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Editorial Board

FROM EDITORIAL DESK

It is with great pleasure to present volume two number one of this journal (International Journal of Industrial Technology, Engineering, Science and Education). Disseminating research findings in science and technology is very essential as technology promotes development and this development can't take place without conducting researches.

Technology makes task easier and as well solves the problem of mankind. As technology progresses, it makes life more convenient. Technological progress is essential to economic growth and national development. The more advanced the technology, the more quickly the local and global economy improves. This occurs as a result of researches conducted. The research findings are made known to public through journal of this nature.

This edition has nineteen articles and it covers many areas. These areas include technical and vocational education and training, information and communication technology, librarianship, science education, agricultural science, engineering, mathematical modeling, computer science and COVID-19 Pandemic.

The critical challenges facing science and industrial technology education in the present day have been ex-rayed by scholars from diverse academics. Therefore, this edition is very useful to researchers, teachers and other stakeholders in the field of science, engineering and education.

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Dr. Ibrahim Yakubu Umar
Editor-In- Chief

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Assessment of COVID-19 Control Measures, Awareness and Compliance among Teachers and Students in Public Secondary Schools in Minna, Nigeria

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Abstract
The few studies on the impact of COVID-19 pandemic on education reported that most governments around the world temporarily closed educational institutions in an attempt to contain its spread. Now that schools have resumed based on the reasonable adherence to the laid down measures of the government on the control measures of COVID-19 pandemic, it is imperative to carry out a study to assess the awareness of schools of these measures. This study therefore assessed the awareness and compliance of COVID-19 pandemic control measures in public secondary schools in Minna, Niger State between teachers and students. Data were collected with the aid of questionnaire from 375 teachers and 1500 students of 15 public secondary schools in Minna, Niger State using purposive sampling technique. The research instrument was subjected to a validity test with a high validity coefficient (Cronbach's Alpha) of 0.77 obtained. Both descriptive (percentile) and inferential (independent sample t – test at 5% level of significance) analytical tools were employed for data analysis. Results of the study showed high rate of awareness of COVID-19 control measures among teachers and students. It was also found that there exists a non-statistically significant difference between the percentage of teachers and students that are aware of the control measures of COVID-19 in the 15 public secondary schools studied ($p = 0.600$ or > 0.05). In addition, the percentage of the teachers that are aware of these control measures is higher than that of the students. Findings also show that both teachers and students have high level of compliance with the control measures of COVID-19 pandemic but the teachers comply more. It was therefore concluded that both teachers and students have high level of awareness of and compliance with the control measures of COVID-19 pandemic except for the measures of 'contact tracing' which is not the sole responsibility of the schools' management. Major recommendation from the study was that school management should always put up mechanism for implementing the 'contract tracing' measures in order to act immediately when a case of COVID-19 is found among staff or students in a school.

Keywords: Awareness, Compliance, Control Measures, COVID-19, Public Secondary Schools.

Introduction

The Corona Virus Infectious Disease (COVID-19) occurred first in Wuhan Province of China in 2019 and since then has spread to almost all continents of the world. According to World Health Organisation (WHO, 2020), COVID-19 is a viral infection that causes respiratory illness. The disease is basically transmitted from person to person through contact with droplet of an infected person and that most people can easily recover from the illness without specialized treatment, but people who are older and those with existing medical conditions such as cancer, chronic respiratory infections, diabetes and cardiovascular diseases are more likely to experience severe illness and death due to COVID-19 (WHO, 2020). Some of the symptoms of the disease include: sore throat, runny nose, constant coughing/sneezing, breathing difficulty and fatigue. Controlling this rise in COVID-19 in the country was particularly challenging and thus gave reason for worry especially in the face of limited health care facilities to contend with the virus (*Omaka-Amari et al.*, 2020).

COVID-19 pandemic is therefore a global problem that requires effective and comprehensive planning and conducting a risk assessment, which is crucial to minimise its spread (Mohammed, 2020). It was as a result of the risk associated with COVID-19 that the United Nations appealed for 2 billion dollars to support global response efforts towards tackling the coronavirus pandemic. The consequences of COVID-19 could be more severe; if people do not comply with or adhere strictly to public health regulations and advice. The United Nations Educational, Scientific and Cultural Organisation (UNESCO, 2020a) that is monitoring closure of schools revealed that over 100 countries implement nationwide closures, impacting over half of the world's student. According to UNESCO (2020b), school closures carry high social, educational and economic costs, and the disruptions affect everybody, but their impact is particularly severe for disadvantaged persons and their families. Edeh *et al.* (2020) reported that unplanned schools closures can cause severe problems for students, educators, parents and the society at large. It could negatively affect the academic interest and performance of

students. If the students are not engaged productively, it could also lead to idleness which might result in youth involvement in crimes, loss of interest in learning, and poor academic performance. School closure as controversial as explained by Quentin (2014); it can have spillover effects on a large number of students in closed down schools. It can also affect the quality of teaching and learning, and academic achievement particularly for students with special needs or those with learning difficulties that often requires more physical attention and guidance from the teachers. Edeh, *et al.* (2020) suggested that technology can be used to remedy some of the fallouts from school closures, but it cannot replace the important effect of face-to-face interactions by students and teachers. Hence, the need for this study.

Statement of the Research Problem

In view of the above, the problem identified by the study is interrupted learning of schools, unequal access to digital learning portal and deprivation of students from social activities as a result of schools closures due to the spread of COVID-19 pandemic. All these have negative impact on the students' academic performance. Erika and Nicholas (2020) therefore suggested that closure of schools is not the only option to mitigate the spread of COVID-19 pandemic. They advocated for authorities to give parents some flexibility to choose what is best for their families, while implementing stronger mitigation/control measures. In order to prevent this problem from reoccurring, it is better to ensure continuous compliance of teachers and students with the control measures of COVID-19 in school premises as schools resume nationwide.

However, Jegede (2020) revealed that there are few studies on the impact of COVID-19 pandemic on education. Some of the few ones reported that most governments around the world have temporarily closed educational institutions in an attempt to contain the spread of the COVID-19 pandemic. Now that schools have resumed based on the reasonable adherence to the laid down measures of the Government on the control measures of COVID-19 pandemic, it is imperative to carry out a study to ensure continuous compliance of schools to these measures. Therefore, in view of the background of this study, the research problem and review of related literature therein, the study assessed the awareness and compliance of COVID-19 pandemic control measures in public secondary schools in Minna, Niger State with a view to improving the level of compliance among teachers and students. In order to achieve the aim of the study, the following objectives were pursued:

i. To determine the proportion of Teachers and Students that are aware of the control measures of COVID-19 in public secondary schools in Minna, Niger State.
ii. To determine the rate of Teachers' and Students' compliance with COVID-19 control measures in public secondary schools in Minna, Niger State.

Research Hypotheses

H_o: There is no significant difference between the proportion of teachers and students that are aware of the control measures of COVID-19 pandemic in public secondary schools in Minna, Niger State.

H_1: There is significant difference between the proportion of teachers and students that are aware of the control measures of COVID-19 pandemic in public secondary schools in Minna, Niger State.

Literature Review

Control Measures for COVID-19 Pandemic

According to the Nigeria Centre for Disease Control (NCDC) (2020), the most important advice is for all schools to encourage their students to maintain good hand and respiratory hygiene to remain safe. School proprietors, headmasters, and head mistresses must ensure that students have access to clean water and soap at all times while on the school premises. NCDC (2020) further highlighted that the best way for schools to avoid COVID-19 infection is to: ensure students and teachers wash their hands frequently; show students how to cough or sneeze into a tissue, or to cough into their elbow if they cannot get tissue; clean and disinfect their premises often; and encourage sick students and teachers to stay home.

Maintaining the health and safety of people and environments will be more important than ever before in the aftermath of the COVID-19 school closures (Carvalho *et al.*, 2020). To make school environments safe, additional health and hygiene measures should be implemented, and school-based psychosocial and nutritional support should be extended to students to strengthen their overall health and well-being in the wake of the pandemic. In addition, Carvalho *et al.* (2020), added that to provide safe school environments following a pandemic, policymakers should: Pair school-based hygiene promotion with the distribution of waterless hand sanitizer and/or soap (where hand-washing stations are already available); Consider school-based screening for fever and cough, which may reduce risk and improve confidence, but which

does not by itself offer a reliable solution.; Train and support teachers and other school staff to offer school-based psychosocial support to returning students; and Prepare for a spike in the number of students with malnutrition and other unmet basic needs.

Guner *et al.* (2020) reported that although there are cures for illnesses and developments made by leaps and bounds in our day, the strongest and most effective weapon that society has against this virus that is affecting not just health but also economics, politics, and social order, is the prevention of its spread. In view of this, Guner *et al.* (2020) further contributed that the main points in preventing the spread in society are hand hygiene, social distancing, use of personal protective equipment and quarantine. With increased testing capacity, detecting more COVID-19 positive patients in the community will also enable the reduction of secondary cases with stricter quarantine rules.

Level of Awareness of Control Measures of COVID-19 Pandemic

Okoro *et al.* (2020) reported that COVID-19 disease remains a public health emergency of international concern. Efforts at the global and national levels are being made to control its spread. The Nigerian Correctional Service is also proactive in the fight against the disease by organising awareness training for correctional officers. The study conducted a pre- and post-test assessment of knowledge among correctional officers in Enugu State Command to determine the impact of awareness training on their knowledge level of the disease. The study revealed a high level of knowledge, practices and attitude among correctional officers towards the disease. Such observations reflect the efforts made by the Nigerian Correctional Service, and the government to sensitize the general population about the disease. This shows that the Government has made a lot of effort to educate the public on the key issues on how to detect and prevent these deadly disease. This effort can only continue to yield fruitful results if this high level of awareness is backed by strict compliance.

The above indicates that no matter how high the level of awareness is, it should be evaluated from time to time in order to enhance the level of compliance with the control measures of COVID-19. It is therefore imperative to evaluate the rate of awareness of teachers and students of secondary schools on the control measures of this deadly disease before examining their level of compliance with these measures.

Compliance with COVID-19 Control Measures in Educational Institutions

According to Moti and Vambe (2020), the novel coronavirus pandemic, though mainly a major global public health concern, has significant socioeconomic implications of great consequences to economies and the well-being of the population. Whereas some countries were proactive with comprehensive mitigation, containment and management policies in response to the pandemic, some were in denial and procrastinated. Notwithstanding the initial reaction of countries, the policy actions appear generic in compliance with standard World Health Organisation (WHO) protocols: lockdowns, testing and contact tracing, isolation and social distancing.

Studies on the compliance with COVID-19 pandemic control measures in educational institutions are scarce. A related study by Oyeyemi *et al.* (2020) revealed that a high proportion of respondents had correct knowledge about the pandemic. Consequently, this study shows that Nigerians' knowledge, perception and adherence to the preventive measures of this disease is averagely good. It is therefore imperative to find out if the trend is the same in educational institutions and particularly secondary schools. Lack of strict adherence to the control measures of this pandemic in the school environment may lead to negative consequences such as: school closures; learning will decline and dropouts will increase, especially among the most disadvantaged; health and safety will suffer, without the support and structure that schools provide; and on the supply side, the economic shock will hit schools and teachers (World Bank Group Education, 2020). The study of Oyeyemi *et al.* (2020) recommends more rigorous public health education aimed at improving the response to the outbreak of the pandemic in Nigeria. Also, physical and social distancing should be emphasized across all age groups with additional focus on the older population in order to increase the level of compliance with and awareness of the measures for controlling the spread of the pandemic.

Methodology

The study adopted the use of quantitative research approach with the use of questionnaire survey. Data collected for the study were analysed with the use of descriptive and inferential methods of analysis. The choice of the quantitative approach was due to the fact that ACAPS (2012) reported that using statistical methods, the results of quantitative analysis can confirm or refute hypotheses about the impact of a disaster and ensuing needs of the affected population.

The use of purposive sampling was employed for the selection of respondents in the study. For the staff the use relevant post and responsibilities required for the study was employed. In view of this, staff who hold key posts were selected. Based on this 25 staff/teachers were selected from each school. In the case of the students on the other hand, posts of responsibility and academic performance were the criteria used for selection. Based on this, students who hold key posts and 15 academically sound students from each class (JSS 1 – SS 3) were selected. Table 1 gives a summary of the total number of respondents sampled per school.

Table 1: Total Population of Respondents

Respondent's Identity	*No per School*	*No of Schools*	*Total Population*
Teachers	25	15	375
Students	100	15	1500

Source: Researchers' Fieldwork (2020)

From Table 1, it was revealed that 25 teachers/staff were selected from each school. This gives a total population of 375 teachers/staff considered for the study. The study sampled 100 students from each school. This implies that 1500 students were considered for the study across the 15 public secondary schools selected in Minna, Niger State for the study.

The use of close ended questionnaire was adopted for the collection of data for the study. In order to examine and assess the level of compliance of COVID-19 control measures, a quantitative research approach was adopted. For phase I of the field work, the majority of quantitative data collected are secondary data (e.g. affected population figures provided by the government). During phase II, field level questionnaires complement the continued collection of secondary data through the collection of quantitative information using close ended questionnaire with two-response format (Yes/No). The questionnaire is made up of three sections. The first section addresses the profile of the respondents. The second section of the questionnaire seeks opinion of the respondents on the issue of awareness of COVID-19 control measures. The opinion of the respondents on the issue of compliance with seven (7) major COVID-19 control measures was sought in the third section. The categorical data obtained from questionnaire were transformed into percentage (continuous data) before being subjected to inferential analysis in order to determine the proportion of teachers and students that are aware of the COVID-19 control measures to test the study's hypotheses.

The study employed the use of descriptive and inferential methods of analysis for the study. This included the use of frequency counts average, and percentage in order to determine the level of compliance to the measures preventing the spread of COVID-19 by the staff/teachers and students. The use of student's t test was employed to determine the difference between the percentage of staff/teachers and students who are aware of the preventive measures of COVID-19 pandemic. The data collected were transformed from categorical data into continuous data by changing them into percentage of teachers and students that are aware of the control measures of COVID-19 pandemic in each of the public secondary schools considered for the study. The analysis of the questionnaire survey data was undertaken using the MS Excel and Statistical Package for Social Sciences (SPSS) Version 20.0. The inferential statistics was carried out at 5% level of significance.

In order to validate the research instrument used, a reliability test was carried out on the data collected. The result of the reliability test is summarised in Table 2.

Table 2: Reliability Test

Item No	*Variable*	*Inter Item Correlation Coefficient*
1	Teachers' Compliance	1.000
2	Teachers' Awareness	0.330
3	Teachers' Average Awareness	0.996
4	Teachers' Percentage Awareness	0.549
5	Students' Compliance	0.376
6	Students' Awareness	0.370
7	Students' Average Awareness	0.375
8	Students' Percentage Awareness	0.237
N	***15***	
Cronbach's Alpha	**0.778**	
Cronbach's Alpha Based on Standardized Items	**0.812**	

Researchers' Field Survey (2020)

Table 2 shows that all the items loaded have fairly good correlation coefficient which range between 0.237 and 1.000. The Cronbach's Alpha of 0.778 observed for the reliability test is high and close to 1.000. The Cronbach's Alpha based on standardized items is 0.812 and is of a higher value and closer to 1.000. This shows that the research data are reliable and hence the research instrument is valid.

Results and Discussion

In order to carry out the inferential analysis for this study, the data collected on the number of teachers and students that are aware and not aware of the control measures of COVID-19 pandemic were transformed from categorical data (Yes/No) into continuous data (percentage). In order to do this, the data was transformed into the percentage of Teachers and Students that are aware of the control measures of COVID-19 in the 15 public secondary schools studied in Minna, Niger State. This is illustrated in Figures 1 and 4.

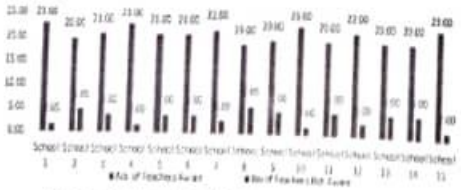

Fig. 1: Comparison between Number of Teachers Aware and Unaware of COVID 19 Measures in Selected Public Secondary Schools in Minna, Niger State

Figure 1 presents the result of data collected on the number of Teachers that are aware of the control measures of COVID-19 and the number of teachers that are not aware of the control measures of COVID-19 pandemic across the 15 secondary schools considered for the study. It was shown that in all the 15 public secondary schools, the number of Teachers that are aware of the control measures of COVID-19 pandemic are more than the number of those that are not aware.

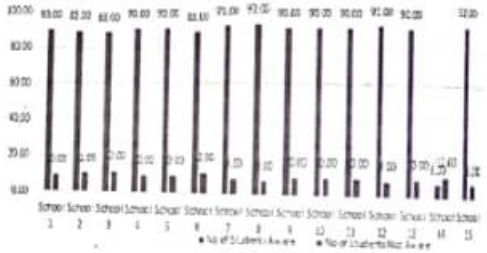

Fig. 2: Comparison between Number of Students Aware and Unaware of COVID 19 Measures in Selected Public Secondary Schools in Minna, Niger State

Figure 2 presents the result of data collected on the number of students that are aware of the control measures of COVID-19 and the number of students that are not aware of the control measures of COVID-19 pandemic across the 15 secondary schools considered for the study. It was also indicated here that in all the 15 public secondary schools, the number of Students that are aware of the control measures of COVID-19 pandemic are more than the number of those that are not aware.

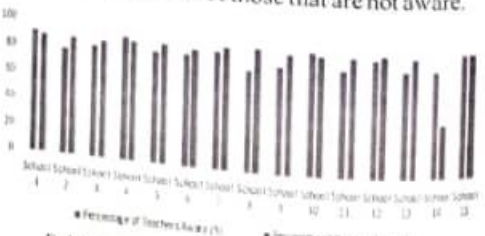

Fig. 3: Comparison between Percentage of Teachers and Students Aware of COVID 19 Measures in Selected Public Secondary Schools in Minna, Niger State

Figure 3 shows the result of the transformed data into the percentage of Teachers and Students that are

aware of the control measures of COVID-19 pandemic in the 15 public secondary schools considered for the study. Figure 3 compares the data on the percentage of Teachers that are aware of the control measures of COVID-19 pandemic and the percentage of students that are aware of the control measures of COVID-19 pandemic in the 15 public secondary schools considered for the study. It was revealed that in most of the schools (Schools 2, 3, 5, 6, 7, 9, 11, 12, 13 and 14) the percentage of Teachers that are aware of the control measures of COVID-19 pandemic is less than the percentage of the students that are aware of the control measures of COVID-19 pandemic. In the fifteenth school, equal proportion of Teachers and Students are aware of the control measures of COVID-19. In Schools 1, 4, 8 and 10, the percentage of Teachers that are aware of the control measures of COVID-19 pandemic is greater than the percentage of the Students that are aware of the control measures of COVID-19 pandemic. This gives a fluctuating or irregular trend which calls for a further analysis. In view of this, before the inferential analysis was undertaken, an average value was computed for the fifteen schools on the percentage of Teachers and Students that are aware of the control measures of COVID-19 pandemic. This is shown in Figure 4.

• Average Proportion of Teachers Aware (%) • Average Proportion of Students Aware (%)

Fig. 4: Comparison between Average Proportion of Teachers and Students Aware of COVID 19 Measures in Selected Public Secondary Schools in Minna, Niger State

Figure 4 also shows a slightly lesser average proportion of teachers (84.80%) that are aware of the control measures of COVID-19 pandemic than the average proportion of Students (86.73) that are aware of the control measures of COVID-19 pandemic. This shows a similar trend from the result shown in Figure 3. On the basis of this, the use of the inferential analysis was further undertaken to compare the trend between Teachers and Students of the 15 public secondary schools selected in Minna, Niger State on the awareness of the control measures of COVID-19 pandemic. This was done in order to test the research hypothesis inferentially.

The inferehtial analysis is the independent sample t-test undertaken in order to determine the statistical difference between the percentage of Teachers and Students that are aware of the control measures of COVID-19 pandemic in the 15 public secondary schools in Minna, Niger State which were considered for the study. Table 3 presents the results of this independent sample t-test.

Table 3: T-Test Result on Proportion of Teachers and Students that are Aware of the COVID–19 Control Measures in 15 Public Secondary Schools in Minna, Niger State

	Variables Tested		*Observations*				*Inferences*	
Analysis No.	X_1	X_2	*Mean Values*	T_{cal}	T_{tab}	P_{value}	*Remark*	*Action on H_0*
	Teachers'	Students'						
	Awareness	Awareness	$X_1 = 84.80$					Accepted
1	Level	Level	$X_2 = 86.73$	0.531	2.040	0.600	NSD	

Source: Researcher's Analysis of Data (2020)

Key: NSD = No Significant Difference

In the t - test presented in Table 3, it was observed that there exists a non-statistically significant difference between the proportion of Teachers that are aware of the control measures of COVID-19 pandemic and the proportion of Students that are aware of the control measures of COVID-19 in the 15 public secondary schools sampled for the study. The mean value observed for the proportion of Teachers that are aware of the COVID-19 control measures is 84.800% while that of the Students is 86.733%. This implies that a slightly lesser proportion of Teachers are aware of the control measures of COVID-19 than the proportion of the Students that are aware of the control measures of COVID-19 pandemic. This supports the results of the descriptive analysis in Figure 3. The t calculated

value of 0.531 observed was less than the t tabulated value of 2.040 and the observed P (sig.) value of 0.600 was greater than 0.05. This implies that there is no significant difference between the proportion of Teachers that aware of the control measures of COVID-19 and the proportion of Students that are aware of the control measures of COVID-19 pandemic. This led to the acceptance of the null hypothesis which states that there is no significant difference between the proportion of Teachers and Students that are aware of the control measures of COVID-19 pandemic in public secondary schools in Minna, Niger State. The study of Okoro *et al.* (2020) agrees with the finding if this study because it revealed a high level of knowledge, practices and attitude among correctional officers towards COVID-19. Also in line with this study, is the finding of a related study by Oyeyemi *et al.* (2020) that a high proportion of respondents had correct knowledge about COVID-19. For this reason, Oyeyemi *et al.* (2020) further reported that to effectively continue to break the chain of transmission of the current outbreak of COVID-19, there is an urgent need for a robust and continuous public enlightenment about the disease.

In the descriptive analysis, the data so collected were organised and presented in a clear and systematic way, so that the analysis can result in valid and accurate conclusion. For this purpose, the proportion of teachers and students in compliance with control measures of COVID-19 was determined under seven (7) major control/preventive measures. These are:

i. Ensuring people with symptoms of COVID-19 do not come to work/school.
ii. Screening staff and students.
iii. Physical (Social) distancing.
iv. Good/Personal hygiene.
v. Cleaning and disinfection.
vi. Contact Tracing.
vii. Use of Personal Protective Equipment (PPE).

The result of the descriptive analysis on the seven (7) measures identified are presented in Table 4.

Table 4: Results of Teachers' and Students' Compliance with COVID-19 Control Measures in 15 Public Secondary Schools in Minna, Niger State

S/N	MEASURES	TEACHERS		STUDENTS	
		Yes (%)	No (%)	Yes (%)	No (%)
1	**Ensuring people with symptoms of COVID 19 do not come to work**				
a.	Awareness of COVID 19	92	8	90	10
b.	COVID 19 patient are not allowed to come to work or school	83	17	46	54
c.	Symptoms of COVID 19	95	5	38	62
Average		***90***	***10***	***58***	***42***
2	**Screening workers and students**				
a.	Contact with persons with COVID 19	1	99	1	99
b.	Travel outside Minna Niger state recently	32	68	45	55
c.	Temperature check with touch free thermometer	60	40	40	60
Average		***31***	***69***	***29***	***71***
3	**Physical distancing (Social distancing)**				
a.	Understanding physical distancing	92	8	33	67
b.	Probability of implementing social distancing	9	91	5	95
	Implementing physical distancing at workplace/school will				

c.	reduce person in workplace/school spreading COVID 19	93	7			85	15	
d.	Implementing physical distancing at workplace/school will reduce person in workplace/school contacting COVID 19	93	7			80	20	
e.	Implementing physical distancing at workplace/school will reduce that person enter the workplace/school with COVID 19	95	5			92	8	
Average		***76***	***24***			***59***	***41***	
4	**Hygiene**							
a.	Practice good hygiene	99	1			98	2	
b.	Adequate facilities to achieve good hygiene	55	45			45	55	
c.	Adequate suppliers of	53	47			32	68	
Average		***69***	***31***			***58***	***42***	
5	**Cleaning and disinfection**							
a.	Appropriate implementation of cleaning and disinfection measures at workplace/school	60	40			47	53	
b.	More frequently used place is more frequently clean	55	45			35	65	
c.	More frequently used equipment are cleaner	55	45			35	65	
Average		***57***	***43***			***39***	***61***	
6	**Contact tracing (Any contact tracing)**	0	100			0	100	
7	**Personnel Protective Equipment (PPE)**							
a.	Face mask are worn at the school	65	35			70	30	
b.	Types of face mask worn	**N95 & P2 Mask**	**Surgical Mask**	**Cloth Mask**	**N95 & P2 Mask**	**Surgical Mask**	**Cloth Mask**	
	Frequency (%)	10	30	60	0	30	70	

Source: Researchers' Analysis of Data (2020)

The compliance with the measures of ensuring that people with symptoms of COVID-19 do not come to work is shown in items 1a – 1c of Table 4. The result shows that 90% of Teachers comply with these measures while 10% do not comply with the measures. On the other hand, 58% of the Students comply with these measures while 42% are do not. This indicates that the proportion of Teachers who comply with the measures of ensuring that people with symptoms of COVID-19 do not come to work is more than that of the Students. The compliance with the measures of screening workers and students is presented in items 2a – 2c of Table 4. It was shown that 31% of Teachers do not comply with these measures while 69% do not. However, 29% of Students comply with these measures while 71% do not. This shows that both Teachers and students have low level of compliance with the measures of screening workers and students in Secondary Schools in Minna. Although, the proportion of Teachers who comply with these measures is more than that of the Students. The Teachers and Students' compliance with the measures of physical distancing (social distancing) is presented in items 3a – 3e of Table 4. It was revealed that 76% of the Teachers comply with these measure while 24% do not. On the other hand, 59% of the Students comply with these measures while 41% do not. These shows that the proportion of Teachers that comply with the measures of Physical distancing is more than that of the students.

Items 4a – 4c of Table 4 shows the result of the compliance of Teachers and Students with the measures of personal hygiene. It was shown that 69% of the Teachers comply with these measures while 31% do not. However, 58% of the Students comply with these measures while 42% do not. The indication of this is that the proportion of the Teachers that comply with the measures of personal hygiene is more than that of the Students. The compliance with the measures of cleaning and disinfection is presented in item 5a – 5c of Table 4. It was revealed that 57% of the Teachers comply with these measures while 43% do not. On the other hand, 39% of the Students comply with these measures while 61% do not. This, however, indicates that the proportion of Teachers that comply with the measures of cleaning and disinfection is more than that of the Students. Item 6 of Table 4 shows the result of the compliance with the measure of contact tracing. It was revealed that none of the Teachers and Students comply with the measure of contact tracing. The reason is because none of them have come in contact with a person that contacted COVID-19. The result of the analysis on Personnel Protective Equipment (PPE) is presented in items 7a and 7b of Table 4. It was shown that 65% of Teachers wear mask while 35% of Teachers do not wear mask within the school premises. Seventy percent (70%) of Students wear mask while 30% of Students do not wear mask within school premises. Students respect wearing of mask more than their teachers.

In summary, the results of this study indicates that both the Teachers/Staff and Students have high level of awareness of and compliance with the control measures of COVID-19 in the selected secondary schools in Minna, Niger State on the average. However, the Teachers have been shown to have higher level of awareness and compliance than the Students on the average. This may be as a result of the fact that the Students are supposed to learn from the Teachers while the Teachers are expected to be a good example to the Students. Although, on the overall both the Teachers and Students have high level of awareness of and compliance with the control measures of COVID-19. The overall finding of this study is in line with the finding of the study of Carvalho *et al.* (2020) where it was reported that training and supporting teachers and other school staff to offer school-based psychosocial support to returning students; and prepare for a spike in the number of students with malnutrition and other unmet basic needs will help in increasing the level of compliance to COVID-19 control measures. In addition, Oyeyemi *et al.* (2020) found that Nigerians' knowledge, perception and adherence to preventive measures of COVID-19 is averagely high.

Conclusion and Recommendations

Findings from the analysis of data led to the conclusion that both Teachers and Students of the selected secondary schools in Minna, Niger State have high level of awareness of and compliance with the control measures of COVID-19 pandemic except for the measures of contact tracing which is not the sole responsibility of the schools' management anyway and can only be implemented when there is a reported case of COVID-19 in such a school. In addition, the Teachers have higher level of awareness and compliance with the measures of controlling COVID-19 pandemic than the Students. In view of the conclusions made, it is recommended that the school management should constantly organise orientation and re-orientation for both staff and students, especially the staff in schools on the control measures of COVID-19 so as to maintain high level adherence and awareness rate at all times. School management should always put up mechanism for implementing the contract tracing

measures in order to act immediately when a case of COVID-19 is found among staff or students in a school. Finally, the government should ensure that the education budget of the country takes care of additional fund to support schools in the implementation of the control measures of COVID-19 pandemic and such budget should be fully implemented because education is one of the most important sector that must be given priority at this period of time.

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