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SCAR ENDOMETRIOSIS- A CASE REPORT

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ABSTRACT Scar endometriosis is presence of endometrial glands and stroma in surgical scars. This usually occurs following surgery on reproductive organs. Dislodgement of endometrial tissue and implantation at the scar site at the time of surgery provides a plausible explanation for occurrence of this pathology. We present a case of scar endometriosis in a laparotomy scar for ruptured ectopic pregnancy which presented after a caesarean section and might got activated under hormonal influence postpartum.

KEYWORDS : scar endometriosis, caesarean

Introduction

Endometriosis is defined as the presence of endometrial glands and stroma at sites outside the uterine endometrium[1]. It can be pelvic or extrapelvic, the former being more common. The common pelvic sites are ovaries, pouch of Douglas, peritoneum and rectosigmoid. Extrapelvic endometriosis is a rare condition[2]. Major sites for extrapelvic endometriosis include the lungs, pleura, kidneys, bladder, omentum, bowel, lymph nodes, and abdominal wall. Abdominal wall endometriosis is one of the most frequent extra pelvic locations, mostly occurring in old surgical scars after obstetrical and gynecological procedures. We report a case of scar endometriosis managed by surgical excision

Case report

A 30 year old woman came to the outpatient department with complaints of a painful peanut size lesion over lower abdominal wall since 2 weeks. She had undergone laparotomy for ruptured tubal ectopic 3 years back and lower segment caesarean section 3 weeks back for fetal distress. Examination revealed a lesion of around 2x2 cm at the centre of the laparotomy scar, bluish in colour which was firm and tender. Ultrasound showed a 1.9x1.8cm well-defined hypo-echoic lesion in the subcutaneous region just below the scar without any connection with the underlying muscles. Patient was offered medical management in the form of progestogens but it provided partial symptomatic relief and patient opted for surgical management. Wide local excision of the lesion was done under local anaesthesia, which was confined to the skin and subcutaneous tissue without involvement of the rectus sheath. Cut section showed solid grey white tissue. Histopathology of excised mass showed presence of endometrial glands and stroma with inflammatory changes in the dermis and diagnosis of scar endometriosis was confirmed.

Figure 1

Discussion

Scar endometriosis is presence of endometrial glands and stroma in the operative scar seen most commonly after surgical procedures on reproductive organs. Incidence of scar endometriosis following hysterotomy is 1.08%-2% whereas after caesarean section the incidence is 0.03%-0.4% [2]. The rising incidence of caesarean section and laparoscopy is also contributing to the rise in the number of scar endometriosis cases. Scar endometriosis has been reported after salpingostomy, sterilization, laparoscopy, amniocentesis, appendectomy, episiotomy, vaginal hysterectomies and hernia repair [3–5]. Various theories have been proposed to explain the pathogenesis of scar endometriosis of which the theory of direct mechanical implantation seems to provide the most plausible explanation for scar endometriosis. During caesarean section, endometrial tissue might be seeded into the wound, and under estrogen influence these cells proliferate, producing endometrioma[6]. However some cases of cutaneous endometriosis have been reported in patients without history of prior abdominal surgery at locations such as vulva, perineum, groin, umbilicus and extremities[7]. A possible explanation for this may be that endometrial cells may reach these locations via lymphatic or haematogenous routes and subsequently grow into an endometrioma. This may cause rare occurrence of abdominal wall endometrioma without any surgical intervention[8].

The presence of postoperative lesion and cyclic pain may raise the suspicion for the condition. Imaging techniques such as ultrasonography, computerized tomography and magnetic resonance imaging may aid in the diagnosis, however a definitive diagnosis can be established only after histopathology. The condition may be misdiagnosed as stitch granuloma, inguinal hernia, lipoma, abscess, cyst, incisional hernia, desmoid tumor, sarcoma, lymphoma, or primary and metastatic cancer.

Wide local excision with at least 1 cm margin is the treatment of choice for scar endometriosis. Excision of large and deep lesions might be difficult. Medical treatment with the use of progestogens, oral contraceptive pills, and danazol is not effective and gives only partial relief in symptoms and does not ablate the lesion. Use of gonadotrophin agonist (Leuprolide

Acetate) has shown to provide symptomatic relief. To prevent the occurrence of scar endometriosis it has been suggested that at the end of surgery especially on uterus and tubes, the abdominal wall wound should be cleaned thoroughly and irrigated vigorously with high jet solution before closure [9].

Conflicts of interest
None declared.
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