

The Economic, Social and Psychological Effects of Obstetric Urinary Fistula on The Patients Seen at Abbo Center- Khartoum Teaching Hospital (Sudan) 2016.

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Abstract:

Introduction: I chose the problem of obstetric urinary fistula [OUF] because it is a common preventable affliction in Sudan which needs to be seriously attended to. OUF is an abnormal communication between the ureter, bladder or urethra with the uterus cervix or vagina (mostly between the bladder and the vagina)[1]. Most often it develops when the presenting fetal part fails to pass smoothly through the pelvis or by surgical intervention by obstetric forceps. The majority of the cases are attributed to prolonged complicated labour due to inaccessibility of adequate and immediate obstetric health care. Victims often live an unworthy life. Many of them have been abandoned, rejected or divorced by their husbands and became ostracized by families and societies because of their repulsive smell and inability to engage in sexual activity or bear children. Victims suffer both psychological and social consequences. Many of them find it difficult to engage in any worthwhile financial activity.

Objective: To know the social, economic and psychological impact of OUF on the females suffering from continuous vaginal urine leakage seen at Abbo Center Khartoum Teaching Hospital Sudan (2016).

Methods: cross sectional hospital based study was done on all females with OUF seen at Abbo,s Center during October and November (2016), using specially designed computer friendly self constructed data sheet (questionnaire). Data analysed using SPSS version 22.

Results: the study was done on 30 OUF patients of whom 16 (55.2%) were primiparae.7 (23.33%) were married at age 14 or less. Twenty one (68.8%) of the patient's incomes were decreased due to loss of jobs. Nine (28.6%) of husband's incomes decreased after their wives developed OUF. Of those ..(62.5%) lost their jobs as they traveled with their wives seeking treatment. A mean of 19.45± 12.69 million Sudanese pound spent by each patient on treatment. One patient spent more than 50 million pounds (at that time) on traetment.

Ten (36%) were either separated or divorced, 18 (61.5%) of them were abandoned by their husbands. Only 2 (6.60%) husbands chose to stay with their wives. Many patients suffered from various types of personality disorders ranging from the effect of loneliness and degradation in half of them 15 (50%), embarrassment in 20 (66.7%) because of their offensive odors, 16 (53.3%) feeling devalued or 17 (56.7%) hurt by

EDITORIAL

others because of their smell. Lastly and most importantly suffered situational depression. Of the 30 patient investigated 11 did not show any evidence of depression. The remaining patients 19 (63.33%) suffered various ranges of depression: 3 (10%) of them had mild mood disturbance, one was border-line clinical depression, 8 (26.70%) had moderate depression, 5 (16.70 %) had severe depression and 2 (6.7%) developed extreme type of depression according to Becks Inventory Scale of depression.

The sexual intimacy of more than half 19 (63.3%) of all participants were affected. Loss of their babies, secondary infertility and inability to work added a lot to the patients suffering ,social isolation, depression and grief.

Furthermore the failure to close the OUF and insufficient support by health providers added more to the patients suffering.

Happily 25 (82.8%) were hopeful of successful treatment in the future.

Conclusions and recommendations: OUF leaves a woman physically, emotionally, financially and socially traumatized. All the study population suffered various types and degrees of personality disorders especially when they lost their babies, abandoned by their husband or inadequately supported by the relatives, friends or neighbors. This was made worse by the financial constraints and additional expenditure on treatment .Lack of support not only by the husbands, families and society will be the hardest consequence to withstand psychologically. Increasing the awareness of women about the importance of antinatal care is vital. Although the OUF is preventable, it is only possible if good maternal health services and well skilled care during pregnancy and childbirth are available. Social, economic and psychological support are mostly needed for proper management.

Introduction:

OUF is an abnormal acquired communication between the ureter, bladder or urethra with the uterus, cervix or vagina (mostly between the bladder and the vagina)⁽¹⁾. Most often it develops when the presenting fetal part fails to pass smoothly through the bony pelvic or by surgical intervention by obstetric forceps.

It has virtually been eliminated in industrialized nations, yet continues to occur in resource-poor countries.⁽²⁾

Globally most patients were illiterate, young, primigravidae ⁽³⁾ aged 20 to 29. Only 11% of such patients received regular antenatal care and they all suffered from obstructed labour ^(4, 5)

Most patients are of low socioeconomic status and of lower education. ⁽⁶⁾

Invariably seen in nomads.⁽⁷⁾

Situational depression: referred to as adjustment disorder which comprises a group of symptoms, such as stress, feeling of sadness or hopelessness, and physical symptoms that can occur after going through a stressful life event.⁽⁸⁾

Standard Beck's Depression Inventory[BDI] scale is the gold standard of rating which was initially developed to assess the efficacy of psycho- analytically oriented psychotherapy in depressed subjects.⁽⁹⁾

EDITORIAL

Objectives:

To assess the socioeconomic and psychological impact on patient suffering from OUF seen at Abbo Centre , Khartoum Teaching Hospital(Khartoum - Sudan) 2016

Methodology:

Cross sectional hospital based study done at Abbo Center, Khartoum Teaching Hospital, Sudan

The targeted population were 30 females with OUF seen at Abbo Center.

All were seen as the came during October to November 2016.

Specially designed computer friendly self constructed data sheet (questionnaire) was used. Depression level measured using Beck’s Standard Inventory.

Data was analyzed using SPSS version 22.

Results:

Results are fully shown bellow in 21 figures.

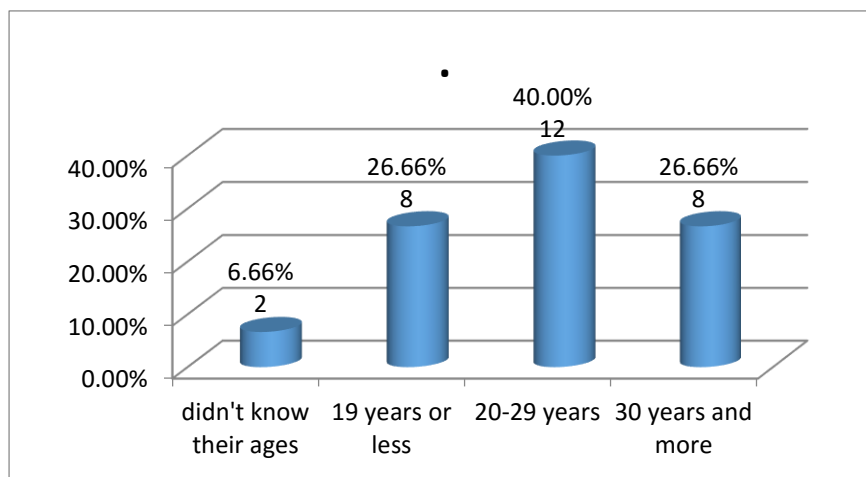


Figure (1): Patients' ages

A study on 30 patients with mean age of (27±10.30) years with youngest age of 16 and oldest of 53. 30% of the patients were ≤ 19 years while 23.3% were ≥ 20. 10% didn't know their age. This is a reflection of their illiteracy and poor births and deaths registry.

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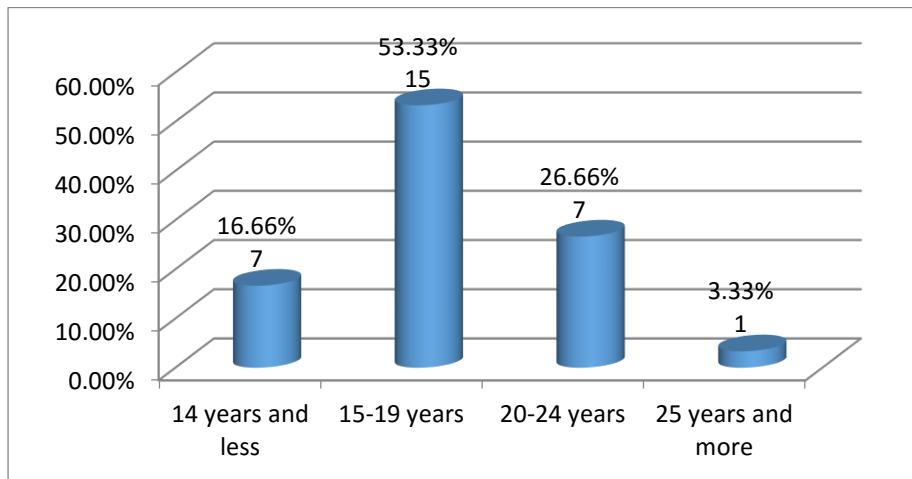


Figure (2): Patient’s ages at time of marriage.

Age of marriage of 4 (16.66%) were 14 years or less with Minimum age of 12 years, 15 (53.33%) married at age 15-19, 8 (26.66%) married at age 20-24 and only one (3.3%) patient married at age 28.

It is notable that 22 (73.33%) were 19 years or less.

Figure (3.A): Patients level of education in relation to the age of marriage.

Level of education is directly related to the patient’s age at marriage.

Most of the patients 12 (40%) were illiterate or had only been to khalwas (khalwa: is an elementary private community school run by a sheikh (muslim cleric) focusing on Islamic teaching only) 5 (16.66%). Nearly third of them received elementary education.

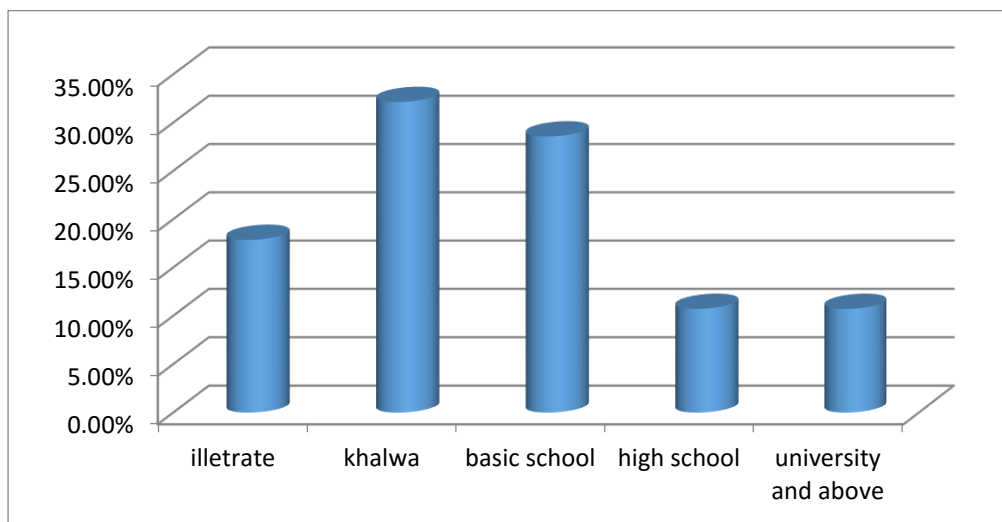


Figure (3.B): Husband level of education

Of the husbands 50% were illiterate or only had been to Khalwa while 28.6% received formal elementary education. Only 10.7% have were to universities. Lack of good education of the husbands was a contributory factor to the development of OUF.

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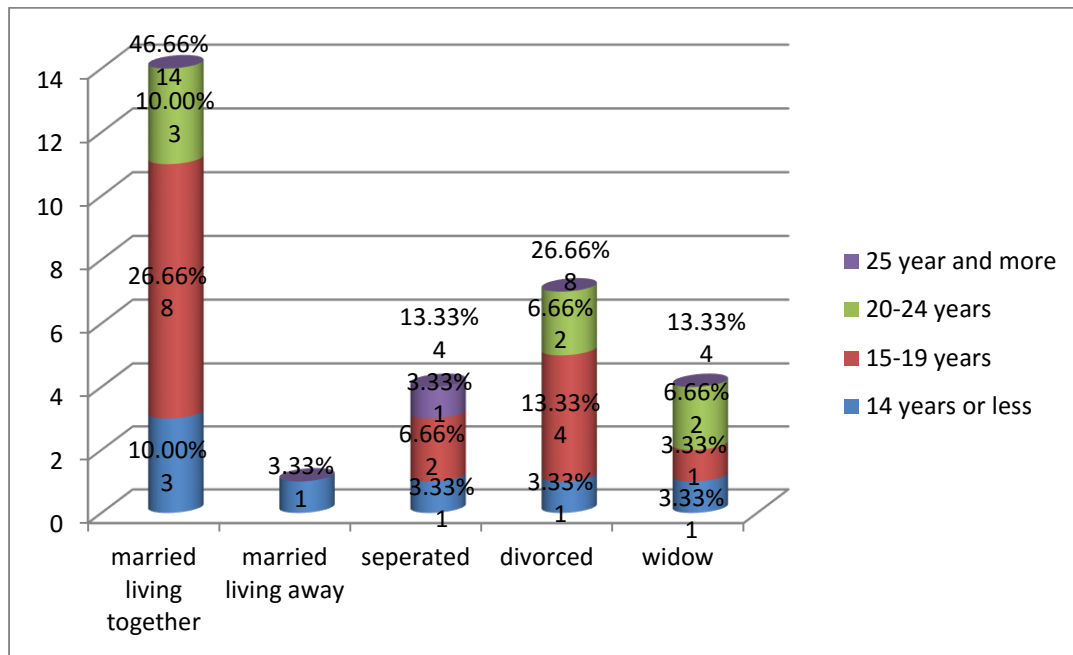


Figure (4): Present marital status of the patients in relation to age.

Of the participants 40% were either separated or divorced because of their fistulae. A good percentage of wives (aged less than 19) continued to life with their husbands as they were primeprae and were hopeful of successful closure of their fistulae.

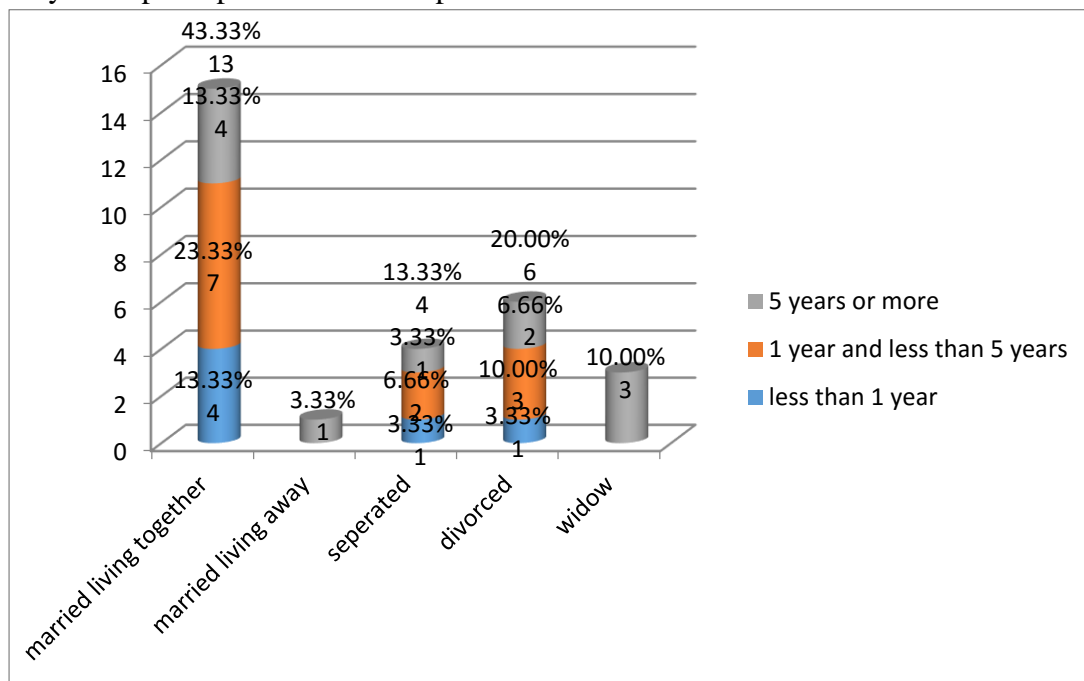


Figure (5): Marital status in relation to the time since developing the fistula.

For those whom husband still living with them in the same house (43.3%) many of them had developed fistula less than five years earlier (36.66%). Husbands tended to desert their wives if the duration of fistula exceeded five year. However the presence of children induced husbands to remain with their families.

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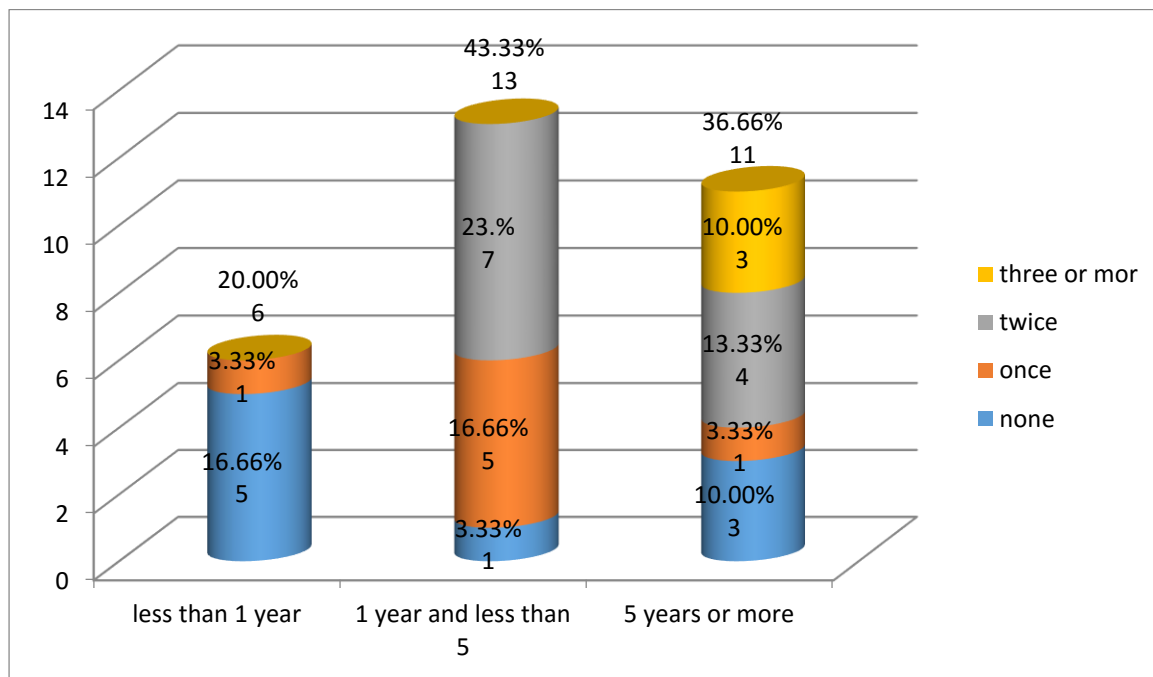


Figure (6): Time since developing the fistula in years In relation number of operations done.

Some patients not operated on, while 70% had operations done for them. Of those one third were operated on for the first time and half for the second time and the remainder underwent three or more operations.

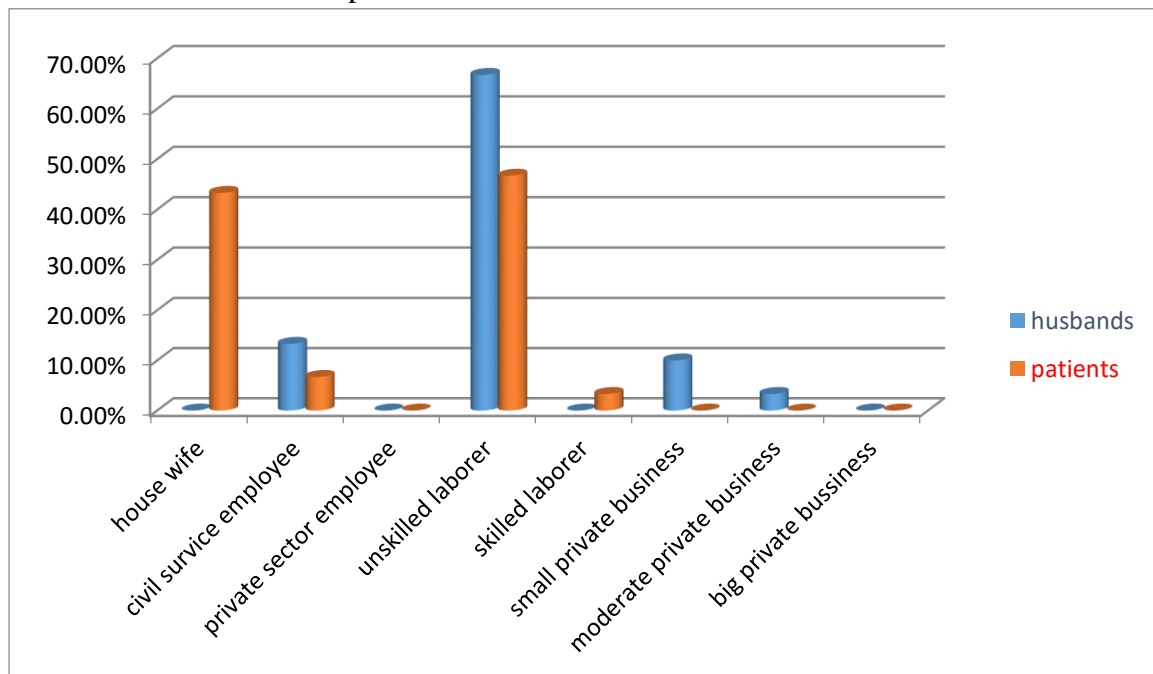


Figure (7): Patients and their husbands occupations.

Most of the patients were of low socioeconomic status, housewives (43.3%) and unskilled labourers (46.7%). Most of the husbands (71.4%) were working as unskilled labourers and a small percent (14.3%) were government employees.

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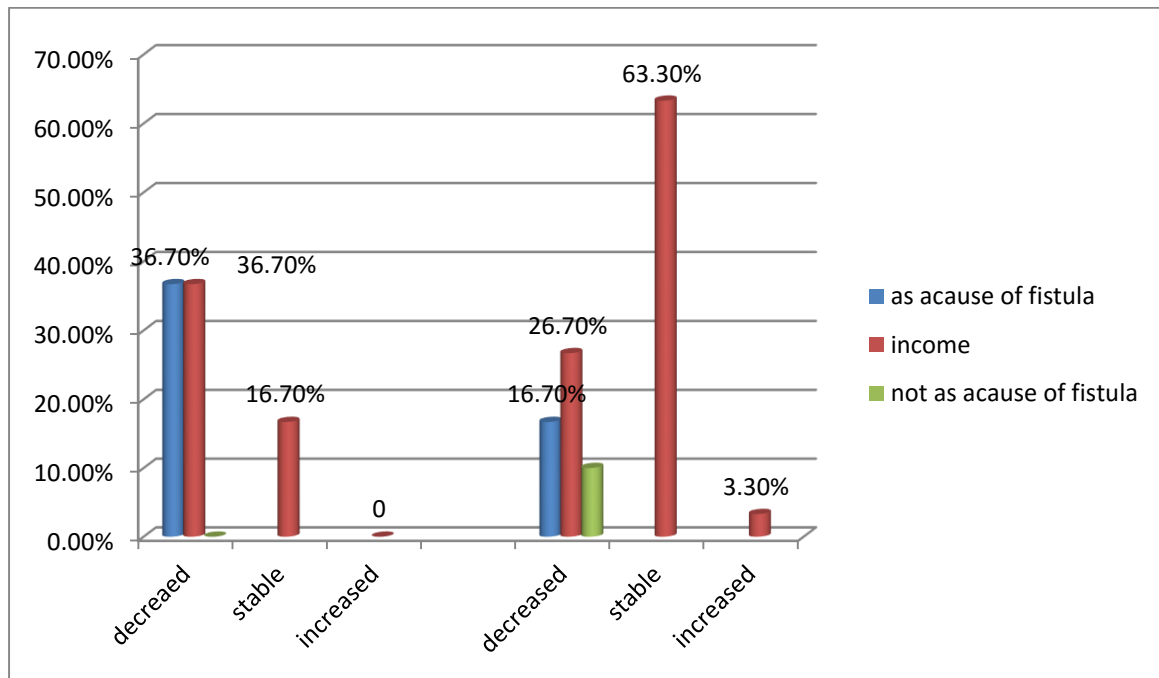


Figure (8): OUF as a cause of effect of income

OUF reduced the income of more than one third of the patients income while the husbands income remained stable in 63.3%

One exception was a husband who had to work more to meet his wives' expenses resulted in his net income increased.

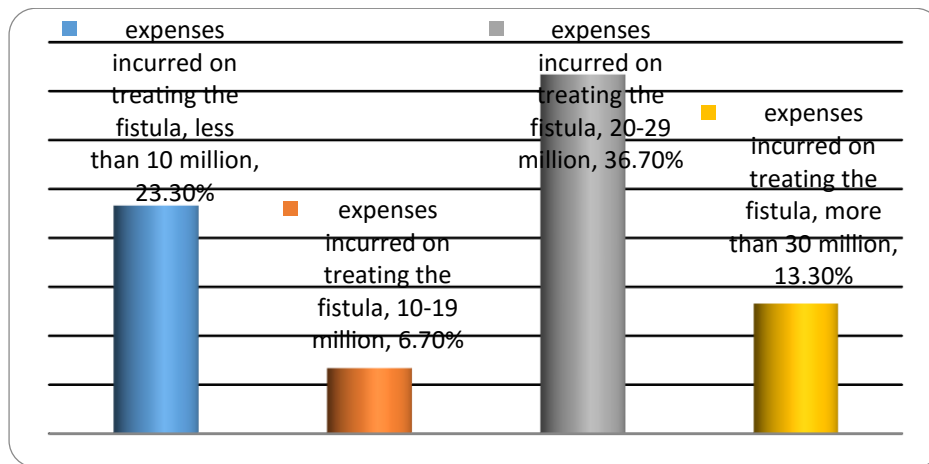


Figure (9): Expenses incurred on treating the patients.

Expenses incurred on treating the patients were large with a mean of 19.45± 12.69 millions at that time. Minimum expenses incurred were 4 millions and maximum were 50 millions. 36.7% spend 20-29 millions.

Although income per se remained stable (63.3%) the expenditure on treatment in addition to the reduced earning capacity, affected the families financial status.

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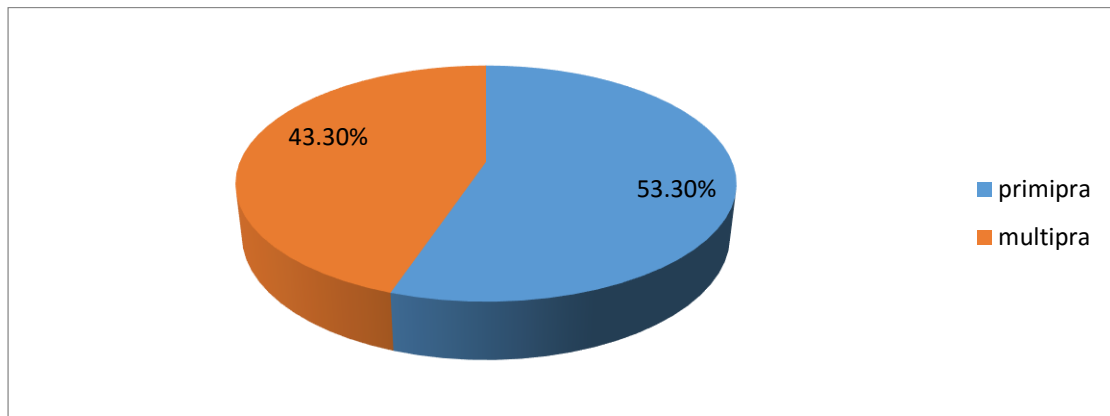


Figure (10): Parity at time of developing the fistula
More than half of the patients were primipara.

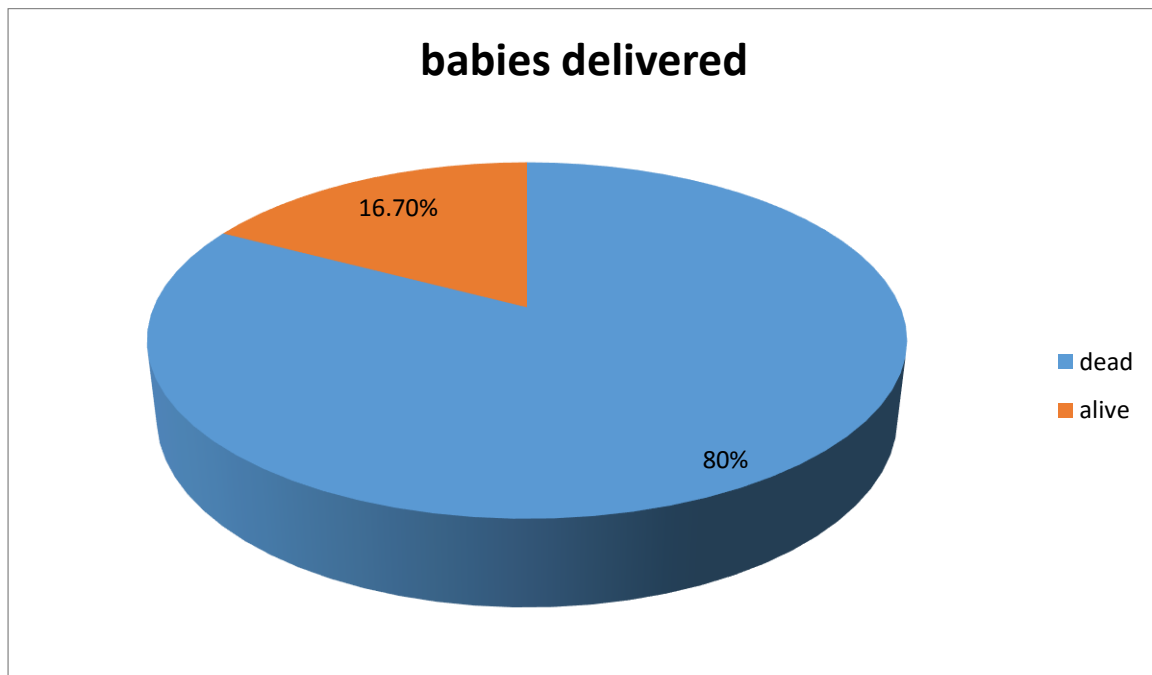


Figure (11): Outcome of obstructed labour on delivered babies.
About 4/5 of the babies died as a result of obstructed labor, adding to the Psychological effect of the mother (p value= .023).

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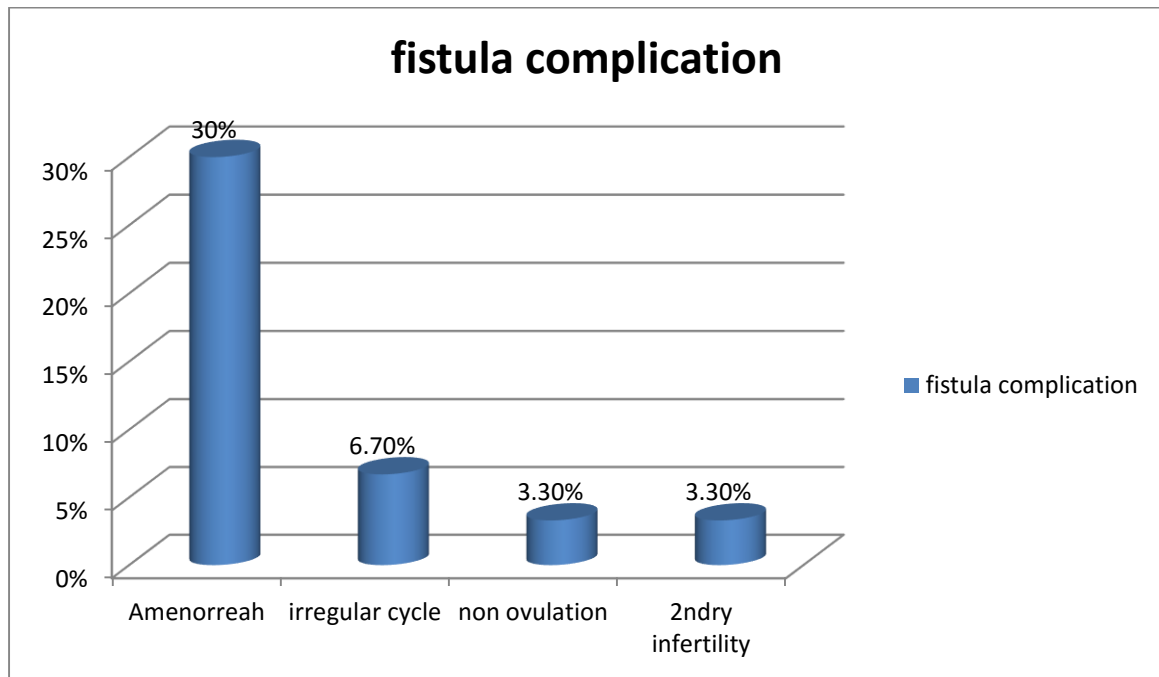


Figure (12): Late complications of fistula

Nearly one third developed amenorrhea as a late complication of fistula other late complications include irregular cycle non ovulation and 2ndry infertility.

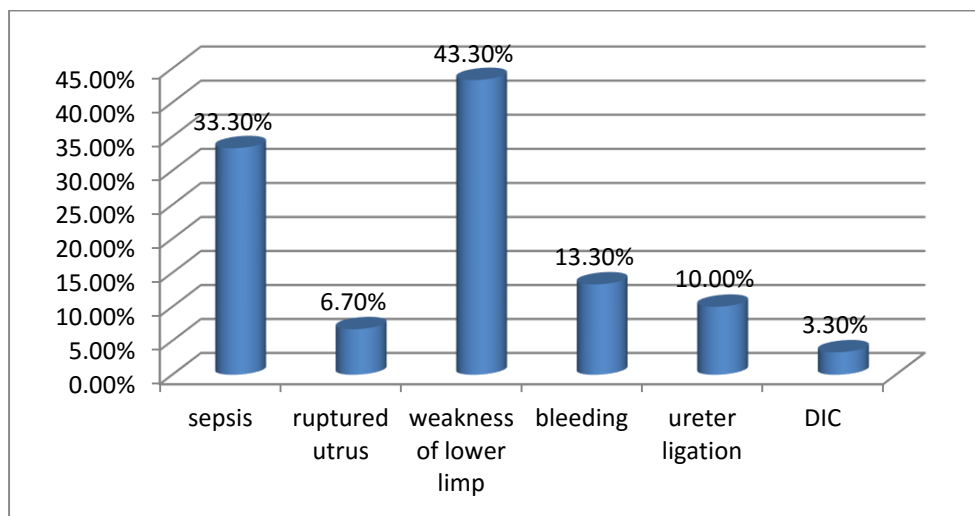


Figure (13): Complications of obstructed labor other than fistulae

About half of the patients suffered lower limb weakness. One third had sepsis as other complication than fistulae.

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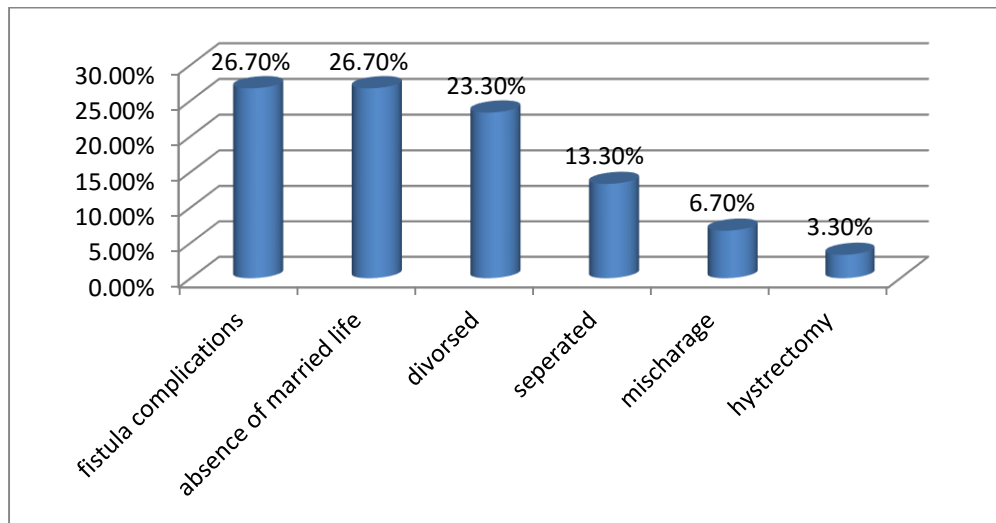


Figure (14): Causes of problems relating to future pregnancies.

Eighty six percent had a problem of getting pregnant due to one or more of fistula complications. 26.7% was due to absence of married live as a result of husband abandonment. 23.3% were divorced, 13.3% seperated. In small percentage hysterectomy was performed while other patients had future mischarges.

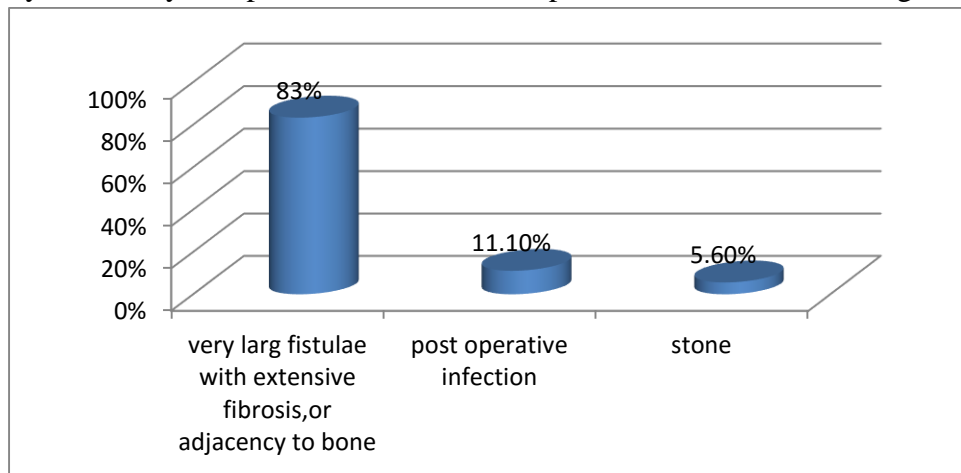


Figure (15): Causes of failure of previous operations

Causes of failure of previous operation were due to very large fistulae with extensive fibrosis, or adjacency to bone in 83% of the operated mothers. It's failure in 11.1% was due to post operative infection and due to stone formation in (5.6%).

Of the patients 86.7% had adequate support . Most of this support was given by their families (96.7%) , their husbands (56.7%),while the other half (43.3%) were abandoned by their husbands. only one patient was abandoned by her family.Three quarters received enough support from health providers (73.3%). One fifth were abandon by close relatives, neighbores and friends.[Figure: 16 ,17]

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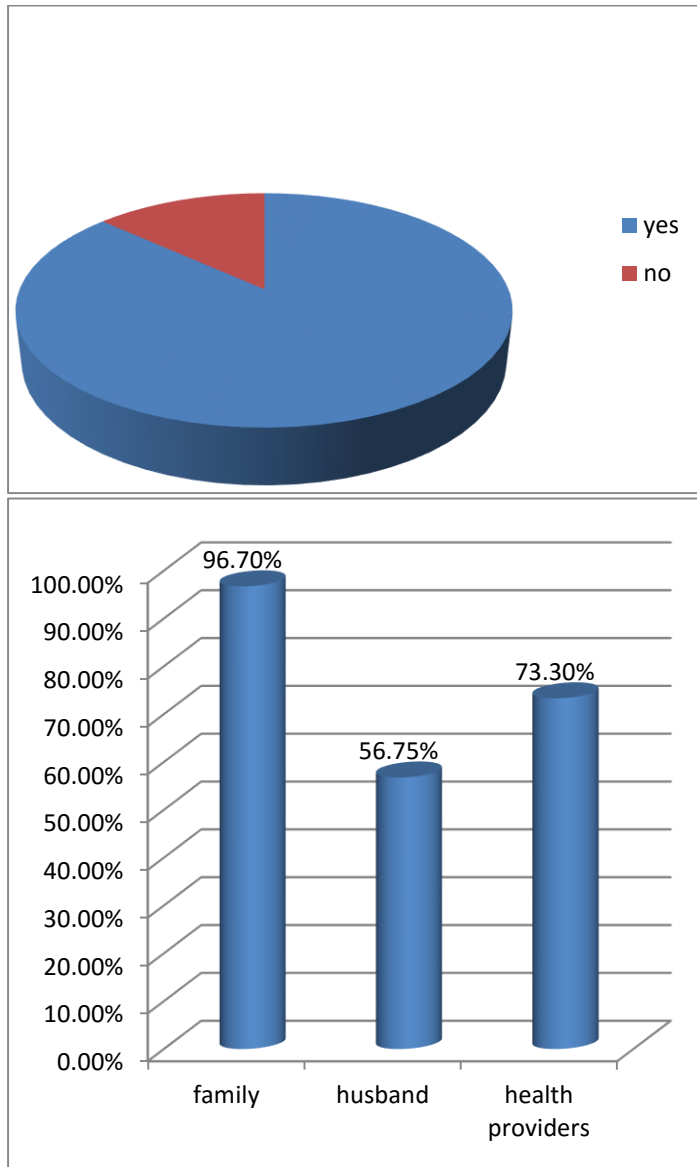


Figure (16): Post fistula support to patients

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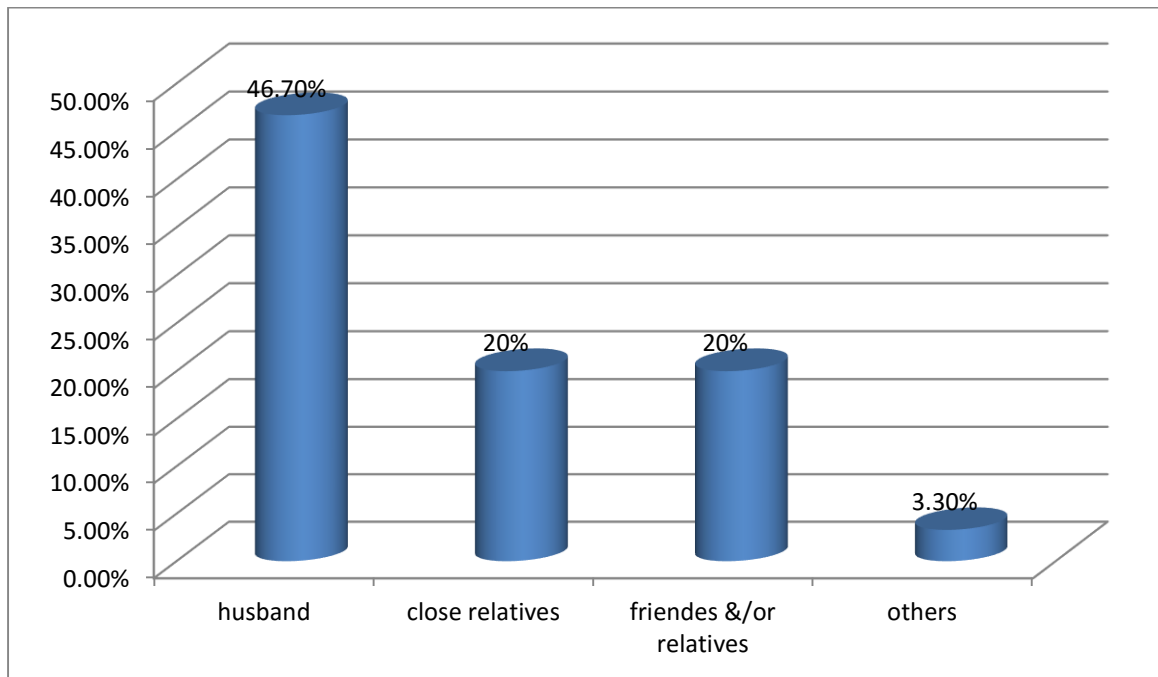


Figure (17): Patients post fistula abandonment

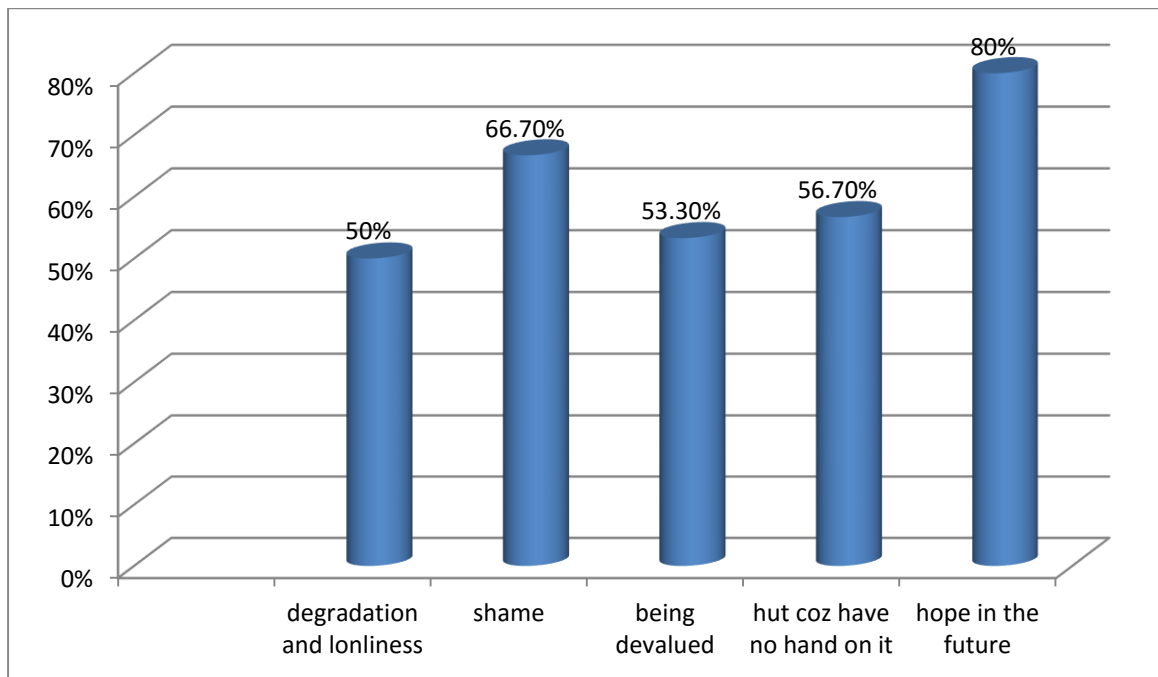


Figure (18): Various types and degrees of psychological consequences on fistula patients

The patients developed various degrees of loneliness, degradation, embarrassment and being devalued. More than half of them were feeling hurt because they had no hand on what happened to them. Eighty percent of them had happy hopes of successful treatment and child birth.

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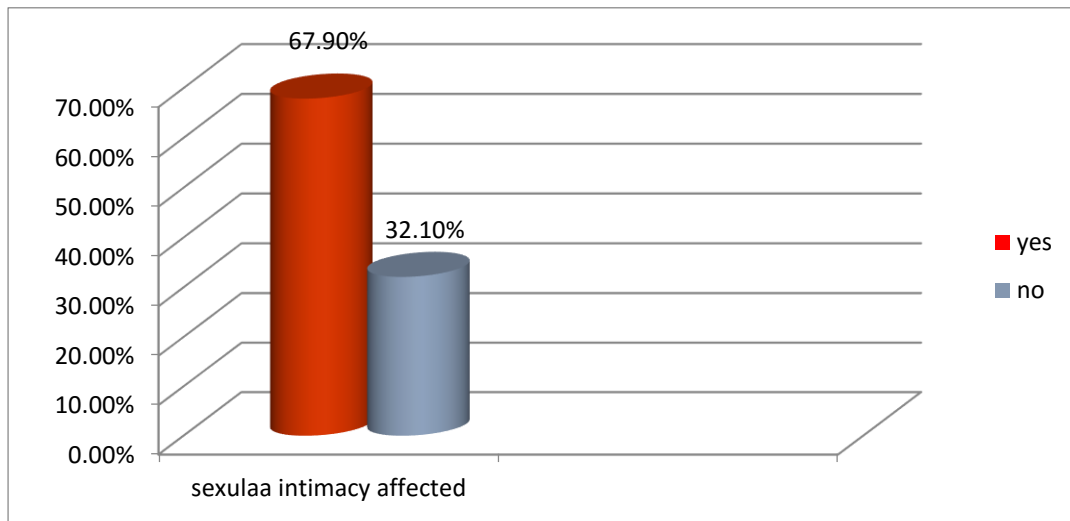


Figure (19): Effect of fistula on sexual intimacy

Sexual intimacy was lost in (67.9 %) as a result of developing OUF.

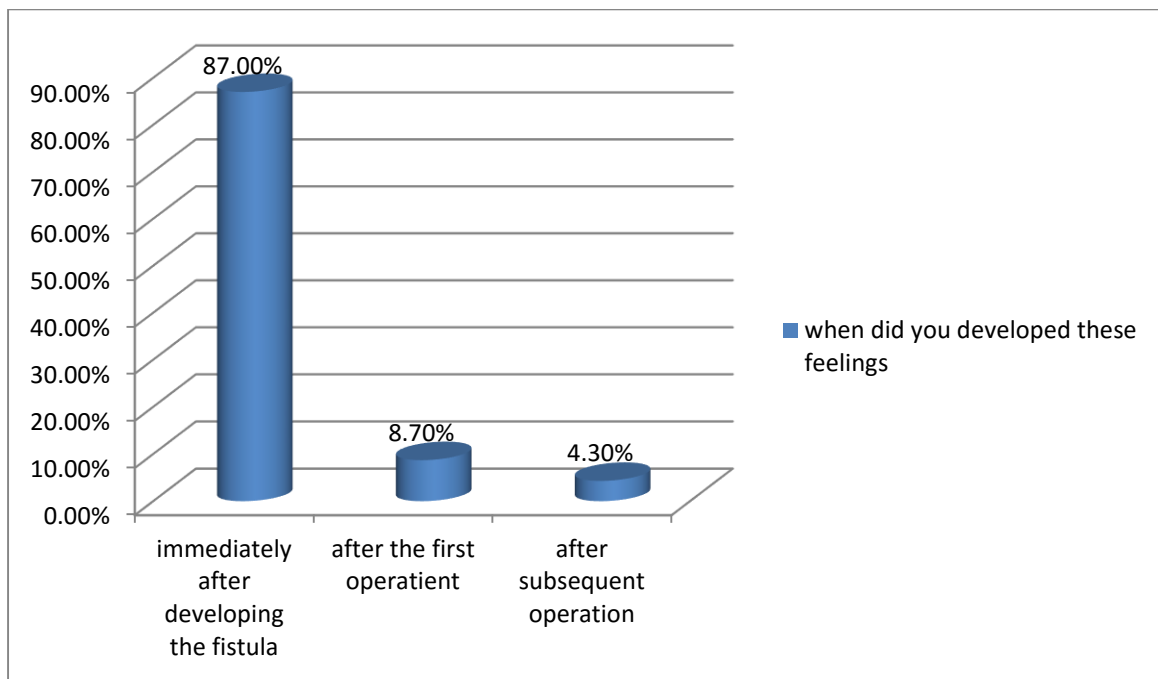


Figure (20): Time relationship of psychological consequence of fistula development.

Above figure (20) is self explanatory.

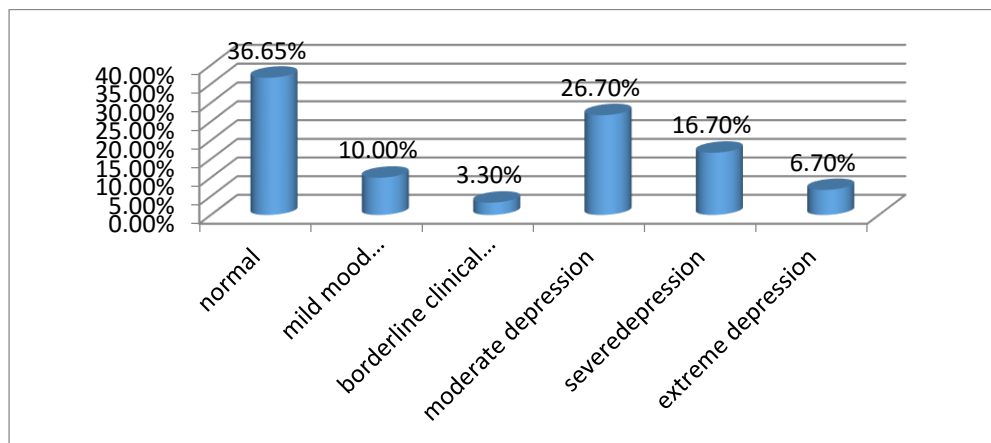


Figure (21): Depression assessment.

By assessing depression using Standard Becks Inventory .of the patients we found that (26.70%) having moderate depression (16.7 %) suffer from severe depression(6.7%) developed extreme depression.

Discussion:

Obstetric urinary fistulae are essentially preventable if health services and health awareness are adequate.

The risk of developing fistulae increase by early marriage. Girls who get married at a young age(less than 19) are likely to have cephalopelvic disproportion because their boney pelves have not yet reached their maximum sizes.

As expected primiparae are more commenly affected.

The presence of Fistula is known in addition to early birth tract and urinary tract infection to be a cause of failure of spontaneous or surgical closure of the fistula. Further more ascending infection may affect the entire urinary tract or uterine and tubal blockage leading to infertility

Some fistula patients are born to develop some post partum psychosis especially if the babies died.Only 30% of our study group developed secondary amenorrhea and infertility. This added to their psychological and personality disorders. Successful closure of fistulae and return of menstruation and fertility lessened or even removed such disorders.

All our study population suffered various degrees of psychological disorder demonstrated by various levels of adjustment disorders which may progress to personality disorders especially if made worse loss of their babies, (p value =.023) or when abandonment or diverced by their husbands (p value= .066) and if inadequately supported by their relatives, friends or neighbors (p value= .066).

This was further aggravated by the financial constraints including additional expenditure on treatment.

Furthermore the failure to close the fistula significantly added to their psychological and personality disorders, especially when the health providers were not sufficiently supportive nor considerate to them.

EDITORIAL

Death of the baby significantly increased their adjustment and personality disorders in addition to the fact that they were unlikely to get pregnant in the future, as mothers were usually hopeful of having live babies who would have grown to adults who would have supported them in the future. Such hopes were shattered by the death of their babies.

Live babies would also inherit after their fathers' demise.

Darfur men are basically religious and consequently it is not surprising as many as (56.7%) had supported their wives.

The strong faith of patients and their positive hope for a successful management of the fistula lessened the psychological and personality disorders on them.

Conclusions and recommendations:

This devastating affliction adversely affected our study population socially, economically and psychologically, amounting in some cases to exogenous depression. The social implications comprised separation or divorce of the patient.

Lack of income as a result of both loss of earning capacity, and additional expenditure on treatment added to their mental problems.

Increasing the awareness of families and health education relative to pregnancy and child birth is largely conducive to avoiding the occurrence of obstetric urinary fistulae. Providing health services including good antenatal care and midwifery services for mothers is necessary for the prevention of the development of obstetric urinary fistulae. Such services can only be provided if mobile health teams are made available to our nomadic tribes.

Adequately experienced surgeons and operative facilities will lead to the successful closure of such fistulae.

All these services can be provided for mothers at risk if funds and training are made available.

The unflinching support of husbands and relatives is extremely important for reducing the psychological effects of this devastating affliction.

Infusing the patients with faith and hope is probably the most important factor in helping them overcome the such adverse effects of this affliction.

Acknowledgement:

It is with great appreciation that we acknowledge the generosity of Doctor Hassan Abdullah how allowed his access to his fistula patients in the department of obstetric, Khartoum Teaching Hospital.

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