

## Acquired Gynaetresia in Pregnancy: Successful Delivery and Vaginoplasty

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### Abstract

A case of successful abdominal delivery and subsequent vaginoplasty for an acquired gynaetresia, following attempted abortion of the index pregnancy at a gestational age of 6 weeks is reported. The futile attempt at terminating the pregnancy was by insertion of a caustic herbal pessary into the vagina. She presented in labour with acquired gynaetresia, was delivered by emergency caesarean section and had antegrade digital dilatation of both the cervix and vagina at surgery. She however developed haematometra subsequently, which was successfully managed by adhesiolysis and drainage. The incidence of this complication from unsuccessful, or successful, attempts at pregnancy termination is unknown.

**Key Words:** Acquired Gynaetresia, Caustic Pessaries, Vaginoplasty, Abortion [Trop J Obstet Gynaecol, 2006, 23:189-190]

### Introduction

Chemical vaginitis resulting from insertion of caustic pessaries is a major cause of gynaetresia in the tropics<sup>1</sup> and acquired gynaetresia is a serious disability in a young woman<sup>2</sup>. The vagina is regarded as a useful receptacle by traditional medical practitioners for various noxious concoctions. Substances used and indications vary<sup>2</sup>.

We report a case of a teenager who presented in labour with acquired gynaetresia following a futile attempt at terminating a pregnancy by insertion of locally-concocted caustic materials into the vagina.

She was delivered by emergency caesarean section and also had antegrade digital dilatation of both the cervix and vagina, during the surgery. The patient however developed haematometra subsequently.

### Case Report

Miss Y.R was an 18 year old, unbooked primigravida, who was referred on account of a 9-hour history of labour pains at 37 weeks' gestational age and an occluded vaginal introitus. She had attempted to procure an abortion of the index pregnancy at about a gestational age of 6 weeks by inserting some herbal concoctions into the vagina. The pessary was removed after three days, when she developed severe vaginal pain with an associated purulent discharge.

Physical examination at the time of presentation revealed a young woman in distress from labour pains. Her vital signs were normal. There was a singleton fetus, in longitudinal lie, cephalic presentation and the fetal heart rate was 148 beats per minute. She had 4 uterine contractions in 10 minutes, each lasting an average of 40 seconds. The vulva was normal, but the vaginal opening was stenotic and barely admitted the tip of the small finger. She subsequently had emergency lower segment caesarean section and was

delivered of a live male infant, weighing 2.5Kg. Apgar scores were 8 and 9 at 1-minute and 5-minutes respectively. Antegrade digital dilatation of the cervix and vagina were done intra-operatively till the introitus could admit two fingers. Post caesarean period was uneventful and she was discharged home on the 7<sup>th</sup> post-operative day with 5 weeks postnatal clinic appointment and advised to do serial gradual dilatation of the vagina with an improvised mould.

She was seen 5 weeks later at the clinic with complaints of intermittent low abdominal pain and progressive low abdominal swelling of 5 days duration. Examination revealed an abdomino-pelvic mass compatible with a 20-week gestation and a pin-hole introitus. An assessment of haematometra was made. Pelvic ultrasonography confirmed the diagnosis and she was counselled for drainage of the blood collection and vaginoplasty.

At surgery, done by a combined team of gynaecologists and plastic surgeons, a probe was inserted through the tiny introitus (Figure 1) as a guide and dissection was done around it till the cervix was visualised. This was followed by graduated dilatation and dissection, which widened the vaginal capacity laterally. The strictured part of the vagina was carefully excised and the lower end of the vaginal defect anastomosed to the mucocutaneous junction with simple suturing, using vicryl 2/0 suture (Figure 2). About 500ml of thick chocolate-coloured collection was drained. Sofratulle® dressings was moulded and inserted into the vagina, which by then admitted two fingers. This was changed daily until

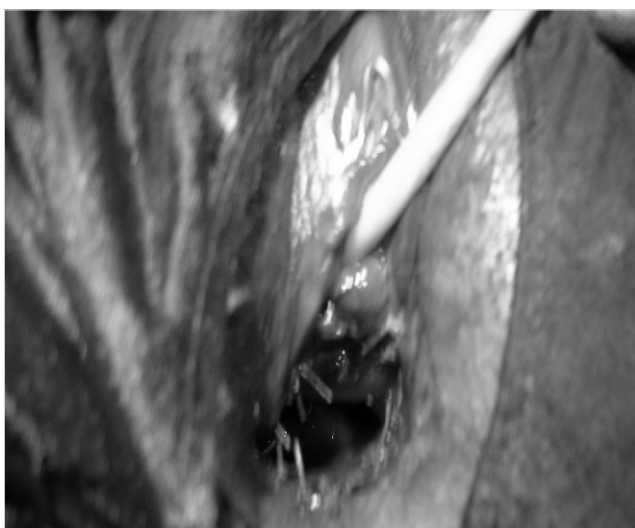
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the patient was discharged. Antibiotics and analgesics were also administered to the patient. She was instructed on the use of a set of graduated vaginal dilators and was discharged on the 7<sup>th</sup> post-operative day after careful vaginal examination to breakdown adhesions that had formed between the vaginal walls. She was given a 2-week clinic appointment. She had since made two follow-up clinic visits with satisfactory progress.

Figure 1



Figure 2



## Discussion

The prevalence of acquired gynaetresia in Nigeria is 7 - 8.5/1000 and the peak incidence is among those aged 20 - 30 years<sup>2,3</sup>. The most common causes are chemical vaginitis, secondary to insertion of locally prepared herbal pessaries, and circumcision<sup>3</sup>. In Southern Nigeria, certain pessaries containing leaves are used; the base of these pessaries is home-made soaps concocted from crude potash in palm oil. It is the highly alkaline vehicle rather than the herbal components that causes damage to the vaginal wall<sup>2</sup>.

In this patient, pregnancy continued above an acquired vaginal stenosis and she presented in obstructed labour for which she had an emergency caesarean section and digital dilatation of the vaginal to allow lochial drainage. She however developed haematometra towards the end of the puerperium because she did not adhere to the instructions given at the time of hospital discharge to dilate the vagina.

Vaginoplasty for acquired gynaetresia is technically more difficult than the correction of congenital defects because of dense fibrosis and the distortion of the normal anatomical relationships in the area<sup>1</sup>. The outcome from reports at Ibadan showed 68% successful repair, 28% residual/partial stenosis, 4% complete stenosis, while 6% were lost to follow-up<sup>4</sup>.

Acquired gynaetrasia following insertion of caustic pessaries is common in developing countries, but the incidence following attempts to terminate unwanted pregnancies is unknown, especially with pregnancy progressing to term and delivery, as was the case in the patient presented. A long term follow-up of this patient is intended. As the large proportion of cases of acquired gynaetresia were preventable, improvement in health education should further reduce incidence of this condition in our community.

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