

ABSTRACT NO. 33

MORBIDITY OF DELAYED RECTAL CANCER SURGERY FOLLOWING NEOADJUVANT CHEMORADIOTHERAPY

Lillard SR, Wu PC, Tatum RP, Lynge DC, Langdale LA
VA Puget Sound Health Care System, Seattle, WA

BACKGROUND: Neoadjuvant chemoradiotherapy for rectal adenocarcinoma has been shown to improve local recurrence rates, decrease treatment toxicity, and increase sphincter-preservation rates. Typically, surgery is performed 6–8 weeks following the last radiotherapy dose. The impact of delayed surgery following neoadjuvant therapy has not been well-studied.

METHODS: Thirty-one (31) male cases of locally advanced rectal cancer were treated with preoperative chemoradiotherapy between 1999 and 2006. Surgical results, perioperative complications, intraoperative blood loss, procedure time and sphincter-preservation rates were compared between patients undergoing resection within (early) or after (delayed) 8 weeks of treatment.

RESULTS: Sixteen patients (mean age of 63 years) underwent resection within 6-8 weeks of neoadjuvant treatment and 7 patients (44%) had successful sphincter-preserving procedures. Fifteen patients (mean age of 62 years) underwent delayed resection ranging from 9–17 weeks and three patients (20%) had sphincter-preserving procedures. There were no differences between groups in length of operative procedure or blood loss. One patient (6%) in the early group was found to have a positive radial margin, while 2 patients (13%) in the delayed group had a positive margin resection. There were 3 wound infection complications in the early group for a morbidity rate of 19%. There were 8 complications in the delayed group (5 wound infections, 1 perforated duodenal ulcer, 1 femoral neuropathy, and 1 c. difficile colitis) for a morbidity rate of 53%.

CONCLUSIONS: Delayed surgery following neoadjuvant therapy may negatively impact results of rectal cancer surgery. In this study, there was a 2.8-fold increase in surgical morbidity following delayed resection, particularly related to surgical site wound infections. These results underscore the importance of careful coordination of multimodality therapy and timely scheduling of surgery to achieve optimal results.