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## How Women Use Art and Art Therapy to Cope With Breast Cancer: A Systematic Exploration of Published Literature

Diana C. Barnes

*Loyola Marymount University*

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Diana C. Barnes

Loyola Marymount University, [dianasart@me.com](mailto:dianasart@me.com)

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**How Women Use Art and Art Therapy to Cope With Breast Cancer:  
A Systematic Exploration of Published Literature**

by

**Diana Barnes**

**A research paper presented to the  
FACULTY OF THE DEPARTMENT OF  
MARITAL AND FAMILY THERAPY  
LOYOLA MARYMOUNT UNIVERSITY**

**In partial fulfillment of the  
requirements for the degree  
MASTERS OF ART**

**May 2015**

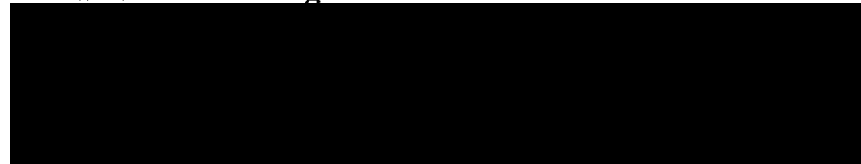
**Signature Page**

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**Diana C. Barnes, M.A. Candidate, Art Therapy and MFT Researcher**

**Research Mentor's Signature:**



**Einat Metzli, Ph.D., LMFT, ATR-BC, Research Mentor**

### **Dedication**

This research project evolved from my journey as a breast cancer survivor. This journey has been a gift to me. It brought me to pursue my masters in art therapy and I will be forever be grateful to the wonderful women that entered my life because of this journey, my friends that are still here and all of those that have passed on. If I had never had cancer, I would have never had the opportunity to have these wonderful women in my life.

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## Introduction

### Study Topic

Breast cancer is one of the most common diagnosed cancers for women accounting for more than 25% of all cancer diagnoses affecting women ranging from 20-80 years of age (American Cancer Society, 2013). Although, there are about 1% of men diagnosed with breast cancer in the United States according to the American Cancer Society (Facts & Figures, 2012). The medical treatments for breast cancer are usually surgery, either mastectomy (partial or full) or lumpectomy and possibly chemotherapy and radiation therapy.

The physical side effects of breast cancer treatments include: fatigue, lymphedema, nausea, weight gain, and depression. These side effects may linger for many years after treatment is complete (Phillips & McAuley, 2014). There are also emotional, spiritual, and social effects of breast cancer that will be looked at in this paper. Some of these side effects can be reduced for patients and survivors through remedies such as physical activity and art therapy.

Physical activity can help with some of the side effects, especially fatigue and depression (Galiano-Castillo et al., 2014). Art therapy can be a positive experience and treatment for women while dealing with breast cancer and going through chemotherapy or radiation, surgery and living with cancer (Bell, 2006; Monti et al., 2006; Reynolds, Lim & Prior, 2008; Svensk et al., 2009). The positive experience of art making can benefit and improve negative emotions (Drake, 2012). Positive psychology in conjunction with art therapy can bring about a sense of resilience when faced with a setback or illness (Bett, 2011; Drake, 2012). According to Chansky (2007) using art therapy in journaling form with photography to create a visual journal promotes a sense of control over one's body and illness, a sense of empowerment. Artistic expression through art therapy or art making can be a supportive environment for women with breast cancer (Collie,



Bottorff, & Long, 2006). The following is an extensive review of literature utilizing archival research methodology to integrate information from different scholarly and clinical publications to illuminate how women make sense of, and cope with, breast cancer.

### **Significance of the Study**

There are limited studies about the use of art therapy and art making for women with breast cancer. Due to the continued growing population of women diagnosed with breast cancer and the side effects associated with treatments, all forms of effective coping strategies to help women with breast cancer should be examined and considered. Some women continue dealing with side effects long after treatments are completed. The use of art therapy as an adjunct treatment to help women cope can be very beneficial. As a breast cancer survivor for almost five years and being associated with other women who have had breast cancer, I feel there is a need for creative and emotional group support such as art therapy. The social, physical, and emotional support breast cancer survivors receive from each other is immeasurable. I have participated in a cancer exercise group as well as a breast cancer survivor team, the Los Angeles Pink Dragons, a competitive dragon boat team. These two groups have been a great support for me for the past four and a half years as a breast cancer patient and survivor. Being an artist, it was natural for me to make art throughout my entire breast cancer experience. It is important for breast cancer survivors to have this creative opportunity, either through art therapy or an open studio art program for cancer patients and survivors.

The literature examined about women diagnosed with breast cancer can help identify the benefits of art making and art therapy as a positive adjunctive treatment. Art therapy can be used as a supportive, emotional process for breast cancer patients to express their feelings in a non-verbal way. There are many artists with breast cancer who pursued their creative expression as a

therapeutic process throughout their cancer experience. Feeling a sense of sisterhood with these artists has helped me understand that I am not alone in my journey and the opportunity to have that creative expression has given me a sense of control and empowerment, which replaced my sense of despair with a cancer diagnosis. There is always the haunting possibility of reoccurrence for breast cancer survivors; therefore, I feel nonverbal fears, anxiety and emotions can be expressed through art therapy.

## **Background of the Study Topic**

### **What Is Cancer?**

Cancer cells are abnormal cells that reproduce uncontrollably in the human body and can spread to distant sites of the body if not controlled may cause death (<http://medical-dictionary.thefreedictionary.com/Cancer>). Normal cells grow and divide in the body to make new cells, then the old cells die in an orderly fashion. Cancer cells continue to grow and multiply forming new abnormal cells. A cell becomes cancerous if DNA is damaged, but if the DNA in a normal cell is damaged, it will either repair itself or die, but cancer cell continue to grow out of control and invade other tissue within the body (American Cancer Society, 2012).

### **Types of Cancers**

According to Cancer Research UK (2013) there are more than 200 different types of cancers. Cancer can develop in any cell of the body. Cancers can be caused by `external factors such as tobacco, infectious organisms, chemicals, and radiation, as well as internal factors like inherited mutations, hormones, immune conditions, and mutations that occur from metabolism (cancerresearchuk.org, 2013). Although any person can develop cancer, the risk increase with age, 77% of all cancers diagnosed are people over the age of 55 years old or older. According to the American Cancer Society's Facts and Figures (2012) it is expected about 577,190 Americans will die of cancer. Heart disease is the number one cause of death in the United States followed by cancer as a close second.

Cancer is usually treated with surgery, radiation, chemotherapy, hormone therapy, biological therapy, and targeted therapy. There are different treatments for each type of cancer depending on the cancer and the stage of advancement. The survival rate for all cancers diagnosed has increased from 49% in 1975-1977 to 67% between 2001 and 2007. This five-year

survival rate reflects both early diagnosis of certain cancers at an early stage and improved treatment (American Cancer Society, 2012).

When a cancer is diagnosed it is essential to determine the stage of the cancer for therapy or treatment options and to assess prognosis. The stage of a cancer is based on the size of the tumor as well as whether it has spread to other parts of the body. This staging system is assessed in three ways: (T) extent of primary tumor, (N) regional lymph node involvement either absence or presence, and (M) absence or presence of distant metastases. Once the T, N, and M are determined a numerical staging is assigned 0, I, II, III or IV. Stage 0 and I are the earliest and stage IV is the most advanced (American Joint Committee on Cancer, 2014). Once staging is determined, prognosis and treatment plan begin.

### **What Is Breast Cancer?**

In the 18<sup>th</sup> century, there were three significant observations that launched the field of cancer epidemiology, which is the study of causes, distribution, and control of a disease (American Cancer Society, 2012). In 1713, an Italian doctor, Bernardino Ramazzini, noticed an absence of cervical cancer but a higher incidence of breast cancer in nuns. This made him wonder if their celibate lifestyle might in some way be the result. This observation brought about the importance of identifying and understanding hormones (like changes in pregnancy) and sexually transmitted infection and cancer risk (Mandal, 2013, [www.news-medical.net](http://www.news-medical.net)).

According to Mandal (2013) breast cancer is a malignant tumor that is in the cells of the breast tissue. A malignant tumor is a group of cancer cells that will grow and invade surrounding tissue and may spread to different areas of the body ([www.news-medical.net](http://www.news-medical.net)). Breast cancer is the most frequently diagnosed cancer in women, although men can also be diagnosed with breast cancer. An estimated 232,340 breast cancer cases in women were expected in 2013 compared to

the 2,240 in men diagnosed in the United States. According to the American Cancer Society, Surveillance and Health Services Research (2013) approximate mortality expected among women with breast cancer in 2013 was 39,620. Although, many women are diagnosed with breast cancer it remains the second in mortality to lung cancer for women. Due to early detection and improved treatment there are greater numbers of women surviving a breast cancer diagnosis (American Cancer Society, 2013). Mammography is a very accurate screening tool used to detect any lumps or abnormality in breast tissue. This type of screening will detect 80-90% of breast cancers. If an abnormality appears from the mammogram further screening such a magnetic resonance imaging (MRI) is recommended or breast ultrasound or a needle biopsy for any suspicious lesions. These additional options can increase diagnostic accuracy and provide essential information regarding size and possible pathology (Benson et al., 2009). There has been a concerted effort to improve access to health care and to encourage all women over the age of 40 to have regular yearly mammograms (American Cancer Society, 2012; Miller, J.W., King, J.B., Joseph, D.A., & Richardson, L.C., 2012).

There are many different types of breast cancer. Among the most common types are ductal carcinoma in situ, lobular carcinoma in situ, invasive ductal carcinoma, invasive lobular carcinoma and triple-negative breast cancer (American Cancer Society, 2012). With every diagnosis, treatment is assessed, taking the size of the tumor in account as well as the type of breast cancer, the characteristic and the extent of spread. The patient's preference of treatment should be taken into consideration as well as surgical options that are most appropriate for the stage and type of breast cancer. Most women with breast cancer will have some form of surgery to remove the tumor, a breast-conserving type of surgery either a lumpectomy or a partial mastectomy may be an option. This type of surgery is usually in conjunction with radiation

therapy and/or chemotherapy depending on the size and location of tumor and other factors.

Another surgical option is a mastectomy, which is the removal of the entire breast. Removal of some of the lymph nodes during surgery is recommended to determine if the cancer has spread beyond the breast (American Cancer Society, 2012). To minimize the impact on the lymphatic system a procedure developed in the 1990's was the sentinel lymph node biopsy (SLNB), at that time Giuliano initiated adding the use of blue dye to this procedure to identify the lymph node status (Murawa, Murawa, Adamczyk, & Polom, 2014). In conjunction with surgical procedures, radiation therapy, chemotherapy, and hormone inhibitors are used as a long-term adjuvant therapy to help prevent the recurrence of cancer. They are tamoxifen and raloxifene. There are side effects from all of these treatments varying in degrees of discomfort that may affect one's quality of life (Benson et al., 2009).

There is a strong likelihood of side effects both physical and emotional; including depression, anxiety and fatigue that goes along with a breast cancer diagnosis and treatment. Art therapy can be a positive experience and treatment for women while dealing with breast cancer and going through chemotherapy or radiation, surgery and living with cancer (Bell, 2006; Monti et al., 2006; Reynolds, Lim & Prior 2008; Svensk et al., 2009). Art therapy can provide a non-verbal way to improve feelings of health and quality of life (Malchiodi, 1999).

### **Research Approach**

Comprehensively reviewing the literature relevant to the experience of women breast cancer patients and survivors making meaning through art is informed by a phenomenological approach, since it is intended to explore the lived experience of women diagnosed with breast cancer as documented in published literature. This approach allowed me to look at different coping strategies and practices that women might use as breast cancer patients and survivors. Paying special attention to the way that creative and expressive techniques have been noted in medical, clinical, and personal accounts.

According to Quail and Peavy (1994) the phenomenological approach looks for patterns and structures within the study rather than literal meanings and facts in order to illuminate the lived experience. The phenomenologist must possess an attitude of openness not relying solely on facts and appearance, but the researcher must be receptive to the experiential process of the subject (Quail & Peavy, 1994). Phenomenological research allows for different interpretations depending on each individual's personal experience and the depth of awareness. In this particular case, it allowed me to use my own experience with art and with breast cancer, to intuitively integrate meanings from published artists. The literature will explore how women with breast cancer, artist and non-artist, through art making create and understand their own personal experience.

Further, research informed by art-based research supports the understanding that art making is an intuitive way that one might make meaning of life experiences (Allen, 2011). As the subject makes the art, meaning begins to emerge in three ways: 1. Dialectic, the experience of being critical of painting, the antithetical meaning emerges; 2. Interactive (dialogal), making art communicates meaning, the meaning can inform the painting; 3. Synergistic, the meanings

work together and combined to exceed the sum of the individual meaning (Quail & Peavy, 1994).

This approach to systematically explore published literature allowed me to analyze and find common ideas that bridged similar experiences for artists and non-artists with breast cancer and their art making. This enlightened me as an artist, who has had breast cancer, to relate to other artists. I used my own art making as a therapeutic process to cope with my breast cancer. Reviewing art therapy journals to see how art therapy is used with breast cancer patients and survivors created an additional connect to those without an art background and how beneficial the art therapy process can be.



## Methods

### Definition of Terms

- Art – (n.) the conscious production or arrangement of sounds, colors, forms, movements, or other elements in a manner that affects the sense of beauty, specifically the production of the beautiful in a graphic or plastic medium (<http://www.thefreedictionary.com/Art>).
- Art therapy – (n.) psychotherapy that incorporates the production of visual art, such as painting or sculpture, in order to understand and express one's feelings (<http://www.thefreedictionary.com/Art+therapy>).
- Breast cancer – (n.) cancer of the breast; one of the most common malignancies in women in the U.S. (<http://www.thefreedictionary.com/Breast-cancer>).
- Cancer – (n.) any malignant growth, the pathological condition characterized by such growths (<http://www.thefreedictionary.com/Cancer>).
- Coping – (vb) 2a: “to maintain a contest or combat usu. on even terms or with success – used with b: “to deal with and attempt to overcome problems and difficulties” (Merriam-Webster's Collegiate Dictionary, 11th ed.).

### Design of Study

This research project was a systematic exploration of published literature regarding women with breast cancer and the various coping mechanisms used from diagnosis through treatment and post-treatment, as breast cancer survivors. Specifically over 86 papers were reviewed from oncology, psychology and art therapy journals to answer the following research questions:

- A. According to professional and published literature, what are the current treatment modalities for women with breast cancer?
- B. According to professional and published literature, what is the current understanding of how women make sense and/or cope with their experiences related to breast cancer?
- C. According to professional and published literature, what are some of the alternative modalities and treatments for breast cancer?
- D. According to professional and published literature, what is the role of art with women with breast cancer?
  - 1. The use of art therapy.
  - 2. Therapeutic use of art and the artists' way.

By categorizing the literature in a few different ways, the author attempts to integrate the different approaches and activities that might help breast cancer patients and survivors make meaning of their experiences through art.

**Sampling.** The author sampled various medical journals and psychological publication to establish an idea of what has been published about women with breast cancer. Then established common themes amongst women with breast cancer, their side effects and how/what they do to help them make sense of their cancer and improve their quality of life. The main focus was to collect literature from any art therapy related journals and any publications and studies that have looked at how art making helped women cope with their breast cancer, diagnosis, treatment and side effects.

**Gathering of data.** The literature was gathered from professional and scholarly publications about women with breast cancer through Internet searches. LMU/LA William H. Hannon Library web site was the primary source to connect with Art Therapy LibGuides databases with access to the most up to date scholarly publications from MEDLINE, PsycINFO,

and ScienceDirect including all available art therapy studies and publications pertaining to the topic of study. Key words used for this study search were; *breast cancer, women with breast cancer, art therapy and breast cancer, art and breast cancer*. There are more medical publications regarding treatment options for women with breast cancer and their side effects than alternative expressive art published works regarding adjunct therapies. Amongst the general medical publications, the searches were between 2009- 2014. The scholarly or professional publications about women with breast cancer with any connection to art, art therapy or artists with breast cancer were gathered. Since there is limited amount of published material in this field, the search parameters were from 1995-2014. The identified reoccurring topics within the literature were:

- Art therapy with women who have breast cancer.
- Making art as a therapeutic process for women with breast cancer.
- Artists with breast cancer, who have expressed themselves through their art making.

**Analysis of data.** The publications reviewed were organized, coded, categorized, and finally, integrated into a comprehensive chart to the research questions. The literature was chosen for its significance to the research questions, and then chronologically arranged in a chart. The literature was categorized and color-coded into groups according to themes. I began to look for parallels that were common to women with breast cancer. I analyzed why and how art therapy works to relieve some of the side effects as well as how even just the act of making art can be a therapeutic endeavor in and of itself.

**Results**

**Presentation of Data**

*Figure 1* is the collection of published literature that was systematically explored within this study. Papers were organized in a chronological order beginning with the most current. A letter and color-code was assigned to each research question and then each article was identified to the corresponding question or questions that were relevant. After categorizing and coding each article, a summary was written to answer the research questions using the information from the articles that were grouped for that category.

Date	Author	Article Titles	Synopsis	A	B	C	D	D
							1	2
2014	Cedolini, C., Bertozzi, S., Londero, A.P., Bernardi, S., Seriau, L., Concina, S., Cattin, F. & Risaliti, A.	Type of breast cancer diagnosis, screening, and survival	"Breast cancer screening is known to reduce mortality. The diagnosis of invasive breast cancer with screening in our population resulted in a survival gain at 5 years from diagnosis."					
2014	Crawford, S.	Art making for the therapist: A study on clinical insight, therapist identity, self-care, and countertransference						
2014	Dupont, A., Bower, J.E., Stanton, A.L. & Ganz, P.A.	Cancer-related intrusive thoughts predict behavioral symptoms following breast cancer treatment	"Intrusive thoughts predicted elevations in fatigue, sleep disturbance & pain, which are among the most common & distressing side effects of breast cancer treatment."					

Date	Author	Article Titles	Synopsis		A	B	C	D	D
2014	Galiano-Castillo, N., Ariza-García, A., Cantarero-Villanueva, I., Fernandez-lao, C., Diaz-Rodriguez, L., & Arroyo-Morales, M.	Depressed mood in breast cancer survivors: Associations with physical activity, cancer-related fatigue, quality of life, and fitness level	Up to 39% of depressed mood in breast cancer survivors can be attributed to cancer-related fatigue, physical activity level, the presence of systemic side effects and a deterioration of body image after oncology procedures.						
2014	Hamelinck, V.C., Bastiaannet, E., Pieterse, A.H., Jannink, I., van de Velde, C.J.H., Liefers, G.-J. & Stiggebout, A.M.	Patients' preferences for surgical and adjuvant systemic treatment in early breast cancer: A systematic review	"Patients who prefer BCS (breast conserving surgery) are predominantly driven by body image, while for patients who prefer MAST (mastectomy) survival &/or recurrence is the most prominent factor."						
2014	Harrison M.E., Coombs, M.R.P., Delaney, L.M. & Hoskin, D.W.	Exposure of breast cancer cells to a subcytotoxic dose of apigenin causes growth inhibition, oxidative stress, and hypophosphorylation of Akt	"Diets rich in fruits & vegetables are associated with a reduced risk in developing certain cancer, including breast cancer. Subcytotoxic concentration of apigenin, found in high concentrations of parsley, onions, grapefruit, oranges & chamomiles tea, inhibited DNA synthesis in a panel of human breast cancer cell lines."						
2014	Kurowecki, D. & Fergus, K.D.	Wearing my heart on my chest: dating, new relationships, and the reconfiguration of self-esteem after breast cancer	"Reclaiming self/bodily esteem was also deemed to be a never-ending process/ women reported having to come to terms with the psychological and emotional impact of the diagnosis and the need to incorporate cancer into their sense of self."						

Date	Author	Article Titles	Synopsis		A	B	C	D	D
2014	Oster, I., Tavelin, B., Thyme, K.E., Magnusson, E., Isaksson, U., Lindh, J. & Astrom, S.	Art therapy during radiotherapy- A five-year follow-up study with women diagnosed with breast cancer	"Art therapy during the period of active treatments for breast cancer can be of great importance to support health, coping & quality in a short-term perspective."					1	
2014	Kusilka, R.L.	Perceptions of healing: Mind, body and spiritual implications for yoga therapy and art therapy students	The mind, body & spirituality integrate through the journey of healing with the importance of personal change & growth through the perceived healing process.						
2014	Mandal, A	www.news- medical.net/health/History-of- Breast-Cancer.aspx	History of breast cancer common medical treatments and diagnostic screening.						
2014	Murawa, P., Murawa, D., Adamczyk, B. & Polom, K.	Breast cancer: Actual methods of treatment and future trends	Improving treatment & diagnostics for breast cancer patients using sentinel lymph node biopsy to help with breast conserving therapy, to improve patient's quality of life.						
2014	Schmidt, M.E., Chang-Claude, J., Seibold, P., Vrieling, A., Heinz, J., Flesch- Janys, D. & Steindorf, K.	Determinants of long-term fatigue in breast cancer survivors: results of a prospective patient cohort study	Some determinants of long-term physical fatigue include low physical activity, obesity and lower education. Other factor for fatigue was related to depression and pain. "The use of aromatase inhibitors was significantly associated with fatigue."						
2014	Tiefer, L.	My cautionary breast cancer tale, women & therapy	A narrative perspective of "choices" & "control" in dealing with breast cancer from a feminist idea. Body autonomy regarding reconstructive surgery post mastectomy.						2
2013	American Cancer Society	Breast cancer facts & figures 2013-2014	"Breast cancer is the most common cancer among US women, 1 in 8, lifetime risk of being diagnosed with breast cancer." Screening, stages, types, risks & population.						

Date	Author	Article Titles	Synopsis		A	B	C	D	D
2013	Boquiren, Esplen, Wong, Toner & Warner	Exploring the influence of gender-role socialization and objectified body consciousness on the body image disturbance in breast cancer survivors	Body image disturbance associated with breast cancer survivors depends on beliefs regarding their bodies, roles and characteristics that define them as women. Women with poorer quality of life were disturbed by their body image.						
2013	Guest, D.D., Evans, E.M. & Rogers, L.Q.	Diet components associated with perceived fatigue in breast cancer survivors	Breast cancer survivors with higher dietary fiber and lower fat intake report less fatigue.						
2013	Phillips, S.M. & McAuley, E.	Physical activity and quality of life in breast cancer survivors: the role of self-efficacy and health status	Physical activity increases self-efficacy in breast cancer survivors & improving global QOL						
2013	Phillips, S.M. & McAuley, E.	Social cognitive influences on physical activity in long-term breast cancer survivors	Educating breast cancer survivors of realistic physical activity expectations & incorporating social support can increase self-efficacy and physical activity.						
2013	Przedziecek, A., Sherman, K.A., Baillie, A., Talor, A., Foley, E. & Stalgis-Bilinski, K.	My changed body: breast cancer, body image, distress and self-compassion	"Breast cancer survivors with poor body image may be more likely to be depressed, anxious or stressed because of their lower levels of self-compassion & distress." Negative link between body image & self compassion.						
2013	Short, C.E., James, E.L., Stacey, F., Plotnikoff, R.C.	A qualitative synthesis of trials promoting physical activity behaviour change among post-treatment breast cancer survivors	Post-treatment breast cancer survivors who participate in regular physical activity can improve their quality of life.						

Date	Author	Article Titles	Synopsis		A	B	C	D	D
2013	Thewes, B.B., Bell, M.L. & Butow, P.P.	Fear of cancer recurrence in young early-stage breast cancer survivors: The role of metacognitive style and disease-related factors	"Maladaptive metacognitive style is associated with greater FCR (Fear of Cancer Recurrence) in young women with breast cancer."						
2013	Van Den Berg, S.W., Ploos Van Amstel, F.K., Ottevanger, P.B., Gielissen, M.F.M. & Prins, J.	The Cancer Empowerment Questionnaire: Psychological Empowerment in breast cancer survivors	"Empowered patients display more adaptive illness cognitions & are more likely to accept their situation & add a positive meaning to their cancer experience (perceived benefits or post-traumatic growth). Breast cancer survivors can be empowered by strengths within themselves, as well as by he perceived support & acceptance from their surroundings."						
2013	Wilkinson, R.A. & Chilton, G.	Positive art therapy: Linking positive psychology to art therapy, practice and research	Positive psychology, it is possible to experience posttraumatic growth, when a positive change occurs as a result of a crisis, "benefit finding".						
2012	Begovic-Juhant, A., Chmielewski, A., Iwuagwu, S. & Chapman, A.	Impact of body image on depression and quality of life among women with breast cancer	"Perceptions of body image, attractiveness & femininity increased depression & reduce quality of life, especially during first year of treatment." Multidisciplinary services helped survivors improve perceptions to a better quality of life.						
2012	Craft, Davis & Paulson	Expressive writing in early breast cancer survivors	"Expressive writing, as a form of emotional expression, has been examined as a coping strategy having overall positive success."						



Date	Author	Article Titles	Synopsis	A	B	C	D	D
2012	Cox, C.R., Reid-Arndt, S., Arndt, J & Moser, R.P.	Considering the unspoken: The role of death cognition in quality of life among women with and without breast cancer	"Cancer diagnosis affects physical & psychological well-being in part by elevating the underlying thoughts of mortality."					
2012	Czamanski-Cohen, J.	The use of art in the medical decision-making process of oncology patients	"Art making may benefit individuals coping with cancer." Art making has helped with reducing stress & can be pleasurable when coping with negative or difficult emotions, as well as "life enhancing."				1	2
2012	DeShazer, M.K.	Postmillennial breast cancer photo-narratives: Technologized terrain	The photo-narrative experiences of 2 breast cancer patients, Catherine Lord & Lynn Kohlman.					2
2012	Drake, J.E. & Winner, E.	Confronting sadness through art-making: Distraction is more beneficial than venting	Drawing to distract can act as a short-term mood regulator. Using art as a distraction of negative feelings can be an effective mood repair, rather than venting. "Similar to expressive writing, drawing may improve mood in the long term because it allows individuals to form coherent narratives of their experiences."				1	
2012	Mutrie, N. Campbell, A., Barry, S. Hefferon, A., McConnachie, A., Ritchie, D. & Tovey, S.	Five-year follow-up of participants in a randomized controlled trial showing benefits from exercise for breast cancer survivors during adjuvant treatment. Are there lasting effects?	Women that reported being active benefited with lower levels of depression, increased mood level and quality of life.					
2012	Regehr, K.	Pink Ribbon Pin-Ups: Photographing femininity after breast cancer	Breast cancer "pin-up" calendar participants expressed they felt 'empowered', 'uplifted', 'joyous', and 'sexy'.					2

Date	Author	Article Titles	Synopsis		A	B	C	D	D
2012	Sabo, B.M. & Thibeault, C.	"I'm still who I was" creating meaning through engagement in art: The experiences of two breast cancer survivors	Sculptors creating lifelike torso casts of two breast cancer survivors, thus giving the survivors the sensory experience of their post surgery bodies, bring up self-reflection and re-authoring of their life narrative.						2
2012	Thibeault, C. & Sabo, B.M.	Art, archetypes and alchemy: Images of self following treatment for breast cancer	"Engaging in in artistic expression, women re-create their life stories by focusing on specific challenges and complex emotions. Artistic experiences were reported to help women with chronic illness generate more positive self-image, strengthen their sense of mastery & help them understand a wider range of life possibilities."					1	2
2012	White, J. & Boehmer, U.	Long-term breast cancer survivors' perceptions of support from female partners	"Female partners are responsive to survivors needs at the time of diagnosis as well as several years later when survivors continue to face reminders of their disease & fear of recurrence."						
2011	Allen, P. B.	Special issue on the social action and advocacy paradigm in art therapy: The lens of art therapy opens larger still.	As art therapist, "There are countless opportunities to engage imaginatively with the energy for change that is available today."					1	
2011	Cantarero-Villanueva, I., Fernandez-Lao, C., Fernandez-De-Las Penas, C., Díaz-Rodríguez, L., Sanchez-Catalejo, E. & Arroyo-Morales, M.	Associations among musculoskeletal impairments, depression, body image and fatigue in breast cancer survivors within the first year after treatment	Significant predictors of fatigue for breast cancer survivors may be linked body image, depression, neck pain intensity and shoulder passive flexion.						

Date	Author	Article Titles	Synopsis	A	B	C	D	D
2011	Collier, A.F.	The well-being of women who create with textiles: Implications for art therapy	Art making can be beneficial by focusing on aesthetics with the use textiles has oriented people from dressed feelings toward positive short-term mood repair.				1	
2011	Drake, J.E., Coleman, K. & Winner, E.	Short-term mood repair through art: Effects of medium and strategy	"Artists and writers seem to realize that creating art has the power to improve mood." "For art making to improve mood immediately, it is better to use art to distract oneself rather than to express one's pain."					
2011	Elkis-Abuhoff et al.	Mandala drawings as an assessment tool for women with breast cancer	Mandala-making process was a valuable therapeutic process allowing the women the ability to express & communicate in a non-verbal way, providing psychological support.				1	
2011	Singh, B.	The therapeutic effects of art making in patients with cancer	Narratives of 3 artists diagnosed with breast cancer, how they and their art evolved as they went through their cancer. How artist use art making without a therapist.					
2010	Park, C.L.	Making sense of the meaning literature: An integrative review of meaning making and its effects on adjustment to stressful life events	"Meaning and meaning making in the context of stressful life events." Distinguishing between "meaning-making efforts" & "meaning made."					
2009	Alfano, C.M., Day, J.M., Katz, M.L., Herdon, J., Bittoni, M.A., Oliveri, J.M. & Paskett, E.D.	Exercise and dietary change after diagnosis and cancer-related symptoms in long-term survivors of breast cancer	Long-term breast cancer survivors reported by increasing exercise & increasing intake of fruits & vegetables in their diet resulted in less fatigue and reduced risk of recurrence, mortality & comorbid conditions.					

Date	Author	Article Titles	Synopsis	A	B	C	D	D
2009	Benson, J.R., Jatoi, I., Keisch, M., Esteva, F.J., Makris, A & Jordan, V.C.	Early breast cancer, Seminar, Lancet 2009; 373: 1463-1479	Screening options, diagnostic & surgical options. "Attention to surgical margins & improved radiotherapy techniques have reduced local recurrence after breast-conservation surgery."					
2009	Elkis-Abuhoff, D., Gaydos, M., Goldblatt, R., Chen, M. & Rose, S.	Mandala drawings as an assessment tool for women with breast cancer	" Mandalas can serve as a coping skill for psychological changes experienced by an individual, promoting growth, strength, & healing within its creator." The mandala making can be a non-verbal therapeutic process for women to express themselves and their condition.				1	
2009	Lengacher, C.A., Johnson-Mallard, V., Post-White, J., Moscoso, M.S., Jacobsen, P.B., Klein, T.W., Widen, R.H., Fitzgerald, S.G., Shelton, M.M., Barta, M., Goodman, M., Cox, C.E. & Kip, K.E.	Randomized controlled trial of mindfulness-based stress reduction (MBSR) for survivors of breast cancer	Mindfulness-based stress reduction (MBSR) improves distress & fears of recurrence & quality of life for breast cancer survivors transitioning off treatment.					
2009	Oster, I., Astrom, S., Lindh, J.J., & Magnusson, E.	Women with breast cancer and gendered limits and boundaries: Art therapy as a 'safe space' for enacting alternative subject positions	"Art therapy helped women to get access to subject positions that enable them to protect and strengthen their boundaries through giving legitimacy to their own experiences and interpretations."				1	

Date	Author	Article Titles	Synopsis	A	B	C	D	D
2009	Svensk, A.C., Oster, I., Thyme, K.E., Magnusson, E., Sjodin, M., Eisemann, M., Astrom, S. & Lindh, J.	Art therapy improves experienced quality of life among women undergoing treatment for breast cancer: a randomized controlled study	Art therapy can play an important role as a complimentary therapy for breast cancer patient.				1	
2008	Reynolds, F., Lim, K. & Prior, S.	Images of resistance: A qualitative enquiry into the meanings of personal artwork for women living with cancer	"Participants' artwork testified to their ongoing personhood, & engagement with positive aspects of life." The need to create art is more important & can be an escape & also defiance.					
2008	Winter-Stone, K.M., Bennett, J.A., Nail, L. & Schwartz, A.	Strength, physical activity, and age predict fatigue in older breast cancer survivors	58% of women with a 5-year post diagnosis of breast cancer report persistent fatigue. There are some correlations with fatigue and age with breast cancer survivors.					
2007	Bar-Sela, G. Atid, L., Dano, S., Gabay, N. & Epelbaum, R.	Art therapy improved depression and influenced fatigue levels in cancer patients on chemotherapy	Art therapy can help patients with emotional distress and be very relaxing, giving 'breathing space' and focusing on 'soul' problems during chemotherapy.				1	
2007	Chansky	Navigating the maze: Life narrative in visual breast cancer journals	Visual breast cancer narrative journals encompassing: personal/therapeutic, internal public as a community role model, external public as a community spokesperson & public/political activist. Hall's artist's books, Lorde's "The Cancer Journal", Lynch & Richards' "Exploring Into Life", King's artist's book, Sigler's B/C journal, Regrave & Clark's journal.					

Date	Author	Article Titles	Synopsis		A	B	C	D	D
2007	Oster, I., Magnusson, E.,Thyme,K.E., Lindh, J.J. & Astrom, S.	Art therapy for women with breast cancer: The therapeutic consequences of boundary strengthening	Women in the study described their breast cancer as an opportunity to learn & grow from, to pay more attention to one body & slow down in life.					1	
2007	Radley, A. & Bell, S.E.	Artworks, collective experience and claims for social justice: the case of women living with breast cancer	Photographer, Jo Spence & Martha Hall, who created art books, both artist with breast cancer.						
2007	Reynolds, F., Lim, K.H.	Contribution of visual art-making to the subjective well-being of women living with cancer: A qualitative study	"This phenomenological study sought to understand how visual art-making, as a leisure pursuit rather than as formal psychotherapy, contributes to the subjective well-being of people living with cancer."					1	
2007	Reynolds, F., Lim, K.H.	Turning to art as a positive way of living with cancer: A qualitative study of personal motives and contextual influences	Understanding how leisure choices & activities such as art making may fulfill the need for well being amongst cancer patients, with a positive experience co-existing with negative. "Making lifestyle changes to live more positively with cancer."					1	
2007	Thompson, P.	The relationship of fatigue and meaning in life in breast cancer survivors	"Fatigue has been shown to be an ongoing symptom after breast cancer treatment." Fatigue levels seem to decrease following completion of treatment.						
2006	Bell, S.E.	Living with breast cancer in text and lineage: Making art to make sense	Spence & Hall Women artist living with breast cancer) their art & how it enhances understanding of post-modern social science that "self" are multiple & shifting.						
2006	Betts, D.J.	Art therapy assessments and the rating instruments: Do they measure up?	Art therapy assessments (benefits & limitations of approach& tools used).					1	

Date	Author	Article Titles	Synopsis	A	B	C	D	D
2006	Collie, Bottorff & Long	A narrative view of art therapy and art making by women with breast cancer	Narrative analysis of storylines: Art & Art Therapy as a Haven; Getting a clearer view; Clearing the Way Emotionally; and Enhancing & Enlivening the Self. Women with breast cancer link art therapy and meaning making.				1	
2006	Monti, D.A., Peterson, C., Shakin Kunkel, E.J., Hauck, W.W., Pedquignot, E. Rhodes, L. & Brainard, G.C.	A randomized, controlled trial of mindfulness-based art therapy (MBAT) for women with cancer	"Mindfulness-based art therapy (MBAT) can help cancer patients decrease distress levels & improve quality of life."				1	
2006	Nainis et al.	Relieving symptoms in cancer: Innovative use of art therapy	"Art making gave them a feeling of control and allowed them to express their feelings without words." Breast cancer patients reported after 1-hour of art therapy there was a reduction in symptoms and anxiety.				1	
2006	Nesbit, S.G.	Using creativity to experience flow on my journey with breast cancer	"Nesbit found ordinary, everyday experiences to be spiritual-she found meaning in life. Flow activities enabled her to restructure her consciousness with positive rather than negative experiences."					
2006	Puig, A., Lee, S.M., Goodwin, L. & Sherrard, P.	The efficacy of creative arts therapies to enhance emotional expression, spirituality, and psychological well-being of newly diagnosed Stage I and Stage II breast cancer patients: A preliminary study	Breast cancer patients that participated in a creative arts therapy reported feelings of enhancement to their sense of well-being & were able to transform their cancer experience as an opportunity for growth, decreased hopelessness & increased happiness & optimism after the creative arts experience.					

Date	Author	Article Titles	Synopsis		A	B	C	D	D
2006	Reynold & Prior	The role of art-making in identity maintenance: Case studies of people living with cancer	Art as a leisure activity as a resource for living with chronic illness & opportunities to find meaningfulness & providing a coping resource to deal with cancer with a positive identity.						
2006	Reynolds, F. & Prior, S.	The role of art-making in identity maintenance: case studies of people living with cancer	People with cancer who engaged in art as leisure activity maintained a positive identity. "Art strengthened personal & social identity & familiar identities & ways of living prior to cancer."						
2006	Seligman, M.E.P., Rashid, T. & Parks, A.C.	Positive psychotherapy	"Positive psychotherapy (PPT) intervention exercises for depression increasing positive emotion, engagement, & meaning relieving depressed symptoms." Positive emotion lowers depression & anxiety.						
2005	Helgeson, V.S. & Tomich, P.L.	Surviving cancer: A comparison of 5-year disease-free breast cancer survivors with healthy women	Surviving cancer affects some, but all psychological thought and can make the world seem less controllable.						
2005	Klagsbrun, J., Rappaport, L., Speiser, V.M., Post, P., Byers, J., Stepakoff, S., & Karman, S.	Focusing and expressive arts therapy as a complimentary treatment for women with breast cancer	"Expressive art therapies improved overall quality of life, these gains referred to various spiritual, physical, emotional, cognitive, creative & social aspects in their lives."						1
2004	Amaya, H.	Photography as technology of the self: Matuschka's art and breast cancer.	Matuschka's art became a political/ethical about body image, beauty & truth about self-expression						
2004	King, S.	Pink Ribbons Inc: breast cancer activism and the politics of philanthropy	Commercial sponsorship and awareness of breast cancer.						



Date	Author	Article Titles	Synopsis		A	B	C	D	D
2002	Petersen, J. & Matuschka	Interview with Matuschka: breast cancer, art, sexuality and activism	"Art is often a very useful tool for healing... Art can be a very constructive form of therapy, for it also is an example of empowerment." Matuschka used her art as an activist, her body & photography.						
2002	Borgmann, E.	Art therapy with three women diagnosed with cancer	"Women with breast cancer were able to increase their repertoire of coping strategies through art therapy which offered a mode of control by promoting self expression."					1	
2001	Singh, B.	The therapeutic effects of art making in patient with cancer	Three women artists with breast cancer using different mediums to explore & work through their cancer experience & evolve as artists.						
2000	Malchiodi, C.A.	Authority or advocacy: art therapy in service of self or others?	"That the creative process of art making is healing and life-enhancing and that all people can benefit from the therapeutic potential of the visual arts."					1	
1999	Csikszentmihalyi, M.	If we are so rich, why are we happy?	The "flow" experience.						
1998	Bloomgarden, J. & Netzer, D.	Validating art therapists' tacit knowing: The heuristic experience	Phenomenology, hermeneutic & heuristic research is lived experience, which naturally lends itself to art therapy. "Qualitative approaches reveal subjective experience as well as shared human experience."					1	
1996	Futterman Collier	The well-being of women who create with textiles: Implications for art therapy	"That art making can be most beneficial by orienting people away from distressed feelings & towards more positive feelings to create short-term mood repair."					1	
1996	Kaufman, A. B.	Art in boxes: An exploration of meanings	Using art as a container to express feelings of loss, suffering & death, from a mother's experience of the death of a child.					1	

Date	Author	Article Titles	Synopsis	A	B	C	D	D
1996	Malchiodi, C.A.	Women and art therapy	There are different approaches to art making & art therapy regarding self-expression beyond materials alone. Art therapist must account for gender, culture, class etc. Healing Legacies, by the Breast Cancer Action Group, show includes well-known artists.				1	
1995	Henderson	Empirical study of the healing nature of artistic expression: Using mandalas with the positive emotions of love and joy	"Many participants used the mandala as an expression to work through personal developmental change that they were experiencing in their lives as well as a way to express happiness or distress in relationships with others such as parents, lovers, friends, etc."				1	
1995	Lynn	Healing through art	"Artists have always used their creative talent to deal with life's difficulties. I never found this more true then when I was stricken with lymphoma in 1991."					
1995	Malchiodi, C.A.	Does a lack of art therapy research hold us back?	"Although we probably all believe that art making is inherently therapeutic & that the creative process is healing."				1	
1994	Quail, J.M. & Peavy, V.	A Phenomenologic research study of a client's experience in art therapy	The experience of the client through art therapy offers possibilities to promote discussion. "This type of research can be validating & affirming of art therapy not only in an intellectual sense, but in a deeper way."					

Figure 1. Articles collected and reviewed.

### **Answering the Research Questions**

The Figure 1 was created to establish the data collected literature into sections to answer the research questions. After coding each article into categories that pertained to each question, I summarized the data into a written form to find themes that stood out amongst the literature.

#### **A. What is in the literature about the current treatment modalities? (Typical screening, diagnostic, surgical and medical)**

**Screening and diagnostics.** There is increasing evidence that current breast cancer screening is known to reduce mortality (Cedolini et al., 2014). Survival rate for women with breast cancer appears to be associated with the stage of which the breast cancer is diagnosed and the age of the women (American Cancer Society, 2013). If women are familiar with the appearance and feel of their breasts, they may detect any symptoms or lumps while bathing or getting dressed. Breast self-exams may help women become more aware of their breast, although all lumps are not cancerous (American Cancer Society, 2013). The American Cancer Society has recommended mammography for women over 40 years of age annually. Breast ultrasound procedures can increase diagnostic accuracy when used in conjunction with mammography to measure tumor size (Benson et al., 2009). Women considered higher risk due to family history or with the BRCA1 or BRCA2 gene mutation are recommended for MRI screening (American Cancer Society, 2013; Benson et al., 2009). After a lump is found, a tissue sample is taken usually using fine needle aspiration cytology (FNAC) to determine malignant cells (Mandal, A. 2014).

**Surgical options/medical treatments.** Within the last few decades surgical treatments for women with breast cancer has progressed from receiving a radical mastectomy that included axillary lymph node dissection (ALND) to enable a full recovery to other viable options.

Surgically removing the cancerous tissue plus the lymph nodes by lymphadenectomy resulted in long-term survival in most cases, although complications can include lymphatic oedema of the upper limb, as well as movement and sensory disorders of the shoulder, pain and/or chylothorax, when chylous fluid fills the thoracic cavity. In the 1990's, sentinel-lymph-node biopsies (SLNB) were first tested (Murawa, P., Murawa, D., Adamczyk, B. & Polom, K., 2014). Another surgical option for women with breast cancer is breast-conservation surgery (BCS) established as a procedure for women with early-stage breast cancer (Benson et al., 2009). Patient preferences for either breast conserving surgery (BCS) or mastectomy (MAST) may vary. The benefit of adjuvant chemotherapy and hormonal therapy are worthwhile additions to the procedures. "Patients who prefer BCS are predominantly driven by body image, while for patients who prefer MAST survival and/or recurrence is the most prominent factor" (Hamelinck et al., 2014, p.1014). Attention to surgical margins and improved radiation therapy for MAST and BCS patients may reduce local recurrence. Two chemoprevention drugs used for the treatment of breast cancer are tamoxifen (for high-risk premenopausal women) and raloxifene (for high-risk postmenopausal women) (Benson et al., 2009). Tamoxifen can decrease the risk of breast cancer by 42% after an average use of seven years, although side effect can increase a risk of endometrial cancer, thromboembolic events and cataracts (American Cancer Society, 2013).

### **B. What is in the literature about the current understanding about women coping with breast cancer?**

**Side effects.** Breast cancer survivors attribute cancer-related fatigue, physical activity level and depressed mood as persistent side effects following cancer treatment (Galiano-Castillo et al., 2014). Continuous intrusive thoughts are predicted to elevate fatigue, sleep disturbance and pain for breast cancer survivors (Dupont et al., 2014). According to Winter-Stone et al.

(2008) over 58% of women breast cancer survivors reported persistent fatigue after five years post diagnosis. This may be associated with higher percentage of body fat, muscle strength and less physical activity. Some correlation may be related to age and fatigue since most breast cancer survivors are older (Winter-Stone et al., 2008).

**Body image.** Breast cancer survivors who had a positive regard for their bodies, roles, and characteristics as unique individuals prior to their breast cancer had less problems with body image disturbance, post treatment, while lower body image was associated with a poorer quality of life (Boquiren et al., 2013). The level of self-compassion that women have following breast cancer treatment may be directly associated with dissatisfaction with body image. If breast cancer survivors have a poor body image they may likely be depressed, anxious or stressed because of their lower level of self-compassion for themselves (Przedziecki et al., 2013). Women's perception of body image, attractiveness and femininity following breast cancer treatment has appeared to increase depression and reduce quality of life. Multidisciplinary services to help women with breast cancer improve their physical appearance and femininity can help to develop a positive body image perception, in turn reducing depressive symptoms, and contribute to a better quality of life (Begovic-Juhant et al., 2012).

**Meaning in life/quality of life.** Meaning in life refers to an existential experience, situation or event, possibly such as cancer, which focuses on the meaning discovered by the individual. Evidence has shown that meaning in life can decrease perceived levels of fatigue (Thompson, 2007). "Meaning appears particularly important in confronting highly stressful life experiences, and much recent research has focused on meaning making" (Parks, 2010 p. 257). According to Nesbits (2006) when she was diagnosed with breast cancer in 2000, she began to use creativity and self-actualizing creativity to help her combat her disease. She incorporated

flow activities to restructure her consciousness from negative to positive experiences. “A caterpillar’s metamorphosis into a butterfly symbolizes my transformation from a frightened, sad, and inherently creative woman with a diagnosis of breast cancer (a caterpillar) into a strong, inspirational, joyous, and creative role model for others diagnosed with breast cancer (a butterfly)” (Nesbit, 2006 p.62).

Mindfulness-based stress reduction (MBSR) improves distress and fear of recurrence, while improving quality of life for breast cancer survivors transitioning from treatment (Lengacher et al., 2009). According to Monti et al. (2006) the use of mindfulness art therapy with cancer patients can decrease distress levels and improve their quality of life. These mindfulness practices can be effective adjunct treatments for the breast cancer patient and survivor.

Many sources report that physical activity is beneficial to women with breast cancer and breast cancer survivors. Physical activity helps in combating depression and fatigue, which leads to an improved quality of life (Mutrie et al., 2012; Phillips & McAuley, 2013; Short et al., 2013).

Empowerment and strengths within oneself may help breast cancer survivors by perceived support and acceptance from their surroundings (van den Berg et al., 2013). Positive psychotherapy exercises can promote positive emotions that may decrease depression and anxiety (Seligman et al., 2006). It is possible to experience posttraumatic growth, when a positive change occurs as a result of a crisis; this is “benefit finding” (Wilkinson & Chilton, 2013 p. 6). Through the use of art therapy with positive psychotherapy one can find meaning and growth (Wilkinson & Chilton, 2013). According to Wilkinson and Chilton (2013), a participant within their study joyfully expressed that creativity was one of many “gifts of cancer,” (p. 6) this is referred to as benefit finding.

**Expressive art therapies.** The use of expressive art therapies has been shown to improve overall quality of life for breast cancer patients in most areas of life including spiritual, physical, emotional, cognitive, creative, and social (Klagsbrun et al., 2005). Art can be a tool for healing and a constructive form of therapy that can be empowering (Petersen & Matuschka, 2002). Art therapy enables women with breast cancer to regain a sense of control, self-efficacy, and self-esteem by promoting self-expression (Borgmann, 2002).

Many artists used their art as a way to explore and work through their cancer experiences. Art making can vary for each artist from photography, painting, textiles, sculpture, crafts, and journaling, these can be helpful mediums to cope with their cancer. In some cases, their art has progressed to another level while they are on their cancer journey (Bell, 2006; Bottorff & Long, 2006; Chansky, 2007; Collie, Nesbit, 2006; Oster et al., 2007; Radley & Bell, 2007; Reynolds & Lim, 2007; Zammit, 2001).

Expressive arts therapies can be explored in various ways, such as, expressive writing and drawing. Both of these mediums seem to help as coping strategies to improve mood through narratives experiences with positive success (Craft, Davis & Paulson, 2012; Drake & Winner, 2012). Drawing can also be used as a distraction of negative feelings and can be an effective short-term mood repair (Drake & Winner, 2012). In addition, Collier (2011) explored the use of textile handcrafts as a coping strategy method while dealing with illness. When textile-copers created something beautiful, they felt rejuvenated and reported an improved in quality of life.

The Thibeault and Sabo (2012) study was the collaboration of nurse-researchers with professional artists to create life-like torsos of two breast cancer survivors. The participants were interviewed during the casting session to help the authors understand their experiences through narratives of their healing process and cancer journey as well as the art experience (Thibeault &

Sabo, 2012; Sabo & Thibeault, 2012). Another project that included breast cancer survivors was “The Pink Ribbon Pin-Ups.” This project photographed breast cancer survivors and created a calendar to educate and bring awareness to breast cancer. Those breast cancer survivors, who participated, expressed feelings such as “empowered, uplifted, joyous and sexy” (Regehr, 2012, p.762). In turn the Pink Ribbon Pin-Ups project brought awareness and commercial sponsorship to breast cancer (King, S., 2004).

### **C. What is in the literature about alternative treatments for breast cancer?**

#### **Survivorship and side effects? (Physical activity, diet, mind/emotions, creativity)**

**Physical Activity and Diet.** Cancer-related fatigue and depressed mood are two of the most common side effects related to breast cancer (Galiano-Castillo et al, 2014). In Alfano et al. (2009) study, women reported by increasing their exercise and increasing fruits and vegetables in their diet they experienced less fatigue. By making some of these positive changes in diet and activity levels, there appeared to be a reduced risk of recurrence, secondary cancer, mortality and comorbid conditions. According to Winter-Stone et al. (2008) older women are amongst the greatest number of breast cancer survivors and fatigue is a persistent symptom that effects breast cancer survivor of any age. Physical fitness and activity seems to mitigate symptoms of fatigue in older breast cancer survivors with better muscular strength and body composition, but with persistent fatigue it may lead to inactivity, which will contribute to muscle weakness and increase in weight (Winter-Stone et al., 2006). According to Alfano et al. (2009) physical activity and healthy lifestyle choices can reduce cancer recurrence following a breast cancer diagnosis.

Current evidence suggests that changing lifestyle behaviors may reduce post-treatment fatigue experienced by breast cancer survivors. According to Guest et al. (2013) findings, breast cancer survivors reported less fatigue when meeting current USDA recommendations for activity



levels with less fat and adding more fiber to their diet. Some breast cancer survivors reported the benefits of higher levels of leisure activity equated to lower levels of depression and improved mood and quality of life (Mutrie et al., 2012). According to Phillips and McAuley (2013), the majority of studies regarding breast cancer and physical activity and quality of life have been related to physical health. There are fewer studies that consider quality of life on a global psychological construct, reflecting the conscious cognitive judgment of one's life or life satisfaction. Sixty percent of breast cancer survivors are over 65 years of age so the concept of Quality of life may be particularly important in regards to a more global perspective. When breast cancer survivors increase their physical activity, the result will be an increase in self-efficacy and this self-efficacy will help to improve Global Quality of life. (Phillips & McAuley, 2013).

**Mind/emotions.** There are alternative methods to help with side effects for breast cancer patients and survivors that deal with the more emotional and mental aspects. According to Nesbit (2006) the use of everyday creativity and self-actualizing creativity with the integration of experiencing flow enabled her to battle her breast cancer. She reconstructed her consciousness with positive rather than negative experiences using activities as walking, socializing, art, music, writing, and even daily routines, the everyday experiences became spiritual and she found meaning in life (Nesbit, 2006). The mind, body, and spirit integration through the journey of healing is important for personal change and growth through the perceived healing process (Kusilka, 2014).

According to Van Den Berg et al. (2013), patients that feel a sense of empowerment seem to be more adaptive cognitively to their illness and more likely to accept their situation as well as adding positive meaning to their cancer experience (often coined perceived benefits or post-

traumatic growth). Breast cancer survivors can feel empowered by inner strength with also the perceived support and acceptance from their surroundings (Van Den Berg et al., 2013). It is possible to experience post-traumatic growth, when a positive change occurs as a result of a crisis, benefit finding is an expression used referring to this attitude (Wilkinson & Chilton, 2013).

“Positive psychotherapy (PPT) intervention exercises may help reduce depression by increasing positive emotion through engagement and meaning rather targeting depressive symptoms” (Seligman, Rashid & Parks, 2006, p. 774). Seligman suggests decomposing “happiness” into three components: positive emotion, engagement, and meaning within the exercise these are further explored. PPT could help by increasing positive emotions therefore decreasing depression and anxiety caused by a crisis or illness, such as breast cancer, in this way character strengths and meaning is built (Seligman et al., 2006). Seligman recognized the term “Flow” that Csikszentmihalyi developed as a psychological state that accompanies highly engaging activities, to relate to engagement or engaged life. “Using one’s signature strengths and talents to belong to and serve something that one believes is bigger than the self, perceived as ‘positive institutions’: religion, politics, family, community, and nation can help produce a sense of meaning. The lack of meaning can be a cause of depression and may be relieved by intervention that help to build meaning” (Seligman et al., 2006, p. 777). According to Parks (2010) meaning appears to be particularly important when one is confronted with highly stressful situations or event in life. A diagnosis and treatment for breast cancer can be a highly stressful event (Monti et al., 2006). Being diagnosed or surviving cancer appears to affect most of one’s psychological thoughts due to the perceived feeling that the world as less controllable (Helgeson & Tomich, 2005).

Mindfulness-based practices such as mindfulness-based stress reduction (MBSR) and mindfulness-based art therapy (MBAT) can improve quality of life and decrease distress in breast cancer patients as well as reduce fear of recurrence in breast cancer survivors (Lengacher et al., 2009; Monti et al., 2006). According to Monti, the goal of MBAT is to decrease distress and improve quality of life by developing a psychosocial group for cancer patients to integrate mindfulness meditation skills with art therapy in a supportive group environment to enhance support and expand coping strategies. MBAT provides verbal and non-verbal aspects and is designed to help participants to develop skills of self-regulation to help cancer patients decrease distress levels and improve their quality of life (Monti et al. 2006).

**Creativity.** "Expressive art therapies improved overall quality of life, these gains referred to various spiritual, physical, emotional, cognitive, creative & social aspects in their lives" (Klagsbrun et al., 2005). According to Craft et al. (2012), expressive writing can be a positive form of expressing emotions and used as a coping strategy. Art making through the use of textiles can be beneficial in helping to improve short-term mood repair and orienting people away from distressed feeling including coping with illness (Collier, 2011). Making mandalas has been used to help express one's feelings, happiness or distress, as well working through personal developmental changes in one's life (Henderson, 2012).

Art can be used as a political and/or ethical statement to bring about awareness or commercial sponsorship brought about by King's article "Pink Ribbons Inc. breast cancer activism and the politics of philanthropy." According to Amaya, H. (2004) when Matuschka, a high fashion model, became a victim of breast cancer she reestablished her self as an artist and advocate about the tension between beauty and illness. "Matuschka's artwork produced since her

mastectomy is part of a process of transformation that includes her ethical self and her political self” (Amaya, 2004, p. 570).

#### **D. What is in the literature about the role of art with women with breast cancer?**

##### **1. The use of art therapy.**

**Art therapy used as a therapeutic process.** Overall, the majority of the literature reviewed revealed there were trends that appeared throughout, how art therapy was consistently effective in improving mood or depression of cancer patients and survivors (Bar-Sela et al., 2007; Czamanski-Cohen, 2012; Drake et al., 2012; Drake & Winner, 2012; Elkis-Abuhoff et al., 2011; Nainis et al., 2006; Svensk et al., 2009). The use of art therapy and art making used as a therapeutic process tend to have many commonalities and benefits (Collie, 2011; Collie et al., 2006; Czamanski-Cohen, 2012; Monti et al., 2006; Oster et al., 2007; Reynolds & Lim, 2007). According to Reynolds & Lim, (2007) “This phenomenological study sought to understand how visual art making as a leisure pursuit, rather than formal psychotherapy, contributes to the subjective well-being of people living with cancer” (p. 9). The mandala-making process demonstrated to be a valuable process that allowed women with breast cancer the ability to express and communicate in a non-verbal way, providing psychological support (Elkis-Abuhoff et al., 2009). In Henderson’s (1995) study, many participants used the mandala experience as a developmental tool to express and explore emotional relationships with others. Using art as a container to express feelings of loss, suffering and death from a mother’s perspective dealing with her own child’s death was explored by Kaufman (1996), in “Art in boxes” Collier (2011) further explores how the use of textiles in art making can be a beneficial way of repairing distressed feelings toward a positive realm to become a short-term mood repair. When women with chronic illnesses engaged in artistic expression to re-create their life’s stories, they were

able to focus on specific challenges and emotions. Through this experience they generated a positive self-image, which gave them a sense of mastery allowing them to see a wider range of life possibilities (Thibeault & Sabo, 2012).

**Art therapy non-verbal expression.** When breast cancer patients participate in art therapy there is a connection between their physical and mental health that offers them a means in which to express through art (Borgmann, 2002). According to Borgmann, (2002), cancer patients increase their coping-skills and offers a mode of control through self-expression.

According to Oster et al. (2007) art therapy can be an opportunity for women with breast cancer to express themselves in a non-verbal way. This may help while going through treatment and the feelings of invisibleness related to health-care (Oster et al., 2007). Art therapy helped women with breast cancer to legitimize their own experiences and interpretations enabling them to protect and strengthen their own boundaries (Oster et al., 2009).

**Making art to relieve symptoms.** Art therapy can play an important role as a complimentary therapy for breast cancer patients (Svensk et al., 2009). According to Nainis et al. (2006), breast cancer patients reported that after art therapy sessions they felt a reduction in symptoms and less tired, even though they had reported being tired prior to art therapy. The subjects commented that art therapy had energized them. The art making process can be used as a distraction that may repair one's mood in the short term rather than as a vehicle for expression of pain (Drake, Coleman & Winner, 2011). Using art as a distraction of negative feelings can be an effective mood repair, rather than just venting. Art making not only benefits the individual to cope with their cancer, but also helps in reducing stress, while being pleasurable during a time of negative or difficult emotions, it can be life-enhancing (Czamanski-Cohen, 2012).

**D. What is in the literature about the role of therapeutic use of art (non-art therapy) for women with breast cancer?**

**2. Therapeutic use of art (non-artists) and the artists' way (artists)**

**Art used therapeutically.** The Pink Ribbon Pin-Up project depicted women with breast cancer photographically in a calendar format (Regehr, 2012). The women photographed for this project expressed their relationship to the illness and their bodies. Most of the women who participated in this project expressed their experience as being positive with feelings of joy, empowerment and even sexy (Regehr, 2012). Two breast cancer survivors participated in an art project in which life-size torso sculptures were made of their bodies. These torsos allowed these women to re-experience the landscape of their bodies through self-reflection in a visual and tactile way to help them re-author their life narrative (Sabo & Thibeault, 2012; Thibeault & Sabo, 2012). In both of these cases the women were not artist themselves, but worked with artists to share their stories as breast cancer patients and survivors.

According to Darcy Lynn (1995), when she was diagnosed with lymphoma in 1991, at that time she began to draw and sketch images of her experiences during treatment of herself and her doctors. Painting seemed to be the one thing she could be in control of. Women living with breast cancer continue to make art as a leisure activity. In this realm artwork may not relate specifically to cancer but tended to be positive and immersed in color and texture, although this did not mean they were coping easily with their cancer. Women engaged in creative art making were able to retain an aspect of self-identity prior to cancer and ensure personal development. The need to create art is important and can be an escape as well as defiance (Reynolds et al., 2008).

**The artists' way.** The artists' way refers to artists that have turned to their own art making as a healing and comfort tool. "Art is often a very useful tool for healing...Art can be a very constructive form of therapy, for it also is an example of empowerment" (Petersen & Matuschka, 2007, p. 502). A few artists have used the art of photography as a form activism about breast cancer. In 1993, the *New York Times Magazine* cover image was of Matuschka's post-mastectomy self-portrait. After being diagnosed with breast cancer and undergoing an unnecessary mastectomy, Matuschka became a renowned activist through her imagery of self-portraits in which her mastectomy scar was the focus of her work (Petersen & Matuschka, 2007; Amaya, H., 2004).

Two other artists that explored their breast cancer experience through photographic narratives are Catherine Lord and Lynn Kohlman. Catherine Lord's photographic memoir, *The Summer of Her Baldness*, chronicles her breast cancer treatment with the documentation of headshots of herself as she became bald, she included the mammogram scan of her cancerous right breast in her work. Lynn Kohlman created her photo-narrative *Lynn Front to Back* with highlights of her personal and professional life and her lived experience as a cancer patient (DeShazer, 2012). Kohlman, once a high fashion model in the 1970's, was diagnosed with breast cancer, after her double mastectomy she began to do self-portraits. "Her experience as a photographer gave her courage to combat cancer" (DeShazer, 2012, p. 24).

A British photographer, Jo Spence was a recognized artist when she was diagnosed with breast cancer, she took nude photographs with her scarred breast. Spence continued to show her work in small galleries, health centers and community center and engaged with other breast cancer patients and doctors (Bell, 2006; Radley & Bell, 2007). Martha Hall began to make artists' books after the recurrence of her breast cancer; these books became a powerful part of her

healing process. Hall made more than 100 books exploring breast cancer narratives in which to be used as a create support for others (Bell, 2006; Radley & Bell, 2007).

Singh's (2011) explored how three artists chose different ways to approach their breast cancer experience through art making. When Irene Boudreau was diagnosed with breast cancer, she began to use her photography as a way to help her deal with her cancer. The predominant theme in her work was "Getting a clearer view" which helped her to cope with her cancer using art. Later, Irene paired up with painter Carolyn Bedford and together they exhibited their work of provoking images about their breast cancer experiences. Carolyn's paintings became louder after her cancer diagnosis; her art was an outlet for her emotions during her cancer experience, and "her art helped her clear her way emotionally through the mixed emotions she experienced as a cancer patient" (Singh, 2011, p. 162). Sandra used her art as a haven to escape her fears and confusion she felt from her breast cancer diagnosis. She continued directing her play to forget her breast cancer and began to write poems out of her experience to find a safe place away from her thoughts of cancer. "Sandra found comfort in her art and her art in turn gives comfort to others who are going through similar experiences" (Singh, 2011, p. 162).



## Themes Supported by the Findings in the Literature On Breast Cancer Patients/Survivors

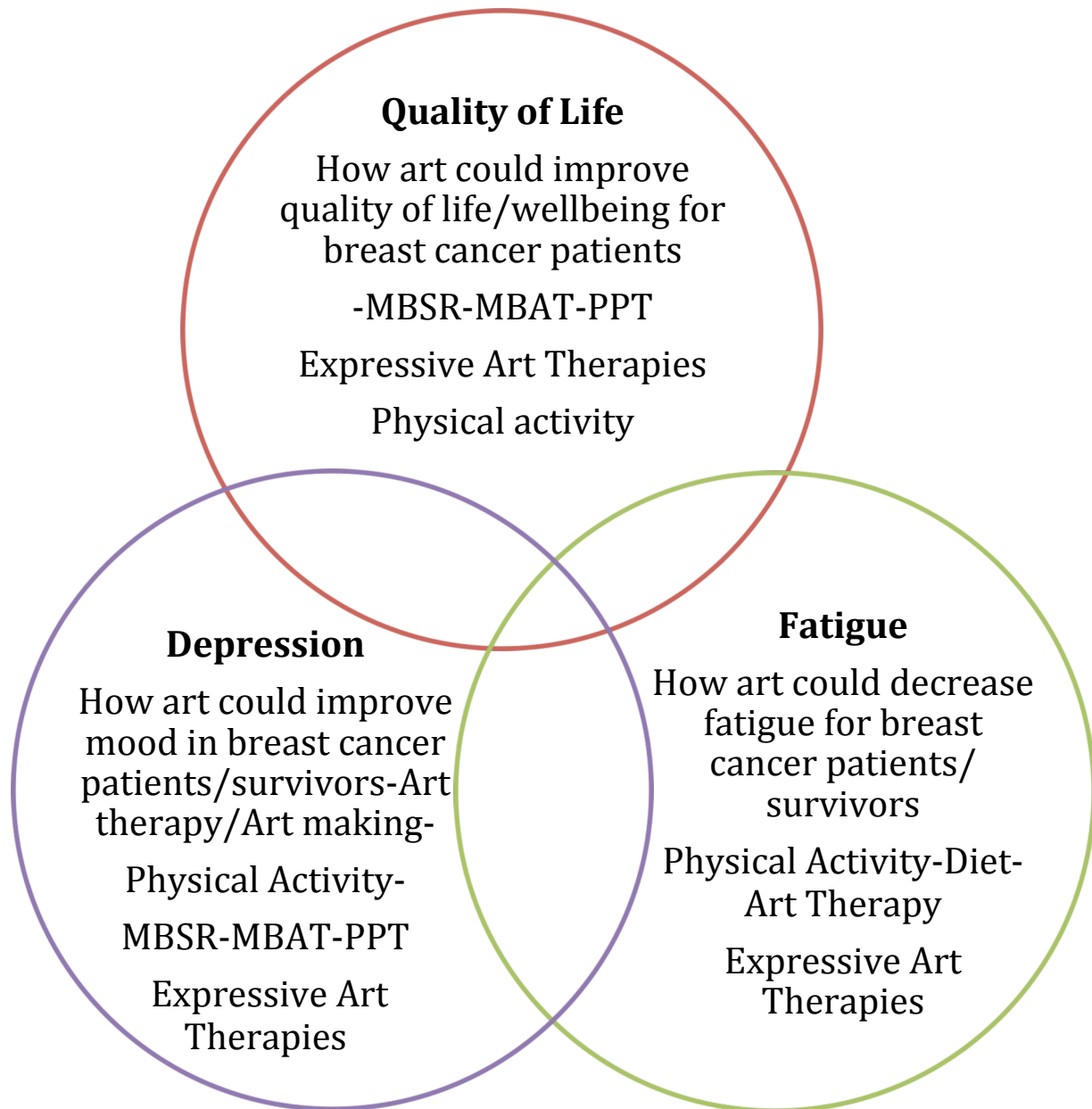


Figure 2. Themes Supported by the Findings In the Literature On Breast Cancer Patients/Survivors

### **Analysis of Data**

According to the literature gathered there were reoccurring themes that were presented about women with breast cancer. The two most common were the side effects of fatigue and depressed mood, from treatment and post-treatment of breast cancer patients and survivors. The third was an emphasis on how alternative therapy improved the quality of life for women with breast cancer and survivors. I analyzed why and how art therapy works to relieve some of the side effects as well as how even just the act of making art can be a therapeutic endeavor in and of itself. There appeared to be a common emphasis on purposeful meaning making as well as quality of life following a cancer diagnosis in most of the literature.

In most cases, patients and survivors participating in some form of alternative therapy reported some relief in their side effects. There was also improvement when breast cancer patients and survivors were involved in physical activity or improved their diet (Alfano et al., 2009; Galiano-Castillo et al., 2014; Guest et al., 2013; Winter-Stone et al., 2006).

These findings can help with further research and studies regarding this subject of breast cancer, cancer, and many chronic illnesses. Medical modalities are significant in the treatment of disease, but as shown in some of the literature using alternative adjunct therapy can help to alleviate some side effect brought on by treatment and disease.

**Depression.** The most common theme found was depression as a side effect for many breast cancer patients and survivors. The causes vary, some might be related to fatigue, body image, and emotional/physical stressors from cancer treatment, diagnosis, and prognosis (Galiano-Castillo et al., 2014; Przedziecki et al., 2013). Increasing physical activity and social interactions seems to decrease depression. According to Mutrie et al. (2012) some women reported lower levels of depression and an increase in mood levels when they were physically

active. Women perceptions of body image, attractiveness and femininity after going through breast cancer treatments appeared to increase depression, although with services to help women improve their physical appearance and femininity, depressive symptoms were reduced (Begovic-Juhant et al., 2012).

Art therapy can improve mood as well as be a calming relaxing activity and provide a sense of control, increase self-esteem and be a supportive environment (Nainis et al., 2006). One may experiences a sense of increased wellbeing through the use of art therapy using creative pathways that can increase positive emotions (Wilkinson & Chilton, 2013). Art making can be a beneficial short-term mood repair (Drake et al., 2011). According to Collier (1996) the grounding quality and aesthetics while using textiles has proven to help women with breast cancer focus on creating something beautiful and helps them cope with negative moods. Making art as a distraction from negative feelings can be an effective mood repair (Drake, Coleman & Winner, 2012).

Expressive writing, like art and drawing may improve one's mood in the long term because it allows individuals to write cohesive narratives of their experience (Craft et al., 2012; Drake & Winner, 2012). Many artistic experiences have helped with positive self-image and an increase in one's mastery giving one a broader view of life's possibilities (Thibeault & Sabo, 2012). Art making can benefit individual's coping with cancer as well as reduce stress. This activity of art making can be pleasurable while dealing with negative emotion and be life-enhancing too (Czamanski-Cohen, 2012). Artists living with cancer continue to make art as a leisure activity and may get immersed in color and texture as a positive experience (Lynn, 1995). The need to create art can be an escape and even a defiant form of expression but art making can help these women retain an aspect of their self-identity prior to cancer (Reynolds et al., 2008).

Mindfulness practices help with depression by reducing stress especially as breast cancer patients transition from treatment, using techniques from both MBSR and MBAT can improve mood levels (Lengacher et al., 2009; Monti et al., 2006). The use of positive psychotherapy exercises may promote positive emotions and therefore reduce anxiety and decrease depression (Seligman et al., 2006). According to Nesbit (2006) by integrating self-actualizing creativity into her everyday life and restructuring her consciousness with positive experiences, rather than negative, her everyday activities, such as walking, socializing, art, music, and writing, helped her to battle her breast cancer. The attitude in which enhancement to common events can be referred to as an attitude of flow (Csikszentmihalyi, 1999). This idea of “Flow”, Seligman (2006) refers to it as a highly engaged psychological state one brings to an activity.

**Fatigue.** The second most common theme found in the literature was fatigue. Most breast cancer patients and survivors experience high levels of fatigue during and following treatment. According to Thompson (2007) women diagnosed with stage II breast cancer experienced high levels of fatigues after receiving chemotherapy. Even though most breast cancer patients and survivors are older, persistent fatigue can effect any age and continue after treatment is complete. There are some indications that fatigue levels have been reported as decreasing after treatment is complete, but some women have experienced moderate fatigue 16 months following the completion of treatment.

Many sources report that physical activity is beneficial in combating fatigue for breast cancer patients and survivors (Mutrie et al., 2012; Phillips & McAuley, 2013; Short et al., 2013). Physical activity can mitigate the symptoms although many breast cancer patients and survivors continue to be inactive because of fatigue, which will contribute to muscle weakness and weight gain (Winter-Stone et al., 2006). There is higher risk of prolonged fatigue for patients and

survivors who have an inactive lifestyles and an unhealthy body composition (Schmidt et al., 2014). According to Guest et al. (2013) the population of breast cancer survivors that are less physically active and more obese, fatigue may be associated with their diet. When breast cancer survivors incorporated healthy life style choices, such as diet and exercise, there appeared to be an improvement in fatigue level (Alfano et al., 2009). These healthy behavior choices included an increase of fruits and vegetables as well as lower fat intake and increasing fiber in one's diet may improve the effects of fatigue and help reduce the risk of recurrence (Alfano et al., 2009). Breast cancer survivors reported less fatigue when they met the current USDA recommendations for activity levels and dietary requirements of less fat and more fiber intake (Guest et al., 2013).

A correlation between cancer-related fatigue and meaning in life can be associated with psychological factors and overall symptoms experienced by breast cancer survivors (Thompson, 2007). Participants in some creative art therapies referred to gaining various spiritual, physical, emotional, cognitive, creative and social aspects. A dance therapy support group reported improved vigor and reduced fatigue (Klagsbrun et al., 2005). In some cases patients expressed they felt a reduction in symptoms and tiredness and an increase in energy, when participating in art therapy. Art therapy had energized them (Nainis et al., 2006).

**Quality of life/wellbeing.** Quality of life is a broad concept but can relate to general mental and physical attitude of wellbeing in life. This could be an assessment of one's well being including one's emotional, social, and physical aspects of an individual's life. In health related issues one's quality of life usually refers to how a disease, disability, or disorder may affect an individual over time (en.wikipedia.org, 2014). With the onset of breast cancer most women's lives are forever changed due to physical aspects (body image and ailments), surgeries, and treatments. Usually there are side effects that change a person's life from how it was prior to

cancer (Galiano-Castillo et al., 2014). Mindfulness based practices as well as positive psychotherapy helped to improve quality of life and wellbeing for breast cancer patients and survivors (Kusilka, 2014; Lengacher et al., 2009; Monti et al., 2006; Seligman et al., 2006; Van Den Berg et al., 2013; Wilkinson & Chilton, 2013). Using different mindfulness practice such as mindfulness-based stress reduction (MBSR) and mindfulness-based art therapy (MBAT) can help in reducing fear of recurrences, also decrease distress and in turn improve one's quality of life (Monti et al., 2006).

When breast cancer patients and survivors feel a sense of empowerment and are able to accept their situation with some positive meaning to their cancer experience, there is a possibility for post-traumatic growth; this is where a positive change occurs as a result of a crisis (Van Den Berg et al., 2013; Wilkinson & Chilton, 2013). Positive psychotherapy exercises can help to initiate this process (Seligman et al., 2006).

Many expressive art therapies can help to improve one's quality of life through spiritual, physical and emotional ways using forms of creativity along with social aspects (Klagsbrun et al., 2005). There appears to be a link between art therapy and meaning making. When breast cancer patients have participated in these activities, they maintain a sense of purpose and meaning despite their cancer (Collie, Botorff & Long, 2006; Wilkinson & Chilton, 2013).

An increase of physical activity and other social leisure activities may improve the quality of life of breast cancer patients and survivors (Mutie et al., 2012). According to Phillips and McAuley (2013), when breast cancer survivors increase their physical activity level, there is an increase in self-efficacy, which can in turn improve quality of life. When breast cancer survivors combat some of their side effects of depression or fatigue with physical activity, they

may improve their quality of life (Mutrie et al., 2012; Phillips & McAuley, 2013; Short et al., 2013).

### **Findings**

The intention of this paper was to systematically explore published literature about women with breast cancer to see how women cope with their cancer using art and art therapy. I used the Internet database from LMU/LA William H. Hannon Library website Art Therapy LibGuide as my primary source, including publications from MEDLINE, PsycINFO, and ScienceDirect, as well as art therapy studies and publications. After gathering published works, I reviewed and sorted according to themes to answer my research questions, see *Figure 1*. The themes that most stood out in the literature related to side effects from breast cancer treatments as well as the importance of quality of life when one is confronted with breast cancer.

Amongst the findings there were three predominant themes that occurred. One of the themes was the emphasis on improving one's quality of life. The other recurring theme that was present in most of the literature was side effects that breast cancer patients and survivors experience during and after treatment. The two most common side effects were depression and fatigue, as seen in *Figure 2*. Many studies that addressed these side effects found alternative/adjunct therapies and treatments to be successful. Specifically, several studies suggested strong evidence for physical activity as an effective method to address depression and fatigue as well as improving one's quality of life. Although there seemed to be more attention to the activity level of breast cancer patients and survivors, it appeared that diet plays a factor too. Organized activities such as support groups, exercise groups, and art groups (art therapy or open studio) because of the social aspects contribute greatly to one's quality of life.

The research shows that side effects for women with breast cancer continue to be problematic (refer to Research Question B, Side Effects). When women were involved in alternative therapies such as mindfulness practices, expressive arts therapy, and art therapy, this seemed to improve mood and created less fatigue resulting in an improved quality of life. I think there are other significant areas to research and study regarding the effects of complimentary and alternative therapies used in conjunction with conventional medicine, such as mind-body practices (ie. yoga, meditation, acupuncture, and message).

Most of the research found that art therapy and art making helped to decrease side effects. Art making in and of itself was beneficial (refer to Research Question D 1). Using almost any medium seemed to help as a distraction from cancer treatments and side effects and allow women to feel a personal accomplishment. In some cases this mastering of an art medium created an opportunity to expand as an artist. Developing these skills gave way for meaning and purpose allowing participants to feel a sense of empowerment and control in their lives. Participating in art therapy groups allowed women to share experiences and develop social aspects of sharing one's art, which seemed to enhance their lives. Even when art making was done in a solitude way the sharing and witnessing of one's art through others seemed to enrich the experience for the artist (refer to Research Question D 2, Artist way).

Incorporating art therapy within the hospital or clinical environment where cancer patients are being treated can be very beneficial. There are many clinics and hospitals where chemotherapy and radiation are conducted on a regular basis. Breast cancer patients spend many hours waiting and receiving treatments. This would be the optimum time for these patients and even family members to participate in art therapy programs. These programs could be individual, family or even groups. Cancer is an overwhelming experience for not only the patient but also



anyone who supports them, friends or family. Having an on-staff art therapist available for patients and supporters would help. Even when treatment is complete the patient and survivor would benefit in any community-centered group to help them cope with their new reality. Cancer support groups that are centered on an activity tend to help the patients and survivors to develop new activities and help to distract from negativity. An open studio art group would be a great opportunity for patients and survivors to be involved in.

Examining other ways to combat depression and fatigue, the use of mindfulness practices, positive psychotherapy, expressive arts therapies and art therapy were among those looked at (refer to Research Question C, Mind/Emotion). These practices and therapies were also helpful with the improvement of one's quality of life. Basically, when depression and fatigue improved, women felt better and therefore their quality of life improved (refer to Research Question B, Meaning in life/quality of life). Art therapy and other expressive art therapies and mindfulness-based practices can bring forth an opportunity for cancer centers, hospitals and even community based centers to incorporate the use of these alternative therapies while breast cancer patients are in treatment as well as continuing aftercare (refer to Research Question B, Expressive art therapies). These types of therapies create a supportive environment for breast cancer patients and survivors when in a stressful and intimidating time with an overwhelming medical environment to deal with. On-staff art therapists in hospitals and medical offices can be beneficial to breast cancer patients that are diagnosed or receiving surgery and/or treatments. Along the same lines, would be any medical facility where cancer patients are receiving radiation or chemotherapy treatment.

Early intervention using art therapy could benefit women who are newly diagnosed with breast cancer. Immediately following a cancer diagnosis, there is fear and disbelief. With this

emotional upset art therapy could help women to express these feelings, because at this point it are very difficult to verbalize (refer to Research Question D 1, Art therapy non-verbal expression). Most women would benefit with individual art therapy especially since art making may be a new experience. As cancer treatment begins either surgically or with chemotherapy or radiation, many hours are spent devoted to cancer treatment. It can be helpful if not essential to be involved in an art therapy group. This supportive environment can help women with breast cancer to realize they are not alone. Art therapy can be an opportunity to express feelings as well as be a distraction when side effects begin to occur (refer to Research Question D 1, Making art to relieve symptoms).

When breast cancer treatment is complete, there are still unresolved emotions and feelings of grief and loss. These feelings should be addressed. A supportive group activity such as an open studio art program or an art therapy group would be helpful with this transition from patient to survivor. Even as a survivor, there are still fears of recurrence of cancer; therefore, art therapy could allow those unresolved emotions to surface and be explored. In some cases when there is a recurrence of cancer, there can be a supportive environment within the art therapy group (refer to Research Question D 1, Art therapy used as a therapeutic process). Using art making as a tool to help survivors and patients cope with their cancer will continue to be a benefit and create purpose and meaning.

This comprehensive review had many limitations due to the limited amount of resources reviewed and analyzed by the author. Time constraints prevented the ability to do art-based research with breast cancer patients and survivors. This would have been a very valuable resource to be explored and should be further looked at in the future for additional studies. I personally would have liked to explore my own experience as a breast cancer survivor through

art-based heuristic research. Being an artist and doing my own art while I was a breast cancer patient initiated this study. However, doing the heuristic research was not possible at this time because of the time constraints associated to this project.

Most of these findings within the literature study had many limitations. The collection of data in most of the studies was self-reported and subjective in many respects; therefore there may be some limitations in the findings. There was a limited amount of literature and research that had been done using these alternative therapies as adjunct treatments with breast cancer patients, especially in the field of art therapy. However I was unable to obtain extensive literature from other alternative therapies due to my time constraints. The limitation of this study results in the need for possibly further research in this field especially art-based research. This art-based research could benefit cancer patients and survivors as well as the field of art therapy.

### **Conclusion**

This research paper intended to explore how women cope and make sense of their breast cancer using art and art therapy. The author's main objective was to answer the research questions through a systematic and comprehensive review of published literature illuminating the topic.

The methodology used was a systematic exploration of published literature from oncology, psychology and art therapy journals to answer the questions of how women cope or make sense of their breast cancer. The literature was gathered using Internet searches from the LMU/LA William H. Hannon Library web site through the Art Therapy LibGuides databases. Key words were used for the study search within the general medical and psychology publications with search parameters between 2009 and 2014. Any other professional or scholarly publications about women with breast cancer with a connection to art or art therapy were gathered; these search parameters were from 1995 to 2014. This time frame was broadened due to the limited amount of published research in the art therapy field.

Amongst the findings, there were three common themes. The first two were common side effects that most women with breast cancer deal with during and following treatments. They are depression and fatigue. The topic of quality of life stood out as a major subject that related to the two other side effects and became the third theme. These three themes seem to overlap with some common symptoms as well as similar behaviors or treatments to alleviate or improve the patient or survivor's life.

I think there are other significant areas of research and study to be explored about the benefits of complimentary and alternative therapies used in conjunction with conventional medicine, such as mind-body practices (ie, yoga, meditation, acupuncture, and message). This

research was limited in collecting and gathering the most current and expanded professional and scholarly literature due to the limitation of the author. Time constraints created a limit in the number of articles collected and reviewed. Although the literature was consistent with the theme of side effects, depression and fatigue, and the quality of life were connected throughout the literature gathered. The most significant limitation to this study was the lack of current art-based research explored through lived experiences from breast cancer patients and survivors. This extensive review has given way to opportunities to develop art-based research with women in cancer support groups in the future using art therapy.

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