

Public Policy and Public Health Management System in Amuwo-Odofin Primary Health Care, Festac, Lagos, Nigeria

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ABSTRACT

This study examined the effects of public policy on the public health management system at Amuwo-Odofin Primary Health Care, Festac, Lagos State, Nigeria. A pragmatist research paradigm and stratified random sampling were adopted to select 350 employees. Data were collected using a structured questionnaire and analyzed using descriptive statistics, chi-square tests, Pearson product-moment correlation coefficients, and regression analysis with Statistical Package for Social Sciences (SPSS, Version 25.0). Findings indicated that public health policies promote equitable access to healthcare services across socioeconomic groups and support regular vaccination and immunization services in public primary healthcare centers. The study also found that health facilities provide drug abuse awareness and family planning information. Statistical results revealed significant relationships between health insurance policy and access to healthcare services ($r = .877, p < .001$), public health policy and vaccination services, and healthcare service policy and effective prenatal and antenatal care ($r = .786, p < .001$). The study concludes that public policy significantly enhances public health management and recommends increased government funding and continuous capacity building for health workers to improve service delivery.

Keywords: public policy, public health management, public health policy, health insurance policy, primary health care (PHC)

INTRODUCTION

Background of the Study

Globally, substantial progress has been made in improving life expectancy; however, health inequalities persist and, in some cases, have widened across both low- and high-income countries. Despite sustained global efforts to expand healthcare services, particularly for low-income populations, anticipated reductions in inequality have not been fully realized. Garcia-Prado (2019) observed that policymakers and healthcare professionals are increasingly emphasizing behavioral change, attitudes, and healthcare-seeking patterns, especially in maternal and public health services.

In Nigeria, Lagos State—the most populous state and the nation’s economic hub—continues to face significant challenges in providing adequate healthcare for its rapidly growing population. The healthcare system remains overstretched, resulting in the private healthcare sector emerging as a critical complement to public healthcare provision. The private sector plays a vital role in meeting increasing healthcare demand and addressing diverse health needs. Rapid urbanization, lifestyle changes, and the growing burden of non-communicable diseases further complicate the healthcare landscape (Ganju et al., 2020; Mba-Oduwusi et al., 2024).

The healthcare environment in Lagos State is complex and dynamic. Private healthcare providers, as major stakeholders in service delivery, are central to discussions surrounding healthcare quality, accessibility, and efficiency. This context underscores the need to examine government-led quality improvement initiatives aimed at strengthening private healthcare delivery (Mba-Oduwusi et al., 2024). Oleribe et al. (2022) noted that private healthcare providers significantly complement public-sector efforts and are essential to achieving universal health coverage. Given the substantial contribution of the private sector, understanding its engagement in quality improvement initiatives is critical for a comprehensive assessment of healthcare delivery in Lagos State.

In recognition of the importance of private healthcare providers, the Lagos State Government has implemented various healthcare interventions and quality improvement projects to enhance service standards, address systemic challenges, and create an enabling environment for healthcare delivery (Ogundeji et al., 2022). These collaborative efforts reflect a commitment to sustainable improvements in healthcare services across the state.

Despite these initiatives, healthcare delivery in Lagos State continues to face challenges, including inadequate funding, poor infrastructure, and shortages of healthcare professionals. Nevertheless, effective implementation of public health policies has the potential to significantly improve public health management at the primary healthcare level. Access to health insurance remains limited for many residents, necessitating increased public enlightenment, education, and orientation on family planning methods to reduce unwanted pregnancies and maternal mortality (Bolarinwa et al., 2018).

Primary healthcare centres play a crucial role in disseminating information on vaccination, immunization, drug abuse, and self-medication. They are also responsible for providing prenatal, antenatal, and postnatal services to ensure safe childbirth and maternal well-being. However, gaps in policy implementation persist.

Yaqub et al. (2019) argued that although public policies have been formulated to improve public health management, their implementation has not always yielded the desired outcomes. This situation necessitates a systematic investigation into the challenges affecting policy execution. Consequently, this study examines the effects of public policies on public health management at Amuwo-Odofin Primary Health Care, Festac, Lagos State, Nigeria.

Statement of the Problem

Access to quality healthcare remains a major challenge in Nigeria, affecting both citizens and government institutions. Fatile and Adesanya (2016) argued that the primary healthcare, like most facets of our life, collapsed long ago and the evidence is the preference for foreign medical attention by Nigeria's elite who can afford it. They do not have confidence in our medical personnel to handle even basic ailments, from toothache to headache, and more serious medical conditions. Gustafsson-Wright and Schellekens (2013) also reported that Nigeria has one of the highest levels of out-of-pocket healthcare expenditure globally, despite recording poor health indicators. The healthcare financing system is further constrained by corruption, inadequate public awareness, low donor funding, limited insurance coverage, insufficient medical supplies, and low enrollment, particularly among rural populations (Oлакunde, 2012).

In response, governments in many developing countries have adopted healthcare insurance schemes to provide affordable and subsidized healthcare services. Health insurance policies are intended to protect citizens from the financial burden of healthcare costs, while public health policies aim to promote effective healthcare management at the primary healthcare level. However, Nigeria's primary healthcare system has suffered prolonged neglect, as evidenced by the increasing reliance of the political and economic elite on foreign medical services (Eme et al., 2014).

Chukwunwike (2005) noted that many healthcare facilities at the primary, secondary, and tertiary levels in Nigeria are dilapidated or operating below optimal capacity. Marutha and Ngulube (2012) further observed that ineffective record-keeping and payment management systems contribute to long waiting times, poor patient data management, and inadequate service delivery.

Although previous studies have examined public policies and healthcare management, limited attention has been paid to public service delivery at the primary healthcare level in Lagos State. Moreover, the role of digital technologies-such as electronic health records, e-payment systems, and electronic diagnosis-remains underexplored within the Nigerian context. This study therefore seeks to address these gaps by examining the effects of public policies on public health management at Amuwo-Odofin Primary Health Care (PHC), Festac, Lagos State, Nigeria.

Research Objectives, Questions and Hypotheses

The main objective of this study is to examine the effects of public policies on public health management at Amuwo-Odofin Primary Health Care (PHC), Festac, Lagos State, Nigeria.

The specific objectives of the study are to:

1. Examine the relationship between health insurance policy and accessibility to healthcare services.
2. Investigate the influence of public health policy on vaccination and immunization services.
3. Assess the relationship between pharmaceutical policy and public enlightenment on drug abuse and self-medication.
4. Determine the effect of healthcare services policy on prenatal and antenatal care.
5. Examine the effect of personal health policy on the utilization of contraceptive methods for family planning.

On the basis of the above objectives, the following questions were asked:

1. Is there a relationship between health insurance policy and access to healthcare services?
2. To what extent does public health policy influence vaccination and immunization services?
3. Does pharmaceutical policy significantly affect public enlightenment on drug abuse and self-medication?
4. What is the effect of healthcare services policy on prenatal and antenatal care?
5. What is the effect of personal health policy on the utilization of contraceptive methods for family planning?

On the basis of the objectives and questions raised, the following hypotheses were tested:

- **H₀₁:** Health insurance policy has no significant relationship with access to healthcare services.
- **H₀₂:** Public health policy has no significant influence on vaccination and immunization services.
- **H₀₃:** Healthcare services policy has no significant effect on prenatal and antenatal care.
- **H₀₄:** Pharmaceutical policy has no significant relationship with public enlightenment on drug abuse and self-medication.

Conceptual Review

This section reviews relevant scholarly literature, including journal articles, books, conference papers, and government publications to establish the theoretical and empirical foundations of the study. The review focuses on the effects of public policies on public health management, with particular reference to Amuwo-Odofin Primary Health Care (PHC), Festac, Lagos, Nigeria. The literature is examined through conceptual, empirical, and theoretical perspectives.

Public policy is widely conceptualized as the interaction between government and its social environment, reflecting the ways in which public authorities respond to societal demands, pressures, and expectations. From this perspective, public policy emerges as a mechanism through which governments address public needs and manage relationships within society (Eyestone, 1971). This view emphasizes the responsive nature of policy-making and situates public policy within the broader context of state–society relations.

Public policy has also been described in broad and practical terms as the sum total of what governments choose to do or deliberately refrain from doing (Dye, 1995). This definition highlights that public policy encompasses both governmental action and inaction, including direct interventions by the state as well as indirect actions carried out through collaborative arrangements with academic institutions, private sector organizations, and non-governmental actors. In addition, scholars have stressed the intentional and goal-oriented character of public policy. According to Friedrich and Mason (2007), public policy represents a consciously formulated course of action designed to achieve specific objectives. From this standpoint, policies are not random or ad hoc decisions but carefully planned strategies aimed at addressing clearly identified societal problems.

Although these perspectives offer valuable insights, the concept of public policy has long been the subject of debate within political science and public administration. The lack of a single, universally accepted definition reflects the complexity and evolving nature of policy processes (Simeon, 1976; Howlett & Cashore, 2014). Nevertheless, there is general agreement that public policy refers to government plans of action or deliberate inaction directed at resolving societal problems through instruments such as laws, regulations, programs, and public funding. Overall, public policy can be understood as a coherent framework of decisions and actions that guide governmental responses to complex, interconnected, and often long-term challenges. Beyond addressing

specific issues, public policy also provides a basis for governmental accountability, with policy choices shaped by societal values and collective priorities rather than solely by technical or objective considerations.

Abdullah (2022) and Kickbusch (2003) traces the origins of healthy public policy to early social welfare initiatives, noting that its formal articulation emerged in the 1980s through the efforts of the World Health Organization. Public policy, in this context, serves as a guide to action, influencing resource allocation and signaling governmental priorities. The level and distribution of resources allocated to health reflect political commitment and policy emphasis.

Health policy represents a set of decisions, plans, and actions designed to achieve defined health goals within a society (Salma et al. 2023). As a component of public policy, health policy plays a critical role in ensuring sustainable healthcare financing through risk pooling and insurance mechanisms. These arrangements transfer financial risk from individuals to organized institutions, thereby enhancing financial protection and access to care.

A clearly articulated definition of health management is essential for establishing a shared professional identity, promoting consistency in practice, and guiding scholarly efforts aimed at strengthening managerial capacity within health systems (Linnander et al., 2017). Conceptual clarity also plays a critical role in shaping policy development, professional education, and the design of health systems that advance efficiency, sustainability, and equity (Valiotis, 2025).

Healthcare management is widely recognised as the provision of leadership, coordination, and strategic direction within healthcare organisations and their operational units (Walshe & Smith, 2011). The field is commonly anchored on three core principles-effectiveness, efficiency, and equity-which guide decision-making and performance evaluation (Arah et al., 2003; Davis et al., 2013). Healthcare managers typically perform interrelated functions such as planning, organising, staffing, directing, controlling, risk assessment, and decision-making, all of which are fundamental to organisational efficiency, financial sustainability, and quality of care (Thompson et al., 2016; Valiotis, 2025).

The existence of a well-defined concept of healthcare management has enabled diverse professionals-including medical directors, clinical managers, and health facility administrators-to align within a recognised professional domain. This shared identity has facilitated the growth of healthcare management as a distinct specialty, marked by expanding accredited training programmes and increased scholarly attention, with demonstrable improvements in health facility performance and service delivery (Burtis et al., 2021; Valiotis, 2025).

In contrast, public health practice, despite its broad scope and multidisciplinary participation, continues to face challenges related to professional identity and conceptual coherence (Fennell, 2021). Public health is conventionally defined as the science concerned with preventing disease, prolonging life, and promoting health through organised societal efforts (Detels et al., 2011). Its functional emphasis lies in coordinated actions that enhance community well-being and support healthy living. Consensus-building methods such as the Delphi technique have been widely endorsed for advancing public health research and development, particularly in multidisciplinary contexts (Jones & Hunter, 1995; Jünger, 2017).

Public health encompasses organized societal efforts to protect, promote, and restore population health. It integrates scientific knowledge, professional skills, and social values aimed at reducing disease prevalence, premature mortality, and disability through collective action. While public health strategies evolve with technological and social changes, their core objectives remain constant.

Public health management is inherently multidisciplinary, encompassing clinical professionals, epidemiologists, social and behavioural scientists, health promotion specialists, and health systems researchers (Berman, 1997). It provides a unifying framework for mobilising societal and institutional resources to improve population health through contextually appropriate interventions. Public health management therefore extends beyond needs assessment, health promotion, and disease prevention to include the stewardship of all publicly funded health resources, including acute care services, which are integral to secondary prevention.

Ultimately, effective public health management requires professionals who adopt population-based perspectives and function as agents of change. Such managers must possess the capacity to lead systemic change, coordinate

resources, and build cross-sectoral partnerships that address the broader determinants of health and sustain improvements in population health outcomes (Hunter, 1997; Hunter, 1998).

Joseph (2023) emphasizes that the Lagos State Government's public health insurance policy aims to provide accessible, affordable, and high-quality healthcare services through investments in healthcare infrastructure, workforce development, disease prevention, and health education.

According to Mba-Oduwusi (2024), effective implementation of public health policy in Lagos State is expected to deliver comprehensive health management services, including emergency response systems, strengthened referral mechanisms, technology integration, primary healthcare revitalization, disease prevention, workforce training, collaborative partnerships, and continuous monitoring and evaluation.

Empirical Review

Empirical evidence from Ephraim-Emmanuel et al. (2018) indicates that global gains in child survival have been largely driven by expanded access to immunization and improved primary healthcare services. Despite these advances, immunization utilization rates in many low- and middle-income countries have stagnated since 2010, raising concerns about sustainability and equity in service delivery.

Studies on drug abuse and self-medication further highlight public health challenges. Enamhe and Maxwell-Borjor (2021), supported by findings from Shehu and Rao (2020), reveal that drug abuse—particularly of prescription and over-the-counter medications—is prevalent among low-income and less-educated youth, with severe mental and physical health consequences. Johnson (2021) similarly reports widespread self-medication practices in Lagos, attributing the trend to aggressive drug promotion and declining confidence in public health institutions.

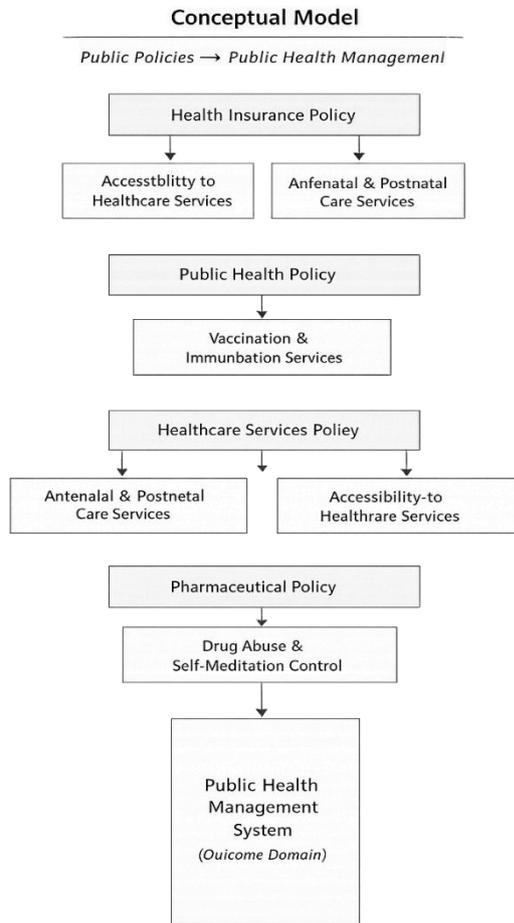
Maternal and child health outcomes are also closely linked to access to quality primary healthcare. Adebowale and Udjo (2016) demonstrate that access to formal healthcare during pregnancy increases the likelihood of skilled birth attendance, thereby improving maternal outcomes. Akinyemi et al. (2015) emphasize that inadequate training of healthcare workers undermines the effectiveness of antenatal and postnatal services, contributing to preventable infant mortality in Nigeria.

Family planning remains a critical component of public health management. Charles et al. (2018) establish that access to family planning information enhances reproductive health outcomes and supports sustainable population growth. Alrawi (2021) further identifies sociocultural and economic barriers to family planning utilization, underscoring the need for targeted health education, counseling, and male involvement in reproductive health decision-making.

Aregbeshola, Onigbogi, and Khan (2017) note that healthcare access is a critical public health challenge in developing countries, particularly affecting residents of urban slums in Nigeria. Their study examined healthcare accessibility in three Lagos State slums, exploring geographical, financial, and socio-cultural factors that influence the ability of residents to obtain needed services. In the same vein, empirical evidence from Onigbogi and Aregbeshola (2022) also identifies several challenges that hinder access to public healthcare services in Lagos State. These challenges include inadequate healthcare infrastructure, which results in overcrowded facilities and prolonged waiting times; shortages in the healthcare workforce, particularly doctors, nurses, and midwives; inequitable distribution of healthcare services favoring urban areas over rural and underserved communities; high healthcare costs that limit affordability; and insufficient emphasis on preventive healthcare services, leading to an increased burden of preventable diseases.

Conceptual Model

This study adopts a conceptual model that explains how the implementation of public policies influences public health management in primary healthcare centres in Lagos State.



Source: Developed by the Researcher (2024)

This conceptual model depicts the influence of selected public policies—Health Insurance, Public Health, Healthcare Services, and Pharmaceutical Policies—on multiple interconnected public health management indicators, including accessibility, maternal care, vaccination, and drug use control. Each policy may impact one or more outcome indicators, illustrating one-to-many effects, which collectively converge into the Public Health Management System. The vertical, single-column layout emphasizes clarity, methodological rigor, and suitability for empirical analysis.

Health insurance policy which is one of the indicators is a critical mechanism for achieving universal health coverage. Extant literature shows that insurance schemes reduce out-of-pocket expenditure, increase utilization of formal health services, and enhance equity in access to care. In Nigeria, the effectiveness of health insurance policies influences citizens’ ability to access preventive, curative, and maternal health services. Weak coverage, poor awareness, and limited implementation have been identified as constraints to effective health system management, while expanded insurance coverage improves service accessibility and continuity of care.

Public health policy is another indicator and it encompasses government actions aimed at disease prevention, health promotion, and population-level interventions. Scholars emphasize that strong public health policies improve surveillance systems, vaccination coverage, environmental health control, and emergency preparedness. In Nigeria, public health policies guide immunization programs, maternal and child health initiatives, and responses to communicable and non-communicable diseases. Ineffective implementation or policy inconsistency often results in fragmented service delivery and poor health outcomes.

The health care services policy is also used as an indicator and it defines how health services are organized, funded, and delivered across primary, secondary, and tertiary levels. Literature suggests that policies promoting decentralization, adequate staffing, and primary health care strengthening lead to more responsive and efficient health management systems. In Nigeria, service delivery policies directly affect the functioning of primary health care centres, referral systems, and the quality of maternal and child health services.

Finally, the pharmaceutical policy regulates drug production, distribution, pricing, and prescription practices. Research indicates that strong pharmaceutical policies ensure drug availability, affordability, quality assurance, and rational drug use. Conversely, weak regulatory frameworks contribute to counterfeit drugs, self-medication, and drug abuse. In Nigeria, pharmaceutical policy plays a central role in shaping medication access and controlling misuse within the public health system.

The public health management system is the dependent variable in the study and the indicators selected in this model represent key performance outcomes of health management influenced by public policy.

Accessibility of Health Services reflects the ease with which individuals obtain needed health services in terms of cost, distance, availability, and acceptability. The literature consistently links effective health and insurance policies to improved service accessibility. Where policies are weak or poorly implemented, access becomes limited, especially for rural populations and low-income households.

Vaccination and Immunization Services are core public health interventions aimed at disease prevention. Studies demonstrate that strong public health policies enhance immunization coverage through funding, logistics, public awareness, and monitoring systems. In Nigeria, policy-driven immunization programs have significantly reduced vaccine-preventable diseases, although gaps remain due to implementation challenges.

Also, prenatal and antenatal services are critical indicators of maternal and child health system performance. Existing literature shows that supportive health care service policies improve maternal health outcomes by ensuring skilled personnel, accessible facilities, and affordable services. Weak policy implementation, however, leads to low utilization of antenatal care and higher maternal and infant mortality rates.

Drug abuse and self-medication are outcomes strongly influenced by pharmaceutical and public health policies. Research indicates that inadequate regulation, poor enforcement, and limited public awareness increase the prevalence of irrational drug use. Effective pharmaceutical policies, combined with health education and enforcement mechanisms, reduce drug misuse and improve overall health system management.

The model assumes a direct and positive relationship between public policy and the public health management system. Thus, the conceptual model demonstrates that improvements in health insurance, public health, healthcare services, and pharmaceutical policies are expected to translate into better accessibility of services, improved immunization coverage, enhanced maternal health services, and reduced drug abuse within Nigeria's public health management system.

Theoretical Review

This study is anchored in systems theory, which provides a useful framework for analyzing public health management. According to Okotoni (2010), as cited in Dahida et al. (2019), a system comprises interrelated subsystems working together to achieve a common goal. The core components of a system include inputs, processes, outputs, and feedback (or recycling).

Easton (1965), a leading political scientist, transformed the study of political systems through his General Systems Theory. Departing from traditional views that considered political systems as static, Easton proposed a dynamic framework that emphasizes the constant interactions and adaptability within these systems. He conceptualized political systems as processes that authoritatively allocate values within a society, highlighting their continuous and adaptive nature. In line with this perspective, Okotoni (2010, as cited in Dahida et al., 2019) defines a system as a collection of interconnected sub-systems working together to achieve a shared objective. A system's fundamental unit involves the attainment of a goal and typically consists of four components: input, processing, output, and feedback.

Similarly, Apenda (2010) notes that social systems contend with two primary challenges: the production and distribution of scarce resources and the maintenance of social order. Applying this framework to the National Health Insurance Scheme (NHIS), the scheme represents a governmental goal aimed at ensuring quality healthcare. Consistent with systems theory, the NHIS requires the integration of key components: inputs such as funding, human resources, medical supplies, and healthcare personnel; processing, which entails the effective combination and utilization of these resources; outputs, manifested as affordable, accessible, and high-quality

healthcare services; and feedback, which involves continuous evaluation to assess the scheme's effectiveness and guide improvements (Adebisi et al., 2019). In the context of public health, government policies-particularly in Lagos State-are designed to achieve the overarching goal of providing accessible, affordable, and quality healthcare services to residents.

This study applies systems theory to explain how public policies influence public health management at Amuwo-Odofin Primary Health Care. Within this framework, health insurance, public health, pharmaceutical, healthcare services, and personal health policies function as system inputs supported by resources such as funding, skilled personnel, medical supplies, and infrastructure. These inputs are processed through administrative coordination and service delivery mechanisms that shape access to healthcare, vaccination and immunization services, public enlightenment on drug abuse and self-medication, prenatal and antenatal care, and the utilization of contraceptive methods for family planning. The resulting outputs include improved accessibility, effective preventive services, enhanced public awareness, better maternal health outcomes, and increased family planning uptake. Continuous monitoring and evaluation serve as feedback mechanisms for assessing performance and refining policy implementation to strengthen public health management within the primary healthcare system in Lagos State.

Gaps in the Literature

Existing studies on public policy and public health management in Lagos State have mainly focused on policy formulation and general effects on service delivery within primary health care settings, including locations such as Festac. However, gaps remain, particularly regarding policy implementation dynamics at the Primary Health Care (PHC) level. While prior research emphasizes policy intentions, there is limited critical examination of how weak implementation capacity, inadequate monitoring, and poor institutional coordination hinder the effectiveness of public health policies. Additionally, despite documented advancements in medical technology, few studies explore the role of digital infrastructure and health information systems-such as electronic health records, data-driven decision-making, and telehealth-in enhancing policy implementation and health service management.

Another significant gap lies in the lack of context-specific studies that integrate multiple policy dimensions, including public health policy, healthcare service policy, pharmaceutical policy, and health insurance policy, into a unified analytical framework. Existing research often adopts a fragmented approach, overlooking the interrelated effects of these policies on overall public health management. This study seeks to bridge these gaps by providing an integrated analysis of public policy and public health management in Lagos State, with a focus on community awareness, service accessibility, monitoring of public-private partnerships, and the effective implementation of health insurance policies. The study aims to identify critical policy shortcomings, highlight areas for improvement, and propose actionable strategies to strengthen public health management, especially at the primary health care level.

METHODOLOGY

This study adopted a descriptive survey research design within a quantitative research approach, suitable for examining the prevalence of attitudes, perceptions, and behaviours among respondents and for assessing the influence of public policies on public health management in primary health care settings. This design allowed for the systematic collection and analysis of numerical data to explain relationships among the study variables.

The research was conducted in Amuwo-Odofin Local Government Area of Lagos State, targeting the total population of 280,924 residents. The study employed simple random, area (cluster) and purposive sampling techniques. Simple random sampling was used to minimize selection bias and ensure representativeness. Area sampling was adopted to account for heterogeneity in primary health care service utilization. To ensure representativeness and account for heterogeneity in service utilization, a total accessible population of 2,810 was identified from which the final study sample of 350 respondents was drawn. Patients were categorized into five clusters based on service type: general medical treatment, vaccination and immunization, self-medication and drug abuse, pre-natal and antenatal care, and contraceptive/family planning services. Sixty-four respondents were randomly selected from each patient cluster (total $n = 320$) using cluster sampling, while 20 staff members were purposively selected across the various departments.

Table 3.1 Population and Sample Distribution

Category	Total Population	Sampled Population (n)	Sample Size Selected (n)	Sampling Method
General medical treatment	95,120	764	64	Cluster sampling
Vaccination & immunization	56,184	564	64	Cluster sampling
Self-medication & drug abuse	48,130	481	64	Cluster sampling
Pre-natal & Anti-natal services	52,265	523	64	Cluster sampling
Contraceptive/family planning	29,325	478	64	Cluster sampling
Staff (all departments)	1,900	20	20	Purposive sampling
Total	280,924	2,810	350	

The sample was determined using the Taro Yamani sample size determination formula because the population of the study is a finite one. The formula is given as:

$$n = \frac{N}{1 + N(e)^2}$$

Where:

N= is the Population

1 = is the constant

e = is the degree of error expected

n = is the sample size

$$n = \frac{2,810}{1 + 2,810(0.05)^2}$$

$$n = \frac{2,810}{1 + 2,810(0.0025)}$$

$$n = \frac{2,810}{1 + 7.025}$$

$$n = \frac{2,810}{8.025}$$

$$n = 350$$

Thus, the sample size of 350 respondents was selected.

Data were collected from both primary and secondary sources, with structured questionnaire serving as the principal instrument. Respondents’ opinions and perceptions were measured using a four-point Likert scale. The questionnaire was reviewed by public administration scholars to ensure face and content validity, while reliability was established through the test-retest method, yielding a coefficient above 0.60, indicating suitability for the study.

Collected data were analyzed using descriptive and inferential statistical techniques. Descriptive statistics including tables, frequency distributions, and percentages - were used to summarize and present the data. Inferential statistics, specifically Chi-square and regression analyses, were employed to test the study hypotheses with the aid of SPSS (Version 25.0). This methodological approach provided a robust framework for assessing the relationship between public policy and public health management within the study area.

Data Analysis, Results and Discussion

Socio-Demographic Characteristics of Respondents

This section presents the demographic characteristics of respondents who participated in the study, focusing on gender, age, educational qualification, and marital status. The primary quantitative data were collected through a structured questionnaire administered to beneficiaries of primary health care in Amuwo Odofin Primary Health care, Festac, Lagos state. A total of 350 respondents selected as sample for the study successfully completed the questionnaire, yielding an impressive 100 % response rate.

The socio-demographic profile of the respondents is presented to assess the representativeness of the study sample. A total of 350 respondents participated in the survey.

Table 4.1: Socio-Demographic Distribution of Respondents (n = 350)

Variable	Category	N	%
Gender	Male	140	40.0
	Female	210	60.0
Age (years)	20–29	70	20.0
	30–39	105	30.0
	40–49	88	25.0
	50–59	70	20.0
	≥60	17	5.0
Marital status	Married	175	50.0
	Single	123	35.0
	Widowed/Divorced/Separated	52	15.0
Education	Secondary and above	333	95.0
	Primary or none	17	5.0

Note. Percentages may not sum to exactly 100 due to rounding.

Interpretation

The sample was dominated by females (60.0%) and respondents aged 30–49 years (55.0%), reflecting typical primary health care utilization patterns. Half of the respondents were married, while educational attainment was high, with 95.0% having at least secondary education. Overall, the distribution suggests that the sample is adequately representative of primary health care users in Amuwo-Odofin Local Government Area, Lagos State.

Test of Hypotheses

This presents result of the inferential statistics such as Chi-square non-parametric technique and Pearson Product Moment Correlation Coefficient (PPMCC) used to test the relevant hypotheses about the relationship that exist between variables in the study.

Hypothesis One

H₀: There is no significant relationship between Health Insurance Policy and accessibility of people to healthcare services in Amuwo-Odofin Primary Health Care.

Table 4. 2: Pearson Correlation Between Health Insurance Policy and Accessibility to Healthcare Services

Variables	1	2
1. Health Insurance Policy	1	.877***
2. Accessibility to Healthcare Services	.877***	1

Note. $N = 350$. ** $p < .001$ (two-tailed).

As shown in the table, a Pearson product–moment correlation was conducted to examine the relationship between health insurance policy and accessibility to healthcare services among respondents in Amuwo-Odofin Primary Health Care. The analysis revealed a strong, positive, and statistically significant correlation between health insurance policy and accessibility to healthcare services, $r = .877$, $p < .001$. This indicates that higher levels of health insurance policy implementation are associated with greater accessibility to healthcare services. The magnitude of the correlation coefficient indicates a very strong association between the variables (Cohen, 1988). The null hypothesis of no relationship is therefore rejected. The findings provide empirical evidence that health insurance policy is significantly associated with improved accessibility to healthcare services in the study area.

Hypothesis Two

H₀: Public Health Policy has no significant influence on administration of vaccination and immunization services in Amuwo-Odofin Primary Health Care

Table

Chi-Square Test of Hypothesis Two: Influence of Public Health Policy on Vaccination and Immunization Services in Amuwo-Odofin Primary Health Care

Test Statistic	Value	df	Asymp. Sig. (2-tailed)
Chi-Square	103.1	6	.000

Note. Significance level set at 0.05.

0 cells (.0%) have expected frequencies less than 5. The minimum expected cell frequency is 25.0.

From the result of Chi-square, the value for the influence of Public Health Policy on administration of vaccination and immunization services in Amuwo-Odofin Primary Health Care is 103.15 with an associated P-value of 0.000. Since the p-value= 0.000 is less than the level of significance (0.05), null hypothesis (H₀) rejected and we accepted alternative (H₁). It is therefore inferred that Public Health Policy has significant influence on administration of vaccination and immunization services in Amuwo-Odofin Primary Health Care. This shows that through implementation of public health policy information related to vaccination and immunization were adequately disseminated and appropriate vaccines were properly administered to people in Amuwo-Odofin, Festac, Lagos.

Hypothesis Three

H₀: There is no significant effect of Health Care services Policy on effective pre- natal and Anti-natal services in Amuwo-Odofin Primary Health Care.

Table 4.4 Test Statistics for Hypothesis Three

Attitudinal Statements	SA	A	D	SD	Mean	Decision
Consistent prenatal services in public healthcare reduce maternal and neonatal mortality in Lagos State.	268	24	23	35	3.54	Accepted
Prenatal services in public healthcare enhance safety of childbirth in Lagos State.	247	6	20	30	3.25	Accepted
Regular check-ups for nursing mothers and newborns are frequently delivered in public healthcare centres.	260	1	20	29	3.53	Accepted

Note. SA = Strongly Agree; A = Agree; D = Disagree; SD = Strongly Disagree. Decision rule: Mean \geq 3.00 = Accepted.

Source: Field Survey (2024).

From table 4.4, the mean record showed that all variables have positive effect and was therefore accepted. Thus, Health Care services Policy has significant effect on effective pre-natal and anti-natal services in Amuwo-Odofin Primary Health Care. This implies that health care service policy effectively enhanced delivery services of pre-natal and anti-natal to respective people in the study area.

Table 4.5: Model Summary

R-squared	Adjusted R-squared	F-Statistic	Prob. (F-Statistic)
0.64700	0.48226	7.5050	0.00462

The R- Squared of the model is **0.64700** in table 4.5 above showing that the explanatory variables explain 64.7% of changes in the dependent variable. It remained strong even after adjusting for the degree of freedom to 48.2% (Adjusted R-Squared). The F- statistic which measures the effect of Health Care services Policy on effective pre- natal and Anti-natal services in Amuwo-Odofin Primary Health Care variables in explaining the dependent variable was found to be statistically significant at 0.05% level. The F- statistic figure of 7.5050 shows that there is significant effect of Health Care services Policy on effective pre- natal and Anti-natal services delivery in Amuwo-Odofin Primary Health Care.

Hypothesis Four

H₀: There is no significant relationship between Pharmaceutical Policy and public enlightenment on implication of drug abuse and self-medication in Amuwo-Odofin Primary Health Care

Table 4.6 Pearson Correlation Analysis of Hypothesis Four: Pharmaceutical Policy and Implications of Drug Abuse and Self-Medication

Variables	1	2
1. Pharmaceutical Policy	1	.786**
2. Implication of Drug Abuse & Self-Medication	.786**	1

Note. N = 350; **p < .01 (2-tailed).

Table 4.6 shows a strong positive correlation between Pharmaceutical Policy and public enlightenment on the implications of drug abuse and self-medication in Amuwo - Odofin Primary Health Care. The correlation coefficient, $r = .786$, is statistically significant at the 0.01 level ($p = .000 < .01$), indicating that the variables are highly associated. This suggests that effective implementation of Pharmaceutical Policy enhances public education, awareness, and information dissemination on drug abuse and self-medication, ultimately reducing such practices in Festac, Lagos State.

DISCUSSION OF FINDINGS

The empirical findings indicate that the majority of respondents were aware of, and experienced, the significant influence of public policies on public health management in the study area. Female respondents, in particular, demonstrated higher compliance with medical prescriptions, suggesting greater health consciousness and responsibility for family health outcomes. Most health workers possessed professional medical experience, while a large proportion of patients had prior exposure to public healthcare services, reflecting sustained engagement with the public health management system.

Hypothesis one revealed a strong and statistically significant relationship between health insurance policy and accessibility to healthcare services at Amuwo-Odofin Primary Health Care (Pearson's $r = 0.877$, $p < 0.001$). This finding aligns with existing evidence that effective health insurance policies enhance affordability and utilization of health services. It supports the view that public health insurance initiatives are central to achieving accessible and equitable healthcare in Nigeria.

The Chi-square analysis further showed that public health policy significantly influences vaccination and immunization services at the primary healthcare level ($\chi^2 = 103.14$, $p < 0.05$). This finding is consistent with prior studies which document that well-implemented immunization policies contribute to reductions in vaccine-preventable diseases and improvements in child survival, particularly in low- and middle-income countries.

Findings from hypothesis three established a significant and positive relationship between healthcare services policy and the effectiveness of prenatal and antenatal services ($r = 0.786$, $p < 0.001$). This result corroborates earlier studies which demonstrate that access to formal healthcare during pregnancy increases the use of skilled birth attendants and improves maternal and infant health outcomes. The evidence further underscores the importance of quality antenatal and postnatal care in reducing preventable maternal and infant mortality.

Finally, hypothesis four revealed a significant relationship between pharmaceutical policy and public enlightenment on drug abuse and self-medication ($r = 0.786$, $p < 0.001$). The findings suggest that effective pharmaceutical regulation, combined with sustained public education, can substantially reduce drug abuse and self-medication practices, particularly among youths. This outcome is consistent with national surveys and empirical studies that highlight the prevalence of substance abuse and emphasize the need for stronger regulatory enforcement and awareness campaigns.

Overall, the findings confirm a significant relationship between public policy and public health management in Amuwo-Odofin Primary Health Care. They demonstrate that coherent and effectively implemented public policies-covering health insurance, public health, healthcare services, and pharmaceutical regulation-are critical to improving service accessibility, preventive care, maternal health services, and rational drug use.

CONCLUSION AND RECOMMENDATIONS

Conclusion

This study provides empirical evidence that public policies significantly influence public health management outcomes at Amuwo-Odofin Primary Health Care in Nigeria. Specifically, health insurance policy was found to significantly improve access to healthcare services; public health policy positively influenced vaccination and immunization services; healthcare services policy enhanced the effectiveness of prenatal and antenatal care; and pharmaceutical policy contributed to public awareness and control of drug abuse and self-medication. Overall, the findings confirm that effective formulation and implementation of public policies are critical to improving accessibility, preventive care, maternal health services, and rational drug use within the public health management system.

Recommendations

The findings of this study underscore the need for stronger government commitment to the health sector through sustained and adequate funding of public health facilities. Improved financing would enhance the availability of essential medical equipment, drugs, and infrastructure, thereby increasing public confidence in public health institutions and encouraging greater utilization of services. Adequate funding is also critical for maintaining

vaccination programs, maternal and child health services, and preventive care, which are central to effective public health management.

The adoption of electronic health information systems is equally important for improving efficiency and accountability within the public health management system. Digital record-keeping enhances continuity of care, reduces errors associated with manual data management, and supports evidence-based decision-making. In the long run, electronic databases can strengthen health planning, monitoring, and evaluation, while also improving coordination across different levels of healthcare delivery.

Capacity building among health workers remains a key requirement for translating public policies into effective service delivery. Regular training and retraining programs, particularly in the use of information and communication technologies, will enable health professionals to deliver services more efficiently and adapt to emerging health challenges. Beyond technical skills, continuous development in communication and interpersonal relations is necessary to improve patient satisfaction, trust, and compliance with medical advice.

Furthermore, sustained public health education initiatives are essential for improving health outcomes, especially among women of reproductive age and their partners. Increased awareness of the benefits of antenatal and postnatal care, immunization, family planning, and the dangers of self-medication can significantly reduce preventable morbidity and mortality. When communities are well informed, public health policies are more likely to achieve their intended outcomes.

Overall, the effective implementation of these recommendations would strengthen the linkage between public policy and public health management, ensuring that policy objectives translate into measurable improvements in healthcare accessibility, quality, and sustainability within primary healthcare settings.

Ethical Considerations

This research adheres strictly to ethical guidelines associated with the conduct of quantitative research in social and management sciences, ensuring confidentiality and informed consent. Participants in the study were provided with information about the objectives of the study and their right to withdraw at any stage of the research. Anonymity was also maintained throughout the reporting of findings.

Informed consent

Informed consent was obtained from all participants for participation in the study.

Author contributions

CLO contributed in: conceptualization, methodology, formal analysis and investigation, writing - original draft preparation and writing

FJO contributed in reviewing and editing, resources and supervision

HVO: Contributed in data gathering, analysis and review

Conflict of Interest

The authors have no relevant financial or non-financial interests to disclose.

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