



ORIGINAL RESEARCH PAPER

Gynaecology

OPERATIVE GYNAECOLOGICAL LAPAROSCOPY PRACTICE IN A TERTIARY CARE SET UP IN CHHATTISGARH STATE

KEY WORDS:

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INTRODUCTION

Early in the 20th century, diagnostic laparoscopy was used by a limited number of general surgeons in place of diagnostic laparotomy, but had a substantial complication rate.^[1] Throughout the 1920s and 1930s, advocates of the procedure continued to develop improved laparoscopic equipment. Dr. Kurt Semm, a German gynecologist who specialized in infertility, was perhaps the most influential early advocate of modern operative laparoscopy.^[2]

In addition to diagnostic laparoscopy, operative endoscopy is used to perform common procedures, including removal of ectopic pregnancies, treatment of endometriosis, and lysis of pelvic adhesions.

Frequently, the physician needs to assess the pelvis for acute or chronic pain, ectopic pregnancy, endometriosis, adnexal torsion, or other pelvic pathology.^[3,4]

The advantages of laparoscopy over laparotomy include less postoperative pain, shorter hospital stays, and reduced blood loss^[5-7] However, complications may arise during initial abdominal access, port placement, dissection, or use of electrosurgery

In our study we tried to explore the rate and various types of operative laparoscopic surgeries in rural set up of Chhattisgarh state, so that operative laparoscopic surgeries should be promoted all over the India specially in rural areas for betterment of the patients.

AIM & OBJECTIVES

- To study rates of operative laparoscopic surgeries out of total Gynaec laparoscopic surgeries in rural india
- To study varieties & indications of opeartive laparoscopic surgeries

MATERIAL & METHODS

The present Retrospective Observational study was conducted in the Department of Obstetrics and Gynecology, CCM Medical College and Hospital, Kachandur, Durg (Chhattisgarh) in 570 total women (19- 65years) underwent various diagnostic and operative laparoscopic surgeries between January 2014 to June 2018 (54 months).

Case records of patients were reviewed critically by retrieving information from ward registers, clinical notes and theater records. During study period total number of major gynecological operations performed was also obtained from all OT register. All data was assessed and analyzed using simple percentages. Ethical clearance for this study has been taken.

All operative laparoscopies were performed under general anesthesia. Patients were put in modified Trendelenburg position and pneumoperitoneum was created with carbon dioxide (CO₂) insufflator 12-15 mmHg via Veress needle followed by sub, intra & supra umbilical incision for 5 mm or 10mm primary port.

After inserting camera through primary port, quick evaluation of whole abdominal cavity was undertaken by rotating 30° camera through 360 degrees to rule out any adherence of bowel and decision made for inserting secondary 5mm ports through small

incisions under direct vision and trans-illumination, lateral to deep inferior epigastric vessels. Diagnostic procedures were immediately converted to operative procedures if required after taking proper consent. Peritoneal cavity was lavaged and intra peritoneal drain was placed only if indicated.

Patients who underwent operative procedures were discharged after 5days except some special cases. Follow up of all pts were done after 1 week of surgery till needed.

RESULTS

Table 1: Types of Laparoscopic Surgery

S.No.	Types	Number	%age
1	Diagnostic Laparoscopy	240	29.63 %
2	Operative Laparoscopy	570	70.37 %
TOTAL		810	100%

Table 1 shows out of total 810 laparoscopic surgeries, maximum 570 (70.37 %) cases were of Operative Laparoscopic Surgery & 240 (29.63 %) cases were of Diagnostic Laparoscopy.

Graph No. 1. Shows Laparoscopic Surgery

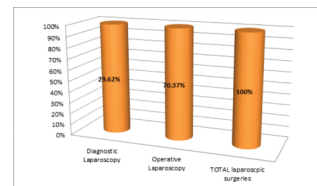


Table 2: Showing Varieties of Operative Laparoscopic Surgeries

S.No	Types of Operative Laparoscopic Surgeries	No of Surgeries (N=570)	%age
1	TLH	247	43.33%
2	LAVH	20	03.51%
3	Lap Myomectomy	36	06.31%
4	Lap Cystectomy	95	16.67%
5	Ectopic Pregnancy (Ruptured & Intact)	35	06.14%
6	Lap Wertheims Hysterectomy	05	00.88%
7	Lap Sacrocolpopexy	14	02.46%
8	Lap TO Mass Removal	21	03.68%
9	Lap Adhesiolysis	29	05.09%
10	LTT	48	08.42%
11	Lap Resection of Adenomyoma	10	01.75%
12	Chronic PID	4	00.72%
13	Embedded CuT Removal	3	00.53%
14	Vaginoplasty by Davydov's Technique	3	00.53%
TOTAL		570	100%

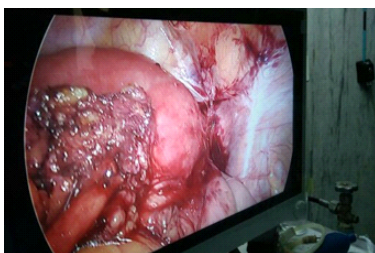
Table 2 shows out of total 570 cases of Operative Laparoscopic Surgery maximum 247 (43.33%) cases were of TLH followed by Lap Cystectomy (16.67%), LTT (08.42%), Lap Myomectomy (06.31%), Ectopic Pregnancy (06.14%), Lap Adhesiolysis (05.09%), Lap TO Mass Removal (03.68%), LAVH (3.51%), Lap

Sacrocolpopexy (02.46%) Lap Resection of Adenomyoma (01.75%), Lap Wertheims Hysterectomy (00.88%) & minimum both of 3 cases (00.53%) were of Embedded CuT Removaol and Vaginoplasty by Davydov's Technique.

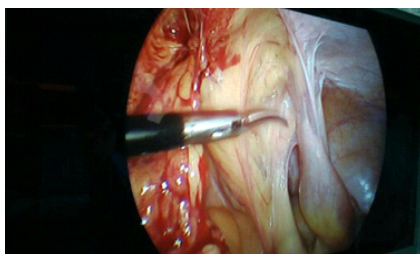
Table 3: Various Indications of Operative Laparoscopy (N=570)

S.No.	Indications	Number	%age	
1.	TLH 247 (43.33%)	AUB-L	85	14.91%
		AUB-A	34	05.96%
		AUB-M	28	04.91%
		AUB-O	25	04.39%
		AUB-P	15	02.63%
		AUB-N	8	01.40%
		AUB- C	2	0.35%
		CIN II/CIN III	16	02.81%
		Chronic PID	6	01.53%
		CPP with Chronic Cervicitis	5	0.88%
		PMB	7	01.23%
		Complex TO Mass	8	01.40%
		Grade IV Endometriosis	4	0.70%
		AUB with I Prolapse	4	0.70%
2.	LAVH 20 (03.51%)	AUB-L	9	01.58%
		AUB-A	4	0.70%
		AUB - N with PID	3	0.53%
		AUB - O with TO Mass	4	0.70%
3.	Ectopic Pregnancy 35 (06.14%)	Ruptured	22	03.86%
		Intact	13	02.28%
4.	Ovarian Masses 95 (16.67%)	Simple Ovarian cyst/ Hemorrhagic Cyst	52	09.12%
		Endometriotic cyst	22	03.86%
		Dermoid cyst	10	01.75%
		Paraovarian cyst	11	01.93%

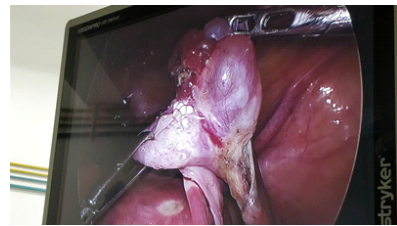
Table 7 Shows various indications of operative laparoscopy in detail.



Picture 1. shows Grade IV Endometriosis



Picture 2. shows Lap Adhesiolysis



Picture 3. shows Grade Paraovarian Cystectomy

DISCUSSION

In our study out of total 810 laparoscopic surgeries, maximum 570 (70.37 %) cases were of Operative Laparoscopic Surgery & 240 (29.63 %) cases were of Diagnostic Laparoscopy.

Attiya Begum (2015) studies that out of total 137 laparoscopic surgeries, maximum 89 cases (65%) were of Operative Laparoscopic Surgery & 48 (35 %) cases were of Diagnostic Laparoscopy which is comparable with our study.

In our study out of total 570 cases of Operative Laparoscopic Surgery maximum 247 (43.33%) cases were of TLH followed by Lap Cystectomy (16.67%), LTT (08.42%), Lap Myomectomy (06.31%), Ectopic Pregnancy (06.14%), Lap Adhesiolysis (05.09%), Lap TO Mass Removal (03.68%), LAVH (3.51%), Lap Sacrocolpopexy (02.46%) Lap Resection of Adenomyoma (01.75%), Lap Wertheims Hysterectomy (00.88%) & minimum both 3 cases (00.53%) were of Embedded CuT Removaol and Vaginoplasty by Davydov's Technique.

Attiya Begum et al (2015)⁸ studies that out of total 89 Operative laparoscopies, ovarian masses formed a major group i.e. 43 (48.3%) followed by 31 (34.8%) patients of ectopic pregnancies, only 4 (4.5%) cases of LAVH % 11 cases others. But no TLH was done.

As such No other studies are available related to various indications of operative laparoscopy of gynaecology in detail.

Present study is not comparable with above mentioned study {Attiya Begum et al (2015)⁸} because in our rural set-up maximum no of AUB cases were there that is why TLH were maximum followed by Lap Cystectomy (16.67%) & others.

Various indications of operative laparoscopic surgeries are described in detail in table in 3.

CONCLUSION

In our rural set-up minimal access laparoscopic surgeries are not only feasible but very safe, effective, short hospital stay & not so costly as a operative tool. It is even Gold standard for many gynaecological diseases.

So our study is a new basic approach specially to cover rural area to treat the variety of diseases in a proper manner by advanced & even difficult rare laprscopic surgeries.

Being a Laparoscopic Surgeon it is our basic resonsibility & duty to pay attention towards each and every woman of our society, state & nation to make her disease free from any gynaec disease by Recommending Advanced Technology like Laparoscopic Surgeries due to following reasons:

1. Less pain than an open procedure
2. Faster recovery
3. Less Bleeding
4. Smaller incisions
5. Smaller external scarring
6. Less internal scarring
7. Less risk of infection
8. Gold standard for some diseases like PIDs, Chronic Pelvic Pain, Infertility etc.

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