A COMPARATIVE STUDY OF THE MANAGEMENT OF VESICO AND/OR RECTO-VAGINAL FISTULAE AT BUGANDO MEDICAL CENTRE, MWANZA, TANZANIA, EAST AFRICA: A RETROSPECTIVE STUDY

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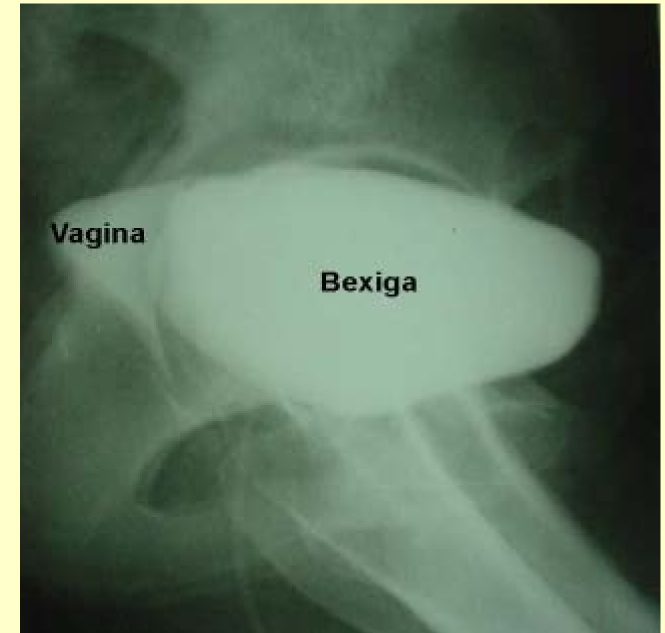
DEFINITION

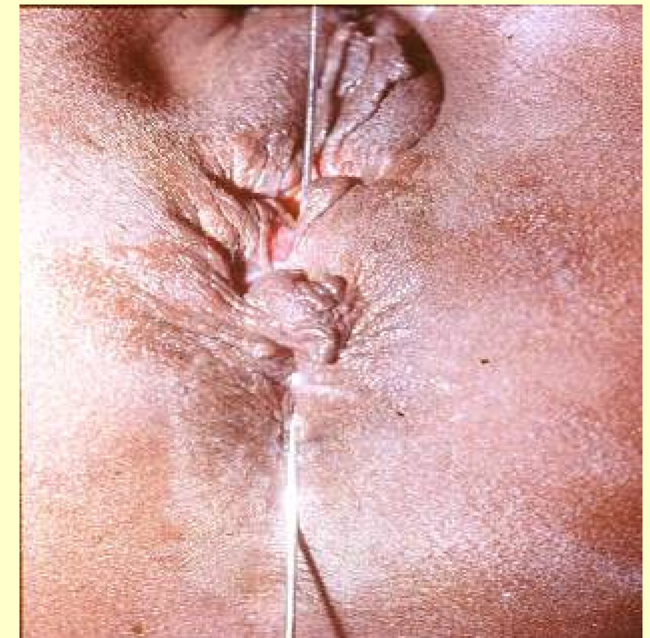
- VESICO-VAGINAL FISTULA (VVF) or URINE FISTULA

  Abnormal communication between the bladder and the vagina



- RECTO-VAGINAL FISTULA (RVF) or STOOL FISTULA

  Abnormal communication between the rectum and the vagina



CAUSES

- PROLONGED OBSTRUCTED LABOUR:
  - Obstetric fistulae
- IATROGENIC
  - Surgery: Hysterectomy, colporrhaphy, caesarean section
- MALIGNANCY
- RADIATION
  - Carcinoma of the cervix
- DIRECT TRAUMA TO THE BLADDER AND/OR RECTUM
- CONGENITAL MALFORMATION
- INFECTION

OBSTETRIC FISTULA:

Mechanism of formation in prolonged obstructed labour:

The fetal head gets stuck inside the birth canal

The bladder is compressed betweeen the hard fetal skull and the hard maternal pelvic bones (symphisis pubis)

If not releaved within 3 hours by a caesarean section **occurs**:

Oedema, avascular necrosis (no blood supply)

Slough and a **FISTULA** develops

OBSTETRIC FISTULA HAS **DISAPPEARED** FROM THE INDUSTRIALIZED WORLD

BUT

VERY COMMON IN THE

DEVELOPING WORLD:

85%

OF ALL THE FISTULA WORLD-WIDE

SIGNS AND SYMPTOMS

- VESICO-VAGINAL FISTULA
  - Continuous urine leaking through vagina
  - Cannot be stopped or cleaned
  - Smell and excoriative dermatitis

- RECTO-VAGINAL FISTULA
  - Intermittent passing of stools through vagina
  - Can be stopped and cleaned (unless diarrhoea)

SOCIAL ACCEPTANCE

URINE FISTULA

far **less** acceptable than

STOOL FISTULA

SOCIAL IMPLICATION

woman with VVF is

Ostracized

from her own society and community

LIVES AS AN OUTCAST

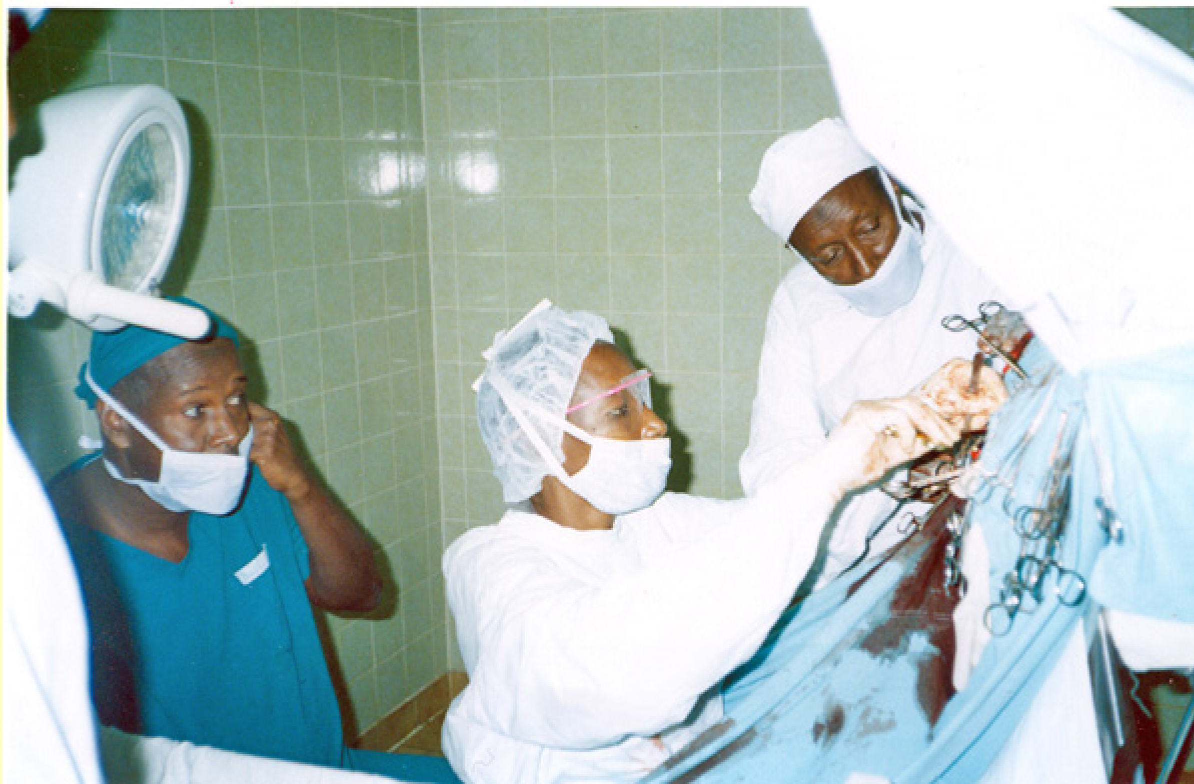
PREVALENCE

AT LEAST **2,000,000**

WOMEN AWAITING FOR SURGERY WORLD-WIDE

80-90% IN AFRICA

What Is Important?



TO CLOSE THE FISTULA

A retrospective comparative study of the management of vesico and/or recto-vaginal fistulae, between the usual and the modified method was done at Bugando Medical Centre, Mwanza, Tanzania, East Africa:

from April 1996 to September 2003

OBJECTIVE OF THE MODIFIED METHOD

To provide a high quality fistulae repair which is:

- SIMPLE
- SAFE
- EFFECTIVE
- FEASIBLE
- SUSTAINABLE
- PAYABLE UNDER PRIMITIVE CONDITIONS

MODIFIED MANAGEMENT	USUAL MANAGEMENT
• No examination under general anaesthesia(EUA) during first visit	• Some required EUA during first visit
• Early surgical closure, as soon as the fistula edge is clean	• All to undergo surgery after 3 months
• No special light diet before surgery	• 3 days light diet
• No treatement of excoriative dermatitis	• Antibiotic creams

MODIFIED MANAGEMENT	USUAL MANAGEMENT
Two enemas before surgery	4 enemas
One dose prophylaxis antibiotherapy few minutes before surgery	Preventive and post-operative antibiotherapy
Spinal anaesthesia	General anaesthesia

MODIFIED MANAGEMENT

- Starting with RVF repair then VVF
- Absorbable sutures on vaginal mucosa and episiotomy
- Urine bag on foley catheter

USUAL MANAGEMENT

- Starting with VVF repair when RVF and VVF are combined
- Non absorbable sutures
- Free urine drainage

MODIFIED MANAGEMENT	USUAL MANAGEMENT
Ambulation on day 2 post op	14 days in bed
No routine use of Martius fat graft	Routine use
Normal diet at day 2 post op	Fluid diet for 14 days

The comparison group of 100 patients has been selected randomly for

age, cause and size of vesico and/or recto-vaginal fistula.

All patients were operated vaginally

The age ranged from 14 up to 65 years.

Age distribution for two groups

Age group in years	**No of patients**
14-19	30
20-24	28
25-29	12
30-34	20
35+	10
Total	**100**

The common cause of vesico and/or recto-vaginal fistula was prolonged obstructed labour

Aetiology of vesico and/or recto-vaginal fistulae for two groups

Cause of vesico-vaginal fistula	**No. of patients**
Prolonged obstructed labour	92
Ruptured uterus + hysterectomy	2
Caesarean section	4
Total abdominal hysterectomy	2
Total	**100**

The size of the fistulae, varied from small to extensive

Size of fistula for two groups

Size of fistula	**No. of patients**
Small	25
Medium	50
Large	20
Extensive	5
Total	**100**

- **With the modified method:**

Total cost of **45-70 USD** per patient

Hospital stay of up to **30 days**

- **With the usual method:**

Total cost of **60-300 USD** per patient

Hospital stay of up to **10 months**

RESULTS

MODIFIED METHOD:

100 patients

Success rate **92%**

Unsuccessful **8%**

Mortality rate of **0%.**

USUAL METHOD:

100 patients

Success rate **90%**

Unsuccessful **9%**

Mortality rate of **1%.**

Cause of post-op mortality : uraemia
both ureters were tied during VVF repair

CONCLUSION (I)

The proposed modified management of vesico and /or recto-vaginal fistula:

- Prevents the woman from becoming an outcast in her society and her family.

- Prevents her from progressive downgrading medically, socially and mentally.

CONCLUSION (II)

- This management has equal success rate of closure as the usual method.

HOWEVER, IT IS MORE:

-Simple, fast, safe, effective, easy to learn, cheap

-Reduces hospital stay

-Can be applied under primitive conditions

- This is exactly what is needed in developing countries with a high annual incidence of fistula patients**!**

Thank You