

Case Report

HUGE SYMPTOMATIC UTERINE FIBROID COEXISTING WITH PREGNANCY IN A PRIMIGRAVIDA – SUCCESSFUL INEVITABLE CAESAREAN MYOMECTIONY IN A PRIVATE HOSPITAL: A CASE REPORT.

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Abstract

Background: Caesarean myomectomy is traditionally discouraged, and very controversial because of the significantly increased risk of haemorrhage and postoperative morbidity of myomectomy from the increased vascularity of the gravid uterus. However, some reports have shown that myomectomy during Caesarean delivery can be safe.

Case presentation: Successful urgent inevitable Caesarean myomectomy of huge symptomatic myomas in a primigravida at 33 weeks and 6 days' gestation after she had been previously booked for scheduled Caesarean delivery at 34 weeks' gestation for severe respiratory distress/embarrassment due to huge uterine fibroid co-existing with pregnancy.

Discussion: Though Caesarean myomectomy ought to and should still be handled with caution, there is increasing evidence of its safety especially in well-selected cases and in experienced hands. It is heartening that elective Caesarean myomectomy can be performed safely in resource poor environment like ours where the need is more using low technology techniques.

Conclusion: Removal of symptomatic uterine fibroids during Caesarean delivery should be embarked on where the necessary skill is available especially where it can interfere with uterine closure at surgery, cause uterine atony and predispose to post-partum haemorrhage. It also decreases the complications associated with uterine fibroids in subsequent pregnancies.

Keywords: Caesarean myomectomy, huge myoma, post-partum haemorrhage.

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INTRODUCTION

Uterine fibroids, also known as Leiomyoma uteri are the most common pelvic tumour of females especially among the Negros^{1,2,3}. Leiomyoma complicating pregnancy is a common presentation to obstetricians practicing in Africa. A prevalence of leiomyoma during pregnancy has been reported to be 0.3–3%^{4,5,6,7}. In spite of the fact that myomas

can cause numerous complications during pregnancy like red degeneration, increased frequency of spontaneous abortion, preterm labour, premature rupture of foetal membranes, antepartum haemorrhage, mal-presentation obstructed labour, increased Caesarean section rate and post-partum hemorrhage^{4,8,9}.

Surgical removal of myomas during Caesarean section is traditionally discouraged and very controversial because of the significantly increased risk of haemorrhage and postoperative morbidity of myomectomy from the increased vascularity of the gravid uterus. Despite these controversies and fears, some reports have shown that myomectomy during Caesarean delivery can be safe. We present a case report of a successful urgent Caesarean myomectomy done for huge multiple myomas of various sizes on our patient at 33 weeks and 6 days' gestational age^{8,10,11,12,13,14,15,16}.

CASE PRESENTATION

A 27-year-old booked primigravida. She was referred to our facility at 21 weeks and 6 days' gestational age with history of co-existing uterine fibroids and peptic ulcer disease. She was admitted in another private hospital at 16 weeks' gestational age for lower abdominal pain. She had menorrhagia but had not had blood transfusion before.

Examination at booking revealed a young woman that was not in distress, she was afebrile, pale, anicteric, not dehydrated and no pedal oedema. Respiratory rate was 22 cycles per minute, lung fields were clinically clear; pulse was 88/min, regular and full volume; blood pressure was 100/60 mmHg. The abdomen was gravidly enlarged with irregular contour lines. There was tenderness around the contour lines. The liver and spleen were not palpably enlarged and the kidneys were not ballotable. The symphysio-fundal height (SFH) was 41 cm corresponding to 41 weeks gestation and much larger than her gestational age of 21 weeks and 6 days. The outline was irregular and nodular. The foetal heart tone was heard with a hand-held foetal Doppler device and was regular.

Packed cell volume (PCV) was 27%, Haemoglobin genotype – AA, Blood group – A Rh 'D' positive. Her retroviral, HBsAg, HCV antibodies and VDRL tests were negative. Urinalysis was normal. Obstetric ultrasound scan revealed a single viable foetus at 22 weeks' gestation, oblique lie with the placenta being mid-uterine and anterior. The liquor volume was adequate for gestational age. There

were multiple solid intramural masses. The largest, subserous and fundal measuring 30 cm x 22 cm and another one in the postero-fundal region measured 10 cm x 8 cm. Both showed no degeneration. The mid-anterior and posterior regions harboured myomas measuring 6 cm x 8 cm and 5 cm x 7 cm respectively with degeneration. There were also tiny myomas. The adnexa and pouch of Douglas were free.

She was placed on high dose haematinics, she received 2 doses of tetanus toxoid at 22 weeks' and 26 weeks' gestation respectively and monthly intermittent preventive therapy (IPT) for malaria.

For the moderate generalized abdominal pains and mild uterine contractions, she occasionally had, she was placed on oral dydrogesterone (duphastone) 10 mg twice daily, analgesics, intermittent tocolytics and anti-peptic ulcer medications as she occasionally had acute exacerbations of peptic ulcer disease.

She had multiple hospital admissions due to pains, abdominal tightness and respiratory difficulty caused by the pressure effect of the huge uterine fibroids on her abdomen and chest.

At 28 weeks' gestation, the SFH was 50 cm. She was given intramuscular Dexamethasone and she was encouraged to continue her oral duphastone till delivery. PCV at 28 weeks' gestation was 30%. Urinalysis remained normal.

She was counselled and planned for Caesarean delivery at 34 weeks' gestational age. At 33 weeks and 6 days' gestation, she presented to the emergency unit with complaints of severe generalized abdominal pain, difficulty in breathing and reduced perception of foetal movement. She was examined, stabilised with analgesic, intravenous fluid and oxygen. She was nursed on the left lateral position and counselled for urgent Caesarean myomectomy same day. SFH at this time was 59 cm. PCV was 33%. Four units of blood were grouped and cross-matched. Theatre was prepared, Anaesthetist and Paediatrician were informed. Written informed consent was obtained for surgery.

Intra-operation findings were mild pelvic adhesions, poorly formed lower uterine segment, live female pre-term neonate with cord tied round the neck three times. APGAR scores 7, 8 and 10 at 1st, 5th and 10th minute respectively. Birth weight was 2.1 kg, placenta was antero-fundal and weighed 0.4 kg. Huge and multiple uterine myomas, with the biggest being fundal and subserous measuring 36 cm x 28 cm. There were also anterior and posterior mid-uterine intramural and submucous myomas, diameter ranged between 1 cm and 12 cm. Total of 15 myomas which collectively weighed about 9kg. The ovaries and fallopian tubes were grossly normal. The omentum was matted to the fundal myoma.

Longitudinal mid line suprapubic incision with Supra umbilical extension up to 12 cm above the umbilicus was used. A crescentic incision was made on the poorly formed lower uterine segment. Baby was delivered cephalad; intravenous oxytocin 10 IU was administered by the anaesthetist and placenta was delivered by cord traction. Uterus was quickly exteriorised (Figure 1). Haemostasis was secured with the use of size 20 Foleys catheter tied around the cervico-isthmic junction. When the bulky fibroid uterus was lifted away from her chest and abdomen her oxygen concentration rose from 97% to 100% which strengthened the need to proceed to myomectomy. The myomas grossly visible were all enucleated and the uterus closed in layers. The tourniquet was removed and haemostasis ensured. Peritoneal lavage was done and abdominal drain was put in place. The abdomen was also closed in layers. Estimated blood loss was

1.6 litres. She had two units of whole blood intra-operation and one unit post-operation. Immediate post-operative condition was satisfactory.

She was placed on 1 litre of intravenous fluid 8-hourly for 24 hours with oxytocin 40 IU added to the first two litres. Misoprostol 600 microgram was also administered per rectum. Intravenous antibiotics and analgesics were given for 72 hours and then converted to oral form. Subcutaneous low molecular weight heparin (Clexane) 40 mg was given for 5 days. Post-operatively, The SPO₂ on room air ranged between 98 – 100%. Post-operative PCV was 28%.

The baby (Figure 2) was immediately taken to the special care baby unit for proper evaluation and possible admission for prematurity. She was discharged after two weeks on admission. The mother was discharged after 8th day post operation. Both mother and baby were in good clinical condition. Histology report of the fibroids confirmed uterine leiomyoma.

At six weeks post-partum, her PCV was 30%. She opted for subdermal implant with Jadelle as a form of contraceptive. She also had Papanicolaou smear done which was normal. There was no complaint from mother and baby as at the time of writing up the case.



Figure 1: During surgery.



Figure 2: The baby and the fibroids.

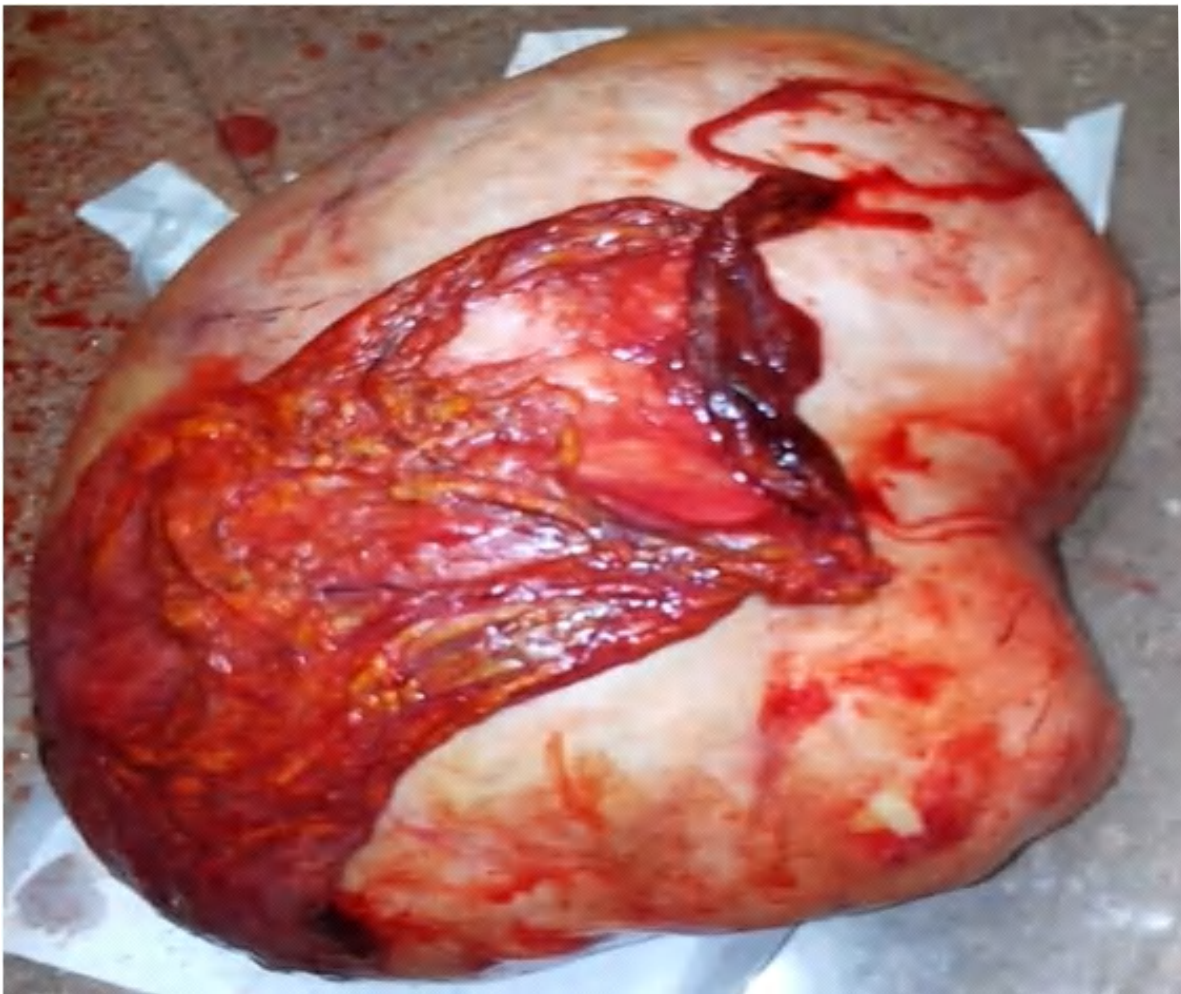


Figure 3: The largest of the fibroids.

DISCUSSION

Doing a Caesarean myomectomy is traditionally discouraged because of the risk of haemorrhage¹⁰, but a number of authorities have found Caesarean myomectomy to be safe in well selected and prepared cases and in experienced hands^{18,12,13,14,15}. Since leiomyoma is prevalent in Africa with resource poor countries and the women because of the Negroid ancestry of most of them are bound to have myoma coexisting and complicating some of their pregnancies. Leiomyoma in pregnancy is, therefore, bound to be encountered by obstetricians practicing in Africa and other places populated by the Negroes. Against this background, obstetricians practicing in these areas are naturally going to be continuously facing the dilemma of whether to carry out Caesarean myomectomies in their pregnant patients with co-existing fibroids or not. Myomas are found more commonly in

primigravidae of advanced age just like our patient who is of black race, a primigravida but she was 27 years of age.

Traditionally, the management of fibroids in pregnancy is conservative but sometimes myomectomy may be necessary when complications occur. Some authors are of the opinion that all uterine fibroids along the way of incisions should be routinely removed should Caesarean section be the mode of delivery.

In our case, we did urgent Caesarean myomectomy, successfully removing sub-serous, intramural and submucous myomas. With those that were anteriorly and posteriorly located.

Myomectomy is a very bloody operation especially if done on a gravid uterus and haemostasis not given adequate attention. Combining high dose oxytocin, Foley's catheter tourniquet applied to the

base of the uterus and use of misoprostol as we did will successfully help in reduction of blood loss as also reported by other authors^{1,3,17,18}.

One of the most feared complications of Caesarean myomectomy is haemorrhage. Many workers had however not found significant difference in blood loss between Caesarean sections alone and Caesarean section with concomitant myomectomy^{1,10,18}.

Though Caesarean myomectomy ought to and should still be handled with caution, there is increasing evidence of its safety especially in well-selected cases and in experienced hands. It is heartening that elective Caesarean myomectomy can be performed safely in resource poor environment like ours where the need is more using low technology techniques. Most of our women fear surgeries until it becomes inevitable. Anaesthesia and surgeries are still not as safe in our area of practice as is found in other more developed climes. These coupled with poverty and lack of social security make the option of Caesarean myomectomy desirable in our environment if it can be proven to be safe^{19,20,21,22}.

CONCLUSION

Leiomyomas including the huge ones can be safely removed during Caesarean section. These huge ones, if left in situ during Caesarean section are capable of preventing adequate uterine closure if along the line of incision. They can also cause uterine atony, post-partum haemorrhage and uterine subinvolution²⁰. Additionally, removal of symptomatic uterine fibroids decreases the complications associated with uterine fibroids in subsequent pregnancies²². The scar integrity following Caesarean myomectomy also has been shown to be better than following interval myomectomy when assessed²³.

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