

Workplace Violence against Health Care Workers in Nigeria

Taagbara Jolly Abaate¹, Tamunodiepiriye Inimgba¹, Vivian Ifeoma Ogbonna¹, Chizaram Onyeaghala², Celine Ude Osi¹, Abiye Somiari¹, Agiri A. Utchay (JR)³, Dabota Yvonne Buowari⁴ under the aegis of the Scientific and Research Committee of the Association of Resident Doctors, University of Port Harcourt Teaching Hospital

Departments of ¹Community Medicine, ²Internal Medicine, ³Family Medicine and ⁴Accident and Emergency, University of Port Harcourt Teaching Hospital, Port Harcourt, Nigeria

Abstract

Background: Workers anywhere are exposed to assault at the workplace and the worst affected are service providers. Globally, the highest incidence occurs among health-care workers (HCWs) and it is a workplace hazard. **Aim:** This is a review article investigating the burden of violence against HCWs in Nigeria. **Materials and Methods:** To provide the evidence of violence against HCWs, a narrative review of pertinent papers on workplace violence (WPV) against HCWs in Nigeria was conducted using the databases PubMed, Ajol, and Google Scholar. We found that violence against HCWs is high in the health sector. It is further worsened by conflict situations and the COVID-19 pandemic. Nurses and physicians are the common victims. The most common perpetrators are companions of patients followed by the patients themselves. Worse still is that the victim/survivors may do little or nothing about it. Worse, there is no protocol in place to prevent recurrence, so victims/survivors may have little or no recourse. **Conclusion:** WPV occurs in health care. Therefore, there must be reporting systems in all Nigerian including protocols to prevent this menace.

Keywords: Health-care workers, perpetrators, violence, workplace

INTRODUCTION

Workplace violence (WPV) was defined by the World Health Organization (WHO) as the intentional use of physical force or power, whether threatened or actual, against another person, oneself, or a group of people, which results in or has a high probability of resulting in injury, death, psychological harm, mal-development, or deprivation.^[1] It occurs when an employee is being abused, threatened, or assaulted on the grounds of their employment, including commuting to and from work, causing an implicit or explicit challenge to their safety, well-being, or health.^[2] According to the National Institute for Occupational Safety and Health, WPV was defined as violent acts, including physical assaults, directed toward a person at work or on duty.^[3] Empirical evidence has suggested that 30% of violence that occurs in society is related to WPV.^[4] WPV is reportedly the leading cause of death among workers worldwide.^[5] Annually, WPV results in the death of 1.5 million workers and 8% and 33% suffer physical violence.^[5]

Globally, the health industry is where WPV occurs most frequently^[6] as greater than one-third of WPV is directed at

health-care workers (HCWs).^[7-9] This is why the Australian Institute of Criminology referred to medical care as the worst profession in which its practitioners are frequent victims of violence at their place of work.^[10] It is a public health concern and occupational hazard due to its increasing incidence worldwide.^[7,9,11] Any HCW can be assaulted while they are working although some are more affected than others.^[12,13] Most cases of violence against HCWs are not reported^[14] and it is worst in countries or health institutions where there are no policies against violence against HCWs or reporting systems. It is worst in developing countries where the condition of health-care delivery is abysmal.^[7,9,15]

All employees are susceptible to being assaulted while at work, but it is worse in workers who are service providers such as

Address for correspondence: Dr. Dabota Yvonne Buowari, Department of Accident and Emergency, University of Port Harcourt Teaching Hospital, Port Harcourt, Nigeria. E-mail: dabotabuowari@yahoo.com

This is an open access journal, and articles are distributed under the terms of the Creative Commons Attribution-NonCommercial-ShareAlike 4.0 License, which allows others to remix, tweak, and build upon the work non-commercially, as long as appropriate credit is given and the new creations are licensed under the identical terms.

For reprints contact: WKHLRPMedknow_reprints@wolterskluwer.com

How to cite this article: Abaate TJ, Inimgba T, Ogbonna VI, Onyeaghala C, Osi CU, Somiari A, *et al.* Workplace violence against health care workers in Nigeria. *Niger J Med* 2022;31:605-10.

Submitted: 03-Oct-2022

Revised: 08-Nov-2022

Accepted: 14-Dec-2022

Published: 28-Feb-2023

Access this article online

Quick Response Code:



Website:
www.njmonline.org

DOI:
10.4103/NJM.NJM_102_22

bankers, law enforcement agents, teachers, and HCWs. The worst affected by violence in the workplace are HCWs.^[14,16]

WPV can also occur in the community or when the HCW is going to or returning from work. WPV affects the health, welfare, and well-being of the victim. HCWs encounter hostile and violent behavior from the people they provide medical services to. The prevalence of WPV in the medical workplace varies between countries, especially between developing and developed countries.^[7] This may be due to the availability of support systems for the victim in developed countries, globally 8%–38% of health-care providers are physically at some time in their professional practice, and most of the assailants are the people receiving medical care that is patients and individuals who accompany patients to the health facility.^[11] The frequency of violence among HCWs varies in all places as the risk has been reported to be more in psychiatric units, emergency departments, and geriatric units.^[1]

A systematic review revealed that some HCWs experienced mild aggressive events (verbal insults and abuses), 26% were victims of moderate aggression like criminal damage to property, while 8% experienced sexual assault and physical violence.^[17] In Germany, primary health physicians that were victims of dreadful hostility were 23%.^[18] Some American studies carried out between 2004 and 2015 showed that physicians and nurses commonly reported verbal abuse as 39%–99% experienced it.^[17] Nurses have been physically attacked or verbally abused in their workplaces in countries such as Poland, the Czech Republic, Slovakia, and Turkey.^[16] About 26% of physicians working in primary health care in Canada had exposure to aggressive behavior.^[17]

About 88% of HCWs in developing countries were victims of various types of WPV, and the majority of them were bullied, verbally abused, and attacked with an object.^[7] In Africa, the prevalence of assault on HCWs both at the workplace and in the community is alarming.^[7] Both physicians and nurses have been assaulted in their career life.^[19] In a study conducted in Sudan, 50% of physicians have encountered WPV, and 92% of the violence was verbal and psychological. The risk factors are younger ages <30 years and female gender.^[20] The majority of the perpetrators were men.^[20] In an Egyptian study conducted in the emergency unit, the prevalence of violence against HCWs was 59.7%.^[9] The various forms of violence experienced by HCWs were verbal abuse 58.2% and physical violence 15.7%. The cause of WPV in the emergency departments in Egypt was long waiting times and unmet expectations by both the patient and their family members.^[9] Most of the victims of the violence at the medical workplace did not report the abuse as only 29.5% that were verbally and 23.8% were physically abused reported the incident.

In Namibia, 100% of radiographers have experienced WPV.^[7,21] Gambian nurses reported a 62.1% prevalence of WPV,^[22] and Malawian nurses reported a 71% prevalence.^[7] Majority of the victims of WPV do not report the incidents when it occurs, even with the impact of the incident.

At least one in two physicians are victims of WPV. The result of various studies has shown that violence against HCWs is affected by the gender and age of the HCW.^[7] Furthermore, HCWs who work shifts, as well as those in the emergency and psychiatric units, are more vulnerable to workplace violence than other HCWs.^[23] The perpetrators of this violence are patients, escorts of patients who are their caregivers and relatives, colleagues, bosses, and other clinical and nonclinical staff of the hospital.^[7]

According to WHO, about 18 million HCWs are therefore required to achieve universal health care by 2030 in low- and middle-income countries (LMICs). This number of workers is nonexistent. The few HCWs available face violence, poor working conditions, and health funding.^[24] The health-care system in LMICs is not well developed, hence it becomes weakened by WPV, thereby worsening the poor health indices in Africa. To improve the health-care system, manpower in the health sector should be increased, safeguarded, and retained. They also need to be content and satisfied with their job as this will lead to good job performance and productivity. To achieve a good landmark in the health sector, violence against HCWs should be dealt with to a zero level. It is important to use all available strategies to protect HCWs against WPV, some of which are the development of policies and advocacy.^[7]

Any category of HCWs can be a victim of WPV while discharging their duties where they work, but nurses are thrice more predisposed to being assaulted than other HCWs.^[25] This may be because the nurses are always with the patients in the wards.

Types of violence health-care workers encounter

Different types of violence can occur in the medical workplace. The WHO categorized WPV into psychological, physical, sexual, and racial.^[11] Physical violence involves physical contact or combat between the assailant and the victim. Physical abuse is reported to occur within health-care facilities four times more often than in all other industries. There is no physical contact between the victim and the perpetrators in nonphysical workplace violence, which includes verbal, emotional, and sexual harassment. Verbal abuse is defined as using offensive and derogatory words and tone and manner of voice against a health worker; it includes shouting, yelling, and even making threats. It leaves no visible scars, but the emotional damage can be devastating leaving the victim feeling personally or professionally humiliated, attacked, or devalued. Bullying, abuse, and beating with objects are the most prevalent forms of violence experienced by HCWs while at work in underdeveloped countries, where the quality of care and service is appalling.^[7,23]

This article reviews the burden, causes, perpetrators, and consequences of WPV on HCWs in Nigeria.

MATERIALS AND METHODS

This article narratively reviews relevant articles on violence in the medical workplace in Nigeria from several databases

including PubMed, Ajol, and Google Scholar demonstrating evidence of violence against HCWs. A search for the literature of studies conducted on assault on HCWs conducted in Nigeria was done on studies conducted on violence against HCWs in other countries that were excluded from this study. Furthermore, other Nigerian studies done on violence in workplaces that are not HCWs such as bankers, law enforcement agents, and teachers were excluded from this study.

The burden of assault on health-care workers In Nigeria

In Nigeria, 31.9%–78% of people experienced WPV.^[12] In all the studies conducted in Nigeria on WPV in the health sector, nurses were the most commonly assaulted followed by doctors. All the Nigerian studies used the descriptive cross-sectional study design. The results of various researches have shown that the incidence of WPV against HCWs in Nigeria ranges from 10% to 60%. This shows that almost all HCWs working in Nigeria have been assaulted at one time or the other at their workplace. Emotional and verbal assault against HCWs is the most common type of WPV in Nigerian medical facilities. Verbal violence occurs when an assailant uses inappropriate words against the victim.^[9]

In the study conducted at the Katsina General Hospital located in Northern Nigeria, all the HCWs sampled had experienced violence at their workplace.^[26] Verbal abuse was experienced by 88.1% of HCWs. At Federal Medical Centre, Umuahia, located in Eastern Nigeria,^[27] 87.1% of HCWs are at health-care facilities which provide a secondary level of medical care in the Kaduna metropolis.^[23] In the various studies, conducted nurses were to be the most common victims of WPV^[26] followed by medical doctors and dentists. Verbal abuse was the most common form of WPV experienced by HCWs in Enugu,^[28,29] Oshogbo,^[25] Benin City,^[30] and Sokoto^[31] and pharmacists.^[16] This was followed by physical violence, against nurses at general hospitals at Osun State^[32] and Federal Teaching Hospital Ido-Ekiti.^[22]

According to one study, verbal and psychological assaults on medical staff members are a common form of violence, occurring in an estimated 60% of hospitals in Oshogbo, Nigeria.^[25] Of those who faced physical assault, it was revealed that 64.5% were nurses, 19.7% were doctors, and 6.6% were pharmacists.^[27] A study conducted in six tertiary multi-center health facilities revealed that 65% of employees had experienced WPV in the emergency department,^[12] while the prevalence in the oral health-care centers in Nigeria was reported as about 32%.^[10] Furthermore, physical violence was found in a study to be about 12.6% prevalent in Enugu, Nigeria.^[29] Concerning physical assault, it was experienced by nurses compared to the doctors.^[33]

According to research done in a psychiatric health facility in Nigeria, physical assault against HCWs in mental health was shown to be pervasive. More than half of the employees are victims of physical assault perpetrated by patients once or

more during the time that they had worked at the facility.^[34] Just within the last year before the study was conducted, 30.6% of the staff had been physically attacked. Pushing was the most experienced type of physical assault in the hospital. Other types that occur are hitting with hands or with an object, kicking, shaking, and attempts at strangulation.^[34] Sometimes, the incidents occurred while making efforts to make a violent patient calm.

Furthermore, it was observed in a study carried out at a multi-specialist hospital that psychological violence was the most experienced by the selected health workers compared to physical violence, which stood at 72% and 0.7%, respectively.^[27] Psychological violence usually takes the form of verbal attacks, threatening remarks, and sexual harassment. The study also revealed that the victims were mostly nurses (69.7%), followed by doctors (28.9%) and pharmacists (7%).^[27] Furthermore, type 3 violence was observed with the dominant types being bullying and sexual harassment.^[27] Female doctors were more likely than younger respondents, those under 30 years old, to have encountered violent episodes.^[20]

There is no particular time at which a HCW can be assaulted, but it was more prevalent in the morning. The violence can occur anywhere within the premises of the hospital, where HCWs are in contact with clients and patients. In Nigeria, it occurs commonly in the wards and clinics. It is common in the morning when there are a large number of people waiting to collect their medical case folders to see the doctor's physical violence comprising bullying, lifting, biting, slapping, kicking, and attacking with a weapon. The weapon used is items present at the health facility or clubs and firearms brought by the assailant from home.

Perpetrators of workplace violence against health-care workers in Nigeria

Anyone who comes in contact with an HCW can assault them. This can be the patients' clients themselves or their escorts and companions. The escorts and companions of patients in Nigeria could be anyone who accompanies the patient to a health facility or visits the patient when they are admitted to the hospital. These are the caregivers, relatives or visitors, relatives, and their escorts for the patients. This is followed by patients, colleagues, and other hospital staff, both clinical and nonclinical, as well as management staff.

9.6% of the offenders in a study from Enugu and 5.1% in a study from Katsina were hospital employees.^[26] The majority of the assailants that assault HCWs in Nigeria while they are discharging their legitimate duties caring for the sick are of the male gender.^[16] Relatives of the patients made up 55.6% of those who assaulted the HCWs physically and psychologically, while staff personnel made up 23.4% at Nigerian mental health hospitals.^[35] In terms of perpetrators in the Nigerian multi-specialist hospital survey, patients' relatives were observed to be the main culprits in all the categories of violence while the patients initiated most of the physical assaults and sexual harassment.^[27]

Causes of assault of health-care workers in Nigeria

There are several reasons why incidents of violence occur at medical facilities in Nigeria. Aggressive, violent, and hostile behavior may be exhibited by patients and the people that accompany them to the hospital. This could be due to a variety of factors, including illness they or the person accompanying them are suffering from, adverse effects from prescribed medications, or dissatisfaction with the medical care received. Patients and their families may also have a history of violent behavior or feel frustrated and angry as a result of the patient's circumstances.^[1] Poor working conditions of health facilities in Nigeria and lack of required medical supplies can get patients and their companions impatient. Some of the factors are related to the victim, the assailant, or both parties. Individual factors related to the HCW include a communication gap and a negative attitude. Counseling of patients should be done always and updated about the diagnosis, management plan, and the possible prognosis of the ailment. Patient caregivers should also be communicated with, but with medical ethics, particularly the ethical principle of autonomy, in mind. Shortage of staff and increased work load can make HCWs exhibit a bad attitude and become rude to patients and their companions. Factors related to the assailant are drug abuse, alcoholism, and violent behavior.

Other causes of workplace violence among health-care workers in Nigeria are:

1. Long waiting time: This is the most common reason why HCWs are assaulted at the workplace.^[16,10,22,24] It has been worsened by the increased rate at which HCWs in Nigeria migrate to the Western world due to brain drain, especially among doctors, dentists, and nurses. It is estimated that one-fifth of HCWs in Africa are migrating to the Western world^[36,37]
2. Breach of the hospital policies on visiting time: This occurs when patients' relatives and friends want to visit the patient when it is not the time visitors are allowed to visit patients in the hospital^[38]
3. Hospital bills: There are only a few of the Nigerian populace that has been enrolled in the National Health Insurance Scheme and some others are on various community health insurance schemes. Therefore, most patients have to pay out of pocket. This is a source of violence, especially when the patient or their caregiver does not have funds to pay for the medication which may be consultation fees, admission fees, laboratory investigations, or even for medications^[10,38]
4. Nonavailability of a vacant bed to admit patients: This is a common source of WPV in areas of the hospital that attend to emergencies and trauma.^[23,25] In large hospitals in Nigeria where there are specialized units to manage trauma and burns, it makes patients' relatives agitated and angry that they assault HCWs
5. Rescheduling of dental appointments and surgeries^[10]
6. Unmet expectations of patients or their escorts/companions^[16,25]
7. Patient not improving or responding to treatment^[10,25]
8. Patients' demise^[10,22,25]
9. Manpower shortage, this has been worsened by brain drain^[22,39]
10. Lack of mutual understanding and teamwork among medical personnel
11. Doctors and nurses are absent at night or during call hours.

Workplace violence against health-care workers in Nigeria in times of conflict

HCWs have been assaulted during times of conflict. Even when there is no conflict, doctors have been victims of kidnap as they have been from the hospitals where they work. Some were abducted while at home or on their way to or from work. Sometimes, the doctors and other HCWs are targets of violence during conflict.^[38] During conflicts, not only HCWs but also patients and ambulances transporting patients are attacked.^[40] This is an infringement of the victim's rights and a violation of the law of war and armed conflicts.^[40] When this happens, HCWs are afraid of being posted to work in conflict zones, and as a result, the communities and people to whom they are supposed to provide medical care suffer.^[41] In 2020, during the end special anti-robbery squad protest, medical equipment and supplies were looted from hospitals. Doctors were physically attacked in some hospitals by the protesters and their personal belongings were destroyed and stolen.

The COVID-19 pandemic and the risk of workplace violence against health-care workers

The COVID-19 pandemic was a source of anxiety for some individuals. There was an increased rate of violence experienced by HCWs during the first wave of the pandemic. This was due to denial when patients were diagnosed with the disease and have to be transferred to the COVID-19 isolation centers. It was also a source of violence when the next of kin of deceased refuse to collect the death certificates of patients that died from the infection with severe acute respiratory syndrome coronavirus 2. According to the International Committee of the Red Cross in 2020, over 600 HCWs experienced violence during the time of the pandemic caused by COVID-19 globally. Medical facilities were also attacked. It is not surprising because violence is aggravated and intensified during a crisis including health emergencies.^[42]

Response of health-care workers who are victims of workplace violence in Nigeria

1. Some victims take no action when they are assaulted thinking that it is not necessary.^[23] Some of the reasons why some victims in Nigeria do not report incidents of violence at the medical workplace include the perpetrator's apology, regrets, and remorse, the absence of policies, protocols, or reporting systems, and the lack of incident reporting forms. Therefore, the issue of the nonexistence of policies and reporting systems for violence against HCWs needs urgent attention,^[9]

especially as several health-care facilities in Nigeria do not have policies on violence^[23]

2. Retaliate by abusing or physically fighting the assailant^[23,27]
3. The incident was reported to the supervisor, boss, or head of the department^[23,27]
4. The incident was reported to the appropriate professional organization^[23,25]
5. Pressed charges with the police^[23]
6. Alerted the hospital security.^[25]

Consequences of workplace violence of health-care workers

In addition to the effects it has on individual workers, WPV also has an impact on the organization through reduced output, absenteeism, payment of compensation, loss of experts, job dissatisfaction, and workers' turnover.^[9] It can lead to injuries, job dissatisfaction, and death.^[43]

Assault has a lot of untoward effects on the victim which affects both the health and medical care that is been delivered. It affects both physical and mental health. The victim becomes overwhelmed and demoralized that they may no longer put in so much effort in their job. The consequences of the assault on the health-care provider are work-induced stress,^[44] diminished quality of the medical care delivery,^[9,45] detachment from the job,^[38] lackadaisical attitude to work,^[38] and the exhibition of truancy. The incident makes the victim consider exhibiting truancy and absenting themselves from work,^[46] reduced job satisfaction, complacency, and reduced job performance and productivity.^[16,31,33] This manifests in an increased number of HCWs who present a letter of ill health from their family doctors in the form of sick leave that victims submit to their supervisors.^[33] It also leads to increased turnover as the victims may want to resign from their job or relocate to another town or country.

The impact of WPV on the mental health of HCWs is burnout, depression, anxiety, poor well-being, and insomnia.^[43] Victims can also sustain bodily injuries inflicted by the assailant victims of violence against HCWs that required medical attention was 82.2% in a study conducted at the Federal Neuropsychiatry Hospital located in Yaba, Lagos, in 2009^[35] and 25% of victims of physical assault in two hospitals in Oshogbo.^[25]

Consensus for further research

To advocate for policies against WPV and carry out wide-reaching crusades on WPV in the health sector, documentation of the data and evidence is necessary.^[7] It is necessary that a national survey on this subject should be conducted to find out the actual prevalence in the country.

CONCLUSION

Employees sometimes encounter violence at their place of work. HCWs are sometimes confronted with various forms of assault. These assaults may be physical or nonphysical. The perpetrators of this violence are patients, patient's relatives, and

hospital staff. The circumstances to lead to such incidents are factors related to the assailant, victim, and the health facility. One of the consequences of the COVID19 pandemic is an increase in the incidence of WPV in health care, because the rate of violence of all types rises in times of crisis, including during the COVID19 pandemic. Although most Nigerian health facilities do not have policies against it, the HCWs in Nigeria have developed strategies to combat it because it affects the mental and physical health of both the victim and other HCWs who witnessed the incident.

Acknowledgment

Dr. Omosivie Maduka, a mentor of the Scientific and Research Committee of the Association of Resident Doctors, University of Port Harcourt Teaching Hospital branch, is acknowledged.

Financial support and sponsorship

Nil.

Conflicts of interest

There are no conflicts of interest.

REFERENCES

1. Al-Turki N, Afify AA, AlAteeq M. Violence against health workers in family medicine Centers. *J Multidiscip Healthc* 2016;9:257-66.
2. Shahjalal M, Gow J, Alam MM, Ahmed T, Chakma SK, Mohsin FM, *et al.* Workplace violence among health care professionals in public and private health facilities in Bangladesh. *Int J Public Health* 2021. p. 115.
3. Center for Disease Control and Prevention. The Nations Institute for Occupational Safety and Health (NIOSH). Violence Occupational Hazards in Hospitals. Available from <https://www.cdc.gov/niosh/docs/2002-101/default>. [Last accessed on 2022 Oct 02].
4. Gignon M, Verheye JC, Manaouil C, Ammirati C, Turban-Castel E, Ganry O. Fighting violence against health workers: A way to improve quality of care? *Workplace Health Saf* 2014;62:220-2.
5. Injuries and Violence. Available from: <https://www.who.int/newsroom/fact-sheets/detail/injuries-and-violence>. [Last accessed on 2022 Aug 31].
6. Binmadi NO, Alblowi JA. Prevalence and policy of occupational violence against oral healthcare workers: Systematic review and meta-analysis. *BMC Oral Health* 2019;19:279.
7. Njaka S, Edeogu OC, Oko CC, Goni MD, Nkadi N. Work place violence (WPV) against healthcare workers in Africa: A systematic review. *Heliyon* 2020;6:e04800.
8. Bofo IM, Hancock P. Workplace violence against nurses: A cross-sectional descriptive study of Ghanaian nurses. *SAGE Open* 2017;7:1-9.
9. Abdellah RF, Salama KM. Prevalence and risk factors of workplace violence against health care workers in emergency department in Ismailia, Egypt. *Pan Afr Med J* 2017;26:21.
10. Azodo CC, Ezeja EB, Ehikhamenor EE. Occupational violence against dental professionals in southern Nigeria. *Afr Health Sci* 2011;11:486-92.
11. World Health Organization. Framework guidelines for Addressing Workplace Violence in the Health Sector. Geneva, Switzerland: International Labour Office (ILO), International Council for Nurses (ICN), World Health Organization (WHO), and the Public Services International (PSI); 2020. Available from www.who.int/violence-injury-prevention/violence/activities/work-place/en/. [Last accessed on 2022 Oct 02].
12. Ogundipe KO, Etoneyaku AC, Adigun I, Ojo EO, Aladesanmi T, Taiwo JO, *et al.* Violence in the emergency department: a multicentre survey of nurses' perceptions in Nigeria. *Emerg Med J* 2013;30:758-62.
13. Ferrinho P, Sidat M, Delgado AP, Pascoal E. Overlooking workplace violence in health workforce planning in Sub-Saharan Africa. *Int J Health Plann Manage* 2022;37:568-71.

14. Turgut K, Yavuz E, Yıldız MK, Poyraz MK. Violence toward emergency physicians: A prospective-descriptive study. *World J Emerg Med* 2021;12:111-6.
15. Seun-Fadipe CT, Akinsulore AA, Oginni OA. Workplace violence and risk for psychiatric morbidity among health workers in a tertiary health care setting in Nigeria: Prevalence and correlates. *Psychiatry Res* 2019;272:730-6.
16. Khalid GM, Idris UI, Jatau AI, Wada YH, Adamu Y, Ungogo MA. Assessment of occupational violence towards pharmacists at practice settings in Nigeria. *Pharm Pract (Granada)* 2020;18:2080.
17. Mento C, Silvestri MC, Bruno A, Muscatello MR, Cedro C, Pandolfo G, *et al.* Workplace violence against healthcare professionals: A systematic review. *Aggress Violent Behav* 2020;51:101381.
18. Vento S, Cainelli F, Vallone A. Violence against healthcare workers: A worldwide phenomenon with serious consequences. *Front Public Health* 2020;8:570459.
19. Watson A, Jafari M, Seifi A. The persistent pandemic of violence against health care workers. *Am J Manage Care* 2020;26:e377-9.
20. Elamin MM, Hamza SB, Abbasher K, Idris KE, Abdallah YA, Abdalmagsad KA, *et al.* Workplace violence against doctors in Khartoum State, Sudan. *Sudan J Med Sci* 2021;16:301-19.
21. Amkongo M, Daniels RE, Hattingh C, Kalondo L, Karera A, Nabasenja C. Workplace violence involving radiographers at a state radiology department in Windhoek Namibia. *South Afr Radiogr* 2019;57:19-23.
22. Ayamolowo SJ, Kegbeyale RM, Akewole KP, Adejuwon SO, Osunronbi FA, Akinyemi AO. Knowledge, experience and coping strategies for workplace violence among nurses in federal teaching hospital Ido-Ekiti, Ekiti State, Nigeria. *Inter J Sci Res Publ* 2020;10:895-900.
23. Usman NO, Dominic BO, Nwankwo B, Nmadu AG, Omole NV, Usman OA. Violence towards workers in the workplace: Exploratory findings in secondary healthcare facilities in Kaduna metropolis, Northern Nigeria. *Babcock Univ Med J* 2022;5:28-36.
24. World Health Organization. Health Workforce Requirements for Universal Health Coverage and the Sustainable Development Goals. (Human Resources for Health Observer, 17). World Health Organization; 2016. p. 40. Available from: <https://apps.who.int/iris/handle/10665/250330>. [Last accessed on 2022 Aug 31].
25. Abodurin OL, Adeoye OA, Adeomi HA, Akande TM. Prevalence and forms of violence against healthcare professionals in a southwestern city, Nigeria. *Sky J Med Med Sci* 2014;2:067-72.
26. Abdullahi IH, Thomas K, Sanusi FF. Violence against nurses in the workplace: who is responsible? *Inter J Sci Tech Mgt* 2018;7:1-7. Available from: <https://www.ijstm.com>. [Last accessed on 2022 Oct 02].
27. Ogbonnaya GU, Ukegbu AU, Aguwa EN, Emma-Ukaegbu U. A study on workplace violence against health workers in a Nigerian tertiary hospital. *Niger J Med* 2012;21:174-9.
28. Arinze-Onyia SU, Agwu-Umahi OR, Chinawa AT, Ndu AC, Okwor TJ, Chukukasi KW, *et al.* Prevalence and patterns of psychological and physical violence among nurses in a public tertiary health facility in Enugu, South-South Nigeria. *Inter J Adv Med Health Res* 2020;7:15-22.
29. Chinawa AT, Ndu AC, Arinze-Onyia SU, Ogugua IJ, Okwor TJ, Kassy WC, *et al.* Prevalence of psychological workplace violence among employees of a public tertiary health facility in Enugu, Southeast Nigeria. *Niger J Clin Pract* 2020;23:103-9.
30. Ogboghodo EO, Okojie OH. Workplace violence in the health sector: An assessment of prevalence and pattern. *Eur J Public Health* 2020;30 Suppl 5:979-80.
31. Yunusa EU, Ango UM, Musa AS, Shaba MA, Khadija AS. Prevalence and factors associated with workplace violence against health care workers in tertiary hospitals in Sokoto, Nigeria. *Inter J Curr Res* 2018;10:72234-8.
32. Douglas KE, Enikanaselu OB. Workplace violence among nurses in general hospitals in Osun State, Nigeria. *Nig J Med* 2019;28:510-24.
33. Onyia SU, Chinawa AT, Ndu AC, Okwor TJ, Agwu-Umahi OI, Obionu I, *et al.* Factors and characteristics of physical violence among healthcare workers of a tertiary hospital in Enugu, Nigeria. *Inter J Comm Med Public Health* 2019;6:5027.
34. Akanni OO, Osundina AF, Olotu SO, Agbonile IO, Otakpor AN, Fela-Thomas AL. Prevalence, factors, and outcome of physical violence against mental health professionals at a Nigerian psychiatric hospital. *East Asian Arch Psychiatry* 2019;29:15-9.
35. Ukpung DI, Owoeye O, Udofia O, Abasiubong F, Ukpung S. Violence against mental health staff: A survey in a Nigerian psychiatric hospital. *Psychiatrist* 2011;35:46-9.
36. Poppe A, Jirovsky E, Blacklock C, Laxmikanth P, Moosa S, De Maeseneer J, *et al.* Why sub-Saharan African health workers migrate to European countries that do not actively recruit: A qualitative study post-migration. *Glob Health Action* 2014;7:24071.
37. Duvivier RJ, Burch VC, Boulet JR. A comparison of physician emigration from Africa to the United States of America between 2005 and 2015. *Hum Resour Health* 2017;15:41.
38. Uzobo E, Oriye BE, Omu RE. Violence in the health industry: An analysis of violence against healthcare professionals in Yenagoa, Bayelsa State. *Stud Soc Sci* 2020;1:76-90.
39. Salami B, Dada FO, Adelakun FE. Human resources for health challenges in Nigeria and nurse migration. *Policy Polit Nurs Pract* 2016;17:76-84.
40. Haar RJ, Read R, Fast L, Blanchet K, Rinaldi S, Taithe B, *et al.* Violence against healthcare in conflict: A systematic review of the literature and agenda for future research. *Confl Health* 2021;15:37.
41. International Committee of the Red Cross. Changing Behaviour Tackling Violence against Healthcare in Nigeria. The Central African Republic and Nigeria. Selected Experiences. Geneva: International Committee of the Red Cross; 2018. Available from: <https://www.icrc.org>. [Last accessed on 2022 Oct 02].
42. Devi S. COVID-19 exacerbates violence against health workers. *Lancet* 2020;396:658.
43. Magnavita N, Heponiemi T. Violence towards health care workers in a public health care facility in Italy: A repeated cross-sectional study. *BMC Health Serv Res* 2012;12:108.
44. Etim JJ, Basse PE, Ndep AO, Iyam MA, Nwikekii CN. Work-related stress among healthcare workers in Ugep Yakurr local government area, cross River State, Nigeria: A study of sources effects and coping strategies. *Inter J Ebola AIDS, HIV Infect Dis Immune* 2017;2:9-19.
45. Albalwei HS, Ahmed NF, Albalawi NM, Albalawi SS, Al-Enazi NH. Violence against healthcare workers of pediatric departments in Saudi Arabia: A systematic review. *Arch Pharm Pract* 2021;12:79-84.
46. Liu J, Gan Y, Jiang H, Li L, Dwyer R, Lu K, *et al.* Prevalence of workplace violence against healthcare workers: A systematic review and meta-analysis. *Occup Environ Med* 2019;76:927-37.