Development and Validation of the Body Image Scale among Thai Breast Cancer Patients

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Objective: *To examine the psychometric property of the Thai version of the Body Image Scale (BIS) in breast cancer patients in Thailand.*
Material and Method: *The authors conducted a cross-culture translation of the BIS into the Thai language and administered it to 242 breast cancer patients who had surgery and had completed chemo-radiation for more than one year.*
Results: *The present study confirmed a good reliability and validity of Thai version of BIS. The questionnaire has high internal and external consistency; Cronbach's alpha was above 0.8 and test-retest reliability was more than 0.7. Content validity was confirmed by expert opinion and cognitive interview with breast cancer patients. Construct validity was examined though factor analysis showed a single-factor solution which excludes one item from the original 10-item scale. Discriminant validity which confirmed by different score between mastectomy and breast conserving surgery group and good response prevalence also supported the clinical validity of the test.*
Conclusion: *Thai version of the BIS showed a good psychometric property and can be used as a patient-physician communication and quality of life evaluation tool after breast cancer treatment in Thai women.*

Keywords: *Body image, Quality of life, Breast cancer, Thai version*

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The incidence of breast cancer has been increasing worldwide. In Thailand, breast cancer has become the most common cancer in women. A nationwide study found that the age-standardized incidence rate (ASR) of breast cancer in Thai women rose from 17.2 in 1996 to 20.9 per 100,000 in year 2003, a number which has been on the rise during the past ten years. Due to improved treatment outcomes, breast cancer survivors have been able to live longer. Therefore, the aim of treatment has now gone beyond cure towards attaining a good quality of life.

Breast conserving surgery has emerged as an alternative to mastectomy for early-stage breast cancer patients, an option which improves cosmetic outcome and quality of life. Although achieving better cosmetic results than mastectomy, breast conservation still leaves significant deformities in 20-30% of patients[1-3]. In addition to a permanent fear of a relapse of their malignancy, breast cancer survivors deal with physical defects resulting from treatment, including changes in appearance or limited motility of the upper limb, which adversely affects quality of life. This psychological distress can persist for many years after the diagnosis.

Many studies[4-8] have reported a correlation between cosmetic results and quality of life, level of anxiety, depression, sexuality and self-esteem[9]. Moreover, it has also been found that the type of breast cancer surgery, including mastectomy, mastectomy with reconstruction and breast conserving therapy, caused different degrees of psychological morbidity. The results emphasize that change of breast appearance in breast cancer survivors affect their mood and the way they feel about themselves[10]. Adverse squeal of treatment have greater impact on the femininity and sexuality of younger patients[11]. Post-surgical physical changes, which range from aesthetic to life-threatening, impact a woman's sense of well-being and adjustment in later life. Cosmetic appeal, a significant aspect of quality of life, is an important part of post-operative assessment and should be integrated into the comprehensive assessment of breast cancer surgery.

Although breast cancer treatment outcomes in Thailand are not far from the international standard in terms of recurrence and survival rates, studies

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concerning patients' perceptions about their body image after breast cancer surgery are not available. Due to differences in culture and language between the West and Thailand, there has been no validated measurement for body image assessment specific to Thai breast cancer patients. The present study aims to develop and evaluate the validity and reliability of the Thai version of the Body Image Scale for use in Thai breast cancer patients.

The Body Image Scale (BIS) was developed by Hopwood et al[12], aiming to evaluate cancer patients' perception of their body image. It leans toward an affective-cognitive-behavioral model of body image disturbance[13]. This 10-item scale showed high reliability and clinical validity in testing among cancer patients. Although the BIS was constructed for use in all cancer patients, it has been clinically tested and validated in breast cancer groups[5,7,14-16]. Due to its brief and good psychometric properties, this questionnaire is suitable for evaluation of body image in Thai breast cancer survivors.

Material and Method

Participants and procedure

Between April 2011 and July 2011, the authors recruited 242 breast cancer patients who were diagnosed for at least 12 months, underwent unilateral breast cancer surgery and completed their course of chemo-radiation and were aged more than 18 years. The authors excluded patients previously diagnosed with mental and psychological disorders, had a Karnofsky Performance Scale of less than 80% and who were illiterate. Sample size was calculated by using the confidential interval which was derived for Person correlation when reliability was at less 0.70, α level of 0.05, confidential interval width equal to 0.10 and approximately 80% response rate for mailing back of questionnaires.

After obtaining ethical approval from the Institutional Review Board of the Faculty of Medicine of Srinakharinwirot University and Mahavajiralongkorn Cancer Center, eligible breast cancer patients who attended out-patient clinics during routine follow-up were consecutively invited to participate in the present study. All participants were given detailed research objectives before they gave informed consent and completed the first self-administered Thai version of the BIS. Postage-paid, pre-addressed envelopes containing the second questionnaire were given to the participants before leaving the clinic. Participants were asked to complete the second questionnaire after two weeks and mail it back. Phone reminder was done on the due date and 3 days afterward. All demographic and clinical data were collected from medical records.

Measures

The Body Image Scale (BIS) is a 10-item scale used a 4-point scale for rating the symptom/distress: "not at all" (score 0), "a little" (score 1), "quite a bit" (score 2) and "very much" (score 3). Each score is then summed up to produce overall scores for each patient. Scores rank from 0 to 30. Lower scores mean fewer adverse symptoms, reflecting better perception of body image. The missing score in one or two items of the BIS were replaced by the mean of the items to which the participants responded.

After getting permission from the BIS developer and publisher, cross-cultural adaptation and translation was done[17]. Firstly, forward translation of the BIS from English into the Thai version was performed by a team of bilingual translators who are native Thai speakers. The backward translation into English was done by another independent translator. Both versions of the BIS were refined for content and word format by five independent experts, including bilingual health professionals: two independent surgeons, a radio-oncologist, an experienced nurse, and a linguist. Cognitive interviews by think around technique with 20 breast cancer patients were performed by the principal investigator. Each participant was asked to make suggestions, including alternative wording or paraphrasing for each item. The interview was mainly focused on items which were difficult to answer, confusing, difficult to understand, upsetting, offensive, or redundant. The wording of questions was modified to suit the Thai cultural context while maintaining the same meaning. The item "feeling self-conscious about your appearance" was stood out during the cognitive interview as being difficult to understand. This concept is common in the West but not relevant to Thai culture. The finalized Thai version of the BIS was administered to 242 breast cancer patients for psychometric property evaluation.

Statistical analysis

The following analysis used the Statistical Package for Social Sciences Version 15 (SPSS Inc., Chicago, IL, USA) for evaluating the psychometric property of the Thai version of the BIS. Patient characteristics were reported as a whole sample and in subgroups according to surgical procedures. The internal consistency was measured by Cronbach's

alpha and the estimated acceptable value was 0.70 or greater. External consistency was measured by test-retest reliability. Due to disease stability, two-week duration was chosen for test-retest analysis. Both initial scores and those received two weeks later were tested by intraclass correlation coefficient which was expected to be at least 0.70.

The clinical validity was evaluated by response prevalence, discriminant validity and factor analysis. Response prevalence was calculated by dividing the number of participants who scored 1, 2 and 3 by the total number of women who completed those items, multiplied by 100. A ratio of more than 30% was acceptable[18]. Discriminant validity compared scores between the mastectomy group and those who received breast conserving therapy using the Mann-Whitney test for analysis. Factor analysis was used to confirm the structure and validity of the test, and examined the relationship between each scale and group scale. Acceptable first component variance was more than 0.40, and factor loading was more than 0.30 in most items.

Results

Participants' demographic and clinical data are presented in Table 1. Mean age for all participants and subgroups was 50 years. Eighty percent of participants underwent mastectomy while 16.9% had breast conserving therapy, and only 2.5% had reconstruction after mastectomy. Because of the small number of patients with reconstruction, the authors did not analyze it separately. Mean duration after operation was 3.3 years in the mastectomy subgroup and 2.7 years in the breast conserving therapy group. Most of the participants were married while only 14% were single. Forty-seven percent of the participants attended primary school, 25.6% attended secondary school and 26.9% received college-level (or higher) education. Sixty-one percent of participants had regular jobs and 38.8% were housewives. Most of the parti-cipants had early-stage breast cancer. Ninety-one percent of patients received chemotherapy, 74.8% underwent radiation and 71.1% received hormonal treatment (Table 1). Characteristics from this sample were similar to report of breast cancer patients from cancer registration in Thailand 2003. Back-mailing of the second administrated questionnaire was 220 from 242 questionnaires, 91.32%, which was relatively high.

Analysis of psychometric property

Missing data were found in 13 questionnaires from both episodes, of which twelve had one item missing and one questionnaire had two items missing. Impute scores were done as described previously. Four data were found missing in Item 10 "Dissatisfied your scar", three missing in Item 5 "Difficult to look at yourself" and Item 6 "Less sexually attractive" and one missing in Item 1, 2, 3, 4, and 7.

Endorsement of test items

In cognitive interviews, all items were modified using comments from 20 breast cancer patients. No items were deleted. Frequent comments were made on Item 1, "Have you been feeling self-conscious about your appearance", as some patients were confused about the meaning of the question, which reflected cultural difference.

Factor analysis

The Kaiser-Meyer-Olkin measure of sampling adequacy was 0.869 and p-value from Bartlett's test was less than 0.001. Both results demonstrated that it was appropriate to use factor analysis. The initial exploratory factory analysis with oblique rotation extracted two factors. The first factor showed 39.57% variance comprising item 4 to 10 and the second component had 12.08% variance comprising Item 1 to 3. However, two-factor solution result could not be explained by the theory of the questionnaire. Moreover, the original article was based on a single-factor solution. Thus, an exploratory factor analysis on a single-factor solution was performed. The result showed 43.28% variance in one component dimension which excluded Item 1 "self-conscious about your appearance" from the model. Factor loading ranged from 0.59 to 0.74. The 2nd administrated questionnaire also showed a similar result, with 49.86% variance loaded in one component which was comprised of nine items, not including Item 1.

Reliability

Cronbach's alpha for the 10-item BIS showed good reliability for the whole sample, the mastectomy group and the BCT group (0.82, 0.82 and 0.75 respectively). In the whole sample, the corrected item-total correlation varied from 0.22 to 0.63 (Table 2). Item 1 was excluded from the analysis due to incomprehensiveness from the cognitive interview and results of the factor analysis. The Cronbach's alpha increased to 0.82 in the whole sample, 0.83 in the mastectomy group and 0.811 in the BCT group.

Test-retest reliability compared the summary

Table 1. Demographic and clinical characteristics of participants

	Total sample n = 242	Mastectomy subgroup n = 194	BCT subgroup n = 41
Age (year) mean ±SD	50.5 ± 9.6	50.3 ± 9.6	50.9 ± 10.1
Duration after diagnosis (year) mean± SD	3 ± 2.3	3.3 ± 2.3	2.7 ± 1.8
	n (%)	n (%)	n (%)
Marital status			
Married	151 (62.4)	118 (60.8)	27 (65.9)
Single	34 (14.0)	27 (13.9)	6 (14.6)
Divorced/widowed/separated	57 (23.6)	49 (25.3)	8 (19.5)
Education*			
Primary school	114 (47.1)	98 (50.8)	13 (31.7)
Secondary school	62 (25.6)	50 (25.9)	10 (24.4)
College or higher	65 (26.9)	45 (23.3)	18 (43.9)
Occupation			
Housewife	94 (38.8)	76 (39.2)	14 (34.1)
Government/private officer	52 (21.5)	35 (18)	15 (36.6)
Manual labor	38 (15.3)	35 (18.0)	3 (7.3)
Agriculture	15 (6.2)	15 (7.7)	0
Self employed	43 (17.8)	33 (17.0)	1 (16.7)
Cancer staging*			
Early stage	159 (65.7)	119 (61.7)	37 (90.2)
Advanced stage	82 (33.9)	74 (38.3)	4 (9.8)
Chemotherapy			
Yes	221 (91.3)	185 (95.4)	30 (73.2)
No	21 (8.7)	9 (4.6)	11 (26.8)
Radiation			
Yes	181 (74.8)	134 (69.1)	41 (100)
No	61 (25.2)	60 (30.9)	0
Hormonal treatment*			
Yes	172 (71.1)	138 (71.1)	28 (68.3)
No	68 (28.1)	55 (28.4)	13 (31.7)

* Missing information on staging (1 = 0.4%), education (1 = 0.4%), hormonal treatment (2 = 0.8%), surgery type (1 = 0.4%), data of mastectomy with reconstruction (n = 6) were not shown here

scores of nine items from two sets which were collected from the same participants two weeks apart. All participants were requested to send the second questionnaire back by mail. There was a significant correlation between two sets of scores; Intraclass correlation coefficient was more than 0.7 in the whole sample, as well as in the mastectomy and BCT subgroups. Wilcoxon signed rank test also shown no statistical significance between the two sets of score in all sample groups (Table 3).

Clinical validity

Response prevalence in the full sample ranged from 29.8% to 82.2%. In Item 7 "Avoid people", the response rate was less than 30% in the full sample, BCT subgroup and the mastectomy with reconstruction group. These results reflect the difference in culture and characteristics of the participants in comparison with the original paper. However, the response rate in mastectomy group was still more than 30%. In the BCT subgroup, the response prevalence of Item 4 "Feeling less feminine", Item 6 "Less sexually attractive" and Item 7 "Avoid people", were less than 30%, with was consistent with indifferent image changes in these groups. The results in the mastectomy with reconstruction group were similar to the BCT group as there were few body changes in this group as well (Table 3).

Table 2. Descriptive item analysis

Scale item	Mean	SD	Median	Corrected item-total correlation	Cronbach's alpha if item deleted	Percent response prevalence			
						Total sample (n = 242)	Mastectomy (n = 194)	BCT (n = 41)	Mastectomy with reconstruction (n = 6)
1. Self-conscious	1.46	0.97	1	0.23	0.83	82.24	81.45	82.93	100.0
2. Less physically attractive	0.74	0.88	0	0.51	0.77	49.59	50.52	43.91	50.0
3. Dissatisfied with your appearance	0.83	0.81	1	0.54	0.79	61.58	63.92	51.22	50.0
4. Feeling less feminine	0.49	0.73	0	0.56	0.79	37.20	39.18	26.83	33.33
5. Difficult to look at yourself	0.76	0.85	1	0.55	0.79	55.00	59.28	39.03	16.67
6. Less sexually attractive	0.57	0.83	0	0.56	0.79	38.85	41.76	24.40	33.33
7. Avoid people	0.38	0.67	0	0.53	0.79	29.76	31.96	22.0	0
8. Body less whole	0.55	0.73	0	0.49	0.79	42.98	44.33	39.03	16.67
9. Dissatisfied with your body	0.64	0.75	1	0.63	0.78	50.42	53.10	36.59	50.0
10. Dissatisfied your scar	0.71	0.81	1	0.44	0.80	52.48	55.68	39.03	33.33

Discriminant validity was assessed by comparing the summary scores of items 2 to 10 between the mastectomy and BCT groups which were expected to be high in the mastectomy group and low in the BCT group according to different degrees of body image disturbance. Mean BIS in the mastectomy and BCT groups from the first and second questionnaires were 6.10, 3.70, 6.27, and 3.50 consecutively, which shows statistically significant differences ($p = 0.002$ and < 0.001, Mann-Whitney test) (Table 3). Thus, the BIS show a high rate of discriminant validity.

Correlation of the BIS score to other variables was also examined. Comparing the BIS scores in patients aged above or below 50-years old, duration after operation and educational level showed no statistical significance ($p = 0.18$, 0.35 and 0.38, Mann-Whitney test). However, the score demonstrated statistical difference between married and single patients ($p = 0.03$).

Discussion

The present study findings support good reliability and validity of a Thai version of the BIS in Thai breast cancer patients. The high rate of questionnaire return and the low rate of missing items showed good acceptability and cooperation from patients. Missing Item 10 "Dissatisfied with your scar", may be caused by the Hawthorne effect. Our factor analysis, which excluded Item 1, contained a one-factor solution as in the original article and the Portuguese version[12,19]. Factor analysis was performed on both episodes of administration and got the same result; 43% and 49.86% variance were loaded on the single factor.

The Thai version of the BIS also showed good internal consistency in breast cancer patients; the alpha level was more than 0.7 in whole sample and in all subgroups and the corrected item-total correlation were all more than 0.2. Therefore, the questionnaire is applicable at group levels but may be limited for exploring data at the individual level. Only Item 1 "Self-conscious about your appearance" had a slightly low corrected item-total correlation of 0.22 and the alpha level was increased to 0.83 when this item was deleted. Results from the statistical analysis as well as our discovery of the incomprehensiveness of Item 1 during the cognitive interview led to our decision to delete this item from the following analysis. The authors presumed that it resulted from differences in culture and the way of life in which Thai women feel less concerned about their appearance or may cause form

Table 3. Descriptive item correlation

BIS	Total sample	Mastectomy subgroup	BCT subgroup
First score (n = 242)			
Mean (SD)	5.66 (4.62)	6.10 (4.73)	3.70 (3.45)
Median (IQR 25,75)	5 (2,8)	5 (2,8)	2 (1,6.50)
Range	0-22	0-22	0-12
Second score (n = 221)			
Mean (SD)	5.75 (5.20)	6.27 (5.28)	3.50 (4.53)
Median (IQR 25,75)	4 (2,8.5)	5 (2,9)	2 (1,5.25)
Range	0-23	0-23	0-23
Intraclass correlation coefficient	0.86	0.86	0.86
Wilcoxon signed rank test (p-value)	0.67	0.87	0.34

ambiguous meaning of the first item. The questionnaire needs to be revised if the researchers need to use all 10-items.

Although the percentage of response prevalence in Item 7 was less than 30% in the whole sample and the BCT group, which was similar to the original paper and the Greek version[16], this item was retained in the questionnaire because more than 30% of patients in the mastectomy group rated their score more than zero.

The Thai version of the BIS also showed good external consistency. The questionnaire had high correlations between two difference episodes of scores in the whole sample and all subgroups. The Wilcoxon signed rank test also showed no difference between sums of two scores, which means the questionnaire can measure stability of disease in a preferred range of time. The discriminant validity also showed statistical difference between the mastectomy and the BCT group, which means this questionnaire, can detect differences in the expected group with altered body image. The results were consistent with Baxter et al[20], showing that mastectomy patients had higher levels of body image disturbance compared to breast conserving therapy patients and the BCT group also had some degree of body stigma.

Evaluation of the association of body image with other variables found that the score was not different between younger and older patients, duration after surgery and educational level. Although this result was not consistent with the original article, it was similar to results from other versions[16,19] which showed that age, duration after surgery and educational level did not affect the feeling of body disturbance. The difference of BIS scores between single and married participants confirmed that perception of body image could be affected by marital status. Many studies[9,21-23] also reported that breast cancer and its treatment resulted in marital dissatisfaction and sexual dysfunction, of which the mastectomy group was more affected.

The present study is the first report on body image after breast cancer treatment in Thai breast cancer patients. It reflects patients' perception and satisfaction of body appearance in a different language and culture from other studies. Thai patients are less concerned about their appearance than Westerners[24]. This may result from the traditional lifestyle and culture in which Thai women are more concern with filial duties and housework than social activity. This is assumed from the overall sum score which was lower than in the original paper and other languages. Moreover, Item 1 "Self-conscious about your appearance" was excluded from the final version and Item 7 "Avoiding other people" were rated lower than other items.

The present study had some limitations that should be considered when interpreting results. Firstly, our study was cross-sectional so there may be some limitations for interpretation of the property of the scale in detecting the change of body image over time, as well as sensitivity to change of the scales, which is one criteria of clinical validation. Further studies should be conducted to explore the longitudinal change of body image. Secondly, the authors enrolled every participant who visited the clinic and was interested in the present study, so it may result in selection bias. Future studies should include equal numbers of participants treated with mastectomy, breast conserving surgery and mastectomy with reconstruction so the result can be analyzed by subgroups.

Thai version of the Body Image Scale (BIS) has been proved to have good psychometric property

in Thais breast cancer patients. Due to its brevity and high correlation between each item, it can be used to evaluate body image after breast cancer surgery which will be beneficial in both clinical and research settings. The BIS score will reflect patient satisfaction of their body image and refer to quality of life and psychological stress, which will facilitate physician and patient communication and allow recognition of problems which may need interventions. Moreover, the BIS can help physicians make decisions in providing interventions, including reconstruction for each patient. This score can be use as a parameter for evaluation of treatment outcomes after breast cancer surgery or after radiation as baseline data for comparing between choices of treatment.

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Potential conflicts of interest

None.

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Appendix. A Thai version of Body Image Scale

แบบวัดรูปลักษณ์ทางกาย

กรุณาอ่านแบบสอบถามแต่ละข้ออย่างละเอียด และทำเครื่องหมาย (X) ในช่องที่ตรงกับความเห็นของท่านมากที่สุดในเรื่องรูปลักษณ์ภายนอกของท่านและการเปลี่ยนแปลงด้านร่างกาย จากที่ท่านได้เป็นมะเร็งด้านมและได้รับการรักษา **ณ ปัจจุบันที่ท่านตอบแบบสอบถาม และย้อนหลังไปหนึ่งสัปดาห์**

1. ท่านสนใจ รูปร่างและท่าทางบุคลิกภายนอกของท่านเองหรือไม่ **ณ ปัจจุบันและย้อนหลังไปหนึ่งสัปดาห์**

   ☐ ไม่ ☐ เล็กน้อย ☐ มาก ☐ มากที่สุด

2. ท่านรู้สึกว่าผลจากการรักษามะเร็งเต้านมทำให้รูปร่างทรวดทรงของท่านมีความดึงดูดใจต่อผู้อื่นลดน้อยลงหรือไม่ **ณ ปัจจุบันและย้อนหลังไปหนึ่งสัปดาห์**

   ☐ ไม่ ☐ เล็กน้อย ☐ มาก ☐ มากที่สุด

3. เมื่อท่านแต่งตัวท่านไม่พอใจต่อรูปร่างและท่าทางบุคลิกภายนอกของท่าน **ณ ปัจจุบันและย้อนหลังไปหนึ่งสัปดาห์**

   ☐ ไม่ ☐ เล็กน้อย ☐ มาก ☐ มากที่สุด

4. ท่านรู้สึกว่าความเป็นผู้หญิงลดน้อยลงหรือไม่ จากการเป็นมะเร็งเต้านมและจากผลของการรักษา **ณ ปัจจุบันและย้อนหลังไปหนึ่งสัปดาห์**

   ☐ ไม่ ☐ เล็กน้อย ☐ มาก ☐ มากที่สุด

5. ท่านไม่อยากเห็นตนเองขณะไม่ได้ใส่เสื้อผ้า **ณ ปัจจุบันและย้อนหลังไปหนึ่งสัปดาห์**

   ☐ ไม่ ☐ เล็กน้อย ☐ มาก ☐ มากที่สุด

6. ท่านรู้สึกว่าการเป็นมะเร็งเต้านมและผลจากการรักษาทำให้เสน่ห์ดึงดูดต่อเพศตรงข้ามของท่านลดลงหรือไม่ **ณ ปัจจุบันและย้อนหลังไปหนึ่งสัปดาห์**

   ☐ ไม่ ☐ เล็กน้อย ☐ มาก ☐ มากที่สุด

7. ผลจากการเปลี่ยนแปลงรูปร่างและท่าทางบุคลิกภายนอกของท่าน ทำให้ท่านไม่อยากพบปะผู้คน **ณ ปัจจุบันและย้อนหลังไปหนึ่งสัปดาห์**

   ☐ ไม่ ☐ เล็กน้อย ☐ มาก ☐ มากที่สุด

8. ผลจากการรักษามะเร็งเต้านมทำให้ท่านรู้สึกว่าความเป็นตัวตนทั้งด้านร่างกายและจิตใจ ของท่านลดน้อยลงหรือไม่ **ณ ปัจจุบันและย้อนหลังไปหนึ่งสัปดาห์**

   ☐ ไม่ ☐ เล็กน้อย ☐ มาก ☐ มากที่สุด

9. ท่านรู้สึกไม่พึงพอใจกับร่างกายของตนเอง **ณ ปัจจุบันและย้อนหลังไปหนึ่งสัปดาห์**

   ☐ ไม่ ☐ เล็กน้อย ☐ มาก ☐ มากที่สุด

10. ท่านไม่พอใจกับลักษณะแผลที่เกิดจากการผ่าตัด **ณ ปัจจุบันและย้อนหลังไปหนึ่งสัปดาห์**

    ☐ ไม่

การพัฒนาและประเมินความตรงของแบบวัดรูปลักษณ์ทางกายในผู้ป่วยไทยที่เป็นมะเร็งเต้านม

ดลฤดี สองทิศ, ประกอบเกียรติ หิรัญวิวัฒน์กุล

วัตถุประสงค์: *เพื่อศึกษาคุณสมบัติการวัดทางจิตวิทยาของแบบวัดรูปลักษณ์ทางกายฉบับภาษาไทยในผู้ป่วยมะเร็งเต้านมในประเทศไทย*

วัสดุและวิธีการ: *คณะผู้นิพนธ์ทำการแปลแบบวัดรูปลักษณ์ทางกายจากต้นฉบับภาษาอังกฤษเป็นภาษาไทย และทำการทดสอบคุณสมบัติการวัดทางจิตวิทยาในสตรีไทย 242 คน ที่ได้รับการวินิจว่าเป็นมะเร็งเต้านม และได้รับการรักษาโดยการผ่าตัด รับเคมีบำบัด และการฉายแสงครบเป็นระยะเวลามากกว่า 1 ปี*

ผลการศึกษา: *ผลการทดสอบคุณสมบัติการวัดทางจิตวิทยาของแบบวัดรูปลักษณ์ทางกายฉบับภาษาไทยพบว่ามีความเที่ยงภายในและภายนอกและความตรงสูง โดยพบว่าค่าสัมประสิทธิ์ความสม่ำเสมอภายในมากกว่า 0.8 และค่าความเที่ยงของการวัดซ้ำในแบบสอบถาม 2 ชุด มากกว่า 0.7 ความตรงตามเนื้อหาพบว่ามีความตรงตามดุลยพินิจของผู้เชี่ยวชาญและจากการสัมภาษณ์ผู้ป่วยมะเร็งเต้านม ความตรงตามโครงสร้างประเมินโดยการวิเคราะห์องค์ประกอบของแบบสอบถามพบเพียงหนึ่งองค์ประกอบ โดยคำถามข้อที่หนึ่งถูกแยกออกจากกลุ่มข้อคำถามต้นฉบับ 10 ข้อ นอกจากนี้ผลทดสอบพบว่าแบบสอบถามมีความตรงทางคลินิกดี ความตรงเชิงจำแนกพบว่าคะแนนของแบบสอบถามมีความแตกต่างอย่างมีนัยสำคัญทางสถิติระหว่างผู้ป่วยมะเร็งเต้านมที่ได้รับการตัดเต้านมออกทั้งข้างเทียบกับกลุ่มผู้ป่วยที่เก็บเต้านมไว้ และความไวของแบบสอบถามในแต่ละข้อยังสนับสนุนการประเมินความตรงทางคลินิกของแบบสอบถาม*

สรุป: *แบบวัดรูปลักษณ์ทางกายฉบับภาษาไทยมีคุณสมบัติการวัดทางจิตวิทยาที่ยอบรับได้และสามารถใช้เป็นเครื่องมือแสดงคุณภาพชีวิตสื่อระหว่างผู้ป่วยและแพทย์ และใช้เป็นเครื่องมือในการประเมินคุณภาพชีวิตผู้ป่วยมะเร็งเต้านมทั้งในทางคลินิกและการวิจัย*