Adnexal Torsion in Second Trimester of Pregnancy

Lt Col Y Singh*, Lt Col A Shankar⁺, Surg Lt Cdr S Dutta[#], Col VRR Chari (Retd)**

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Introduction

Isolated adnexal torsion is a rare event and accounts for 2.7% of all gynaecological emergencies. The incidence of first trimester adnexal torsion in pregnancy is 1:5000 [1]. This condition is rare during late second trimester. The findings are non specific and the entity is difficult to diagnose pre-operatively [2]. We report a case of mid trimester adnexal torsion diagnosed during laparotomy done for suspected acute appendicitis.

Case Report

A 28 years old Gravida 2 Para 1 patient at 23 weeks of gestation was admitted as a case of acute right abdominal pain of 36 hours duration. Intermittent pain was localised and increasing on movements. She had nausea and vomiting after the onset of pain. There was no uterine contractility. There was no history of bleeding per vagina. Her first delivery was three years back (vaginal delivery). There was no significant past medical or surgical history. On clinical examination her temperature was 37 degree celsius, pulse 78/minute and blood pressure was 130/80 mmHg. Her chest was clear. Abdominal examination showed uterus of 22 weeks size gestation. Foetal heart sounds were present. There was marked tenderness around the Mcburney's point. There was rebound tenderness. Laboratory investigations showed haemoglobin of 11.8 gm% and total leucocyte count of 10,800/cmm with 76% polymorphs, 19% lymphocytes, 2% monocyte and 3% eosinophils. Urine routine examination was normal. Ultrasonography showed single live foetus at 23 weeks of gestation. Placenta was anterior and there was no retro placental clot. There was free fluid in the Pouch of Douglas. The patient was taken up for emergency laparotomy with a presumptive diagnosis of acute appendicitis. On laparotomy uterus was 22 weeks size, colour of uterus was normal. Fallopian tube and ovary of right side had undergone torsion (three twists) and appeared ischaemic (Fig. 1). Size of the ovary was normal. Appendix was healthy. Right side salpingo-oophorectomy and appendicectomy was done. Post operatively patient was given antibiotics and tocolytics for 48 hours. She made an uneventful recovery.

Discussion

Adnexal torsion is an uncommon cause of surgical emergency. It has been described as a complication of ovarian hyper stimulation syndrome (OHSS) and ovarian stimulation for IVF (In vitro fertilization) [3]. The enlarged hyperstimulated ovaries, floating in pelvic ascitis, may explain the association [4]. The condition commonly involves right side [5,6]. The condition is rare during second trimester and exceptional during the third trimester. Diagnosis of twisted adnexae is usually delayed because of inconsistent presentation and lack of clear cut signs. In this circumstances, adnexae often become infarcted and necrotic, leading to peritonitis. The use of colour doppler sonography shows the absence of intraparenchymal ovarian blood flow. However decreased flow should not rule out the suspicion of adnexal torsion. It depends on stage of torsion and degree of vascular compromise. It is known from the pathological findings that venous and lymphatic stasis occur early in torsion and arterial flow may be decreased

Fig. 1 : Ischaemic ovary

*Reader (Gynaecology and Obstetrics) & Maternal Foetal Medicine: AFMC, Pune-40. ⁺Graded Specialist (Anaesthesiology), [#]Graded Specialist (General Surgery), ^{**}Ex Senior Advisor (Anaesthesiology), 158 Base Hospital.

at this stage. Although laparoscopy has been described for diagnosis and treatment of adnexal torsion in early pregnancy, advanced gestation can present significant difficulties in the form of possible injury to the enlarged uterus, cardiovascular and respiratory alterations during the pneumoperitoneum and Trendelenburg position. Combination of magnetic resonance imaging (MRI) and doppler sonography helps in accurate diagnosis [7]. Traditionally, such complications during pregnancy have been managed by means of laparotomy either by unwinding of twisted adnexa or by adnexectomy depending upon the degree of ischemia and necrosis. Recently laparoscopy has been used in second and beginning of third trimester of pregnancy [8]. We performed unilateral adnexectomy due to delay in the diagnosis. Adnexal torsion as differential diagnosis of acute abdomen in pregnancy should be considered and we recommend early surgical treatment that will save the adnexa.

Conflicts of Interest

None identified

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