

ANALYSIS OF IMMEDIATE POST OPERATIVE COMPLICATIONS FOLLOWING OPEN HAEMORRHOIDECTOMY VS. STAPLER HAEMORRHOIDOPEXY

Surgery

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ABSTRACT

Introduction: Stapler Haemorrhoidopexy is a relatively recent technique used in surgical management of haemorrhoids. The traditional haemorrhoidectomy procedure (Milligan Morgan Technique) is known to be associated with more post operative complications which may include bleeding, pain, fever etc. The aim of this study was to compare the two procedures in terms of post operative complications in the immediate period following surgery. **Aim :** To analyse open haemorrhoidectomy and stapler haemorrhoidopexy in the management of grade III/IV haemorrhoids based on immediate post operative period. **Objective:** To study the incidence of post operative complications in the 2 techniques of surgical management of haemorrhoids. **Materials and Methods :** A prospective and retrospective clinical study done in Department of general surgery of Dr. Sampurnanand Medical College, Jodhpur, Rajasthan. In our study 116 patients with grade ¾ haemorrhoids were included and were equally divided in 2 groups that underwent either procedure. **Results:** Among all patients, the ones who underwent stapler haemorrhoidopexy had significantly fewer complications as compared to patients in open haemorrhoidectomy group. **Conclusion:** stapled haemorrhoidopexy is a safe and effective procedure in grade 3 & 4 haemorrhoids and can be safely considered an alternative to open haemorrhoidectomy

KEYWORDS

Open Haemorrhoidectomy, Stapler Haemorrhoidopexy, Haemorrhoids

INTRODUCTION

Haemorrhoids are one of the most common benign anorectal diseases that plagues the human population across the globe. According to some studies at least 50 % of adults over the age of 50 have some degree of haemorrhoids. Although the treatment of first and second degree haemorrhoids is usually conservative, third and fourth degree haemorrhoids are treated with surgical management. ⁽¹⁾Open haemorrhoidectomy and stapler haemorrhoidopexy are the two mainstays of surgical management of grade 3 & 4 haemorrhoids. Open(Milligan- Morgan) haemorrhoidectomy was first introduced in 1937 and continues to be used widely by surgeons all over the world.⁽²⁾ Even though the technique is cost effective and has a short learning curve it suffers from a bad name due to being a painful procedure for a fairly benign condition causing postoperative pain needing about 2-3 days hospital stay with a convalescence of at least one month ^(3,4) Stapler Haemorrhoidopexy is a relatively new route for treatment of the disease which was first introduced in 1995 and has been consistently associated with improved short-term outcomes, including less postoperative pain, shorter operating times, earlier return to work, and greater patient satisfaction. ^(3,4,5,6,7) Even though a lot of research is available regarding the use of both techniques the literature available in the setting of Indian Scenario is scanty and further research regarding the immediate post operative outcomes is required. This study is designed to assess and compare the condition of the patient in regard to the immediate post operative complications and period of stay subsequent to either of the two procedures.

MATERIALS & METHODS

After clearance from Institutional Ethical Committee (IEC) a prospective and retrospective clinical study in the Department of general surgery of Dr. Sampurnanand Medical College, Jodhpur,

Rajasthan was conducted.

Inclusion Criteria

Patients clinically diagnosed with Grade III and IV haemorrhoids belonging to the age group of more than 18 years of both genders

Exclusion Criteria

- Patients who were deemed unfit during pre-anaesthetic check-up
- Patients with uncorrected coagulopathies

In our study 116 patients with grade ¾ haemorrhoids were included and were equally divided in 2 groups that underwent either procedure.

A detailed history of their illness, onset and duration of presenting symptoms was taken from all the patients. Per Rectal Exam and proctoscopy was done in all patients to confirm the diagnosis of grade 3 and 4 haemorrhoids. The data was collected from the records of patient's admission files with the above-mentioned inclusion criteria after permission from the respective medical record department in cases taken retrospectively. For prospective cases, the data was collected directly from patients via history and clinical examination. Pre-anaesthetic evaluation of all patients was performed by an anaesthesiologist a day before the surgery. After taking written informed consent, patients were allocated randomly.

RESULTS

Table 1: Incidence Of Bleeding Per Rectum In Post Operative Period

Post op Complication	Open Haemorrhoidectomy (Total -58 patients)	Stapler Haemorrhoidopexy (Total -58 patients)	Total (Total -116 patients)

Bleeding per rectum	44	75.86%	07	12.06%	51	43.96%
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After the procedure 51 patients out of a total 116 suffered from Bleeding per rectum. 44 patients (75.86%) belonged to open haemorrhoidectomy and 7 patients (12.06%) to stapler haemorrhoidectomy group.

Table 2: Incidence Of Pain In Post Operative Period

Post op Complication	Open Haemorrhoidectomy (Total -58 patients)	Stapler Haemorrhoidectomy (Total -58 patients)	Total (Total -116 patients)
Pain	50 86.20%	12 20.68%	62 53.44%

Pain per ano was the second most common complaint after the surgery, reported by 62 patients. Pain was seen more commonly in open haemorrhoidectomy group in 86.20% patients i.e. 50 patients. 20.68% i.e. 12 patients reported pain in stapler haemorrhoidectomy group.

Table 3: Incidence Of Fever In Post Operative Period

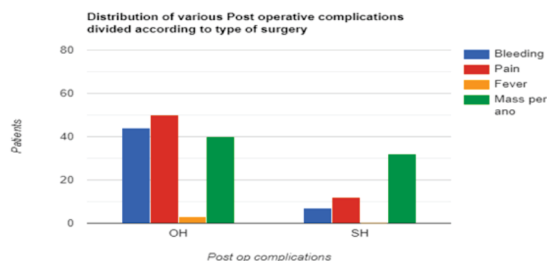
Post op Complication	Open Haemorrhoidectomy (Total -58 patients)	Stapler Haemorrhoidectomy (Total -58 patients)	Total (Total -116 patients)
Fever	3 5.17%	0 0%	3 2.58%

Fever was the least common complain seen in just 3 patients which is 5.17 % patients in the group. All patients who had fever underwent open haemorrhoidectomy.

Table 4: Incidence of Bleeding per rectum in post operative period

Post op Complication	Open Haemorrhoidectomy (Total -58 patients)	Stapler Haemorrhoidectomy (Total -58 patients)	Total (Total -116 patients)
Mass per Ano	40 68.96%	32 58.17%	72 62.06%

Feeling of mass per ano was the most common complaint by the patients post operatively, reported by 40 patients i.e. 68.96% after the open haemorrhoidectomy procedure and 32 patients i.e. 58.17% after stapler haemorrhoidectomy



After the surgery, the most common complication suffered by the patients was a feeling of mass per ano, seen in 62.06 % (72) patients. Out of these 72 patients 40 were from open haemorrhoidectomy group while 32 were from stapler haemorrhoidectomy group. Second most common complaint of pain per ano was reported by 53.44% of patients i.e. 62 patients. 50 patients who complained of pain were from open haemorrhoidectomy group while 12 were from stapler haemorrhoidectomy group. 43.9 % patients (51 patients) suffered from bleeding per rectum out of which 44 were from open haemorrhoidectomy group and 7 were from Stapler group. 3 patients suffered from fever after the surgery and all of them belonged to Open Haemorrhoidectomy group.

DISCUSSION

Stapled haemorrhoidectomy was introduced in 1995 by Longo. A novel technique in dealing with the management of haemorrhoidal disease, it has emerged as an alternative to open haemorrhoidectomy, long considered the —gold standard. Over the last two decades, the technique has been standardized and the indications, contraindications, and operative technique have been defined. Several randomized trials have shown the efficacy and safety of the procedure but there has been some concern and reluctance in accepting stapled haemorrhoidectomy due to few reported complications like persistent postoperative pain, fecal urgency, recto-vaginal fistula, rectal obstruction, perforation

peritonitis and pelvic sepsis. Numerous controlled studies have already demonstrated that this technique is associated with less postoperative pain and a quicker recovery. Right from the earliest study, there is a high patient satisfaction rate. However, most of these studies were conducted in highly specialized centers. The present study was designed to compare the short term immediate post operative results of stapled hemorrhoidectomy with Milligan-Morgan Haemorrhoidectomy. Our goals were to find out if the results of the stapled hemorrhoidectomy are the same as those reported in the literature when the operation is performed at independent centers. In the present study, in terms of complications in the immediate post operative period Stapler haemorrhoidectomy was superior and showed fewer complications . Open procedure suffered from post operative pain that required the use of analgesia while 32 patients complained of pain in the stapler group. 44 patients (75.86%) had bleeding per rectum in the open group which was significantly higher than the stapler group which had 7 patients (12.06%) who complained of bleeding. Srikanth Kulkarni et al⁽⁸⁾ stapled versus open haemorrhoidectomy evaluation of short term results (2016). Postoperative bleeding in both Open haemorrhoidectomy and Stapler Haemorrhoidectomy group had an incidence of 2%. Postoperative hospital stay and duration of resumption of daily activity was less in Stapler Haemorrhoidectomy group compared to Open haemorrhoidectomy group and statistically significant with p.

CONCLUSION

It can be concluded that stapled haemorrhoidectomy is a safe and effective procedure in grade 3 & 4 haemorrhoids and can be safely considered an alternative to open haemorrhoidectomy, long considered the —gold standard

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