



A CLINICAL STUDY OF COMPLICATED INGUINAL HERNIA AND ITS MANAGEMENT

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ABSTRACT

Background: Inguinal hernia is the most common hernia of the abdominal wall. Complicated inguinal hernias is a important surgical emergency. **Methods:** 50 complicated inguinal hernias were studied prospectively for a period of 3 years. Patients were selected randomly from admission at the place of study. All patients were studied and results analysed. **Result:** The study revealed that elderly people of 5th decade were most affected. Male population was found to be most affected. Most cases were operated by reduction (28/50) and was operated by modified bassini (28/50) method.

KEYWORDS :

INTRODUCTION

A hernia is a protrusion of a viscus or part of a viscus through an abnormal opening in the walls of its containing cavity.¹

Seventy-five per cent of all abdominal wall hernias are found in the groin, making it the most common location for an abdominal wall hernia. Of all groin hernias, 95% are the hernias of the inguinal canal with the remaining being femoral hernia defects. Inguinal hernias are nine times more common in men than in women. The overall lifetime risk of developing a groin hernia is approximately 15% in males and less than 5% in females. Inguinal hernias are further divided by anatomical location into direct and indirect types. difference is based on the location of the actual hernia defect concerning the inferior epigastric vessels.² Indirect inguinal hernias strangulate more commonly, the direct variety not so often because of the wide neck of the sac.³

There is link between age and hernia diagnosis. After an initial increase in the young age, groin hernias become common with higher age. In the same way, the complications of hernias (incarceration, strangulation, and bowel obstruction) are found more commonly at the extremes of age.²

The reasons for the simple hernia to go into complications include lack of public awareness of the dangers of hernia complications and reluctance on behalf of them non-surgical medical personnel to refer patients with known risk factors.³

An inguinal hernia either direct and indirect A is common problem that we face in our routine surgical practice. Management of these complicated hernias is different from uncomplicated hernias. Most significant is the death and morbid situation linked with this hernias.⁴

This paper aims to find out the high-risk factors for the development of the complicated inguinal hernia and also to find out effective management of the operated patients. Duration (< 1 yr) were those who mostly developed the highest rate of complications with 35 cases (70%).

MATERIALS AND METHOD

Study Design: A Prospective analytical study

Study Period: October 2020 to September 2022

Study Population: 50 patients admitted in government medical college and hospital, cuddalore,

Source of Data: Study is to be conducted among patients admitted and also operated for complicated inguinal/inguinoscrotal hernia at government medical college and hospital, cuddalore, during the study period.

Method of Study: Study will be conducted among patients diagnosed with complicated inguinal hernia and admitted at government medical college and hospital, cuddalore during the study period.

OBSERVATION AND RESULTS

Age Incidence

Age	Incidence
21-30	9
31-40	10
41-50	9
51-60	12
61-70	9
71-80	1

Incidence of complicated groin Hernia were notably higher in the older age group, a large number belonging to 5th decade This reflected the lack of attention to groin swelling in elderly people.

Sex Incidence

	MALE	FEMALE
INGUINAL	44	6
TOTAL	44	6

With regard to sex incidence, the majority (44 cases) were males and it is also evident that all had a complicated inguinal Hernia.

Complication Of Groin Hernia

	OBSTRN.	STRANG.	IRRED/INCAR

INGUINAL	28	6	16
TOTAL	28	6	16

Our study revealed that obstruction was the important complication occurring in the groin Hernia. About 28 had features of obstruction viz. abd distension, vomiting, constipation and visible intestinal peristalsis. 6 of the patients presented with features of strangulation; severe groin pain and evidence of peritonitis in abdomen. Incarceration / Irreducibility was seen in 16 cases.

Per operative procedure	Incidence
Darning	5
Mod bassini	28
Mesh	17

After Reduction (or) Reduction and anastomosis, repair of the postr. wall of Inguinal canal was carried out by Darning in 5 cases, Hernia repair by modified Bassini's Technique was undertaken in 28 cases while 17 cases had prosthetic mesh repair.

Method of repair	Incidence
Reduction	28
Resection and anastomosis	12
Orchidectomy	10

The decision about the preoperative procedure to be carried was made on looking at the viability of the contents. Reduction was done in 28 cases who had viable bowel while resection of the nonviable bowel and subsequent anastomosis of the normal bowel segment carried out in 12 cases, orchidectomy in another 10 cases.

Analysis And Discussion

The complications of inguinal hernia identified in this study include irreducibility, obstruction, strangulation. The male and female ratio (22:3) in the current study among the complicated of inguinal/inguinoscrotal hernia in the present study is in the consistency of Hariprasad et al.⁵

The hernias (70%) presented with complication did so within 1 year of duration. This finding was following the result of the study done by S Rai et al.³

Most of the patients who were admitted with complications of groin hernias have not sought previous medical attention. This signifies that most hernias that go for complications do so within a short interval of time in the progression of the disease.

Individuals with a short span presentation of inguinal hernia should be operated at the earliest than those with longer presentations.

NJ Andrews et al.,⁶ observed that risk of strangulation in recurrent hernia is more as compared to primary hernias.

Obstructed Groin Hernia have been the most cause for bowel obstruction cases in emergency department.

Old age is important risk for complicated hernias. This study that the most occurrences of complications in inguinal hernia complications occur in the 5th decade of life.

More male population is affected than female population. All complicated Inguinal Hernias are indirect type of hernias. Indirect hernias are not readily reducible on lying down and hence commonly go for irreducibility.

In our study it is highlighted that Right sided hernias, are common can be attributed to right testis descending later than left and a higher chance of failure of closure of processus vaginalis.

Obstruction of small bowel in hernial sac is the most common complication- 66%. Strangulation is a dangerous

complication of inguinoscrotal hernias. it happens more in neglected incarcerated hernias in old age, and in huge inguinal hernias with comparatively small neck.comparable observations are recorded by Hariprasad et al., 5and Muhammad Hasan Abbas et al.⁸

Occurrence of symptoms in Prakash JS et al.,⁷ study records the same pattern. The greater the delay, greater the risk for strangulation.³ Martinez-Serrano et al.,¹⁰ revealed higher rates of mortality in patients with acute complication as their first hernia related symptom and whose treatment was delayed for more than 24 hours.

Resuscitation was done in patients who complained of symptoms of obstruction and strangulation of inguinoscrotal hernias. Before surgery antibiotics were given to all who indicated signs of complications of inguinoscrotal hernias.

The viability of contents of the current study are same as Hariprasad et al.⁵ The viable bowel loops and omentum were reduced into the peritoneum. These findings are similar to Brindelli et al., Orchidectomy was done in 10 of the older patients to reduce recurrence.

The choice of surgery is based on the surgeon. No procedures showed any advantage over others. The surgical procedures done were similar in findings as with Manish Baria et al., 4 and Rives et al.¹² Most of the patients came for suture removal after a week of surgery,

CONCLUSION

1. The major complications of groin hernia in our study included irreducibility, obstruction and strangulation.
2. Obstructed groin hernia remains the most common cause of small intestinal obstruction, admitted in emergency department.
3. Most of the complicated groin hernias occur in old aged people. Males out number female in overall incidence.
4. Primary indirect Inguinal Hernia were the most common type of hernia in the study.
5. Obstruction of the bowel in the hernial sac is the most commonly presented complication.
6. Initial resuscitation was instituted in all cases of strangulation which helped in smooth preoperative course and smoother postoperative recovery.
7. Choice of Hernia repair was decided on patient's requirement and surgeon's preference. No significant advantage was made one over another

Ethical Clearance: Taken.

Conflict of Interest: None declared.

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