

## Knowledge, Attitude and Perception of Pharmacists as Consumers of National Health Insurance Scheme (NHIS) in Calabar Metropolis, Cross River State, Nigeria

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### Abstract

*This study examines Knowledge, Attitude and Perception of Pharmacists towards their participation in NHIS in Calabar Metropolis. The survey design and purposive sampling techniques were adopted. A questionnaire was constructed and distributed to seventy (70) respondents. Fishers' exact test analysis was used to test the hypotheses. Results showed that pharmacists with adequate knowledge participated actively in NHIS (81.4%) more than those with inadequate knowledge (18.6%). It also showed that Pharmacists with positive attitude (75.7%) participated actively in NHIS than those with negative attitudes (24.3%) towards it. It further revealed that Pharmacists with positive perception (70%) participated in NHIS than those with negative perception (30%) towards it. Further analysis showed that all the respondents (100%) were aware of the existence of NHIS while 72 percent were familiar with the components of the scheme and how NHIS works. 81.4 percent showed confidence in the scheme and 85.7 percent agreed that they can encourage people to join the scheme. Also, from the study, 70 percent perceived that the scheme should continue despite flaws identified, 80 percent believed NHIS is the best policy to improve health care delivery in Nigeria and 92.9 percent agreed that it's an intervention that should be sustained. On the basis of these results it was recommended among others that government should provide the necessary incentives, facilities and other enabling environment that will facilitate appropriate knowledge and utilization of NHIS by pharmacists.*

**Keywords:** Knowledge, Attitude, Perception, Participation, NHIS

### Introduction

As part of government effort to address the problems in the health sector, the National Health Insurance Scheme was initiated to address the health problems in Nigeria. NHIS in Nigeria has been characterized by a lot of misconceptions, fears about workability of the scheme, concerns as regards workers' financial contribution to the scheme overtime and the sincerity of government in financing workers in the formal sector among others. This study therefore assessed the Knowledge, Attitude and Perception of Pharmacists towards National Health Insurance Scheme in Calabar Metropolis of Cross River State, Nigeria.

### Research objectives

1. To determine whether there is association between knowledge of Pharmacists and their participation in NHIS in Calabar Metropolis.

2. To determine whether there is association between attitude of Pharmacists and their participation in NHIS in Calabar Metropolis.
3. To determine whether there is association between perception of Pharmacists and their participation in NHIS in Calabar Metropolis.

### ***Research questions***

1. Is there any association between knowledge of Pharmacists and their participation in NHIS in Calabar Metropolis?
2. Is there any association between attitude of Pharmacists and their participation in NHIS in Calabar Metropolis?
3. How does the perception of Pharmacists associate with their participation in NHIS in Calabar Metropolis?

### ***Research hypotheses***

1. There is no significant association between knowledge of Pharmacists and their participation in NHIS in Calabar Metropolis.
2. There is no significant association between attitude of Pharmacists and their participation in NHIS in Calabar Metropolis.
3. There is no significant association between perception of Pharmacists and their participation in NHIS in Calabar Metropolis.

### ***Literature review***

#### **Concept of National Health Insurance Scheme (NHIS)**

The National Health Insurance Scheme (NHIS) was initiated to address the health problems in the country. The NHIS is a corporate body established under Act 35 of 1999 by the Federal Government of Nigeria to improve the health of all Nigerian's at an affordable cost.

The Health Insurance is a veritable tool for healthcare financing that comes in different models. It has been used by most advanced countries in its various forms to fund healthcare. Health Insurance is a social device for pooling the health risks and costs of an exposure unit with a view towards predictability (Awosika, 2015). Health insurance is an approach that protects insured persons from paying high treatment costs during an episode of sickness. The basic health insurance process is that a client makes a regular payment to a managing institution. This institution is responsible for holding the payments in a fund and paying a healthcare provider for the cost of the consumer's care (Conn and Walford, 2008).

The history of Social Health Insurance (SHI) is as old as the history of mankind. One of the first countries which instituted SHI nationally was Germany in 1883 (World Health Organization, 2009). Since then the concept of Social Health Insurance spread throughout the world. Currently, according to World Bank, the system is practiced in more than 60 countries of the world (World Bank, 2006). Some key features of SHI comprise legislation by government; regular and compulsory contributions by users; no possibility for eligible members to opt out of the scheme; premiums calculated according to ability to pay; standardized benefit packages; and contributions earmarked for spending on health services.

Many European states have long embarked on healthcare reforms by introducing SHI for increased efficiency and consumer satisfaction in provision of health care services (Stefan, 2014). It took decades for most of these developed countries to have SHI implemented (WHO, 2009). Some of the high-income countries which are successful in SHI include Germany, France, Belgium, Japan, Korea and Switzerland. It is interesting to note that Health insurance in many of these countries started when they were classified as lower-middle income countries. Germany was the first to do this through legislation; whereby workers earning less than a specific amount were enrolled in the sickness fund program of SHI. France followed in the year 2000 (World Health Organization, 2009).

In Germany, SHI is based on solidarity (i.e mandatory Health insurance for everyone within an income under specific amount) and subsidiary (the government provide only necessary framework of laws and regulations). More than 88 per cent of the population in Germany has mandatory insurance by the statutory Health insurance funds; 11% have private insurance policy or are civil servants who get their sickness costs reimbursed from their employers (Selbmann, Flohi and Volki, 2006).

In Japan, the system of Health insurance is currently financed through individual contributions, employer contributions, and government subsidies. This system accounted for 84 per cent of all health expenditures in the fiscal year 1996. Japan has three categories of Health insurance: Employer-based insurance, National Health insurance, Health insurance for the elderly (Fukawa, 2012).

In Belgium, Health insurance is compulsory and has been adopted for all salaried workers since 1944. The mechanism is based on National Fund for Sickness and Invalidity, in which the funds are collected and distributed to the mutual health funds that are in charge of administering compulsory health insurance (Hussey and Anderson, 2003). A replica of NHIS in South Africa is called the National Health Information System of South Africa (NHIS/SA). Its main goal is to provide affordable health for the people of South Africa at the local level. It is also extended to the district, provincial and national levels including the private and public sector. The health need of an average South African is reportedly well taken care of by this scheme (Kujenya, 2009).

A National Health Insurance Scheme was first proposed in Nigeria in 1962 under a bill introduced to parliament in the same year by the then Federal Minister of Health, Dr. M. A Majekodunmi. However, the idea of NHIS was re-introduced in the 1988 National Health Policy of Nigeria by the former Federal Minister of Health, the late Prof. Olukoye Ransome Kuti. The scheme suffered some setbacks as it had been be-devilled with lack of political will by the successive government and inter-professional rivalry within the rank of stake-holders. Still, the Federal government not wanting to relent in its efforts, took some concrete steps by enacting Decree 35 (NHIS) of 1999. It was enunciated by General Sanni Abacha who first launched the scheme in Abuja, to be followed by some state governors in their respective states. This again, was somehow characterized by administrative fumbling and the introduction of pilot schemes that were ill-advised and not backed by legislation.

The private sector wherein most of the health activities take place took the bull by the horn and launched Private Health Insurance Schemes in their respective organizations (Awosika, 2015). However, the pressure from the private sector and other stakeholders along with the enthusiasm of the former Federal Minister of Health, Prof. Eytayo Lambo led to a new launch of the scheme in June, 2005. This time as a formal public sector programme of the NHIS. The current NHIS is managed, controlled and supervised by a regulatory body known as the “Health Maintenance Organization” (HMO). This body provides oversight functions to the organizations that are involved in the direct delivery of health services to beneficiaries or members of the public. The health care providers under the scheme shall be a mix of public and private facilities in the spirit of public/private partnership. The members shall be free to choose and obtain services at any one of such registered Health care providers (Awosika, 2015).

The NHIS have offices in the 36 states of the Federation. It also has zonal offices in the six geo-political zones of the federation and a national office in the FCT, Abuja. On the whole, NHIS is managed by a governing council, which ensures the effective simple mutation of the policy and procedures of the scheme. The Governing Council is made up of 10 members, who are appointed by the President of the Federal Republic of Nigeria, on the recommendation of the Minister of Health (Omoruan, Bamidele and Philips 2009). The establishment of NHIS was informed by the following factors:

- (i) The general poor state of the nations’ health care services,
- (ii) The excessive dependency and pressure on government to provide health facilities,
- (iii) Dwindling funding of health care in the face of rising costs, poor integration of private health facilities to the nations’ health care delivery system (Acheson, (2009).

NHIS has kicked off in some states of the Federation like Oyo, Sokoto, Niger, Gombe, Imo, Bayelsa and Calabar Metropolis. The programme covers employees of the formal sector, i.e the public sector and the organized private sector. It is mandatory for every organization with ten (10) or more employees who have to contribute 5 per cent of their basic salary to the scheme; while their employers are expected to pay 10 percent for each of its worker under the scheme. By the provision of the scheme, a contributor and his or her spouse and four children under 18 years are free to access Medicare from any approved service provider. The contributor may also be required to pay 10% or a small co-payment at point of service.

In other to ensure that every Nigerian has access to good health care services, the National Health Insurance has developed various programmes to cover other segments of the society. This includes informal sectors, vulnerable group and disabled, retirees, unemployed, pregnant women and orphans (Omoruan, Bamidele and Philips 2009). The scheme is designed to:

- Ensure that every Nigerian has access to good health care services.
- Protect families from the financial hardship of huge medical bill limit the rise in the cost of health care services.
- Ensure equitable distribution of health care cost among different income groups.
- Ensure high standard of health care services delivery to Nigerians.
- Ensure efficiency in health care services.
- Improve and harness private sector participation in the provision of health care services.
- Ensure equitable distribution of health facilities within the federation.
- Ensure appropriate patronage of all levels of health care.
- Ensure the availability of funds to the health sector for improved services (Omoruan, Bamidele and Philips 2009).

### **Knowledge of National Health Insurance Scheme (NHIS)**

In most developing countries, Nigeria in particular, there is a clear lack of universal coverage of health care and access to health care is severely limited and awareness of health insurance scheme is very low (Otuoyemi, 2011). Low level of health insurance awareness and inability of the consumers to pay for the services as well as the health care provision that is far from being equitable has been identified among other factors to impose limitation on National Health Insurance Scheme to realize its goal of effective health care delivery (Sanusi and Awe, 2009). A social health insurance scheme involves contribution based on means, utilization and need. A health insurance scheme is an arrangement in which contributions are made on behalf of individuals or groups (members) to a purchasing institution (HMO) which is responsible for purchasing covered services from providers. (Kutzin, 2007). Ibiwoye and Adeleke (2007) reported that consumers' awareness creation on the importance or benefits of National Health Insurance Scheme is desirable for effective health care. A number of arguments are put forward to stress the advantages of health insurance in improving health care delivery. Ibiwoye and Adeleke stressed that low awareness level is responsible for low patronage, and the seemingly ineffective health care services. Health Scheme, according to Rigoli and Dussault (2013) can improve health care in the following ways:

- Insurance can increase the availability of resources for health care, freeing up limited public funds to be directed towards poor people
- Insurance offers a more predictable source of funding, compared with the unpredictability of tax finances. This also facilitates private investment in health
- The pooling of resources allows for cross-subsidies between those who are healthy and those who are sick, and between rich and poor.
- Insurance reduces uncertainty for citizens and gives them financial protection against improvement as a consequence of illness
- Health insurance schemes contribute to better-quality health care by separating the purchasing and provision of services especially if payment is based on performance.
- People are more willing to pay for health insurance than to pay taxes, as their contribution is linked to entitlement.

Irinoye (2014) asserted that consumer awareness of the benefits of NHIS is a factor in effective health care services. Irinoye stated further that social insurance arrangement is compulsory and is often designed to provide a minimum economic security for large groups of persons particularly those in the lower economic classes. It concerns itself with the unfavorable losses (income and cost) resulting from perils of accidental injury, sickness, old age, unemployment and the premature death of the family wage earner. The pharmacists need to have comprehensive knowledge of the National Health Insurance Scheme package as a desirable tool for satisfying their health needs. Olugbenga and Adebimpe (2010) carried out a descriptive cross sectional study on knowledge and attitude of civil servants among 400 civil servants in Osun State, Nigeria, using multi stage sampling method. The research instrument was pre-coded, semi structured, self-administered questionnaires. The result showed that the respondents had poor knowledge of the objectives and mechanism of operation of the NHIS scheme.

Also the civil servants showed fair attitude towards joining the scheme in this study. The researcher concluded that this could be improved upon, if stakeholders in the scheme could carry out adequate awareness seminars targeted at the civil servants.

Noah (2012) in reporting the existence of an association between consumers' knowledge in term of awareness of the potentials of National Health Insurance Scheme and the health service delivery stated that consumer awareness is necessary since the scheme is designed for them. The right time to start implementing NHIS is now, as the good health care for the poor must not wait for tomorrow that may never come. Noah concluded that if NHIS is to be effective, both economically and socially, the people have to acquire sufficient knowledge about the aspects of the scheme. Okaro, Ohangwu and Njoku (2010) carried out a study that targeted all the radiographers in South Eastern Nigeria. A 17-item questionnaire designed in line with the objectives of the study was used to collect data. Data collected were analyzed with statistical package for social sciences (SPSS). The result indicated that there was high level of awareness of the existence of NHIS in Nigeria among the Radiographers (n = 37, 100%). Seminars on the Hospitals were noted to be the major source of information about NHIS (n = 17, 45.9%), knowledge about the various aspects of the scheme was not encouraging.

The Radiographers however showed positive awareness towards the scheme. The Researchers agreed that NHIS is capable of improving health care delivery in Nigeria and admitted their willingness to participate in the scheme. The Researchers concluded that the awareness of the existence of the scheme was very encouraging. However, this was not translated into knowledge of principles of operation of the scheme. The Radiographers showed positive awareness towards the scheme. Seminars in hospital were noted to play important role in enlightening the healthcare professionals and should be encouraged.

### **Attitudes towards NHIS**

Attitude is a predisposition to make certain choices or to engage in particular acts. It is a specific mental state of the individual towards something according to which his behaviour is molded. Attitude implies the individual's prevailing tendency to respond favourably or unfavourably to an object, could be a person or group of people, institutions, events or programs (Ijeoma, 2014). Attitudes can be positive (values) or negative (prejudice). Social psychologist distinguished and study three components of the response:

- (a) Cognitive Component
- (b) Affective Component
- (c) Behavioral Component – which is the action taken towards the object (John, 2007).

Attitudes are interlinked with the person's knowledge, beliefs, emotions and value and they are either positive or negative (Pelto and Pelto, 2014). They have also described casual attitudes or erroneous attitudes, which are considered derivatives of beliefs and / or knowledge. Attitude can be proper or improper. Proper attitudes can improve practice which improper attitudes can have a harmful effect.

Ijeoma (2014) carried out a study on knowledge and attitude of health professionals towards the National Health Insurance Scheme (NHIS) in Asokoro District Hospital Abuja. The sample size was two hundred and sixty-six (266) health professionals. The instrument for data collection was questionnaire. Data were analyzed using descriptive statistics. Findings showed high acceptance of the scheme by the respondents which indicated their very high participation in the NHIS. The study concluded that health professionals (clinical consultants, registrars, medical officers, pharmacists, medical records officers, medical laboratory officers, physiotherapists, nurses and allied health and administrative) show very positive attitude towards NHIS and strongly agree that it should be made compulsory because it helps reduce financial burdens on their families, among other reasons.

Abdulqadir, Alhaji and Amadu (2012) carried out a study on knowledge, attitude, perception and clients' satisfaction with National Health Insurance Scheme services (NHIS) at Minna. A multi-stage sampling technique was used to sample 144 clients receiving NHIS services. The results indicated that all respondents had positive attitude towards the scheme. According to Adibe, Udeogaranya and Ubaka (2010) stated that awareness and interest towards government policies and programs can be aroused by individual attitude and behaviour. Whenever there are negative perception and attitude towards those policies and programs, such policies and programs are bound to fail. Attitude positions people into a frame of mind or liking or disliking things, of moving toward or away from them.

It is acknowledged that people have attitudes toward which could be favourable or unfavourable toward government policies. Ubong and Ukpong (2009) observed that awareness of government programmes and activities makes the people or the governed have positive attitude and perception towards these programmes, thus, improving their participation and responsiveness to these programs.

Thus, the growing number for health insurance indicates that there is a positive attitude towards it. The NHIS seems to meet the health care demands and improves standards of care. This is because attitude is strongly linked to behavior and behavior to interest. The Nigerian National Policy objective is the attainments of a level of health that will enable Nigerians achieve socially and economically productive lives (Adibe et al, 2010). Attitude towards health care help identify and inform priorities that support government program of NHIS.

People's beliefs and attitudes towards health care set the stage for how they react towards social policy such as health insurance. Attitudes help to frame how the experience and express their views about how satisfactory they are towards the health care (Yohersor, 2014). Attitudes about NHIS are shaped by personal knowledge acquired through participation in the scheme. When such attitudes are expressed positively, they can result in supportive and inclusive behaviours by others who are yet to benefit. When such attitudes are expressed negatively, they may result in avoidance; that is, criticizing and downplaying overt benefits. Favourable attitudes implies acceptance of health programme (Pyper, Ameny, Natson and Thomas, 2012).

### **1.10 Perceptions about NHIS**

The National Health Insurance Scheme (NHIS) is a social health insurance programme designed by the Federal Government of Nigeria to complement sources of financing the health care for the majority of Nigerians. The perception of many Nigerians is however different as far as the scheme is concerned. Okaro et al (2010) stressed that the perception of most Nigerians is that access to health care in Nigeria today is severely limited; and that the problem of poor funding has resulted in low quality of health services and facilities. Other perceptions held by people, according to Okaro et al includes: (i) Health facilities at all levels are dilapidated (ii) poorly equipped or dysfunctional facilities (iii)The poor management and deployment of the available health personnel translate to inefficient and ineffective health service delivery.

Eboh (2010) argued that the perception of consumers to National Health Insurance Scheme is vital to health care delivery. He also added that majority of the people believe that NHIS is the framework for sustainable funding that will support a model for implementing realistic changes in the Nation's health care reform if pragmatic and strategic efforts are supported unequivocally by political will. Some people also believe that there is the need for constant debate on Nigeria National Health Care System and the NHIS initiative for its better implementation among the stakeholders in Nigeria and relevant healthcare management experts in Diaspora (Irinoye, 2014).

Morphy (2010) reported that when it comes to providing customer service, health insurance companies are not just ailing, they are in a prolonged coma. Morphy stressed further that the general perception, even among many industry insiders, is that health insurance providers are not Customer-friendly not because there is too much paper work or too many maddening regulator-driven processes, rather, it is due to the fact that Health Insurance companies, by and large, are notorious for neglecting the most crucial element in their customer service operations: delivering straightforward, legalese-free explanation for their underwriting decisions. The situation is not changing, despite predictable rhetoric from congress and the occasional public outcry over an egregious misstep on the part of some insurers." In fact, I would say they are worse than they have ever been in keeping communication lines open with their customers,"

Ogbonnaya (2010) stated that consumers to NHIS perceive that the effectiveness of NHIS and the lack of ownership even by those that will implement it at the operational level makes realization of objectives of health care doubtful. Ogbonnaya stressed that the biggest challenge is for getting the wider public, most of whom are illiterate and unemployed to take ownership of the scheme and support its viability. Adeniyi and Onajole (2010) carried out a study on National Health Insurance Scheme (NHIS) among Nigerian dentists' in Lagos state, Nigeria. This study was designed to assess the knowledge and perceptions of Nigerian dentists to the National Health Insurance scheme (NHIS). A cross-sectional descriptive survey was conducted amongst 250 dentists employed in private and public dental clinics in Lagos State, Nigeria. The survey instrument was a self-administered questionnaire designed to assess their knowledge and attitudes towards the scheme. Data analysis was done using the Epi-Info statistical software (version 6.04). Statistical tools used included measures of central tendency, frequency distribution and chi-square test. The result showed that majority of the dentists involved in this study had some knowledge of the NHIS and were generally positively disposed towards the scheme and perceived it as a good idea. Commenting on customer perception of NHIS and health care delivery, Aderounmu (2010:13) reported that the scheme might just be a jamboree.

He argued that: The strategy is yet to be adequately substantiated in practical terms to account for the population of the unemployed, elderly and disabled people, pregnant women and all children who are under 18 years of age. The NHIS concept is ambitious but achievable except that the implementation could be marred by the usual bureaucratic bottleneck. Onuekwusi and Okpala (2008), maintained that successful implementation of the NHIS to a large extent depends on the perception and attitude of the health care providers. In a related work done to assess the awareness of NHIS among Health care consumers, the report showed that 65% of the respondents (Consumers) have received treatment from registered Health care providers under the NHIS programme. However, respondents who have been treated under the programme wanted the programme discontinued. This indicated that people have little hope in the programme (Sanusi and Awe, 2009). Sanusi and Awe concluded that the problems with the implementation of NHIS border on consumer awareness and perception of the sustainability of the programme in line with the objectives of its initiation.

Turkson (2009) carried out a study on clients' perceptions of the quality of healthcare delivery at the district level in rural Ghana, using the Komenda-Edina-Eguafo-Abrem District as a case study. 803 patients were purposively selected and interviewed after visits to health facilities using a pretested questionnaire, while Focus Group Discussions were held in 13 communities. Data collected were analyzed using Statistical Package for Social Sciences (SPSS). The study concluded that the quality of healthcare was generally perceived to be high except that patients were not told the diagnosis or given instructions or advise about their illness. There were also concerns about the attitude of some staff and unavailability of some drugs. The researcher agreed that clients' perception of health service is very important in assessing quality health care.

Anderson and Newman (2015) suggested that if health programmes are to succeed in resource-poor countries, it is important to get the opinions of the local people in addition to their degree of satisfaction with available services. Reich (2012) stated that the patient's perception of quality of care is critical to understanding the relationship between quality of care and utilisation of health services and is now considered an outcome of healthcare delivery. Agba (2010) reported in a study carried out to perceive the Impact of the National Health Insurance Schemes (NHIS) among registered staff in Federal Polytechnic, Idah, Kogi State Nigeria, 51.4 percent of the respondents said the scheme should not be scrapped. This is against 37.1 percent who were of the view that government should discontinue the scheme while 11.4 percent were undecided. Agba concluded that the scheme is judged to be ineffective, there is still room for improvement hence it should not be scrapped. As expressed by some of the respondents, the scheme should be sustained because it has brought some form of financial relief to some of the beneficiaries; it could serve as a source of motivation on workers if properly managed; it increases availability and affordability of functional health care to beneficiaries; and the scheme has the ability of affecting all the sectors of the economy because it takes good health to be productive (Agba, 2010).

### **Methods**

The study adopted descriptive survey method. A structured, closed ended and self-administered questionnaire was used to collect data. The population of the study consisted of all Pharmacists in different categories of Pharmacy practice in Calabar Metropolis. The categories include: Hospital Pharmacists, Community Pharmacists, Industrial Pharmacists, Academia Pharmacists, and Hospital and Administrative Pharmacists. The total number of Pharmacists in all categories was 127 (Pharmaceutical Society of Nigeria (PSN), CROSS River State chapter). Both the systematic sampling technique was used to select the sample for the study. This was done by using the list of all registered Pharmacists from January 2015 - May 2015 from the office of Secretary to Pharmaceutical Society of Nigeria (PSN), Calabar Metropolis. To draw the respondents of the study, every 3<sup>rd</sup> name in the list was chosen, and the chosen pharmacist was then located and served with the questionnaire instrument. Thus, the systematic sampling method was used to arrive at a sample of seventy (70). Data for the study was obtained from both primary and secondary sources. The primary source consisted of firsthand information obtained from respondents in the process of fieldwork. In this study, the questionnaire instrument was used to gather data. Data were analyzed using tables, percentages and Fishers' exact test analysis.

### **Statistical analysis**

#### **Distribution of respondents on Pharmacists' knowledge of NHIS**

All the respondents agreed that they have heard about NHIS as shown in Table1, item 1 in their positive response.

For item 2 which states that NHIS is restricted to certain class of people, majority responded positively to this as shown in the positive response 40 (57.2%), this implies that NHIS is restricted to certain class of people while a total number of 30(42.8%) responded negatively that NHIS is not restricted to certain class of people. 54(77.2%) respondents agreed by responding positively that there is a law that mandate every government worker to register with NHIS, 16(22.8%) respondents disagreed. 47(67.1%) were positive to item 4 which states that “NHIS ensures high standard of health care services delivery in Nigeria”. A total of 23(32.9%) respondents were negative.

In response to question 5 which states that “I am familiar with the components and how NHIS works”, a total of 55 (78.6%) respondents responded positively, 15(21.4%) disagreed. The majority, 58 (82.9%) agreed to item 6 that NHIS makes health care available to every government worker and four of their dependents under 18 years. For item 7 which states “The scheme is meant to pool resources from rich and poor to treat every Nigerian”, 29 (41.4%) respondents disagreed, 41(58.6%) respondents agree. Still on item 8, 58(82.9%) responded positively to the statement “I am aware that I can register with any hospital whether private or government” while 12 (17.2%) responded negatively to same question.

**Table 1: Distribution of respondents on their knowledge of NHIS**

S/n	Questionnaire items	Responses	
		Positive %	Negative %
1	I have heard about NHIS	70 (100%)	Nil
2	NHIS is restricted to certain class of people	40(57.2%)	30 (42.8%)
3	There is a law that mandates every work to register with NHIS	54(77.2%)	16(22.8%)
4	NHIS ensures high standard of health care services delivery in Nigeria	47 (67.1%)	23(32.9%)
5	I am familiar with the components and how NHIS works	55(78.6%)	15(21.4%)
6	NHIS makes health care available to every worker and their children under 18 years	58 (82.9%)	12(17.2%)
7	The scheme is meant to pool resources from rich and poor to treat every Nigerian	29 (41.4%)	41(58.6%)
8	I am aware that I can register with any hospital whether private or government	58 (82.9%)	12(17.2%)

#### Distribution of respondents on attitude towards NHIS

In Table 2, item 9 which states that “The scheme has many protocols which make accessibility to services difficult”, 48 (68.6%) respondents agreed while 22(31.4%) disagreed. For item 10, majority 5(7.1%) disagreed with the statement that says “I don’t feel like participating in the scheme”, 65(92.8%) respondents agreed with this. Likewise, 19(27.1%) respondents responded negatively to item 11 which states “I don’t like the idea of making NHIS scheme mandatory”, 51(72.9%) respondents agreed with this. Still on item 12 which states that “I cannot encourage anybody to register with NHIS”, out of 70 respondents, 68(97.1%) disagreed with this, 2(2.9%) agreed. For item 13 which states “I am willing to participate in the scheme because of its benefits”, majority of the respondents 64 (91.5%) agreed, 6 (8.5%) disagreed. 57 (81.4%) respondents responded positively to the statement “I have confidence in the scheme”, 13(18.6%) respondents responded negatively while 2(2.29%) were neutral to it.

**Table 2: Distribution of respondents on attitude to NHIS**

S/n	Questionnaire items	Responses	
		Positive %	Negative %
9	The scheme has many protocols which make accessibility to services difficult	48 (68.6%)	22 (31.4%)
10	I don’t feel like participating in the scheme	5(7.1%)	65 (92.8%)
11	I don’t like the idea of making NHIS scheme mandatory	19 (27.1%)	51 (72.9%)
12	I cannot encourage anybody to register with NHIS	2 (2.9%)	68(97.1%)
13	I am willing to participate in the scheme because of its benefits	64(91.5%)	6(8.5%)
14	I have confidence in the scheme	57(81.4%)	13(18.6%)

#### Distribution of respondents on perception to NHIS

In Table 3, out of 70 respondents, 56 (80%) respondents indicated positive response while 14 (20%) disagreed to item 15 which states “NHIS is the best policy to improve health delivery in Nigeria.



With respect to item 16, 16(22.9%) respondents agreed that the scheme is meant for people of high socio economic class but 54 (77.1%) respondents disagreed. Similarly, in item 17, majority of the respondents, 43(61.5%) disagreed that NHIS is another way of making some top government officials rich in their response but 27(38.5%) respondents agreed to it. According to item 18, 51(72.9%) respondents were of the opinion that corruption in Nigeria will frustrate the scheme while 19 (27.1%) respondents disagreed.

For item 19, 21(30%) felt that the programme should be discontinued, while 49(70%) disagreed which implies that they want the program to continue while 14(20%) expressed no feelings. Still on item 20, 44(62.9%) respondents agreed that there are so many flaws in NHIS scheme while 26(37.1%) respondents disagreed to this. For item 21 which states that:” I foresee NHIS failing as a result of inadequate health personnel”, 43(61.5%) respondents out of the population disagreed to this, while 27(38.5%) respondents agreed to this. For item 22, which states that NHIS is an intervention that should be sustained, 65(92.9%) respondents responded positively while 5(7.1%) disagreed.

**Table 3: Distribution of respondents on perception to NHIS**

S/n	Questionnaire items	Responses	
		Positive %	Negative %
15	NHIS is the best policy to improve health delivery in Nigeria	56( 80%)	14 (20%)
16	The scheme is meant for people of high socio economic class	16 (22.9%)	54(77.1%)
17	NHIS is another way of making some top government officials rich	27 (38.5%)	43(61.5%)
18	Corruption in Nigeria will frustrate the scheme	51(72.9%)	19(27.1%)
19	The programme should be discontinued	21 (30%)	49(70%)
20	There are so many flaws in the NHIS scheme	44(62.9%)	26 (37.1%)
21	I foresee NHIS failing as a result of inadequate health personnel	27(38.5%)	43(61.5%)
22	NHIS is an intervention that should be sustained	65(92.9%)	5 (7.1%)

## Results

### Hypothesis one

The first hypothesis states that there is no significant association between knowledge of Pharmacists and their participation in NHIS. The independent variable in this hypothesis is knowledge of Pharmacists while the dependent variable is pharmacists’ participation in National Health Insurance Scheme. To test this hypothesis, Fishers’ exact test analysis was used. The result of the analysis is presented in Table 7.

### Test of hypotheses

Hypothesis 1:

The first hypothesis of the study states that there is no significant association between knowledge of Pharmacists and their participation in NHIS. The independent variable of this hypothesis is knowledge of Pharmacists while the dependent variable is participation in NHIS. To test this hypothesis, the Fishers’ exact test analysis was adopted. The result of the analysis is presented in Table 4.

**Table 4: Fishers’ exact test analysis of the association between knowledge of pharmacists and their participation in NHIS (n=70)**

		Participation in NHIS		Total	Fishers Exact Test
		Active	Inactive		p-value
Civil servants’ knowledge in NHIS	Adequate	57(81.4)	2(2.9)	59(100.0)	.317
	Inadequate	10(18.6)	1(1.4)	11(100.0)	
Total		67(100)	3(4.3)	70(100.0)	

$P > 0.05$ , Critical  $r = .05$

Table 4 shows that the calculated P - value of 317 is greater than the critical P-value of .05 at 5 per cent level of significance.

This shows that a significant association exists between pharmacists' knowledge and their participation in NHIS in Calabar Metropolis in Cross River State. It further implies that pharmacists with adequate knowledge participated actively in NHIS (81.4%) more than those with inadequate knowledge (18.6%).

### Hypothesis two

The second hypothesis of the study states that the attitude of Pharmacists has no significant association with their participation in NHIS. The independent variable in this hypothesis was attitude of Pharmacists while the dependent variable is participation of Pharmacists in National Health Insurance Scheme. To test this hypothesis, Fishers' exact test analysis was used. The result of the analysis is presented in Table 5.

**Table 5: Fishers' exact test analysis of the association between attitude of Pharmacists and their participation in NHIS (n=70)**

		Participation in NHIS		Total	Fishers Exact Test
		Active	Inactive		p-value
Pharmacists' attitude toward NHIS	Positive	53(75.7)	3(4.3)	56(100.0)	1.000
	Negative	14(24.3)	0(0.0)	14(100.0)	
Total		67(100)	3(4.3)	70(100.0)	

$P > 0.05$ , Critical  $r = .05$

Table 5 shows that the calculated P – value of 1.000 is greater than the critical P-value of .05 at 5 per cent level of significance. This shows that there is significant association between attitude of Pharmacists and their participation in NHIS in Calabar Metropolis of Cross River State, Nigeria. It further implies that Pharmacists with positive attitude (75.7%) participated actively in NHIS than those Pharmacists who exhibit negative attitude (24.3%) towards it.

### Hypothesis three

The third hypothesis of the study states that there is no significant association between perception of Pharmacists and their participation in NHIS. The independent variable in this hypothesis is perception of Pharmacists while the dependent variable is participation of pharmacists in National Health Insurance Scheme. To test this hypothesis, Fishers' exact test analysis was used. The results of the analysis are presented in Table 6.

Table 6: Fishers' exact test analysis of the association between perception of Pharmacists and their participation in NHIS (n=70)

		Participation in NHIS		Total	Fishers Exact Test
		Active	Inactive		p-value
Pharmacists' perception of NHIS	Positive	49(70.0)	2(2.9)	51(100.0)	1.000
	Negative	17(30.0)	22.9)	19(100.0)	
Total		66(100)	4(5.7)	70(100.0)	

$P > 0.05$ , Critical  $r = .05$

Table 6 shows that the calculated P – value of 1.000 is greater than the critical P-value of .05 at 5 per cent level of significance. This shows that there is significant association between perception of Pharmacists and their participation in NHIS in Calabar Metropolis of Cross River State, Nigeria. It further implies that Pharmacists with positive perception (70%) participated in NHIS than those Pharmacists who exhibit negative perception (30%) towards it.

## Discussion

### Knowledge of Pharmacists and their participation in NHIS

The first finding revealed that knowledge of Pharmacists has significant association with their participation in NHIS in Calabar Metropolis. This finding supports Irinoye (2014) that consumers' awareness of the benefits of NHIS encourages or motivates them to participate in National Health Insurance Scheme. This finding was highly consistent with Ibiwoye and Adeleke (2007) that consumers' knowledge of the importance or benefits of National Health Insurance Scheme is desirable in health care delivery. Pharmacists are considered in this study as consumers of health care service under National Health Insurance Scheme.

The finding also agrees with Noah (2012) that consumers' knowledge of the potentials of National Health Insurance Scheme is important in health care services since the scheme is designed for them. The findings further support Onekwusi and Okpala (2008) that consumer awareness of the implementation of the National Health Insurance Scheme is needed to achieve the objectives of the health care delivery. The effectiveness of National Health Insurance Scheme both economically and socially depends on consumers acquiring sufficient knowledge about the aspects of the scheme. In Calabar Metropolis, NHIS exists and is effectively implemented. For instance, from Table 3, item 10, all the Pharmacists, both in hospital and community under this present study have heard about NHIS, this was confirmed by all the 70(100%) respondents.

The present study also shows that they have good knowledge that there is a law that mandates every worker to register with National Health Insurance Scheme as shown in response of 45(64.3%) on item 4. This is in compliance with the law establishing NHIS in Nigeria (Act 35 of 1999), and also 56 (72.9 %) respondents from the study believed that NHIS makes health care available to every participant and four of their dependents under 18 years of age. These are part of the objectives of the scheme to improve the quality of health care delivery. Pharmacists in Calabar Metropolis have comprehensive knowledge of the National Health Insurance Scheme package as a desirable tool for satisfying their health needs. However, the significant association implies that the knowledge of Pharmacists and their participation in National Health Insurance Scheme had been observed by consumers of NHIS (Pharmacists). From the study, it was observed that the scheme in Calabar Metropolis ensures high standard of health care delivery. This is captured in Table 3, item 13 which indicates that 45 respondents out of 70 respondents agreed while 16 responded negatively. Majority of the respondents 58(82.9%) knew that they can register with any government approved hospital whether private or public. This further accentuates the participation of Pharmacists in the scheme based on this knowledge.

#### **Attitude of Pharmacists and their participation in NHIS**

The second finding revealed that attitude of Pharmacists has significant association with their participation in National Health Insurance Scheme in Calabar Metropolis. This significant association implies that attitude of Pharmacists to health insurance scheme is a very important factor in health care delivery.

The findings of this study support Ubong and Ukpong (2009) who observed that positive attitude and perception of people towards NHIS programme improve their participation and responsiveness to it. Thus, the growing number for health insurance indicates that there is a positive attitude towards it.

Similarly, the current study is in line with Ijeoma (2014) who carried out a study on knowledge and attitude of health professionals towards the National Health Insurance Scheme (NHIS) in Asokoro District Hospital Abuja and reported that health professionals (clinical consultants, registrars, medical officers, pharmacists, medical records officers, medical laboratory officers, physiotherapists, nurses and allied health and administrative) show very positive attitude towards NHIS and strongly agree that it should be made compulsory because it helps reduce financial burdens on their families, among other reasons. In this present study, Pharmacists show positive attitude toward National Health Insurance Scheme as captured in table 4, most of the respondents, 71.4 percent demonstrated their willingness to participate in the scheme and also showed their willingness to encourage anybody to register (60 out of 70 respondents representing 85.7% agreed) with National Health Insurance Scheme because of its benefits. Likewise, 57(81.4%) respondents have confidence in the scheme, this is a strong positive attitude exhibited.

#### **Perception of Pharmacists and their participation in NHIS**

The last finding of the study revealed that perception of Pharmacists has significant association with NHIS in Calabar Metropolis, Nigeria. The more positive the perception by people about NHIS, the greater the acceptance. David's (2008) findings have been supported by this hypothesis. David stated that the consumers' perception of National Health Insurance Scheme is vital to health care delivery. The findings support Sanusi and Awe (2009) who concluded that health services users are important in assessing the nature of health service delivery. Their perception of the quality of the programme is one of the most important determinants in the success of sustainable health care services to the citizenry. This is also in agreement with findings in Ghana by Turkson (2009) that patient's perception of quality of care is critical to acceptance and utilisation of health services.

The present study revealed that majority of respondents, 56 (80%) perceived that NHIS is the best policy to improve healthcare delivery in Nigeria. Also, from the available data in this study, majority of respondents 54 (77.1%) do not believe that the scheme is meant for people of high socio economic class. Many respondents 43(61.5%) had a contrary opinion that NHIS is another way of making some top government officials rich. It was also perceived by 51(72.9 %) respondents that corruption in Nigeria will frustrate the scheme. In contrary, 70% representing 49 respondents out of 70 respondents disagreed that the program should be discontinued. This is contrary to the study carried out by Sanusi and Awe in 2009, where respondents who have been treated under the programme wanted it discontinued indicating that people have little hope in the programme. This might be due to low level of awareness or poor knowledge of the scheme in 2009 which have been improved upon. Evidence from this study also indicated that majority of the respondents, 44 (62.9%) of Pharmacists in Calabar Metropolis stressed that there are so many flaws in NHIS scheme. Notwithstanding, the respondents still believe that NHIS is an intervention that should be sustained as shown on Table 5, item 31. Respondents did not see NHIS failing as a result of inadequate health personnel as confirmed by 43 respondents representing 61.5%. Though many of the respondents 43 (37.1%) felt like participating in the scheme because it will not fail. This implies that Pharmacists in Calabar Metropolis still perceive that the NHIS program will work.

The findings further indicate that the respondents perceived the scheme to be worthwhile and necessary for their wellbeing. In other words, the perception of Pharmacists in Calabar Metropolis is high and positive despite the fact that they pointed out some challenges such as making NHIS scheme mandatory, many protocols in provision of health care services. For now, the benefits of the scheme especially to participants have endeared many who initially were not keen in participating in it; and this has also raised their perception of the scheme. For example, somebody on Grade Level 1 contributing just ₦170 will receive the same care with another on consolidated salary scale and contributing over ₦10,000. That is, when the fellow paying ₦170 gets sick with malaria, the treatment is the same as he pays according to his ability. So there appears to be a fair distribution in health expenditure because the more salary you get the more you pay.

### **Conclusion**

From the findings of the study, it can be concluded that among the registered Pharmacists in Calabar Metropolis, the awareness of the existence of the scheme was very encouraging and this was translated into knowledge of principle of operation of the scheme which was high. The Pharmacists showed positive attitude towards the scheme and they were of the opinion that the scheme should continue. In spite of a well-structured health system in Nigeria, development of the Primary Health Care (PHC) has not improved the health experience of the population. As part of government effort to address the problems of health care delivery, the National Health Insurance Scheme (NHIS) was initiated.

Despite few challenges identified in this present study confronting the program registered Pharmacists in Calabar Metropolis will not abandon the programme because of the lofty benefits inherent in the scheme. For example, the beneficiaries of the scheme have realized that standard health care is received with little or no cost. The scheme has also solved the problem of substandard drugs and inequality in the health care services. Also the Pharmacists, being consumers of health care, have the right to choose from any hospital and get the same care irrespective of the salary level. The scheme has also reduced the rising cost to health. Consequently, it was discovered that Pharmacists' knowledge of NHIS and their attitude towards NHIS are critical to improving their participation and responsiveness to NHIS program. Similarly, private sector participation (community Pharmacies) was found to improve standard of health care services especially as it relates to equal distribution of health care cost among different income groups.

Also Pharmacists' perception of NHIS was found to enhance quality of health care services in terms of acceptance. Through NHIS, consumers' families in Calabar Metropolis are protected from the financial hardship of huge medical bill and assured of efficient and high standard of health care services delivery. On the basis of these results, it is imperative that the government should be more committed towards the implementation of the National Health Insurance Scheme (NHIS) because of its laudable objectives such as ensuring high standard of health care services to Nigerians. The health insurance scheme should be seen as a fundamental social welfare scheme meant to reduce the cost of health care of people of Cross River State. More so, the NHIS programme should be effectively monitored, supervised and controlled by special task force to check corruption in the scheme.

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