A TUBO - OVARIAN ABSCESS CASE DRAINED AND TREATED VIA TRANSVAGINAL ULTRASOUND

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SUMMARY

Tubo-ovarian abscess is seen as a complication of PID cases who are inadequately treated or delayed in treatment. Recently minimal invasive techniques such as; ultrasound, CT or MRI guided drainage are suggested in the treatment of tubo-ovarian abscesses. The current report presents a patient with a tubo-ovarian abscess treated by drainage via transvaginal ultrasonography.

Key Words : Tubo-ovarian abscess, Transvaginal ultrasound

INTRODUCTION

Tubo-ovarian abscess (TOA) is one of the most important complications of PID. It is a threat to women in their reproductive years causing significant short and long term disability and infertility and occasionally can result in death. TOA is seen in 10-30% of patients with PID (1). Emergency surgery is widely accepted in cases with a ruptured abscess, but treatment of choice is debatable when the abscess has not been ruptured. Among the treatment modalities; surgery, conservative treatment with antibiotics or laparoscopy or ultrasound guided aspiration of the abscess are suggested (2). In this report a patient treated by aspiration of TOA via transvaginal ultrasound is presented.

CASE REPORT

A 26 year old G = 2, P = 2 patient presented to our clinic with the complaints of pelvic pain, vaginal discharge and fever. She was seen by a gynecologist a week ago who prescribed antibiotics (Chloramphenicol, Gentamycine), but the patient told that she did not benefit from that treatment. Her temperature was 37.6 C and her pelvic examination revealed cervical motion tenderness and painful and palpable adnexal regions. Rest of the physical examination was unremarkable. The erithrocyte sedimentation rate was 123 mm and leukocyte count was 11600 / mm^3. The transvaginal ultrasonography revealed hypoechogenic collections in both ovaries which were consistent with sonolucent abscess. The dimensions of the left ovary was 60x50x40 mm and the right ovary was 40 x 30 x 50 mm.

With these findings TOA diagnosis was confirmed and Cefuroksim (Cefatin, Roche, Istanbul) 2 x 1 gr i.v. and Doxycycline (Monodoks, Deva, Istanbul) 2 x 100 mg p.o. treatment was initiated to the patient. She responded to this antibiotic treatment and her temperature and leukocyte count became normal. Pelvic ultrasound was repeated on the 7th day of her antibiotic treatment. On ultrasound examination, right abscess was found to be dissolved and left abscess diminished in size with dimensions of 20 x 30 x 10 mm. Then, the left abscess was drained by the special needles that were used to aspirate oocyte via transvaginal ulltrasound. Approximately 20 cc pus was drained and the abscess cavity was irrigated with diluted betadine. Repeated ultrasound after the procedure was found to be normal and the patient was discharged with the advice to continue Doxycycline 2 x 100 mg p.o. for another week. In her control visits the pelvic and ultrasound examinations were unremarkable. Approximately 1 year later the patient came to our clinic with the similiar complaints. She had pelvic pain, vaginal discharge and pelvic examination revealed tender cervix and a mass in her left adnexal region. Ultrasound examination revealed sonoluscent abscess in the left ovary with dimensions of 40 x 30 x 50 mm. The patient was admitted to the hospital with a diagnosis of TOA and treated with Clindamycine (Cleocin, Eczacıbaşı, Istanbul) 4 x 600 mg i.v. and Gentamycine (Genta, İbrahim Etem, Istanbul) 3 x 80 mg i.v. The TOA was drained by transvaginal ultrasound On the 4th day of her antibiotic treatment dimensions of the ovary were diminished by half. The abscess cavity was irrigated with betadine. The parenteral antibiotic treatment was completed to a week and then she was discharged from the hospital with oral Doxycycline 2 x 1 for 10 days. Pelvic and ultrasound examinations in her control visits were unremarkable.

DISCUSSION

Treatment modality in patients with TOA after PID depends on the patient's general condition, age, desire of future fertility and abscess being ruptured or not. In most patients medical and surgical treatments are used together (3).

The patient may be treated with antibiotics alone when the abscess has not ruptured. While the specifics of antibiotic therapy are contraversial, there is consensus on the necessity for a parenteral, multiagent regime aimed at the anaerobe dominant, polymicrobial spectrum of potentially involved bacteria. The most commonly utilized combination is an aminoglycoside plus gentamycine.

Surgery is indicated as an initial step in the treatment of pelvic abscess when there is suspicion of rupture or uncertainity about the diagnosis. A ruptured pelvic abscess is a life threatening emergency that requires both aggressive medical therapy and urgent surgical intervention.

A new aproach in conservative treatment of nonruptured TOA is drainage of the abscess. There are many advantages of recent minimal invasive drainage techniques that are done with ultrasound, CT, MRI. The patients are saved from the risk of general anesthesia and tolerate the treatment better (4-6).

Ultrasound is the preferred method in patients who need drainage. Recently, there are reports of successful drainage of TOA cases via transvaginal ultrasound which is a real-time procedure (4). Transvaginal ultrasound is easier and more effective than transabdominal ultrasound, CT, MRI. Drainage with transvaginal ultrasound is done with mild sedation, general anesthesia is not required, so it is safer, and cost effective. In our patient abscess was drained transvaginally after a significant improvement was achieved by antibiotics and the patient was cured.

Recurrences are frequent in treatment of TOA cases. Also our patient had a recurrent abscess after a year and it is drained in the same way. So close follow up of the patients who are treated conservatively is very important.

As a conclusion, gynecologists should consider the drainage of an unruptured TOA via transvaginal ultrasound as an alternative treatment.

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