Journal of Family Medicine

Open Access

Austin Publishing Group

Case Report

Ovarian Torsion in 17-year-old Nulligravida with Polycystic Ovarian Disease

Himanshi Sathawane[1*]; Krutika Pannase[1]; Vaishnavi Ronghe[1]; Anushri Modak[1]; Archana Dhore[1]; Spandan Bansod[1]; Vaishnavi Kantode[2]; Abhas Nakhale[3]; Bali Thool[1]

[1]Department of Obstetrics and Gynaecological Nursing, Smt. Radhikabai Meghe Memorial College of Nursing, Datta Meghe Institute of Medical Sciences, India

[2]Department of Medical Surgical Nursing, Smt. Radhikabai Meghe Memorial College of Nursing, Datta Meghe Institute of Medical Sciences, India

[3]Department of Community Health Nursing, Smt. Radhikabai Meghe Memorial College of Nursing, Datta Meghe Institute of Medical Sciences, India

***Corresponding author: Himanshi Sathawane**
Department of Obstetrics and Gynaecological Nursing, Smt. Radhikabai Meghe Memorial College of Nursing, Datta Meghe Institute of Medical Sciences, India.

Received: February 14, 2023
Accepted: March 28, 2023
Published: April 04, 2023

Abstract

Ovarian torsion is defined as the complete or partial rotation of the adnexal supporting organ in the presence of ischemia. To maintain the health of the ovaries and fallopian tubes and prevent severe morbidity, early diagnosis is essential. Ovarian torsion emerges in 2 percent to 15 percent of patients who have a procedure of adnexal mass. Acute pelvic pain that suddenly starts is the most typical sign of ovarian torsion, followed by nausea and vomiting. Ultrasonography revealed that left ovary is enlarged measures 5.16×4.62×3.99cm volume 49.8ml with hemorrhagic cyst of size 4×3cm. The recovery of macroscopically nonviable ovaries is feasible with laparoscopic conservative management and ovary untwisting. To confirm the result, prolonged follow-up is necessary.

Keywords: Ovarian torsion; Adnexal; Morbidity; Hemorrhagic cyst; Conservative

Introduction

Ovarian Torsion (OT) a comparatively infrequent gynaecological emergency. Due to the non-specificity of the symptoms, overlapping differential diagnosis, and the non-specificity of most biochemical and radiological investigations, it is a diagnostic quandary, particularly in children [1]. A study of surgically treated ovarian masses in patients up to the age of 19 found that 2.3 percent were borderline and 5.3 percent were cancerous, with no reported cases of ovarian torsion in either group [2]. It has been observed to happen at any age with the highest occurrence in women between the ages of 20 and 30 [3]. Ovarian torsions might be a differential diagnosis for an acute surgical abdomen since they are often accompanied by a sudden onset of abdominal pain. Torsion is typically caused by twisting of the ligamentous support, resulting in venous congestion [4].

Patient and Observation

Patient Information

A 17yr old nulligravida presented to emergency department with the complaint of severe abdominal pain along with nausea since 5 days. She was developed pain in abdomen which was stabbing in nature and radiated to the back region and aggravated on walking and relieved on lying down. Patient is known case of polycystic ovarian disease since 2 years. She has history of frequent irregular menstrual cycle. She has history of cerebellar parenchymal space occupying lesion with peripheral edema in 2017.

Clinical Findings

Physical examination revealed pain in abdomen which was radiated to the back region and aggravated on walking and relieved on lying down.

Timeline of Current Episode

She presented with the complaint of pain in abdomen, nausea since 5 days.

Diagnostic Assessment

Blood investigations revealed low haemoglobin (9.8gm%), raised white blood cell count (15,700cell/cumm), Ultrasonography revealed that left ovary is enlarged measures

Citation: Sathawane H, Pannase K, Ronghe V, Modak A, Dhore A, et al. Ovarian Torsion in 17-year-old Nulligravida with Polycystic Ovarian Disease. J Fam Med. 2023; 10(1): 1326.

5.16×4.62×3.99cm volume 49.8ml with hemorrhagic cyst of size 4×3cm. Typical features of ovarian torsion.

Diagnosis

Blood investigation and ultrasonography confirmed the diagnosis of ovarian torsion.

Therapeutic Interventions

Patient was treated with an Antibiotic, antiemetic, Proton pump inhibitor.

Informed Consent

Parents of the patient gave signed, well-informed consent for the publication of this case report.

Discussion

The precise prevalence of adnexal torsion is uncertain. Despite the fact that torsion has been reported in all age groups, earlier studies have shown that torsion that develops without an adnexal mass happens at a young age, particularly before menarche [5]. The stomach pain is usually sudden and intermittent. The majority of reported patients presented for evaluation one or more days after the onset of pain, up to 210 days later because it was difficult for them to localize the pain, premenarchal patients frequently mentioned diffuse pain [6].

Torsion of the ovary on the right side is more typical. This is thought to be due to the position of caecum and ileum's mobility on the right-side [7]. Treatment for Ovarian torsion that involved detorsion and retention in the abdominal cavity preserved the ovaries' normal morphology and function, according to long term analysis of the treatment. Conservative surgical treatment was found to be safe [8]. Even in academic medical centres, around 30 percent of cases with ovarian torsion are not appropriately identified, according to comprehensive research on the subject [9]. The main issue with ovarian torsion is that the ovary cannot be saved, possibly requiring a salpingo-oophorectomy. This could have an impact on a woman's ability to conceive. Other side effects of torsion include atrophied ovaries or abnormal pelvic anatomy such as adhesions may cause infertility [10].

Conclusion

The diagnosis of ovarian torsion is nonspecific, as well as clinical presentation and the differential for pelvic pain is broad. However, immediate diagnosis and treatment are essential for positive clinical outcomes and ovary and/or fallopian tube preservation. The recovery of macroscopically nonviable ovaries is feasible with laparoscopic conservative management and ovary untwisting. To confirm the result, prolonged follow-up is necessary.

Author Statements

Competing Interests

There are no conflicting interests identified by the authors.

Authors' Contributions

The final paper has been reviewed and approved by all writers.

References

1. De Silva MHAD, Kolombage P, Kasthuri S. An ovarian torsion in a 2-year-old girl: a case report. J Med Case Reports. 2020; 14: 194.
2. Vicente AP, Gomes AS, Jokubkiene L, Sladkevicius P. Ovarian borderline tumor presenting as ovarian torsion in a 17-year-old patient: a case report. J Med Case Reports. 2021; 15: 7.
3. Baradwan S, Sendy W, Sendy S. Bilateral dermoid ovarian torsion in a young woman: a case report. J Med Case Reports. 2018; 12: 159.
4. Warwar RE, Schmidt GE. Bilateral ovarian torsion with ovarian fusion in the setting of polycystic ovarian syndrome: A case report. Case Rep Womens Health. 2019; 23: e00129.
5. Karaca SY, İleri A. Ovarian Torsion in Adolescents with and without ovarian mass: A Cross-sectional Study. J Pediatr Adolesc Gynecol. 2021; 34: 857–861.
6. Huang C, Hong M-K, Ding D-C. A review of ovary torsion. Tzu-Chi Med J. 2017; 29: 143–147.
7. Winton C, Yamoah K. Ovarian torsion and laparoscopy in the paediatric and adolescent population. BMJ Case Rep. 2020; 13: e232610.
8. Geimanaite L, Trainavicius K. Ovarian torsion in children: management and outcomes. J Pediatr Surg. 2013; 48: 1946–1953.
9. Sugi MD, Patel AG, Yi J, Patel MD. The Flipped Ovary Sign in Ovarian Torsion. J Ultrasound Med. 2021; 40: 839–843.
10. Guile SL, Mathai JK. Ovarian Torsion. In: StatPearls. Treasure Island (FL). Stat Pearls Publishing. 2022.