VAGINAL HYSTERECTOMY AND PELVIC FLOOR REPAIR FOR THIRD DEGREE UTEROVAGINAL PROLAPSE COEXISTING WITH UTERINE LEIOMYOMA: A CASE REPORT

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ABSTRACT:

Genital prolapse occurs when the ligamentous and muscular supports of the uterus weaken from repeated or difficult vaginal births, reduced oestrogen secretion from the ovaries after menopause or a myriad of conditions that increase intrabdominal pressure.

It may coexist with uterine fibroids which are common benign tumours of the uterus. Where the fibroids are large enough, the surgeon must make a choice on whether the abdominal or vaginal approach is appropriate for definitive surgical management.

We present a case report in which we opted for a vaginal approach to perform a hysterectomy for a symptomatic uterine fibroid in a 45-year-old woman with a completed family size and coexisting pathologies of a third degree uterovaginal prolapse and a rectocele with the aim of highlighting the challenges of managing such a clinical scenario.

CASE:

A case of a third degree uterovaginal prolapse and a rectocele coexisting with a symptomatic 16-week leiomyoma in a 45-year-old grand multiparous woman is reported. A vaginal hysterectomy with repair of rectocele and the pelvic floor resulted in a satisfactory outcome.

Keywords:

uterovaginal prolapse, uterine fibroids, vaginal hysterectomy

INTRODUCTION

Uterine fibroids are the commonest benign tumours of the smooth muscle of the uterus among women of reproductive age .They arise as overgrowths of smooth muscle and connective tissue in the uterus and have been estimated to have an incidence of greater than 70% by the age of 50.(1)

They are among the commonest reasons for gynaecological consultations in Nigerian tertiary health facilities accounting for between 10-20% of gynaecological admissions in Teaching hospitals in Ilorin and Nnewi .(2,3)

Uterine fibroids are the commonest indication for total abdominal hysterectomy(TAH) at the Jos University Teaching Hospital(JUTH)

accounting for 89.5% of indications for TAH. (4)

Fibroids can present as pelvic masses and affect similar demographics of women who can be both in the reproductive age and may have had obstetric risk factors that predispose to uterovaginal prolapse. Submucous fibroids are more likely to be associated with genital prolapse when they chronically protrude from the endocervical canal and thus weaken the cardinal and utero-sacral ligaments and present as uterine inversion.(5) Access for vaginal hysterectomy accompanied with or without a myomectomy through the vaginal route with prolapsed submucous fibroids but when intramural or subserous fibroids accompany a genital prolapse, the enlarged uterus might be considered a relative contraindication because of anticipate difficulties in delivering the uterus vaginally with a uterine size of 12 weeks or uterine weight of 250g-300g considered safe to remove vaginally if the uterus is sufficiently mobile. (6,7)

We report a case of third-degree utero-vaginal prolapse with intramural uterine fibroids in which a total vaginal hysterectomy was performed.

CASE REPORT

Mrs A.F was a 45-year-old Para 5+0 woman who presented with a 3-year history of genital prolapse that was noticed after her last delivery 3 years before presentation. There was no associated menorrhagia, but she had a sense of supra pubic fullness. There was no constipation but no urge or stress incontinence. There were no symptoms of sexual dysfunction. She had no cough. She was diagnosed HIV positive and was on Highly Active Antiretoviral Therapy for 14years and antihypertensives for 3 months A pelvic examination showed that the cervix had prolapsed 3 cm beyond the introitus and there was a rectocele. There was no apical compartment descent.

A bimanual examination showed an enlarged uterus about 14 weeks size. The rest of the clinical examinations were unremarkable.

An abdominopelvic ultrasonography confirmed multiple intramural fibroids with the largest measuring 5.3 by 6cm.

PCV was 35%, Eu Cr was normal, and urinalysis was negative for sugar and protein.

A vaginal hysterectomy, pelvic floor repair and rectocele repair was performed with preservation of the ovaries. The uterus weighed 289g. Her post operative period was uneventful, and she was discharged after 48hours. Her follow up was uneventful.

Informed consent was obtained to photograph the uterine specimen and permission for use of her case for publication was given.

Histological report confirmed uterine fibroids

with essentially normal cervix.

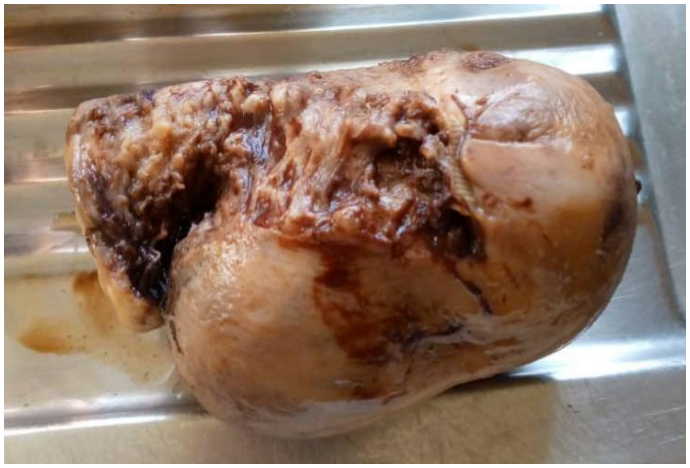

Figure 1: Specimen of removed uterus

Figure 2: Cut section of uterus showing intramural fibroids

DISCUSSION

Genital prolapse refers to the herniation of pelvic organs to or beyond the vaginal walls. It is a condition that causes symptoms that affect a female's daily activities and sexuality. It has may risk factors but occurs when there is loss of pelvic support for the uterus. It is referred to by many other names such as pelvic organ prolapse (POP),Uterovaginal or vaginal prolapse.(8) The aetiological factors that predisposed this patient to genital prolapse are the grandmaternity with the repeated vaginal births weakening the pelvic floor muscles and the uterosacral-cardinal ligament complex. It is likely that the prolapse predated the last childbirth that made her notice the genital prolapse but the degree of prolapse worsened after her delivery.

The incidence of genital prolapse in Nigerian women has been variously reported in several studies which are mainly hospital based and differs with the study locations. It accounts for 1.4% of gynaecological admissions in Usman Dan Fodio University Teaching Hospital Sokoto. (9) while in Nnewi it accounted for 1.58% of gynaecological admissions in a year. (10)

Occasionally symptomatic uterine fibroids may coexist with a genital prolapse and require a surgical management strategy that effectively treats both conditions satisfactorily. In the case presented, the patient had intramural uterine fibroids (See figure 2) with a third uterovaginal prolapse as determined by the Pelvic Organ Prolapse Quantification (POPQ).(8) This required delivery of the fibroid uterus via a posterior colpotomy.

There are reported cases where a submucous pedunculated fibroid presents along with a protruding elongated cervix necessitating a vaginal myomectomy or transvaginal morcellation of the fibroid before a vaginal hysterectomy.(11) (5,12). Generally, the options of choosing the vaginal route for a hysterectomy for benign uterine conditions are favoured but the exposure of gynaecologists in training to acquire the skills to perform vaginal hysterectomies is decreasing. Reporting over a 3-year period (2002-2005), Ocheke et al found that of the 94 hysterectomies performed for benign gynaecological conditions, only 10% were vaginal hysterectomies and all of these were performed by consultants.(13) Similarly ,in Nnewi ,a 10 year review of 1,370 surgeries found that 224 were hysterectomies and only 47 (21%) were vaginal hysterectomies. (14) While only 1:9 hysterectomies were vaginal in Ibadan where an audit of hysterectomies between 1995-2004 was carried out.(15)

The advantages of vaginal hysterectomy over the abdominal route include less post operative morbidity and pain, reduced hospital stay and the absence of abdominal scars. However as the uterine sizes increase, the risk for complications for vaginal hysterectomy may occur if the surgeon is not proficient.(8) In well selected cases, comparative studies have shown that a vaginal hysterectomy may be safely performed for indications other than genital prolapse or with coexisting benign conditions such as the presented case.

Comparing operative outcomes between uteri < 12 weeks and > 12 weeks size in 241 consecutive vaginal hysterectomies in patients with benign uterine disease, Sahin found no significant intra or post operative complications or conversion to laparotomy.(16)

The take home lessons from the presented case are that careful case selection, good training and surgical technique allow the removal of enlarged fibroid uteri in patients with a coexisting genital prolapse.

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