



Obstetrics & Gynaecology

STUDY OF ADNEXAL MASSES: USG, CLINICAL AND ITS HISTOPATHOLOGICAL A RETROSPECTIVE OBSERVATIONAL STUDY

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ABSTRACT

Introduction: An adnexal mass is an abnormal growth that develops near the uterus, most commonly arising from ovaries, fallopian tubes, or connective tissues. It is common gynecological problem. The prevalence of adnexal masses in the general population is 0.17% to 5.9% in asymptomatic women and 7.1% to 12% in symptomatic women. **Materials And Methods:** The present study was conducted at gynaecology department. This study contains 52 patients of benign adnexal mass diagnosed clinically, with/without ultrasonography and operated for same. This was retrospective study. Data was collected from indoor case papers of the patients with due consent of authority. **Result:** In present study out of 52 patients, 22 patients (42.2%) was having simple ovarian cyst, Chocolate cyst with 08 patients (9.6%) having Dermoid cyst, hemorrhagic /corpus luteal cyst with 11 patients (21.1%), 1 patient (1.9%) with hydrosalpinx, 03 patients (5.7%) with ovarian mass with (5.7%) and 2 patients (3.8%) having mucinous cyst. Out of 52 patient 13 patient (25%) was operated by laparoscopic cystectomy. 22 patient (42.3%) had laparotomy for cystectomy. 07 patient (13.4%) had salpingoopherectomy. 08 patients (15.3%) had TAH with BSO who have completed their family. 02 (3.84%) cyst wall removal for chocolate cyst was done. In histopathological reports serous cyst adenoma was found in 26 patients contributing 50% of total patients. Follicular cyst was found in 02 patients contributing 3.8%. Endometriotic/chocolate cyst in 09 patients contributing 17.3%, 7 patients with Dermoid cyst contributing 13.46%, 1 patient with Hydrosalpinx contributing 1.92%, Granulosa cell tumour and dysgerminoma found in 1 patient each. Mucinous cyst adenoma in 03 patient contributing 5.76% and with Mixed (serous with mucinous) 02 patient contributing 3.84%. **Discussion:** Intra operative and histopathological findings were correlated or discrepancies between intra operative and histopathological findings were not statistically significant. No significant difference between USG findings and Histopathological findings or discrepancies were not statistically significant.

KEYWORDS : TAH with BSO, USG findings, Histopathological findings.

INTRODUCTION

An adnexal mass is an abnormal growth that develops near the uterus, most commonly arising from ovaries, fallopian tubes, or connective tissues. It is common gynecological problem. The prevalence of adnexal masses in the general population is 0.17% to 5.9% in asymptomatic women and 7.1% to 12% in symptomatic women.

MATERIALS AND METHODS

This study contains 52 patients of benign adnexal mass diagnosed clinically, with/without ultrasonography and operated for same.

Inclusion Criteria:

Patients with adnexal masses diagnosed clinically and/or ultrasonographically and have clinical features of adnexal masses.

Exclusion Criteria:

Women with ovulation induction drugs.
Women with pregnancy
Acute ectopic pregnancy

RESULTS

Table- 1: Symptoms with adnexal mass

Symptoms	Number of patients	% Of patients
Abdominal pain	43	82.6%
Menstrual problems	06	11.53%
Infertility	02	3.8%
Abdominal enlargement	01	1.92%
Vomiting	02	3.8%
Fever	01	1.92%
Urinary complaints	04	7.69%

As shown in table no.1 it was observed that 43 patients were came for abdominal pain contributing 82.6%, 06 patients had menstrual problems contributing 11.53%, 02 patients were came for treatment of infertility and accidentally found on ultrasonography, and other patients were presented with complain of fever, vomiting, urinary complaints.

Table-2: USG findings and their percentage

USG findings	Number of patients	Percentage of patients
Simple ovarian cyst	22	42.2
Chocolate cyst	08	15.3

Dermoid cyst	05	9.6
Haemorrhagic /corpus luteal cyst	11	21.1
Hydrosalpinx	01	1.9
Ovarian mass	03	5.7
Mucinous cyst	02	3.8

In present study out of 52 patients, 22 patients was having simple ovarian cyst (42.2%), Chocolate cyst with 08 patients contributing (15.3%), 5 patients having Dermoid cyst contributing (9.6%), Haemorrhagic /corpus luteal cyst with 11 patients contributing (21.1%), 1 patient with hydrosalpinx contributing (1.9%), 03 patients with ovarian mass with (5.7%) of contribution and 2 patients (3.8%) having mucinous cyst.

Table no 3: Intraoperative Findings

FINDINGS	NUMBER OF PATIENTS	PERCENTAGE OF PATIENTS
Simple ovarian cyst	30	57.69
Endometriotic/chocolate cyst	10	19.23
Dermoid cyst	07	13.4
Mucinous cyst	02	3.84
Hydro salpinx	01	1.92
Ovarian mass	02	3.84
Total	52	100

As given in table no 7 given out of 52 patients 30 patients had simple ovarian cyst, 10 patients had chocolate cyst, 07 patients had dermoid cyst, 02 patients had mucinous cyst, 1 patient with hydrosalpinx, and 02 patients with ovarian mass on intraoperative findings.

Table no.04 Comparison of intraoperative findings with histopathological findings

INTRA OPERATIVE FINDINGS	NUMBER	PERCENTAGE (%)	HISTOPATHOLOGICAL FINDING	NUMBER	PERCENTAGE (%)
Simple ovarian cyst	30	57.2	Serous cyst adenoma	26	50
Dermoid cyst	07	13.4	Dermoid cyst	07	13.46

Endometriotic/chocolate cyst	10	19.23	Endometriotic/chocolate cyst	10	19.2
Mucinous cyst	02	3.84	Mucinous cyst adenoma	03	5.76
Hydro salpinx	01	1.92	Hydro salpinx	01	1.92
Ovarian mass	02	3.84	Ovarian tumors (dysgerminoma, germ cell tumors, borderline tumor)	03	5.76

No significant difference between intra operative findings and Histopathological findings. Or discrepancies were not statistically significant.

In present study, intra operative and histopathological findings were correlated or discrepancies between intra operative and histopathological findings were not statistically significant.

Table no.05 Showing comparison of usg findings with histopathological findings

USG FINDINGS	NUMBER	PERCENTAGE (%)	HISTOPATHOLOGICAL FINDING	NUMBER	PERCENTAGE (%)
Simple ovarian cyst	23	44.2	Serous cyst adenoma	2	51.92
Chocolate cyst	08	15.38	Chocolate cyst	09	17.3
Dermoid cyst	05	9.6	Dermoid	09	17.38
Hydrosalpinx	01	1.9	Hydro salpinx	01	1.92
Ovarian mass	03	5.7	Ovarian tumors(dysgerminoma, germ cell tumor, borderline tumor)	03	5.76
Mucinous cyst	02	3.8	Mucinous cyst adenoma	03	5.76

No significant difference between USG findings and Histopathological findings or discrepancies were not statistically significant.

In present study, findings of sonography and histopathology were correlated or discrepancies between ultrasonographic and histopathological findings were not statistically significant.

DISCUSSION

This study contains 52 patients of benign adnexal mass diagnosed clinically, with/without ultrasonography and operated for same. The main aim of this study was to correlate between USG, intraoperative and histopathological findings of adnexal mass. According to USG there was 26 masses from right adnexa (50%),14 from left adnexa (26.92%),08 masses were bilateral (15.38%) and 04 masses cannot localize on USG.43(82.6%) patients were coming for abdominal pain, 06 patients (11.53%) had menstrual problems ,02 patients were coming for treatment of infertility and accidentally found on ultrasonography, and other patients were presented with complain of fever, vomiting, urinary complaints. In present study out of 52 patients,22 patients(42.2%) was having simple ovarian cyst, Chocolate cyst with 08 patients (9.6%) having Dermoid cyst ,Hemorrhagic /corpus luteal cyst with 11 patients (21.1%),1 patient(1.9%) with hydrosalpinx ,03 patients(5.7%) with ovarian mass with(5.7%) and 2 patients (3.8%) having mucinous cyst.52 patients 30 patients(51.92%) had simple ovarian cyst,10 patients(19.2%) had chocolate cyst,07 patients (13.4%)had dermoid cyst,02 patients(3.84%) had mucinous cyst,1 patient(1.92%) with hydrosalpinx, and 02 patients(3.84%) with ovarian mass on intraoperative findings. Out of 52 patient 13 patient (25%) was operated by laparoscopic cystectomy. Laparoscopic surgery for benign ovarian tumors is associated with less pain, shorter hospital stays, and fewer adverse events than with laparotomy. laparoscopic cystectomy is treatment of choice.22 patient (42.3%) had laparotomy for cystectomy.07 patient (13.4%) had salpingoophorectomy where cyst was unable to separate from ovary or adnexa. 08 patients (15.3%) had TAH with BSO who have completed their family. 02(3.84%) cyst wall removal for chocolate cyst was done. There were 2 patients with

ovarian mass intraoperatively in both omental biopsies have taken. There were 3 patient whose has torsion of cyst and 1 patient with cyst rupture. Serous cyst adenoma was found in 26 patients (50%) of total patients. Follicular cyst was found in 02 patients (3.8%). Endometriotic/chocolate cyst in 09 patients (17.3%),7 patients with Dermoid cyst contributing (13.46%),1 patient with Hydrosalpinx (1.92%) Granulosa cell tumor and dysgerminoma found in 1 patient each. Mucinous cyst adenoma in 03 patient contributing 5.76% and with Mixed (serous with mucinous) 02 patient contributing 3.84%.

CONCLUSION.

In reproductive age group, simple ovarian cysts were more commonly seen followed by hemorrhagic cysts and in reproductive age group patients. The most common presenting symptom was abdominal pain followed by menstrual problems and infertility. Majority of benign ovarian lesion were seen to be involving unilateral ovary with higher incidence of right ovarian involvement than of left ovary. In our study there is good correlation between ultrasonographic findings and interop findings with final histopathological findings.

REFERENCES

- Biggs WS, Marks ST. Diagnosis and management of adnexal masses. Am fam physician. 2016;93(8):676-81.
- Padilla LA, Radosevich DM, Milad MP. Accuracy of the pelvic examination in detecting adnexal masses. Obstetrics & Gynecology. 2000;96(4):593-8.
- Jerry K, Luise C, Bourne T. The characterization of common ovarian cysts in premenopausal women. Ultrasound in obstetrics & gynecology : the official journal of the International Society of Ultrasound in Obstetrics and Gynecology. 2001;17(2):1404.
- Borgfeldt C, Andolf E. Transvaginal sonographic ovarian findings in a random sample of women 25-40 years old. Ultrasound in obstetrics & gynecology : the official journal of the International Society of Ultrasound in Obstetrics and Gynecology. 1999;13(5):34550.
- Castillo G, Alcazar JL, Jurado M. Natural history of sonographically detected simple unilocular adnexal cysts in asymptomatic postmenopausal women. Gynecologic oncology. 2004;92(3):965-9.
- Valentin L. Imaging in gynecology. Best practice & research Clinical obstetrics & gynaecology. 2006;20(6):881-906.
- Valentin L. Prospective cross-validation of Doppler ultrasound examination and gray-scale ultrasound imaging for discrimination of benign and malignant pelvic masses. Ultrasound in Obstetrics and Gynecology. 1999;14(4):273-83. smoking and marijuana use according to body mass index. Am J Epidemiol. 2005 Mar 15. 161(6):520-5. [Medline].
- Holt VL, Cushing-Haugen KL, Daling JR. Oral contraceptives, tubal sterilization, and functional ovarian cyst risk. Obstet Gynecol. 2003 Aug. 102(2):252-8. [Medline].
- Katz VL. Comprehensive Gynecology. 5th ed. Philadelphia: Mosby Elsevier.; 2007. 1098-103.
- Hallatt JG, Steele CH, Snyder M. Ruptured corpus luteum with hemoperitoneum: a study of 173 surgical cases. American journal of obstetrics and gynecology. 1984;149(1):5-9.
- William's Obstetrics (24th ed.). McGraw Hill. 2014. p. 50. ISBN 978-0-07-179893-8.