



Case Report

Primary Umbilical Endometriosis: A case report and management with review of literature

Dr Aashia Rumman¹, Dr Vaishali², Dr Anjali Dabral³

¹Senior Resident, Department of OBS and Gyane VMMC & Safdarjung hospital, New Delhi India

²Senior Resident, Department of OBS and Gyane VMMC & Safdarjung hospital, New Delhi India

³Director Professor and Unit Head, Department of OBS and Gyane VMMC & Safdarjung hospital, New Delhi India

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Corresponding Author:

Dr Aashia Rumman
Senior Resident

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ABSTRACT

Introduction-we report a case of primary umbilical endometriosis(UE) in the absence of any pelvic endometriosis with the aim to discuss the management of this rare entity.

Case presentation- A 35 years old female PIL1 who conceived after ovulation induction and delivered vaginally. She presented with complaints of cyclical bleeding from umbilicus and pain in the umbilical region during menstruation. Ultrasound and MRI showed a well defined lesion of 1.5x2 cm in the subcutaneous plane deep in umbilical region communicating with skin. Excision of umbilicus with deep seated endometriotic tissue followed laparotomy and umbilical reconstruction was performed. Histopathology examination confirmed the diagnosis of umbilical endometriosis. Neither signs nor symptoms have recurred after 6 months of follow up.

Discussion- UE can occur in the absence any previous surgical scar or typical signs symptoms of pelvic endometriosis in the women of reproductive age. In such scenario clinical diagnosis may be difficult and other differential diagnosis needs to be excluded specifically malignant cause, CEMRI abdomen and FNAC of lesion can be of great importance. Though the main stay of treatment is wide excision of the lesion with or without removal of the umbilicus followed by laparotomy/laparoscopic exploration of peritoneal cavity. Surgical radicalisation depends on size, extend, duration of symptoms and possibility of pelvic or peritoneal endometriosis.

Keywords: Umbilicus, Endometriosis, excision.

INTRODUCTION

Endometriosis is defined as presence of endometrial gland and stroma out side uterine cavity. Endometriosis was described by Simpson. It is a benign disease affecting 10-14 % of reproductive age group women. Pathology is not yet clear though various theories has been postulated. Clinical symptoms depends on site of disease, pelvic cavity being the most common. Pelvic sites are Ovaries, fallopian tubes, uterosacral ligaments , pouch of Douglas, pelvic peritoneum. Clinal features pelvic endometriosis is pelvic pain before during or after menstruation, dyspareunia, ,menorrhagia , bowel and or bladder symptoms, infertility. Extrapelvic sites can be GIT, diaphragm, lung, skin, eye ,brain, abdominal wall. Umbilical endometriosis is the commenest cutaneous site, still a rare occurrence with incidence of 0.5-1% among all cases of endometriosis. It can be subdivided into primary UE (villar's nodule) which develops spontaneously and secondary endometriosis following previous abdominal surgery. Secondary UE is more common and the incidence is increasing with increasing trend of laparoscopic surgeries.

CASE REPORT

A 35 years old presented to the Gynaecology OPD with history of cyclical umbilical pain , tenderness and bleeding from Umbilicus during menstruation since 2 years without any pelvic pain or any menstrual irregularities. Examination revealed no visible or palpable lesion or nodule. Patient was called to come during menstruation for examination , on examination there was visible bleeding from umbilicus but no obvious nodule or lesion found. MRI



Pic 1 - On examination no obvious lesion found. **Pic 2** – After excision entire lesion with normal skin rim.

suggested deep seated endometriosis sinus of 3x1.2 cm communicating with skin of umbilicus non communicable to peritoneal cavity. Complete omphalectomy giving circumferential incision excising all endometriotic tissue with adequate margin of 0.5 cm was done as the sinus was deep rooted in the umbilicus extending up to recuts sheath, Followed by laparotomy , findings were of grade 2 pelvic endometriosis. Umbilicus reconstruction was done to give good aesthetic result. Hisopathology confirmed endometriosis with adequate margin and follow up after 1 and 6 months 1 year confirmed no residual and recurrence respectively.

DISCUSSION

Primary umbilical endometriosis is rare extragenital endometriosis accounts for 30-40% of all cutaneous forms of endometriosis, develops spontaneously in the absence of any prior abdominal surgery. Though the exact pathogenesis remains unknown possible theories are embryonic remnant , spread of endometriosis from abdominal cavity via lymphatic or direct communication. Pathogenesis of secondary umbilical endometriosis is relatively easier to explain and develops due to iatrogenic seedling after abdominal surgery (more at laparoscopic port site).

Clinical presentation of UE are pain and tenderness in the umbilical region during menstruation only without any obvious mass or lesion as in case herein. Patient may come with complaint of bluish -purple tender mass or swelling or bleeding concomitantly with menstruation depending on the site size and communication with skin or peritoneal cavity of the endometriotic ectopic tissue. On reviewing the literature we found that majority of patient with UE don't present with history of pelvic endometriosis as in the case described here and they belong to reproductive age group age youngest patient reported is 23 years oldest 47years.

We want to emphasise that in patients with UE typical clinical picture and physical examination is the mainstay of diagnosis. Differential diagnosis of Umbilical nodule includes umbilical hernia, polyp, hemangioma, melanocytic nevus, granuloma, metastatic, seborrhoea , adenocarcinoma ,benign or malignant skin neoplasia. We evaluated the umbilical lesion with MRI to know the extend of sinus tract ,exact size and communication with peritoneal cavity. Ultrasonography has been found to be equally effective in evaluating UE, FNAC and Histopathological confirmation is not mandatory but can be used in cases with coexisting dermatological conditions or if in doubt.

Management of UE is not standardised because of the rarity of this condition. Medical treatment such as contraceptive pills and GnRH analogue are effective option in diminishing the symptoms temporarily however on cessation of hormonal suppression recurrence is common, so the definitive management remains surgery which can vary from diathermy for superficial lesion to radical omphalectomy with concomitant laparoscopic or laparotomy of abdomen. Radical approach allows us total excision of the umbilicus and repair of the underlying fascia and umbilical reconstruction ensuring less chances of recurrence . Local excision aiming to spare the umbilicus is another more conservative approach for small and superficial lesion. However the ultimate aim should be complete resection of endometriotic tissue and subsequent histopathological confirmation of disease and adequacy of safe margin. The use of laparotomy or laparoscopy allows the extent of the lesion , any peritoneal cavity connection, concomitant pelvic disease to be treated and adequate resection and accurate reconstruction.

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