

PRE-OPERATIVE LOW DOSE RADIOTHERAPY OF RECTAL CANCER WITH FOURNIER'S GANGRENE: A CASE REPORT AND REVIEW OF LITERATURE

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Fournier's gangrene is a rare but often fatal manifestation of rectal cancer. We report a case of at least T3 stage adenocarcinoma of rectum with Fournier's gangrene in a male alcoholic abuser. Instead of postponing radiation therapy as suggested by some literature, we arranged low dose pre-operative radiation therapy and found the following operation was smoother than expected. Whereas full dose radiation therapy of the cancer should be performed after resection as suggested by the literature, we believe pre-operative low-dose radiation therapy may help the execution of tumor resection and thus the general outcome of the patient. This report also summarizes a review of the literature on the management of *de novo* Fournier's gangrene cases with rectal cancers and discusses the role and timing of radiation therapy in such cases.

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Key words: Fournier's gangrene, Rectal cancer, Radiation therapy, Case report

INTRODUCTION

Fournier's gangrene is an uncommon gangrenous process combining with toxic sepsis and is generally presented as rapidly progressive necrotizing fasciitis of genitalia and perineum. Rectal cancer often combines with some inflammatory and infectious process such as perirectal, perianal and ischiorectal abscess. The concurrence of Fournier's gangrene, however, is extremely rare but often poses a challenge to the treatment team. It is suggested that radiation therapy (RT) be postponed after the curative abdominal perineal resection (APR) operation and the stabilization of wound healing process [13]. However, the application of pre-operative

low dose RT to control inflammation is uncommon in other settings to facilitate the execution of curative surgery on patients of malignancy. Because the immune system is seldom compromised in such cases, holding the RT does not seem to be necessary. We therefore report a case of rectal cancer with Fournier's gangrene in a patient who received preoperative RT and benefited from a smoother course in the following operation. A review of related literature indexed by Medline is also conducted.

CASE REPORT

A 51-yr-old male alcoholic abuser presented with general discomfort, extreme weakness,

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