

# بسم الله الرحمن الرحيم





# شبكة المعلومات الجامعية

## التوثيق الالكتروني والميكروفيلم



# جامعة عين شمس

التوثيق الإلكتروني والميكرو فيلم

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# Laparoscopic Rectopexy For Complete Rectal Prolapse

**Essay**

Submitted for partial fulfillment of  
Master Degree in General Surgery

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# Introduction

Complete rectal prolapse is defined as protrusion of all layers of the rectal wall through anal sphincter complex. Rectal prolapse is a condition that can occur both in adult and children due to various predisposing factors. The disease is relatively common and its treatment lies on the accuracy of diagnosis and a rational therapeutic plan **(Keighley, 1999)**.

Rectal prolapse as a disease process targets mainly the quality of life of patient. The surgical management of rectal prolapse encompasses a wide variety of procedures. Selection of the most appropriate operation for the individual case continues to be problematic for surgeons and requires a thorough evaluation of the concomitant disorders of the patient **(Keighley, 1999)**.

**Pemberton** and **Stalker** were the first one to surgically suspend and fix the rectum for rectal prolapse on **1939 (Lechaux et al., 2005)**.

## Introduction and Aim of the Study

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Although more than hundreds of surgical procedures have been described and practiced throughout the world for rectal prolapse only few are universally accepted(**Jegadesh,2007**).

Surgical procedure is broadly classified into abdominal and perineal procedures, but the details of the technique remain controversial either suture, mesh or resection rectopexy. As most of patients are elderly and not always fit enough to undergo an abdominal procedure, various perineal approaches are preferred (**Lechaux, 1995**).

Laparoscopic repair represents the latest development in the evolution of the surgical treatment of rectal prolapse. Laparoscopic approaches to sutured rectopexy with and without resection, mesh rectopexy, and anterior resection have been reported (**Lechaux et al., 2005**).

**Graf et al., (1995)** claimed that recently laparoscopic approach has been adopted as an alternative to open surgery and can be performed safely even in elderly.

## Introduction and Aim of the Study

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**Baker et al., (1995)** stated that laparoscopic procedures effectively treat rectal prolapse without the morbidity of the laparotomy wound and significantly shorten hospitalization for this align disease.

Evaluation of laparoscopic rectopexy in comparison with other open abdominal procedures for treatment of complete rectal prolapse was reviewed in the literatures (**Satomi et al., 2004**).

### **Aim of the work**

This study is reviewing the literatures comparing laparoscopic management of rectal prolapse with open abdominal and perineal procedures. In brief, it documents the techniques and balances the applications of laparoscopic procedures against potential advantages and disadvantages. In essence, this overview proposes to shine a light on evaluation of clinical outcome of laparoscopic procedures in comparison with other classic (open) trans-abdominal or perineal procedures.

# ANATOMY OF THE RECTUM, ANAL CANAL AND PELVIC FLOOR

## **Embryology Of The Rectum**

The primitive gut tube develops from the endodermal roof of the yolk sac. At beginning of the third week of development, it can be divided into three regions: the foregut in the head fold, the hindgut in the smaller tail fold, and between these two portions, the midgut that progresses below the major pancreatic papilla to form the small intestine, the ascending colon, and the proximal two thirds of the transverse colon. The distal third of the transverse colon, the rectum and the anal canal above the dentate line are all derived from the hindgut. The dentate line marks the fusion between endodermal and ectodermal tubes, where the terminal portion of the hindgut or cloaca fuses with an ingrowth from the anal pit (the proctodeum). Before the fifth week of development, the intestinal and urogenital tracts terminate in conjunction with the cloaca. At the six week the two tracts are separated and divided into an anterior urogenital and a