UTILIZATION OF TERTIARY INSTITUTIONS SOCIAL HEALTH INSURANCE PROGRAMME (TISHIP) AMONG UNDERGRADUATE STUDENTS IN ENUGU STATE

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ABSTRACT

Introduction

Utilization of Health Insurance Scheme services varies for a variety of reasons but it appears that the determining factors are universal.TISHIP was developed to counteract the detrimental effects of user fees which sometimes lead to catastrophic health expenditures. This study aimed to ascertain level of awareness and utilization of TISHIP in tertiary institution in Nigeria

Methods

The study was carried out among full time undergraduate studentsEnugu State University of Science and Technology, Enugu state. Nigeria. Analytical cross sectional study design involving use of questionnaire was done. Chi Square test and Binary logistic regression were used to ascertain socio-demographic factors influencing utilization of TISHIP.

Results

Majority of respondents were aged 21-25 years 149(48.7%) and lived off-campus 267(87.3%). About 137(44.8%) were aware of TISHIP with major source of awareness from friends/relatives 82(59.8%). Also 60% had positive attitude, 88(28.8%) has registered for the programme and 46(52.3%0 registered >1 year ago. Major factors influencing TISHIP includes; long waiting time 195(63.7%) and poor attitude of the medical staff 186(60.8%). There were statistical significant associations between use of TISHIP with address, education and occupation of both parents. (p< 0.05). Identified predictors were being females (AOR 0.74; 95% CI 0.35-0.96), living in hostel (AOR 3.24; 95% CI 1.52-6.77), father being civil/public servant (AOR 2.34; 95% CI 1.66-5.61) and mother being civil/public servant (AOR 3.13; 95% CI 1.02-7.54).

Conclusion

The study showed that knowledge on TISHIP was poor, Also utilization of TISHIP was poor However, majority had positive attitude on TISHIP. There is need for improvement especially as regards sensitization and dissemination on availability of TISHIP to achieve the set objective of the programme.

Key words: Tertiary, Health, Insurance, Students

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INTRODUCTION

ealth services utilization is a c o m p l e x b e h a v i o u r a l phenomenon. Pragmatic studies of preventive and curative services have often noted that health services utilization is linked to the organization of the health delivery system and the availability, standard and cost of services, along with social structure, health beliefs and personal traits of the users.^{1,2}

Correspondence to: Ndu Anne C Department of Community Medicine University of Nigeria Enugu Campus, Enugu State, Nigeria. Health insurance is attracting more and more attention in low- and middle-income countries as a means for improving health care utilization and protecting households against impoverishment from out-of-pocket expenditures.³ The health financing mechanism was developed to counteract the detrimental effects of user fees which appear to inhibit heath care utilization, particularly for marginalized populations, and sometimes lead to catastrophic health expenditures. The World Health Organization (WHO) considers health insurance a promising means for achieving universal health-care coverage.⁴It offers an

easy access to healthcare at an affordable cost through various repayment systems with a view to improving the health status of countries including Nigerians.⁵

The Tertiary Institutions Social Health Insurance Programme (TISHIP) is a social security system whereby the healthcare of students in tertiary institutions is paid from funds pooled through the contributions of students, government subsidies and mandates, charitable and philanthropic organizations. It is an arm of the National Health Insurance Scheme (NHIS), which provides quality healthcare to students in Nigerian higher institutions. The purpose of TISHIP is to cater for the health care needs of Nigerians, aged 18 years and above, within tertiary institution, who by nature of their age and studentship status, cannot benefit under other health insurance programme.6 This aims toensure that every student in Tertiary institutions has access to good health services, protect students and families from the financial hardships of huge medical bills, maintain high standard of healthcare delivery services within Tertiary Institutions and ensure availability of funds to the tertiary institution health centres for improved services.6

Students are among the dependent population, may fall sick while in school and this if not promptly and appropriately managed negatively affects their academic performance. Taking care of their healthcare services is an enormous financial burden both on the students and on their parents and guardians. This prompted the government to introduce the TISHIP programme to tertiary institutions in Nigeria to cushion this economic burden.⁷ Many students are not aware of the TISHIP program and those who are sensitized about it still doubt about the authenticity of the program and this limit their participation. Also, not every student in tertiary institution are been covered. Study done in Ahmadu Bello University documented that initially TISHIP started with only regular students but now it covers all diploma, post graduate and non-degree students since they are all under tertiary institution. In a retrospective assessment of the TISHIP at University of Jos Health Centre from 2010 to 2013 found that only the full time students were considered eligible and registered under the TISHIP.

The utilization of Health Insurance Scheme services varies across different cultures for a variety of reasons but it appears that the determining factors are universal. It is determined not only by its availability but by a number of other factors including; location and distance to facility, Client's perception of accessibility, services, Self-rated health status, Providerrelated factors, income and education level.9 A study on the perception of students to factors affecting the utilization of health services in tertiary institutions in South-Western Nigeria, factors identified includes; inadequate referral services, high cost of drugs, time spent in waiting for treatment, satisfaction with services and non-availability of essential drugs. Accessibility to health facility and studentsmedical staff relationship, however, were not considered to be factors affecting utilization of university health services. 10

The level of awareness and utilization of TISHIP in various tertiary institutions in Nigeria is uncertain because there is not enough research done on the use of the programme. Based on this, this study will re-assess the level of awareness and utilization of TISHIP and possible constraints to its usage and possibly suggest workable means of achieving the set target of persons enrolled into the insurance scheme.

METHODS

The study area was at Enugu State University of Science and Technology (ESUT). The main campus of the school is located at Agbani local Government Area in Enugu state. Enugu state is located in Southeastern part of Nigeria. The University is made up of nine faculties, fifty department and about five thousand students. The study was among full time undergraduate students. Analytical cross-sectional study was done using pre-tested, semi-structured, self-administered questionnaires. Respondents were selected by proportionally allocating equitable number of students to faculties, levels of study and consecutively recruiting the students studied. Analysis was done using IBM Statistical Package or Social Science version 21. Results were presented in tables. Likert scale was converted to two categories: positive and negative, for interpretation. Chi Square test was used to ascertain associations between socio demographic of respondents with use of TISHIP. Binary logistic regression was used to assess the predictors of use of TISHIP. Level of significance was at p = 0. 0 Ethical clearance was from Health Research and Ethics Committee of University of Nigeria Teaching Hospital, Ituku-Ozalla, Participation in the study was voluntary and was based on informed consent. Confidentiality was maintained.

RESULTS

Table 1 shows the socio-demographic characteristics of respondents. The mean age of the respondents was 21.4 years and standard deviation of 4.2 years. Majority of the patients were aged 21-25 years 149(48.7%), lived off-campus 267(87.3%), fathers' had tertiary education 159(52.1%), mothers' had tertiary education 157(51.5%), fathers were civil/public servants 126(41.2%), mothers were civil/public servants 138(42.1%) and males equal to

females 153(50.0% each)

Table 2 shows knowledge on TISHIP. About 137(44.8%) were aware of TISHIP with major source of awareness from friends and relatives 82(59.8%). On correct knowledge on concepts of TISHIP; 117(47.6%) knowledge of meaning, 112(36.6%0 where it can be accessed, 99(32.4%) services rendered and 90(29.4%) contributors to the funding. Also 168(54.9%) were willing to participate and 79(25.8%) even willing to pay to access the services not rendered.

Table 3 shows attitude towards and utilization of TISHIP. About 60% of respondents had positive attitude on activities of TISHIP including; reduction in medical bills 201(65.6%), enhancement in efficiency of health care 183(59.8%) and programme worthy of the financial contribution 186(60.8%). Equally 77(25.2%) are of opinion that it should be discontinued. Eighty eight(28.8%) has registered for the programme and 46(52.3%0 registered >1 year ago. However only 20(40.0%) have used it for 3 times or more in past I year. Major reasons for not registering in TISHIP were 81(37.2%) did not know about it and 55(25.2%) had no time to register.

Table 4 shows suggested factors affecting utilization of TISHIP services. Major factors suggested includes; Long waiting time at the medical centre 195(63.7%), poor attitude of the medical staff 186(60.8%), imaging investigations are not covered by the scheme 173(56.5%) and major surgeries not covered 164(53.6%).

Table 5 shows the relationship between socio-demographic characteristics and use of TISHIP. There were statistical significant associations between use of TISHIP with address (p < 0.001), Fathers education (p < 0.001), mothers education (p < 0.001),

Fathers occupation (p < 0.001) and Fathers education (p = 0.016). There was no statistical significant associations with age (p = 0.110) and sex (p = 0.130).

Table 6 shows that the respondents that were aged 16-20 years were about 1.6 times (AOR 1.56; 95% CI 0.68-10.26) more and those aged 21-25 years about 1.9 times (AOR 1.91; 95% CI 0.24-3.79) likely to have used TISHIP than those aged >25 years. Males were about 0.7 times (AOR 0.74; 95% CI 0.35-0.96) likely to have used TISHIP than females. Those that live in hostel were about 3.2 times (AOR 3.24; 95% CI 1.52-6.77) likely to have used TISHIP than those off-campus. Those whose fathers had primary education were 0.6 times (AOR 0.59; 95% CI

0.24-1.44) likely while and those that had secondary education were about 0.5 times (AOR 0.54; 95% CI 0.32-3.30) likely to have used TISHIP than those that had tertiary Those whose mothers had education. primary education were similarly (AOR 0.96; 95% CI 0.74-3.41) likely while and those that had secondary education were about 0.5 times (AOR 0.45; 95% CI 0.22-6.42) likely to have used TISHIP than those that had tertiary education. Those whose fathers were Civil/public servants were about 2.3 times (AOR 2.34; 95% CI 1.66-5.61) likely to have used TISHIP than others. Those whose mothers were Civil/public servants were about 3.1 times (AOR 3.13; 95% CI 1.02-7.54) likely to have used TISHIP than others.

Table 1 Socio-demographic characteristics of respondents

Variable	Frequency (n=306)	Percent (%)	
Age in categories(years)			
15-20	134	43.8	
21-25	149	48.7	
>25	23	7.5	
Mean(SD)	21.4(4.	21.4(4.2)	
Sex			
Male	153	50	
Female	153	50	
Address			
Hostel	39	12.7	
Off-campus	267	87.3	
Nova devicación			
None	66	21.5	
Primary	50	16.3	
Secondary	31	10.1	
Tertiary	159	521	
Mother's educational level			
None	58	18.9	
Primary	49	16.0	
Secondary	41	13.4	
Tertiary	157	51.5	
Occupation of father			
Business	80	26.1	
Civil/public servants	126	41.2	
Others	110	35.9	
Occupation of mother			
Business	117	38.2	
Civil/public servants	138	42.1	
Others	51	16.1	

Table 2: Knowledge on TISHIP

Variable	Yes	No
	Freq(%)	Freq(%)
Awareness of TISHIP	137(44.8)	169(55.2)
Source of awareness	Freq	Percent
Mass Media (Billboard, Television, Radio)	46	33.5
Friends/Relatives	82	59.8
Other (Health workers, etc)	9	6.6
Knowledge on meaning TISHIP	Yes	No
Correct	117	47.6
Incorrect	129	52.4
Knowledge where it can be accessed		
Correct	112	36.6
Incorrect	194	63.4
Services that are rendered by TISHIP		
Correct	99	32.4
Incorrect	207	67.4
Contributors to the funding of the TISHIP programme		
Correct	90	29.4
Incorrect	216	70.6
Willingness to participate		
Yes	168	54.9
No	138	45.1
Willingness to pay more to access the services not rendered		
Yes	79	25.8
No	227	74.2

Table 3: Attitude towards and utilization of TISHIP

	Positive	Negative
ATTITUDE	Freq (%)	Freq (%)
NHIS/TISHIP reduces the burden of medical bills	201(65.6)	105(34.4)
NHIS/TISHIP will promote equity in healthcare delivery	178(58.2)	128(41.8)
NHIS/TISHIP will promote improved health facilities	184(60.1)	122(39.9)
NHIS/TISHIP will enhance efficiency in healthcare delivery	183(59.8)	123(40.2)
The TISHIP programme is necessary	199(65.0)	107(35.0)
The TISHIP programme is worth the financial contribution to it	186(60.8)	120(39.2)
The TISHIP programme should be discontinued	77(25.2)	229(74.8)
UTILIZATION		
Registration of TISHIP	Frequency	Percent
Yes	88	28.8
No	218	71.2
Reasons for not registering		
Didn't know of TISHIP	81	37.2
Have not had any need of the service	49	22.5
Didn't think it necessary to register	21	9.6
Takes too long to register	12	5.5
Have not had time to register	55	25.2
Time of registration (n = 88)		
	42	47.7
>1 year	46	52.3
Respondents who have received care under TISHIP in 1 year	•	
Yes	50	16.3
No	256	83.7
Utilization of TISHIP services in the past one year $(n = 50)$		
Once	13	26.0
Twice	17	34.0
Three times	20	40.0

Table 4: Suggested factors affecting utilization of TISHIP services

	Positive	Negative
Variable	Freq (%)	Freq (%)
Long distance to the medical centre	156(51.0)	150(49.0)
Poor access road to the medical centre	148(48.4)	158(51.6)
Poor transportation to the medical centre	162(53.0)	144(47.0)
Long waiting time at the medical centre	195(63.7)	111(33.3)
Bad attitude of the medical staff	186(60.8)	120(39.2)
Poor communication skill of the staff of the medical staff	156(51.0)	150(49.0)
Imaging investigations are not covered by the scheme	173(56.5)	133(43.5)
Minor surgeries are not covered by the scheme	149(48.7)	157(51.3)
Major surgeries are not covered by the scheme	164(53.6)	142(46.4)
Prescribed spectacles and contacts are not covered by the scheme	143(46.7)	163(53.3)
The drugs covered do not meet all my healthcare needs	163(53.3)	143(46.7)
Prescribed drugs are usually not available	160(52.3)	146(47.7)
High additional costs are required for services not covered	140(45.8)	166(54.2)

Table 5: Associations of socio-demographic characteristics and use TISHIP.

	Use of	TISHIP	
Variables	Yes	No	χ ² (p value)
	Freq(%)	Freq(%)	,
Age in categories(years)			
16-20	42(31.3)	92(68.7)	4.41 (0.110)
21-25	36(24.2)	113(75.8)	
>25	10(43.5)	13(56.5)	
Sex			
Male	38(24.8)	115(75.2)	2.30 (0.130)
Female	50(32.7)	103(67.3)	
Address			
Hostel	24(61.5)	15(38.5)	23.44(0.000)
Off-campus	64(24.0)	203(76.0)	(*****)
1			
Father's educational level			
None	16(24.2)	50(75.8)	
Primary	19(38.0)	31(72.0)	19.27 (0.000)
Secondary	18(58.1)	13(41.9)	
Tertiary	35(22.0)	124(78.0)	
Mother's educational level			
None	13(22.4)	45(77.6)	
Primary	17(34.7)	32(65.3)	27.29 (0.000)
Secondary	25(61.0)	16(39.0)	
Tertiary	33(21.0)	124(79.0)	
Occupation of father			
Business	14(17.5)	66(82.5)	
Civil/public servants	49(38.9)	77(61.1)	13.34 (0.001)
Others	25(22.7)	85(77.3)	13.54 (0.001)
Occupation of mother			
Business	25(21.4)	92(78.6)	
Civil/public servants	51(37.0)	87(63.0)	8.33 (0.016)
Others	12(23.5)	39(76.5)	

Table 6: Factors influencing utilization of TISHIP.

Variables	AOR	95% CI of AOR
Age in categories(years)		
16-20	1.56	0.68-10.26
21-25	1.91	0.24-3.79
>25	1	1
Sex		
Male	0.74	0.35-0.96
Female	1	
Address		
Hostel	3.24	1.52-6.77
Off-campus	1	
Father's educational level		
None	0.81	0.44-2.36
Primary	0.59	0.24-1.44
Secondary	0.54	0.32-3.30
Tertiary	1	
Mother's educational level		
None	1.01	0.44-2.36
Primary	0.96	0.74-3.41
Secondary	0.45	0.22-6.42
Tertiary	1	
Occupation of father		
Business	1.03	0.85-4.70
Civil/public servants	2.34	1.66-5.61
Others	1	
Occupation of mother		
Business	1.26	0.92-8.32
Civil/public servants	3.13	1.02-7.54
Others	1	

DISCUSSION

This study reported that about a half of respondents were aware of TISHIP with major source of awareness from friends and relatives. On concepts of TISHIP; about half had correct knowledge of meaning, a third where it can be accessed, services rendered and contributors to the funding. More than half were willing to participate. This though revealing is poor considering the benefits of the programme as this will negatively impact on improving health care utilization among this disadvantaged and dependent population. A study in Anambra state had a contrasting finding as all the students reported to have known about TISHIP

through various means even though that only about two-third got the actual meaning of TISHIP.¹¹

Majority of respondents in this study had positive attitude on activities of TISHIP including; reduction in medical bills, enhancement in efficiency of health care and programme worthy of the financial contribution. Equally majority was of opinion that the programme should be continued. This finding is in keeping with a study done in Kano, Nigeria, where a reasonable percentage of the respondents were of the opinion that NHIS is a good initiative; though a significant proportion

had a reservation for the scheme.¹² Similarlyan overwhelming number of the students were of the opinion that TISHIP should continue even when a few attributed unfriendly attitude of healthcare professionals' to students as factor making students not feeling satisfied with the quality of care they received.¹¹ However another study found that many respondents wanted NHIS to be discontinued due to skepticism on the part of the respondents on drugs issued under the scheme.¹³

Findings from this study showed that only about a third has registered for the programme with about a half of them registered more than a year ago. Major reasons for not registering in TISHIP were that they did not know about it and that they had no time to register. This is not encouraging and more sensitization needed for the scheme to achieve its desired aim. The above result also shows a majority of students perceive TISHIP as necessary as well as that majority of the sampled students' showed willingness to use TISHIP, though few were undecided as regards using the programme. This seems to be in agreement with a work done in 2010 in Osun, Nigeria, where a high willingness among the health service consumers was also noted.14 A summary of the students' assessment of TISHIP program showed that only about half of the students believed that the institution is utilizing this program with about one-third not actually sure of its utilization although, more than half of the respondents had benefited from the scheme.11

Major factors suggested affecting utilization of TISHIP were long distance to the medical centre, long waiting time at the medical centre, poor attitude of the medical staff, imaging investigations are not covered by the scheme and major surgeries not covered. The long distance to medical centre

as a militating factor was however not surprising as majority of respondents reside off-campus. These findings correlate with a study done in South-West Nigeria as well as that conducted University of Benin, Nigeria in which the significance of similar factors as long time spent in waiting for services, high cost of services and availability of essential drugs and relationship with medical staff were identified. 10,15 This was in keeping with findings made by studies done in Ibadan and in Kogi State, Nigeria which access to and distance from health centres were found to be particularly important. 16,17 The major drawbacks to TISHIP implementation as reported by the students was lack of essential drugs in addition to others like long waiting time and poor service delivery, poor attitude and behavior of service providers and inadequate knowledge and awareness of the scheme.11

There were statistical significant associations between use of TISHIP with address, education and occupation of both parents. Identified predictors were being female, living in hostel, father and mother being civil/public servants. Other studies noted that religion, cost of health services, distance of health facilities, waiting time and quality of care, were found to be contributory to the non-utilization of health facilities.¹⁸ In a study of some factors affecting utilization of health services, in the University of Benin, Alakija stated that easy accessibility to the medical centre, time spent in waiting for treatment, studentsmedical staff relationship and availability of essential drugs were among factors affecting utilization of services. 19 There could be many reasons why patients may choose to attend a health facility. In this study, majority of the enrollees chose the sick bay because of its proximity to their hall of residence and are enrolled in the scheme because it is the only one around, thus they

are left with no choice 20

CONCLUSION

Our study showed that there is need for improvement, especially as regards the knowledge and utilisation of TISHIP among the respondents. About half of the respondents had not heard about TISHIP nor do they know where such services can be accessed. However, majority had positive attitude but poor level of utilization of TISHIP. There were some barriers to the use of TISHIP, conversely identified predictors were being female, living in hostel, father and mother being civil/public servants. Sensitization and dissemination on availability of TISHIP is essential for change in knowledge, attitude and utilization of the programme.

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