International Journal of Research and Reports in Gynaecology

5(2): 56-60, 2022; Article no.IJRRGY.78451

Hemorrhagic Ovarian Cyst: "A Case Report"

Anuj Gavankar [a*] and Jaya Gawai [a]

[a] Department of Mental Health Nursing, Smt. Radhikabai Meghe Memorial College of Nursing, Datta Meghe Institute of Medical Sciences (Deemed to be University), Sawangi (M), Wardha, Maharashtra, India.

Authors' contributions

This work was carried out in collaboration between both authors. Both authors read and approved the final manuscript.

Article Information

Open Peer Review History:
This journal follows the Advanced Open Peer Review policy. Identity of the Reviewers, Editor(s) and additional Reviewers, peer review comments, different versions of the manuscript, comments of the editors, etc are available here: https://www.sdiarticle5.com/review-history/78451

Case Study

Received 10 October 2021
Accepted 12 December 2021
Published 15 April 2022

ABSTRACT

A hemorrhagic cyst is a type of functioning cyst that arises when a cyst bleed. Abdominal discomfort on one side of the body is a symptom of this sort of cyst. A 36-year-old female from Dhanora Ta. Digras Dist. Yavatmal admitted in gynecology ward no. 17 in AVBRH on date 22/03/2021 with known case of hemorrhagic ovarian Cyst.

Symptoms: Nausea and vomiting, abdominal pain and fever.

Clinical Findings: CBC: Hb – 10.4gm%, Total RBC count: 3.87 million/ cu.mm, Total WBC count: 11400 cu.mm. In liver function test: Albumin – 2.1 gm/dl. Report of cytology examination: 31/03/2021, (Peritoneal wash cytology – Smear show only hemorrhagic material and a few leukocytes at place) **USG:** Urinary bladder: Very minimal distended with anehoic content. Uterus: The right ovary shows changes of hemorrhagic cysts with low level echoes & internal/ separation within the right ovary cystic lesion measure 12 x 10 x12 cm with volume of 780 cc.

Diagnosis: The patient was diagnosed with Right hemorrhagic ovarian cyst.

Therapeutic Intervention: Inj. Pantoprazole 40 mg OD, Tab. Tramadol 50 mg BD, Tab. Buscopan 10 mg BD, Tab. Emset 4 mg BD.

Etiology: Sexual intercourse causes pain, especially when it is deep. Pain in the lower abdomen or pelvis. It can be severe, abrupt, and harsh. Menstrual cycles that are irregular.

Conclusion: Clinical, laboratory, and USG characteristics of individuals with a hemorrhagic ovarian cyst can help gynecologists determine the best course of treatment, avoiding needless surgery.

**Corresponding author: E-mail: anujgavankar@gmail.com;*

Keywords: Ultrasonography; haemorrhagic; ovarian cyst; functioning cysts.

1. INTRODUCTION

A fluid-filled sac within the ovary is known as an ovarian cyst. The cases frequently have no symptoms. They can cause bloating, lower stomach discomfort, or lower back pain in certain people. The overwhelming majority of cysts are benign. Severe discomfort might result if the cyst bursts open or forces the ovary to rotate. As a result, the patient may vomit or feel dizzy and can potentially result in headaches [1-5].

Every month, the majority of women of reproductive age produce tiny cysts. Before menopause, around 8% of women have large cysts that cause problems. After menopause, around 16% of women have ovarian cysts, which are more likely to be cancerous if present.

Ovarian cysts affect women of all ages and are rather frequent. The boundless majority of ovarian cysts are really useful (i.e., They are a result of hormonal changes that occur during the menstrual cycle.). They might turn out to be bothersome, but they are not indicative of a specific disease condition. The majority of ovarian cysts are benign (noncancerous), and many of them go away on their own without treatment over time. While malignant cysts can occur in the presence of ovarian cancer, most ovarian cysts are not carcinogenic. Ovarian cysts are more frequent throughout a woman's reproductive years [6-8].

A hemorrhagic cyst is a kind of functioning cyst that arises when a cyst bleed. Abdominal discomfort on one side of the body is a symptom of this sort of cyst.

During ovulation, a Graafian follicle may instead of releasing an egg, the ovary continues to swell with fluid. Follicular cysts are the name for this type of cyst. The follicle may release the egg in certain situations, while the sac shuts and swells with fluid or blood in others. rather than disintegrating.

A rupture ovarian cyst is a mutual occurrence, with symptoms extending from none to symptoms that resemble an acute abdomen. There are a variety of sequelae. Every cycle, a follicular cyst ruptures in a woman's uterus, which might be asymptomatic or cause minor temporary pain (mittelschmerz) [9-11]. The rupture can be linked with severe discomfort in less common conditions. Intraperitoneal hemorrhage and mortality can occur in extremely rare conditions [12,13]. Clinicians who come into contact with patients who have probable cyst rupture in the acute environment have the most immediate concerns of ruling out ectopic pregnancy, ensuring sufficient pain management, and quickly assessing the patient to be evaluated to enable adequate triage due to hemodynamic instability [14,15]. Even though the majority of patients just need monitoring, nearly may require pain reliever for discomfort relief for diagnostic or hemostasis, and laparoscopy or laparotomy. The disease is most frequent in reproductive-aged women between the ages of 18 and 35.

While the cause of some bleeding linked when an ovarian cyst bursts is unknown, there are some known risk factors. Abdominal trauma and anticoagulant treatment are two examples.

The stromal cells surrounding a mature Graafian follicle become more vascular as a result of hormonal response, and after the oocyte is expelled, the Graafian follicle develops into a corpus luteum with a highly vascular and fragile granulosa layer, which ruptures easily, resulting in hemorrhagic ovarian cysts [16].

2. CASE PRESENTATION

2.1 Patient Information

A 36-year-old female from Dhanora Ta. Digras Dist. Yavatmal was admitted in gynecology ward no. 17 in AVBRH on date 22/03/2021 with known case of hemorrhagic ovarian cyst. She is 55 kg and her height is 160 cm.

2.2 Present Medical History

A female 36-year-old was brought to AVBRH on 22/03/2021 by her husband and she was admitted to gynecology ward no. 17, she is known case of right hemorrhagic ovarian cyst having complaints 15 days of abdominal discomfort, 2 days of fever, and 2 to 3 days of vomiting

2.3 Past Medical History

My patient was diagnosed to have haemorrhagic ovarian cyst and does not have any past history. There was no other significant history of history of hypertension, diabetes mellitus, epilepsy or

thyroid disorder or any other communicable disease.

2.4 Present Surgical History

My Patient has surgical history of Total Abdominal Hysterectomy (TAH) with bilateral salpingo – oophorectomy which was conducted on date 25/03/2021.

2.5 Past Surgical History

My patient has past surgical history of negative laparotomy on date 20/08/2017 with adenomyosis with B/L ovarian cyst. Uterus could not be removed due to adhesions.

2.6 Family History

There are three members in the family. My patient was diagnosed to have right hemorrhagic ovarian cyst. All other members of the family were not having complaints in their health except for my patient who was being admitted in the hospital.

2.7 Past Intervention and Outcome

My patient was diagnosed hemorrhagic ovarian cyst after undergoing USG abdomen and pelvis on date 15/03/2021 the results showed rupture of right-side ovarian cyst.

2.8 Etiology

Sexual intercourse causes pain, especially when it is deep. Pain in the lower abdomen or pelvis. This might be sporadic, or it can be severe, abrupt, and harsh. Menstrual cycles that are irregular. A sensation of heaviness or fullness in the lower abdomen or pelvis throughout the menstrual cycle, you may experience chronic pelvic discomfort or low back pain. Pelvic pain after strong activity or exercise. Urination or bowel movement pain or pressure, vomiting and nausea, vaginal discomfort or sporadic vaginal bleeding, infertility, having issues with bowel motions, experiencing tenderness, pressure to make a bowel movement in the abdomen, Distension of the abdomen, Distending, a feeling of ampleness in the stomach, Heartburn. Indigestion when you eat, you get full quickly, controlling urine is a problem for some people.

2.9 Physical Examination

There is not much deformity found in head-to-toe examination, Inspection of abdomen scar was found on previous laparotomy site, palpation not done because of pain, in spine tenderness was found in lower back with pain.

3. DIAGNOSTIC ASSESSMENT

CBC: Hb – 10.4gm%,

Total RBC count: 3.87 million/ cu. mm,

Total WBC count: 11400 cu.mm,

Total platelet count: 1.53 lacs/ cu.mm.

In liver function test: Total protein – 4.9 gm/dl, Albumin – 2.1 gm/dl.

4. CLINICAL FINDINGS

Report of cytology examination: 31/03/2021

- Peritoneal wash cytology – Smear show only hemorrhagic material and a few leukocytes at place
- No malignant cells seen

4.1 Ultra-Sonography of Abdomen and Pelvis

Liver: Normal in size and shape.

Gall bladder: Appears normal descendent.

CBD: Normal in course and caliber for the age of patient.

Kidneys: Normal in size and shape.

Spleen: Normal size (9.9 cm).

Urinary bladder: Very minimal distended with anehoic content.

Uterus: The right ovary shows changes of hemorrhagic cysts with low level echoes & internal/ separation within the right ovary cystic lesion measure 12 x 10 x12 cm with volume of 780 cc.

4.2 Therapeutic Intervention

Injection Pantoprazole 40 mg IV x OD, Tablet Tramadol 50 Orally mg x BD, Tablet Buscopan Orally 10 mg x BD, Tablet Orally 4 mg x BD.

5. DISCUSSION

A 36-year-old female from Dhanora Ta. Digras Dist. Yavatmal admitted in gynecology ward no.

17 in AVBRH on date 22/03/2021 with known case of hemorrhagic ovarian Cyst. She is 55 kg and her height is 160 cm. Having complaints of temperature for 2 days, aching in abdomen for 15 days, and vomiting since 2 to 3 days. As soon as she was admitted to hospital investigations were done and appropriate treatment was started. After getting treatment, she shows great improvement and the treatment was still going till my last date of care.

During routine clinical and sonographic examinations, haemorrhagic ovarian cysts are commonly seen. There are just a few publications in the literature that provide an appropriate and complete examination of Haemorrhagic ovarian cyst. They appear with a variety of clinical signs, extending from no warning sign to severe abdomen, haemorrhagic ovarian cysts can be mistaken with other medical diseases such as twisting of an Acute appendicitis, tub ovarian abscess, or ovarian cyst, resulting in unnecessary surgery. Regardless of the patient's clinical condition, ultrasound is considered the golden standard for diagnosing of haemorrhagic ovarian cysts.

Premenopausal women are the most likely to have haemorrhagic cysts. Which is consistent with the notion that functional cysts develop in young women as a result of hormonal changes.

We discovered that haemorrhagic ovarian cysts were commonly detected in multiparous individuals divergent to Nemoto et al (56.3 percent). When it came to the start of haemo-rrhagic ovarian cysts, the majority of them were first detected in the luteal phase (68.8%), next in the initial weeks of pregnancy, and finally in the follicular phase. These findings match those of research conducted by Nemoto et al. [17].

Only if an ovarian cyst splits (ruptures), is very big, or restricts the blood flow to the ovaries can it produce symptoms. They include:

5.1 Pelvic Discomfort

this may range from a slow, heavy sensation to a sudden, acute, and sharp pain during sex, problems emptying your bowels, a frequent need to urinate, heavy, irregular, or lighter-than-normal periods, ovarian cysts can cause bloating and a bloated belly, making it difficult to get pregnant-while fertility is typically unaffected by ovarian cysts.

A variety of cyst-detection techniques (Examinations of the pelvis, ultrasounds, MRIs, and CAT scans), as well as a variety strategies and methods for therapy (for example just waiting for the cyst to shrink, hysterectomy, oophorectomy, birth control pills, laparoscopic surgery, open abdominal surgery to remove just the cyst, hysterectomy). Ovarian cysts do not generally prohibit you from becoming pregnant, however they can make it more difficult. This might imply removing only the cyst and leaving the ovaries alone, or removing only one ovary.

6. CONCLUSION

Surgical intervention is required in patients with Haemorrhagic ovarian cyst whose report with severe abdominal discomfort, large cysts measuring more than 5 cm in diameter on ultrasound, recurring unbearable pain during the follow-up period, and a low haemoglobin level, a high leukocytic count. Finally, clinical, ultrasound and laboratory characteristics of patients with Haemorrhagic ovarian cyst can direct gynaecologists to the best therapy of such cases, avoiding needless surgery, although conservatively handled cases must be followed up on until the cysts have completely disappeared. My patient shows great improvement after getting the treatment and the treatment was still going on till my last date of care.

CONSENT

As per international standard or university standard, patient’s consent has been collected and preserved by the authors.

ETHICAL APPROVAL

Taken from institutional Ethics Committee.

COMPETING INTERESTS

Authors have declared that no competing interests exist.

REFERENCES

1. Aurelia Busca, Carlos Parra-Herran. "Ovary - nontumor - Nonneoplastic cysts / other - Corpus luteum cyst (CLC)". Pathology Outlines. Topic Completed; 2016.
   Revised: 5 March 2020
2. Ovarian Cyst Rupture Archived 2013-09-28 at the Way back Machine at Medscape.

Authors: Nathan Webb and David Chelmow. Updated; 2012.
3. "Ovarian Cysts Causes, Symptoms, Diagnosis, and Treatment" eMedicine Health. com. Archived from the original on 2007-03-07.
4. "Ovarian cysts: MedlinePlus Medical Encyclopedia". medlineplus.gov. Retrieved 2020-10-29.
5. Suh DS, Han SE, Yun KY, Lee NK, Kim KH, Yoon MS. Ruptured hemorrhagic corpus luteum cyst in an undescended ovary: a rare cause of acute abdomen. J Pediatr Adolesc Gynecol; 2015.
6. Kim JH, Jeong SY, Cho DH. Massive hemoperitoneum due to a ruptured corpus luteum cyst in a patient with congenital hypofibrinogenemia. Obstet Gynecol Sci. 2015;58 (5):427-30.
7. Muller CH, Zimmermann K, Bettex HJ. Near-fatal intra-abdominal bleeding from a ruptured follicle during thrombolytic therapy. Lancet. 1996;347(9016):1697.
8. Odejinmi F, Sangrithi M, Olowu O. Operative laparoscopy as the mainstay method in management of hemodynamically unstable patients with ectopic pregnancy. J Minim Invasive Gynecol. 2011;18(2):179-83.
9. Jain KA. Sonographic spectrum of hemorrhagic ovarian cysts. Journal of ultrasound in medicine. 2002;21(8):879-86.
10. Okai T, Kobayashi K, Ryo E, Kagawa H, Kozuma S, Taketani Y. Transvaginal sonographic appearance of hemorrhagic functional ovarian cysts and their spontaneous regression. International Journal of Gynecology & Obstetrics. 1994;44(1):47-52. V.K. Logsdon. Common problems in pediatric and adolescent gynecologic surgery. Curr Opin Obstet Gynecol. 2001;13:453-458
11. Joshi M, Ganesan K, Munshi HN, Ganesan S, Lawande A. Ultrasound of adnexal masses.
12. Timmerman D, Valentin L, Bourne TH, Collins WP, Verrelst H, Vergote I. Terms, definitions and measurements to describe the sonographic features of adnexal tumors: a consensus opinion from the International Ovarian Tumor Analysis (IOTA) Group. Ultrasound in Obstetrics and Gynecology: The Official Journal of the International Society of Ultrasound in Obstetrics and Gynecology. 2000;16(5): 500-5.
13. Ishihara K, Nemoto Y. Sonographic appearance of hemorrhagic ovarian cyst with acute abdomen by transvaginal scan. Journal of Nippon Medical School. 1997; 64(5):411-5.
14. Gupta N, Dadhwal V, Deka D, Jain SK, Mittal S. Corpus luteum hemorrhage: rare complication of congenital and acquired coagulation abnormalities. J Obstet Gynaecol Res. 2007;33(3):376-80.
15. Nemoto Y, Ishihara K, Sekiya T, Konishi H, Araki T. Ultrasonographic and clinical appearance of hemorrhagic ovarian cyst diagnosed by transvaginal scan. Journal of Nippon Medical School. 2003;70(3):243-9.
16. Ci Huang, Mun-KunHong, Dah-Ching Dinga (2017) A review of ovary torsion. Ci Ji Yi Xue Za Zhi. 2017;29:143-147.
17. Mohamed M, Al-Ramahi G, McCann M. Postcoital hemoperitoneum caused by ruptured corpus luteal cyst: a hidden etiology. J Surg Case Rep. 2015(10).

Peer-review history:
The peer review history for this paper can be accessed here:
https://www.sdiarticle5.com/review-history/78451