of a competent performance. Competencies can be inferred from the performance of complex and demanding tasks measured or observed (Schuler, 2009).

This study conceptualizes competence into educational level, skills level and training level. Justification of this choice is that they are widely used determinants of employee competencies in many small and large scale organizations (U.S Department of Labor, 2012). Training and development (Skills development) and performance management can enhance employee competence. The change organizations are undergoing necessitates examining the above assumptions to establish the extent of the influence of employee competence on the relationship between employee age and employee performance.

# 2.3 Employee Performance

Employee performance is an essential concept in management research. It is the ability of an employee to

carry out a piece of work, duty or expected tasks according to an established standard (David, 2010). Measurement of performance gives an indicator to the organization's productivity (Musyoka, 2010). Employee performance is measured on the basis of task performance and contextual performance. Justification for the choice of the variable employee performance is that it determines the organization's productivity.

A study by Vroon (1964) indicated that employee performance is a function of competence in terms of individual abilities; experience and motivation. Susanna (2006) examined employees' conceptions of the meaning of experience in job-competence and its development in the workplace context. The aim was to bring out the variety of conceptions related to experience, competence and workplace learning.

The findings of the above mentioned study, showed that importance is accorded to experience in competence and in workplace learning. The employees valued work experience as the main source of their competence. Competencies provide organizations with a way to define in behavioral terms, what it is that people need to do, to produce the results that the organization desires (Casio, 2009). Competencies, allows organizations to evaluate the extent to which the behaviors of employees are demonstrating and where they may be lacking (Carstenson, 2005).

# 2.4 Employee Age, Employee Competence and employee performance

# 2.4.1 Age and competence

Studies such as Rhodes (1990), on aging-related changes in decision making report mixed results. Some decisionmaking skills decline with age, while others remain unchanged or improve. Because fluid cognitive ability (e.g., reasoning, problem solving) deteriorates with age, older adults should perform worse on decision-making tasks that tap fluid cognitive ability. However, performance on some decision-making tasks may require experience, which increases with age. The longer one does repeated tasks, the more he specializes and perfects in his line of tasks. On those tasks, older adults should perform at least as well as younger adults. These two patterns emerged in correlations between age and component tasks of adult Decision-Making Competence 2007). Previous research has documented qualitative changes in certain cognitive abilities during the older adult years, such as in short-term memory, perceptual and motor skills, and attentional capacities (Salthouse, and Maurer, 2000). Other studies have suggested that a number of significant age-related changes, across a variety of cognitive abilities, are based on social experiences, such as occupational or recreational activities (Thomas, 2007).

# 2.4.2 Competence and Performance

Competencies vary based on organizational size and level, management and organizational strategy (Dessler, 2008).

Knowledge and experience are required in competent work performance. These skills, Knowledge and experience are determined by factors such as age, length of service, training and educational level (Walker, 2009). There is need for organizations to enhance competency skills among their employees through age management practices to cultivate maximum productivity from them 2008). Competencies are measurable patterns of skills, knowledge, abilities, behaviors, and other characteristics that an individual needs to perform work roles or occupational functions successfully. It has been argued that the success of today's businesses increasingly depends on their intellectual assets, as opposed to their tangible resources (Bell, 2007). Managing employee performance includes: Planning work and setting expectations, monitoring and measuring performance, developing the capacity to perform, periodically rating performance in a summary and recognizing and rewarding good fash-ion, performance (Rhodes, 2014). Proficiency in certain competencies is required in practicing good performance management. Investigations in developing performance management competencies benefits organizations in enhancing employee performance. These competencies form the basis for employee training and development (Schular, 2009).

A study conducted by Timming (1994), examines the relationship between the type of college degree, level of college degree, and superiors' perceptions of managers' attributes and their work performance in some management areas. No significant relationship has been found between the managers' college education and their performance at work. Thomas (2007) looked at the effects of education level on job performance. Results showed that, in addition to positively influencing core task performance, education level is also positively related to creativity and citizenship behaviors and negatively related to on-the-job substance use and absenteeism. Significant results were found for gender, race, job level and job complexity. Kasika (2015) conducted a study to identify and examine the relationship between job performances of employees against academic qualifications in order to provide recommendations to the organization management on how best educational qualifications can contribute to improved job performance.

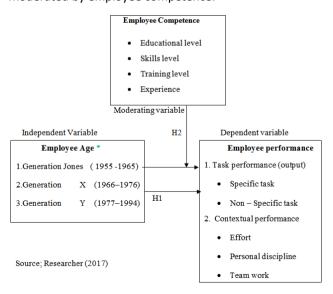
Both quantitative and qualitative methods mainly descriptive statistics (i.e. frequencies) to determine the extent to which employees performance reflects the educational qualifications attained were used. The study findings confirmed that educational qualifications have a significant bearing on job performance. The higher the education level, the more are the effects of education and skill on job performance. As such, peoples' ability to understand and use advanced technology is determined by the level of their education. The educated workers tend to be more responsive in receiving instructions and doing new tasks and easily adopt new technology, which

increases their ability to innovate and improve job performance.

In this empirical literature, the following relationships have been addressed; age and employee competence, employee competence and employee performance, age and employee performance. The moderating effect of employee competence on the relationship between employee age and employee performance has not been addressed. This forms a gap that the current study sought to address.

# 2.5 Conceptual Framework

The schematic diagram presented below (Table 2.1), shows the relationship between three variables under study: Employee age, Employee Competence and Employee Performance, Employee Age. independent variable, Employee performance is the depended variable and Employee competence is the moderating variable. Employee age is operationalised as; Generation Jones (1955 -1965) - 50 - 60 years, X (1966–1976) - 39 – 49 years and Generation Generation Y (1977-1994) 21 - 38 years. Employee competence is operationalised as; (Educational level, Skills level, Training level and Experience. Employee performance is operationalised as (Task performance; Specific and non specific tasks) and Contextual performance (Effort, personal discipline and teamwork). From the conceptual framework, hypothesis was developed in respect of the proposed relationship. Studies have established the relationship between employee age and employee performance (H1). The strength of this relationship is affected by other factors such as employee competence. The following hypothesis was derived from this relationship: (H2) The relationship between employee age and employee performance is moderated by employee competence.



**Fig 2.1** The effect of Employee Competence on the relationship between employee age and employee performance

#### 2.6 Hypotheses of the Study

From the conceptual framework, two hypotheses were developed in respect of the proposed relationships. The hypotheses formulated are presented below.

- H<sub>1</sub> There is a relationship between employee age and employee performance
- H<sub>2</sub> The effect of employee's age on employee performance is moderated by Employee Competence

# 3. Research Methodology

#### 3.1 Research Philosophy

The philosophical foundation of this research is logical positivism. This philosophical paradigm is appropriate for a study which is anchored on theory and which seeks to test hypotheses.

According to logical positivism, universal scientific prepositions are true only if they have been verified by empirical tests and the laws of behavior can be discovered scientifically by observation and analysis of empirical events (Berkey, 1995) In positivist paradigm, scientific process is followed in hypothesizing fundamental laws then deducing the observations so as to prove the said hypothesis.

# 3.2 Research Design

A descriptive research design was used as data was collected from a cross section of response units at one point in time. The design guides the selection of sources and types of information (Musyoka 2010). It is a framework for specifying the study variables (Ntale, 2010).

Descriptive survey assists the researcher to establish whether significant associations among variables exist at one point in time depending on the resources available and the target population (Whidet, 2007).

#### 3.3 Population of the Study

The target population consisted of over 100,000 employees of 187 state corporations in Kenya, which forms the sampling frame. This population is categorized by function under five different categories (Appendix VI) namely commercial state corporations - 34, state corporations with strategic functions - 21, executive agencies - 62, independent regulatory-25, and research, public universities and training institutions - 45, (TPRR, 2014). The number of employees differ from one corporation to another depending on the core businesses.

# 3.4 Sample Design

To make the study representative, the sample was drawn from the headquarters and regional offices throughout

the country. The employees form the sampling frame, since employee is the unit of analysis. The sample design used was proportionate stratified sampling technique. The sample size was 384 determined using the Webster formulae described below. Webster (1995) suggests that where the population is more than 10,000, as is the case in this study, and exact population has not been determined, a sample size called adjusted minimum can be used without affecting the accuracy of the study. Webtser (1995) suggests the following formulae to be used to estimate the sample size.

$$n = \underline{Z^2 \pi (1 - \pi)}$$
(Error)

Where  $\pi$  is taken to be 50% proportion of the diversified employees in state corporations. At 95% desired Level of confidence and margin error of 5% the sample size (n) is calculated as indicated below:

n = 
$$\frac{(1.96)^2 (0.5)^2}{(0.05)^2}$$
 = 384.6 employees

**Table 3.1** Computation of the sample size by Sector, Corporation and Employees

No.	Sector	Corporations Per sector	Sampled no. of corporations per sector	Sampled no. of respondents per sector
1	Commercial state Corporations	34	3	90
2	State corporations with strategic functions	21	1	30
3	Executive agencies	62	4	120
4	Independent regulatory agencies	25	2	60
5	Research, Public universities and T.I	45	3	90
	Total	187	13	390

Table 3.1 above shows sampled State corporations in every sector and the number of respondents in every corporation. Stratified sampling techniques were used to categorize employees as respondents in every corporation into a meaningful strata of human resource managers, line managers, Technicians/ supervisors, clerks & secretaries and other workers. Simple random sampling procedure was used to pick the number of respondent from every stratum in Table 3.2. The percentages were based on the number of employees per every category (Stratum), vis-à-vis the total employees in the organization.

Table 3.2 Categories of respondents in each organization

Exact no.	1	3	6	6	14	30
Percentage	3.3%	10%	20%	20%	46.7%	100 %
Category/ Stratum	Human resource Managers	Line manager	Technicians/S upervisors	clerks & secretaries	Other workers/staff	Total

#### 3.5 Data Collection

The study used primary data which was collected on employee age, employee competence and employee performance. The researcher used questionnaire for employees and management to collect primary data. The two questionnaires contained both structured and unstructured statements. Questions for employees were subdivided into two sections (A and B). The types of questions included Section A and B1 which sought information on Bio data and employee competence based on ratings of a 5 point likert scale, Section D collected information on task performance and contextual performance also based on ratings of a 5 point likert scale.

# 3.6 Reliability and Validity of the Research Instruments

Test-retest reliability, equivalent form reliability and internal consistency reliability were used. Internal consistency reliability assesses the ability to produce similar results when different samples are used to measure a phenomenon during the same time period (McDaniel & Gates, 2010). The Cronbach's Alpha Coefficient was used to assess the internal consistency of the data and instrument with alpha coefficients of above 0.7 implying reliability (Cronbach, 2004; Nunnaly, 1978). The tests produced alpha coefficient above 0.8 implying very reliable.

Validity is the degree to which the researcher tries to measure efficiency of the research instrument (McDaniel & Gates, 2010). Content Validity of the research instrument was carried out through *a pilot test* which was done by administering the research instrument to state corporation employees, 3 from each of the 5 clusters. Such questionnaire pre-testing helps to identify problems with the data collection instruments and find possible solutions.

# 3.7 Data Analysis and Presentation

Statistical package for social sciences (SPSS) tool was used to analyze quantitative data. Descriptive analysis were conducted to present the main characteristics of the sample. Measures of central tendencies, mean, frequency, mode, median, index, cross tabulation and standard deviation were used in analyzing the quantitative data which was based on information from

questionnaires focusing on demographic characteristics and organization characteristics. To establish the nature and magnitude of the relationships between variables and to test hypotheses relationships, inferential statistics were used. The appropriate tests were the parametric tests of correlation analysis and regression analysis. Pearson Product Moment Correlation (r) was used to assess relationships between the variables, specifically to determine both the direction (positive or negative) and strength of the relationship between the study variables. Regression analyses namely, Simple linear, multiple and stepwise regression analysis, were conducted to determine the expected relationship between the variables, measure the amount of variation and determine the effect of the variation. Coefficient of determination (R2) was used to measure the amount of variation between the study variables. It also provided a measure for the magnitude of dependent variable and values for predictor variables by providing estimate equations. The expected relationship was between employee age (independent variable), and Employee performance (Dependent variable) and the moderating effect of employee competence on this relationship. The regression analysis was conducted at 95% level of confidence to test the hypothesis. The amount of variation between the study variables for each hypothesis was determined by the coefficient (R<sup>2</sup>)

# 4. Data Analysis and Findings

# 4.1 Analysis of Employee Competence

Descriptive statistics were used to analyze the responses on employee competence in State Corporations. The scores of the variable employee competence were computed to come up with a simple average of the scores in each component. Table 4.1 presents a summary of Employee competence as shown in the study.

Table 4.1 Employee competence in state corporations

Sub components	N	Mean	Std. Deviation
<ul> <li>Education level of employees</li> </ul>	288	3.964	0.9716
<ul> <li>Respondents skills level</li> <li>Training</li> <li>Experience</li> </ul>	288 288 288	4.097 4.102 3.712	0.896 0.742 0.782
Average score on employee competence	288	3.968	0.8479

Cronbach alpha coefficient = 0.764

An alpha coefficient of 0.764 implies that the data used for this analysis was highly reliable. This analysis shows that the level of employee competence in Kenyan state corporations was rated as high by respondents (mean 3.968 and SD 0.8479). The respondents by consensus rated the level of employee competence as high, shown

by the standard deviation recording less than 1. Respondents level of training scored the highest (Mean 4.102, SD 0.782) followed by skills level (Mean 4.097, SD 0.934), educational level of employees (Mean 3.964, SD 0.934) and Training (Mean 3.712, SD 0.782). The analysis imply that generally the level of employee competence in Kenyan state corporations is high. This was indicated by the standard deviations in all responses being below 1. This may be explained by the fact that different state corporations provide different levels of training and hire different quality of staff in various departments as there are no fixed guidelines and standards to control the training type and conditions for hiring in state corporations.

# 4.2 Relationship between the Study Variables

The linkages study variables as shown in the conceptual framework provided the foundation for this study. These variables include Employee age (young employees, middle age employees. employee competence (Educational level Skills level Training level Experience and employee performance (Task performance and contextual performance).

# 4.3 Test of Hypotheses

To test the hypotheses, simple, multiple and stepwise regression analysis techniques were conducted at 95% confidence level. The analysis was utilized to assess the predictive ability of the independent variable on the dependent variable and how employee competence moderates this relationship. To indicate how well the independent variable accounts for variance in the dependent variable, the goodness of fit was applied. To establish the predicted significance of the independent variable on dependent variable, the overall significance of the model was determined. The hypothesis was developed from the literature review and research objectives. For the hypothesis, coefficient determination (R<sup>2</sup>) was used to measure the amount or magnitude of variation between the study variables.

4.3a To test the role of Employee Competence in the Relationship between Employee Age and Employee Performance in Kenyan State Corporations

The following hypothesis was developed:  $H_2$  The effect of employee age on employee performance is moderated by employee competence.

Stepwise regression analysis technique was used to test this hypothesis as shown below;

STEP 1.  $EP = \theta_0 + \theta_1 EA + \varepsilon$ STEP 2.  $EP = \theta_0 + \theta_1 EA + EC + \varepsilon$ STEP 3  $EP = \theta_0 + \theta_1 EA + \theta_2 EC + \theta_2 EA * EC + \varepsilon$  where Employee performance [EP] = f (Employee age [EA]). and Employee Competence [EC], Interaction term [EA \* EC], Error term [  $\epsilon$ ] and  $\beta_0$ = Constant,  $\beta_1$ = Regression coefficient.

To create the interaction term, employee age (EA) and Employee competence (EC) were entered in the third step to get a single indicator representing the product of the two variables. To solve the problem of multicollinearity the two factors were standardized by use of (z) score with zero mean and one standard deviation. Regression results testing the moderating effect of employee competence on the relationship between employee age and employee performance are shown in table 4.2. As shown in the table, Model 1 tested the single relationship between employee age and employee performance. The findings were:  $R^2 = .000$ , F (1,286) = .070, p >.05. The model reveals a statistically insignificant relationship between employee age (independent variable) and employee performance (depended variable). In step 2 both employee age and employee competence were entered into the regression equation simultaneously as shown in model 2 table 4.2. This model was insignificant  $R^2 = .0376$ , F (5,284) = .054, p >.05. This model revealed a statistically insignificant relationship between employee age (independent variable) and employee performance (depended variable). In step 3, the interaction between employee age (independent variable) and employee competence (moderating variable) creates an interaction term, EA\*EC which brings about a change in  $R^2$  ( $\Delta R^2$ ) amounting for 0.1102 which was positive and statistically significant from the step 1 model. F change recorded a variance of 6.396 which was statistically significant at p >.05. As shown in Model 3, EA, EC and the interaction term EA\*EC accounted for 15.1% of the variance in employee performance ( $R^2 = .151$ ).

# Competence on employee performance

- a. Predictors: (Constant), Employee Age, Employee Competence
- b. Dependent variable is Employee performance

Table 4.3 shows an overall combined relationship between employee age, employee competence, the interaction term EA\*EC and employee performance. It clearly shows that the regression model attained goodness of fit as F (5,282) = 6.3984, at p <. 05. In step one the single relationship between employee age and employee performance, produced the result (1,286) = 0.070, (p <.05). The relationship was not statistically significant. In step two, both employee age and employee competence were entered into the regression equation simultaneously as represented in model 2. This model produced F (5,282) = .059, p >.05. The model reveals a statistically insignificant relationship between employee age (independent variable) and employee performance (depended variable). In step 3, the interaction between employee age (independent variable) and employee competence (moderating variable) creates an interaction term, EA\*EC which brings about a change in variance  $(\Delta R^2)$  accounting for F (5,282) = 6.3984, (p < .05.).

			Adjusted R	Std. Error		Chan	ge Statis	tics	
Model	R	R Square	Square I '	of Estimate	R <sup>2</sup> Change	F Change	df1	df2	Sig F Change
1	.016ª	.000	003	.810	.000	.070	1	286	.792
2	.1848	.0376	.0205	.771	.0376	4.598	5	284	.054
3	.388 <sup>b</sup>	.151	.132	.0896	0.1102	6.3956	5.4	281.6	0.0002

**Table 4.3** Anova outcomes for the effect of employee competence on the relationship between employee age and employee performance

	Model	Sum of Squares	Df	Mean Square	F	Sig.
Regression		0.046	1	0.046	0.070	0.792 <sup>b</sup>
1	Residual	187.829	286	0.657		
	Total	187.875	287			
	Regression	20.6736	5	4.135		
2	Residual	167.1994	282	0.5929	0.05965	0 .456
	Total	187.8764	287	0.6446		
		20.6736	5	3.778	6.3984	
3		167.2014	282	0.5938	0.3364	0 .0004 <sup>b</sup>
		187.875	287	0.6546		

- a. Dependent Variable: Employee task performance
- b. Predictors (Constant) Age
- c. Employee competence

Table 4.4 shows the regression coefficients for the effect of employee competence on the relationship between employee age and employee performance. It shows the regression results before and after inclusion of the interaction term EA EC in the model.

**Table 4.4** Regression coefficients for the effect of employee competence on the relationship between employee age and employee performance

		Standardized		
Model		coefficient	T	Sig
		Beta β		
1	(Constant)		39.261	.000
	Employee age	.016	.264	.792
	(Constant)			
2.	Employee age			
۷.	and Employee	.02523	0.199	0.62241
	competence			
	(Constant)			
3.	(Constant)		11.4425	.000
	Employee age			
	Lilipioyee age	.0215	300	.70825
	E. competence			
	L. competence	.02943	-1.0404	04292
	EA*EC			
	LA LC	0.28176	0.840414	0.66533

- a. Dependent Variable: Employee task performance
- b. Predictors: (Constant), Employee Age, Employee competence, age\*competence.
- c. Employee competence

The results in the table indicate that before inclusion of the interaction term as shown in model 1, the regression coefficient  $(\beta)$  value of employee age was statistically

insignificant the regression coefficient ( $\beta$ ) value of employee age was (0.16) which is 1.6%. In model 2, the regression coefficient ( $\beta$ ) value of employee age and employee competence was 0.02523 (2.5%). The regression coefficient ( $\beta$ ) value of employee age and employee competence was statistically insignificant at ( $\beta$  =0.025233, t = 0.199, ( p >05). Model 3 shows the results after the interaction term is included by including the moderator variable, EA ( $\beta$  =.0215, ( p >.05).which is statistically insignificant. Employee competence ( $\beta$  =.02943, ( p >.05) which is still insignificant. The interaction term EA\*EC ( $\beta$  = 0.28176, t = 0.8404, p>.05). ( $\beta$  = 28%) is statistically significant and it implies that employee competence has moderated the relationship between employee age and employee performance.

# 5. Summary, Conclusions and Recommendation

# *5.1 Summary of the findings*

The objective of the study was to establish the effect of employee competence on the relationship between employee age and employee performance in the Kenyan State Corporations. Descriptive statistical analysis revealed that the level of employee competence in Kenyan state corporations was high (Mean 3.968 and SD 0.8479). Respondents by consensus, rated the level of employee competence as high, shown by the standard deviation recording less than 1.) The hypothesis formulated for this objective was; The effect of employee age on employee performance is moderated by employee competence in Kenyan State Corporations. Stepwise regression analysis was utilized to assess the moderating effect of employee competence on this relationship. Results from the test of this hypothesis are summarized below. The overall model 1 revealed an insignificant relationship between employee age and employee performance. This model produced  $R^2 = .000$ , F

(1,286) = .070, p >.05. since the p - value (0.792) > 0.05. Model 2 produced)  $R^2$  = .0376, F (5,282) = 5.965, p >.05 (3.76 %. statistically insignificant) and model 3 produced  $R^2$  = .151, F (5, 282) = 6.398, p >.05 (15.1%. statistically significant). This demonstrated that Employee competence moderated the relationship between employee age and employee performance

#### 5.2 Conclusion and recommendation

It should be noted that both correlation and regression analysis indicated a statistically in significant relationship between employee age and employee performance. This implies that age on its own does not determine or influence the performance of employees in Kenyan state corporations. The results contradict emphasis organization decisions related to age factors recruitment, promotion and even retirement. State corporations should lay less emphasis on org organization decisions related to age such as recruitment, promotion and retirement factors. Other factors should be considered alongside the age factor. Results indicated that employee competence moderates this relationship. Based on these findings, it is concluded that, State corporations should enhance employee competencies to step up their employee performance. In particular they need to improve training programmes, enhancing technical skills and multi skilling which regression results rated low. Training and development leads to increased job satisfaction, morale, increased efficiency, motivation and increased adoption of new technologies to enhance performance of various age categories of employees. They should also provide, age oriented motivation and maintain good relationship with their workers. This will enhance employee skill competencies, successful ageing which improves their productivity

# 5.3 Suggestions for Further Research

The study findings add to the existing body of knowledge on age, competence and performance. More research is required to understand the effectiveness of other factors influencing employee performance. There is need to have a similar study in private sector firms and NGOs to determine how the relationship between employee age and employee performance can be influenced by other variables and how the organizations compare with the State Corporations.

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