

Balancing potential quality-of-life benefits against the risk of lethal late recurrence with bladder-preserving surgery

KEY WORDS

Bladder cancer, bladder-sparing approach, radical cystectomy

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Re: Rene NJ, Cury FB, Souhami L. Conservative treatment of invasive bladder cancer. *Curr Oncol* 2009;16:36–47.

The authors make a clear case for the role of bladder preservation strategies in selected patients with invasive bladder cancer. However, the "zeitgeist" of the article is that these strategies "achieve survival rates similar to those achieved in modern cystectomy series."

The problem with this statement is that the existing database, which consists of large phase II series, does not permit reliable direct comparisons of outcome because of the vagaries of patient selection. More to the point, it isn't true.

Patients can achieve local control of invasive bladder cancer either by cystectomy or by a bladder preservation approach. However, unlike patients undergoing cystectomy, patients whose bladders are preserved are at risk of late recurrence of invasive cancer in the bladder, even after a complete response (CR). A proportion of these late recurrences are lethal. The authors address this indirectly in their discussion of "Recurrences after Bladder Preservation." They acknowledge that about one third (14%-43%) of patients will have a local recurrence after a CR and that about half of these recurrences will be invasive. Of these invasive recurrences, the largest published series reported that 50% succumb to metastatic disease. Thus 8%-10% of patients, even when carefully selected, will, when managed with a bladder preservation strategy, suffer a preventable bladder cancer death because of metastasis from invasive late recurrence.

These deaths associated with a late bladder recurrence after a CR would have been prevented by cystectomy combined with appropriate neoadjuvant or adjuvant chemotherapy. Patients who have all local disease excised surgically (that is, a surgical CR) have no risk of late recurrence in the bladder, because it has been removed.

Bladder preservation strategies do have a role in selected patients, but this approach should be offered in the context of balancing the potential quality-oflife benefits against the risk of lethal late recurrence in the bladder.

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REPLY FROM DRS. LUIS SOUHAMI AND FABIO CURY

We thank Dr. Klotz for his interest in our paper and for his thoughtful comments. He points to the possible risk of an increased metastatic disease rate from invasive recurrent disease within the bladder after bladder-preserving trimodality therapy in selected patients undergoing bladder preservation strategies. He also mentions that patients undergoing radical cystectomy combined with either neoadjuvant or adjuvant chemotherapy will recur neither locally nor distantly.

Although we would like to agree with Dr. Klotz's triumphant and optimistic statement, the reality is far from that. The systematic reviews and meta-analyses by the Advanced Bladder Cancer Meta-analysis Collaboration ^{1,2} have studied data from more than 2500 patients entering more than 10 randomized trials comparing cystectomy with neoadjuvant chemotherapy followed by cystectomy. Two published studies confirmed the modest, but significant, improvement of 5%–6% in survival for the combined approach. However, analyses for events of local recurrence and distant metastases for the combined therapy showed

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overall rates ranging from 26% to 28% and from 22% to 25%. Data from randomized trials using adjuvant chemotherapy post-cystectomy are less clear, given the limited number of trials performed and the number of patients entered. The Cochrane meta-analysis ³ uncovered six trials for a total of only 491 patients (average of 81 patients per trial). With many caveats, the authors conclude that a reliable treatment decision regarding adjuvant chemotherapy could not be made because of those limitations. Despite that, they pooled the recurrence rate (local and distant) in the combined approach and it was close to 40%.

Thus, metastatic disease remains a significant problem regardless of the primary bladder cancer therapy; even with the use of neoadjuvant or adjuvant chemotherapy, a large number of patients still fail distantly. The bottom line is that survival outcomes are similar between a contemporary selective bladder-sparing therapy and a radical cystectomy, but with an unquestionably improved quality of life for those patients who preserve their organ. Furthermore, there are absolutely no data indicating that patients who undergo a bladdersparing approach have a higher rate of metastatic disease as compared with those treated by a radical cystectomy. These issues should be clearly discussed with all patients having invasive bladder cancer who are candidates for a radical and curative treatment.

Trimodality bladder-preserving approaches, including a complete transurethral resection, are now an important, legitimate, and safe ⁴ treatment alternative for selected patients with invasive bladder cancer. These approaches involve a multidisciplinary approach, and high motivation on the part of the urologist is of paramount importance for its continuing success.

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