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# COORDINATION MECHANISMS AND IMPLEMENTATION OF PUBLIC PRIVATE PARTNERSHIP IN PUBLIC HEALTH SECTOR: A CASE STUDY OF ISIOLO SUB COUNTY

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#### Abstract

The public health sector has overtime been unable to effectively provide the badly needed health care to the public on its own owing to lack of resources and management challenges. The promise of universal coverage of health services financed through tax revenue has proved untenable in the face of increase in demand for quality health services and other competing demand for the same revenue. The need for properly structured and executed public private partnership has become a necessity. There has been growing concern that despite much presence and effort by public and private health actors over the years, nationally and in Isiolo Sub County, a number of health indicators are either on downward trend or have stagnated. The unacceptably high maternal mortality rate of 448/100,000 live births nationally (KDHS 2008), Isiolo county having the 5<sup>th</sup> highest maternal mortality in the country at 790/100,000 live births is a case in point. This has put to question how public private partnership in health sector has been conceived, structured, regulated and coordinated. This research therefore sought to establish how coordination mechanisms influence success of public private partnership in health sector in Isiolo Sub County, of Isiolo County. This will be a cross sectional study that involves a census of all health NGOs and health facilities operating in Isiolo Sub County. Health workers in all the twenty one (21) health facilities and workers of nine (9)

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Nongovernmental organizations supporting health services were the subject of the study. A structured questionnaire will be used to gather data. The questionnaires generated quantitative data, which was analyzed using descriptive and inferential statistics with the help of statistical software known as Statistical Package for Social Sciences (SPSS) version 25 statistical software. Descriptive statistics comprised of frequency distribution, percentages, standard deviation and mean. Inferential data analysis was carried out using Pearson correlation coefficient and multivariate linear regression. The results indicated that coordination mechanisms has a positive and significant effect on implementation of public private partnership in the health sector in Isiolo Sub-County ( $\beta_2$ =0.240, p-value=0.002). The study concluded that an improvement in coordination mechanisms would lead to an implementation of public private partnership in the health sector. The study also recommends that the government of Kenya should organize workshops and training sessions specifically designed to educate stakeholders on partnership agreements. Further, the management of health sector in Kenya should foster a participatory approach by engaging key stakeholders from the public and private sectors, civil society organizations, and local communities.

Key Words: Coordination Mechanisms, Public Private Partnership, Health Sector

# Introduction

Discussion of Public-Private Partnerships in the Health Sector is crucial and overdue considering the difficulties the public sector is having with healthcare financing, management, and delivery of health services (Almarri & Abuhijleh, 2017). Many governments are faced by financial limitations that force them to carefully select and limit public expenditures. Numerous public health systems are already in debt and are under further financial strain due to factors like the need to provide care for an aging population, enhance the standard of care, or make investments in frequently expensive medical treatments and technological advancements (Visconti, 2019). Public private partnership has been adopted in health sector in different parts of the world. For instance, the UK has a long history of engaging private sector in healthcare delivery and service provision (Adamou, Kyriakidou & Connolly, 2021). In the 1990s, the Private Finance Initiative (PFI) was introduced to allow private sector companies to finance and build healthcare infrastructure like hospitals and medical facilities, in partnership with the National Health Service (NHS). Under PFI, private companies are in charge of planning, building, financing, and maintaining the infrastructure over long-term period (Mallat, Vrontis & Thrassou, 2021).

In addition, Colombia has implemented health concessions, which involve private sector assuming responsibility for construction, operation, and management of healthcare facilities and services (Carballo-Cruz, 2017). Similarly, the Italian government has outsourced some healthcare services to private providers to alleviate capacity constraints and reduce waiting times (Pratici & Singer, 2021). In the United States, public health agencies collaborate with private organizations, including nonprofit entities and businesses, to implement public health programs (Akomea-Frimpong, 2022). The Nigerian government has encouraged partnerships between public and private healthcare providers to enhance service delivery (Okwilagwe, 2017). As indicated by Kavishe, Jefferson and Chileshe (2018), the country has developed and implemented a Public-Private Partnership Policy and associated guidelines that provide the overarching framework for PPPs across sectors, including the health sector. These policy documents guide the establishment, implementation, and management of PPPs in Tanzania.

In Kenya, the government is working to enhance the delivery of high-quality healthcare services and to secure the sector's long-term financial viability, as part of this effort, the public and private sectors are being encouraged to work together more closely in the health sector (HENNET, 2010). Isiolo County has got its fair share of public

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private partners supporting various aspects of health services including clinical care, nutritional interventions, capacity building, procurement of medical supplies and equipment and disease prevention. However, there is little to show for the years of presence of health partners in the county in terms of improvement in health status of the people. Key health indicators have suffered the brunt of underperformance in health sector characterized by marginal gains, decline or stagnation in critical areas (World Vision, 2009).

#### **Problem Statement**

Kenya health policy, 2012-2030 recognizes the place of public private partnership as important policy option towards improving health service delivery (MOH, 2012). Over the years, various initiatives have been ongoing at national and sub national level towards public private partnership in health care. However, despite effort by government and private sector to enhance financing, quality and coverage services for health, performance of health sector indicators in many areas has performed below target putting to question the ability of sector players in achieving set health sector targets (HENNET, 2010). The above is reflected in sub optimally performing indicators including the country's non-impressive progress towards achieving Millennium development goals relating to Health. The difficulty of coordinating all the participants, especially the commercial sector, for a bigger impact is noted as a problem (HENNET, 2010).

The figure below demonstrates health sector performance over the years. Even though, there has been a significant improvement in these health indicators in the last two decades, under-five mortality rate, infant mortality rate and neonatal mortality rate still high at 41/100,000 live births, 32//100,000 live births and 21/100,000 live births, respectively.

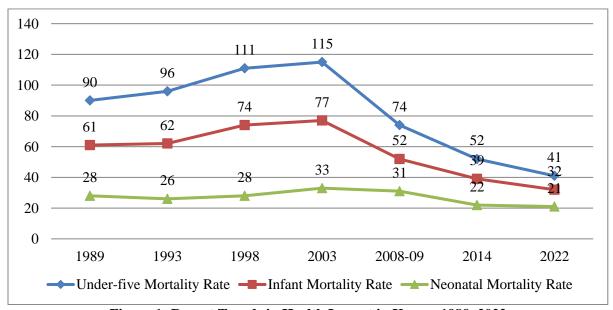


Figure 1: Recent Trends in Health Impact in Kenya, 1989–2022

Source: Kenya National Bureau of Statistics (2022)

Lack of a comprehensive plan to bring together all stakeholders in the health system notably the private sector for better health outcomes has been decried as a major undoing of PPP. Public Private Partnership is seen not to be well conceived, planned, organized and executed for optimal benefit of all (HENNET, 2010). According to report by Health NGOs Network (HENNET), coordination of public private sector players for effective health system

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performance has been weak. Public and private providers often work at cross purposes, at times behaving like they are in competition, as if working towards different objectives. Many NGOs have raised funds to support health sector in many areas. They often come up with their own perceived priorities arrived at without due consultation. There are instances where they fail to disclose their resources envelop. Duplication of activities is a common occurrence. The apparent inadequacies in partnership structures and coordination have a potential to compromise the end result of such collaboration (HENNET, 2010).

In Isiolo County, despite years of embracing public private partnership and a host of Non-governmental organizations supporting public sector initiatives in health, health service delivery has remained sub optimal with most indicators either on downward trend or stagnating. NGOs often set off with self-defined mandates than identifying local needs through participatory assessment. Coordination of the partnership is passive. Overall, there is little to show for the investment in terms of improvement in societal health (World Vision, 2009). To corroborate the above statement, health infrastructure is generally rudimentary across Isiolo County, so is service delivery. Of the 46 health facilities in the county, only 1 health facility (2%) has an operational operating theatre. With only 9 health facilities having some form of maternity unit, access to maternal health (skilled deliveries) is low at 40%, the bulk from urban areas (SARAM, 2012).

The situation is aggravated by unacceptably poor referral system. There is only one ambulance on the road, the rest having broken down. Most are old and rustic, with the rough road taking toll on them. Care continuum is therefore nonexistent (SARAM, 2012 & ICDH, 2013). The recent survey report released by Ministry of Devolution and Planning paints a more grim picture of the county placing Isiolo as the 5<sup>th</sup> unsafe County in the country to bear a child in (Pregnancy is more like a death sentence) with maternal mortality ratio of 790/100,000 live births, which is higher than the national rate of 350/100,000 live births (Kenya National Bureau of Statistics, 2022). This study therefore sought to establish the influence of coordination mechanisms on the success of public private partnership in health sector in Isiolo Sub County. Isiolo sub county was chosen because, it is central to county being it's headquarter, it is where PPP in health has taken root for it hosts the bulk of Public Private Partners. Actually the bulk of NGOs use Isiolo Sub County as its operation base. No study has been conducted in Isiolo Sub County on the subject area.

#### **Literature Review**

# **Public-private partnerships**

Successful0implementation of0public-private0partnerships (PPPs) involves0assessing extent to which partnership has achieved its goals, delivered desired outcomes, and provided value for all stakeholders involved (Karpitskaya, 2019). Some measures commonly used to evaluate the successful implementation of PPPs include achievement of objectives, financial viability, value for money, stakeholder satisfaction and enhanced service quality. Assessing whether the PPP has met its intended objectives is a fundamental measure of success. This involves evaluating whether the partnership has effectively addressed the identified problem or need, improved service delivery, enhanced infrastructure, increased access to services, or achieved other desired outcomes (Almarri & Abuhijleh, 2017).

Evaluating the financial viability of the PPP is important to determine if the project is economically sustainable. This includes assessing the ability to secure financing, generate revenues, and ensure long-term financial stability (Agyenim-Boateng, 2017). Key measures may include cost recovery, return on investment, and the ability to attract private investment. Assessing the value for money is crucial in determining the success of a PPP. This involves evaluating whether the partnership has provided efficient and cost-effective services or infrastructure in relation to

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the quality and quantity of output (Visconti, 2019). Measures can include cost savings, cost-effectiveness analysis, and comparisons with alternative delivery models.

The evaluation of stakeholder satisfaction is essential for measuring the success of a PPP. This includes assessing the satisfaction levels of service users, communities, private partners, government entities, and other stakeholders (Yaya, 2017). Surveys, feedback mechanisms, and qualitative assessments can be used to gauge stakeholder perceptions of the partnership's effectiveness and performance. Assessing whether PPP has increased the quality of services is a critical measure of success (Adamou, Kyriakidou & Connolly, 2021). This can involve evaluating indicators such as improved access, reduced waiting times, increased service responsiveness, enhanced customer experience, and adherence to quality standards.

# **Coordination Mechanisms of Public Private Partnership**

Coordination mechanisms in Public-PrivateOPartnerships (PPPs) involve structures, processes, and strategies put in place to facilitate effective collaboration and coordination between public and private sectors (Mallat, Vrontis & Thrassou, 2021). These mechanisms are designed to ensure that the partners work together harmoniously, share responsibilities, align their objectives, and achieve the desired outcomes of the partnership. According to Adamou, Kyriakidou and Connolly (2021), coordination mechanisms help overcome challenges related to differing priorities, organizational cultures, and decision-making processes between the public and private sectors. They serve as frameworks for effective communication, cooperation, and decision-making throughout the lifecycle of the partnership. Coordination mechanisms in PPPs in the health sector can encompass various elements, including partnership agreement, stakeholder's coordination forum, stakeholder meetings, information sharing, joint planning and performance management.

A partnership agreement in public-private partnerships (PPPs) is a binding legal document that outlines terms, conditions, and responsibilities of public and private partners involved in the collaboration (Gerstlberger & Schneider, 2018). This agreement serves as the foundation for the partnership and provides a framework for effective cooperation and coordination throughout the lifecycle of the project. The agreement begins by clearly defining the objectives, purpose, and scope of the partnership. Sinisammal and Hyrkäs (2018) indicate that the partnership agreement delineates the roles, responsibilities, and obligations of each partner. Wang and Sankaran (2022) observed that stakeholder meetings play a vital function in public-private partnerships (PPPs) by providing a platform for engagement, communication, and collaboration among the various stakeholders involved in the partnership. Stakeholder meetings in PPPs should have a clear purpose and specific objectives (Pratici & Singer, 2021). This could include sharing project updates, discussing policy decisions, seeking stakeholder Sharing information is essential for transparency and accountability in healthcare PPPs.

Joint planning in PPPs involves engaging stakeholders from public, private and other relevant sectors like civil society organizations, community representatives, and service users (Osei-Kyei, Tam & Ma, 2021). Stakeholders are actively involved in process of planning, allowing their perspectives, needs, and expertise to shape partnership's goals, strategies, and implementation plans. Engaging stakeholders fosters ownership, enhances the quality of decision-making, and ensures that partnership aligns with diverse interests and aspirations of stakeholders (Osei-Kyei & Chan, 2018). Performance management in public-private partnerships (PPPs) involves a systematic approach to measuring, monitoring, and improving the performance of the partnership to ensure the achievement of desired outcomes (Osei-Kyei & Chan, 2018). It encompasses the processes, tools, and strategies used to track performance, identify areas for improvement, and take corrective actions. Performance management begins with defining clear performance indicators and targets that align with the objectives of the partnership. These indicators

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can include measures related to service quality, financial performance, efficiency, effectiveness, stakeholder satisfaction, and other relevant aspects (Kusio, 2021).

#### **Theoretical Framework**

This investigation was anchored on hypothesis of Public Private Partnership developed by Hodge and Greve (2005). The theory of Public-Private Partnership (PPP) encompasses a set of principles, concepts, and frameworks that guide collaboration among public and private sectors to obtain mutually beneficial outcomes in delivering public services or infrastructure projects (Hoxha, 2020). The theory recognizes that both sectors bring unique strengths and capabilities to the table, and by leveraging their respective expertise, resources, and incentives, more efficient and effective outcomes can be achieved (Ferk & Ferk, 2019).

Coordination mechanisms can impact the management and allocation of risks in PPPs. A well-defined policy framework and robust coordination mechanisms can enable a fair distribution of risks between public and private industry, ensuring that risks are allocated to party well equipped to control them (Mourgues & Kingombe, 2019). In addition, coordination mechanisms play a crucial role in promoting value for money in healthcare PPPs (Dolla & Laishram, 2020). Additionally, effective coordination mechanisms among relevant stakeholders can facilitate the selection of projects with the best value for public investment and promote efficiency and cost savings in the implementation of PPPs.

# **Conceptual Framework**

The conceptual framework which is shown in Figure 2.1 indicates relationship0between dependent0and independent0study variables. Dependent variable was implementation of public private partnership and independent variable was coordination mechanisms of PPP in health sector.

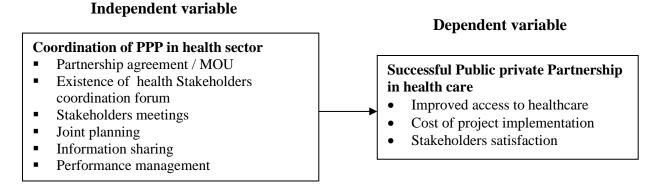


Figure 1: Conceptual Framework

# **Research Methodology**

This was a descriptive0cross0sectional0research design to determine factors influencing success of public0private0partnership0in health sector in Isiolo Sub County. The target population for this research was 30 health facility workers and staff of Non-governmental organizations supporting health service delivery in Isiolo Sub County.

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Table 1.	ircattii laciiities and 1400s iii isloi	o bub County	
Partner in PPP**	Details/Ownership	Number	
Health facilities	Public	11	
	FBOs	4	
	Private	6	
Health partners (NGOs)		9	
• • • • • • • • • • • • • • • • • • • •	Total	30	

Table 1: Health facilities and NGOs in Isiolo Sub County

The research0used a census0approach0and hence included all the 30 health facility staff and staff of Non-governmental organizations supporting health service delivery in Isiolo Sub County. A census approach provides a complete and accurate picture of the entire population of interest. By including every individual or unit, it eliminates sampling errors and ensures that data represents the entire population (Mukherjee, 2020). This comprehensive data allows for accurate analysis and decision-making based on a complete information set.

Structured questionnaires were used in the collection of primary data. The tool was administered by trained enumerators on the respondents who include health facility staff and staff of Non-governmental organizations supporting health service delivery in Isiolo Sub County. A pilot test was conducted to assess the validity and reliability of the research instrument. Face validity of the research tool was enhanced by conducting a pilot test and modifying any vague or unclear questions. Content validity was enhanced by obtaining feedback from authorities in the subject of research, such as the supervisors. The reliability of the research instrument was measured using the Cronbach's Oalpha Ocoefficient. A Cronbach's alpha ( $\alpha$ ) of greater Othan 0.7 was regarded Oacceptable in this research. The questionnaires generated quantitative data, which was analyzed using descriptive and inferential statistics with the aid of statistical software referred to as Statistical OPackage Ofor Social Sciences (SPSS) version 25 statistical software. Descriptive statistics consisted of percentages, frequency distribution, standard deviation and mean. Inferential statistics included Pearson correlation coefficient and multivariate linear regression. The regression model was as follows;

$$Y = \beta_0 + \beta_1 X_1 + \varepsilon$$

Whereby;  $Y = \text{Implementation of public private partnership in the health sector; } B_0 = \text{Constant; } \beta_1 = \text{Coefficients0of0determination; } X_1 = \text{Coordination mechanisms; and } \epsilon = \text{Error term}$ 

#### **Results and Discussion**

This research targeted 30 health facility staff and staff of Non-governmental organizations supporting health service delivery in Isiolo Sub County. Out of 30 questionnaires that the researcher distributed, all of them were dully filled therefore giving a 100% rate of response. Babbie (2017) contends that a response rate of 75% is sufficient for data processing, making conclusion, and providing recommendation. This indicates that a response rate of 100% was sufficient for analyzing the data, making recommendations, and drawing conclusions.

**Table 2: Questionnaires' Response Rate** 

Partner category	Number	Percentage	
Public health facility	11	37%	
Private health facility	6	20%	
FBO Health facility	4	13%	
NGO	9	30%	
Total	30	100%	

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# **Demographic Characteristics of the Respondents**

From the findings, 63.33% of the participants stated that they were male while 36.67% stated that they were female. This indicates that majority of the participants in this research were male. In terms of age bracket, 53.33% of the participants stated that they were aged between 31 and 40 years, 33.33% stated that they were aged between 41 and 50 years, while 6.67% stated that they were aged between 20 and 30 years and the same percent indicated above 51 years. This implies that most participants in this research were aged between 31 and 49 years. In regard to positions, in their organizations, 53.33% of the respondents indicated that they were hospital administrations, 30.00% indicated that they were program coordinators and 16.67% indicated that they were Chief Executive officers.

**Table 3: Demographic Characteristics of the Respondents** 

Category	Frequency	Percent
Sex		
Male	19	63.33
Female	11	36.67
Total	30	100.00
Age Bracket		
20 to 30 years	2	6.67
31 to 40 years	16	53.33
41 to 50 years	10	33.33
Above 51 years	2	6.67
Total	30	100.00
Position in the Organization		
Hospital Administrations	16	53.33
Chief Executive officers	5	16.67
Program coordinators	9	30.00
Total	30	100.00

#### **Descriptive Statistics**

Descriptive statistics is a branch of statistics that involves the summarization, organization, and presentation of data in order to gain insights and describe the key characteristics of a dataset. It offers a way to understand and analyze data in a meaningful and concise manner. This section covers descriptive statistics on implementation of publicOprivateOpartnership, existence of policy on PPP in health sector and coordination mechanisms of PPP in health sector.

# Implementation of Public Private Partnership in the Health Sector

The dependent variable of this research was implementation0of public0private0partnership in health sector in Isiolo sub-county. The participants were requested to state their level of concurrence with different statements on the implementation0of public0private0partnership in Isiolo County. The findings were as displayed in Table 4. From the outcomes, participants agreed with a mean of 3.882 (SD=0.440) that collaboration between public and private sectors in this PPP has been effective in achieving the desired outcomes. These findings agree with Karpitskaya (2019) observation that successful implementation of public-private partnerships (PPPs) involves assessing extent to which partnership has achieved its goals, delivered desired outcomes, and provided value for all stakeholders involved. The participants also agreed with the mean0of 3.809 (SD=1.007) that PPP has demonstrated efficiency in its operations.

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With0a0mean of 3.779 (SD=0.987) the participants agreed that partnership has successfully improved service delivery and access to services. However, participants disagreed with a statement indicating that PPP has demonstrated cost-effectiveness in its operations as shown by a mean of 2.088 (SD=0.638). These outcomes are in line with Visconti (2019) observation that successful implementation of PPPs should involve efficient and cost-effective services or infrastructure in relation to the quality and quantity of output. They also disagreed with the statement indicating that the partnership has effectively utilized and allocated resources to maximize value for money as shown by a mean of 2.074 (SD=0.628). The outcomes are contrary to Agyenim-Boateng (2017) observation that assessing the value for money is crucial in determining the success of a PPP.

Table 5: Measures of implementation of public private partnership in the Health sector

Statements	N	Mean	Std.
			Deviation
The collaboration between public and private sectors in this PPP has been	30	3.882	0.440
effective in achieving the desired outcomes.			
The partnership has successfully improved service delivery and access to	30	3.779	0.987
services.			
The PPP has demonstrated cost-effectiveness in its operations.	30	2.088	0.638
The PPP has demonstrated efficiency in its operations.	30	3.809	1.007
The partnership has effectively utilized and allocated resources to maximize	30	2.074	0.628
value for money.			

### **Coordination Mechanisms of Public Private Partnership**

The research sought to determine coordination mechanism for Public Private Partnership in health sector in Isiolo Sub County.

#### Existence of partnership agreement

The participants were requested to state whether there was a partnership agreement or Memorandum of Understanding between collaborating parties. The outcomes were as shown in Figure 4.5. From the results majority of respondents at 76% (19 Organizations) reported lack of partnership agreement, commonly referred to as memorandum of understanding between parties in partnership. Only 24% representing six (6) respondents reported existence of such agreement.

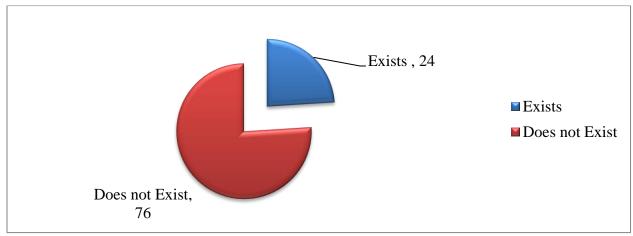


Figure 2: Existence of partnership agreement

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# **Components of a Partnership Agreement**

The participants were requested to state whether the partnership agreement clearly spelt out various components. The outcomes were as shown in Table 6. From the results, all participants (100%) stated that partnership agreement clearly spelt out coordination mechanisms and roles & responsibilities of each party.

<u>=</u>	<b>-</b> 0	
Components	Frequency	Percent
Roles & responsibilities of each party	6	100.00
Resource basket of each party	5	83.33
Benefits to all parties	4	66.67
Coordination mechanism	6	100.00
Terms of engagement	5	83.33

# Existence of stakeholders/partners coordination forum

The participants were requested to state whether they were aware of stakeholders/partners coordination forum in existence. The results indicated that while a large proportion of partners, 78% indicated existence of partnership coordination forum, a sizeable proportion of 21% were not aware of this arrangement. Sinisammal and Hyrkäs (2018) observed stakeholder's coordination forum is important so as to facilitate effective coordination, communication, and collaboration among various stakeholders.

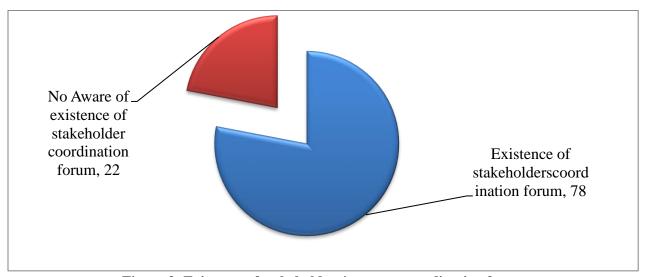


Figure 3: Existence of stakeholders/partners coordination forum

# **Components of Coordination Mechanisms**

The participants were asked to state their level of concurrence with different statements on coordination mechanisms on PPPs in health sector in Isiolo County. Outcomes were as presented in Table 7. From outcomes, respondents agreed with a mean of 3.941 (SD=0.859) that joint planning process in health sector PPP effectively aligns goals and objectives of public and private partners. The respondents also agreed with a mean of 3.882 (SD=0.440) that partnership agreement effectively addresses allocation of risks and liabilities between public and private partners in the health sector PPP. With a mean of 3.809 (SD=1.007) participants agreed that stakeholders meetings are scheduled in a timely manner, allowing sufficient time for preparation and active participation. As shown by a mean

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of 3.779 (SD=0.987) participants agreed that health stakeholders' coordination forum provides a valuable platform for communication and collaboration among stakeholders involved in the health sector PPP. Additionally, the participants agreed with a mean of 3.750 (SD=1.052) that partnership agreement clearly outlines roles and responsibilities of every partner involved in health sector PPP. Further, respondents agreed with a mean of 3.750 (SD=0.653) that information sharing among stakeholders in the health sector PPP is timely and accurate. With a mean of 3.735 (SD=0.702) participants agreed that the agenda for stakeholders meetings adequately covers the relevant topics and issues related to the health sector PPP. Also, the respondents agreed with a mean of 3.735 (SD=0.762) that performance management framework in the health sector PPP effectively measures and evaluates the achievement of desired outcomes and targets. Moreover, participants agreed with a mean of 3.721 (SD=1.298) that coordination mechanisms in place facilitate effective communication and collaboration between public and private partners in the health sector PPP.

**Table 7: Components of Coordination Mechanisms** 

	N	Mean	Std. Deviation
The coordination mechanisms in place facilitate effective communication and collaboration between public and private partners in the health sector PPP.	30	3.721	1.298
The partnership agreement clearly outlines the roles and responsibilities of each partner involved in the health sector PPP.	30	3.750	1.052
The partnership agreement effectively addresses the allocation of risks and liabilities between the public and private partners in the health sector PPP.	30	3.882	0.440
The health stakeholders' coordination forum provides a valuable platform for communication and collaboration among stakeholders involved in the health sector PPP.	30	3.779	0.987
Stakeholders meetings are scheduled in a timely manner, allowing sufficient time for preparation and active participation.	30	3.809	1.007
The agenda for stakeholders meetings adequately covers the relevant topics and issues related to the health sector PPP.	30	3.735	0.702
The joint planning process in the health sector PPP effectively aligns the goals and objectives of the public and private partners.	30	3.941	0.859
Information sharing among stakeholders in the health sector PPP is timely and accurate.	30	3.750	0.653
Performance management framework in the health sector PPP effectively measures and evaluates the achievement of desired outcomes and targets.	30	3.735	0.762

#### **Inferential statistics**

Inferential statistics like multivariate regression and correlation analysis were employed to assess effect of existing policy framework and coordination mechanism on implementation of public private partnership in the health sector in Isiolo Sub-County.

#### **Correlation Analysis**

Pearson product moment correlation coefficient was utilized to evaluate0strength of correlation between independent research variables (existing policy framework and coordination mechanisms) and dependent0variable (implementation0of public private partnership in health sector). Findings were displayed in Table 8. The research discovered that there exists a positive correlation between coordination mechanisms and implementation of public0private0partnership in the health sector in Isiolo Sub-County (r=0.809, p-value =0.000). Moreover, the p-value of 0.000 was0below0significant0level of 0.05, indicating that correlation was significant. The results are in

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agreement with Okwilagwe (2017) findings that coordination mechanisms have an influence0on0implementation0of public private partnership projects.

**Table 8: Correlation Coefficients** 

		Implementation partnership in the	of public private health sector	Coordination mechanism
Implementation of public private	Pearson	1		
partnership in the health sector	Correlation			
	Sig.(2-tailed)			
	N	30		
Coordination mechanism	Pearson	.809**		1
	Correlation			
	Sig.(2-tailed)	.000		
	N	30		30

# **Regression Analysis**

Regression0analysis was utilized to assess the effect of coordination mechanisms on the implementation of public private partnership in the health sector. The r-squared (R²) is a statistical0measure that0represents the0proportion0of0variance in dependent0variable that can be explained by independent0variables in a regression0model. The r-squared in this research was 0.317, which implies that 31.7% of variation in implementation of public private0partnership in health0sector could be explained by existing policy framework and coordination mechanisms.

**Table 9: Model Summary** 

Model	R	R-Square	Adjusted R-Square	Std. Error of Estimate
1	.563ª	0.317	0.314	0.14835

ANOVA can also be applied to assess the overall significance of a regression model. F-calculated was 307.684 while F-critical0from the F-distribution0Table was 2.46. Because F-calculated was above F-critical0and0p-value of 0.000 was not more than00.05, model0used was deemed to be good0fit for research data.

Table 10: ANOVA

Model		Sum o Squares	of df	Mean-Square	F	Sig.
	Regression	31.684	1	31.684	307.718	$.000^{b}$
1	Residual	2.883	28	0.103		
	Total	34.567	29			

Regression equation was;

 $Y = 0.467 + 0.240X_1 + \varepsilon$ 

The researcher found that coordination mechanisms has a positive and significant effect on implementation of public private partnership in the health sector in Isiolo Sub-County ( $\beta_2$ =0.240, p-value=0.002). Moreover, p-value (0.002) was below 0.05, hence relationship was regarded to be significant. The outcomes concur with Sinisammal and

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Hyrkäs (2018) observation that coordination mechanisms play a significant role in the implementation of PPP projects.

**Table 11: Regression Coefficients** 

Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.
		В	Std. Error	Beta		
1	(Constant)	0.467	0.103		4.534	0.000
	Coordination mechanisms	0.240	0.087	0.211	2.759	0.002

#### **Conclusions**

The study concludes that coordination mechanisms have a positive and significant impact on implementation of public private partnership in health sector in Isiolo Sub-County. This suggests that an improvement in coordination mechanisms would lead to an improvement on implementation of public private partnership in health sector in Isiolo Sub-County. Therefore, development of partnership agreement / MOU, existence of health stakeholders coordination forums, stakeholders meeting, joint planning, information sharing and performance management contribute to smoother implementation of PPPs.

#### Recommendations

The government of Kenya should organize workshops and training sessions specifically designed to educate stakeholders on partnership agreements. Invite representatives from government agencies, private sector organizations, civil society groups, and community members to participate. These sessions can provide a platform for interactive discussions, clarifications, and sharing of best practices.

The management of health sector in Kenya should foster a participatory approach by engaging main stakeholders0from public0and0private0sectors, civil0society0organizations, and local communities. Actively involve them in the joint planning process to ensure diverse perspectives, local knowledge, and buy-in from all relevant parties. They should create dedicated platforms or forums for stakeholders to come together and engage in joint planning activities. These platforms can include regular meetings, workshops, and working groups where stakeholders can share information, exchange ideas, and collectively develop strategies and action plans.

The ministry of health should also establish a robust M&E framework that clearly defines the objectives, outcomes, indicators, and targets for the partnership. The framework should be aligned with the overall goals of the PPP and provide a systematic approach to measure progress and impact.

# **Suggestions for Further Research**

This research sought to examine the influence of coordination mechanisms on success of public private partnership in health sector in Isiolo Sub County. Having been limited to Isiolo Sub County, the outcomes of this research can never be generalized to other Sub-Counties in Kenya due to differences in health services accessibility, population density and number of facilities among other factors. In addition, the study found that coordination mechanisms could explain 31.7% of implementation of public private partnership in health sector. The research therefore recommends further investigations on other factors0that influence0implementation of public0private0partnership in health0sector. These factors could include factors that institutional capacity, political will and leadership and socio-cultural context among others.

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