



ISSN: 0975-833X

Available online at <http://www.journalcra.com>

INTERNATIONAL JOURNAL
OF CURRENT RESEARCH

International Journal of Current Research
Vol. 10, Issue, 11, pp.75118-75125, November, 2018

DOI: <https://doi.org/10.24941/ijcr.32924.11.2018>

RESEARCH ARTICLE

RESEARCH ON THE LEVEL OF PUBLIC KNOWLEDGE AND AWARENESS ABOUT GLOBAL WARMING IN TERMS OF DIFFERENT VARIABLES IN ABUJA, NIGERIA

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ARTICLE INFO

Article History:

Received 20th August, 2018
Received in revised form
30th September, 2018
Accepted 15th October, 2018
Published online 29th November, 2018

Key words:

Environment knowledge,
Public Awareness,
Global warming,
Abuja.

ABSTRACT

Background: Global warming is one of the major problem that could negatively affect the ecosystem and the health of humans. Global warming occurs when greenhouse gases(carbon dioxide (CO₂) and chlorofluorocarbons) and other air pollutant which include particulate matter, benzene, toxic metals, polycyclic aromatic hydrocarbons, carbon monoxide, nitrogen oxides, sulfur oxides and ozone(O₃) accumulate in the atmosphere and absorb solar radiation and sunlight and eventually bound off the earth's surface. Global warming may cause unalterable damage if no effort is made to avert it. Consequently determining the public knowledge and awareness on the topic would be one of the solutions of the problem. **Objective:** The goal of this research is to identify the level of knowledge and awareness about global warming that will make people more conscious about the effect of global warming. **Method:** In this study, survey research was used as the methodology. The sample of the study consisted of 1000 people randomly chosen from the center of capital territory Abuja, when determining the sample, age, gender, qualification and occupation variables were taken into considerations and it has created an impartial distributions. A questionnaire consisting of 14 questions was set as data collection tool. The data obtained from the survey were analyzed by chi-square. **Results:** This research has reached the results of how individuals perceive global warming as a big problem. This perception is informed out of the devastating effect of global warming which is heightened due to information available on media platforms. But one striking observation glaring in the result is that respondents do not have enough consciousness about what causes global warming and how it affects their livelihood. **Conclusion:** The data indicates that the participants of the study are aware of global warming but they are not at sufficient level of knowledge for the possible effects and the prevention of global warming. Moreover, the information on individual's level of awareness about global warming shows statistically momentous differences in terms of gender, age, qualification and occupation.

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Citation: Maimuna Buba, 2018. "Research on the level of public knowledge and awareness about global warming in terms of different variables in Abuja, Nigeria", International Journal of Current Research, 10, (11), 75118-75125.

INTRODUCTION

One of the most vital problems of our age is the growing environmental problems in the rapidly developing and changing world. And one of the most important environmental issues is global warming. As a result of various activities of people and greenhouse gases in the atmosphere (water vapor, CO₂, chlorofluorocarbons (CFCs), nitrous oxides and methane) as a results of the increase of some gases, The process of artificially increasing the temperature of the near-earth portions of the atmosphere is called global warming (Çepel, 2008). The first step in responding to global warming and other environmental issues is to have adequate knowledge of the extent and nature of the effects of climate change on the environment (Olaniyi *et al.*, 2013).

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Effects of Global warming: Global warming is the result of the increase of the greenhouse effect. The increase in land and sea glaciers and increase in sea level, the increase in the severity of natural disasters, increase in floods, increase in droughts, decrease in agricultural production due to climate change, and the disappearance of animal species is one of the important consequences of global warming (Venkataramanan, 2011). Global warming has been responsible for climate change and the rise sea level with unpalatable consequences, such as bad weather, flooding, hurricanes, poverty, ill-health, socio-economic challenges and wildfire. It has also effect on natural resources and the balance of nature. Environmental activities and day-to-day human activities are said to have contributed to an increase in average global temperatures, because of release of greenhouse gases, such as carbon dioxide, into the atmosphere (Derman *et al.*, 2013; Olaniyi *et al.*, 2013).

Solution to the problem: Since global warming is caused by the behavior of people, this is mainly due to lack of

knowledge. In order to solve environmental problems Individuals can be educated as a result of raising awareness. But educating alone is not enough to solve environmental problems. Individuals, families, businesses, communities and governments must also take decisions and responsibilities. As Nigeria has been listed among countries most at risk as global warming brings more high temperatures, necessitating the need to keep people healthy and preserve food and medicine most of the people in Nigeria are not aware of the causes of global warming and how to prevent it, so in this research the people of Abuja capital city of Nigeria was used as sample to determine their level of knowledge and to educate them through the questionnaire. Further research will be done to aware the nationwide about the causes and necessary things to prevent global warming. Environment is important as the first way of educating highly sensitive individuals through awareness, to raise awareness and to leave a cleaner and more livable world for future generations. People associated to the environment are highly influential on each other. The attitudes and behaviors that individuals develop towards living in a clean and healthy environment are positive and a big contributor to the families who have a very important habitation in their lives. Without practical solution application is too difficult to the people of the community in resolving environmental health problems that can be removed by radical measures and Progression of communities with space, time, and personality characteristics, for this reason, the level of knowledge and awareness will contribute to the solution.

Aims: Is to educate people by raising awareness about global warming, the level of knowledge and awareness will contribute a lot in reducing environmental health problems caused by global warming.

Objectives: The aim of this study is to determine the knowledge levels of the Abuja people participating in the study on global warming and to determine their awareness. Answers to the following research questions within this basic objective are being sought:

1. Are the responses of the participants to the survey questions differentiated in terms of age change?
2. Are the answers given by the participants to the questionnaire differentiated in terms of gender change?
3. Are the responses of the participants to the survey questions differentiated in terms of their level of education?

4. Are the responses of the participants to the survey questions differentiated in terms of their profession?
5. Are the answers given by the participants matched the survey questions?
6. Are the participants aware about global warming?

MATERIALS AND METHODS

Research site: This research was carried out in Abuja, the Federal Capital Territory of Nigeria. Abuja is geographically located in the center of the country. The city is well developed and is home to Nigeria seeking employment or business opportunities since it is the seat of the federal government. Consequently, Nigerian from all parts of the country travels into Abuja regularly either for business, job opportunities or for settlement.

Research design: In this research, a descriptive survey method was used. In this type of researches the sample is quite large and the main purpose is to describe and explain in detail. For this reason, questionnaires were used to reach broad sampling the easiest way. Quantitative data are collected via questionnaires, statistical and generalizations are aimed to reach with their analysis (Çepni, 2010). In this study, the Abuja people points of view about global warming were analyzed. For this purpose, Abuja people were randomly selected as the sample in Abuja center. When evaluated in this respect it can be said that studying satisfies the criteria of the descriptive scanning method. The number of participants is as wide as possible (1000 people) were analyzed. For this reason, it is believed that the results obtained can be generalized to whole people of Abuja.

Sampling

1000 persons (500 female, 500 male) randomly selected from the center of Abuja city. As determining the sample, gender, age, level of education and occupational variables were considered so as to create a balanced distribution. The individuality of the sample are shown in Table 1.

Data collection tool

A questionnaire consisting of 14 questions was prepared as data collection tool. Survey questions about environmental education were examined.

Table 1. Features of the Sample

Age	Number of people (1000)	Education Level	Number of people (1000)	Occupation	Number of people(1000)
18-24	124	Primary education	166	Teacher	118
25-30	136	Secondary school	258	Officer	126
31-35	178	College	148	Private sector	88
36-40	238	University	360	Health sector	98
41 and over	324	Master's degree and above	68	Student	124
				Housewife	176
				Worker	90
				Free Job	102
				Engineer	32
				Retired	46

Table 2. Content of survey questions related to global warming

Content of the questions	Questionnaires
General information about global warming	1, 2, 3
Economic, political and social effects of global warming	4, 5, 6, 7
Methods used in global warming struggle	8, 9, 10, 11, 12, 13, 14

Table 3. Questions and Reply options

QUESTIONS	Reply options	Frequency	Percent %	
Question 1 Which one is themain global warming problem to you?	Global warming	470	47	
	Wars	98	9.8	
	Globalization	74	7.4	
	Terror events	80	8	
	Environmental pollution	84	8,4	
	Sea pollution	6	0.6	
	Air pollution	30	3	
	Decrease of forests	32	3.2	
	Decomposition of ecological balance	94	9,4	
	Biodiversity and natural resources reduction	32	3.2	
Question 2 Which are you following up often In the media about global warming research, news, developments?	Always	74	7.4	
	Generally	204	20,4	
	Occasionally	380	38	
	Maybe if it comes to	314	31.4	
	Never a time	28	2.8	
Question 3 Which is the most important cause of global warming?	Human-induced greenhouse gases	438	43.8	
	Industrialization	330	33	
	Sun rays	106	10.6	
	Agricultural activities	20	2	
	Deforestation	74	7.4	
	No idea	32	3.2	
	Decrease in production	130	13	
Question 4 What is the most important thing that global warming effect will cause?	Decrease in water reserves	376	37.6	
	Epidemic diseases	90	9	
	Decrease in agricultural production	66	6.6	
	Reliability in energy supply	18	1.8	
	Migration	12	1.2	
	Poverty	16	1.6	
	Food shortage	18	1.8	
	Drought	169	16	
	Desertification	80	8	
	Unemployment due to low production	10	1	
	No idea	24	2,4	
	Question 5 What is the Kyoto Convention?	Living species living in the environment countries come together to investigate signed contract	142	14.2
		Presented for Nigeria to enter the EU conditions	10	1
Global warming gases to industrial countries to reduce emissions various limitations		488	48.8	
I do not know		360	36	
Question 6 Has Nigeria signed the Kyoto Protocol?		Signed		
	Not signed			
	I do not know	396	39,6	
		84	8,4	
Question 7 Do you believe that In our country necessary measures are taken in fighting with global warming	Yes	202	20.2	
	No	558	55.8	
	No idea	240	24	
Question 8 what are you doing for Individual precautions for global warming ?	I use well water	330	33	
	I use electricity cautiously	140	14	
	I'm sorting the garbage	68	6.8	
	I use public transport	145	14,5	
	I am using Products that are less harmful to the environment	147	14.7	
	I grow plants			
	I support environmental organizations	104	10,4	
	Other	34	3,4	
	Changing individual habits will not come up with a solution	10	1.0	
		22	2.2	
Question 9 Do you think renewable energy sources can be alternative solution in combating global warming?	Yes	588	58.8	
	No	126	12.6	
	No idea	286	28,6	
Question 10 Which one would you choosein fighting against global warming? Can the method be more effective than others?	Activities for the People's education and awareness	666	66.6	
	Legal regulations and Prevention of civil society organizations efforts	216	21,6	
		118	11,8	
Question 11 What could be the biggest contribution can you do to prevent global warming?	I will try to prevent it with my power, do everything that comes from my hand,	538	53,8	
	Take tasks in related organizations and material spiritual support	270	27	
	I can only provide financial support to related organizations, I cannot do anything else	48	4.8	
	I won't make effort since it is not something very important to an individual to make effort.	144	14.4	
	Question 12 Do you believe global warming awareness as a solution?	Yes	764	76.4
No		108	10.8	
No idea		128	12,8	
Question 13 Can you do individual sacrifice in changing your life to fight global warming?	Yes	680	68	
	No	108	10.8	
	I do not think my experience has affected global warming	212	21,2	
Question 14 Do you participate in an event related to global warming?	Yes	62	6.2	
	No	938	93,8	

The final questionnaire consists of two parts. First part demographic characteristics (gender, age, level of education and occupation) of the individuals participating in the survey, it was carried out to determine their views on global warming. Content of survey questions related to global warming is given in Table 2.

Analysis of Data

Chi-square test was used to obtain the data from the questionnaire to analyzed opinions about global warming.

RESULTS

Frequency and percentage distributions of the answers given to the survey questions of the individuals participating in the survey are shown in Table 3. As seen in Table 3, the most important problem facing our world today (question 1), global warming. Although nearly half of the sample does not see global warming as a major problem, (20.4%) research on the global warming media, news, developments and (38%) research on the global warming occasionally (question2). 43.8% of the participants responded that the most important cause of global warming (question 3) is that they see human-induced greenhouse gases. This is followed by industrialization by 33%. 37.6% of the individuals responded that reduction in water reserves as the most important effect of global warming (Question 4). It was drought with a rate of 16% and a rate of 13% a decrease in production is observed. Because of the decrease in water, will bring accompanying drought and decrease in production. Question 6is about the Kyoto agreement, part of 39.6 % of the participant are aware that Nigeria have signed the contract, and 52% are not aware of this situation. In question 7, 20.2% of the individuals believe that in Nigeria necessary measures are taken in fighting with global warming while 55.8% of question7 don't believe in that. 45.2% of respondents said that they took individual measures

against global warming, 43.6% they did not take precautions (question 8). More than half of the sample (58.8%), think renewable energy sources can be alternative solution in combating global warming (question 9) while28.6% of the participant don't think that. In question 10, a large proportion of the individuals participating in the survey, 66.6% of them believed that education and awareness activities are more effective than others while 21% of them believed that Legal regulations and Prevention of civil society are more effective and 11.8% of them believed that non-governmental organizations efforts are more effective. In question 11, more than half of the participant (53.8%) said they will do everything they could and would work with all their power to prevent global warming and about 27% of them take tasks in related organizations and material spiritual support to prevent global warming and 14.4% of them said they will not give an individual effort in solving the problem. In question 12 of the survey, a large proportion of participants (76.4%) believe that global warming awareness is a solution. However, 10.8% of the respondents said that global warming awareness was not a solution and 12.8% they did not have ideas. In Question 13 of the survey, 68% of respondents were in the fight against global warming they thought that they would make changes in their lives by making individual sacrifice, while 21.8% of them stated that their experiences do not affect global warming. In the last question of the questionnaire (question 14), participants were asked if they participate in an event related to global warming, 93.8% of the individuals don't participate only6.2% of the participants stated that they participated in such a study (Table 3). The first factor investigated in the study was that the answers given by the participants to the survey questions changed as the age increased. For example the participants answered question 1, 4 and 5 in terms of age variable the answers are given in Table 4. As a result of the analyzes made, participants' question 1 ($X^2 = 74,334$; $SD = 36$), question 4 ($X^2 = 77,709$; $SD = 44$), question 5 ($X^2 = 36,853$, $SD = 12$), question 7 ($X^2 = 29,336$, $SD = 8$),

Table 4. Findings from Questionnaire 1, 4 and 5 by Age Variable

		18-24 frequency	25-30 Frequency	31-35 Frequency	36-40 Frequency	41 and above Frequency
Question 1 From the following What is the most important global problem to you?	Global warming	24	37	37	57	80
	Wars	10	5	10	10	14
	Globalization	2	7	6	15	7
	Terrorist events	10	5	1	12	12
	Environmental pollution	3	3	14	7	15
	Sea pollution	-	1	1	-	1
	Air pollution	2	6	3	1	3
	Decrease in forests	-	1	6	3	6
	Degradation of ecological balance	9	2	6	9	21
	Biodiversity and natural reduction of resources	2	1	5	5	3
Question 4 Which is the important effect that most likely cause of global warming?	Decrease in production	11	8	11	19	16
	Decrease of water reserves	14	29	31	55	59
	Epidemic diseases	11	1	7	18	8
	Decrease in agricultural production	1	2	7	8	15
	Reliability in energy supply	2	2	3	1	1
	Migration	-	1	1	-	4
	Poverty	3	2	1	1	1
	Food shortage	-	3	1	4	1
	Drought	13	11	15	4	37
	Desertification	6	6	9	7	12
Question 5 What is the Kyoto Convention?	unemployment due to the low production	-	1	1	1	2
	No idea	1	2	2	1	6
	The country come together to sign the contract	2	6	9	28	26
	to investigate about the kind of people living in the environment.	-	-	-	4	1
	The Presented condition for Nigeria to enter EU	39	34	52	39	80
Is the agreement on various limitations to the country industries to reduce the release of gases that are causing global warming	21	28	28	48	55	
I do not know						

Table 5. Findings of Gender Variable from Questions 1, 2 and 5 of Questionnaire

		Female Frequency	Male Frequency
Question 1 Which is the most important global problem to you?	Global warming 123 112	246	224
	Wars 18 31	36	62
	Globalization 18 19	36	38
	Terrorist events 14 26	28	52
	Environmental pollution 22 20	44	40
	Sea pollution 2 1	4	2
	Air pollution 9 6	18	12
	Decrease in forests 6 10	12	20
	Decomposition of ecological balance	48	46
	Decreasing biodiversity and natural resources	28	4
Question 2 How often are you following up In the media about global warming research, news, developments?	Always	54	20
	Usually	96	108
	Occasionally	208	172
	Maybe if it coincides	132	182
Question 5 What is the Kyoto Convention?	Never	10	18
	The country come together to sign the contract to investigate about the kind of people living in the environment.	40	72
	The Presented condition for Nigeria to enter EU	38	2
	Is the agreement on various limitations to the country industries to reduce the release of gases that are causing global warming	154	220
	I do not know	268	206

Table 6. Survey findings obtained from question 3 and 6 of the questionnaire

		Primary School	Secondary School	Higher institution	university	Masters and above
		F	F	F	F	F
Question 3 Which is the most important cause of global warming	Human product sera gases	52	96	60	188	42
	Industrialization	60	96	38	112	24
	Sun rays	18	32	26	30	-
	Agricultural activities	6	6	4	2	2
	Deforestation	18	20	10	26	-
	No idea	12	8	10	2	-
	TOTAL	166	258	148	360	68
Question 6 Has Nigeria signed the Kyoto Protocol?	Signed	44	102	46	156	44
	Not signed	12	12	16	32	10
	I do not know	110	144	80	172	14
	TOTAL	166	258	148	360	68

Table 7. Findings of Profession Variable from Questions 7 and 12 of Questionnaire

		Teacher f	Officer f	Private Sector f	Health Sector f	Student f
Question 7 Do you believe that In our country necessary measures are taken in other to fight global warming?	Yes	30	38	16	36	16
	No	65	15	30	54	14
	I have no Idea	22	20	40	20	84
	TOTAL=	117	73	86	110	114
		House Wife f	Business Worker f	Self employed f	Engineer f	Retired f
	Yes	32	18	26	22	23
	No	94	50	10	6	5
	I have no Idea	48	24	64	2	76
	TOTAL =	174	92	100	30	104
	Question 12 Do you believe global warming awareness as a solution?	Yes	106	88	20	60
No		4	16	8	2	28
I have no Idea		6	22	20	12	68
TOTAL=		116	126	48	74	136
		House Wife	Business worker	Self employed	Engineer	Retired
Yes		160	40	78	4	33
No		78	16	5	2	7
I have no Idea		32	30	18	6	97
TOTAL=		164	86	101	12	137

question 9 ($X^2 = 17,989$; $SD = 8$) and question 13 ($X^2 = 36,405$; $SD = 8$) were statistically age-matched ($p < 0.05$). In other questions, change in age did not make a meaningful difference. The second factor examined in the study was that the respondents' responses to the survey questions that there is change varied by gender. Significant differences according to sex variables were obtained from questions 1, 2 and 5 given in Table 5. Question 1 ($X^2 = 60,372$, $SD = 7$),

Question 2 ($X^2 = 60,372$, $SD = 4$) and Question 5 ($X^2 = 7,930$, $SD = 3$) showed significant differences ($p < 0.05$). In other questions, sex change. There were no statistically significant differences between the two groups. The third variable involved in the study is the level of education of participants. In all questions except the 9th questionnaire statistically significant differences were found according to education variable. According to the education variable Findings

obtained from 3 and 6 questions are given in Table 6 as an example. Statistics obtained as a result of analysis; question 1 ($X^2 = 44,470$, $SD = 28$; $p < 0.05$), question 2 ($X^2 = 39,926$ $SD = 16$; $p = 0.05$), question 3 ($X^2 = 80.39$, $SD = 16$, $p < 0.05$), question 4 ($X^2 = 41,792$, $SD = 24$, $p < 0.05$; $SD = 12$; $p = 0.05$), question 6 ($X^2 = 19.09$, $SD = 8$, $p < 0.05$), question 7 ($X^2 = 19,091$, $SD = 8$, $p < 0.05$; $SD = 8$; $p = 0.05$), question 11 ($X^2 = 32,624$, $SD = 12$, $p < 0.05$), question 12 ($X^2 = 27,343$, $SD = 8$, $p < 0.05$; $SD = 8$; $p < 0.05$) and question 14 ($X^2 = 11,047$, $SD = 4$, $p < 0.05$). The fourth variable examined in the study was the occupations of the participants. The square according to the occupation variable. Question 1 ($X^2 = 162,228$, $SD = 28$), Question 2 ($X^2 = 60,372$ $SD = 16$), Question 3 ($X^2 = 69,271$, $SD = 16$), Question 4 ($X^2 = 129,508$, $SD = 24$), Question 5 ($X^2 = 63,404$, $SD = 12$), Question 7 ($X^2 = 40,731$, $SD = 8$), Question 11 ($X^2 = 36,405$; $SD = 8$) and question 14 ($X^2 = 23,749$, $SD = 4$) occupation were statistically significant differences. The findings obtained from questions 7 and 12 are given in Table 7 as examples

DISCUSSION

The issues of global warming in the year 2000 as a result of human activities the unwanted changes of nature have become a very vital problem as they begin to affect everyday life. Upon this studies on global warming awareness have shown that global warming is considered as a serious problem (Çağlar *et al.*, 2008; Temelli *et al.*, 2011). In this research, about half of the samples have expressed the global warming as the most vital problem our world facing. Although it is quite amazing more than half of the sample in (Table 3) follow the research, News, field surveys media and development generally (20.4%) or occasional (38%). The result found out that the participants couldn't see clearly the fact that we are going to be more affected and suffer day by day. One reason for this according to one research is that it evaluated that the global warming in the mass media has less important than other personal and social issues (Lorenzoni and Pidgeon, 2006). One of the most important findings from the survey was that some of the participants believed that it will not be a benefit for you to strive individually to prevent global warming (14.4%) and they think that global warming did not affect their life (21.2%, Table 3). In this situation for individuals to prevent global warming or at least to reduce it, they do not know the precautions that can be taken to slow it down or they are not aware of these measures yet. However, individual measures to be taken may enrich and make our life even easier, the individual measures that can be taken in this regard are as follows:

To use water economically, to use organic farming and livestock products, to produce packaged foods to read the expiry date and the contents of the chapter, to plant trees, use of cleaning products and pay attention to the storage instructions, set the water heaters to 2 degrees down in winter, 2 degrees up in summer, to save 1000kg carbon dioxide, choose public transportation vehicles, to support recycling, choose products with recycling mark on their packaging, to reduce the use of plastic packaging, to avoid smoking cigarette, to use computers and office equipment accordance with the instructions for use take measures to prevent wasting of energy, paper and other consumption materials, pay attention to the instructions for use and storage of cosmetic products, to choose products that have recycled packaging and do not use the product that will damage the ozone layer, to

keep the substance and products containing chemicals away from the environment (Gülbahar, 2008). In Question 5, of this study 39.2% of the respondents knew what the meaning of Kyoto protocol while 60.8% don't know. It has been identified similarly, in the literature where 44.1% of university students do not know the KYOTO protocol (Oğuz *et al.*, 2011). In another study %48.8 of their sample heard the Kyoto protocol (Gökhan and Hülya, 2015). As can be seen the results obtained in this study supports the literature.

In this study, the questionnaire on the determination of the levels of knowledge and awareness on global warming there were significant differences in terms of age, gender, education and occupational variables. Similar in the studies done in the literature, claims that the socio-economic conditions of people's environmental behavior, the level of education, gender, occupation, ecological knowledge, can be affected variably (Alp *et al.*, 2008; Worsley, 1998). Though, in another literature the role of gender, full-time work, housewives, social roles such as parenting, found that did not affect global warming awareness (McCright, 2010). As the individuals age increase, global warming, the challenges that global warming brings, and there has been an increase in knowledge and awareness about the resolution of problems. It shows that the vast majority of individuals are globally ware of the current problem of greenhouse gases are among the most vital causes of warming (Table 3, question 3). In another research it reached the result that as the ages of the participants increases the attitudes towards the environment increased in the positive direction (Erol and Gezer, 2006; Nakiboğlu, 2007). This increase may be due to the fact that the future anxiety is felt more and more as the age progresses. When gender variation is taken into account, men are more aware of the global warming than women. However, many studies have encountered the opposite situation (Çağlar *et al.*, 2008; Yayar *et al.*, 2014). In our society, even if more attention has been given to the girl's education, this may have been the result of the fact that education of boys children is already in the foreground. In different studies, it has come to the conclusion that the gender factor is not effective on this issue (McKinney and Schoch, 2003; Özdemir, 2010; Yousuf and Bhutta, 2012). This research has identified that Increase in levels of education and increase in awareness of the effect of global Warming participants who are Students, teachers, and officers have more aware of global warming than other occupational groups respectively. This result is similar as a result of the studies in the literature (Yayar *et al.*, 2014). The group of individuals with middle age, married, higher education and graduates are more likely to have an environmentally sensitive knowledge and they show environmental acquiring behavior compared to others (Nakiboğlu, 2017). As the income level of individuals increase, the support giving for the prevention of global warming increases (Dietz *et al.*, 2015). In this research the result obtained also support this statement.

Conclusion

As a result of the questionnaire on the determination of the level of knowledge and awareness on global warming, gender, education and occupation variables were found to be significantly different. This research has reached the results of how individuals perceive global warming as a big problem. This perception is informed out of the devastating effect of global warming which is heightened due to information available on media platforms. But one striking observation

glaring in the result is that respondents do not have enough consciousness about what causes global warming and how it affects their livelihood. This therefore shows that respondents may not feel the need to take proactive steps and responsive measures to combat global warming. This is clearly evident in the relatively large percentage of respondents totaling up to 36% who are not aware of KYOTO protocol for the release of greenhouse gases. Similarly a total of 15.2% of respondents said that the content of protocol Kyoto is incorrect further evidencing their emptiness of consciousness to the challenges of global warming. It is important to raise awareness for a livable world of different values to prevent global warming. This study shows that information on the activities of experts on global warming and the relationship it shares with the environment cannot be limited within formal circles of education such as schools and universities. There is therefore such need to try other platforms in order to re-jig and raise environmental consciousness. Another important thing to note is that prevention of global warming is not effected only through physical and ecological change but also through social change (Adger *et al.*, 2009). Civil society must therefore be involved in order to re-orient the whole society on this issue starting from the individual establishments, foundations and all educational institutions then the solution maker event management should be one of the priority objectives. The university students in Nigeria often learn about the environment by written and visual media, this indicates that there is increase in written and visual media; mass media awareness of environmental concerns and environmental issues plays an active role. Therefore, environmental education should be evaluated in written and programs should be prepared in this way in the visual media. As people learn about the effect of ecosystem they will exhibit more positive behaviors towards the environment (McCright, 2014; Hsu, and Roth, 1998; Yücel Işıldar, 2008).

Recommendations

Necessary work should be done in order to minimize the use of fossil fuels which is one of the most important cause of global warming. Raising awareness of renewable energy sources will help us to see how harmful the use of fossil fuels is. People will be required to pay in areas such as energy consumption, use of natural resources and recycling of waste. In this way people will take major steps to reduce the effects of global warming by individual measures. This work is limited to 1000 people in the province of Abuja in Nigeria. Broader scale work on global warming should be done. Because these kinds of studies on global warming are spreading throughout the country and sharing of results is very important in securing the future of human generations.

Acknowledgements

With utmost humility I give thanks to the almighty ALLAH (s.w.a) for giving me opportunity to carry out this work successfully on his infinite blessings and I would like to express my gratitude to my beloved and caring parents (Hajiya Ummulkhulsum and Alhaji Buba Gabaju) for their love, prayers and support given to me towards the success of my work, may Allah continue to bless them abundantly. I would also like to extend my gratitude to all my siblings, love ones, friends, colleagues, and participants of the research, for their prayers, advice and words of encouragement.

Author contributions: The research was originally conceived by Maimuna Buba who wrote the entire paper.

Disclosure statement: No potential conflict of interest was reported by the author.

Ethics and consent: Not required.

Funding information: None

Paper context: As Nigeria has been listed among countries most at risk as global warming brings more high temperatures, necessitating the need to keep people healthy and preserve food and medicine most of the people in Nigeria are not aware of the causes of global warming and how to prevent it. Since global warming is caused by the behavior of people, this is mainly due to lack of knowledge. In order to solve environmental problems Individuals can be educated as a result of raising awareness.

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