

## **INFLUENCE OF BUDGETING PRACTICES ON BUDGET PERFORMANCE OF COUNTY GOVERNMENTS- A CASE OF SIAYA COUNTY, KENYA**

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**Abstract:** *A well formulated and properly implemented budget has the capacity to promote socio-economic well-being of the people, finance development projects and support public service administration. However annual budget implementation reports have shown that since their inception in 2013, County Governments have failed to fully implement their budgets as planned. This study aimed at establishing the influence of budgeting practices on budget performance of County Governments- a case of Siaya County. The study considered budgeting practices at the strategic and operational phase of budgeting process where the specific objectives were to assess the effects of participatory budgeting on budget performance; to examine the effects of budgetary forecasting techniques on budget performance; and to determine the effects of use of technology on budget performance. The research findings revealed that standardized regression coefficient for participatory budgeting ( $\beta=0.749$ ), implies that an increase of 1 unit in participatory budgeting is likely to result in a 0.749 increase in budget performance. Standardized regression coefficient for budget forecasting techniques ( $\beta=0.492$ ), implies that an increase of 1 unit in budget forecasting techniques is likely to result in a 0.492 increase in budget performance. Lastly, standardized regression coefficient for use of technology ( $\beta=0.209$ ), implies that an increase of 1 unit in use of technology is likely to result in a 0.209 increase in budget performance. The study findings were significant and therefore it concluded that budgetary practices at the strategic and operational phase of budgeting process are important ingredients to enhanced budget performance. The study recommended that county government should pay more attention to participatory budgeting, employ adequate forecasting techniques and employ use of technology fully in budgeting process in order to improve budget performance.*

**Keywords:** *budgeting practices, budgetary forecasting techniques, budget performance*

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### **1. Background of the Study**

The primary goal of any government is provision of the essential goods and services to the citizenry. For any government to deliver the essential goods and services, it has become a routine at all levels to prepare and approve into law a summary of a plan of all revenue and expenditure projections which are made in advance of a government's financial year concerning a document called a budget. Mitchel (2005) defined a budget as a summary of the projected expenditure over a certain period of time, together with a plan on how to finance it. Abdullah (2008) defined a budget as a comprehensive plan in writing, stated in monetary terms that outline the expected financial consequences of management's plans and strategies for accomplishing the organization's mission for the coming period. Budget serves as a tool for planning and controlling the use of scarce financial resources with the aim of achieving the organizational goals (Schick,

1999). Government is held accountable by the citizens on allocation, custody and the use of state resources through the budget. A well formulated and properly implemented budget has the capacity to promote socio-economic wellbeing of the people, finance development projects and support public service administration.

Budgeting refers to the process of preparation, implementation and operation of budget decisions into specific projected financial plans (Abdullah, 2008). Budgeting is one of the most successful and useful management accounting techniques that can reap handsome rewards if properly understood and implemented (Suberu, 2010). Budgeting facilitates effective utilization of available funds, improve decision making and provide a bench mark to measure organization performance. The success and importance of budgeting relates to the identification of organizational goals, allocation of responsibilities for achieving these goals and consequently its execution (Drake & Fabozzi, 2010).

One fundamental purpose of any government which has been in existence over the years is to allocate scarce resources to the competing programs and services through budgeting process and according to Hyde (1992) as cited by Khan & Hilderth (2002), budgeting is partly economical, accounting and administrative. Mitchel (2002) noted that budgets also act as communication tools. Economically, it serves as the primary instrument for evaluating a jurisdiction's economic growth and development. As an accounting tool, budgets provide a ceiling on government spending and make it legally binding for it live within the allocated funds (Bartle & Shields, 2008). Administratively, budget specifies the ways and means by which services are provided, establishes criteria by which the services are monitored and evaluated (He, 2011). As a communication tool, budgets help decision makers to make informed choices about provision of services and capital assets and to promote stakeholder participation. It further allows public officials to interact and engage with citizens and taxpayers (Lapsey & Rios, 2015). Arguably, administrative and communicative capacities of budgets are important in ensuring transparency and accountability in the management of public funds.

Budgeting process consists of activities that include development, implementation and evaluation of a plan for the provision of services and capital assets (Drury, 2000). Good budgeting processes incorporates a long term perspective, establishes linkages to organizational goals, focuses budget decision on results and outcomes and promotes effective communication with stakeholders.

In Kenya, budgeting process is a cycle which starts with the issuance of annual budget circular by the Cabinet secretary for National Treasury not later than 30<sup>th</sup> August every year. The annual budget circular sets out the guidelines that will be followed by the ministries, departments and agencies in preparation of budget. The MDAs are required to prepare budget estimates in compliance with the instructions, guidelines and prescribed formats contained in the circular that supports program-based budgeting (PBB) and must be supported by the national government or entity's strategic plan (PFM Act Regulations, 2015). The national and county treasuries conduct sector hearings where the public are involved in the preparation of the National Budget Policy Statement (BPS) and the County Fiscal Strategy Paper (CFSP) between September to Mid- February (15<sup>th</sup> February). The national and county treasuries produce their respective Budget Review and Outlook Papers (CBROP) by 30<sup>th</sup> September every year. The 30<sup>th</sup> September is the deadline for the National Assembly and County Assemblies to consider and approve the Finance Bill for the current fiscal year with or without amendments. The respective Budget Review and Outlook Papers are tabled in the respective houses by 21<sup>st</sup> October for discussion and noting purposes. Before 1<sup>st</sup> of January, the Commission on Revenue Allocation (CRA) should submit to the National Treasury, its

recommendations on the division of revenue vertically between the National and County Governments and project how revenue will be shared equitable between the 47 county governments (PFM Act Regulations, 2015).

## **2. Problem Statement**

Even though there exist a budget calendar with a broadly consultative, elaborate and highly participatory budgeting process exercise carried out by the county governments in Kenya every fiscal year, with the aim of having minimal or nil budget variances, performance of the county governments' budgets is still poor. Reports available from the Office of the Controller of Budget (OCOB) indicate that since their inception in 2013, County Governments have registered negative variances in terms of actual budget performance compared to planned/projected targets. Success of an organization's operations depends on how well they plan and implement their plans, however Siaya County has faced a major challenge in enhancing the credibility of its budgets over the financial years by reducing the gap between planned and actual spending. Siaya County has registered actual under performance both for revenue and expenditure in comparison to budgeted targets across the FYs from 2013 to date. This mismatch between the targeted and actuals is unending and usually leads to huge amounts of unspent funds (huge County Revenue Fund balances), large number (percentage) of incomplete projects to be rolled over to subsequent financial year, supplementary estimates and reallocations of budget line funding which in turn leads to poor service delivery. Poor/under-utilization of budgeted funds and unmet revenue targets have been repeatedly cited by various stake holders as some of the problems hindering effective and efficient service delivery in Siaya County (Budget committee report on public participation, June 2019). It is from this perspective that the study assessed the influence of budgeting practices employed by Siaya County Government on budget performance, with the main proposition that there is no significant effect of budgeting practices on budget performance.

## **3. Research Hypotheses**

**HO<sub>1</sub>:** There is no statistically significant effect of participatory budgeting on budget performance of County Governments: A case of Siaya County, Kenya

**HO<sub>2</sub>:** There is no statistically significant effect of budgetary forecasting techniques on budget performance of County Governments: A case of Siaya County, Kenya

**HO<sub>3</sub>:** There is no statistically significant effect of use of ICT systems on budget performance of County Governments: A case of Siaya County, Kenya

## **4. Research Methodology**

The descriptive survey design was appropriately suited for the study because of the nature of the problem, which was a relationship between variables over a short period of time. The target population comprised of 500 persons from 10 sectors forming the sector working groups in Siaya County. This comprised 300 Ward Development Committees Representatives, 70 Sectorial Committee members, 32 representatives from relevant Community Based Organizations (CBOs), Non-Governmental Organizations (NGOs), Faith Based Organizations (FBOs), Civil Society and other interest groups (PWDs, Youths and Women), 50 CECs, Cos and Directors, 5 representatives from County Assembly involved in Budget making, 5 Budget Committee members and 38 other officers involved in Budget making from all sectors including the budget secretariat. The researcher used Krejcie & Morgan table (1970), in determining the sample size and according to the table, a target population of 500 persons gave a sample size of 198 respondents.

### 5. Descriptive Statistics of the effect of budgeting practices on budget performance

Descriptive (frequency, percentage and mean) and inferential (Multiple Linear Regression) were preferred for analysis of objectives. The descriptive statistics assessed the dimensions of budgeting practices and budget performance of County Governments. The analysis, thus, began with the descriptive statistics for objective one.

### 6. Descriptive Statistics of participatory budgeting on budget performance

The study sought to assess the effects of participatory budgeting on budget performance. To analyze the objective, the respondents were first asked to state whether they had participated in budget making process in Siaya County.

All 198 (100.0%) respondents had participated in budget making process in Siaya County. If yes, the respondents were further asked to indicate the period they had participated in budget making process. The findings are shown on Table 1.

Table 1: Duration of participating in budget making process

What is your functional capacity in budget making process? * Period of participation in budget making process in Siaya County? Cross tabulation		If yes, then for how long have you participated in budget making process in Siaya County?					Total	
		1 year and below	2 years	3 years	4 years	5 years and above		
Functional capacity in budget making process?	Non- elected employees of the County Government of Siaya	Count	0	8	0	6	23	37
		% within functional capacity in budget making process	0.0%	21.6%	0.0%	16.2%	62.2%	100.0%
	Representative from the ward development committees, Civil society, NGOs, CBOs, FBOs and other interest groups	Count	10	35	20	35	31	131
		% within functional capacity in budget making process	7.6%	26.7%	15.3%	26.7%	23.7%	100.0%
	Member of the County Assembly	Count	0	23	4	0	3	30
		% within functional capacity in budget making process	0.0%	76.7%	13.3%	0.0%	10.0%	100.0%
Total		Count	10	66	24	41	57	198
		% within functional capacity in budget making process	5.1%	33.3%	12.1%	20.7%	28.8%	100.0%

As shown in Table 1 majority 23(62.2%) of the non- elected employees of the County Government of Siaya had participated in budget making process for 5 years and above. Furthermore, majority 35(26.7%) of representative from the ward development committees, Civil society, NGOs, CBOs, FBOs and other interest groups had participated in budget making process for 2 years, and a similar percentage for 4 years. Lastly, most 23(76.7%) of Member of the County Assembly had participated in budget making process for 2 years. In summary, majority 66(33.3%) of the respondents revealed that they had participated in budget making process for 2 years, 57(28.8%) for 5 years and above, 41(20.7%) for 4 years, 24(12.1%) for 3 years and 10(5.1%) for 1 year and below. This implies that non- elected employees of the County Government

of Siaya are the ones who have participated in the budget making process for a longer period and most of the respondents have participated for 2 years. From the findings, there are indications that non- elected employees of the county government had more experience in budgetary matters as compared to other groups. Thus, the above findings are supported by Kathungu (2016). She asserts that County Governments have qualified and experienced personnel to manage the budgets and inflow of finances thus right category for providing outcomes of the County financial performance and management.

The respondents were further asked whether the county government publish and publicize various budget documents within specified time to enable citizens have meaningful input and engagement. The findings are shown on Table 2.

*Table 2: Whether government publish and publicize various budget documents within specified time*

<b>Functional capacity in budget making process? * Does the county government publish and publicize various budget documents within specified time to enable citizens meaningful input and engagement? Cross tabulation</b>					
			Whether the county government publish and publicize various budget documents within specified time to enable citizens meaningful input and engagement?		Total
			Yes	No	
Functional capacity in budget making process	Non- elected employees of the County Government of Siaya	Count	37	0	37
		% within functional capacity in budget making process?	100.0%	0.0%	100.0%
	Representative from the ward development committees, Civil society, NGOs, CBOs, FBOs and other interest groups	Count	112	19	131
		% within functional capacity in budget making process?	85.5%	14.5%	100.0%
	Member of the County Assembly	Count	23	7	30
		% within functional capacity in budget making process?	76.7%	23.3%	100.0%
Total	Count	<b>172</b>	<b>26</b>	<b>198</b>	
	% within What is your functional capacity in budget making process?	<b>86.9%</b>	<b>13.1%</b>	<b>100.0%</b>	

As shown in Table 2 all 37 (100.0%) of the non- elected employees of the County Government of Siaya stated that county government published and publicized various budget documents within specified time to enable citizens have meaningful input and engagement. Similarly, majority 112(85.5%) of the ward development committees, Civil society, NGOs, CBOs, FBOs and other interest groups of Siaya County indicated that county government published and publicized various budget documents within specified time to enable citizens meaningful input and engagement. Lastly, most 23(76.7%) of the Member of the County Assembly stated that county government published and publicized various budget documents within specified time to enable citizens meaningful input and engagement.

In summary, majority 172(86.9%) of the respondents indicated that county government published and publicized various budget documents within specified time to enable citizens meaningful input and engagement, while, minority 26(13.1%) revealed that they did not. This implies that government publishes

and publicizes various budget documents within specified time to enable citizens have meaningful input and engagement. However, this finding contradicts that of Wacera (2016) who affirmed that before public participation gatherings, the public usually had no information about documents to be discussed. Wacera (2016) further asserted that respondents were not in agreement concerning access to the relevant materials for public participation on time prior to the date of public participation for perusal with majority indicating that they do not access the materials in prior.

The respondents were further asked to indicate the smallest unit/level in which the county government conducts public participation. The results are shown on Table 3.

*Table 3: Smallest unit/level in which the government conducts public participation*

<b>Functional capacity in budget making process? * What is the smallest unit/level in which the county government conducts public participation? Cross tabulation</b>						
			Smallest unit/level in which the county government conducts public participation			Total
			Village	Ward	Sub County	
Functional capacity in budget making process?	Non-elected employees of the County Government of Siaya	Count	10	27	0	37
		% within functional capacity in budget making process?	27.0%	73.0%	0.0%	100.0%
	Representative from the ward development committees, Civil society, NGOs, CBOs, FBOs and other interest groups	Count	1	122	8	131
		% within functional capacity in budget making process?	0.8%	93.1%	6.1%	100.0%
Member of the County Assembly	Count	0	30	0	30	
	% within functional capacity in budget making process?	0.0%	100.0%	0.0%	100.0%	
Total		Count	<b>11</b>	<b>179</b>	<b>8</b>	<b>198</b>
		% within functional capacity in budget making process?	<b>5.6%</b>	<b>90.4%</b>	<b>4.0%</b>	<b>100.0%</b>

As shown in Table 3 majority 27(73.0%) of the non- elected employees of the County Government of Siaya stated that smallest unit/level in which the county government conducted public participation was Ward. Similarly, majority 122(93.1%) of the ward development committees, Civil society, NGOs, CBOs, FBOs and other interest groups of Siaya indicated that smallest unit/level in which the county government conducted public participation was Ward followed by Sub County at 8(6.1%). Lastly, all 30(100.0%) of Member of the County Assembly stated that smallest unit/level in which the county government conducted public participation was Ward. In summary, majority 179(90.4%) of the respondents revealed that smallest unit/level in which the county government conducted public participation was Ward, 11(5.6%) Village and

8(4.0%) Sub county. This implies that Ward is the smallest unit/level in which the county government conducts public participation. The respondents were further asked whether the County Executive facilitate public consultations at different stages of the budget cycle. The results are shown on Table 4.

*Table 4: Whether County Executive facilitates public consultation at different stages of budget cycle*

Functional capacity in budget making process? * Does the County Executive facilitate public consultations at different stages of the budget cycle? Cross tabulation			Does the County Executive facilitate public consultations at different stages of the budget cycle?		Total
			Yes	No	
Functional capacity in budget making process?	Non- elected employees of the County Government of Siaya	Count	36	1	37
		% within functional capacity in budget making process?	97.3%	2.7%	100.0%
	Representative from the ward development committees, Civil society, NGOs, CBOs, FBOs and other interest groups	Count	97	34	131
		% within functional capacity in budget making process?	74.0%	26.0%	100.0%
	Member of the County Assembly	Count	16	14	30
		% within functional capacity in budget making process?	53.3%	46.7%	100.0%
Total	Count	<b>149</b>	<b>49</b>	<b>198</b>	
	% within What is your functional capacity in budget making process?	<b>75.3%</b>	<b>24.7%</b>	<b>100.0%</b>	

As shown in Table 4 majority 36(97.3%) of the non- elected employees of the County Government of Siaya stated that County Executive facilitated public consultations at different stages of the budget cycle. Similarly, majority 97(74.0%) of the ward development committees, Civil society, NGOs, CBOs, FBOs and other interest groups of Siaya indicated that County Executive facilitated public consultations at different stages of the budget cycle. Lastly, majority 16(53.3%) of Member of the County Assembly stated that County Executive facilitated public consultations at different stages of the budget cycle. In summary, majority 149(75.3%) of the respondents indicated that County Executive facilitated public consultations at different stages of the budget cycle, while, minority 49(24.7%) revealed that they did not. This implies that County Executive facilitates public consultations at different stages of the budget cycle. This finding supports the findings of a number of studies. Wacera (2016) affirmed that before public participation gatherings, the public usually had information about public participation. He further stated that information regarding public participation was mainly available through the media. These included print media (gazette notices and newspapers), television and vernacular radio stations). Musyoka (2017) asserted that public participation had been fairly supported and embraced by the County governments. The respondents were asked to state the frequency in which county government conduction of public participation. The results are shown on Table 5.

Table 5: Frequency of public participation conduction by the county government

Functional capacity in budget making process? * How often does the county government conduct public participation?							
Cross tabulation			How often does the county government conduct public participation?				
			Every quarter (after every 3 months)	Semi-annually (after every 6 months)	Once every	Often when there is an issue to be discussed	Total
Functional capacity in budget making process?	Non- elected employees of the County Government of Siaya	Count	0	2	5	30	37
		% within functional capacity in budget making process?	0.0%	5.4%	13.5%	81.1%	100.0%
	Representative from the ward development committees, Civil society, NGOs, CBOs, FBOs and other interest groups	Count	4	15	34	78	131
		% within functional capacity in budget making process?	3.1%	11.5%	26.0%	59.5%	100.0%
	Member of the County Assembly	Count	13	1	0	16	30
		% within functional capacity in budget making process?	43.3%	3.3%	0.0%	53.3%	100.0%
Total	Count	<b>17</b>	<b>18</b>	<b>39</b>	<b>124</b>	<b>198</b>	
	% within functional capacity in budget making process?	<b>8.6%</b>	<b>9.1%</b>	<b>19.7%</b>	<b>62.6%</b>	<b>100.0%</b>	

Table 5 shows that majority 30(81.1%) of the non- elected employees of the County Government of Siaya stated that the county government conducted public participation often when there was an issue to be discussed. Similarly, majority 78(59.5%) of the ward development committees, Civil society, NGOs, CBOs, FBOs and other interest groups of Siaya indicated that the county government conducted public participation often when there was an issue to be discussed. Lastly, majority 16(53.3%) of Member of the County Assembly stated that the county government conducted public participation often when there was an issue to be discussed. In summary, majority 124(62.6%) of the respondents indicated that the county government conducted public participation often when there was an issue to be discussed, 39(19.7%) once every year, 18(9.1%) semi- annually (after every 6 months) and 17(8.6) every quarter (after every 3 months). This implies that the county government conducts public participation often when there is an issue to be discussed. The respondents were asked to state whether the county assembly have a budget and appropriations committee. The results are shown on Table 6.



Table 6: Whether the county assembly has a budget and appropriations committee

<b>Functional capacity in budget making process? * Does the county assembly have a budget and appropriations committee? Cross tabulation</b>				
			Does the county assembly have a budget and appropriations committee?	Total
			Yes	
Functional capacity in budget making process?	Non- elected employees of the County Government of Siaya	Count	37	37
		% within functional capacity in budget making process?	100.0%	100.0%
	Representative from the ward development committees, Civil society, NGOs, CBOs, FBOs and other interest groups	Count	131	131
		% within functional capacity in budget making process?	100.0%	100.0%
	Member of the County Assembly	Count	30	30
		% within functional capacity in budget making process?	100.0%	100.0%
Total		Count	198	198

As shown in Table 6 all 37(100.0%), 131(100.0%) and 30(100.0%) of the non- elected employees of the County Government of Siaya stated, Ward development committees, Civil society, NGOs, CBOs, FBOs and other interest groups of Siaya and Member of the County Assembly, respectively, stated that the county assembly had a budget and appropriations committee. In summary, all 198(100.0%) of the respondents indicated that the county assembly had a budget and appropriations committee. This implies that county assembly has a budget and appropriations committee. The findings support Kathungu (2016) confirmed the existence of budget and appropriations committees in the County Governments and further stated that they usually conduct public participation deliberations on planning issues.

The respondents were asked to state whether the BAC convene public forums for discussion of the county executive's proposed policy documents and budgets. The results are shown on Table 7.

Table 7: Whether the county assembly have a budget and appropriations

<b>Functional capacity in budget making process? * Does the BAC convene public forums for discussion of the county executive's proposed policy documents and budgets? Cross tabulation</b>				
			Does the BAC convene public forums for discussion of the county executive's proposed policy documents and budgets?	Total
			Yes	
Functional capacity in budget making process?	Non- elected employees of the County Government of Siaya	Count	37	37
		% within functional capacity in budget making process?	100.0%	100.0%
	Representative from the ward development committees, Civil society, NGOs, CBOs, FBOs and other interest groups	Count	131	131
		% within functional capacity in budget making process?	100.0%	100.0%

	Member of the County Assembly	Count	30	30
		% within functional capacity in budget making process?	100.0%	100.0%
Total		Count	198	198
		% within What is your functional capacity in budget making process?	100.0%	100.0%

As shown in Table 7 all 37(100.0%), 131(100.0%) and 30(100.0%) of the non- elected employees of the County Government of Siaya stated, Ward development committees, Civil society, NGOs, CBOs, FBOs and other interest groups of Siaya and Member of the County Assembly, respectively, stated that the BAC convened public forums for discussion of the county executive's proposed policy documents and budgets. In summary, all 198(100.0%) of the respondents indicated that the BAC convened public forums for discussion of the county executive's proposed policy documents and budgets. This implies that the BAC convenes public forums for discussion of the county executive's proposed policy documents and budgets. This supports a number of studies. Kathungu (2016) affirmed the existence of budget and appropriations committees in the County Governments and further stated that they usually conduct public participation deliberations on planning issues. Wacera (2016) found out that the County Assembly represented by the budget and appropriations committee was the most vibrant in conducting public participation forums on budgeting matters.

The respondents were asked to state their level of agreement on comprehensive public participation. The results are shown on Table 8.

*Table 8: Agreement on comprehensive public participation*

Statements		SD	D	U	A	SA	MEAN
The county government has mapped all the stakeholders and has a data base with the names of the stakeholder group	F	6	59	40	62	31	<b>3.27</b>
	%	<b>3.0</b>	<b>29.8</b>	<b>20.2</b>	<b>31.3</b>	<b>15.7</b>	
The county government has established the sector they (stakeholders) represent, their perceived role and legal identity	F	0	35	48	70	45	<b>3.68</b>
	%	<b>0.0</b>	<b>17.7</b>	<b>24.2</b>	<b>35.4</b>	<b>22.7</b>	
The county government through respective departments has a list of office-bearers and contact details of all stakeholders and their locations.	F	6	45	28	97	22	<b>3.42</b>
	%	<b>3.0</b>	<b>22.7</b>	<b>14.1</b>	<b>49.0</b>	<b>11.1</b>	

Table 8 shows that 62(31.3%) of the respondents agreed with the statement that the county government had mapped all the stakeholders and had a data base with the names of the stakeholder group, 59(29.8%) disagreed, 40(20.2%) were undecided, 31(15.7%) strongly agreed and 6(3.0%) strongly disagreed with the statement. The study findings suggested that the respondents were undecided (Mean=3.27) on whether the county government had mapped all the stakeholders and had a data base with the names of the stakeholder group. This implies that sometimes the county government maps all the stakeholders and has a data base with the names of the stakeholder group.

Additionally, 70(35.4%) of the respondents agreed with the statement that the county government had established the sector they (stakeholders) represented, their perceived role and legal identity, 48(24.2%) were undecided, 45(22.7%) strongly agreed and 35(17.4%) disagreed with the statement. The study findings revealed that the respondents were undecided (Mean=3.68) on whether the county government had established the sector they (stakeholders) represented, their perceived role and legal identity. This

implies that sometimes the county government establishes the sector they (stakeholders) represent, their perceived role and legal identity.

Lastly, 97(49.0%) of the respondents agreed with the statement that the county government through respective departments had a list of office-bearers and contact details of all stakeholders and their locations, 45(22.7%) disagreed, 28(14.1%) were undecided, 22(11.1%) strongly agreed and 6(3.0%) strongly disagreed with the statement. The study findings suggested that the respondents were undecided (Mean=3.42) on whether the county government through respective departments had a list of office-bearers and contact details of all stakeholders and their locations. This implies that sometimes the county government through respective departments maintains a list of office-bearers and contact details of all stakeholders and their location. This is in line with the findings of Orale (2008) as cited by Nzuve and Njeru (2013) who asserted that the organization leadership has to be committed to performance management; the council should involve its stakeholders and there should be continuous monitoring, feedback, dissemination and learning from outcomes.

### 7. Descriptive Statistics of budgetary forecasting techniques

The researcher sought to examine the effects of budgetary forecasting techniques on budget performance. To analyze the objective, the respondents were first asked to state whether: The government had put in place the County Budget and Economic Forum (CBEF) as per the requirement of section 37 of the PFM Act 2012; the government had put in place various sector working; and there is a defined criteria or basis for distribution of resources by the county government.

Figure 1: Budgetary forecasting techniques

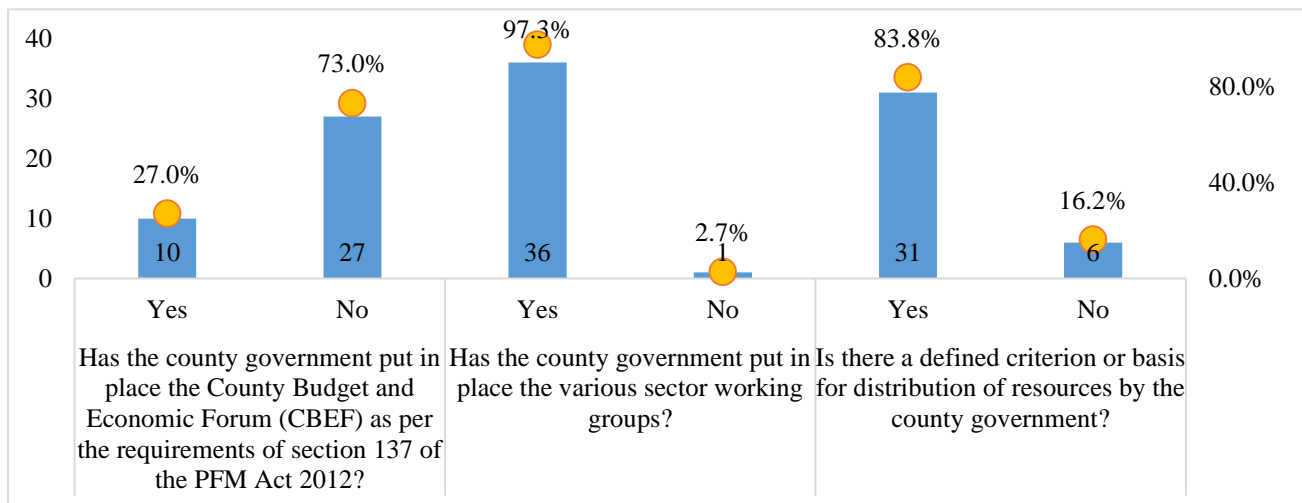


Figure 1 shows that majority 27(73.0%) of the respondents stated that the county government has not put in place the County Budget and Economic Forum (CBEF) as per the requirements of section 137 of the PFM Act 2012, while, minority 10(27.0%) revealed that they had. Similarly, majority 36(97.3%) of the respondents stated that the county government has put in place the various sector working groups, while, minority 1(2.7%) revealed that they did not. Lastly, majority 31(83.8%) of the respondents stated that there was a defined criterion or basis for distribution of resources by the county government, while, minority 6(16.2%) revealed that there was no defined criterion. As to whether the criterion is defined, several

respondents mention that the criterion is defined in plan and policy documents which included the county fiscal strategy paper.

*Table 9: Budgetary forecasting techniques*

Statements		Yes	No
Does the government stick to the ceilings set in the CFSP?	F	11	26
	%	<b>29.7</b>	<b>70.3</b>
Are there justifications/explanations for the ceilings set and deviations?	F	23	3
	%	<b>88.5</b>	<b>11.5</b>
Does the county government provide a report on the performance of previous budgets (both on revenue and expenditure)?	F	37	0
	%	<b>100.0</b>	<b>0.0</b>

Table 9 shows that majority 26(70.3%) of the respondents stated that the government do not stick to the ceilings set in the CFSP, while, minority 11(29.7%) revealed that they stuck. All 37(100.0%) of the respondents revealed that the county government provided a report on the performance of previous budgets (both on revenue and expenditure). Additionally, majority 23(88.5%) of the respondents stated that there were justifications/ explanations for the ceilings set and deviations, while minority 3(11.5%) revealed that there were no justifications. Clearly, the findings showed deviations were always experienced with reasons for such deviations. This supports the findings of Gacheru (2012) who stated that failure to implement budgets as planned would always be experienced and this would be as a result foreign exchange rate fluctuations in the market, uncertainties, insufficient allocations and different budgeting guidelines and new set of rules which take time to learn accompany donor funded projects. They were further asked to categorize the relationship between revenue and expenditure in the previous county government budgets in one of the following category. This is presented in Table 10.

*Table 10: County government projections*

Response	F	%
The county government has always projected a balanced budget	26	70.3
The county government has always projected a deficit budget	11	29.7

As shown in Table 10 majority 26(70.3%) of the respondents stated that the county government had always projected a balanced budget, while, minority 11(29.7%) revealed that the county government had always projected a deficit budget. The findings are in line with the Office of the Controller of Budget (OCOB) reports 2019 which affirmed that over the years, the County Governments have always projected a balanced budget. This complies with the provisions of the annual budget circular guidelines which dictate the forms and contents of the budgets. The findings are further supported by Kavanagh (2007) as cited by Darlton (2010) who asserted that while budgets are a means of resource allocation, revenue and expenditure projections should be linked to provide stakeholders with an overall financial picture of the organization's future and provide the planning staff with an early warning financial deficits or surpluses and highlighting issues of concern.

The respondents were asked to state their level of agreement on the statements. The results are shown on Table 11.

*Table 11: Level of agreements on government projection elements*

Statements		SD	D	U	A	SA	MEAN
The government provides a projection on how much it intends to collect/raise from its local sources and how much it projects to receive from the national government which are realistic/reasonable	F	0	0	2	18	17	<b>4.41</b>
	%	<b>0.0</b>	<b>0.0</b>	<b>5.4</b>	<b>48.6</b>	<b>45.9</b>	
The county government always projects and reveals to the public and all stakeholders the amount of revenue it projects to collect and expend	F	0	0	0	15	22	<b>4.59</b>
	%	<b>0.0</b>	<b>0.0</b>	<b>0.0</b>	<b>40.5</b>	<b>59.5</b>	
MTEF Framework- the county government provides projections for the three coming financial years using the current year as the baseline and the 2 outer years	F	0	3	0	19	15	<b>4.24</b>
	%	<b>0.0</b>	<b>8.1</b>	<b>0.0</b>	<b>51.4</b>	<b>40.5</b>	
The ceilings set by the government are always realistic and are based on the past year performance and the goals set out in the development plans	F	0	16	0	15	6	<b>3.30</b>
	%	<b>0.0</b>	<b>43.2</b>	<b>0.0</b>	<b>40.5</b>	<b>16.2</b>	
The county government has a comprehensive revenue manual which describes all revenue source, the legislative authority for each source, the uses and funding for each sources of revenue stream and the historical revenue data which informs future projection	F	2	4	4	17	10	<b>3.78</b>
	%	<b>5.4</b>	<b>10.8</b>	<b>10.8</b>	<b>45.9</b>	<b>27.0</b>	

Table 11 shows that 18(48.6%) of the respondents agreed with the statement that the government provided a projection on how much it intended to collect/raise from its local sources and how much it projected to receive from the national government which were realistic/reasonable, 17(45.9%) strongly agreed and 2(5.4%) were undecided on the statement. The study findings suggested that the respondents agreed (Mean=4.41) with the statement that the government provided a projection on how much it intended to collect/raise from its local sources and how much it projected to receive from the national government which were realistic/reasonable. This implies that the government provides a projection on how much it intends to collect/raise from its local sources and how much it projects to receive from the national government which is realistic /reasonable. This supports the findings of Gacheru (2012) who stated that while budgets are a means of resource allocation, the process involves preparation of forecasts of the expected/confirmed income or grants. Darlton (2010) asserted that financial forecasting provides an understanding of the available funding, evaluate financial risks, assess service sustainability, assess capital investment levels and identify future commitments and resource demands.

Additionally, 22(59.5%) of the respondents strongly agreed with the statement that the county government always projected and revealed to the public and all stakeholders the amount of revenue it projected to collect and expend and 15(40.5%) agreed with the statement. The study findings revealed that the respondents agreed (Mean=4.59) with the statement that the county government always projected and revealed to the public and all stakeholders the amount of revenue it projected to collect and expend. This implies that the county government always projects and reveals to the public and all stakeholders the amount of revenue it projects to collect and expend. This proves that budgets are used as communication tools and thus in agreement with the findings of Gachithi (2010) who stated that institutions use budgets as a tool for planning, controlling, co-ordination and communication. Abongo (2017) stated that various firms communicate budgetary issues to all relevant stakeholders.

On MTEF Framework- the county government provided projections for the three coming financial years using the current year as the baseline and the 2 outer years, 19(51.4) of the respondents agreed with the statement, 15(40.5%) strongly agreed and 3(8.1%) disagreed with the statement. The study findings

suggested that the respondents agreed (Mean=4.24) with the statement on MTEF Framework that the county government provided projections for the three coming financial years using the current year as the baseline and the 2 outer years. This implies that the county government provides projections for the three coming financial years using the current year as the baseline and the 2 outer years. This agrees with the findings of Darlton (2010) who asserted that it is imperative to make the shift from a short term tactical budgeting process to a strategic fiscal process. He further stated that a financial plan for a longer period of time helps to anticipate future economic impacts, ensure achievements of objectives, provides an assurance of ability to provide essential services over a long term period and ability to meet public value and performance expectations. Ayorekire (2018) asserted that organizations should prepare both short and long term budgets to avoid the focus on short term events since some projects being undertaken are capital in nature and are continuous.

On the other hand, 16(43.2) of the respondents disagreed with the statement that the ceilings set by the government were always realistic and based on the past year performance and goals set out in the development plans, 15(40.5%) agreed and 6(16.2%) strongly agreed with the statement. The study findings revealed that the respondents were undecided (Mean=3.30) on whether the ceilings set by the government were always realistic and based on the past year performance and goals set out in the development plans. This implies that ceilings set by the government are sometimes realistic and based on the past year performance and the goals set out in the development plans. This is in line with the findings of Ayorekire (2018) who asserted that budgeting facilitates better resource allocation to achieve organization targets since budgeting create future plan to spend, facilitate effective allocation and utilization of resources and provide a means of performance measurement.

Lastly, 17(45.9) of the respondents agreed with the statement that the county government had a comprehensive revenue manual which described all revenue source, the legislative authority for each source, the uses and funding for each sources of revenue stream and the historical revenue data which informs future projection, 10(27.0%) strongly disagreed, 4(10.8%) were undecided, 4(10.8%) disagreed and 2(5.4%) strongly disagreed with the statement. The study findings revealed that the respondents were undecided (Mean=3.78) with the statement the county government had a comprehensive revenue manual which described all revenue source, the legislative authority for each source, the uses and funding for each sources of revenue stream and the historical revenue data which informs future projection. This implies that the county government sometimes has a comprehensive revenue manual which describes all revenue sources, the legislative authority for each source, the uses and funding for each source of revenue stream and the historical revenue data which informs future projects. This supports the findings of Abdullah (2016) who asserted that amongst other problems faced during budgeting is lack of transparency in budgeting, expenditure and some revenue streams.

The respondents were then asked to state most to least used revenue forecasting approaches. This is presented in Table 12.

Table 12: Most to least used approaches

Statements		Most used	Moderately Used	Least used
Conventional approaches	F	24	13	0
	%	<b>64.9</b>	<b>35.1</b>	<b>0.0</b>
Non-conventional approaches	F	2	0	35
	%	<b>5.4</b>	<b>0.0</b>	<b>94.6</b>
Mixture of both approaches	F	11	24	2
	%	<b>29.7</b>	<b>64.9</b>	<b>5.4</b>

Table 12 shows that the most used approach by majority 24(64.9%) of the respondents was conventional approaches. The second used approach by majority 24(64.9%) of the respondents was mixture of both approaches. The least used approach by majority 35(94.6%) of the respondents was non-conventional approaches. This implies that conventional approaches are the most used approach. This is in line with the findings of Martins (1999) as cited by Suberu (2010) that conventional budgeting as most used approach involves budgeting on yearly basis by adding certain percentage to allow for inflation and other costs increases to the previous budget. Suberu (2010) noted that it is a system of making minor changes or marginal increases over the existing budget for next year's estimates. It itemizes details under headings and sub headings in accordance with the objects such as salaries, allowances, services and special expenditures. Suberu (2010) however notes that where capital expenditure is involved, mixture of both approaches may be ideal.

### 8. Descriptive Statistics of use of technology on budget performance

The researcher sought to determine the effects of use of technology on budget performance. The respondents were asked to state whether the county government employed the use of ICT (IFMIS) during budget preparation and implementation across all the sectors, and rate the level of adoption. This is presented in table 13.

Table 13: County government use of the ICT during budget preparation and implementation

Functional capacity in budget making process? * Does the county government employ the use of ICT (IFMIS) during budget preparation and implementation across all the sectors? Cross tabulation					
			Does the county government employ the use of ICT (IFMIS) during budget preparation and implementation across all the sectors?		Total
			Yes	No	
Functional capacity in budget making process?	Non- elected employees of the County Government of Siaya	Count	37	0	37
		% within functional capacity in budget making process	100.0%	0.0%	100.0%
	Representative from the ward development committees, Civil society, NGOs, CBOs, FBOs and other interest groups	Count	125	6	131
		% within functional capacity in budget making process	95.4%	4.6%	100.0%
Member of the County Assembly	Count	27	3	30	
	% within functional capacity in budget making process	90.0%	10.0%	100.0%	
Total		Count	189	9	198

	% within functional capacity in budget making process	95.5%	4.5%	100.0%
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Table 13 shows that all 37(100%) of the non- elected employees of the County Government of Siaya stated that the county government employed the use of ICT (IFMIS) during budget preparation and implementation across all the sectors. Additionally, majority 125(95.4%) of the ward development committees, Civil society, NGOs, CBOs, FBOs and other interest groups of Siaya indicated that the county government employed the use of ICT (IFMIS) during budget preparation and implementation across all the sectors, while, 6(4.6%) revealed that they did not. Lastly, majority 27(90.0%) of Member of the County Assembly stated that the county government employed the use of ICT (IFMIS) during budget preparation and implementation across all the sectors, while, 3(10.0%) revealed that they did not. In summary, majority 189(95.5%) of the respondents indicated that the county government employed the use of ICT (IFMIS) during budget preparation and implementation across all the sectors, while, 9(4.5%) revealed that they did not. This implies that the county government employs the use of ICT (IFMIS) during budget preparation and implementation across all the sectors. This supports the findings of Alade et al., (2016) stated that the use of ICT to process budgets has been in practice, has hasten and sped up collation of budget, reduce government bureaucratic ways of doing things and reduce costs. The respondents were asked to opine the level at which the use of IFMIS has been adopted by the county government. The results are shown on Table 14.

Table 14: Level at which the use of IFMIS has been adopted by the county government

Functional capacity in budget making process? * Kindly in your own opinion, rate the level at which the use of IFMIS has been adopted by the county government Cross tabulation					
			Kindly in your own opinion, rate the level at which the use of IFMIS has been adopted by the county government		Total
			Fully	Partially	
Functional capacity in budget making process?	Non- elected employees of the County Government of Siaya	Count	0	37	37
		% within functional capacity in budget making process	0.0%	100.0%	100.0%
	Representative from the ward development committees, Civil society, NGOs, CBOs, FBOs and other interest groups	Count	24	107	131
		% within functional capacity in budget making process	18.3%	81.7%	100.0%
	Member of the County Assembly	Count	13	17	30
		% within functional capacity in budget making process	43.3%	56.7%	100.0%
Total	Count	37	161	198	
	% within functional capacity in budget making process	18.7%	81.3%	100.0%	

Table 14 shows that all 37(100%) of the non- elected employees of the County Government of Siaya stated that use of IFMIS had been partially adopted by the county government. Additionally, majority 107(81.7%) of



the ward development committees, Civil society, NGOs, CBOs, FBOs and other interest groups of Siaya indicated that use of IFMIS had been partially adopted by the county government, while, 24(18.3%) revealed that they are fully adopted. Lastly, majority 17(56.7%) of Member of the County Assembly stated that the use of IFMIS had been partially adopted by the county government, while, 13(43.3%) revealed that they are fully adopted. In summary, majority 161(81.3%) of the respondents indicated that use of IFMIS had been partially adopted by the county government, while, 37(18.7%) revealed that they fully adopted. This implies that the use of IFMIS has been partially adopted by the county government. This supports the findings of Musyoka (2017) who asserted that County Governments have embraced the use of ICT in most of their functions including budgeting. He further stated that there was room for improvement as the adoption of use of ICT was partial.

### 9. Descriptive statistics for budget performance

The researcher sought to assess budget performance. The respondents were first asked to state their level of agreement on the statement: Expenditures incurred are usually based on the approved budget and nothing is implemented outside the budget; and supplementary budgets are done to bring on board uncompleted projects from the previous financial years (FYs) and to correct missed target/unachieved targets due to changes in financial and economic environments. The results are shown on Table 15.

Table 15: Agreement level on budget performance

Statements		SD	D	U	A	SA	MEAN
Expenditures incurred are usually based on the approved budget and nothing is implemented outside the budget	F	1	18	51	117	11	<b>3.60</b>
	%	<b>0.5</b>	<b>9.1</b>	<b>25.8</b>	<b>59.1</b>	<b>5.6</b>	
Supplementary budgets are done to bring on board uncompleted projects from the previous FYs and to correct missed target/unachieved targets due to changes in financial and economic environments	F	0	29	76	70	23	<b>3.44</b>
	%	<b>0.0</b>	<b>14.6</b>	<b>38.4</b>	<b>35.4</b>	<b>11.6</b>	

Table 15 shows that 117(59.1%) of the respondents agreed with the statement that the expenditures incurred were usually based on the approved budget and nothing was implemented outside the budget, 51(25.8%) were undecided, 18(9.1%) disagreed, 11(5.6%) strongly agreed and 1(0.5%) strongly disagreed with the statement. The study findings suggested that the respondents were undecided (Mean=3.60) with the statement that the expenditures incurred were usually based on the approved budget and nothing was implemented outside the budget. This implies that the expenditures incurred are sometimes based on the approved budget and nothing is implemented outside the budget. This finding support Gacheru (2012) who stated that failures to implement budgets as planned are usually experienced and may be as a result of foreign exchange rate fluctuations in the market, donor funded projects have different budgeting guidelines and come with new set of rules which take time to learn, uncertainties and insufficient allocations.

Additionally, 76(38.4%) of the respondents were undecided on whether the supplementary budgets were done to bring on board uncompleted projects from the previous FYs and to correct missed target/unachieved targets due to changes in financial and economic environments, 70(35.4%) agreed, 29(14.6%) disagreed and 23(11.6%) strongly agreed. The study findings suggested that the respondents were undecided (Mean=3.44) on whether the supplementary budgets were done to bring on board uncompleted projects from the previous FYs and to correct missed target/unachieved targets due to changes in financial and economic environments. This implies that supplementary budgets are sometimes done to bring on board uncompleted projects from the

previous FYs and to correct missed target/unachieved targets due to changes in financial and economic environments. This finding support Ayorekire (2018) who affirmed that reviewing budgets is a necessity as it helps in highlighting from efficient performance thus enabling the management to detect and suggest immediate strategy/corrective action/controls to mitigate undesirable activities thus more useful for effective budgeting process.

The respondents were asked to rate challenges associated with participatory budgeting, forecasting practices and use of ICT systems from most to least. This is presented in Table 16.

Table 16: Ranking of challenges

Statements		First Ranked	Second Ranked	Third Ranked
Participatory budgeting	F	58	74	66
	%	<b>29.3</b>	<b>37.3</b>	<b>33.3</b>
Forecasting practices	F	89	68	41
	%	<b>44.9</b>	<b>34.3</b>	<b>20.7</b>
Use of ICT systems	F	51	41	106
	%	<b>25.8</b>	<b>20.7</b>	<b>53.5</b>

Table 16 shows that the most ranked challenge by majority 89(44.9%) of the respondents was forecasting practices. The second ranked challenge by majority 74(37.3%) of the respondents was participatory budgeting. The least ranked challenge by majority 106(53.5%) of the respondents was use of ICT systems. This implies that challenges associated with forecasting practices are the most experienced challenges to budget performance followed by challenges associated with public participation. This is in line with the findings of Darlton (2010) who asserted that inadequate forecasting practices and lack of public participation are major challenges to budget implementation. He further affirmed that amongst other measures to address these challenges, organizations should develop a long term revenue and expenditure forecasting models to provide effective analysis of problems and opportunities and an ability to look for structural or cyclical deficits and practice a collaborative budgeting process which include all key stakeholders. Musyoka (2017) asserted that application of ICT had a fairly low relationship on effective management of budgets in County Governments as system depends more entirely on the users. The respondents were then asked to rate the elements of participatory challenges. This is presented in table 17.

Table 17: Ranking of Participatory Challenges

Statements		Ranks				
		1	2	3	4	5
Lack of public participation policy and guidelines to state how public participation should be done	F	40	37	61	51	9
	%	<b>20.2</b>	<b>18.7</b>	<b>30.8</b>	<b>25.8</b>	<b>4.5</b>
Stakeholders views/inputs are sometimes not feasible hence cannot be implemented within the year of proposal and at a times are too many to be implemented at once.	F	94	6	58	18	22
	%	<b>47.5</b>	<b>3.0</b>	<b>29.3</b>	<b>9.1</b>	<b>11.1</b>
Budgets are not usually aligned to the development plans and views from the public (stakeholders)	F	50	81	14	8	45
	%	<b>25.3</b>	<b>40.9</b>	<b>7.1</b>	<b>4.0</b>	<b>22.7</b>
Most of projects by the stakeholders are capital in nature and therefore requires other processes e.g. tendering, feasibility studies etc. which take too long to be completed and therefore most of them (projects) are rolled over to successive financial year	F	7	40	36	82	33
	%	<b>3.5</b>	<b>20.2</b>	<b>18.2</b>	<b>41.4</b>	<b>16.7</b>

Public participation is done as a formality which has to be fulfilled, as a component of budgeting process which is a routine, lack meaning and does not take stakeholders proposals seriously	F	15	34	21	50	78
	%	<b>7.6</b>	<b>17.2</b>	<b>10.6</b>	<b>25.3</b>	<b>39.4</b>

Table 17 shows that the most ranked participatory budgeting challenge by majority 94(47.5%) of the respondents was that stakeholders’ views/inputs were sometimes not feasible hence could not be implemented within the year of proposal and at a times were too many to be implemented at once. The second ranked participatory challenge by majority 81(40.9%) of the respondents was that budgets were not usually aligned to the development plans and views from the public (stakeholders). The third ranked participatory challenge by majority 61(30.8%) of the respondents was that lack of public participation policy and guidelines to state how public participation should be done.

The fourth ranked participatory challenge by majority 82(41.4%) of the respondents was that most of projects by the stakeholders were capital in nature and therefore, required other processes e.g. tendering, feasibility studies etc. which took too long to be completed and therefore, most of them (projects) were rolled over to successive financial year. The least ranked participatory challenge by the majority 78(39.4%) of the respondents was that public participation was done as a formality which had to be fulfilled, as a component of budgeting process which is a routine, lacked meaning and did not take stakeholders proposals seriously. This implies that stakeholders’ views/inputs are sometimes not feasible hence cannot be implemented within the year of proposal and at a times are too many to be implemented at once was the major challenge. These findings in Table 4.19 supports Kelly (2007) as illustrated by Musyoka (2017) in his findings that there are various challenges associated with stakeholder’s participation on public budgeting process which includes feasibility of the proposals by the public, effectiveness of the process and equity in allocation of funds. Abdullah (2016) noted that citizens’ demands arises (increases to levels which may not be feasible) when governments deliberates with them during public participation. Abdullah (2016) noted that once proposals have been deliberated, the citizens expect the government to implement everything and where the government fails to implement everything due to limitation of budget funding conflicts arises. The respondents were asked to rate the elements of forecasting practice challenges. This is presented in table 18.

Table 18: Ranking of forecasting practice challenges

Statements		Ranks		
		1	2	3
Poor forecasting methods- Methods used to project revenues and expenditures and to allocate funds to user department may be unsatisfactory	F	64	77	57
	%	<b>32.3</b>	<b>38.9</b>	<b>28.8</b>
In some period, projections may include unattainable/unachievable/unrealistic/over ambitious revenue and expenditure projections/ targets or standards hence may hamper budget performance	F	93	62	43
	%	<b>47.0</b>	<b>31.3</b>	<b>21.7</b>
The budget may be faced with uncertainty/ unforeseen scenarios which may have not been taken care of during projections which hinders effective implementation	F	50	62	86
	%	<b>25.3</b>	<b>31.3</b>	<b>43.4</b>

As shown in Table 18 the most ranked forecasting practice challenge by majority 93(47.0%) of the respondents was that in some period, projections could include unattainable/unachievable/unrealistic/over ambitious revenue and expenditure projections/ targets or standards hence may hamper budget performance. The second ranked forecasting practice challenge by majority 77(38.9%) of the respondents was that poor forecasting

methods such as methods used to project revenues and expenditures and to allocate funds to user department could be unsatisfactory. The least ranked forecasting practice challenge by majority 86(43.4%) of the respondents was that the budget could be faced with uncertainty/ unforeseen scenarios which could have not been taken care of during projections which hindered effective budget implementations. This implies that the most forecasting practice challenge is projections that may include unattainable/ unachievable/ unrealistic/ over ambitious revenue and expenditure projections/ targets or standards, hence may hamper budget performance. This is in line with the findings of Gachithi (2010) who stated that budget performance is affected by a number of forecasting challenges which includes insufficient funds allocated to departments, institutional weaknesses. In some periods budget may include unattainable targets or standards, methods used to allocate funds to user department may be unsatisfactory and uncertainties associated with the financial and economic environment.

The respondents were asked to rate the elements of use of ICT systems’ challenges. This is presented in Figure 19.

Table 19: Ranking of elements of use of ICT systems’ challenges

Statements		Ranks		
		1	2	3
IFMIS downtime weaknesses affects activities like budget uploading, requisitions and e-procurement which could hinder effective budget implementation	F	55	62	81
	%	<b>27.8</b>	<b>31.3</b>	<b>40.9</b>
IFMIS re-engineering comes with new set of rules which users take time to learn and can be a challenge to budget implementation	F	91	51	56
	%	<b>46.0</b>	<b>25.8</b>	<b>28.3</b>
Hierarchical nature of approval required by the IFMIS system i.e. where approval is required/sought at every level, system codes must match a given set of guidelines and a long requisition process affect budget implementation	F	27	106	65
	%	<b>13.6</b>	<b>53.5</b>	<b>32.8</b>

Table 19 shows that the most ranked use of ICT systems challenge by majority 91(46.0%) of the respondents was that IFMIS re-engineering come with new set of rules which users take time to learn and could be a challenge to budget implementation. The second ranked use of ICT systems challenge by majority 106(53.5%) of the respondents was that hierarchical nature of approval required by the IFMIS system such as where approval is required/sought at every level, system codes had to match a given set of guidelines and a long requisition process affected budget implementation. The least ranked use of ICT systems challenge by majority 81(40.9%) of the respondents was that IFMIS downtime weaknesses affected activities like budget uploading, requisitions and e-procurement which hindered effective budget implementation. This implies that the most experienced challenge associated with use of ICT system is that IFMIS re-engineering comes with new set of rules which users take time to learn and can be a challenge to budget implementation. This is in line with the findings Alade et al., (2016) who stated that the use of ICT to process budgets is a right step and should be encouraged at all government levels with capable and competent personnel brought in to handle ICT- based budget processing devices or programs and further reduce bureaucratic ways of doing things.

**10. Inferential statistics to determine the effect of budgeting practices on budget performance**

The Multiple linear regression test was used to determine which among the dimensions of budgeting practices predict budget performance of County Governments. First, the model summary was analyzed to establish the

strength of the conceptualized dimensions of budgeting practices in predicting budget performance of County Governments.

Table 20: Model Summary

**Model summary<sup>b</sup>**

Model	R	R Square	Adjusted Square	RStd. Error of the Estimate	Durbin-Watson
1	.945 <sup>a</sup>	.893	.884	.169	.923

a. Predictors: (Constant), Use of technology, Participatory budgeting, Budgetary forecasting techniques

b. Dependent Variable: Budget performance

As shown in Table 20 the three dimensions namely participatory budgeting, budgetary forecasting techniques and use of technology explained 88.4% of the variation in budget performance (Adjusted R Square = 0.884). Therefore, the remaining 11.6% is explained by other dimensions of budgeting practices not considered in the study. Additionally, the ANOVA output was examined to check whether the proposed model was viable.

Table 21: Analysis of Variance (ANOVA<sup>b</sup>)

**ANOVA<sup>a</sup>**

Model	Sum of Squares	Df	Mean Square	F	Sig.
Regression	7.870	3	2.623	92.015	.000 <sup>b</sup>
Residual	.941	33	.029		
Total	8.811	36			

a. Dependent Variable: Budget performance

b. Predictors: (Constant), Use of technology, Participatory budgeting, Budgetary forecasting techniques

Results shown in Table 21 reveal that the F-statistic was highly significant (F= 92.015 p<0.05), this shows that the model was valid. The model significantly improved the ability to predict budget performance. Thus, the model was significant leading to rejection of the null hypotheses.

**11. Regression Coefficients of Budget Performance**

Multiple regression coefficients showed that the estimates of  $\beta$  values give an individual contribution of each predictor to the model. The  $\beta$  value tells us about the relationship between budget performances with each predictor. The positive  $\beta$  values indicate the positive relationship between the predictors and the outcome. The coefficients for each of the variables indicates the amount of change one could expect in budget performance, given a one-unit change in the value of that variable, given that all the variables in the model are standardized basing on the standardized coefficients.

Table 22: Regression Coefficients<sup>a</sup>

**Coefficients<sup>a</sup>**

Model	Unstandardized Coefficients		Standardized Coefficients	T	Sig.	Collinearity Statistics	
	B	Std. Error	Beta			Tolerance	VIF
(Constant)	.230	.236		.975	.337		
Participatory budgeting	.351	.030	.749	11.749	.000	.795	1.257

Budgetary forecasting techniques	.404	.074	.492	5.454	.000	.398	2.511
Use of technology	.174	.074	.209	2.337	.026	.406	2.465

a. Dependent Variable: Budget performance

Table 22 revealed that, the  $\beta$  value for participatory budgeting (.749), budget forecasting techniques (.492) and use of technology (.209) were positive. The positive  $\beta$  values indicate the direction of relationship between predictors and outcome. From the results (Table 4.12) the model was then specified as: -

$$y = \beta_1x_1 + \beta_2x_2 + \beta_3x_3 + \varepsilon \dots$$

Budget performance=0 .749 participatory budgeting +0.492 budget forecasting techniques +0.209 use of technology.

Consequently, results revealed standardized regression coefficient for participatory budgeting ( $\beta=0.749$ ), implies that an increase of 1 standard deviation in participatory budgeting is likely to result in a 0.749 standard deviations increase in budget performance. Standardized regression coefficient for budget forecasting techniques ( $\beta=0.492$ ), implies that an increase of 1 standard deviation in budget forecasting techniques is likely to result in a 0.492 standard deviations increase in budget performance. Lastly, standardized regression coefficient for use of technology ( $\beta=0.209$ ), implies that an increase of 1 standard deviation in use of technology is likely to result in a 0.209 standard deviations increase in budget performance.

In order to identify whether the predictors were making a significant contribution to the model, T-test was used. When the t-test associated with  $\beta$  value is significant then the predictor is making a significant contribution to the model. The smaller the value of significance (the larger the value of t) meaning greater is the contributor of that predictor. The results show that participatory budgeting ( $t =11.749$ ,  $P<.05$ ), budget forecasting techniques ( $t =5.454$ ,  $P<.05$ ) and use of technology ( $t =2.337$ ,  $P <.05$ ). This implies that participatory budgeting is most important predictor for budget performance.

## 12. Hypothesis testing

**H01:** There is no significant effect of participatory budgeting on budget performance of County Governments: A case of Siaya County, Kenya.

As shown in Table 22, for participatory budgeting, P value is equal to 0.000 that is less than 0.05. Therefore, the null hypothesis that there is no significant effect of participatory budgeting on budget performance is rejected. This implies that there is a statistically significant effect of participatory budgeting on budget performance. This finding supports Wacera (2016) who concluded that from the regression analysis it was clear that public participation and funds availability was significant in predicting budget implementation  $p < 0.05$ .

**H02:** There is no significant effect of budgetary forecasting techniques on budget performance of County Governments: A case of Siaya County, Kenya.

As shown in Table 22, for budgetary forecasting techniques, P value is equal to 0.000 that is less than 0.05. Therefore, the null hypothesis that there is no significant effect of budgetary forecasting techniques on budget performance is rejected. This implies that there is a statistically significant effect of budgetary forecasting techniques on budget performance. This finding supports the findings of Darlton (2010) who asserted that financial forecasting provides an understanding of the available funding, evaluate financial risks, assess service

sustainability, assess capital investment levels and identify future commitments and resource demands hence affects budget implementation significantly.

**H03:** There is no significant effect of use of technology on budget performance of County Governments: A case of Siaya County, Kenya.

As shown in Table 22, for use of technology, P value is equal to 0.026 that is less than 0.05. Therefore, the null hypothesis that there is no significant effect of use of technology on budget performance is rejected. This implies that there is a statistically significant effect of use of technology on budget performance. This finding supports the findings of Alade et al., (2016) who concluded that computer and other related budget processing ICT devices process budget faster, reduce budgeting time and thereby allow MDAs' budget to be processed and submitted within the required time. Mbithi (2016) observed that implementation of financial regulations in the national Sub-county treasuries goes hand in hand with technology.

### 13. Summary

The purpose of the study was to assess the influence of budgeting practices on budget performance of County Governments: A case of Siaya County, Kenya. The specific objectives were to: assess the effects of participatory budgeting on budget performance; examine the effects of budgetary forecasting techniques on budget performance; determine the effects of use of technology on budget performance. Descriptive survey design was adopted and data collected through use of questionnaires which were administered to participants in budget making process through their various sector working groups. A sample size 217 participants was used from all the sector working groups with a response rate of 91.2%. Data collected was coded into categorical variables and later analyzed by use of Statistical Package for Social Sciences (SPSS) version 24. The research findings were significant and therefore it concluded that budgetary practices at the strategic and operational phase of budgeting process are important ingredients to enhanced budget performance. The study recommended that county government should pay more attention to participatory budgeting, employ adequate forecasting techniques and employ use of technology fully in budgeting process in order to improve budget performance

#### Effects of participatory budgeting on budget performance

On the effects of participatory budgeting on budget performance, when asked whether they had participated in budget making process in Siaya County, all 198(100.0%) respondents revealed that they had. On the length of participation, majority 66(33.3%) revealed that had participated in budget making process for 2 years. Additionally, majority 172(86.9%) of the respondents indicated that county government published and publicized various budget documents within specified time to enable citizens meaningful input and engagement. When asked about the smallest unit/level in which the county government conducted public participation, most 179(90.4%) of the respondents revealed that Ward level was the least. Consequently, majority 149(75.3%) of the respondents revealed that County Executive facilitated public consultations at different stages of the budget cycle. Majority 124(62.6%) of the respondents indicated that the county government conducted public participation often when there was an issue to be discussed. All 198(100.0%) respondents indicated that the county assembly had a budget and appropriations committee, and 198(100.0%) that the BAC convened public forums for discussion of the county executive's proposed policy documents and budgets.

On how comprehensive the public participation was, the respondents were undecided (Mean=3.27) on whether the county government had mapped all the stakeholders and had a data base with the names of the stakeholder

group. Additionally, respondents were undecided (Mean=3.68) on whether the county government had established the sector they (stakeholders) represented, their perceived role and legal identity. The respondents were undecided (Mean=3.42) on whether the county government through respective departments had a list of office-bearers and contact details of all stakeholders and their locations. Standardized regression coefficient for participatory budgeting ( $\beta=0.749$ ), implies that an increase of 1 standard deviation in participatory budgeting is likely to result in a 0.749 standard deviations increase in budget performance. For participatory budgeting, P value is equal to 0.000 that is less than 0.05. Therefore, the null hypothesis that there is no significant effect of participatory budgeting on budget performance is rejected.

### **Effects of budgetary forecasting techniques on budget performance**

The study examined the effects of budgetary forecasting techniques on budget performance. The study revealed that majority 27(73.0%) of the respondents stated that the county government had not put in place the County Budget and Economic Forum (CBEF) as per the requirements of section 137 of the PFM Act 2012. Similarly, majority 36(97.3%) of the respondents stated that the county government had put in place the various sector working groups. Majority 31(83.8%) of the respondents stated that there was a defined criterion or basis for distribution of resources by the county government. Majority 26(70.3%) of the respondents stated that the government did not stick to the ceilings set in the CFSP. All 37(100.0%) respondents revealed that the county government provided a report on the performance of previous budgets (both on revenue and expenditure). Subsequently, majority 23(88.5%) and 26(70.3%) of the respondents stated that there were justifications/explanations for the ceilings set and deviations, and the county government had always projected a balanced budget, respectively.

On the agreement on government projections, the respondents agreed (Mean=4.41) that the government provided a projection on how much it intended to collect/raise from its local sources and how much it projected to receive from the national government which were realistic/reasonable. Additionally, the respondents agreed (Mean=4.59) that the county government always projected and revealed to the public and all stakeholders the amount of revenue it projected to collect and expend. The respondents agreed (Mean=4.24) that MTEF Framework-the county government provided projections for the three coming financial years using the current year as the baseline and the 2 outer years. The respondents were undecided (Mean=3.30) on whether the ceilings set by the government were always realistic and based on the past year performance and the goals set out in the development plans. The respondents tended to be undecided (Mean=3.78) that the county government had a comprehensive revenue manual which described all revenue source, the legislative authority for each source, the uses and funding for each source of revenue stream and the historical revenue data which informs future projection. Most used approach by majority 24(64.9%) of the respondents was conventional approaches. Standardized regression coefficient for budget forecasting techniques ( $\beta=0.492$ ) implies that an increase of 1 standard deviation in budget forecasting techniques is likely to result in a 0.492 standard deviations increase in budget performance. The P value is equal to 0.000 that is less than 0.05, thus, the null hypothesis that there is no significant effect of budgetary forecasting techniques on budget performance, was rejected.

### **Effects of use of ICT on budget performance**

The researcher determined the effects of use of technology on budget performance. The findings revealed that majority 189(95.5%) of the respondents indicated that the county government employed the use of ICT (IFMIS) during budget preparation and implementation across all the sectors. Majority 161(81.3%) of the respondents indicated that use of IFMIS had been partially adopted by the county government. Consequently,



the respondents were undecided (Mean=3.67) on whether requisition of funds through IFMIS was efficient and effective. The respondents were undecided (Mean=3.57) on whether uploading budget on the IFMIS platform was done in time to enable its implementation. The respondents disagreed (Mean=3.20) that there were usually no system challenges that caused delay in budget implementation. Standardized regression coefficient for use of technology ( $\beta=0.209$ ), implies that an increase of 1 standard deviation in use of technology is likely to result in a 0.209 standard deviations increase in budget performance. For use of technology, P value is equal to 0.026 that is less than 0.05. Therefore, the null hypothesis that there is no significant effect of use of technology on budget performance is rejected.

#### **14. Conclusions**

On the effects of participatory budgeting on budget performance, the study concludes that there is a significant positive effect of participatory budgeting on budget performance. The researcher further concludes that most people participate in budget making process in Siaya County, and participation has been for 2 years and above. The county government publishes and publicizes various budget documents within specified time to enable citizens meaningful input and engagement, and Ward level is the smallest unit/level in which the county government conducted public participation.

Moreover, the County Executive facilitates public consultations at different stages of the budget cycle, and conducts public participation often when there is an issue to be discussed. The county assembly has a budget and appropriations committee, and the BAC convenes public forums for discussion of the county executive's proposed policy documents and budgets. Somehow, the county government maps all the stakeholders and has a database with the names of the stakeholder group, establishes the sector where stakeholders represents, their perceived role and legal identity, and through respective departments has a list of office-bearers and contact details of all stakeholders and their locations.

On the effect of budgetary forecasting techniques on budget performance, the study concludes that there is a significant positive effect of budgetary forecasting techniques on budget performance. It further concludes that the county government has not put in place the County Budget and Economic Forum (CBEF) as per the requirements of section 137 of the PFM Act 2012, however, it has put in place the various sector working groups. There is a defined criterion or basis for distribution of resources by the county government. The government do not stick to the ceilings set in the CFSP and provides a report on the performance of previous budgets (both on revenue and expenditure). Therefore, there are justifications/explanations for the ceilings set and deviations, and the county government has always projected a balanced budget.

The government provides a projection on how much it intends to collect/raise from its local sources and how much it projects to receive from the national government which is realistic/reasonable. The county government always projects and reveals to the public and all stakeholders the amount of revenue it projects to collect and expend. The MTEF Framework-the county government provides projections for the three coming financial years using the current year as the baseline and the 2 outer years. Somehow, the ceilings set by the government are always realistic and based on the past year performance and the goals set out in the development plans. The county government somehow has a comprehensive revenue manual which describes all revenue sources, the legislative authority for each source, the uses and funding for each sources of revenue stream and the historical revenue data which informs future projection and conventional approaches is the most used.

On the effect of ICT use on budget performance the study concludes that there is a significant positive effect of use of technology on budget performance. Additionally, it concludes that the county government employs

the use of ICT (IFMIS) during budget preparation and implementation across all the sectors. Use of IFMIS has been partially adopted by the county government. Somehow, requisition of funds through IFMIS is efficient and effective, and uploading budget on the IFMIS platform done in time to enable its implementation, however, there are usually system challenges that cause delay in budget implementation. Lastly, of the three budgetary practices, participatory budgeting is the most predictor of budget performance. As a result, it is concluded that participatory budgeting is a key element of budget practice, followed by forecasting practices and lastly use of technology which highly and significantly affects budget performance. This means participatory budgeting, adequate forecasting techniques and use of technology should be highly secured by the county government in order to gain high budget performance.

## References

- Abdullah, N. (2008). Budget: Planning, Control and Organizational Performance among Public-Listed Companies in Malaysia. Malaysia: Axzo Press on Budgeting.*
- Abdullah, N. N (2016). Impacts of public participation on public budgeting process in Kurdistan. PHD Thesis, Sintok: Universiti Utara Malaysia.*
- Abongo, S. (2017). The effect of Budgeting process on the financial performance of top 100 small and medium firms. Kenya: UoN.*
- Alade, M. E Abiodun, E. Igbekoyi, O. E. (2016). Assessment of the Impact of ICT on budget processing in MDAs of Ondo state- Nigeria." IOSR journal of humanities and social sciences Volume19, no. 12.*
- Ayorekire, M. (2018). Budgeting and budgetary control in Non Governmental Organizations- Case of Infectious Diseases Research Collaboration ( IDRC). Masters Thesis, Kampala- Uganda: Makerere University.*
- Drake, P. P.: Fabozzi, J.F. (2010). The basics of Finance." An Introduction to Financial markets, Business finance and Portfolio management. (Joh Wiley and Sons Inc.: Hoboken).*
- Gachithi, E. W. (2010). The challenges of budget implementation in public institutions. A case study of University of Nairobi." Unpublished MBA project (University of Nairobi).*
- Musyoka, M. M. (2017). Factors affecting the effective management of budgets in selected county governments in Kenya.*
- Gacheru, N. A. (2012). The effect of the budgeting process on budget variance in Non-governmental organizations in Kenya." (University of Nairobi).*
- Schick, A. (1999). A contemporary approach to public expenditure management. (World bank Institute).*
- Suberu, S. B. (2010). Budgeting Strategies in selected federal polytechnic libraries in Nigeria." Samaru Journal of information Studies 10.*
- The National Treasury. (2016). The strategy for public financial management reforms in Kenya 2013-2018. Nairobi-Kenya: Kenya..*
- Wacera, D. M. (2016). Effect of citizen participation on budget implementation in Kenya Counties: A case study of Nyandarua County. MBA-Project, University of Nairobi.*