## UNIVERSITY OF ILORIN

# THE ONE HUNDRED AND FIFTIETH (150<sup>TH</sup>) INAUGURAL LECTURE

# "PREGNANCY: THE BURDEN OF WOMANHOOD"

# By

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THURSDAY, 14<sup>TH</sup> AUGUST, 2014

Mr. Vice-chancellor sir,
Deputy vice-chancellors,

Registrar,

Other Principal Officers of the University,

Provost College of Health sciences,

Deans of faculties, postgraduate school and student affairs,

Professors and other members of the senate,

The Chief Medical Director, University of Ilorin Teaching Hospital (UITH),

Principal Officers of the University of Ilorin Teaching Hospital,

Heads of department and other academic colleagues,

Members of Administrative and technical staff,

My lords spiritual and His Royal Highness,

Members of my family, Nuclear and Extended,

Distinguished invited guests,

Gentlemen of the press,

Mothers and Potential mothers,

Friends,

Great Unilorin students,

Ladies and Gentlemen.

#### **INTRODUCTION:**

To God be the glory, great things He has done. I thank the Almighty God for sparing my life to stand before you to present the 150<sup>th</sup> inaugural lecture of this great university. This is the 5<sup>th</sup> in the department of Obstetrics and Gynaecology, Faculty of Clinical Sciences, College of Health Sciences. The title of this lecture is; PREGNANCY: THE BURDEN OF WOMANHOOD.

The choice of this topic is borne out of my years of experience as a clinician and researcher on the issue of pregnancy as it affects women. I have witnessed the untold hardship, frustration disappointment, sense of helplessness and hopelessness, life-long disabilities, and death experienced by women in relation to pregnancy.

It is sad that despite all forms of programmes and interventions costing billions of naira i.e. Safe Motherhood and Millennium Development Goals, maternal health has improved a little, if any, over the years. To play her role in the God's given responsibility of "be fruitful and multiply" (Genesis 1:28), a woman has to get pregnant. This can happen naturally through sexual intercourse involving the man and the woman or through assisted reproductive technology. The "unequal partnership" in the process of reproduction where the woman is exposed to potential risks and hazards leaves much to be desired.

For the purpose of this lecture, the following definitions are adopted:

BURDEN: The Oxford Advanced Learner's Dictionary defined burden as: "something that is carried; something that is exerting, oppressive or difficult to bear. It is also defined as something that causes anxiety or a source of great worry or stress".

PREGNANCY: Is the fertilization of ovum (produced by woman) by the spermatozoon (produced by man) and development of offspring known as an embryo, later the foetus in a woman's uterus

**WOMANHOOD:** A woman is simply a female gender and womanhood is the state of being a woman or women in general.

During the course of reproductive life of a woman, there are approximately 400 opportunities for pregnancy which may occur with intercourse on any of 1,200 days (the day of ovulation and its two preceding days). Consequent upon fertilization, the blastocyst is implanted into the endometrium that has been appropriately prepared. The embryo, later the foetus develops till it is expelled by the uterus at parturition. During pregnancy, there is considerable physiological, anatomical and biochemical adaptations, many of these remarkable changes begin soon after fertilization and continue throughout gestation. However, most of these profound changes

return to the pre-pregnant state after delivery and lactation. The ability of the mother and foetus to co-exist as two distinct immunological systems results from endocrine, paracrine and immunological modification of the foetal and maternal tissue in a unique manner not seen elsewhere. The development of the embryo/foetus is complex and fascinating. As a result of functional and anatomical changes that virtually every organ/system undergoes during pregnancy, criteria for diagnosis and treatment of diseases are appreciably altered. A normal pregnancy last for about 280 days from the date of the first day of last menstrual period. Traditionally, the gestational period is divided into three segments of approximately three calendar months (about 13 weeks) called first, second and third trimester respectively. These three trimesters have important obstetric milestones. At the end of normal pregnancy, the expectation is that the mother would deliver a healthy and normal foetus and she remains in good health.

#### **BURDEN OF PREGNANCY.**

Pregnancy is not all about burden. It is a considerable source of Joy for the couple, their family and society at large. The end product in the majority of cases (the child) is a blessing of the fruit of the womb and greatly valued in any society particularly ours where they serve as "insurance" for old age. However pregnancy can become a burden in women when pregnancy is:

- Intended and wanted but get complicated;
- Unintended and unwanted;
- Desired but not readily achievable (infertility);
- When pregnancy occurs too soon or too late in reproductive lives of women;
- When steps are taken to prevent pregnancy; and
- When death occurs as a result of pregnancy.

Mr. Vice-Chancellor sir, the literature on Obstetrics and Gynaecology is replete with volumes of work on pregnancy and its complications, however, I shall discuss some of my contributions as it relate to the title of this lecture.

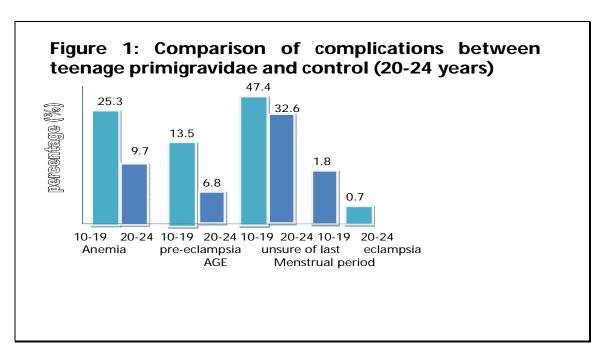
#### ADOLESCENT REPRODUCTIVE HEALTH:

#### **TEENAGE PREGNANCY**

Teenage pregnancy is pregnancy in girls aged between 10 and 19 years. It is a public health problem and is of concern to health professionals, policymakers, social scientists and curriculum developers all over the world because of the adverse health, demographic and social

consequences. Recent studies demonstrate quite clearly that sexual activity occurs at an early age and that adolescent pregnancy is becoming more prevalent. Approximately 16 million teenage girls become mothers every year, about 11% of all births worldwide. (WHO 2012, Al-Kadri, Madkhali, Al-kadi, Bakhsh, Alruwaili and Tamin; 2014). Ninety-five percent of these births occur in low and middle income countries with more than 50% in sub-Saharan Africa. Nigeria has the highest rate of adolescent fertility in Africa with 121 live births per 1,000 births. There is great variation between the northern and southern geo-political zones of the country with one in every three teenage girls in the north and one out of ten teenage girls in the south being mothers. The highest concentration of teenage mothers occur in the north-east and northwest zones of the country which constitute 42percent of total married adolescents and they contribute 71percent of annual births (NDHS 2008). The emergence of these teenage pregnancies has been attributed to various factors which include poverty, sexual abuse, ignorance, decreased age of menarche, parental indifference and cultural and religious beliefs. Adolescent mothers tend to be poor and care for their children in impoverished circumstances that are hard either to escape from or improve. Pregnancy in the teenagers may predispose them to anaemia, preterm labour, difficult labour, pre-eclampsia, eclampsia, obstetrics fistulae, postpartum hemorrhage, mental disorders such as depression and complications of unsafe abortion.

The health risk to the infant and children of the adolescent mothers has been well documented. The infant may be of low birth weights. Still births and neonatal deaths are 50% higher among infants of adolescent mothers than among infants of mothers between the ages of 20 and 29 years. About 1 million children born to adolescent mothers do not make it to their first birth day. Aboyeji (1999) reported on the obstetric outcome of teenage primigravidae in Ilorin. The study showed that teenage pregnancy was significantly complicated by anaemia, preeclampsia and eclampsia compared to pregnancy in the control aged between 20 and 24 years. They were also found more to be unsure of their last menstrual period and frequently unbooked; conditions that make obstetrics decision sometimes difficult in complicated pregnancy. The neonates of the teenagers were also significantly of low birth weight. Maternal and perinatal mortality were also significantly higher in the teenage primigravidae. As a result of the general perceived burden of pregnancy in the adolescent, parents are often anxious about adolescent sexual life. Aboyeji Adegoke, Adebisi, (2004) reported on the sexual behaviour and knowledge of sexually transmitted infections (STIs) among female adolescents in Ilorin. It was found that sexually related topics were frequently discussed among the adolescent (90%) with majority discussing it with their peers. Sixty-three percent of them knew one or more symptoms of STIs. About half (46.7%) had experienced sexual intercourse, the youngest being 11 years old with a mean of age of 15.9 years. The three most common motives for the first sexual activity were curiosity, financial reward/inducement and peer pressure. Sexual activity was higher among adolescent from polygamous homes and those of low socio-economic status.



To prevent pregnancy, contraception use is of utmost importance. In general contraceptive use in Nigeria is very low at 15% compared to 60-90% of women of reproductive age group in developed countries of the world. (Emmanuel, Andrea, John and James; 2010). Aboyeji, Fawole and liaiya (2001) reported on the previous use of contraception among pregnant teenagers in Ilorin. We found out that although they had high level of contraceptive knowledge (91.7%) only 16.3% had ever used any contraceptive method with none having not used any contraceptive method prior to or during their first sexual experience. Fear of side effect was the commonest reason for the non-use of contraception (61.2%). Other reasons included contraception being unnecessary (36.6%), against religious belief (28.2%) and husband/fiancée against the use of contraception (25.3%). Aboyeji, Adegoke and Adebisi (2004) also reported on the knowledge, beliefs concerning Human Immunodeficiency Virus and Acquired Immune-deficiency Disease Syndrome (HIV/AIDS) among female adolescents in Ilorin. 89.6% of the adolescents were aware of HIV/AIDS, with friends being the commonest source of information (28.5%). 88.9% knew that HIV/AIDS could be transmitted through sexual intercourse while about a third (27.3%) were of the opinion that it could be transmitted through sharing of towel. 48.4% of those who had sexual intercourse, knew that condom use could prevent HIV/AIDS. However, only 9.3% had ever used condom at one time or the other but not consistently. 47.7% of the respondents who had sexual relation had multiple sexual partners.

#### REPRODUCTIVE WASTAGE

ECTOPIC PREGNANCY: Pregnancy sometime becomes a burden in the early stages in the form of reproductive wastage. Ectopic pregnancy is the implantation of fertilized ovum outside the endometrial lining of the uterine cavity. It was first described by the famous Arabian physician Abul<sup>c</sup>asis (936-1013). The condition is tragedy of reproduction. Apart from being a form of reproductive failure in the index pregnancy of affected women, such women have a 7-15% chance of recurrence and only 40-60% chance of conceiving after surgery. It is 10 times and 50 times as dangerous as vaginal delivery and induced abortion respectively and it is a significant contributor to maternal mortality. Worldwide there is evidence that the incidence of ectopic pregnancy both in absolute numbers and in percentage of all deliveries is on the increase in order of two to four folds. In Nigeria the incidence of ectopic pregnancy is between 0.9% and 4.38% and is a common cause of gynecological emergency (Lawani, Okechukwu and Ezeonu; 2013). Ninety-five percent of all ectopic pregnancies are located in one of the fallopian tube. Other forms of ectopic pregnancies are ovarian, cervical, angular, abdominal and heterotopic (a combination of intra uterine and ectopic pregnancies). The diagnosis of the condition may sometimes be difficult particularly the sub acute variety. Risk factors for development of tubal ectopic pregnancy include pelvic infection, previous tubal ectopic pregnancy, and previous tubal surgery, current use of intrauterine devices, progesterone only contraceptive, smoking, advanced maternal age, luteal phase deficiency and salpingitis isthmical nodosa. Sotubo and Aboyeji (1994) reported 241 cases of ectopic pregnancy over a five year period between 1st January 1987 and 31<sup>st</sup> December 1991 in Horin. The overall hospital incidence of ectopic pregnancy was in I in 111 (0.9%) deliveries. There was a low reproductive performance amongst the women with an average parity of 2.3. Twenty-six-percent of them being nullipara. Sixty-two percent of the patients were in the prime of their reproductive career (age 20-29 years). These young women are at risk of being subjected to a lot of psychological, emotional and social trauma as a result of their compromised future fertility in our environment where a lot of premium is placed on child bearing. Aboyeji, Fawole and Ijaiya (2002) reported on the trend of ectopic pregnancy in Ilorin. Our results revealed an increase in the incidence of ectopic pregnancy from 0.9% to 1.4%. This was in agreement with the rising incidence of ectopic pregnancy worldwide. The socio-demographic characteristics of the patients remained unchanged and the recurrence rate was 14.1%. However, an increase in maternal mortality rate from 12.5/1000 to 19.9/1,000 was also reported. HETEROTOPIC PREGNANCY AND ABDOMINAL PREGNANCY: Aboyeji, Fawole and Adeniji (2001) reported the first documented case of heterotopic pregnancy in Ilorin. Heterotopic pregnancy is the combination of both intrauterine and ectopic pregnancies. It is thought to arise from fertilization of two ova by super fecundation in 90% cases and in 10% of cases by superfetation. Super fecundation is the fertilization by separate acts of coitus of two released ova during the same menstrual cycle while superfetation is fertilization of two ova from coitus during different cycles. It is a rare phenomenon in

spontaneous conception with an incidence of 1 in 30,000 pregnancies. The first documented case was by Daverny in 1708. (Thankam, 1991) The incidence is on the increase ranging between 1 in 4,000 and 7,000 pregnancies (Stable 1994). The incidence is significantly higher following assisted reproductive techniques. The incidence in our study was 1 in 140,917 deliveries over a ten-year period (1986 to 1995). Heterotopic pregnancy poses a diagnostic and management problems since clinician must investigate patients complaining of symptoms of ectopic pregnancy even after an intra-uterine pregnancy has been diagnosed. Treatment is complex as it is directed towards preserving the intra-uterine embryo and elimination of the ectopic one. To illustrate the burden of ectopic pregnancy on womanhood, I shall describe the case of an abdominal pregnancy reported by (Abdulkadir, Aboyeji, Adesiyun, and Fawole; (2005.) The case was that of a 35 years old woman in her fourth pregnancy who was referred from a private hospital on account of severe anaemia in pregnancy. She gave a three week history of abdominal pain, weakness, dizziness and some episodes of fainting attack. She had two units of blood transfused before being referred to our hospital. She booked at the referral clinic after 16 weeks of pregnancy. The pregnancy was uneventful until two months after booking. When first Admitted in the hospital with severe anaemia (packed cell volume of 16%) the foetus was in transverse lie and with good cardiac activity. Three consecutive abdominal ultrasound scan reported live intrauterine pregnancy with co-existing lower uterine segment uterine fibroid. It was the scan at 34 weeks that confirmed live abdominal pregnancy with the placenta in the posterior abdominal wall completely separated from the uterus. She had a total of 10 units of blood transfused between 26 and 34 weeks. When the abdominal pregnancy was confirmed, she was planned for an emergency laparotomy which could not be done immediately for various logistic reasons. She eventually had laparotomy 24hours after the diagnosis was confirmed, and was delivered of a fresh still born baby girl that weighed 2.85kg. She had eleven units of blood both intraoperatively and within 72hours of surgery. She had three other units of blood transfused while still in the hospital making a total blood transfusion of twenty-four units. She spent about three months in the hospital. Worldwide the incidence of abdominal pregnancy ranges between 1 in 10,200 and 33,000 deliveries (Ramanchandran and Kirk; 2004). That the diagnosis is sometimes difficult is demonstrated by this case in which three consecutive abdominal ultrasound reports revealed intra uterine pregnancy. Diagnosis could be missed in 25% of cases. The maternal mortality associated with abdominal pregnancy is about eight times greater than tubal ectopic pregnancy that constitutes over 95% of ectopic gestation. Maternal mortality associated with the condition ranges between 0% to 30% while foetal mortality range between 40% and 95%

Mr. Vice-chancellor sir, it is clear from discussion above that ectopic pregnancy comes in various forms and sometimes there is difficulty and delay in making diagnosis resulting in severe maternal morbidities. A high index of suspicion is essential in making a diagnosis and

instituting prompt and effective treatment to prevent associated maternal and fetal morbidity and mortality.

#### COMPLICATIONS OF UNSAFE ABORTION.

Abortion is a sensitive and complex issue that has medical, social, religious, cultural and political dimensions. It is generally defined as the spontaneous loss of a pregnancy before the foetus has reached viability. In the United Kingdom it is defined as the loss of an intra uterine pregnancy before the 24<sup>th</sup> completed weeks of gestation (Reajan and Buckett, 2003). The World Health Organization (WHO) defines it as expulsion of the fetus or embryo with foetal weight of less than 500g. In our environment it is pregnancy loss before 28 completed weeks. Unsafe abortion is defined by WHO as a procedure for terminating an unintended pregnancy carried out either by persons lacking the necessary skills or in an environment that does not conform to minimum medical standards or both. While the definition seems to be linked to the process, unsafe abortion is typically characterized by the followings:

- No pre-abortion counseling or advice
- It is induced by an unskilled provider, frequently in unhygienic conditions or by health practitioners outside official adequate health facilities
- A medical abortion is prescribed incorrectly or medication is issued by a pharmacist with inadequate instructions and follow-up It is provoked by insertion of an object into the uterus by the woman herself or by a traditional practitioner or by a violent abdominal massage. Abortion is self-induced by ingestion of traditional medication or hazardous substances
- The lack of immediate intervention if severe bleeding or other emergencies develop during the procedure
- Failure to provide post abortion check-up and including no contraceptive counseling to prevent repeat abortion
- The reluctance of a woman to seek timely medical care in case of complications because of legal restrictions and social and cultural belief linked to induced abortion (WHO 2008, Guttmacher 2008).
- Some of the above or all may be present in cases of unsafe abortion. Worldwide it is estimated that of the 210 million pregnancies that occur each year, about 80 million are unintended. 21.6 million unsafe abortion took place worldwide in 2008, nearly all in the developing countries. Unsafe abortion is responsible for about 13% of all maternal deaths (47,000), almost all in developing countries (WHO 2008). Apart from the

maternal deaths, patients may suffer acute complications of hemorrhage, sepsis, acute organ failure and injuries to abdominal organs. They are also at risk of long term morbidities of infertility, chronic pelvic pain, ectopic pregnancy and chronic ill-health. In addition the patients may suffer psychological, financial and emotional trauma as a result of the procedure.

It is estimated that every year in developing countries, 5 million women are admitted to hospital as a result of unsafe abortion. This consumed a significant share of scarce hospital resources in many developing countries compromising other maternity and emergency services.

In Nigeria, official statistics on the prevalence of abortion do not exist because abortion is severely restricted. Unofficially 1 in 10 Nigerian women of childbearing age is said to have had an abortion. It is estimated that about 760,000 abortions were performed in 2006 with more than 3,000 maternal deaths (Guttmacher 2008). Fawole, Aboyeji Olaoye and Akande(2001) reported on the complications of unsafe abortion over 11 years period. Two hundred and twenty patients presented with complications of unsafe abortions. The age range of the patients was between 15 and 50 years with about 80% in the ages between 26 and 35years. 92.7% had sepsis with abscess formations in 64.9% of cases. There were 28.2% cases of visceral injuries. Of the patients with visceral injuries, 73.8% had uterine injuries and 9.2% had intestinal (both small and large intestine) injuries. Hospital stay postoperatively ranged between one and forty-two days.77.4% of patients with visceral injuries had blood transfusion. There was 26.4% maternal mortality in the series. Only 6.5% of the patient admitted to ever using any contraception.

In Nigeria abortion is restricted and permitted only to save lives. Abortion laws generally fall into five categories, namely:

- To save the life of the pregnant woman;
- To preserve her physical health;
- To protect her mental health;
- On socio-economic ground; and
- For any other reason.

In addition many countries allow abortion in cases of rape, incest, and foetal impairment (Population Reference Bureau 2005). Highly restrictive abortion laws are not associated with lower abortion rates. For example the abortion rate is 29 per 1,000 women of childbearing age in Africa and 32 per 1,000 in Latin America regions in which abortion is illegal under most

circumstances in the majority of countries. In contrast the rate is 12 per 1,000 in Western Europe where abortion is generally permitted on broad grounds. Also in countries where abortion is permitted on broad legal grounds, it is generally safe whereas where it is highly restricted it is typically unsafe. To prevent complications of unsafe abortion usage of contraception will have to increase by public health education on the advantages of the use of contraception and making contraceptive agents widely and readily available. We may also have to take another look at our abortion laws as a change in abortion law could reduce the complications associated with it as it has been shown in South Africa where when abortion law was liberalized in 1977, the annual number of abortion related death fell by 91% between 1995-2001 (WHO 2008, Guttmacher, 2008).

#### **OBSTRUCTED LABOUR**

Labour is said to be obstructed when despite adequate uterine contractions, the foetus can descend no further down the birth canal and delivery per vaginam is impossible without assistance (Wright 1988). The condition is a rare event in developed countries of the world but a common obstetrical problem in developing countries like Nigeria. This is so in the developing countries because of their peculiar socio-economic problems such as widespread poverty, ignorance, lack of good transportation system, limited education/illiteracy, belief in home deliveries unsupervised by skilled health personnel, aversion to surgery and maldistribution of minimal health care delivery facilities. Malnutrition, uncontrolled childhood infections which cause stunting of growth and small pelvic dimensions and cultural factors that inhibit utilization of health care facility are other important contributing factors. Obstructed labour is responsible for considerable fetal and maternal morbidity and mortality. On a global basis, it is responsible for 8% of maternal death. The commonest cause of obstructed labour is cephalopelvic disproportion. This could arise as a result of reduced pelvic dimension as it occurs in patients with childhood malnutrition, infection, poliomyelitis deformity, sickle cell disease or in teenagers. Malpresentation and malposition i.e. brow, face presentation and occipito-posterior position, impacted pelvic tumor (uterine fibroid and ovarian tumor), cervical stenosis and rigid perineum are other important causes. Aboyeji and Fawole (1999) reported an incidence of obstructed labour of 1 in 31 or 3.2% of deliveries in a prospective 1 year study, in Ilorin. The condition was poverty related as 76.1% of the patients were of low socio-economic status. More than half (55.2%) of the patients were unbooked and 25.4% were grand-multiparous. Foeto-pelvic disproportion was the commonest cause (56.7%). Other causes included transverse lie (19.4%), deep transverse arrest (8.9%) face and brow presentation (7.5%). Eightysix percent of the patients

were delivered by caesarean section. The condition and the operative procedures to relieve it was commonly complicated by genital sepsis, wound infection, prolonged hospital stay and

postpartum hemorrhage. Six percent of the patients developed vesico-vaginal fistula a chronic and debilitating and stressful condition. Obstructed labour is largely preventable. The prevention of obstructed labour and its complications is multilayered. The patient, her family and community, healthcare providers at primary, secondary and tertiary care levels, religious leaders and government at all levels have a role to play.

#### RUPTURED UTERUS.

Mr. Vice Chancellor sir, some of our women in an attempt to reproduce, sometimes have the foetal housing unit (the uterus) "destroyed". Uterine rupture is the disruption of the muscular layer (myometrium) of the uterus during pregnancy and labour. It may be complete or incomplete depending on whether or not the serosa layer is involved. It is a catastrophic event and a great burden on womanhood. Like obstructed labour, it is a common occurrence in developing countries and rare in developed countries. The reasons for the disparity in developing countries and developed world are also similar to that of obstructed labour. However, it is important to bear in mind that some of the conditions like poverty is becoming worse because of down turn in economy and monumental corruption. The women therefore find it difficult to utilize the limited and poorly equipped health facilities as a result of abject poverty.

Aboyeji (1997) reported on a five-year review of uterine rupture between 1<sup>st</sup> January 1987 and 31st December 1991. The incidence of uterine rupture was 1 in 298 deliveries. Uterine scar, cephalopelvic disproportion and oxytocin misuse were the commonest causes of uterine rupture. Fifty percent of the patients were of parity 3 and 4 while 32.9% were grandmultiparous and 2.1% nulliparous. 86.2% of the patients will be unable to carry another pregnancy as they had repair of ruptured uterus with sterilization or hysterectomy as surgical procedure for treatment. Maternal mortality and perinatal mortality of 10.6% and 90.4% were recorded in the study. In a subsequent study of 100 consecutive cases of uterine rupture between February 1992 and December 1999, Aboyeji, Ijaiya and Yahaya (2000) reported an increase in incidence of uterine rupture of 1 in 210 deliveries. In this series oxytocin misuse was the commonest cause. Other common causes were uterine scar and obstructed labour.

It was established that the condition was significantly associated with low-socio-economic status, lack of antenatal care, high parity and advanced maternal age. Again maternal mortality was 13% and perinatal mortality 92% respectively. Sixty-nine percent of the patients in the series would not again be able to carry another pregnancy or menstruate in our society where a lot of premium is placed on child bearing. To many women, "a woman is not a woman without her uterus", and some may suffer psychologically as a result of the loss of the uterus.

#### POSTPARTUM HAEMORRHAGE

Postpartum hemorrhage is variously defined as blood loss of 500ml or more from the genital tract during vaginal delivery (WHO) or blood loss in excess of 1000ml during caesarian delivery or any blood loss during delivery that can cause hemodynamic instability or 10% change in heamatrocrit between antenatal and postnatal periods (Coker and Oliver; 2006). It is an important cause of maternal morbidity and mortality. Traditionally, the classification of postpartum hemorrhage has been based on the timing of the onset of bleeding in relation to delivery. Excessive bleeding occurring within the first 24 hours of vaginal delivery is termed primary postpartum hemorrhage (PPH) whereas if it occurs afterwards up to 6 weeks is secondary postpartum hemorrhage . Primary postpartum hemorrhage is far more common than secondary postpartum hemorrhage. The incidence of PPH in observational studies is believed to be around 6% although this can vary depending on geographical region and delivery setting. Primary postpartum hemorrhage is the commonest cause of maternal mortality worldwide responsible for 25% of direct causes of maternal death. Generally, causes of primary PPH include uterine atony (commonest cause), genital tract trauma, retained placenta tissue and disorder of clotting cascade and platelet dysfunction. It is difficult to predict the occurrence of PPH in a parturient. However, some of the identified risk factors include advanced maternal age (more than 35years), women with body mass index greater than 30, grandmultiparity, women with type 2 diabetes mellitus, connective tissue disorder, prolonged pregnancy, foetal macrosomia, multiple pregnancies and co-existing uterine fibroid. Other risk factors include placenta praevia, abruptio placentae, previous history of PPH, previous caesarean delivery, episiotomy and chorioamnionitis.

Ijaiya, Aboyeji and Abubakar (2003) reported on 348 consecutive cases of primary postpartum hemorrhage in Ilorin. The incidence of PPH was found to be 4.5 %. Uterine atony was the commonest cause of PPH (53.8%). The condition was significantly associated with advanced maternal age (greater than 35years), grand-multiparity, anemia and delivery conducted by midwives. During the course of management of the condition seven (0.2%) of the patients had hysterectomy, again such patient will not be able to achieve pregnancy and may not be able to have their own biological baby with the attendant psychological and emotional trauma. Oguntoyinbo, Amole and Aboyeji (2003) also reported on the relationship between normally implanted placenta and estimated postpartum blood loss. The study did not reveal any significant relationship between normal placenta sites and estimated postpartum blood loss in actively managed labour. Placenta was anterioly located in the uterus in 48.7% and posteriorly in 41.7%. What determines the site of placenta is currently unknown, and the relationship, if any between normally implanted placenta and postpartum blood loss is not documented in the literature

PRE-LABOUR RUPTURE OF MEMBRANES (PROM): This is defined as rupture of the foetal membranes with a latent period before the onset of spontaneous uterine contraction. It occurs in about 10% of all pregnancies with a majority of cases occurring after 37 completed weeks of gestation (Svigos, Dodd and Robinson; 2011). If PROM occurs before 37 completed weeks of gestation, the condition is referred to as preterm-pre-labour rupture of the membranes (PPROM). The pregnant mothers face considerable morbidity and possible mortality from this condition. Some of the maternal risks include chorioamnionitis, abruptio placentae, primary and secondary post-partum hemorrhage and risks of induction and operative delivery. They are also prone to psychological sequelae particularly related to PROM with disruption created by maternal hospitalization and continued observation associated with uncertain foetal/neonatal prognosis

Aboyeji, Abdul, Ijaiya, Nwabuisi and Ologe (2003) reported on the bacteriology of pre-labour-premature of membranes in Ilorin. It was a case controlled study to determine the association and pattern of bacteria in the aetiology of pre-labour

premature rupture of membranes. Pathogens were isolated in 44.4% of cases. The common pathogens were *Gardnerella Vaginalis* (29.1%), *Candidia albicans* (23%), *Staphylococcus Aureus* (18.7%), *Strept. Pyogens* (16.6%), *Coagulase negative* staphylococcus (CONS) (6.3%) and *klebisiella* (6.3%).

The antibiotics that were 100% active against the isolated pathogens were Ofloxacin and Azithromycin. That *Gardnerella Vaginalis* was the most frequently isolated organism in the study suggests a major difference in the prevalence of aetological organisms in cases of PROM in this environment as *G.Vaginalis* is not one of the specific organisms associated with PROM and its isolation in previous studies is not common. Other isolates from this study (*S.Pyogens*, CONS, and *klebsiella*) are peculiar to this environment having not been specifically linked with PROM in previous studies. The study also concluded that Azithromycin is the only safe drug in pregnancy with 100% sensitivity that is locally useful in cases of PROM. The importance of this study lies in the fact that we are able to isolate pathogens that are peculiar to this environment and the appropriate anti-microbial drug to use thus enhancing quality of care to the women and in the process lessen the burden of the condition on our women.

#### SEXUALITY.

Sexuality has been described as a social construction of biological drive (Sondra and Kirsten; 1996). It is multi-dimensional and dynamic. An individual experience of sexuality is mediated by biology, gender roles and power relation as well as by factors such as age, culture, religion and social and economic condition. Aboyeji and Ijaiya (2005) reported on the experience of pregnant mothers' sexuality and sexual activities. The study demonstrated a reduction in sexual

desire, pleasure and orgasm during pregnancy in the women studied. It was also found that sexual activity is associated with abdominal discomfort in 37.8% of cases, dyspereunia (26.9%), vaginal bruise (20.8%) and fear of miscarriage and preterm labour (19.1%). Thus sexual activity, an act that should be pleasurable to both parties, is additional burden imposed by pregnancy. Lack of understanding of the male partner about the changes in sexuality during pregnancy may cause marital disharmony which may put the pregnant woman at risk adversely affecting the pregnancy outcome.

**SEXUALLY TRANSMITTED INFECTIONS** (STIs). Sexually transmitted infection is a public and social health problem with more than 1 million people acquiring a sexually transmitted infection (STI) every day and an estimated 500 million people acquiring one of the four STIs; Chlamydia, Gonorrhea, Syphilis and Trichomoniasis yearly. More than 530 million people are living with herpes simplex type 2, the virus that causes genital herpes and more than 290 million women have a human papilomavirus(HPV) infection (WHO 2013). Pregnant mothers are not exempted from these STIs, the occurrence of which may adversely affect pregnancy outcome. STIs are associated with morbidities including infertility, septic abortion, ectopic pregnancy, cervical cancer and cause an increase risk of HIV/AIDS when a genital ulcer is present. During pregnancy and labour, STI is also associated with premature rupture of membranes, preterm labour, low-birth weight, stillbirth, postpartum endometritis, neonatal pneumonia, conjunctivitis and congenital deformities/malformations.

Aboyeji and Nwabuisi (2003) reported on a cross-sectional study of prevalence of sexually transmitted infections in 230 pregnant women in Ilorin. About half (49.4%) of the study population haboured various agents including *candida albicans* (37.8%), *trichomonas vaginalis* (47%), *Gardnerella Vaginalis* (3.9%), *Syphillis* (1.7%) and *Neissaria gonorrhea* (1.3%). Risk factors associated with STIs were young age, and low level of education. The isolation of these organisms was a source of concern and anxiety to the pregnant mothers as they were highly worried that it may adversely affect the outcome of the pregnancy. The prevention of STIs in general would include comprehensive sexual education, encouraging safer sex and scaling up of STI services. Screening of pregnant women for sexually transmitted infections is also important to reduce the burden of the condition on womanhood.

#### **UTERINE FIBROIDS**

Uterine leiomyomas or fibroids represent a major public health problem. They are benign tumor of the smooth muscle of the uterus. They represent the most common pathological growth of the female reproductive tract with a prevalence rate varying from 20-50% of woman depending on age, ethnicity, parity and method used to assess their presence. In one series they were said to be present in 77% of postmortem specimen where detailed examination of the uterus was done looking out for the tumor (Fletcher and Fredrick; 1999). The precise of

aetiology of uterine fibroid is unknown. Some of the known risk factors that predispose a woman to the development of the condition include early menarche, nulliparity or low parity, advanced maternal age, obesity (risk of uterine fibroid is increased approximately 21% for each 10kg increase in body weight). Tamoxifen use and ethnicity (being between two and three times greater among black women than white women) are other risk factors (Khan, Shellamar and Gupta; 2014). Recent evidence also suggests that alcohol and caffeine intake is a also risk factor. However, smoking, menopause and high parity are known to decrease the risk of developing uterine fibroid. Uterine fibroids are frequently asymptomatic but are recognized cause of menorrhagia, dysmenorrhoea, irregular vaginal bleeding, lower abdominal swelling and distention. Fibroids are frequently diagnosed in infertile patients. They are also associated with spontaneous abortions, pre-term delivery, abnormal presentation, outlet obstruction, post-partum hemorrhage and Puerperal Sepsis.

The management of uterine fibroid depends on the size, location and number of the fibroid, the age and reproductive wish of the patient and whether the fibroid is symptomatic or not. The management could vary from observation to the use of drugs, surgery (myomectomy and hysterectomy) uterine artery ligation, uterine artery embolization, image guided focused ultrasound thermal therapy and myolysis. Aboyeji and ljaiya (2002) reported on a ten-year clinical review of uterine fibroid. The study found that uterine fibroid constituted 13.4% of gynecological admission and was responsible for 26.2% of major gynecological surgery. Common clinical features of the condition in the study included; menorrhagia (64.3%), infertility (56.2%), abdominal swelling (35.5%), dysmenorrhoea (32.5%) and abdominal pain (27.1%).

The patients' age range between 19 and 59 years with a mean of 28.4 years. They were predominantly of low parity ≤2 (60.1%) and 17.1% had "huge" uterine fibroid corresponding to greater than 24 weeks of pregnancy. In the study, infertility was present in 56.2% of the cases. The role of the uterine fibroid as a casual factor in infertility remains controversial; it is however obvious that obstruction of both fallopian tubes by fibroid or gross uterine cavity distortion could contribute to infertility. Fifty-two percent of the patients had hysterectomy while 48% had myomectomy. The myomectomy group was significantly complicated by post operative morbidities of pyrexia, anaemia and prolonged hospital stay and wound dehiscence than the hysterectomy group. A few of the patients with low parity had hysterectomy because of the size and number of the fibroid. These patients again would not be able to carry their own pregnancy and may not be able to afford assisted reproductive technology and therefore suffer the psychological trauma associated with infertility in our society. In fact if we had followed the recommendation of the American College of Obstetrician and Gynecologist, that hysterectomy is indicated in women with "large" myomas with uterine size equal or greater than 12 weeks gestation, 95.4% of our patients would have had hysterectomy. In my opinion that would be a "tragedy" for some of these women as they may suffer neglect or divorce by their husbands.

#### **VESICO-VAGINAL FISTULAE**

Another burden of pregnancy on womanhood is Vesico-vaginal fistula. Vesico-vaginal fistula (VVF) is an abnormal tract between the bladder and vagina that allows continuous involuntary leakage of urine into the vagina. It is the most common communication between the efferent urinary passages and the genital tract. Obstetric urogenital fistulae is as old as mankind and has been a constant source of misery to the affected women. It was thought to be an incurable disease until 1675 when the first successful Vesico-vaginal fistulae repair was performed by Johann Fatio (Thomas and Lane; 1994). The condition is a medical, social and public health problem and a disease of the developing countries. Contributing factors again include poverty, illiteracy, ignorance and poor road networks and poor utilization of mal-distributed health facilities. It is rarely encountered in industrialized world because of excellent obstetric care.

Globally over two million women are estimated to be living with the condition, majority being in sub-Saharan Africa and south Asia. Between 100,000 and 1,000,000 Nigerian women are estimated to be living with the condition with annual case of between 50,000 and 100,000. Prolonged obstructed labour is the major cause of Vesico-vaginal fistula in developing countries. This is in contrast to the industrialized countries where it is mainly due to complications of gynecological surgery.

Ijaiya, Aboyeji and Ijaiya (2002) reported on the epidemiology of the condition in Ilorin. The frequency of the condition was in 1.4 per 1,000 deliveries. The highest frequency was in the teenagers 25% and 43.2% were primiparous. Majority of the patients were of low socioeconomic status and illiterate. None of the patients belonged to the high social class. Prolonged obstructed labour was the most common cause in 65.9% cases. 27.3% of the patients were separated or divorced from their husbands. In another study Ijaiya, Rahman, Aboyeji, Olatinwo, Esuga, et al; (2005) reported on the Nigerian experience of Vesico-vaginal fistula. The result showed that the condition was prevalent both in the Northern and Southern parts of the country. Majority of the patients in Northern Nigeria were married before or at 18 years of age. The mean age of marriage ranged between 13 and 15.5 years. The youngest patient was aged 10 years. The peak age group of occurrence of Vesico-vaginal fistula was 10 to 18 years in 90% of patients in Sokoto, 72.5% of Kano and 58.8% of Maiduguri. Primiparous patients were the group commonly affected in most centres except in PortHacourt where multiparous patients constituted 64.5% of cases. As expected the most common cause of the condition was prolonged obstructed labour in all the series (65.9% to 96.5%). Other causes included gynaecological operations, advanced cervical cancer, caesarean sections, forceps delivery, uterine rupture, craniotomy and traumatic vaginal laceration from fall. The psycho-social complications of the condition were highlighted by the fact that one-third of the patients in

Kano series had psychological depression and over half suffered from negative reaction. Divorce/separation was also the lot in many of the patients.

#### **CAESAREAN SECTION**

Caesarean section is the delivery of the foetus and placenta through an abdominal and uterine incision after 28 completed weeks of gestation. It is the commonest major obstetric operation worldwide. The origin of caesarean section is not certain having been largely lost in antiquity and mythology. It has evolved from being a post-mortem operation to become a lifesaving procedure for both the mother and her baby. The first modern caesarean section was performed by a German Doctor Ferdinand Adolf Kehier in 1881, when he introduced transverse incision to minimize bleeding (Wikipedia 2013). Globally the incidence of the operation has been on the increase with incidence as high as 46% in China and 33% in the USA (Feng, Wang, An and Ronsmans; 2014). The high incidence has become an issue of international public health concern not only because caesarean sections are costly incurring a financial burden for the families and society, but also because they may entail health risks for women and their children. Some of the reasons for the increase include unending list of indications, improved education of the patients leading to a better acceptance of the procedure as adjudged from maternal and foetal outcome. Although caesarean delivery is now safer than it has ever been, it can never be entirely safe and therefore is not an alternative to vaginal delivery. Ijaiya and Aboyeji (2001) reported the trend in caesarean delivery over a ten-year period in Ilorin. The overall caesarean section rate was 9.1%. The commonest indication was cephalo-pelvic disproportion in 30.8%. Other common causes include antepartum haemorrhage 13.1%, preeclampsia/eclampsia 9.3%, foetal distress 8.6% and breech presentation 7.3%. caesarean section was the indication in 6.7% of cases.

Emergency Caesarean section accounted for 91.5% while elective caesarean section accounted for 8.5% of cases. The rate rose from 1 in 26 deliveries (3.8%) in 1990 to 1 in 5 deliveries (20%) in 1999. The maternal mortality for caesarean section was 1,050 per 100,000 operations. The risk of dying from the operation was 26 times higher than vaginal delivery .Similar study reported from Mokwa, a secondary health care facility in Niger state, (Nwosu, Agumon, Aboyeji and Ijaiya 2004) reported an 18.5% incidence of caesarean delivery with the commonest indication being again cephalo-pelvic disproportion in 42.1% of cases. Maternal mortality was 831 per 100,000 operations. Complications recorded in both series included wound infection, postoperative anemia requiring blood transfusion, septicemia and puerperal psychosis. Apart from these complications the patients have a compromised reproductive future in that they are prone to uterine rupture, abruptio placentae, placenta praevia, morbidly adherent placenta, ectopic pregnancy and still birth after 34 weeks in subsequent pregnancies. They are also at risk associated with repeat caesarean section.

These highlighted associated risks and complications with caesarean section should serve as deterrent to performing the procedure without valid obstetric indication so that our women will not be subjected to unnecessary morbidities and mortality.

#### **GENITAL MALIGNANCY**

Mr. Vice-Chancellor sir, the burden of pregnancy on womanhood also extends to malignant conditions of the female genital tract. I shall highlight carcinoma of the cervix and ovarian cancer in this respect.

**CARCINOMA OF THE CERVIX**: carcinoma of the cervix, a preventable disease is the fourth most common cancer affecting women worldwide and the commonest genital malignancy in our environment. Cervical cancer comprises approximately 6% of all cancers in women. An estimated half a million new cases are diagnosed yearly with about 266,000 deaths (WHO 2012). About 70% of these cases are found in developing countries which has only 5% of global cancer resources. In sub-Saharan Africa, 34.8 new cases of cervical cancer are diagnosed per 100,000 women annually and 22.5 per 100,000 women die from the disease while the corresponding figures for North America are 6.6 and 2.5 per 100,000 women respectively. Cervical cancer has a devastating effect with a very high human, social and economic cost affecting women in their prime of life. The initiating factor for the development of cancer of the cervix is Human Papilloma Virus (HPV). Other risk factors are early initiation of sexual activity, smoking, low socio-economic status, multiple sexual partners and high parity (a consequence of many pregnancies.)

Ijaiya, Aboyeji and Buhari (2004) reported on cancer of the cervix in Ilorin. The disease was the commonest gynecological cancer (63.1%) of the 236 histological confirmed gynecological cancers over the 10-year period of study. Not surprisingly, the incidence was highest among grand-multiparous patients. Sadly 75% of the patients presented at advanced stage when cure is not achievable. An important finding was the high incidence (9.4%) of the aggressive variety: adeno-squamous carcinoma which is higher than the published series. Because carcinoma of the cervix is preventable by screening to detect the pre-invasive disease, Aboyeji, Ijaiya and Jimoh(2004) reported on the knowledge, attitude and practice of cervical smear as a screening procedure for cancer of the cervix among health workers in Ilorin. Although the knowledge of papanicolaou-smear (Pap smear) as a screening procedure for cervical cancer was high at 69.8% only 3% of those with the knowledge had Pap smear at least once previously. 52.5% of the respondents would not want to be screened because they believed they could not develop the disease and 49.2% because they feared being detected of having the disease. The findings of poor attitude among health workers: Doctors, Nurses and Pharmacists a group of workers who unconsciously and passively act as role models in health related issues to members of the larger society leave much to be desired. To reduce the burden of carcinoma of the cervix, public

health education on the preventable nature of the disease through Pap smear should be intensified. Also organized population based screening programme should be established in the country.

#### **OVARIAN CANCER.**

Worldwide ovarian cancer is the third most common gynecologic malignancy and ninth overall with an estimated 225,000 new diagnosis each year. It accounts for 5% of all cancers among women and 23% of gynecological cancers. One in 58 women will develop the disease and 47% of all deaths from cancer of the female genital tract occur in women with ovarian cancer. A woman's risk at birth of having ovarian cancer sometimes in her life is 1% to 1.5% and that of dying from ovarian cancer almost 0.5% (Berek and Nataraghans; 2007).

Cancer of the ovary is commoner in the developed than developing countries of the world. Incidence ranges between 2.7 and 14.9 per 100,000 in developed countries. It occurs at all age including infancy and childhood depending on the histological type. As in most malignant conditions, the causative factors are poorly understood. Epithelial tumor (the commonest histological type of ovarian tumor) is associated with infertility, low parity (a consequence of few pregnancies), early menarche and late menopause; it also has an unclear association with prolonged treatment with fertility drugs. Heredity also plays a significant role in the aetiology of ovarian cancer. The hallmark of this lethal disease is that it has insidious onset, often producing no distinct symptoms even in advanced stage. Ovarian cancer represents a major surgical challenge, requires intensive and often complex therapies and is extremely demanding of the patients' psychological and physical energy.

Buhari, Ojo, Ijaiya and Aboyeji (2005) reported on ovarian cancer in Ilorin over a 20year period. Ovarian cancer was the second most common gynecological cancer with a peak age incidence in the 5<sup>th</sup> decade of life. Epithelial cancer was the commonest histological type in 43.9% of cases. Cancer derived from the sex cord and Stroma accounted for 18.5% and germ cell tumour accounted for 13.4%. Late presentation was the case in more than 50% of cases; the youngest of the patients was 21years old while the oldest was 85years old. Ojo, Buhari, Malami and Aboyeji (2005) also reported a case of Struma ovarii an extremely rare ovarian teratoma with only 150 reported cases in medical literature. It belongs to the group of monodermal and highly specialized teratomas of germ cell origin. It accounts for about 2% of all ovarian germ cell tumors and less than 5% of mature teratoma

#### **MATERNAL MORTALITY**

Mr. Vice-Chancellor sir, perhaps the mother of all burden of pregnancy on womanhood is maternal death or maternal mortality. The fact that maternal health is neglected is aptly described by Fred Sai (2000), former president of International planned parenthood federation,

when he said "No country send its soldiers to war to protect their country without seeing to it that they will return safely, and yet mankind for centuries has been sending women to battle to renew the human resource without protecting them". That statement made fourteen years ago is still relevant today.

The WHO defines maternal mortality as the death of a woman while pregnant or within 42days of a termination of a pregnancy irrespective of the duration and site of the pregnancy from any cause related to or aggravated by the pregnancy or its management but not from accidental or incidental causes. The causes could be classified to either direct or indirect

**Direct maternal Death**: The death of a woman resulting from obstetric complication of pregnancy, labour or puerperium and from interventions, omissions, incorrect treatment or chain of events resulting from any of these factors. An example is maternal death from eclampsia.

**Indirect maternal death**: A maternal death not directly due to an obstetric cause but resulting from previously existing disease or a disease that develops during pregnancy, labour or Puerperium but which was aggravated by maternal physiologic adaptation to the pregnancy. An example is maternal death from complications of heart disease.

Maternal mortality is commonly measured by:

**Maternal mortality ratio**: The number of maternal death during a given period that results from the reproductive process per 100,000 live births over the same period.

**Maternal mortality rate**: Is the number of maternal death in a given period per 100,000 women in the reproductive age over the same period.

**Adult lifetime risk of maternal death**: the probability that a 15-year old woman will die eventually from a maternal cause. This is the probability of dying from a maternal cause during a woman's reproductive lifespan.

#### MAGNITUDE OF THE PROBLEM

The statistics about maternal mortality is unimaginable and mind-bogging. Globally there were 287,000 maternal deaths in year 2010 yielding a maternal mortality ratio (MMR) of 210 maternal deaths per 100,000 live births. This translates to about 800 maternal deaths per day; about 30 deaths every hour and one death every 2 minutes.

Developing countries accounted for 284,000(99%) of the global maternal deaths. The majority 162,000 (56%) are in sub-Saharan Africa. The lifetime risk of maternal death is 1 in 3,800 in developed countries, 1 in 39 in sub-Saharan Africa and 1 in 29 in Nigeria.

At country level, two countries India and Nigeria accounted for one-third (33%) of the global maternal deaths: India 56,000 (19%) and Nigeria 40,000 (14%). Nigeria is one among the top 10 countries with highest maternal mortality ratio. This contrast with the ten countries with least MMR.

Table 1: Top Ten Countries with highest MMR and Ten Countries with least MMR

|      |   | Least ten countries   |  |
|------|---|---|--|
| MMR  | Country   | MMR   |  |
| 1100 | Estonia   | 2   |  |
| 1000 | Greece  | 3   |  |
| 890  | Austria   | 4   |  |
|      |   |   |  |
| 890  | Belarus   | 4   |  |
| 800  | Italy   | 4   |  |
| 790  | Sweden  | 4   |  |
| 730  | Iceland   | 5   |  |
| 730  | Japan   | 5   |  |
| 690  | Finland   | 5   |  |
| 630  | Ireland   | 6   |  |
|      | 1100<br>1000<br>890<br>890<br>890<br>790<br>730<br>730<br>690 | 1100         Estonia           1000         Greece           890         Austria           890         Belarus           800         Italy           790         Sweden           730         Iceland           730         Japan           690         Finland |  |

Worldwide, direct causes of maternal death are responsible for about 75 to 80% of maternal deaths while indirect causes are responsible for between 20 and 25% cases of maternal death.

The direct causes of maternal deaths include:

- Hemmorrhage (25%);
- Infections/Sepsis (15%);
- Unsafe abortion (13%);
- Eclampsia/High Blood Pressure (12%);
- Obstructed Labour and/Prolonged Labour (8%).

The marked wide disparity in the MMR between the developed and developing countries are due to widespread poverty, ignorance, illiteracy, social inequalities, inadequate and inaccessible health services, poor transportation and communication facilities, shortage and maldistribution of trained health personnel, expensive or non-existent drugs, medical supplies or equipment, systemic corruption, inadequate health funding and inconsistent and poorly formulated and managed health policies. This complex interplay may result in delay in women seeking skilled care during pregnancy and delivery. The delays may arise because women and their families may not recognize the warning signs of life threatening complication of pregnancy (phase 1

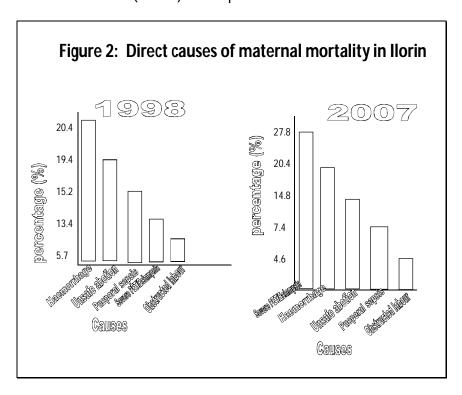
delay) or they may have difficulties in reaching the health facilities (phase 2 delay) or receive substandard or slow care in the health facilities (phase 3 delay)

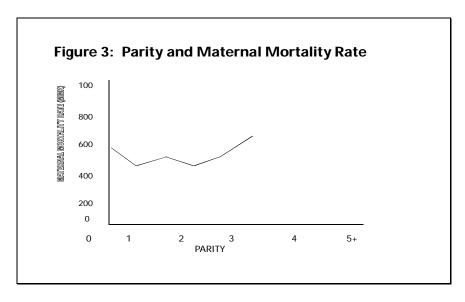
There is regional variation in the unacceptable high maternal mortality rate in Nigeria. In the South-West MMR is 165 per 100,000 live births while in the North-East it is 1,549/100,000 live births. The situation is likely to be worse with the on going Boko haram insurgency most prominent in that part of the country. Specific reasons for the alarming situation in this country include:

- High poverty level with 70% of the populace living on less than one dollar a day;
- Low educational level as demonstrated by low completion rate of primary school 73% (2%-99%) and corresponding out-of-school children (10 million, the highest in the world). Adult literacy level also low at 61%; Poor antenatal attendance at least four visits (44.8%);
- Low skilled birth attendance (39%);
- Absence of emergency obstetric care in most rural areas;
- Lack of access to health facilities linked to transport and communication problems;
- Low contraceptive rate at 15% leading to unintended and unwanted pregnancies;
- Deterioration of infrastructures in most hospital;
- Traditional beliefs delaying referral of complicated cases and utilization of obstetric facilities; and
- Over-concentration of Doctors and other health workers in the urban centres.

Aboyeji and Fakeye (1995) reported on the avoidable factors in mortality in Ilorin. The delay in instituting prompt, appropriate and effective treatment was the commonest identified avoidable factor in 38.9% of cases. Other identified avoidable factors included late presentation of patients (19.3%), home deliveries (19.3%), inadequate blood transfusion (16.1%) and administrative problems (6.5%). The findings of the study led to the set up of the Prevention of Maternal Mortality Revolving Fund (PMMR-RF) at the University of Ilorin Teaching Hospital. This scheme allowed women in labour and those at risk of death to be offered emergency obstetric care services promptly before payment of surgical fees is made. The revolving fund model ensured sustenance of the scheme and has proved to save many lives of women who would have died without prompt intervention. Aboyeji (1998) reported on the trends in maternal mortality in Ilorin over a ten-year period between 1987 and 1996. The maternal mortality ratio was 532/100,000 live births. The main causes of death were hemorrhage (20.4%), unsafe

abortion (19.4%), puerperal sepsis (15.2%), severe pre-eclampsia and eclampsia (13.4%), and obstructed labour (5.7%). The patients were mainly unbooked of low socio-economic status, grand-multiparous (five or more deliveries) and 40 years and above. The unbooked patients and the 40yrs and above were found to be four times likely to die than those aged between 20 and 29 years. In another study Aboyeji, Ijaiya and Fawole (2007) reported on maternal mortality between 1999 and 2002. The maternal mortality ratio was found to have increased to 825/100,000 live births. Severe pre-eclampsia/ eclampsia was found to be the commonest cause (27.8%) of maternal death. However, hemorrhage, unsafe abortions, puerperial sepsis and obstructed labour still retained their prominent roles in the causative factors of maternal death. About half (47.2%) of the patients died within 24hours of admission.





In the words of Mahmoud Fathalla (1977) "What is painful about these maternal deaths is not only because these women are in the prime of their life or that maternal death is one of the most terrible ways to die, but because almost every of the maternal death is an event that could have been avoided and should have never been allowed to happen".

#### **CONCLUDING REMARKS AND RECOMMENDATIONS**

The grim situation of maternal health in Nigeria demands urgent attention and state of emergency should be declared about it now to address the issue as it can be likened to a "war" situation. Indeed how else can we describe a condition that is responsible for the death of 40,000 women every year in Nigeria, 3,333 every month, 769 every week, 109 every day and 5 every hour leaving between 800,000 to 1,200,000 others with permanent lifelong disabilities?

The Nigerian women in general are disadvantaged educationally, politically, economically and socially. From primary to tertiary educational levels enrollment of girls is lower than that of boys. Economically they are not to be found in high income segment of the society and they also form a non significant proportion of the political class that formulates policies that directly affect their lives. Socially most of the times their voices cannot and should not be heard. They sometimes carryout the divine responsibility and blessing of "be fruitful and multiply" without any form of support from male partners.

Because of these disadvantages and many other compounding variables they are sexually abused, assaulted and married off in their teen years. They are unable to use modern contraception because of non-availability and inaccessibility and male dominant society not approving of it. When they are pregnant not by choice they cannot seek legal abortion services because of restrictive abortion law and sheer public hypocrisy. If the pregnancy is intended and wanted, health facilities across the country are maldistributed, poorly equipped and manned to

take care of them. Eventually in the process of delivery, thousands die which in itself is a tragedy as most of the deaths are avoidable.

#### RECOMMENDATIONS.

The most important thing that is needed is political prioritization and commitment to safe motherhood issues. Political priority and political commitment in political science is the process of ensuring that political leaders consider an issue to be worthy of sustained attention and support that attention with the provision of financial, human and technical resources commensurate with the severity of the problem (Shiffman and Okonofua; 2007).

In order therefore, to reduce the burden of pregnancy on womanhood, political priority and commitment are needed in the following areas:

#### **Education:**

Massive investment in education at all levels to develop our educational institutions to acceptable standards.

Formulations and implementation of policy that will make education free and compulsory to at least senior secondary school level to produce populace that will be literate, better informed and able to use information appropriately.

#### **HEALTH:**

- Massive investment in health sector to upgrade health facilities, train and retrain health workers
- Provide additional incentives to rural health workers
- Make obstetrics emergency care available in rural areas
- Strengthen the district hospitals to provide comprehensive obstetric care
- Establish maternal waiting homes around Teaching Hospitals and Federal Medical Centres to accommodate high risk obstetric patients till they deliver
- Establish national screening protocol for the screening of cervical cancer and Regional centres for management of malignant conditions for optimal care of such cases
- Establish national protocols on how to treat obstetric complications.

#### Formulate policy:

- To make antenatal care free and subsidize operative deliveries.
- To include practical components of how to treat obstetrics emergencies in curricular for health providers
- To ensure that national insurance health scheme is available to all.

#### **INFRASTRUCTURES:**

Investing on infrastructural development of transportation, electricity, portable water. This will improve women's economic security, income-generating activities, information and personal safety to earn a livelihood

**ABORTION LAW**: should be reviewed to make it less restrictive And finally our known and most deadly enemy "monumental CORRUPTION" should be fought sincerely.

#### **ACKNOWLEDGEMENTS**

I must first of all thank the Almighty God for making today a reality for me. He has been faithful and merciful to me in the course of my earthly sojourn. I will forever worship Him, I am grateful to my parents late Chief Noah Aboyeji and my mother late Mrs. Abigail Ajibike Aboyeji for bringing me to this world and teaching me the values of hard work, honesty, integrity and the fear of the Lord. I am also indebted to my stepmother Mrs. Asabi Aboyeji for taking care of me while in the primary school. I thank my elder brothers late Timothy Sunday Aboyeji and Chief Joseph Aboyeji for their support during my educational pursuit. I equally thank all my brothers and sisters (the Olusin of Iji-isin, Oba Samuel Babatunde Aboyeji inclusive) for their love and presence here today.

I thank my in-laws (The Omiyales) for your care and love. May The Almighty Lord continue to prosper you.

I would like to thank all my teachers in the primary and secondary schools, Kwara State Polytechnic and College of Medicine University of Ibadan for their contributions to my academic life.

I must thank all my teachers during my Residency training programme at the University of Ilorin Teaching Hospital, Ilorin. They are Prof. O.O. Ogunbode, Prof. O.O. Fakeye, Prof M. Anate, Prof O. Adetoro and late Dr. Shobowale.

I want to thank all my friends from my secondary school (Esie/Iludun Grammar School) and those from the University of Ibadan. I am grateful to all members of Iji-isin Dynamic club and the women's wing for their love and support over the years. I equally thank all my community Iji-isin; including his Royal Highness Oba Samuel Babatunde Aboyeji and his council-in-chiefs. "Alale Iji-isin Agbe wa o".

I am grateful to late Chief J.Oni of the Circular Hotel, Ilorin for his financial support during my university education. I thank Professor A.W.O. Olantinwo, Chief Medical Director of UITH and other past Chief Medical Directors for providing conducive atmosphere for my Fellowship training and to carry out my Researches.

I cannot but thank the past and present members of the most cohesive department in the University: the department of Obstetrics and Gynecology. I thank Mrs. O. Olayemi and Mr John Okoji for their secretarial assistance during the days when computer was not available to" type, copy and paste". I would like to acknowledge the friendship of Dr. Fawole with whom I started residency training and have shared our professional career together over the years having been in the same unit for over twenty-eight years. Dr. Balogun as a colleague and also as a friend has been wonderful. Dr. Ijaiya with whom I have done extensive researches on common interest is hereby acknowledged (in fact whenever I introduce myself in conferences outside Ilorin people often ask me where is Dr Ijaiya, your friend). I must also thank other members of the department, Professor Jimoh, Drs Abdul, Adesina, Olarinoye, Eze, Adeniran, Omokanye, Raji and Saidu.

I must also recognize my residents, past and present, in the department for all they have done for me. They are too numerous to mention many of whom are my colleagues in the department and others in various universities and Federal medical centres across the country. I want to thank all my co-researchers and friends in the college and the university at large. They are Professors Nwabuisi, Buhari, Adebisi, Ojuawo, Akande, Adedoyin, Mokuolu, Ologe, Adegoke, Atte, Abdulrahman, Drs Ojo, Olarinoye, Adewara, Ibrahim, Oguntoyinbo, Olaoye, Segun Busari, and many others who had been supportive in the course of my research effort. I am also grateful to my many other friends in other Nigerian universities and beyond for their support and encouragement.

I want to appreciate all the past deans and provost of the faculty and college; professors Araoye and Bojuwoye (retired), Soladoye and Omotoso for their support and encouragement while waiting to be appointed a professor. I equally thank the present provost.

I must also recognize all the nurses in the University of Ilorin Teaching Hospital, particularly those in the department of Obstetrics and Gynaecology for taking adequate care of patients under my care over all these years.

I thank God for all the members of Emmanuel Baptist church, Sabo-oke, Ilorin: Rev Dr James, Rev Adeola and all other pastoral team and Deacons. May the Lord God Almighty renew your strength.

I appreciate members of Full Gospel Business Men Fellowship International GRA chapter, Ilorin and Staff of Royal Care Hospital for their support. I also appreciate the suggestions and contributions of Professors Abdulrahman, Atte and Dr Ijaiya in the preparation of this lecture. I also thank Miss Deborah Olanrewaju and Mrs Fagbemi for their secretarial assistance.

Finally to my nuclear family I say a big thank you. To my dear wife (*MRS. SIJUWADE ABIOLA ABOYEJI*) I can only thank you for your support and love and thank God for your resourcefulness, wisdom, integrity and compassion. I will forever love her.

I also want to thank my children Mrs. Adejumoke Oluwatoyin Oni and her husband Engineer Gbenga Oni, Mrs. Adejoke Abiodun Olasina and her husband Dr Gbolahan Olasina and baby of the house Mr. Oluwamuyiwa Ademola Aboyeji. I appreciate you all for your support, love and understanding for a father who is always busy.

I thank you all for your attention.

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