

Case Report

Parasitic abdominal wall leiomyoma after open myomectomy

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Summary

Parasitic abdominal wall leiomyoma (AWL) is a rare event after myomectomy. In the literature, this occurrence was reported after a laparoscopic approach with an incidence of less than 1%. The present authors report an unusual case of parasitic AWL after open myomectomy in a 46-year-old woman. Also during a laparotomy, where fibroids are usually removed intact, particular care is mandatory to avoid myoma fragments in the surgical scar. Furthermore, differential diagnosis of an abdominal wall neoformation after laparotomy for fibroid removal should include the occurrence of a parasitic myoma.

Key words: Open myomectomy; Parasitic myoma; Abdominal wall leiomyoma.

Introduction

Uterine myomatosis is a widespread disorder that affects 20% of reproductive age women [1]. Usually, when a leiomyoma is symptomatic for considerable size or heavy vaginal bleeding, surgical removal is required [2]. Myomectomy may be performed with a laparoscopic and laparotomic approach. A rare complication of this surgical procedure is represented by the possibility of leaving fragments of myoma after its removal [3]. These particles can be implanted in the abdominal cavity or in other anatomical sites and grow until they reach considerable size.

Post-operative abdominal wall leiomyoma (AWL) is a rare anatomical localization after surgery. In the literature, this occurrence is reported to occur more with laparoscopic approach and several published case reports prove it [4, 5]. It is likely that myoma morcellation during laparoscopy increases the risk of spreading fibroid remnants [6]. The present report shows an unusual case of parasitic AWL after open myomectomy which may reveal some teaching points.

Case Report

A 46-year-old woman came to the authors' attention for menorrhagia, anemia, and for the presence of a mildly painful abdominal wall neoformation (AWN) of about 3 cm near a previous laparotomic scar. The patient had undergone laparotomic myomectomy five years earlier. Her personal clinical history was unremarkable. Transvaginal and transabdominal ultrasound were performed. Transvaginal sonographic evaluation revealed an enlarged uterus due to the presence of severe uterine fibromatosis. Conversely, the adnexa were regular bilaterally. The AWN was evaluated with transabdominal ultrasonography, and appeared as a hypoechoic structural lesion with sharp margins and modest pe-

ripheral vascularization. The AWN was sliding, hard, and slightly painful. A laparohysterectomy with prophylactic bilateral salpingectomy, and removal of the AWN were decided with the consent of the patient. Vaginal cytology and endometrial biopsy were negative.

During the abdominal wall opening, a well-circumscribed AWN of about 3 cm in diameter was identified at the level of the anterior rectus sheath (Figure 1). It was easily removed from the muscle fascia. Subsequently, as planned, a laparohysterectomy with bilateral salpingectomy was performed. Histological examination of the AWN showed a leiomyoma. Post-operative course was unremarkable and the woman was discharged three days after surgery. Four months later, a gynecological examination was performed with negative outcome.

Discussion

Up to 70% of women at the age of 50 may suffer from uterine fibromatosis [1]. Given these numbers, open myomectomy is the most widespread surgical procedure in the gynecological field [2]. Like any surgery, laparotomic myomectomy can have early and late complications. Early complications include bleeding, infection, and pyrexia; long-term post-operative complications are represented by adhesions [2]. A more rare complication of a myomectomy is represented by post-operative parasitic myomas [3]. In the latter case, during myomectomy fragments of myoma that are left unintentionally in abdominal cavity can implant in the healthy tissue. These initial small fragments can reach considerable size and become symptomatic causing pain, pelvic pressure, and dyspareunia depending on the anatomical location [3].

One of the rare localizations is represented by the abdominal wall. In the literature, this occurrence has been reported several times following a laparoscopic myomectomy [4, 5].

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Figure 1. — Leiomyoma of the anterior rectus sheath (arrow).

The most plausible hypothesis is that during myoma morcellation, it is easy for small myoma particles to be unidentified and left most frequently in the abdominal cavity or at the level of the trocar entry [6]. The overall incidence of parasitic myomas after laparoscopic morcellation is 0.12-0.95% [6]. Conversely, there are no reports in the literature that showed a parasitic AWL after an open myomectomy. In the latter case, usually, fibroids are removed intact with minimal risks of leaving myoma fragments in the abdominal wall.

In the present case, it is likely that, when myomectomy was performed, the considerable size of the myoma required the displacement of the uterus outside the abdominal wall. Subsequently, during fibroid removal, a myoma fragment may have been scattered on the rectus sheath. It is

likely that many gynecologists during a laparotomic myomectomy pay little attention to this occurrence because it is considered less frequent with an open approach.

Conclusion

The real teaching point of this case is that even during an open myomectomy, where fibroids are usually removed intact, care must be taken not to leave myoma fragments in other anatomic sites. Furthermore, it is to be kept in mind that when a large uterus is externalized to perform a myomectomy, the abdominal wall must be carefully inspected to rule out the presence of small myoma remnants. Finally, the differential diagnosis of an AWN after laparotomy for fibroid removal should provide the occurrence of a parasitic myoma.

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