Healthcare Alliance Drivers and Competitive Advantage of Private Hospitals in Anambra State, Nigeria

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ABSTRACT

The fragility of Nigeria's health sector is in a worrying state of despair. The continuous underperformance of the country's healthcare sector has not only resulted in medical errors leading to careless deaths but is negatively affecting the economic sustainability of private hospitals. As a result, the study aimed to examine the effect of healthcare risk management (HRM) and scale and scope economies on the competitive advantage of private hospitals in Anambra state, Nigeria. Four hundred and sixty-eight (468) medical staff served as the study population. Pearson correlation and regression analysis were the analytical tools employed. Findings reveal that healthcare risk management and scale and scope economies affect the competitive advantage of private hospitals in Anambra State, Nigeria. In line with these findings, the study recommends acknowledging the role of healthcare risk managers and encouraging collaborative geographical specialty and hospital size.

Keywords: Competitive Advantage, Economies of Scale and Scope, Healthcare Risk Management, Strategic Alliance

INTRODUCTION

Competition, which improves quality and efficiency, inspires innovation, and drives down costs in viable sectors of an economy, is central to boosting the performance of the global healthcare sector (Leemore et al., 2019). Rising medical costs and operational uncertainty associated with the worldwide healthcare environment (Abdulsalam et al., 2018) have caused many healthcare facilities, particularly in the United States, to rely on strategic hospital alliances to create extensive healthcare systems capable of influencing prospective patients' hospital decisions (New York Times, 2012).

Nigeria, with a population of 211,400,794 (World Bank, 2021), has its healthcare system ranked 187 out of 197 constituting countries of the United Nations (Tide, 2018). Price Water Cooper (2016) reveals that annually, Nigerians spend over USD 1 billion to receive emergency medical treatment abroad. Nigeria's healthcare system has been weakened by inadequate investment in healthcare systems, dilapidating healthcare infrastructure, underfunding, unstable policy frameworks, and poor implementation of the public-private partnership agreement (Akunne et al., 2019). Despite the Federal government's policies to improve healthcare delivery in Nigeria, gross underperformance is still witnessed in the healthcare sector. In addition, rising inflation, insecurity, and unaffordability of healthcare services have further thwarted the sector's growth potential (Abubakar, 2021). Nigeria has a young population that spends more on their health, yet it has a life expectancy of 54 years, which is lower than that of its neighboring countries (Lancelet Nigeria Commission, 2022). Consequentially, Nigeria's continuous reliance on importing health products, missing the opportunity to manufacture medical equipment, products, and consumables locally has exacerbated disparities in accessing quality healthcare, prompting those who can afford it to seek healthcare outside the country, contributing to Nigeria's $1 billion medical tourism industry (Oguanuo, 2024). Several internal and external assessments of the issues affecting Nigeria's healthcare system often show that the persistence of inequity is fueled by the unavailability of technically competent and evidence-based care to people regardless of underlying social standing (Ayetotot-Oladehinde, 2022).

In Anambra state, Nigeria, many private hospitals not only underperform but are filled with quack personnel in dehumanizing medical facilities. These quack practices have increased medical errors and dampened

the confidence of the state's residents in existing private hospitals. The state's health commissioner, Dr Afam Obidike, reveals that 80 per cent of healthcare services are driven by the unregulated private sector, prompting the existence of unprofessional medical personnel operating in identified healthcare facilities in the state (Osuizigbo-Okechukwu, 2024). Equally, the Anambra State Head of Medical Services and the Ministry of Health have eradicated unprofessionalism among medical personnel (Okoye, 2023). In curbing underperformance and quackery, the state government, in collaboration with the World Health Organisation (WHO), launched the State Health Facility Monitoring and Accreditation Unit targeted at enabling real-time registration, renewal and regulation of health facilities and licenses, data collection, analysis, and reporting, facilitating informed decision-making and prompt intervention where necessary to ensure better performance from healthcare providers (Nwanodu, 2024).

In Nigeria, the only known form of healthcare collaboration is that which exists between the World Health Organization (WHO) and the Private Sector Health Alliance of Nigeria through the "Adopt-A-Healthcare Facility Programme (ADHFP). Under this collaboration, the ambitious goal is to establish at least one globally standardized primary health care PHC facility in each of Nigeria's 774 Local Government Areas (Onyedinefu, 2024). All forms of health-centric alliance in Anambra state are well documented and presented thus; Well-health, a leading health technology company, partnered with the Anambra State Health Insurance Agency (ASHIA) to accelerate the enrollment of residents in the state's health insurance scheme (Olawale, 2023); and a collaboration with the Lagos State Ministry of Science and technology to leverage modern, secure, and transparent technology (Blockchain) to maintain health data and the expansion of the social investment database of poor and vulnerable households (Anambra state government, 2024). Aside from these alliances, more studies on private hospital alliances in Anambra state need to be conducted, thus creating a gap in the literature that this study intends to fill. In line with this background, the study aims to examine the role of healthcare risk management (Alam, 2016) and economies of scale and scope (Freeman & Scholtes, 2015) as drivers of strategic alliance in improving the competitive advantage of private hospitals in Anambra State, Nigeria.

LITERATURE REVIEW

Healthcare Alliance

This study's Healthcare alliance was carved from a strategic management concept called strategic alliance. Strategic alliances have attracted massive attention in strategic management literature as researchers have contributed fundamentally to firms' strategic attempts towards goal attainment (Akpotu & Jasmine, 2016). Dyer and Kale (2007: 65) affirm that *"pressures from globalization along with changes in regulations and technological factors have resulted in firms reaching out to partners to access their complementary capabilities."* Amidst rising competition, managers must seek strategic approaches that improve performance and sustain gained competitive advantage (Uchegbulam et al., 2015). Viable business strategies must aim at increasing stakeholders' satisfaction and improving the current level of performance (Olanipekun et al., 2015). Strategic alliances (SAs) aim to gain the best raw materials, enjoy low production costs, access recent technological processes, and improve market penetration strategies (Bentolhoda & Salehi, 2021). Strategic alliances are critical to organizational expansion and success (Christoffersen, 2012), breaking down barriers and improving firms' corporate image (Wen, 2007) domestically and across national borders. Strategic alliances in the healthcare industry emerged in the mid-1970s as a defensive strategy against the growth of investor-owned hospitals in the United States, which focused on profit rather than delivering affordable healthcare services (Giminez et al., 2020). A strategic alliance is a viable strategy that helps many organizations expand into new markets, improve performance, and sustain competitive advantage (Umar, 2020). Alliances are bringing organizations closer to each other, with each organization knowing that they can gain a more significant competitive advantage when operating cooperatively rather than acting alone.

In hospital collaboration, converging hospitals pool their resources to achieve long-term goals that may be out of reach for a single hospital (Tidd et al., 2005). Hospital collaboration can be made possible by attempting to: *"minimize the cost and risk associated with technology development/new market entry; attain economies of scale and scope in production; shorten the time involved in developing and commercializing a product; and promote shared learning"* (Tidd et al., 2005). The importance of solid partnerships and collaboration between hospitals and public health systems has become

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increasingly clear, as alliances are critical for improving the health and well-being of communities, addressing health disparities, and enhancing the overall quality of healthcare (Derr, 2023). Also, the benefits of hospital collaboration include, firstly, the sharing of performance with each hospital so individual hospitals can assess where they stand relative to their peers; secondly, the development of an improvement agenda set by those delivering care (Howard et al., 2022). As mentioned earlier, the scope of this study is to examine the effect of healthcare alliance drivers (healthcare risk management and economies of scale and scope) on the competitive advantage of private hospitals.

Healthcare Risk Management

Risks to patients, staff, and visitors are often witnessed in healthcare facilities. Among several risks, Radar Healthcare (2023) identified incorrect diagnosis, medication errors, slow to act on results, insufficient safeguarding policies, and poor communication, causing an incident as an example of the risk to patients and staff. Healthcare risk management comprises the systems and processes employed to uncover, mitigate, and prevent risks in healthcare institutions (Catalyst, 2018). Risk management in healthcare is identifying threats that could harm the organization, its patients, staff, or anyone else within the facility. Health risk management involves actions that reduce the frequency and severity of unexpected incidents and legal claims and promote reliable performance systems where the uniqueness of each patient exposes health organizations to potential liability (Bunting & Benton, 2006). HRM is an organized effort to identify, assess, reduce, and eliminate, where necessary, risks to patients, visitors, staff, and hospital assets (Alam, 2016). Managing risk in the health sector pertains to controlling incidents that seem inconsistent with the standard practices and activities of the hospital, where incident reporting is the foundational stone of a sound system that intends to manage risks effectively (Singh & Ghatala, 2012). Kaya et al. (2016) aimed to understand how risk management practices apply to hospital settings in the UK and provide suggestions to improve them. Results demonstrate that practitioners and managers agree that risk assessment is more important than risk mitigation. The study concluded that risk management practices can be advanced by focusing on safety culture, staff involvement, safety training, incident reporting systems, and risk management tools.

Economies of Scale and Scope

Economies of scale and scope are employed when explaining the result of production system efficiency (Peltokorpi et al., 2011). Economies of scale are perceived when patient costs reduce as the number of patients treated increases over time (Masters, 2012). Also, as the number of patients increases, the opportunities available for individuals and organizations to learn and improve the quality of service rendered will increase (Freeman & Scholtes, 2015). Nevertheless, one may argue that increasing a particular medical service will reduce the cost of another medical care in the same facility. In a recent study, Freeman et al. (2020) showed that an increase in elective volume at a hospital is associated with an increase in the cost of emergency care (a negative spillover) and that for emergency admissions, an increase in emergency activity in one specialty is associated with lower costs of emergency care in other specialties (a positive spillover). Healthcare providers explain that attending to a high volume of similar patients makes service providers gain experience and become more effective and innovative in developing unique routines for improving the quality of care (Christensen et al., 2009).

Economies of scope are experienced as the joint average cost of rendering multiple health services is lower than that of rendering these services separately (Master, 2012). Turner et al. (2018) reveal that the average cost per unit reduction results from producing two or more products at once through an integrated control program. Masayuki (2010) studied economies of scale and hospital productivity by empirically analyzing medical area panel data in Japan. The analysis revealed that hospital size affects its performance: a hospital will be more productive when it is large. Furthermore, the hospital-size effect is economically significant because productivity will increase by more than 10% when the hospital doubles in size. Similarly, Kristensen et al. (2009) studied economies of scale and the optimal size of hospitals by empirically revealing results for Danish public hospitals.

Competitive Advantage, Healthcare Risk Management, and Scale and Scope Economies

Competitive advantage exists whenever organizations edge out rivals, ensure repeated patronage, and shield customers against competitive forces (Afolabi & Adegoke, 2014). These forces can either be national or international. It is a national force when competitors operate within the same geographical boundary as the shielding organization and an international force when its competitors operate outside the boundaries of a country. Particularly, competitive advantage relates to value creation (Attaran et al., 2012). Notably, the created value must be competitively cost-effective compared to rival firms (Dash, 2013). Despite the turbulence and uncertainty in the business environment, organizations are still faced with the challenge of achieving and sustaining a certain level of competitiveness.

Private healthcare organizations with proactive control systems and risk management abilities are better prepared to handle environmental complexities (Ahmed & Manab, 2016). The healthcare risk management system assists firms in gaining a higher level of competitive advantage by aiding them in controlling, managing, and organizing risk management activities (Coso, 2004). Competitive advantage can be attained when an organization can manage the effects of risk better than its competitors (Coso, 2004). Possessing sound knowledge about the risks that exist in an industry is vital to actively enacting viable actions (Saeidi et al., 2018). Elahi (2013) established that a firm could attain a competitive advantage when developing an appropriate risk management system that can effectively serve when other firms cannot increase their risk-taking ability.

Gaining a competitive advantage depends not only on increasing the revenue base of an organization. Competitive advantage is achieved when a firm learns to reduce its production costs more efficiently than its rivals. An organization can significantly gain and sustain competitiveness through scale and scope economies, which entail reducing production costs through mass and variety. Economies of scale mean that firms can decrease overhead costs when output increases, increasing the competitive advantage of larger organizations over smaller firms (Rana & Salman, 2015).
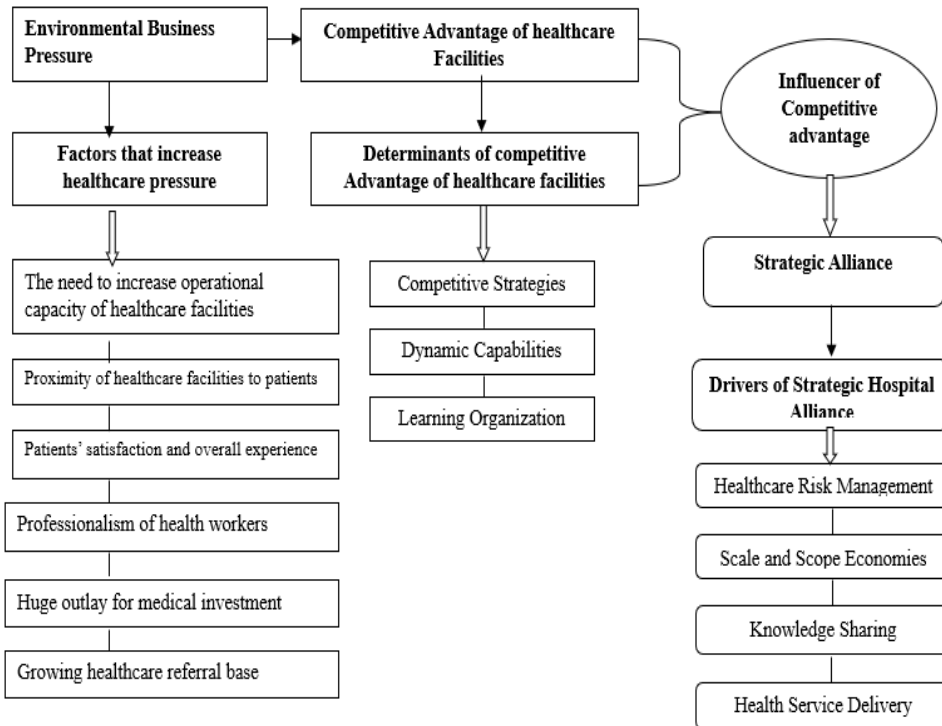
Figure 1: Conceptual Framework

Theoretical Framework

This study is anchored on the resource dependence theory. Resource dependence theory has become a dominant theory explaining why independent organizations engage in mergers and acquisitions only next to transaction costs theory (Yin & Shanley, 2008). This theory was developed by Pfeffer and Salancik in 1978. Pfeffer and Salancik theorized the notion of resource dependence, highlighting several critical propositions of RDT; firstly, firms are embedded in a web of relationships through which they unavoidably rely on other organizations which control the critical resources needed by the focal firms; Secondly, inter-organizational dependence constrains a firm's autonomy and creates uncertainties in business strategies and operations; Thirdly, in reacting, firms are motivated to manage existing inter- and intra-organizational resource to reduce the risk of business failure; lastly, dependence-management strategies can be impeded by internal and external barriers and thus vary in their effectiveness (Jiang et al., 2022). The relevancy of the resource dependence theory to this study explains the need for inter-organizational collaboration, which in most cases is knotted by

drivers that enhance the competitiveness of the performance of organizations. Also, linking the conceptual framework to the resource dependence theory, it can be deduced that hospital alliance is competitively amplified by the need to manage risk in healthcare facilities collaboratively and to reap the benefits of economies of scale and scope. To guide this study, the following hypotheses are derived for test purposes:

H_1: Healthcare risk management affects the competitive advantage of private hospitals in Anambra State, Nigeria.

H_2: Scale and scope economies influence the competitive advantage of private hospitals in Anambra State, Nigeria.

METHODOLOGY

The study adopted a descriptive research design approach. Adopting this method is premised on establishing a workable relationship between study variables. The population encircle names of Nigerian Medical Association (NMA) registered Private hospitals in Anambra State. NMA, Anambra Chapter (2021) categorized these hospitals into five (5) zones: Awka zone, Aguata zone, Ihiala zone, Nnewi zone, and Onitsha. Hence, from a total of two hundred and fifty-five (255) registered private hospitals, a population of four hundred and sixty-eight (468) medical professionals were obtained from registered private hospitals in the zones. Due to the manageability of the population size, the entire population were adopted. Since the study is examining the entire population, the total population sampling method is adopted.

Cronbach's alpha was utilized to obtain the instrument's reliability. Cronbach's alpha coefficient ascertains internal consistency between items (Cronbach, 1951). To achieve the reliability intent, copies of the questionnaire were administered to a sample of twenty (20) medical staff members from General Hospital Enugu-Ukwu. The administered questionnaire was successfully retrieved, which aided the reliability measurement. The Cronbach alpha values obtained after the necessary computation are shown in Table 1 below.

Table 1: Reliability Test Values

Variables	Number of statements	Cronbach's alpha values
Healthcare Risk Management	6	0.73
Scale and Scope Economies	6	0.80
Competitive Advantage	5	0.90

The alpha values of 0.73, 0.80, and 0.90 denote that the test instrument is empirically reliable to conduct this study successfully *"Economies of scale and scope"* with a value of 0.80 is within the *"good"* region. Also, the healthcare risk management value of 0.73 falls within George and Mallery's (2003) *"acceptable"* region. Finally, the competitive advantage value (0.90) is within George and Mallery's (2003) region of *"excellent."* These obtained values mean that the research instrument is internally consistent and reliable enough for research purposes.

The study specifically modified and concerted the thematic findings of Eren et al. (2017) on the impact of strategic alliances on innovation, knowledge availability, risk reduction, and cost-sharing into mathematical form. Competitive strategies were a proxy of competitive advantage. The model for this study is specified as follows:

COMADV = f (HRM, ESS) ………………………………equation 1

Mathematically, the model is specified as follows:

COMADV = α_0 + α_1HRM + α_2ESS + ε_i………………..equation 2

Where:

COMADV = Competitive Advantage

HRM = Healthcare Risk Management

ESS = Economies of Scale and Scale

And a priori expectations: α_1 ...... $\alpha_2 > 0$

Data obtained through questionnaire administration were analyzed descriptively and inferentially. Frequency distribution, percentages, the mean, and the standard deviation were all used in descriptive statistics. Additionally, the specified model, which aligns with the study objective and statements of hypotheses, was tested using Pearson correlation and

regression analyses at a 5% significance level with the aid of the Statistical Package for Social Science (SPSS) version 25. Regression analysis was ideal for this study because it accurately predicts the *"nature of the relationship between independent variables and a dependent variable."*

DATA ANALYSIS AND PRESENTATION OF FINDINGS

Recall that the specific objectives of this study are to ascertain the impact of health risk management and scale and scope economies on the competitive advantage of private hospitals in Anambra State, Nigeria. In achieving these objectives, the researchers conducted a field survey to interact with medical professionals by administering copies of a structured questionnaire according to classified study zones and randomly selected private hospitals. An analysis of the interaction is shown in the tables below.

Table 2: Descriptive Statistics on Healthcare Risk Management and Competitive Advantage

Items	N	SA	A	U	D	SD	Mean	Std Dev	Remark
Environmental uncertainty in Nigeria is affecting the performance of organizations, most especially hospitals.	468	319 68.2%	87 18.6%	40 8.5%	14 3.0%	8 1.7%	4.49	.898	Accept
I want to learn how to reduce the undesirable effects of operational medical risks.	468	320 68.4%	89 19.0%	45 9.6%	11 2.4%	3 0.6%	4.52	.813	Accept
Unwanted medical risks can be prevented when healthcare professionals diligently follow prescribed medical protocols.	468	307 65.6%	93 19.9%	26 5.6%	39 8.3%	3 0.6%	4.41	.966	Accept
Cases of medical malpractice and negligence in Anambra State are constantly reported on medical platforms.	468	311 66.5%	99 21.2%	33 7.1%	22 4.7%	3 0.6%	4.48	.867	Accept
Avoidable medical risks damage hospitals' reputation and may lead to practice failure.	468	337 72.0%	65 13.9%	33 7.1%	27 5.8%	6 1.3%	4.50	.945	Accept
In the event of unwanted occurrences, our hospital has established medical procedures to ameliorate the situation.	468	329 70.3%	86 18.4%	29 6.2%	18 3.8%	6 1.3%	4.53	.872	Accept
Grand Mean							4.49		**Accept**

Table 2 shows that above 75% of respondents were cumulatively found in the agreed column, with a mean ranging from 4.41 to 4.53 and a grand mean of 4.49. These statistics suggest that health risk management will likely influence the competitive advantage of private hospitals in Anambra State.

Table 3: Descriptive Statistics of Scale and Scope Economies and Competitive Advantage

Items	N	SA	A	U	D	SD	Mean	Std Dev	Remark
The current exchange rate is negatively impacting our ability to purchase hospital equipment and pharmaceutical supplies.	468	330 70.5%	89 19.0%	26 5.6%	18 3.8%	5 1.1%	4.54	.849	Accept
We often obtain business loans from financial institutions with high interest rates to purchase hospital equipment and pharmaceutical supplies.	468	335 71.6%	87 18.6%	24 5.1%	17 3.6%	5 1.1%	4.56	.835	Accept
Medical costs accrued to patients are expected to decrease as the number of patients to treat increases.	468	334 71.4%	85 18.2%	26 5.6%	17 3.6%	6 1.3%	4.55	.856	Accept
The introduction of medical service varieties reduces the cost of medical treatments and operational costs.	468	332 70.9%	88 18.8%	26 5.6%	17 3.6%	5 1.1%	4.55	.840	Accept
Treating similar ailments has increased my level of efficiency and reduced the waiting time for patients.	468	334 71.4%	71 15.2%	29 6.2%	29 6.2%	5 1.1%	4.50	.936	Accept
Joint-hospitals' acquisition and utilization of medical equipment and purchase of pharmaceutical supplies will reduce operational costs.	468	290 62.0%	89 19.0%	32 6.8%	36 7.7%	21 4.5%	4.26	1.155	Accept
Grand Mean							**4.49**		**Accept**

From Table 3, it can be seen that all mean values are above 4.2, which led to the acceptance remark. The grand mean of 4.49 indicates that in the overall outcome, scale and scope economies are also likely to impact the competitive advantage of private hospitals.

Table 4: Descriptive Statistics of Dependent Variable: Competitive Advantage

Items	N	SA	A	U	D	SD	Mean	Std Dev	Remarks
Medically advanced private hospitals are competitively positioned when compared to other private hospitals.	468	292 62.4%	87 18.6%	59 12.6%	18 3.8%	12 2.6%	4.34	1.009	Accept
Reducing the cost of medical treatment makes hospitals attractive to prospective patients.	468	306 65.4%	94 20.1%	51 10.9%	12 2.6%	5 1.1%	4.46	.866	Accept
The ability of private hospitals to differentiate their medical services from other private hospitals increases their competitiveness.	468	275 58.8%	93 19.9%	40 8.5%	55 11.8%	5 1.1%	4.24	1.089	Accept
Private hospitals will increase their competitiveness if they focus on the health needs of identified groups of patients or communities.	468	281 60.0%	95 20.3%	60 12.8%	26 5.6%	6 1.3%	4.32	.982	Accept

Table 4 shows how respondents understand the importance of attaining and remaining competitive in the health industry. The descriptive data on frequency and corresponding percentages suggest that many respondents

agree with the stated questionnaire items, which implies that attaining and achieving a competitive advantage is vital for the survival and performance of private hospitals in Anambra state.

Hypotheses Testing

In this section, formulated hypotheses were duly tested using Pearson correlation and regression analysis. The test intends to validate or disprove the study hypotheses. Tests were conducted at a 5% significance level, which is the probability at which type I errors will be accepted.

Table 5: Correlation Matrix Analysis

		Healthcare Risk Management	Scale and Scale Economies	Competitive Advantage
Healthcare Risk Management	Pearson Correlation	1	.602**	.703**
	Sig. (2-tailed)		.000	.000
Scale and Scale Economies	Pearson Correlation	.602**	1	.321**
	Sig. (2-tailed)	.000		.000
Competitive Advantage	Pearson Correlation	.703**	.321**	1
	Sig. (2-tailed)	.000	.000	

The above correlation matrix is used to assess the degree of relationship between and among study variables: independent and dependent variables in the regression equation. The result showed that competitive advantage has a moderate relationship with healthcare risk management ($r=.102; p<.05$) and a moderate relationship with scale and scope economies ($r=.321; p<.05$). Healthcare risk management positively correlated with scale and scope economies ($r=.602; p<.05$). Scale and Scope Economies positively correlated with competitive advantage ($r=.321; p<.05$).

A regression analysis was conducted to determine the influence of healthcare risk management and the scale and scope economies on a competitive advantage. The regression model is given as:

$$COMADV = \alpha_0 + \alpha_1 HRM + \alpha_2 ESS + \varepsilon_i \ldots\ldots\ldots\ldots\text{equation 3}$$

Table 6: Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.850a	.722	.720	.38765

a. Predictors: (Constant), Economies of Scale and Scale, Healthcare Risk Management

Table 6 shows a model summary of regression analysis between two independent variables: health risk management, and scale and scope economies on competitive strategies. The R-value of.850 indicates a strong correlation between the independent and dependent variables. The R square value of 0.722 implies that the four independent variables attribute 72 percent of the variance in competitive advantage. The adjusted R square value of 0.720 suggests that the regression model is fit to accommodate more predictor variables.

Table 7: ANOVA[a]

Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	180.938	4	45.235	301.011	.000[b]
	Residual	69.577	463	.150		
	Total	250.515	467			

a. Dependent Variable: Competitive Strategies
b. Predictors: (Constant), Scale and Scale Economies, Healthcare Risk Management

Table 7 shows that the model linking health risk management and economies of scale and scope to competitive strategies was statistically significant. This is because the significant value of 0.000 is less than the 0.05 significance level.

Table 8: Coefficients

Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.
		B	Std. Error	Beta		
1	(Constant)	.206	.185		1.112	.267
	Healthcare Risk Management	.410	.052	.317	7.908	.000
	Scale and Scope of Economies	-.272	.038	-.225	-7.226	.000

a. Dependent Variable: Competitive Strategies

From the findings in Table 8, the regression model can be written as follows:

$$COMADV = 0.317HRM - 0.225ESS \quad \text{……………..equation 4}$$

The regression equation above has established that taking all factors at zero, competitive advantage will have an autonomous value of 0.206. Healthcare risk management, as the first coefficient with 0.317, suggests that if an extra unit is added to healthcare risk management, the competitive advantage of private hospitals will increase by 31.7 per cent as long as other variables are held constant. Also, scale and scope economies have a negative

regression value of -0.225, which implies that if a single unit of scale and scope economies increases, the competitive advantage of private hospitals in Anambra State will reduce by 22.5 per cent.

Healthcare risk management does not affect the competitive advantage of private hospitals in Anambra State. Decision: The p-value for HRM and competitive advantage, which is 0.000, denotes that HRM affects the competitive advantage of private hospitals in Anambra state, Nigeria. On this ground, the H1 is accepted.

Scale and scope economies do not influence private hospitals ' competitive advantage in Anambra State. Decision: The P-value for ESS and competitive advantage is 0.000, which means that the competitive advantage of private hospitals in Anambra state, Nigeria, is influenced by economies of scale and scope. On this ground, we reject H2. Also, a negative ESS coefficient value implies a negative significant influence of ESS on the competitive advantage of private hospitals in Anambra state, Nigeria. In other words, ESS's influence on the competitive advantage of private hospitals in Anambra state, Nigeria, is negatively significant.

DISCUSSION OF FINDINGS

Firstly, our findings revealed that healthcare risk management positively affects the competitive advantage of private hospitals in Anambra State, Nigeria. This implies that as private hospitals intentionally form suitable alliances, their ability to manage emanating risk from healthcare increases, which in turn strengthens their competitiveness. In other words, aligning private hospitals will be well placed through diverse experience to carefully assess the impact of risk on performance rather than discarding risk factors. This finding agrees with the report of Kaya et al. (2016); the study of medical practitioners and healthcare administrators in the United Kingdom revealed that risk assessment is more important than risk mitigation. Risk mitigation does not provide an avenue for improvement since it tends to avoid risk-taking. This demonstrates that healthcare risk management improves hospital efficiency.

Our second finding reports that scale and scope economies positively influence the competitive advantage of private hospitals in Anambra State, Nigeria. By implication, as private hospitals agree to align operations

externally, the cost per patient care reduces as specialization and medical service variety increase. Invariably, as the cost per patient reduces, the operational cost of aligning hospitals reduces. This finding agreed with the report of Freeman and Scholtes (2015) in their study of hospitals in England when they revealed that increased emergency activity in one specialty is associated with lower emergency care costs in other specialties. Similarly, in Japan, Masayuki (2010) found that the hospital-size effect is economically significant because it increases productivity by 10% when the hospital doubles in size.

CONCLUSION AND RECOMMENDATIONS

The objective of this study has been to investigate the probability of creating a formidable relationship between healthcare alliance drivers (healthcare risk management and scale and scope economies) and the competitive advantage of private hospitals in Anambra state, Nigeria. The problem surrounding Nigeria's health sector is increasingly overwhelming, such that the federal government, through its agencies, is continuously making room for most private healthcare providers to aid in achieving governmental healthcare objectives for its citizens. Nonetheless, the performance of private healthcare facilities is often affected by operational factors. While developing healthcare risk management techniques improves the competitive position of the studied hospitals, economies of scale and scope returned negative. In line with this, the researchers recommend the following;

Private and public hospitals in Anambra State need to admit the importance of establishing the role of healthcare risk managers in their respective facilities. Healthcare risk managers are trained to identify risks and estimate the potential consequences of those risks for healthcare facilities. A healthcare risk manager is a trained professional who constantly assesses and, where possible, minimizes risks to staff, patients, and the public in healthcare facilities. Usually, healthcare risk managers hold bachelor's or bachelor's degrees in healthcare management or administration. As a collaborative unit, private hospitals in Anambra State should jointly weigh and evaluate the possibility of creating the position of healthcare risk managers to reduce medical and administrative risks in hospitals.

Private hospitals in Anambra State can benefit from scale and scope economies when encouraged to decentralize medical services geographically. Existing private hospitals should be grouped by geographic location and size of healthcare facility. Hospital sizes are usually measured by available bed space and the number of employed medical professionals (the medical professional ratio to patients). These hospitals need to collaboratively conduct an internal assessment to ascertain their strengths and weaknesses in terms of available medical skills and functional hospital and support equipment. As a starting point, compatible smaller hospitals should merge to enhance knowledge sharing, render quality healthcare services, jointly employ healthcare risk managers, and increase scale and scope economies. It is beneficial that these alliances start with smaller hospitals before progressing to medium- and large-sized hospitals.

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