

Psychosocial Aspects of Mastectomy: I. The Woman's Perspective

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The authors administered a questionnaire to 41 women who had had mastectomies to investigate aspects of the procedure itself, pre- and postmastectomy adjustment, effects on sexual relationships, and the influence of age. Although most women reported good overall adjustment, there were strong indications of psychological suffering (suicidal ideation, increased use of alcohol and tranquilizers, etc.). Psychological intervention may be called for in many cases, and age, support systems, and premorbid functioning may be indicators of the amount and type of intervention needed. Counseling is particularly important before surgery, since this was viewed as the period of maximum stress by most women. Further research with larger, more random samples and postsurgical control groups is indicated to determine more precisely the factors related to adjustment to mastectomy.

ALTHOUGH the psychiatric literature, particularly the psychosomatic literature, contains many studies purporting to describe the personality and psychodynamics of the breast cancer patient (1-5), there was very little written until quite recently on the emotional upheavals that women must endure after mastectomy. However, in the past few years, increasing emphasis has been placed on psychosocial aspects of mastectomy (6-9), and the roles of surgeons, liaison psychiatrists, and self-help groups in pre- and postmastectomy care are becoming better defined. Our goal in undertaking the research reported herein was to examine more systematically and explicitly the psychological effects of mastectomy. Major areas of investigation included: 1) general demographic characteristics of the sample, 2) findings pertaining to the mastectomy procedure itself, 3) general emotional and psychological adjustments before and after mastectomy, 4) the effect

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of mastectomy on sexual relationships, 5) comparison of women who reported suicidal ideation after the mastectomy with those who did not, and 6) comparison of women younger than 45 years old with older women. We also investigated the reactions of 31 men to their wives' mastectomies in a similar questionnaire study that will be reported in the next issue of the *Journal* (10).

METHOD

Subjects and Procedure

The 41 women in our sample were drawn from two sources—half came from the Women for Women self-help recovery group (started and primarily located in Los Angeles) and half came from the American Cancer Society. It is clear from the demographic data reported below that a strong self-selection factor was operating; this resulted in a somewhat biased sample.

Each woman was given an extensive questionnaire designed to examine various aspects of the mastectomy procedure, emotional responses before and after the surgery, perceptions of effects of the mastectomy on relationships with spouses (both sexually and generally), and attitudes toward surgeons and the nursing staff in the hospital. In addition, subjects were asked to complete the Locke-Wallace Marital Adjustment Test, the Rotter Internal-External Locus of Control Scale (I-E), and the Eysenck Personality Inventory (EPI).

Characteristics of Sample

The mean age of our sample (N=41) was 52.7 years (range, 32-70); 95% were Caucasian. The mean family income was approximately \$15,000. Eighty percent of the women were married, 10% widowed, and 10% single. Religious distribution was as follows: 40% Protestant, 35% Jewish, and 10% Catholic. The mean number of years that the women had been married to their spouses was 23.0. The mean number of months since the mastectomy was 22, with a median of 10 months.

Data Analysis

The data from the questionnaire were coded, the personality test data were scored, and frequency distributions were obtained for all variables. Means and standard deviations were computed for continuous variables and significance was assessed by t tests or chi-square analyses. Intercorrelations were obtained for all continuous variables.

RESULTS

Premastectomy Behavior

In describing the events leading up to mastectomy, 85% of the women stated that they themselves first discovered the lump or abnormality in their breasts; 13% of the lumps were discovered by physicians and 2% by husbands or lovers. The mean number of days between discovery of the lump and examination by a physician was 23.0 (SD=34.6), with a median of 6 days. It is of both psychological and clinical interest to note that 10% of these women waited longer than 3 months to see a physician. The mean length of time between initial medical examination and biopsy was 27 days (median=10). The overwhelming majority of women (88%) had their mastectomies immediately after biopsy: only 7% asked for a second opinion.

The women were asked whether or not they thought at the time of the biopsy that they would require a mastectomy. Thirty-six percent said they thought they almost certainly would need a mastectomy or were fairly likely to need one, and 21% thought the chances were 50-50. Over two-fifths (44%) of the women stated that they understood it would be fairly or extremely unlikely that they would require a mastectomy. The most common procedure was a modified radical mastectomy (54%). Radical mastectomies were performed in 44% of the cases and simple mastectomies in only 2%.

Postmastectomy Emotional Adjustment

In describing their overall postmastectomy emotional adjustment, 60% of the women in the study judged it excellent or very good, 23% good, 7% adequate, and 10% not very good, poor, or very poor. Those women who reported better emotional adjustment had significantly lower scores on the EPI Neuroticism Scale ($p < .05$), a more external locus of control on the Rotter I-E Scale ($p < .003$), had been married longer ($p < .04$), were older ($p < .04$), and perceived significantly more understanding and emotional support from their physicians ($p < .03$), spouses ($p < .02$), surgeons ($p < .03$), nursing staff in the hospital ($p < .01$), and their children ($p < .01$).

For the entire sample, the primary sources of perceived emotional support were spouses and friends, with surgeons and nursing staff evaluated as least supportive. More than two-fifths of the women (42.1%) reported that the worst time from an emotional or psychological standpoint was immediately after the lump was discovered. The other two periods cited as being most emotionally difficult were the postoperative period in the hospital (15.8%) and the second and third months after surgery (15.8%). The initial period of time at home after surgery was not assessed as a particularly difficult time by most women.

In an attempt to ascertain the degree of clinical depression, we asked the women specific questions about any changes in appetite, sexual behavior, sleep patterns, tranquilizer and alcohol use, suicidal idea-

TABLE 1
Perceived Effects of Mastectomy on Sexual Adjustment*

Variable	Number	Percent
Rating of spouse's reaction		
Extremely understanding	18	51.4
Very understanding	7	20.0
Somewhat understanding	5	14.3
Not very understanding	2	5.7
Not at all understanding	3	8.6
Woman seen naked by spouse after mastectomy		
Yes	27	77.0
No	8	23.0
Intercourse with spouse postmastectomy		
Yes	30	85.7
No	5	14.3
Effect on coital orgasm		
Made it impossible or more difficult	7	23.3
No difference	22	73.3
Made it easier	1	3.3
Sexual satisfaction in relationship		
No change	21	63.6
Worse	8	24.2
Better	4	12.1
Frequency of intercourse		
No change	27	75.8
Less often	2	21.2
More often	1	3.0
Number of extramarital affairs		
No change	31	81.6
Increase	3	7.9
Decrease	4	10.5

*Ns for variables differ due to missing responses.

tion, and seeking of professional help. Approximately one-fourth (24.4%) of the women stated that they had had suicidal ideation after the mastectomy. More than a third (35.9%) stated that their tranquilizer use was greater or much greater than it had been before the mastectomy, and 15.4% reported that their alcohol use significantly increased. An increase in problematic sleep patterns was reported by 9.8%, 7.3% reported a significant decrease in appetite, and 2.7% a decrease in sexual interest or activity. Of our sample, 14.6% sought professional help for emotional problems related to mastectomy. An undetermined percentage of the subjects were already in psychotherapy and presumably had that available as part of their support systems. Phantom breast sensation (usually pain but occasionally other sensations, either erotic or "tingling" in nature) was experienced by 53.7% of the women. Of those reporting such sensations, 80% experienced them as painful, but only 42% reported this phenomenon to their physicians.

The amount of time spent talking about the emotional aspects of mastectomy with either spouse or significant other was rated as "little or none" by 89% prior to surgery, 87% while in the hospital, and 50% after returning home. These data reveal that discussion of emotional repercussions did not occur at the times of perceived maximum emotional stress (i.e., after discovery of the lump and immediately after surgery while still in the hospital) but was postponed until the women returned home.

TABLE 2
Comparison of Women With and Without Postmastectomy Suicidal Ideation*

Variable	Suicidal Group (N=10)			Nonsuicidal Group (N=31)			Significance**
	N	Mean	SD	N	Mean	SD	
EPI neuroticism score	10	13.8	4.7	31	8.2	4.0	p<.001
Evaluation of emotional support received from surgeon	9	2.7	1.8	30	3.7	0.7	p<.001
Use of tranquilizers postmastectomy	10	3.9	0.9	29	3.2	0.8	p<.03
Rating of emotional adjustment to mastectomy	9	4.2	1.9	31	6.0	1.1	p<.001
Rating of personal sexual satisfaction premastectomy	8	4.1	0.6	27	3.3	1.2	p<.05
Rating of spouse's sexual satisfaction premastectomy	8	4.1	1.0	27	3.3	1.0	p<.04
Level of anxiety about resuming sexual activity postmastectomy	7	3.9	1.2	25	2.3	1.4	p<.01
Responsiveness to the possibility of breast reconstructive surgery	8	3.8	1.0	30	2.5	1.4	p<.03

*Rating scales ranged 1-5 for all variables except emotional support from surgeon (1-4); higher numbers indicate higher ratings. Ns for each item indicate number of respondents on that item.

**All analysis by t test.

Effect of Mastectomy on Sexual Relationships

One of the most pervasive assumptions about mastectomy is that it has profound negative effects on the woman's body image and her sexual relationships. In addition to the more quantitative data presented in table 1, we asked several open-ended questions about the woman's impressions of the mastectomy procedure, the effect on the sexual relationship, and the reactions of her male partner to seeing her naked for the first time postmastectomy. One woman made the graphic remark, "I will always remember the pain in my chest immediately after waking up from surgery. I felt I had been crucified on the table, I could not stop crying. The cost of surgery is extremely high." The women's comments on their partner's reaction to seeing them naked ranged from "very reassuring, minimized the change, emphasized other positive attributes" to "repulsed," with many women reporting reactions somewhere in between, e.g., "He pretended to be indifferent, but I am sure it was quite a shock," and "I volunteered to show him and he said nothing—made an attempt—but he covered my one breast. He is not anxious to expose himself to this experience."

Similarly, there was marked variance in the responses of the women when they were asked about the overall effect of mastectomy on their sexual relationships. These responses ranged from "no change" to "My deep depression has destroyed my libido. I have no sex drive now at all. I am hostile, angry, outraged and emotionally hate men, though not intellectually," and "I have always enjoyed sex with the person I love to a great extent and have been multiorgasmic. But that is over because love from a man is. I am now a freak; I couldn't inflict this upon a man."

Effect of Age on Mastectomy

It was hypothesized that the younger the woman, the more profound the emotional impact of mastectomy was likely to be. Accordingly, we divided our sample into women 45 years old or older (N=25) and those under 45 (N=16). We found that the younger women did rate their postmastectomy adjustment as significantly poorer (F=5.15, p<.02), that a higher percentage of this group sought professional help for psychological problems secondary to mastectomy ($\chi^2=4.4$, p<.03), and that more of these women perceived the mastectomy as having had a negative influence on their sexual relationships (F=5.1, p<.03).

Postmastectomy Suicidal Ideation

Of considerable clinical concern is the finding that one-fourth of the women we surveyed had considered killing themselves for reasons they associated with, or depression and other emotional reactions to, their mastectomies. We compared these women with those who stated they at no time had considered suicide as a possibility.

It can be seen in table 2 that the women who had postmastectomy suicidal ideation rated their pre-mastectomy sexual satisfaction with their mates significantly higher than did the other women. Likewise, a significantly higher proportion of this group had sought a second opinion on the biopsy (22% versus 3.4%, p<.05). They also had more negative views of the amount of understanding shown them by their physicians and surgeons, poorer emotional postmastectomy adjustment, more anxiety about resuming a sexual relationship with their mates, and more positive attitudes toward the possibility of breast reconstructive

surgery. It is possible that these women had been much more invested in their sexuality before the mastectomy and thus suffered larger loss and grief reaction after their surgery. Other possibilities are that they were using less denial or that they were, in fact, generally less well-adjusted emotionally before their mastectomies.

COMMENT

After analyzing our data we were impressed that, in accord with findings reported by Ervin (8), emotional suffering appears to far outweigh the physical pain in women who have undergone mastectomy. In addition, the general areas that Asken (7) outlined as being particularly salient to these patients—sense of mutilation, loss of feelings of femininity, and fear of death—were reaffirmed in our study. However, there were also some strong indications of successful coping. For example, 71% of the women rated their husbands' reactions to the mastectomy as extremely or very understanding, 76% felt that the loss of a breast made no difference or had a positive effect on their sexual satisfaction or their ability to be orgasmic, and 60% rated their overall postmastectomy adjustment as excellent or very good. However, it is possible that many of these women were simply using more denial than the women who stated they had considerable or profound problems in dealing with themselves and/or their husbands postsurgery.

A sizable proportion of women, however, suffered a great deal as a result of what they perceived to be mutilating, defeminizing, and disfiguring surgical procedures. Several relevant clinical interventions for these women, and possibly for a substantial percentage of the "good adjusters" as well, emerge from an examination of the data. First, the woman's age, support systems, and level of premastectomy functioning determine to a large extent the amount and type of psychological intervention most applicable to her needs. Second, the timing of the intervention is clearly important, as is the necessity for realistic premastectomy counseling (approximately 45% of the women in our study thought at the time of the biopsy that it was fairly or extremely likely that they would *not* have to have a mastectomy). As almost half of the women (42%) judged this premastectomy period as the worst time for them emotionally, it might be advisable to do some counseling at this period of maximum stress.

Further areas for psychological intervention might include arrangements for psychotherapy for those women judged to be at high risk for severe postmastectomy depression and sexual counseling for women who feel that their sexual relationships have suffered as a result of the mastectomy. Another important area is the education and counseling of nursing staff on the surgical ward to increase the understanding of the special problems with which a mastectomy

patient must deal, as well as understanding the problems the nurses themselves will face. These include their own fears and identification with mastectomy patients, which may result in hostility toward them. In addition, conjoint marital therapy or family therapy may be necessary.

It is obvious that further studies need to be done using larger, random samples of women from more varied socioeconomic and ethnic backgrounds. The women in our sample were from a higher social class, were better educated, a greater percentage were Jewish, and they were probably older than the entire population of women who have had mastectomies (although this is difficult to ascertain because so few studies have been done). This bias may well have resulted in a sample of women who were more financially stable and more likely to be well-informed medically and to demand and receive good medical care. Similarly, some of the more pragmatic sequelae of mastectomy (e.g., job loss with attendant loss of income, loss of health insurance), as well as factors such as inability to afford psychotherapy, may have been less important to these women than they would be to less educated women with fewer financial resources. Differences in the effects of mastectomy on emotional and sexual adjustment among varying classes and groups of women are, of course, unstudied but empirical questions. Additionally, it is clear from our data that the effects of mastectomy are much more far-reaching in younger women, and this is almost certainly true for unmarried or divorced women as well. Our sample was composed primarily of married women, so this relationship was not examined here, but it is an important one to consider in future studies.

In order to ferret out effects due strictly to the mastectomy, it would be desirable to use at least two control groups: a postoperative group of general surgical patients to tease out the effect of surgery, and a group of women who have had surgery such as hysterectomy for uterine cancer to separate out the effects of surgery for a life-threatening disease and to examine the effects of another potentially defeminizing procedure, but one with no impact on appearance. A major aspect of mastectomy, which was not studied here because this was a questionnaire study and there is an ethical problem in broaching an area that is potentially very traumatic without being able to provide clinical intervention, is the issue of death and of the possibility of metastases and/or a second mastectomy, with or without supplemental radiation treatment and chemotherapy.

Future studies might also profit from using prospective rather than retrospective techniques and applying more sophisticated statistical techniques (e.g., multiple regression analyses) that are applicable with a larger sample size. Such techniques might well add to the predictive power of demographic, personality, and social variables in attempting to pinpoint those women at high risk for serious adverse reactions to mastectomy (severe depression with or without marked suicidal

ideation and unremitting phantom breast pain). It is hoped that such women could be identified early and given maximum psychological treatment.

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ABPN Announces New Policies for Applicants with Non-U.S. Training Qualifications and New Criterion for PGY-1 Abroad

At its November 17-19, 1977, policy meeting, the American Board of Psychiatry and Neurology, Inc., approved the policy changes outlined below. The new policy regarding applicants with non-U.S. training qualifications is a redefinition of the Board's Program for Special Training and Qualifications (PSTQ).

The following regulations relate only to the admission of candidates to the written and, subsequently, to the oral examination.

APPLICANTS WITH NON-U.S. TRAINING QUALIFICATIONS

The criteria for admission to examination for applicants with non-U.S. training qualifications are as follows:

- 1) The candidate must have had full-time specialty training in a manner equivalent in length of time and content to that required for U.S. training,
- 2) The candidate must successfully complete a certification examination in the country of training in the specialty in which the physician is seeking admission to examination,
- 3) The candidate must possess an unlimited license to practice medicine in a state or commonwealth of the United States or a province of Canada, and
- 4) The candidate must have achieved certification within the past seven (7) years. If this occurred earlier, the candidate must have had one year of clinical practice in a setting in which his/her professional work has been observed by at least two ABPN diplomates in that specialty and documented by two letters of sponsorship from such diplomates.

CRITERION FOR PGY-1 ABROAD

For those candidates who have completed the first postgraduate year of training in a training center located outside the United States or Canada, the following criterion will be acceptable:

The candidate must have completed a full year of supervised postgraduate training equivalent to that required by the Board for United States and Canadian graduates as evidenced by appropriate documentation. This documentation should consist of a letter of verification from the institution at which the training was taken and from the person who was in charge of the training. The burden of verification for this year rests with the candidate.