

## CONTEMPORARY ISSUES ON ORGAN DONATION AND TRANSPLANTATION IN NIGERIA: A DISCUSSION

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### ABSTRACT

Organ donation and transplantation is one of the areas of bioethical advancement in medicine that is attracting more attention in health care especially in developing countries like Nigeria. The technological advancement in medical technology has made it possible to prolong the lives of the patients having organs problems through transplantation of organs. However, one of the major challenges of organ transplantation in Nigeria is scarcity, because the number of organs available outnumbered the patients on the waiting list. This article examines contemporary issues and problems in relation to organ donation and transplantation in Nigeria among which are; sale of organs to the highest bidder, consent problems, compromised nature of medical personnel, cultural and religious influence, paucity of the Nigerian legal frame work and limited advance equipment in the health sector. The article also discusses the possible solutions to these challenges by drawing inference from other jurisdictions such as Belgium and United Kingdom. By adopting a doctrinal method of research through the use of primary and secondary materials such as Statutes, decided cases, journals, textbooks, conference papers, articles and magazines and finds the issues are a combination of socio-cultural and legal issues hindering the acceptability of organ donation and transplantation in Nigeria. It concludes that the issues can be addressed through adequate sensitization of the public on the need to donate organs to save lives and that government should make provisions to compensate those who altruistically donate in order to reduce sale of organs for financial gains. This article recommends that Nigerian Legislators should draw inferences from other jurisdictions with

comprehensive legislations on organ donation and transplantation to review their National Health Act.

**Keywords:** Organ donation and transplantation, National Health Act, Donor apathy, Opt-in and Opt-out organ donor system

## INTRODUCTION

The health status of an individual can be measured through the functionality of the vital organs in the body. Human organs are synergised such that when any of them is affected and not treated urgently or replaced, the quality and life expectancy of the affected person can be shortened.<sup>i</sup> Patients suffering from non-functionality of vital organs like the kidney, liver, lungs and heart can be managed through adequate dialysis and medications for a short period of time, but with exorbitant cost. It has been observed that the best way to resolve organ related issues is through transplantation.<sup>ii</sup> When a patient is in need of an organ, there must be a donor before transplantation can be realistic, therefore, the importance of organ donation cannot be over emphasized in the medical field. The necessity for organ donation and transplantation in recent time became prevalent as a result changes in lifestyle, heredity and medical issues leading to complicated organs diseases which can cause the death of patients if not urgently attend to The wide gap between those in need of human organs for transplantation and the number of organ available for transplantation in Nigerian society has become of serious concern.<sup>iii</sup>

The kidney is often the most affected organs in the body as it performs the essential function of removal of waste product and excess fluid from the body and the maintenance of fluid balance. The retention of such product can lead to death. The best way to treat a patient with a diseased and non-functional kidney is through transplantation. Although kidney diseases can be managed through dialysis which is very expensive it is not an absolute cure. In 1933, the Soviet surgeon Yu Yu Voronoy performed the first human-to-human kidney transplant. The kidney used for the transplant was not procured until 6 hours after the donor's death and was transplanted across a major blood group mismatch which probably could have accounted for its prompt failure.<sup>iv</sup>

After several failures in the history of organ transplantation in humans, history was made around the 1950s by David Hume in Boston when he used a cadaver kidney in an attempt to save the life of one of his patients who had kidney problem; however, the attempt was unsuccessful which could be as a result of poor technological equipment and complications.<sup>v</sup> Thereafter, in 1954 there was a turn around on the transplantation of kidney when Joseph Murray bypassed the barrier of rejection by using the patient's identical twin as the donor of a human kidney transplant. This time, the kidney transplanted was harvested from a living donor, who was a twin brother of the recipient. The transplantation was successful although, the recipient died of a heart attack eight years after transplantation.<sup>vi</sup> This survival of the recipient for years brought hope and chance for an improvement and advancement in the area of organ transplantation in the medical field.

Despite the success recorded in the second transplantation, there were still some challenges especially where there are issues of rejection from the recipient due to compatibility test between the donor and the recipient. This is so because when an organ is transplanted, the body of the recipient sees it as a foreign object, fights against and its complication can result in death.<sup>vii</sup> One of the people who contributed immensely to solve this problem was Peter Medawar, an immunologist who advocated tissue typing on both the donor and the recipient before a transplant as possible solution. The essence of doing this was to prevent the recipients' body from identifying the transplanted organ as "foreign". Further improvement on this challenge, was another breakthrough in 1983 when a Swiss pharmaceutical company produced *Cyclosporin*<sup>viii</sup> which enabled the body of the recipient to suppress the rejection of foreign tissue selectively.<sup>ix</sup> This broke the barrier between the recipient and unrelated kidney donor from living persons to save patients in need of organs. In Nigeria, organ donation and transplantation has not gained much ground, although there is a lot of improvement recently compared to what was in operation decades ago. The first successful organ transplantation procedure in Nigeria was a kidney transplant at St Nicholas Hospital in Lagos in 2001.<sup>x</sup> This success has opened the pathway to organ transplantation surgeries in Nigeria that has given rise to issues of organ donation and transplantation within the socio-cultural and legal ambit within this area of medical biotechnology operates.

Generally, there are four major ways in which organs donated can be transplanted. These are through auto-grafts,<sup>xi</sup> isografts,<sup>xii</sup> homografts<sup>xiii</sup> and xenografts.<sup>xiv</sup>

This paper discusses the contemporary issues on organ donation in Nigeria. It begins by considering the legal framework on organ donation, contemporary issues on organ donation such as sale of organs, compromise nature of the medical personnel, cultural and religious influences on organ donation, scarcity of organs, paucity of legal framework and regulations on organ donation and limited equipment in Nigerian the health sector. It also draws lessons from Belgium and England, two countries with advanced legal framework on organ donation and transplantation in order to make recommendation to Nigerian legislature on the identified issues.

## **ORGAN DONATION UNDER NIGERIAN LAW**

Organ donation and transplantation processes in Nigeria are still at developing stage when compared with other technologically advanced jurisdictions in the field of medical science. However, the demands for vital organs in Nigeria are on the increase which leads to inadequate organs available to meet the needs of patients. Generally, in Nigeria, the primary legislation on organ donation and transplantation is the National Health Act, 2014 (NHA).<sup>xv</sup> The Act makes essential contributions to organ donation related issues in terms of prohibition and limitation surrounding organ procurement and transplantation.

The NHA provides that human organs can be harvested from living body and cadaver and such must be carried out only by a licensed and permitted medical practitioner in charge of the clinical issue.<sup>xvi</sup> In order to secure adequate measures in this regard, the National Tertiary Hospital Commission was set up and empowered to give approval for the procedure to facilitate organ transplantation.<sup>xvii</sup> A review of related sections of the NHA on organ donation will aid the understanding of the issues thrown up on organ donations and transplantation by the provisions of the NHA.

Part VI of the NHA comprises of sections 49-53 and they center on the control and usage of blood, blood products, tissue and gametes in humans.<sup>xviii</sup> The tissues includes flesh, bone, organ, bone marrow etc.<sup>xix</sup> Section 47 of the NHA gave the Health Minister the power to set up the National Blood Transfusion Service for the Federation and this is mainly to monitor

blood transfusion services and its related matters across the country and to avoid commercialization of human blood.<sup>xx</sup> However, the National Blood Transfusion Service is not evenly circulated in the federation as many public Hospitals do not have enough blood in their blood banks as a result, these hospitals could not help to prevent the challenges of commercialising human blood donation.<sup>xxi</sup>

Furthermore, this NHA supports the removal of blood products and tissues from a living person with cautions. Thus, section 48 of the Act centers on the removal of tissue, blood or blood product with the consent of the donor. The Section specifically provides that a person shall not remove tissue, blood or blood product from the body of another living person for any purpose without the informed consent of the donor.<sup>xxii</sup>

Another issue that draws attention is in section 48 of the Act is the proviso against the provision for consent. It states that ‘the consent clause may be waived for medical investigations and treatment in emergency cases and in accordance with prescribed protocols by the appropriate authority’.<sup>xxiii</sup> As much as this provision appears helpful, it can be grossly abused. It also raises issues of the rights and ownership of human tissue and consent to use it. The medical treatment of an individual without consent for the purpose of investigation may amount to a gross breach of fundamental human rights especially where investigation of a crime is still ongoing and where the guilt of the defendant has not been established.

The NHA makes provisions against commercialization of organs. It provides that, ‘tissue, blood or a blood product shall not be removed from the body of another living person for the purpose of merchandise or commercial purposes’.<sup>xxiv</sup> This provision also poses certain challenges in the sense that it allows a donor to be reimbursed for a reasonable cost incurred by the donor in connection with organ donation.<sup>xxv</sup> The first question is how to determine ‘reasonable cost’? Secondly, does this provision wholly and practically prevent merchandising of human organs? The donor and recipient can have other private arrangement with each other without the knowledge of the medical personnel and the authority involved. Also, this provision only prohibits the sale of tissues, blood and blood products from a living donor; does it mean that organs harvested from a dead person can be merchandise since it was not covered by the provision? The Act left many questions unanswered and this calls for further review of the Act. Another notable provision of the Act is the provision under section 48 for the restriction to obtain an irreplaceable tissue by natural process from a person below the age of 18 years<sup>xxvi</sup> and anyone who contravenes the provisions of section 48 would be sanctioned accordingly.<sup>xxvii</sup>

This is commendable, but the Act did not specify to what extent a tissue which cannot regenerate by natural process can be taken from someone above the age of 18 years and in what capacity.

In addition, the NHA 2014, provided for appropriate usage of any tissue, blood or blood products collected or obtained. It provides that “subject to the provision of section 52 of this Act, a person shall use tissue removed or blood or a blood product withdrawn from a living person only for such medical or dental purposes as may be prescribed”.<sup>xxviii</sup> This section further provides for sanctions should this provision be contravened.<sup>xxix</sup> Furthermore, the removal and transplantation of human tissue from a living or dead persons can only be carried out in the hospital and by a medical practitioner or dentist<sup>xxx</sup> and upon a written authority of the medical practitioner in charge of the clinical services in the hospital or any other medical practitioner ordered by him who must not be the lead participant in a transplant for which he has granted authorization.<sup>xxxi</sup>

The Act also makes provision for the deceased donors whose organs are for the purpose of transplantation, treatment or training to be used in a prescribed manner in which the criteria and procedures for doing such must be regulated by the National Tertiary Health Institution Standards Committee<sup>xxxii</sup> and anyone who contravenes this provision is liable for an imprisonment of 5 years without an option of fine.<sup>xxxiii</sup> The body of a deceased can be donated through a Will made by the deceased before death which must be witnessed by at least two people or in the absence of a valid Will, if there is a written statement made by the deceased in the presence of competent witnesses and such a document must specify the particular organ or organs to be used either for transplantation or mortem examination.<sup>xxxiv</sup>

The purpose of such donation as indicated above could be for training of students, health, research, advance health science, therapy and therapeutic purposes.<sup>xxxv</sup> It is essential to state that a donor may prior to the removal his organ for transplantation revoke the offer. A deceased person can revoke the donation made through a Will by a codicil or other subsequent agreements after the Will to reveal the intention of the donor after death.<sup>xxxvi</sup> Although, the provision of section 57 of the NHA, centers on deceased donors but it is safe to say a living donor can also revoke the agreement to donate before the process begins since a person cannot be compelled or forced to donate to organ.

The current legislations on organ donation and transplantation in Nigeria needs a timely review because many practical areas are left out and some of the aspects covered on organ donation

are unrealistic and uncertain as there are a lot of loopholes in the mode of actual implementation of the provisions.

## **RELATED ISSUES ON ORGAN DONATION IN NIGERIA**

It is a common fact that there is a shortage of organ donation globally. The demand for organs out-weighs the supply and this has made the whole process porous and constructively causing commercialization of human organs in the medical practices. Recently, there is a report on the case of the former Deputy-Senate President of Nigeria, Senator Ike Ekweremadu and his wife whose daughter was confirmed to be in need of kidney transplantation.<sup>xxxvii</sup> Senator Ike Ekweremadu and his wife were arrested in the United Kingdom while on their way to Istanbul, Turkey on the alleged offence of picking up an underage and homeless boy for modern slavery and kidney harvesting. They were arraigned before the Uxbridge Magistrates' Court in the United Kingdom where bail was applied for on their behalf but was denied by the Magistrate and matter was initially adjourned to 7<sup>th</sup> of July, 2022.<sup>xxxviii</sup> Although, on the 7<sup>th</sup> of July, 2022 it was established before the court that the purported donor David Ukpo Nwamini was not a minor but Ike Ekweremadu and his wife were still alleged to be involved in organ harvesting and modern slavery and as a result they were still kept in custody. The case was adjourned to 4<sup>th</sup> of August, 2022 and was to be presented before the Central Criminal Court in London.<sup>xxxix</sup> This ongoing case of Senator Ike Ekweremadu further corroborates the fact that people are in need of organ for transplantation in Nigeria and many patients are on the transplant waiting list. The Senator's resought to a foreign land for medical treatment for his daughter is not unconnected with scarce organ availability and the state of healthcare in Nigeria. This is due to shortage and poor medical advanced equipment, inadequate well trained personnel and the fear of compromised medical personnel which can affect the standard of health care delivery in Nigeria. There are many well trained medical personnel who have left Nigeria for advanced countries due to the inadequate attention paid by Nigerian government to healthcare issues. It can be assumed that if Nigerian medical care services are well taken care of by the Nigerian government and there are reliable and well trained experts in the area of organ transplantation, Senator Ike Ekweremadu would not have needed to fly his daughter abroad for kidney transplant to make it successful.

This leads us to consider some socio-cultural and legal issues associated with organ donation and transplantation in Nigeria.

*i. Sale of organs*

Generally, under Nigerian law, donation of organs for transplantation should be altruistically done without any flavour of compensation on the part of the donor.<sup>xi</sup> This position has cleared all doubt irrespective of any cultural and religious arguments on commercialization of organs for donation. However, The reality, is that many people are unwilling to donate their organs without some form of compensation which in actual fact leads to selling of organs in a clandestine manner. Some donors and middlemen have unfortunately seen it as a means of making money and not the altruistic nature the law intended.<sup>xii</sup> It is undoubtedly that this unlawful act is practiced and supported by some medical personnel who chose financial gains above their professional oath. Sale of organs can degenerate to organ market for the highest bidder which may also be extended to the cadaveric organ sale by the family members of the deceased donor.

Where the deceased-donor has not expressed the wish to donate either in his Will or testamentary documents, it becomes an issue to know who has the legal right to give consent on the donation between the medical personnel and the relatives. At times, it could lead to disagreement among the relatives to determine the appropriate person to give consent. This is so because most of the deceased family members care more about the financial gains from the donation.<sup>xlii</sup> The NHA stipulates that it is the choice of the deceased-donor or the family members to either donate or not to donate without any financial compensation.

Despite the prohibition of commercialization of organ, it has been argued that there is a need to reward donors either financially or through other forms of compensation by government to encourage people to come forward as potential organ donors, thereby reducing the scarcity of organs for transplantation.<sup>xliii</sup> In addition, some recipients often believe they have a duty to compensate their donors because they consider the donation as a special gift which necessitates a reciprocal appreciation. Failure to appreciate the donor may cause psychological and moral burden to repay their donors in some way, which is an entrenched cultural value to show appreciation. As much as this argument is reasonable, it has some negative implications. One issue that could arise from



compensation if allowed is the difficulty to determine the reasonable compensation to be given to avoid selling of the organs to the highest bidder. The NHA is silent on quantum and what manner of compensation should be deemed adequate for a donor. This lacuna, has affected the equitable health care amongst Nigerians. However, it will not be out of place to reimburse the donor for the cost incurred during the time of providing the donation including short and long term medical care, loss of income, travel, accommodation to cater for them where reasonable which is applicable in other countries.<sup>xliv</sup>

**ii. *Compromise Nature of the Medical Personnel***

Nigerian medical personnel are often the first point of contact when a patient is in need of organ transplantation, therefore they play a vital role in the process of donation, harvesting and transplantation of vital organs. Since there is no clearly stipulated procedure under the NHA, patients are often scared to trust the medical team that will procure the harvesting of the organs for donation. There have been instances of violation of the ethical code by some medical personnel who have been held guilty of medical misconduct in this regard and as result, which passes wrong signal and messages to the potential donors who might want to donate to save lives.<sup>xlv</sup> Compromise nature of medical personnel often arise where there is a breach of trust and fiduciary relation between the medical personnel and the patient in exchange for monetary compensation. A patient who wants to donate a kidney for example might be scared of losing the better out of the two when screened and subjected to compatibility test. In addition, a patient with two good and functional kidneys might end up losing the two to comprised medical personnel who could in return transplant weaker ones from another donor during the procedure, provided the organ passes the compatibility test. The fear of having an irreparable damage caused by medical personnel on voluntary donors can make them resist or have a change of mind. Mistrust and apprehension has further compounded donor apathy related to organ donation in Nigeria.

**iii. *Cultural and religious influence***

Culture and religion play determinant role on how people perceive organ donation in Nigeria.<sup>xlvi</sup> Generally, most religion may not forbid organ donation since it is a way of

saving lives; however donors must do it altruistically. In all the over 240 different cultures in Nigeria, there is the belief that human body is sacred and should not be tampered with unless in cases of dire need and for altruistic reasons. As such, the beliefs of donors will determine the possibility of harvesting organs even after death. In this regard, it is important to consider some religions perception regarding organ donation.

**a. Buddhism**

Buddhist sees life as a continuum and in the sense that the spiritual aspect of life continues after loss of consciousness and brain death. Death is seen by the Buddhist as a change in the state of consciousness in preparation for the next life, hence, Buddhists, neither condemns organ transplantation and donation of organs neither do they promote them, they believe it is a matter of individual conscience.<sup>xlvi</sup>

**b. Hindus**

The Hindus religion is majorly practiced in India. The Hindus believe that organ donation and transplantation is a personal decision which is not prohibited under their religious law. Although, no part of Hindu religion indicates that human organ may not be used to alleviate the suffering of other humans, however, burning of the intact body in the presence of the family is a very common rite of passage for the dead.<sup>xlvi</sup>

**c. Shinto**

The Shinto religion is commonly practiced in Japan and is directly against organ harvesting and transplantations. It considers organ donation, harvesting and transplantation as spiritually dirty.<sup>xlvi</sup> Report shows that as at year 2000, only eight sets of kidneys were obtained from dead donors upon family consent and has turned Japanese patients to organ tourists because they travel overseas to buy kidneys which are the most sought after organ transplantation need.<sup>1</sup>

**d. Christianity**

Christianity is one of the worlds' largest religion, though with different denominations but preaching the same message about God's plan of salvation for mankind.<sup>li</sup> Christianity is one of the major religions practiced in Nigeria. It encourages altruism and saving of lives because Jesus Christ did the same with his life.<sup>lii</sup> Therefore, Christianity supports acts of donating organs as long as it does not violate the dignity

of human person. Nevertheless, not all Christians are willing to donate organs. This may be as a result of their cultural and eschatological view of life or the fear of not being complete after resurrection and the weight of sanctity attached to lives.<sup>liii</sup>

*e. Islam*

The word Islam means *Peace* and the religion has its origins in Saudi Arabia. The religion connotes absolute submission to the will of God or Allah. The belief in Islam involves the acceptance of God's oneness and the prophethood of Muhammad (Peace be upon him) as the recipient of the holy scripture of Islam called the Holy Qur'an.<sup>liv</sup> The practice of Islam neither explicitly allows nor prohibits organ donation and transplantation. However, reference can be made to the reported *hadith*<sup>lv</sup> where it was stated that breaking of a dead's bone is not different from breaking it when the person was alive and considered it a sin.<sup>lvi</sup> However, *Shari'ah* law is one of the major sources of Islamic law in Nigeria and it appears allows cutting of human part for the purpose of safety.<sup>lvii</sup> Thus, removal and transplantation of organ for the purpose of treatment and survival with proper consent without financial gains would not be condemned under Islamic religion. It noted that living donation of vital organ is visible between Muslims following the teaching of the Holy Qur'an which commands them to help one another in righteousness, altruism and piety.<sup>lviii</sup> This assertion is reinforced by the 1981 Islamic Code of Medical Ethics, endorsed by the First International Conference on Islamic Medicine which stated that the individual is the collective responsibility of society, which has to ensure his health needs by any means while inflicting no harm on others.<sup>lix</sup> This includes the donation of body fluids or organs and is regarded as a *fard kifayah*,<sup>lx</sup> which is a compulsory duty that donors fulfil on behalf of society. Nevertheless, human organs should not be treated as commodities for sale, but if there is a dire need, and purchase of the organ is the only way it can be procured, then it is lawful for the needy buyer (by necessity) although sinful to the seller, unless the latter is extremely needy.

*iv. Scarcity of organ*

Scarcity of organ for donation is one of the major issues surrounding donation and transplantation of human organs in Nigeria. This scarcity is attributed to high rate of demand for organ than its availability. The shortage of transplantable organs may not necessarily be linked with the methods of procuring organs but the availability of

donors for procurement. Statistics on organ transplantation and donation is not readily available in Nigeria.<sup>lxi</sup> The scarcity of organs for donation cuts across the globe and is not limited to Nigeria. For instance, in 2004, 86,173 people were on the nation's organ transplant waiting list in the USA, 115 patients were added daily to the waiting list, while 17 patients died every day while waiting for an organ.<sup>lxii</sup>

In Nigeria, End- Stage Renal Diseases (ESRD) is a growing burden and it constitutes a high percent of hospital admission. Record showed that in Nigeria, from 2004-2014, patients with ESRD and on dialysis was estimated to have increased from 780-1500.<sup>lxiii</sup>

In addition, a recent research conducted at the Intensive Care Unit, University of Ilorin Teaching Hospital, Kwara State, Nigeria in the year 2020 reveal that there were 104 deaths in the ICU due to organ problems and that 590 patients were admitted for renal diseases out of which 20.3% died within the period of the research.<sup>lxiv</sup> In Nigeria, many factors contribute to the scarcity of human organs for donation. Many Nigerians find it difficult to donate because of fear of the outcome, illiteracy, religious inhibitions, cultural biases and limited information and awareness on organ donation. Many Nigerians do not know that they can still survive with one of the paired organs in their body system.

Another contributing factor to the scarcity of organ donation in Nigeria is the absence of organ banks. Organ banks in Nigeria are isolated in nature because there is no legislation or legal framework creating organ banks in Nigeria. Some technologically advanced hospitals have organ banking facilities. These are few in number and there is no well-regulated system of organ banking in Nigeria. Those that have the facilities are privately owned which can lead to exploitation of donors due to the absence of a regulatory framework or oversight function.<sup>lxv</sup>

v. ***Paucity of Legal Framework***

Part VI of the National Health Act (NHA) in Nigeria discusses the control of use of blood products, tissue and gametes in humans. However, these provisions have been perceived as insufficient and inadequate on organ donation which further compound issues affecting organ transplantation in Nigeria.<sup>lxvi</sup> The NHA, being the major legislation on organ donation in Nigeria has some limitations which need urgent

attention. The NHA interpreted death to mean brain-death but clarity was not made as to the meaning of brain-death under the interpretation section. This uncertainty can cause such issues as to when cadaveric organs can be harvested from someone acclaimed to be brain-dead.

In addition to this, the Act did not expressly address the term ‘organ’ as it categorized organ under tissue.<sup>lxvii</sup> Whereas, by biological explanation, organ is a structure made up of a group of tissues working together to perform specific function. In this case, tissue should have been placed under organ and this would have clarified many issues related to organ under the Act. Section 55 of the Act provided for donation of human bodies and tissues of deceased persons either through a Will or written documents. However, this section did not make provision for those who are willing to donate their organ but died intestate and their family members could not be reached. Section 48 of the Act provides for the conditions to remove tissue, blood or blood products from living persons, however, the Act if compared with other jurisdictions did not expressly provided for donation of tissues or blood product by a person under the age of 18 and this could pose a challenge where the issue of donation involves a minor.<sup>lxviii</sup>

Furthermore, the lacuna in the Act also reflects in the area of documentation of organs for donation. There are inadequate provisions for registration, transplantation, procurement and details of the donors (especially the cadaveric donors), such as the address, nationality, gender and other information needed for proper documentation particularly where the deceased donor’s family cannot be traced. In 2013, the World Health Organization (WHO) estimated death from road accident in Nigeria to be 20.5/100,000 which was about 35,000 deaths in a population of about 175 million at the time and Nigeria was rated 9<sup>th</sup> position in road accidents worldwide.<sup>lxix</sup> It is estimated that, the figures and percentage would have increased since then due to the increase in Nigeria’s populated estimated to be above 200 million now in 2022.<sup>lxx</sup> Some road accident where people lost lives was not recorded; even when victims died because of the severity and irreversibility of their injuries. If Nigeria’s legislation is inadequate, the fatal accident victims could have been potential donors and provide vital organs to help those on organ transplant list.

The Act did not elaborately make provision for non-disclosure of information about the donor and recipient neither was adequate provisions made about the criteria for

selection of donor for transplantation except for the omnibus and general provision of section 48 as discussed earlier. Furthermore, the Nigerian legislation is also lacking in the area of organ banking in case of emergency or for storage purpose, hence the few private technologically advanced hospitals with organ banking are not regulated.<sup>lxxi</sup> The legal framework within a jurisdiction has meaningful impact on the operation and recognition of certain acts allowed by law. The paucity and lacuna in legislations coupled with poor implementation of existing regulations in Nigeria will continually give rise to negative implication on the citizens with regards to organ donation and transplantation.

**vi. *Poor advanced equipment and inadequate of medical personnel***

The Nigerian health sector is one of the sectors that should be well financed by the government but unfortunately, the reverse is the case.<sup>lxxii</sup> The public hospitals at the federal, state and local government levels are not well equipped with facilities needed to aid adequate delivery of health care services. It is a challenge that some of the private hospitals have more equipment than the public government owned hospitals. The implication of this is that the affluent members of the public can get better care in private hospitals at higher cost whereas the larger percentage of Nigerians are living below economic standard.

Economically advantaged people might prefer to travel outside Nigeria for organ procedures because of fear of disappointment and complication resulting from poor equipment and management in Nigeria. Hence affordability of good health care in terms of donation and transplantation of human organ is cumbersome and beyond the reach of average Nigerians. Poor transportation of fatal accident victims to the hospital and inadequate ICU bed space, the cardiac arrest of patients can also lead to premature death of patients suffering from organ diseases. It has been reported that some of the factors contributing to high death rate of ESRD patients are; inadequate and inequality of dialysis centres, few active transplant centres, high cost of care, poor funding and inadequate personnel.<sup>lxxiii</sup>

## LESSONS TO LEARN FROM OTHER JURISDICTIONS ON ORGAN DONATION

Shortage of organ donation for transplantation cut across the globe. Cadaver organ harvest for transplantation is the routine procedure to reduce shortage of organs for donation in many developed countries, but over the years, this has not reduced the scarcity. Furthermore, the idea of informed consent where people volunteered to donate organ is also used to address the shortage of organs in many European countries. Some countries like Belgium and England had moved from informed consent to presumed consent in order to solve scarcity of organ donation problems. The presumed consent makes everyone a potential donor at the time of death except a person who wants to opt-out.

### *i. Belgium*

Belgian Presumed Consent Law was passed in 1986 and implemented in 1987.<sup>lxxiv</sup> This law made every citizen a potential donor but gives absolute priority to the will of the deceased. Hence, if a deceased did not register to opt out of the system, there is a presumption that at the time of death, he or she was willing to donate. The law made provision for the citizens to register their will and their data are entered in a National Computerized Registry accessible only to the transplant team in order to reduce the agitation of the family members on whether to donate or not after death and also secure the medical doctors legally.<sup>lxxv</sup> The law does not require the permission of the family members for organ retrieval but organ may not be removed if the family takes initiative opposition and this law is also applicable to non-Belgian citizens resident in the country for more than six months.<sup>lxxvi</sup>

The major intention of the Belgian Presumed Consent Law was to increase the number of organs available for transplantation since informed consent system of donation could not resolve the scarcity problem. To avoid abuse of the deceased, there is a fundamental procedure that must be followed by the transplant coordinator which is to check the central registry by modem to confirm the wishes of the deceased and such is kept in the medical record. Record showed that since the Belgian Transplantation Law which provided for presumed consent was implemented in 1986, there has been an increase in organ retrieval for instance, kidney retrieval rate rose to 86%, lung to 71%, pancreases to 100%, liver to 110% and hearts to 145% within few years of the implementation.<sup>lxxvii</sup> The Belgian Transplantation Law provided for favourable collaborative environment for the Intensive Care Unit and other non-university hospitals by giving them freedom to retrieve organ from a deceased in the absence of a registered Will for

adequate performance and this has made Belgium to outperform in the number of organ donation. Nigeria can learn from the Belgium model to reduce the demand and scarcity of organ for transplantation.

*ii. United Kingdom*

The United Kingdom is not exempted from scarcity of organs for transplantation. Despite the 'opt-in' organ donation system in England which increased organ donation rate in the last decade significantly in the United Kingdom, there is still shortage of donors and hundreds of people die whilst waiting for organ each year.<sup>lxxviii</sup> Although, the Human Tissue Act, 2004, allows a person to express his or her consent to donate during their lifetime or appoint a representative to give consent on their behalf when they lost capacity or died, but there was still a wide gap between those in need of organ for survival and organ available for use. For instance, the NHS Blood and Transplant being the special health authority in charge of organ donation and transplantation across the United Kingdom reported that in 2016-2017, 456 adults and 14 children died whilst on the transplant list and 875 people were removed from the list because they were too ill for surgery.<sup>lxxix</sup> One of the contributing factors to the shortage of organs for transplantation is the poor rates of family consent. Family consent was rated at 48.5% as opposed to the potential patient's wish to donate 92% from 2016-2017.<sup>lxxx</sup>

The concern for inadequate donated organs led to further action by the government to increase the number of donors. Hence, presumed consent system to donate organ after death by the citizens was proposed in October 2017 by the Prime Minister who announced the introduction of an 'opt-out' consent system for organ donation in England in a bid to save the lives of about 6,500 people currently waiting for an organ transplant.<sup>lxxxii</sup> By December, 2017, consultation was made on the views of the people and this gave rise to the Organ Donation (Deemed Consent) Bill 2017-19 tabled by the Labour MP, Geoffrey Robinson.<sup>lxxxii</sup> It had its second reading on 23 February 2018 and considered by the Public Bill Committee on the 12 September 2018. Within 2019-2020, about 25.8 million people registered under the opt-in system and as a result, 3,941 recipients of various organs such as kidney (2, 399), pancreases (204), hearts (180), lungs (164), liver (972) and intestine (18) benefitted respectively.<sup>lxxxiii</sup> Nevertheless, about 6,000 people on the waiting list still die each year due to shortage of organ for transplant.<sup>lxxxiv</sup>

Thus, the Organ Donation (Deemed Consent) Bill 2017-19 was passed as the Organ Donation (Deemed Consent) Act in 2019 and became effective in May 20, 2020. By implication, the



Act made all adults in England as having agreed to be an organ and tissue donor when they die, unless they recorded a decision not to donate. However, this provision excludes people who lack mental capacity to understand ‘deemed consent’ before death, children under 18 years of age and people ordinarily resident in England for less than 12 months immediately before their death.<sup>lxxxv</sup>

Presently the presumed consent donation system is not applicable to several novel and rare transplant such as uterine (womb), face and limb transplants. Nevertheless, these might be included later under the presumed consent options if there is high demand of such transplant.<sup>lxxxvi</sup>

The family members will also have roles to play such as giving information about the deceased donor and making decisions especially for those who are incapacitated to take decisions by themselves. The outcome of the new legislation has showed an improvement in the public awareness, family consent and increase in availability of organs for transplant which can also serve as a lesson for Nigeria to learn from and improve on ways to reduce organ related issues in Nigeria.

## **POSSIBLE WAYS TO IMPROVE ON DONATION OF ORGANS IN NIGERIA**

Technology and medical advancement has made it possible in the medical field to improve the quality of health care delivery in respect of organ related problems. Over time, organ transplantation has become a feature of Nigeria’s healthcare system. Although, the possibility of replacing defective human organs depends on availability since organs are usually harvested from living donor and cadaver after required consent is sought and obtained. Hence, it is important to discuss ways to improve organ donation for transplantation in Nigeria. The following are by no means exhaustive:

*i. Introduction of opting-out or presumed consent system of organ donation*

Opting-out is one of the ways to improve donation of human organs in Nigeria. It makes every individual a potential donor unless such an individual indicate his or her refusal to donate organ in case of terminal illness or after death. Such information can be inputted on the national database or at best include same in testamentary documents. As such, there would be less difficulty in respect of consent by the medical personnel.

However, this has to be moderated to prevent an infringement on patients' right of autonomy and fundamental human right.

ii. *Creating proper awareness among the general public*

The creation of awareness through various means especially the media which appears to be the fastest means of reaching people on the need for capable Nigerians to donate organs whether from living or dead donor altruistically. Many Nigerians might want to donate but due to high expectation of financial gain, they may easily be influenced sell their organs abroad or sell it to the highest bidder in Nigeria. Awareness on the importance of donation will reduce shortage of transplantable organs, especially kidneys. This can be better achieved when Nigerian government work with the Federal Road Safety Corp (FRSC) to encourage people to state on their driver's license whether they want to be a potential donor as this will help should such a person becomes incapacitated or brain dead. The religious bodies too can help to promote awareness on the importance of organ donation to their subjects since Nigerians are religion conscious while taking decisions. This will also address the challenges and wrong perception people have towards organ donation as a result of their culture and religion inclinations.

iii. *Adequate care and provision for altruistic donors by the Nigeria government*

It might appear difficult to see a stranger, friend or relation who will voluntarily surrender to have their kidney or other vital organs harvested while still alive. However, if Nigerian government makes adequate plans for donors through autonomous bodies to accommodate the expenses of donor's expenses for travelling, accommodation and loss of time reimbursement that they would be entitled to, many people might be willing to donate. For instance, Iran is one of the few countries with little or no transplant waiting list, because it makes provision for government-controlled donor compensation program that involves the recipient paying the donor with some government subsidy.<sup>lxxxvii</sup> This system can encourage people to donate and also reduce the criminal act of commercialization, black market or middlemen in the sale of human organs. In addition, when adequate care is made, there would be a legalized system of reimbursement which will protect altruistic donors against unscrupulous middlemen whose sole interest is to make a profit.

iv. *Training of medical personnel and provision of adequate medical facilities*

Nigerian medical personnel should develop themselves in the technicalities of organ transplantation. This can be achieved through intentional training. The Nigerian government has the duty to sponsor medical personnel for specific training both locally and internationally in order to improve the health care delivery in Nigeria. This will encourage best practices and international standard among Nigerian medical personnel. In addition, advanced medical equipment should be evenly distributed without favoritism. There is also a need for expansion of public hospitals as this will bring good health care closer to the people.

v. *Improvement and proper implementation of Nigerian laws on organ donation*

There is a need to review the NHA by Nigerian legislature with respect to regulation of organ donation. Although, the NHA<sup>lxxxviii</sup> made provision on organs and other related issues. Nevertheless, the lacuna in the legislation was stated earlier. Lessons can be learnt from other jurisdictions like the United Kingdom, Belgium and other European countries with better legislations to review and improve the Nigerian law on organ donation and transplantation.

In summary, this paper discussed that there are many contemporary issues surrounding organ donation and transplantation in Nigeria which is common with other developing countries in Sub-Saharan Africa. The scarcity of organ donation and the most ethical process is the most apparent. The paper specifically focused on Belgium and the United Kingdom as developing countries to show how through legislation they have been able to ameliorate the need for organ donation by patients on the waiting list through method of legally making every citizen a potential organ donor when they die. Nigeria as has a poor transplantation rate compared to other developing countries caused by many factors as discussed in this paper. Chapter VI of the NHA in Nigeria made provisions for the usage of blood, blood product, tissues and gametes without being explicit on these terms. Therefore this legislation has not resolved various issues surrounding donation of organs and transplantation in Nigeria. Other contemporary issues discussed are sale of organ, compromised nature of the medical personnel, inadequate training of medical personnel, cultural and religious influence, scarcity of organs for donation, vagueness and lack of oversight government function of Nigerian medical personnel carrying out the procedures, poor advanced medical equipment and finally inadequacy of the legal framework for organ donation and transplantation.

## RECOMMENDATIONS

The implication of contemporary issues on organ donation in Nigeria cannot be over emphasized. Hence, there is a need for urgent and adequate attention to address the problems. As such, the following are recommended to reduce the problems associated with organ donation in Nigerian:

1. The Nigerian government should improve on the maintenance of the National data-base for organ donation, which must be regularly updated. With this, citizens can easily promote both 'opt-in' and 'opt-out' system of altruistic donation of organs while alive and after death.
2. Government regulations should make it mandatory for both private and government hospitals to update their patients' cards regularly to document voluntary and prospective donors by signing the donors' card in their life time to avoid legal issues after their demise.
3. Nigerian government through the Minister of Health should set up committees in various states to look into development of regional transplants, donors' banking and deceased donor registration centres in Nigeria.
4. More allocation from Nigerian government Gross Domestic Products (GDP) should be channeled to the health sector. This will help in procurment of advanced medical equipment, sponsorship of medical training to meet international standard, subsidies for the less privileged people and compensation for altruistic prospective donors.
5. The Nigerian legislatures should look legislations in other jurisdictions, especially European countries and emulate relevant sections of their laws on organ donation and transplantation for the benefit of Nigerians.
6. Nigerian government should provide for appropriate means of compensating voluntary donors across the country within the states in the federation attached to hospitals that have been cleared to have the capacity to perform the operation. This will encourage people to donate and reduce the risk of falling victim of middle men and black marketers on organ commercialization.

## CONCLUSIONS

Apathy, mistrust, legal loopholes, inadequate health facilities and government oversight functions among many challenges have led the shortage of organ donation and transplantation in Nigeria. These have contributed to heinous and unregulated acts in Nigerian health sector. Therefore, we recommend that Nigerian Legislatures should draw inferences from other jurisdictions with comprehensive legislations on organ donation and transplantation to review Nigeria's National Health Act. Nigerian legislatures should also consider laws on 'presumed consent' system of organ donation as a way of reducing scarcity of organ for transplant in Nigeria, however the citizens must be sensitised to overcome cultural barriers that negativise removal of organs as a sacred rite of passage at death. The religious leaders of various sects should also work with the Nigerian government to create awareness amongst their followers about the need to donate organs to save lives, with this; there will be more organs for those on the transplant waiting list in Nigeria. There should be a positive collaboration between the Nigerian government and Federal Road Safety Corp (FRSC) with respect to people who die in road accidents on the care and possible harvesting of organs from dead accident victims timely to save other lives.

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## ENDNOTES

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<sup>ii</sup> Human organ and tissue transplantation Report by the Director-General at Seventh-Fifty World Health Assembly Provision Agenda Item 27.2, A75/41, 2022, page 2.

<sup>iii</sup> Christine Park *et al.*, 'A scoping review of inequities in access to organ transplant in the United States', *International Journal for Equity in Health*, Vol 22, 2022 page2 12-13.

<sup>iv</sup> The first successful experimental organ transplant was reported by Emerich Ullmann in 1902. His article shows that he managed to autotransplant a dog kidney from its normal position to the vessels of the neck, which resulted in some urine flow. The animal was presented to a Vienna medical society on March 1, 1902, and caused considerable comment. See, *Kidney Transplantation: A History* written by David Hamilton. Page 1. See also Clyde F. Barker and James F. Markmann, 'Historical Overview of Transplantation', *Cold Spring Harb Perspect Medicine*, Vol 3, 2013 available online at <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC3684003/>. Accessed on 7/05/2022

<sup>v</sup> Ibid

<sup>vi</sup> Siang Yong Tan, and Jason Merchant, 'Joseph Murray (1919–2012): First transplant surgeon', *Singapore Medical Journal* Vol 60, 2019, available online at <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC6482420/>. Accessed on 12/05/2022.

<sup>vii</sup> Madonna Rica Anggelia *et al.*, 'Implantable Immunosuppressant Delivery to Prevent Rejection in Transplantation', *International Journal of Molecular Science*, Vol 23, 2022, pages 1-2

<sup>viii</sup> Cyclosporin is an immunosuppressive drug C<sub>62</sub>H<sub>111</sub>N<sub>11</sub>O<sub>12</sub> that is a cyclic polypeptide obtained as a metabolite from a fungus (*Beauveria nivea* synonym *Tolyocladium inflatum*) and is used especially to prevent rejection of transplanted organs and in the treatment of rheumatoid arthritis and psoriasis.

<sup>ix</sup> Madonna Rica Anggelia *et al.*, at page 2.

<sup>x</sup> Esther Hatsiwa Emmanuel and Ijeoma Frances Nabena 'Legal and Ethical Developments in the Regulation of Organ Donation and Transplantation in Nigeria', *Nnamdi Azikiwe University Journal of International Law and Jurisprudence*, Vol 11, 2020, page 123.

<sup>xi</sup> In auto-graft, the donor is also the recipient. It is a method of transplanting of an organ or tissue, such as skin or bone marrow, of a particular person to a different part of his or her body

<sup>xii</sup> This involves two people who shared the same identity genetically such as identical twins. It is a process of harvesting an organ from one of the identical twins and transplants it in the other. The first successful kidney transplant in history was through isographs when a kidney was harvested from one of the living twin brother and transplanted in the other one and the recipient twin lived for eight years before he died of heart attack.

<sup>xiii</sup> This transplantation occurs in the same species of biological realm, that is, a situation where an individual who can be related or unrelated donate an organ to another individual of the same species (human beings). This is the most common form of organ transplantation where unrelated human beings can assisted one another in preservation of lives. This is common because the demand for human organs and those on the waiting list are on the high side on daily basis.

<sup>xiv</sup> This type of transplantation occurs between different species such as human beings and animals.

<sup>xv</sup> National Health Act, Cap 8 Laws of the Federation of Nigeria, 2014.

<sup>xvi</sup> See section 52 *ibid*

<sup>xvii</sup> See section 54 (3) *ibid*.

<sup>xviii</sup> See sections 49-53 *ibid*.

<sup>xix</sup> Section 64 *ibid*.

<sup>xx</sup> See section 47 (1) –(3) *ibid*.

<sup>xxi</sup> In Nigeria, 80-90 per cent of maternal mortality is as a result of bleeding complications due to shortage of blood. Nike Adebowale, et. al. 'Blood Donor Day: Severe consequences as Nigeria gets 27% of annual blood need' reported by Premium Times on 14/06/2021 available online at <https://www.premiumtimesng.com/news/headlines/467648-blood-donor-day-severe-consequences-as-nigeria-gets-27-of-annual-blood-need.html>. Accessed on 16/07/2021.

<sup>xxii</sup> Section 48 (1) (a) of the National Health Act, 2014.

<sup>xxiii</sup> See section 48 (1b and c) *ibid*.

<sup>xxiv</sup> See section 48 (2) ( b) *Ibid*.

<sup>xxv</sup> See section 53 of *Ibid*.

<sup>xxvi</sup> Section 48 (2) (a) *Ibid*.

<sup>xxvii</sup> See section 48 (3) *Ibid*.

<sup>xxviii</sup> See section 49 (1) *Ibid*.

<sup>xxix</sup> See section 49 (2) *Ibid*.

<sup>xxx</sup> See section 52 *Ibid*.

<sup>xxxi</sup> See generally section 51 *Ibid*.

<sup>xxxii</sup> Section 54 *Ibid*.

<sup>xxxiii</sup> Section 54 (4) *Ibid*.

<sup>xxxiv</sup> Section 55 *Ibid*.

<sup>xxxv</sup> Section 56 *Ibid*.

<sup>xxxvi</sup> Section 57 *Ibid*.

<sup>xxxvii</sup> Organ Harvesting: Nigerian Lady offers her kidney to Ekweremadu's Daughter, reported by Usman Bello Balarabe, Kano, in Daily Trust Limited dated 26<sup>th</sup> Jun 2022 05:52:22 GM. Available online at <https://dailytrust.com/organ-harvesting-nigerian-lady-offers-her-kidney-to-ekweremadus-daughter>.

<sup>xxxviii</sup> Ekweremadu and wife denied bail by UK Magistrate's Court. Available online at <https://www.youtube.com/watch?v=gNiBzXCqQmU>. Accessed on June 25, 2022.

<sup>xxxix</sup> Reported by Juliana Olayinka for Channel's Television, London. Available online at <https://www.youtube.com/watch?v=MgCoc43IIGM>. Accessed on 7/7/2022.

<sup>xl</sup> See section 53 of the National Health Act, Cap 8 Laws of the Federation of Nigeria, 2014.

<sup>xli</sup> Anya Adair and Stephen J Wigmore, 'Paid organ donation: the case against' *Journal of Annals of The Royal College of Surgeons of England*, available online at <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC3291132/>, 2011, pages 191-192; see also Grappling with emerging cases of organs trafficking in Africa reported by Chijioke Iremeka in the The Guardian News Paper on 7th May 2022 at 3:00 am . Available online at <https://guardian.ng/saturday-magazine/grappling-with-emerging-cases-of-organs-trafficking-in-africa/>. Accessed on 8/5/2022. See also; How Mike and Eghosa sold their kidneys in Malaysia for \$10, 000.00 each and returned back to Nigeria. Reported by Webmaster on Daily Trust Limited, titled 'How Nigerians sell own kidneys abroad' on Saturday, 17 Sep 2011 at 02:00:00 GMT. Available online at <https://dailytrust.com/how-nigerians-sell-own-kidneys-abroad>. Accessed 05/06/2022.

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- <sup>lii</sup> (John 17:19).
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<sup>lxxxv</sup> Ibid.

<sup>lxxxvi</sup> Ibid.

<sup>lxxxvii</sup> Ibid.

<sup>lxxxviii</sup> Chris J Rudge, 'Organ donation: opting in or opting out?', *British Journal of General Practice*, Vol 68, 2018, pages 62-63.

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<sup>lxxxii</sup> Sarah Barber, Carl Baker and Daniel Rathbone, 'The Organ Donation(Deemed Consent) Bill 2017-19', House of Commons Library Briefing Paper, 2018, pages 1-2. Available online at <https://commonslibrary.parliament.uk/research-briefings/cbp-8236/>. Accessed on 02/07/2022. See also, Simon Bramhall, 'Presumed Consent for Organ Donation: A Case Against', *Journal of Annals Royal College of Surgeon England*, Vol. 93, 2011, pages 271-272.

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