

THE DECISION BETWEEN MASTECTOMY AND BREAST CONSERVATION

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SUMMARY:

Making a decision about breast cancer surgery is always a challenge. In some cases, the diagnosis and data will strongly suggest how to proceed.

Shared decision has been accepted as a desirable approach to medical care, but our understanding of patient satisfaction with the process and its impact on treatment selection is limited.

There are a variety of ways to go about the decision-making process. For some decisions, there will not be much time; for others, there can be years to contemplate your actions.

Key Words: breast cancer; decision making; breast conserving therapy.

DECIZIA ÎNTRE MASTECTOMIE ȘI TERAPIA CONSERVATOARE A SÂNULUI

Rezumat:

Luarea unei decizii cu privire la chirurgia cancerului de sân este întotdeauna o provocare. În unele cazuri, diagnosticul și datele vor sugera cum să procedați.

Decizia în comun a fost acceptată ca fiind o abordare de dorit a actului medical, dar recunoașterea gradului de înțelegere al pacientului asupra procesului și impactul acestui fapt în selecția tratamentului este limitată.

Există o varietate de moduri de a explica procesul decizional. Pentru unele decizii, nu va exista mult timp, pentru altele vor putea exista ani pentru a reflecta la acțiunile dvs.

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INTRODUCTION

In the past two decades, breast cancer surgery has evolved from mutilating radical mastectomies to more conservative techniques all over the world (1).

The local therapy of breast cancer is an ideal model for studying the decision-making process because there is a large body of high-quality evidence on which to base the decisions. To study decision making, we used a population-based sample of 150 women with ductal carcinoma in situ (DCIS) and a 32% sample of those with invasive breast cancer diagnosed in 2004 – 2008. There was a 77% response rate to the survey, yielding 120 patients. More than 90% were contacted within 6 months of diagnosis.

1. The decision between mastectomy and breast conservation depends on many factors, including the following:

2. The patient's preference
3. The size of the tumor
4. The location of the tumor within the breast
5. The size of the breast
6. The presence of DCIS, LCIS, atypia or hyperplasia
7. The likelihood that all of the tumor can be removed without removing the entire breast
8. The presence of microcalcifications on the mammogram
9. The anticipated cosmetic result
10. The ability to adequately monitor the patient for recurrences after surgery
11. The patient's age and health
12. A history of connective tissue disorders, like scleroderma or lupus
13. The location of the nearest radiation facility

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14. Previous treatment with radiation for lymphoma or other medical conditions
15. Pregnancy (first or second trimester)

Some women who are not initially candidates for breast conservation may benefit of being treated with chemotherapy and/or radiation therapy before surgery. If the tumor shrinks significantly, then they may be able to have breast conservation surgery.

MATERIAL & METHOD

The choice of procedure may be limited by the patient's medical history, previous abdominal surgeries, body build, prior radiation therapy and smoking history. For a woman contemplating a mastectomy where reconstruction may be a consideration, a consultation with a plastic surgeon prior to mastectomy is advisable.

The mean patient age was 58 years and 70% were white. Less than a high school level of education was reported by 27%; 61% graduated from high school or had some college education, and 13% were college graduates. The mastectomy rate was 30% for patients with both DCIS and invasive cancer. Accepted clinical contraindications to breast-conserving surgery were reported by 11.5% of the study population. In 41% of cases the patient reported that she was the primary decision maker, the decision was shared in 37%, and was made by the surgeon in 22% of cases. The therapy recommended by the surgeon was breast-conserving surgery in 49%, mastectomy in 15%, and patients reported being offered a choice between the two procedures in 37% of cases. Greater patient involvement in the decision-making process was significantly correlated with treatment by mastectomy after adjustment for multiple clinical and demographic variables. Only 5.6% of women whose surgeon made the treatment decision had a mastectomy, as compared with 16.9% who reported a shared decision and 27% of women who reported that they made the decision ($P = 0.003$).

Concerning about disease recurrence was the most influential factor in treatment choice, 40% of women has reported that their treatment choice was greatly influenced by this concern.

Concerns about disease recurrence were strongly associated with receipt of mastectomy; 52% of women who were greatly concerned about disease recurrence received a mastectomy, as compared with 19% of those who were not influenced, or only slightly influenced, by this concern ($P < 0.001$) (2).

Patients expressed a high level of confidence in decision making, with more than 80% of women of all ages being very or extremely confident about their treatment choice. However, fewer than 50% were able to answer correctly a true-false question about the lack of a survival difference after treatment by mastectomy or lumpectomy and radiation.

We also examined the match between decision control and patient preference in a subset of 120 patients with no contraindications to breast-conserving therapy who were treated by 17 surgeons (2). We found a rate of mismatch between desired and actual level of involvement of 31%. In 20% of cases actual involvement in decision making was greater than preferred, whereas in 11% it was less than preferred. 20% of patients reported that they asked for, but did not receive a treatment recommendation, and 16% noted that they did not ask for but received a treatment recommendation. Patients who perceived too little involvement in the decision-making process were younger, reported that only one treatment option (mastectomy or breast conservation) was discussed, and were more likely to have been seen by a high-volume surgeon. Patients who perceived too much involvement in decision making had lower levels of education and felt that they asked for but did not receive a treatment recommendation. Lack of satisfaction with the decision-making process was expressed by 37%, lack of satisfaction with the relationship with the surgeon by 23%, and lack of satisfaction with communication with the surgeon by 24% of patients (3, 4).

CONCLUSIONS

Satisfaction with the decision-making process did not correlate with surgeon sex, years in practice, or treatment in a cancer centre. Increased satisfaction with decision making was significantly associated with high-volume breast surgeons, and a trend toward increased satisfaction with higher breast surgery volume was observed for other aspects of the treatment selection process.

The results of these studies suggest that although patients believe that they are informed about their treatment choices and are confident in their decisions, major knowledge gaps exist. In addition, for a significant number of patients there is a mismatch between the preferred level of involvement in decision making and what actually occurs. As in the treatment of breast cancer, the style of decision making must be tailored individually.

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