PERSPECTIVE OF NAVAJO WOMEN IN RECOVERY
FROM BREAST CANCER

by

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STATEMENT BY AUTHOR

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APPROVAL BY THESIS DIRECTOR

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DEDICATION

This thesis is dedicated to five beautiful and courageous Navajo women for sharing their experiences with me.

Thank you: Dawn, Bah, Shondee, Dee, and Raven
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This research was an ethnographic study of the perceptions of five Navajo women who were in recovery from breast cancer. The conceptual orientation for this study consisted of the cultural and social structure dimensions from Leininger's Sunrise Model (Leininger, 1991). The domains identified in this study reflect the Sunrise Model's religious and philosophical factors, kinship and social factors, and cultural values and lifeways. The domains of meaning identified are: Support Persons and Practices, Power and Strength, Self-Care Practices, Difficult Feelings about Breast Cancer, and Biomedical Treatment. The three cultural themes that emerged from the analysis are: (a) Elders' teachings guide the process of recovery and all of lifeways; (b) Ceremonies and beliefs give the power for healing and are the spiritual journey that is woven throughout the culture; and (c) Recovery is important because a long life is desirable.
CHAPTER ONE

INTRODUCTION

Happily, may I walk.
Happily, with abundant dark clouds, may I walk.
Happily, with abundant showers, may I walk.
Happily, with abundant plants, may I walk.
Happily, on a trail of pollen, may I walk.
Happily, may I walk.

- from the Prayer of the Night Chant
  (Navajo)

The purpose of this study was to describe the perspective of Navajo women regarding biomedical and traditional Navajo methods for healing and recovery from breast cancer. My interest in breast cancer stems from my own diagnosis as I am a three-year survivor of breast cancer. This was a very traumatizing period for me and my children. Shock, disbelief, and tears were my first experience in dealing with my diagnosis. Within two weeks, I had surgery and endured six months of chemotherapy. Before surgery and during my recovery, I practiced both traditional prayers and attended a Christian church. Throughout my recovery, I had often wondered how other Native-American women with breast cancer coped with their diagnosis and adjuvant therapy. What were their feelings? Did they have family support? What healing methods were used in their recovery process? Did they see a shaman? Did they go through biomedical treatment? Or did they use both? I was also curious as to whether their spirituality had
increased or decreased. In my case, my spirituality had increased and contributed to my recovery.

In 1990-92, malignant neoplasms constituted the third leading cause of death, preceded by heart disease, and accidents, for all IHS areas (Indian Health Service, 1995). Although breast cancer is a cause for concern among all women, there is a special concern for those interested in health of Native-American women because few studies have explored their perspective on breast cancer. The diagnosis of breast cancer affects all areas of a woman's life, including physical, mental, spiritual, and social aspects. The Native-American woman may use biomedical or traditional methods or a combination to live in balance and harmony with herself, family, and environment. The philosophy of life within Navajo culture is to live in beauty and harmony by walking the corn pollen path.

**Background**

**Breast Cancer**

Breast cancer is a feared term with life-threatening implications for women diagnosed with the disease. The diagnosis also has a great psychosocial impact, which includes a changed body image, effect on the family, and finally the fear of dying from this disease (Ellerhorst-Ryan & Goeldner, 1992). According to the 1973-1991 Surveillance, Epidemiology, and End Results (SEER) data, since 1980 there has been a 2% increase in the breast cancer incidence rate for women in the United States, which has now leveled off at 110 per 100,000 (National Cancer Institute, 1994). In 1994, breast
cancer was the second cause of death nationally for women in the United States (National Cancer Institute, 1994). The American Cancer Society suggested that, during 1995, 182,000 cases of breast cancer would occur among women in the United States (National Cancer Institute, 1994). It was also projected that about 46,000 women would die from breast cancer in 1995.

Due to the increasing use of mammography, detection of breast cancer in the early stages has increased (American Cancer Society, 1995). The data for 1992 show that through early detection and treatment, mortality has been decreasing in Anglo-American women but not for African-American women (National Cancer Institute, 1994). Poor socioeconomic factors make a difference in the incidence and survival rates of breast cancer for minority women. Many cannot obtain medical care or health insurance to get adequate health care such as cancer screening or treatment. Genetic factors may also influence outcome (Arizona Department of Health Services [ADHS], 1994).

In the 1940's, women who were diagnosed with localized breast cancer living five years after their diagnosis had a survival rate of 78 percent. Today, the 5-year survival rate is 94 percent, whether they are undergoing treatment or in remission (National Cancer Institute, 1994). If the diagnosis is regional cancer, the survival rate is 73 percent, and if it has metastasized, the 5-year survival rate is 18 percent (National Cancer Institute, 1994). Based on current data, the 10-year survival rate for women with breast cancer is 63 percent, and at 15 years it is 56 percent (National Cancer Institute, 1994).
In 1994 in Arizona, about 2,500 women were diagnosed with breast cancer. The mortality rate has not changed since 1970 (ADHS, 1994). Five-year survival rates for women in Arizona is 75 percent (ADHS, 1994). Incidence of breast cancer is lower in Native-Americans than in the white population, but Native-Americans are diagnosed at a later stage of the disease, resulting in a low survival rate compared to white women (ADHS, 1994). One's attitude and lifestyle can be linked to a cancer risk (American Cancer Society, 1995). But genetics and environment are also major influences. A person's cultural values and beliefs can prevent them from seeking health care, which may lead to a later diagnosis of metastatic cancer with a poor survival rate (American Cancer Society, 1995).

Treatment and Recovery Programs

Treatments for breast cancer can be conservative, such as a lumpectomy, or more radical, a mastectomy. Both treatments are usually combined with radiation, chemotherapy, or hormonal therapy (American Cancer Society, 1995). Breast reconstruction after a mastectomy is an option selected more frequently today (American Cancer Society, 1995). On comparing conservative treatment versus mastectomy with immediate or delayed reconstruction, one study showed that women had a more positive body image when they had a conservative surgery (Mock, 1993).

Recovery programs through the American Cancer Society, such as Reach to Recovery, provide information and support for women with breast cancer. Another program is Look Good...Feel Better, which helps people who are receiving treatment for
Health of Native-Americans

The indigenous peoples of the Americas in the United States comprise one of the nation's smallest minorities, with an estimated population of 2 million (U.S. Bureau of the Census, 1995). The current conditions of Native-Americans in the United States, including demography, economics, employment, education, and health conditions, reveal widespread underdevelopment despite massive human, material, and fiscal intervention. Indigenous peoples in the United States do not do as well economically and socially as other racial groups in the nation. Social, economic, educational, and health conditions have not improved much for Native-Americans over the years (Hodgkinson, 1992; Snipp, 1992; Szaz, 1991).

Native-Americans remain the most impoverished minority group in the nation and their health status continues to be poor in comparison with other groups (Kozoll, 1986). They live a shorter life span, have larger families, receive less education, and earn less income than other ethnic minority groups in the United States (Antle, 1987). Widespread illnesses and death among Native-Americans may be influenced by poverty, unemployment, and substandard living conditions (Antle, 1987). Although much progress has been made to improve the health care of Native-Americans and Alaska
Natives due to health prevention programs, sanitation improvements, and increased medical technology (Rhoades, D'Angelo, & Hurlburt, 1987), there are still many health problems. Infant and maternal mortality and infectious diseases decreased for Native-Americans when Indian Health Service (IHS) became the primary health provider in 1955 (Kozoll, 1986; Rhoades, D'Angelo, & Hurlburt, 1987). In the past decades, the major health problems for Native-Americans were gastroenteritis and tuberculosis, but more recently heart disease, alcoholism, and diabetes have been major health problems (Rhoades, Hammond, Welty, Handler, & Amler, 1987).

**Breast Cancer in Native-Americans**

Breast cancer occurs in Native-American women but at a lower rate than in Anglo-American women (National Cancer Institute, 1986). Although breast cancer is significantly lower in Native-American women, it is the leading cancer incidence site among Native-American women who live in Arizona and New Mexico (Burhansstipanov & Dresser, 1994). The New Mexico Tumor Registry SEER data indicated that incidence rate in Native-American women had increased since 1991 but the rates had leveled off for Anglo and Hispanic women over the same time frame (New Mexico Tumor Registry, 1993). Occurrence of breast cancer for Native-American women appears to be increasing (Skye & Hampton, 1976) but the mortality rates are much lower than the national average (U. S. DHHS, IHS, 1995).

From 1990-1992, for all Indian Health Service (IHS) Areas, the age-adjusted mortality rate for breast cancer was 11.3 per 100,000 as compared with all other U.S.
races (1991) which was 22.7 per 100,000 (U. S. DHHS, IHS, 1995). There are regional variations in Native-American women, such as the lower incidence of breast cancer among Native-American women in the lower 48 states as compared with Athapaskan Alaska Native women, who have higher incidence (U. S. DHHS, IHS, 1994). Nationally, the age-adjusted mortality rate from breast cancer for Native-American women (9.0 per 100,000) is lower than the rate for Anglo-American women (26.7 per 100,000) (U.S. DHHS, IHS, 1994).

Data from Native-American women who live in Arizona and New Mexico show that the rates for age-adjusted breast cancer incidence are lower in Indian women (21.7 per 100,000) than Anglo-American women (93.3 per 100,000) (U.S. DHHS, IHS, 1994). The five-year survival rate for Native-American females in Arizona and New Mexico is 46.3 percent, compared with 75.7 percent for Anglo-American women. Native-American women have the poorest five-year survival rate of any ethnic group (U.S. DHHS, IHS, 1994).

Indian Health Service data for 1982-1987 show that the Navajo IHS age-adjusted breast cancer incidence rate for females from the Navajo Tribe was 28.7 per 100,000, compared with 106 per 100,000 for SEER whites (U.S. DHHS, IHS, 1994). For the Navajo IHS Area, the age-adjusted breast cancer mortality rate for females was 6.7 per 100,000 as compared to the Billings IHS Area of 21.9 per 100,000 (U.S. DHHS, IHS, 1994). The Billings Area rate almost approaches the U. S. rate. With the exception of the Billings Area, the Navajo population as well as other Native-American populations,
the incidence and mortality rates from breast cancer are lower than for the rest of the U.S. population. The five-year survival rate is poor for the Navajo population, as it is for other Native-Americans, possibly because they are diagnosed at a more advanced stage of the disease as compared to the general population (U.S. DHHS, IHS, 1994; Young, 1984). According to Burhansstipanov and Dresser (1994), there are increasingly more Native-American cancer survivors possible due to cancer survivors organizing and implementing support groups within their own communities. Because of the encouragement and positive effects of these groups, others with cancer may seek earlier screening, diagnosis, and treatment, in addition to learning to manage their own self-care (Burhansstipanov & Dresser, 1994).

**Culture and Healing**

Leininger describes culture as:

the learned, shared, and transmitted values, beliefs, norms,

and lifeways of a particular group that guides their thinking,

decisions, and actions in patterned ways (Leininger, 1991b).

Plawecki adds that culture is, "...a socially transmitted behavior pattern that is based on the acceptance of the beliefs, attitudes, language, and practices that are typical of a community of individuals at a given time" (Plawecki, 1992, p. 4). Each individual in a culture is socialized and in turn socializes others into their culture throughout their lifetime (Andrews & Boyle, 1995).
Despite the narrowness of Western medicine, scientific efforts have been underway to further explore the value of diverse and culture-specific means of health care delivery. Transcultural nursing has been developing over the past three decades to explore and open new ways of providing care (Leininger, 1991b). Nursing perspective is shifting from a narrow unicultural perspective toward a more encompassing multicultural view. Nurses are reexamining traditional nursing practices and policies. Transcultural nursing offers acceptance of more diverse and effective ways to serve people (Leininger, 1991b). Transcultural insights are coming into mainstream practice, particularly within Native-American communities where it is not uncommon today to have a traditional ceremony for a patient right in a hospital. A transcultural perspective encourages nurses to provide culture-specific care that is culturally congruent for patients whose beliefs and lifeways are different from dominant cultures (Leininger, 1988).

**Native-American Culture in Healing**

Most Native-Americans despite intra- and inter-cultural differences and conflicts over the centuries, continue to share a sense of having been born into a collective cultural and spiritual world. This sense of communal culture remains deeply ingrained in the consciousness of many Native-Americans today. There is an enduring unspoken bond that ties families, kinship, clans, and tribes together (Barsh & Henderson, 1980).

Contemporary Native-Americans continue to practice ecological spiritualism, a holistic worldview cultivated over thousands of years, seeking balance, harmony, beauty, peacefulness, reverence and respect for all that is around, toward the good life (H. G.
Begay, personal communication, February 8, 1996). From the standpoint of wellness, advocates of conventional Eurocentric medicine continue to look upon psychosomatic and ethnoscientific health care as largely heathenish and unscientific, and have been reluctant to accept the practical value of faith, belief, and proper attitude, in health care, wellness, and recovery (H. G. Begay, personal communication, February 8, 1996).

Most Native-Americans are fearful of cancer and do not have a word for it. Talking about cancer can "bring about the illness" (Joe & Young, 1993, p. 239). Among the Navajos, cancer is... "a sore that does not heal" (Joe & Young, 1993, p. 239). Because cancer is viewed as a fatal disease, a Navajo may not seek treatment. This fatalistic attitude towards cancer has a negative influence on health care priorities by tribal health leaders because they believe that nothing can be done about it (Joe & Young, 1993).

Perceptions of healing in different cultures is based on one's beliefs and assumptions. An Anglo-American woman oriented to western medicine may seek relief of pain or illness by seeing a physician because she believes the physician will discover the cause of her illness. In contrast, a Native-American woman may seek a medicine man to heal or cure her of illness because she is in disharmony with her environment.

A diagnosis of breast cancer can be frightening for any women whether she is white or Native-American. Native-American women may incorporate their cultural beliefs and values in their approach to dealing with breast cancer. The diagnosis of breast cancer is just as traumatic and devastating for Navajo women as it is for women in the dominant society. Although the incidence is not as high as in the national population, the
detection is cause for alarm for families and for health providers with little knowledge of how Navajo women face the disease. Navajo women diagnosed with breast cancer are faced with the challenge of survival and must seek health care through western medicine or traditional ways of healing, or both.

Navajo Health and Healing

The concept of health to the Navajo people means being in harmony with all living things with their environment, physically, mentally, and spiritually (Frank-Stromborg & Olsen, 1993). It means living in peace, and walking in beauty with all living things by respecting and appreciating them. Prior to a ceremony, a Navajo medicine man gathers plants and herbs by making offerings and asks permission to use the plant. After the completion of the ceremony, all plants are returned respectfully to mother earth (personal communication, L. Horse, June 6, 1996).

When a Navajo person is ill, that person is considered to be in disharmony and, therefore, may seek a medicine man to conduct a "sing" to restore the person to harmony with nature (Frank-Stromborg & Olsen, 1993). Some illness may be caused by violating a cultural taboo or may be caused by witchcraft. Therefore a certain ceremony must be conducted to cure this illness (Frank-Stromborg & Olsen, 1993). Navajos use corn pollen for blessings and burn cedar for purification. The sweat lodge is also used as purification to prevent and treat illness. A traditional Navajo may have a "sweat" once a month to relieve the body of the "negative spirits that block energy" (Frank-Stromborg & Olsen, 1993, p. 71). Navajo men and women conduct "sweats" separately. Only when a shaman
is present will a male and female enter the sweatlodge together. Typically, the male represented is a medicine man and the female represented is a patient (personal communication, G. Redhouse, June 7, 1996).

**Statement of the Problem**

Breast cancer is a serious and life-threatening illness. Native-American women's perspective on surviving and recovering from breast cancer has not been explored. Research is needed on the cultural meaning of recovery and the cultural influences on the process of recovery from breast cancer in Native-American women.

**Statement of Purpose**

The purpose of this study was to describe the perspective of Navajo women regarding recovery from breast cancer including biomedical and traditional methods for healing. The research questions were: 1. What perspective do Navajo women in recovery from breast cancer have regarding healing and recovery? 2. What types of biomedical and traditional Navajo healing methods do Navajo women use to recover from breast cancer? The qualitative research method of ethnography was used to answer these questions.

**Significance of the Study**

The Native-American culture is different in values, beliefs, philosophy, and practices from the dominant society. Health care providers who are knowledgeable and sensitive to Native-American women's beliefs, values, perceptions and practices can provide quality culturally congruent nursing care. Cultural ignorance can prevent nurses
from acknowledging a Native-American woman's perception of health and healing and why she may choose traditional methods of health care. This study provides insight into conventional and culturally-based perceptions of Native-American women who are in recovery from breast cancer.

Native-American women with breast cancer can undergo an emotionally traumatic ordeal, at times reaching a depth of agonizing experience, when diagnosed with breast cancer. Native-American women's perspectives on choosing to use biomedical medicine to heal themselves of cancer or to use indigenous traditional methods have not been studied. This research adds to clinically relevant information on Native-American women in recovery from breast cancer.

This study explicates specific cultural beliefs, perceptions, and healing practices of Native-American women in recovery from breast cancer. Identification of cultural beliefs and healing practices of Native-American women with breast cancer may provide health providers with new directions for providing culturally-sensitive health care, promoting recovery and wellness.

**Summary**

Native-Americans are the most disenfranchised ethnic minority underclass in America. Factors contributing to chronic health problems and issues are substandard living conditions, underemployment and unemployment, geographic isolation, poor education, economic exploitation, and ideological humiliation. The incidence of breast cancer in Native-American women is lower than in the total U.S. population but the
survival rate is poorer than the national average. This situation may be due to the cultural values and belief systems which can delay seeking medical care. Cultural beliefs guiding Navajo women in recovery from breast cancer have not been studied. By understanding Navajo's women's cultural beliefs, values, perceptions and healing practices related to recovery from breast cancer, health care providers will have a basis for planning culturally congruent care. The purpose of this study was to describe the perspective of Navajo women regarding biomedical and traditional methods used for healing and recovery from breast cancer.
CHAPTER TWO

CONCEPTUAL ORIENTATION AND REVIEW OF LITERATURE

Chapter Two presents Leininger's Sunrise Model as the conceptual orientation that guided this study. Also included is a review of the literature on studies related to women in recovery from breast cancer and traditional health beliefs of Native-Americans.

**Conceptual Orientation: Leininger's Sunrise Model of Cultural Care Diversity and Universality**

The conceptual orientation for this study was Leininger's Sunrise Model of Cultural Care Diversity and Universality (Leininger, 1991a). It provided the context for this study of Native-American women's perspective on use of biomedical and traditional Navajo methods in their recovery from breast cancer. According to Leininger, culture is what a person learns and shares, including values and beliefs guiding their pattern of decisions and actions (Leininger, 1988).

**Transcultural Nursing**

As a nurse and anthropologist, Leininger established the field of transcultural nursing. Her theory of transcultural and care diversity and universality took three decades to develop and refine (Luna & Cameron, 1989). In the mid-1950's while working as a child psychiatric nurse, she observed that children from different cultures were different, and she needed a culturally based framework to guide their nursing care. She recognized that culture was the missing link in nursing knowledge and practice.
Leininger (1988). She was one of the first nurse anthropologists to use awareness of culture as a guide for nurses to provide culturally congruent care. Leininger defines transcultural nursing as:

"...a humanistic and scientific area of formal study and practice in nursing which is focused upon differences and similarities among cultures with respect to human care, health (or well-being), and illness based upon the people's cultural values, beliefs, and practices, and to use this knowledge to provide cultural specific or culturally congruent nursing care to people" (Leininger, 1991b, p. 60).

**Components of the Sunrise Model**

Leininger's framework of Cultural Care Diversity and Universality is depicted in the Sunrise Model (Figure 1) which provides an encompassing view of culture. According to Leininger the Sunrise Model is seen as:

"...a wholistic conceptualization to help the researcher systematically study the theory's diverse components, such as world view, social structure factors, cultural values and beliefs, and folk and professional health systems, and how these components interface with each other in a gestaltic perspective" (Leininger, 1988, p. 157).

The researcher used the Sunrise Model, assumptive premises, and orientational definitions in this study. The assumptive premises of the Sunrise Model are:
Figure 1. Leininger's Sunrise Model.

1. Care (caring) is essential for well-being, health, healing, growth, survival, and for facing handicaps or death (Leininger, 1993, p. 111).

2. Care (caring) is essential to curing and healing, for there can be no curing without caring (Leininger, 1993, p. 112).

3. Every human culture has generic (lay, folk, or indigenous) care knowledge and practices, and usually professional care knowledge and practices which vary transculturally (Leininger, 1993, p. 112).

4. Culturally care values, beliefs, and practices are influenced by and tend to be embedded in the world view, language, religion (or spiritual), kinship (social), political (or legal), educational, economic, technological, ethnohistorical, and environmental contexts of a particular culture (Leininger, 1993, p. 112).

5. Culturally congruent nursing care can only occur when culture care values, expressions or patterns are known and used appropriately and meaningfully by the nurse with individuals or groups (Leininger, 1993, p. 112).

6. Culture care differences and similarities between professional care-giver(s) and clients, with their generic needs, exist in human cultures worldwide (Leininger, 1993, p. 112).

7. Clients who show signs of cultural conflicts, noncompliance, stresses, and ethical or moral concerns, need nursing care that is culturally-based (Leininger, 1993, p. 112).
The orientational definitions of the Sunrise Model define the following terms:

1. Care refers to phenomena related to assisting, supportive, or enabling behavior toward or for another individual (or group) with evident or anticipated needs to ameliorate or improve a human condition or lifeway (Leininger, 1988, p. 156).

2. Culture refers to the learned, shared, and transmitted values, beliefs, norms, and life practices of a particular group that guides thinking, decisions, and actions in patterned ways (Leininger, 1988, p. 156).

3. Cultural care refers to the cognitively known values, beliefs, and patterned expressions that assist, support, or enabled another individual or group to maintain well-being, improve a human condition or lifeway (Leininger, 1988, p. 156).

4. World view refers to the way people tend to look upon the world or universe to form a picture or value stance about their life and the world about them (Leininger, 1988, p. 156).

5. Folk health (well-being) system refers to traditional or local indigenous health care or cure practices that have special meanings and uses to heal or assist people which are generally offered in familiar home or community environmental contexts with their practitioners (Leininger, 1988, p. 156).

6. Professional system refers to professional care or cure services offered by diverse health personnel who have been prepared through formal professional programs of study in special educational institutions (Leininger, 1988, p. 156).
There are seven cultural and social structure dimensions of the Sunrise Model as depicted in Figure 1. In the Sunrise Model, the cultural and social structure dimensions are viewed by Leininger as:

"the dynamic patterns and features of interrelated structural and organizational factors of a particular culture (subculture or society) which include religions, kinship (social), political (and legal), economic, educational, technologic, and cultural values, ethnohistorical factors, and how these factors may be interrelated and function to influence human behavior in different environmental contexts" (Leininger, 1991a, p. 47).

The three cultural and social structure dimensions addressed in this study are Religious and Philosophical factors, Kinship and Social factors, and Cultural Values and Lifeways.

**Application of the Sunrise Model to This Study**

Culture influences how Native-American women experience and cope with their lives when recovering from breast cancer. The researcher used three components from the cultural and social structure dimensions from the Sunrise Model. The parts used were the Religious and Philosophical Factors, Kinship and Social Factors, and Cultural Values and Lifeways. The three factors influence folk, professional, and nursing systems. Religious and Philosophical Factors are defined in this study as Native-American women's beliefs and view of life that influence the process of recovery. Kinship and Social Factors are defined as Native-American women's relationships with lay and
professional persons that are used in her recovery. Cultural Values and Lifeways are defined as factors in Native-American women's way of life that are applied in the process of recovery.

The cultural and social structure dimensions illustrated in the Sunrise Model influence culture and health care among Native-American women in recovery from breast cancer. Religious values and philosophy may be reflected in the Native-American woman's approach to recovery. Her choices of recovery approaches are also influenced by her culture and the social support she receives from family and friends. Culture influences the woman's perceptions and beliefs of her illness in coping and healing of breast cancer.

Leininger's theory on health system encompasses the folk, professional, and nursing systems. The health system "refers to the values, norms, and structural features of an organization designed for serving peoples' health needs, concerns or conditions" (Leininger, 1985, p. 209). The nonprofessional local or indigenous system offers traditional folk care and cure services to people, whereas health professionals administer organized and interdependent care in the professional system (Leininger, 1985, p. 209). A Native-American woman diagnosed with breast cancer may choose to enter the health system and undergo surgery and adjuvant treatment such as chemotherapy, radiation, or hormonal therapy. Anglo-American nurses and other allied health professionals may care for her in the hospital and at home. The two cultures may have different perceptions and
beliefs regarding healing and recovery. A Native-American woman may incorporate both biomedical and traditional methods of healing in her recovery.

Review of Literature

The review of literature addresses research on cultural profile of the Navajo Nation, cultural aspects of recovery, coping, self-care, and body-image with cancer.

Cultural Profile of the Navajo Nation

Since the longest walk to Bosque Redondo (Fort Sumner), New Mexico in 1863, the Navajos have continued to survive and persevere despite the many obstacles they have faced. Navajos or Dine (the people) as they prefer to be called, are considered a part of the Athapaskan-speaking peoples and supposedly migrated from the Bering Straits to North America (Spicer, 1962). They were a nomadic tribe, hunting and raiding other tribes and incorporating new knowledge into their culture from the Pueblos and Spaniards (Sander, 1979; Spicer, 1962). In 1863, their raiding and hunting were over when Colonel Kit Carson and seven hundred New Mexico volunteers rounded up Navajo men and their families and forced them to walk over 300 miles to Fort Sumner, New Mexico, to relocate. In 1867, after living four years in a desolated area with only military rationing, the Navajo people were released from captivity in Bosque Redondo and returned home, to a reservation set aside for them by the United States government (Spicer, 1962). The Navajos were given sheep and goats and encouraged to become herdsmen and farmers (Spicer, 1962). They continued to live on rations and forced to change their lifestyles from hunter to living on subsistence from the federal government.
The Navajo tribal council was created in 1924 and Chee Dodge became the first chairman (Spicer, 1962). In 1955, the Indian Health Service (IHS) was transferred to the Public Health Service from the Department of the Interior. Hospitals and clinics were built to combat tuberculosis, which was rapidly becoming an epidemic among the Navajo people. Clark, Kelley, Grange, & Hill (1987) hypothesized that changes such as crowding, poor nutrition, and loss of natural vaccination increased the severity of tuberculosis among Native-Americans. Although the incidence of tuberculosis has decreased, it is three times higher than the United States all-race rate (Centers for Disease Control, 1985). There are still numerous health problems facing the Navajo people. They are facing assimilation from the dominant culture, yet they continue to hold on to and practice their traditional values and cultural beliefs.

The Navajo's philosophy of living in beauty and harmony with the environment is still practiced today. Their cultural belief of body, mind, and spirit is also incorporated in every aspect of their lives. A Navajo woman may see a physician for an illness. However, if she continues to sense disharmony, she may seek a medicine man to get back into harmony with nature. Sings are usually performed before the Navajo patient is hospitalized (Frank-Stromborg & Olsen, 1993). Ke' and Clanship are very important to the Navajo people. Ke' means "family unity whereby parents are responsible for raising their children and teaching them family values such as respect, responsibility, harmony and love" (Navajo Times, 1996, p. A-5). It means to continue to practice the Navajo way
of life and language, because the Navajos are children of the Holy people (Navajo Times, 1996).

**Cultural Aspects of Recovery**

While there is a scarcity of studies on Native-American women in recovery from breast cancer, there are studies linking recovery to Native-American cultural values, and beliefs. Flores (1986) conducted a study on alcoholism treatment and the relationship of Native-American cultural values to recovery. Three groups of subjects (N=83) were selected: an alcoholic and nonalcoholic Native-American group, alcoholic Anglo-American group, and Anglo-American staff (n=17). The purpose of the study was to investigate and to identify value differences between Native-Americans and Anglo-Americans.

Instruments used were a questionnaire on demographics and Rokeach Value Survey. The two alcoholic groups were from an inpatient treatment program of a community mental health center near a southwest Indian reservation. The Native-American and Anglo-Americans were asked to fill the questionnaires twice, first from their own perspective, the second time from the other group's perspective. The study reveals that the alcoholic Native-American has a poor rate of recovery, and the evidence suggested that Native-Americans' values are significantly different from Anglo-Americans'. The researcher suggested that perhaps due to the value differences, few alcoholic Native-Americans remain in treatment (Flores, 1986).
Zubek (1994) did a study to assess to what extent physicians agreed with Native-American patients using traditional Native medicine. The study design was a randomized cross-sectional survey of 79 family physicians in British Columbia. Instruments used were a self-reported questionnaire on physicians' demographic variables and attitudes towards patients' use of traditional Native medicines. Results indicated that physicians generally accepted the use of traditional Native medicine for health maintenance, less serious care, and the treatment of benign illness. But there was more disagreement for its use in serious illness in outpatient and intensive care in the hospital. Many physicians had difficulty in defining traditional Native medicine and did not give an opinion on its health risk or benefits. There was a significant correlation between physicians working with Native-Americans who used traditional Native medicine and if the physician knew of five or more patients using traditional medicine. According to the researcher, there are places in North America where both systems seem to work together and create an awareness of different healing strategies, such as on the Navajo Indian Reservation, in Zuni, New Mexico, and the Coast Salish area of British Columbia (Zubek, 1994).

Sprott (1988) conducted a case study on potential carcinogenic exposures of persons diagnosed with cancer since 1972. The researcher did the study at the request of an Alaskan village's traditional council because they expressed concern over a number of lung cancer diagnoses (N=7) with a village population of 209. In addition, the researcher polled 46 of 51 households on tobacco use and opinion on causes of the cancers. Both
the standardized interview forms used for the cancer case study and the household survey questionnaire were presented verbally and tape recorded.

The findings indicated that the seven persons with lung cancer and those with different types of cancers had smoked for many years. The household surveys indicated that many villagers believed that smoking cigarettes caused cancer, but they also believed that their drinking water contaminated with chemicals caused cancer. There were no known carcinogenic exposures other than cigarette smoking. The researcher points out the conflicting views of the villagers regarding cancers caused by smoking cigarettes and the drinking water. She refers to this phenomenon as "biculturalism" in which a culture bearer applies his or her traditional cultural values in one circumstance, then switches to different values of another culture (usually of the dominant society) without noticing the difference (Sprott, 1988). The researcher suggests that to plan a cancer prevention program, the concerns of the villagers about their drinking water must be addressed first before promoting lifestyle changes and attitudes regarding cigarette smoking as the primary risk for lung cancer (Sprott, 1988).

Coping in Breast Cancer

How women hope and cope with the diagnosis of breast cancer, treatment, and recovery are the focus of recent research. Herth (1989) conducted a descriptive study of the relationship between level of hope and level of coping response in adult patients (N=120) in treatment for chemotherapy in hospital, outpatient, and home settings. Instruments were the Herth Hope Scale and the Jalowiec Coping Scale. The Herth Hope
Scale (HHS) has 32 items scored as "Applies to me" or "Does not apply to me," with scores ranging from 0-32. The higher the score, the greater the hope. The Jalowiec Coping Scale (JCS) has 40 items on a 5-point Likert scale with scores which range from 90-200. A Demographic Data Form was used to record age, sex, type and stage of cancer, months since diagnosis, income, educational level, marital status, job status, and race. Three questions addressed interference with job responsibilities, interference with family responsibilities, and religious convictions. There was a significant positive relationship (p < 0.05) between level of hope and level of coping among the patients in the hospital, outpatient, and home setting. Regardless of setting, strength of religious convictions and performance of family role responsibilities were significantly positively related to hope and coping. Because hope is important to the patient's coping response, the researcher suggested that nurses mobilize and support hope for patients undergoing chemotherapy.

A study comparing Hispanic-American women and Anglo-American women diagnosed with breast cancer on religiousness and hope addressed how women cope with their diagnosis and if culture was an influence (Mickley & Soeken, 1993). A sample of 25 Hispanic and 25 Anglo women was recruited from a cancer therapy center and a private physician's office. The sample selection criteria included: age 21 or older, English-speaking, physically and mentally able to participate, and a confirmed diagnosis of breast cancer. The two subsamples were matched on age, income, and educational level.
The women completed a hope scale, a Spiritual Well-Being Scale (SWBS), and a religiousness scale. The hope scale had 29 items on six subscales and used a 4-point Likert-type format, with a high score indicating a high level of hope. The subscales used were confidence in the outcome, relates to others, possibility of a future, spiritual beliefs, active involvement, and comes from within. The spiritual well-being scale had 20 items using a 6-point Likert-type format. The SWBS presented three scores which consisted of the total scores, the religious well-being scale, with 10 items, and the existential well-being scale scores with 10 items. The religiousness scale had 12 items on two subscales, which were intrinsic religiousness and extrinsic religiousness, scored on a 5-point Likert-type response format.

There was one significant difference between the two groups. The Hispanic women scored higher on intrinsic religiousness ($t=2.07$, $df=24$, $p<0.05$) than Anglos. Intrinsic and extrinsic religiousness were not important in predicting existential well-being or hope. But intrinsic religiousness was more important as a predictor of religious well-being and total spiritual well-being than extrinsic religiousness. Intrinsic religiousness was a strong predictor of spiritual well-being and hope for the Anglo women. The researchers suggested that, because women with breast cancer need psychological health and spiritual support from nurses, nurses should be aware of religiousness and different cultural perspectives (Mickley & Soeken, 1993).

Halstead & Fernsler (1993) conducted a study on women cancer survivors' coping strategies in women who had survived cancer for 5 or more years. The two research
questions asked were: What coping strategies were used by the survivors? And how effective were they? Participants (N=59) had a diagnosis of cancer for 5 years or longer, read and write English, were not currently receiving therapy, and were not in a terminal stage of cancer. The Jalowiec Coping Scale (JCS) and a subject information sheet (SIS) were mailed to participants using the snowball technique for recruitment. Cancer survivors were identified through family, friends, support groups, and other cancer survivors.

The mean survival rate for the subjects was 13.03 years. The results indicated that 50.8 percent were breast cancer survivors, 72.8 percent were married, 57.8 percent were professional employees, 88.1 percent were white, 61 percent were college graduates, and ages ranged from 21-82 years with a mean of 55.6. The coping scale measured use and effectiveness of coping strategies, in 60 items classified into eight coping styles: optimistic, supportant, confrontive, self-reliant, palliative, evasive, fatalistic, and emotive. Optimistic, supportant, and confrontive were rated as most often used and effective. There were significant differences for coping use between groups. The elderly group scored higher for use of optimistic, supportant, and palliative strategies as more effective than the young and middle-age group. The middle-aged group used emotive strategies more frequently than the elderly group.

The researchers suggest that findings from this study will encourage nurses to be aware of effective coping strategies and assessment for long-term cancer survivors.
Reducing stress is important for overall health and quality of life (Halstead & Fernsler, 1993).

**Self-Care**

Self-care means a person who takes good care of herself by using her knowledge and skills such as traditional health practices to enhance her own life, health, or well-being (Levin, 1978; Orem, 1980). This descriptive study replicated findings from an earlier research. Dodd (1988) did a study to determine the self-care behaviors of breast cancer patients who experienced side effects from chemotherapy. Dodd used a nonrandomized sample of 30 patients on their first chemotherapy in the San Francisco Bay area. The longitudinal survey technique was used to interview and gather patient data at 6 to 8 weeks apart. Instruments were a self-care log, anxiety scale, control scale, and a questionnaire on demographic data. The Self-Care Behavior Log (SCBL) recorded patients' side effects, date of onset, severity and distress experienced, self-care behavior used to alleviate the side effect, perceptions of effectiveness of self-care behavior, and sources of information for each self-care behavior. A self-administered State-Trait Anxiety Inventory (STAI) was used to measure anxiety. The STAI consisted of two 20-item scales which measure state and trait aspects of anxiety. Another self-administered instrument used was the Multidimensional Health Locus of Control (MHLC). This instrument is used to determine beliefs about the source of reinforcement. The 18-items on the MHLC instrument are measured on a 6-point Likert scale ranging from 1, strongly disagree, to 6, strongly agree.
Nausea, loss of hair, skin changes, and diarrhea and fatigue were side effects most often reported in the self-care log. The severity ratings showed a significant positive correlation with delay in initiating self-care ($r=0.5$, $p > .025$). This finding suggests that by recording their side effects in the log, patients were expeditious in doing self-care activity for themselves. At the second interview, there were significantly lower state anxiety scores, suggesting that anxiety may have decreased for the patients from the length of time of first diagnosis, or the chemotherapy experience. At the second interview, there was a significant positive relationship between state anxiety scores and ratio of self-care behavior on overall management of side effects ($r=.46$, $p < .029$). This finding suggests that patients may have been more motivated in their self-care as anxiety decreased with management of side effects and improved health.

Patients were involved in their self-care such as perception and labeling of side effects, weighing options for actions, initiating Self-Care Behaviors (SCBs), and evaluating the effectiveness of self-care. Patients initiated few self-care activities related to chemotherapy side effects. Because the patients in this study had a high locus of control, the researcher suggested this may support earlier findings that the most important source of self-care information is the patients themselves. The researcher suggests that nurses need to provide cancer patients with information on self-care so that patients can become more responsible in caring for themselves (Dodd, 1988).

Another study done by Dodd (1984), was on how patients managed their side effects from chemotherapy. The participants ($N=48$) were randomly assigned to four
groups to determine their self-care behaviors. Only drug information was given to the first group, information on side-effect management techniques (SEMT) was given to the second group, both drug and SEMT information was given to the third group, and the fourth group was used as a control group. Questionnaires used in the pre- and postintervention interviews were Chemotherapy Knowledge, Self-Care Behaviors, and the Profile of Mood States. Analysis of covariance was used to evaluate the pre- and postintervention scores on the three variables: chemotherapy knowledge, self-care behaviors, and the general affective state.

Patients who had information only on chemotherapy drugs or SEMT information had increased knowledge about the drugs or self-care behaviors. Patients who had information on both drug and SEMT information showed increased knowledge in both areas. There was not a significantly improved affective state when the combined drug or SEMT information were given, suggesting that patients did not experience mood disturbance or they did not report it. The researcher suggests that patients who receive information from nurses are better able to care for themselves in terms of self-care behaviors and chemotherapy knowledge (Dodd, 1984).

A study done by Braden, Mishel, Longman, and Burns (in review) described 193 women who were in treatment for breast cancer. The purpose of the study was to see if two interventions, self-care/self-help promotion and uncertainty management were effective for women who were receiving treatment for breast cancer. This was offered by the Self-Help Intervention Project (SHIP). The method consisted of three different
interventions offered in SHIP: a self-help class consisting of six 90-minute classes, a six-week uncertainty management intervention in which oncology nurses and mental health contacted the women by telephone every week for six weeks, and a combination of the two interventions, self-help and uncertainty management, over the same six-week period. The women were randomly assigned to one of the three groups or to a control group. Data were collected and compared over three points of time from the beginning of each adjuvant therapy, chemotherapy, radiation, and hormone therapy. Measures used were: (a) a blocking variable resourcefulness, measured by Rosenbaum's Self-Control Schedule (SCS), a Visual Analog Scale (VAS), and (b) outcome variables: self-care, self-help, psychological adjustment, and confidence in cancer knowledge.

The findings indicate that women who already had high levels of resourcefulness at the time of entry into the study, had high levels of self-care and psychological adjustment. The findings also indicate that women in the control group who had higher levels of resourcefulness at beginning of treatment were better able to deal with their illness in relation to self-care, self-help, confidence in cancer knowledge, and reducing negative affective state. The findings suggest that there is a need for studies of minority women in the area of psychosocial responses so that specific interventions could be developed for them. Another finding indicated that low resourceful women who did not receive SHIP interventions had decreased knowledge in the area of self-care, self-help, confidence in cancer knowledge, and psychological adjustment during the time they were receiving treatment. The researchers suggest that nurses can help improve the
psychological states and self-management behaviors of women with breast cancer who are receiving adjuvant therapy.

Longman, Braden, and Mishel (in review) conducted a study to describe the side-effects burden characteristics of 307 women receiving treatment for breast cancer. This study is a description how side-effects burden influence self-care, self-help, life quality, and psychological adjustment. Data collection instruments were: De Groot's Symptom Transition Scale, Side Effects Checklist, Inventory of Adult Role Behavior (IARB), Adult Self-Care Behaviors (IASC), Self-Care Inventory-Wellness Promotion subscale (SCIWPR), Negative Affect Scale (NAS), Inventory of Wellbeing (IWB) and the first item in Cantril's Ladder (CL). The findings suggest that women's side-effects burden does have a negative impact on self-help and life quality, is positively associated with a negative affective state, and that side-effects burden is not associated with self-care during treatment. Fatigue was the most problematic as well as the most common side effect. Both number and increase in side effects had a negative correlation (p<0.0001) with fatigue and depression. Self-care behaviors also had a negative association with the extension of side effects, fatigue and depression (p<0.001). Anxiety, depression, and difficulty sleeping were associated with psychological adjustment. Overall life quality was negatively related to depresson and present life quality. The researchers suggest that individualized nursing interventions can reduce the number of side effects and can do much to reduce the perception of illness severity during treatment for breast cancer (Longman, Braden, & Mishel, 1995).
Body Image with Cancer

In a study conducted by Mock (1993) on body image in women treated for breast cancer, 257 women were put into four groups and compared on body image as a component of self-concept. They were grouped into types of treatment received: mastectomy, mastectomy with delayed reconstruction, mastectomy with immediate reconstruction, and conservative surgery. The purpose of the study was to compare body image as a component of self-concept in women receiving treatment for breast cancer. Data were collected by mailed questionnaires using self-report instruments. Instruments used were Body Image Scale (BIS), Tennessee Self-Concept Scale (TSCS), Body Image Visual Analogue Scale (BIVAS).

The findings showed a significant difference in body image in women treated with conservative surgery. They were more satisfied with their bodies than women treated with mastectomy or immediate reconstruction. The BIS and TSCS Physical-Self subscale did not show any difference in body image. There were no differences in self-concept found among the four groups. Mock (1993) suggests that following treatment for breast cancer, physical rehabilitation and possible disturbances in body image, self-concept, and interpersonal relationships should be taken into consideration. Following diagnosis and treatment of breast cancer, patients continue to adapt to changes in body image and self-concept (Mock, 1993).

Reaby, Hort, and Vandervord (1994) did a study on the perceptions of women regarding body image, self-concept, and self-esteem. The study hypothesized that
women who had experienced mastectomy and wore an external breast prosthesis would have more negative body image, self-concept, and self-esteem than women who had mastectomy and breast reconstruction. The sample included 173 women who were divided into three groups. One group had mastectomies and wore external breast prosthesis, the second group had mastectomies with breast reconstruction, and a control group of women who had not experienced mastectomy. Self-administered questionnaires were mailed to the women and later interviewed at home. Instruments used were Polivy's Body Image Scale and the Rosenberg Self-Esteem Scale (RSES). The study revealed that the body image, total self-image, and self-esteem mean scores revealed that the prosthesis and reconstruction groups had more positive feelings regarding their bodies than the control group. In addition, there were no significant differences in self-concept among the three groups (Reaby et al., 1994).

**Summary of Literature**

The review of literature focused on the cultural profile of the Navajo Nation, cultural aspects regarding views and beliefs of recovery, how women cope with diagnoses of breast cancer, self-care during and after adjuvant therapy, and concerns regarding body image. The findings from the cultural aspects regarding views and beliefs indicated that physicians accepted the use of traditional Native medicine for less serious care rather than serious illness. Sprott's findings indicated that seven persons with lung cancer as well as others diagnosed with other types of cancer had smoked for many years but many villagers believed that both smoking and the drinking water caused the cancer. Sprott
referred to this view as biculturalism. Two studies done on hope and coping with the diagnosis of breast cancer indicated that spiritual support was important. A third study on coping indicated that older women were more optimistic, and supportant, and used palliative strategies more effectively than the young and middle-age group. Two studies on self-care behaviors indicated that breast cancer patients who had received information on chemotherapy side-effects had decreased anxiety and were better able to care for themselves in terms of self-care behaviors and chemotherapy knowledge. A study on self-help/self-care indicated that women who already had high levels of resourcefulness at the time of entry into the study, had high levels of self-care and psychological adjustment. Another study on how side-effects burden influence self-care, self-help, life quality, and psychological adjustment suggested that women's side-effects burden does have a negative impact on self-help and life quality, is positively associated with a negative affective state, and that side-effects burden is not associated with self-care during treatment. Mock's studies on body image with cancer indicated that women treated with conservative surgery were more satisfied with their bodies than women treated with mastectomy or reconstruction. Another study on body image indicated that women who wore external prosthesis or had reconstruction experienced more positive feelings regarding their bodies than the control group of women who had not experienced mastectomy.
Research Questions

The research questions for this research were: 1) What is the perspective of Navajo women in recovery from breast cancer regarding healing and recovery? and 2) What types of biomedical and traditional healing methods do Navajo women use to recover from breast cancer?

Definition of Terms


Navajo women: Native-American women living in the southwestern United States.

Recovery: To regain a normal position or condition (as of health) (Merriam-Webster, 1993, p. 977).

Breast Cancer: A malignant neoplasm that invades the breast tissues and may metastasize to new sites.

Biomedical treatment: Western medicine used in the United States to treat a disease or illness. For breast cancer these include: surgery, chemotherapy, radiation, and Tamoxifen (hormonal therapy).

Traditional healing methods: The use of native ceremonies, herbs, or plants and family participation practiced by Native-Americans in order to heal the mind, body, and spirit.

Summary

Chapter Two presented Leininger's Sunrise Model of Cultural Care Diversity and Universality as the conceptual orientation for this study. Components of the Sunrise
Model and application to the study were discussed. The review of literature focused on studies related to the cultural profile of the Navajo Nation, cultural aspects of recovery, and women in recovery from breast cancer regarding coping, self-care, and body image.
CHAPTER THREE

METHOD

Chapter Three includes the research design, and method. The sample, setting, protection of human subjects, data-gathering questions, data analysis and criteria for rigor in qualitative research are discussed.

Design

The design of the study was exploratory/descriptive. The goal of this study was to describe participants' cultural perception of recovery from breast cancer. Therefore the qualitative research method of ethnography was used for this study. Spradley (1979) defines ethnography as the work of describing a culture, learning from people and understanding another way of life from the native point of view. Ethnography is "a means of studying the life ways or patterns of groups of individuals" (Streubert & Carpenter, 1995, p. 89).

Today nurses are working in a multicultural world and must understand different cultures to work effectively with people who have different values and beliefs regarding health, caring, and illness (Leininger, 1991a). Leininger defines ethnography as the "systematic process of observing, detailing, describing, documenting, and analyzing the lifeways or particular patterns of a culture in order to grasp the lifeways or patterns of the people in their familiar environment" (1985, p. 35). Ethnographic research is important
to nurse researchers studying other cultures to enhance cultural sensitivity and awareness in promoting nursing knowledge.

Ethnographic researchers identify, interpret, and analyze the culture they are studying. This is done through observation, recording, and as a participant.

Ethnographic studies are conducted at the macro or micro level. Leininger (1985) refers to them as maxi or mini. A micro or mini study is of a small scale and is narrow in its focus. A macro or maxi study's scope is large and lasts over a longer period (Streubert & Carpenter, 1995). This study was a micro study, with a small sample size and narrow focus.

According to Pike (1966), emic means the insider's view of local informants or people. The emic view is the native's view, which reflects the cultural group's language, beliefs, and experiences (Streubert & Carpenter, 1995). Etic refers to the outsider's views of a culture (Pike, 1966). In doing this study, the researcher (etic) explored participants' emic views to discover their cultural meanings and perceptions of healing and recovery from breast cancer.

Sample

Purposive sampling is used in qualitative studies to observe and interview participants who have experience with the culture or phenomena of interest (Streubert & Carpenter, 1995). The purposive sample for this study was five Navajo women from the Southwest region of the United States. The women had been diagnosed with breast
cancer and were in recovery at the time of data collection. The criteria for inclusion of
the participants in the sample were:

1. Female of Navajo heritage
2. Able to speak and read English
3. 18 years or older
4. Having a biomedical diagnosis of breast cancer within the past five
   years.

Through initial approval from the Institutional Review Board from the University
of Arizona, the researcher proceeded to contact the Research Specialist with the Navajo
Research Program. The researcher was informed by the Specialist to contact the Chief
Executive Officer (CEO) of Public Health Service (PHS) at the area in which the
researcher was to conduct the study. The researcher contacted the CEO by telephone to
arrange a meeting with the PHS health advisory board to present the researcher's
proposal. The CEO requested a letter and copy of the research proposal prior to the
meeting. The meeting was scheduled with the health advisory board a month later, and
the proposal was approved. The researcher was then required to present her proposal to a
research committee from the Navajo Research Program. The meeting was scheduled and
postponed twice. The committee met once a month. A third meeting was scheduled and
the proposal was approved at that time. The researcher was then requested by the
research specialist to contact the Secretary of Health and Human Services in Washington,
D.C. to obtain a Confidentiality Certificate (Appendix G). The researcher could not
begin the study until the certificate had arrived via mail. Once the certificate arrived, the researcher then traveled six to seven hours to the area in which she was to do her study. Through prior contact and permission from the Chief Executive Officer of the PHS hospital, the researcher obtained a list of five potential participants from an IHS physician. Four did not fit the criteria as they did not speak English or lived off the reservation. The researcher obtained another list of five potential participants from the physician. Three did not fit the criteria: two did not speak English, and one was deceased. Two participants were recruited using the snowball technique. One refused to participate and was not included in the study. A relative of the researcher who had been diagnosed with breast cancer was included in the sample. Three participants were contacted by telephone, and two by home visits. A total of five participants were interviewed.

Setting

The fieldwork for this study occurred in an area in the Southwestern United States. The setting for data collection was a place convenient for the participants. Three of the participants chose their homes as the site for data collection. The husband was present at two of the interviews, and a son was present at another interview. One interview was done at a Catholic church with the participant's five-year old niece present. Another interview was done at a worksite with only the researcher and participant present.
Researcher Experience in Data Collection

The researcher traveled to the area of study and explained the purpose of the research to each participant in person. Three were contacted by telephone and appointments were made for the interviews. Two participants were contacted in person, as they did not have telephones, and they agreed to be interviewed on the same day. Because one participant lived in a rural area, the researcher had to stop at a trading post to ask for directions to her place. The manager of the trading post drew a map of the location of the home and the researcher traveled another forty-five minutes over unpaved, dusty roads to arrive at the home. Three interviews took place in their homes, two of which were conducted without interruptions. The third participant had her grandchild playing nearby who often interrupted to talk to grandma. One interview was conducted on a weekend at the participant's office, interrupted only by the vacuum cleaner used by the janitor. The door was closed for privacy. Another interview was conducted in the lounge of the Catholic church because the participant had come from out-of-town, and it was the best option for an interview. Interruptions were frequent because the participant had brought her young niece who refused to sit still, often jumping up and down on the couch and interrupting to ask permission to go outside. The researcher speaks some Navajo and could understand some of the participants' words in Navajo.

Demographic sheets were filled out and returned to the researcher prior to the interviews. Data collection was done through open-ended questions used in focused interviews. The researcher interviewed each participant, and audiotaped each interview.
Transcription was done by another person who did not know the participants. All audiotapes were erased after the researcher checked transcripts for accuracy.

**Protection of Human Subjects**

Approval of the application for protection of human subjects was obtained from the Human Subjects Committee of the University of Arizona (Appendix B). The researcher began the data collection session, and handed a copy of the disclaimer (Appendix C) to each participant and reviewed the purpose of the study, confidentiality, and the right to withdraw at any time. The researcher also explained the Confidentiality Certificate (Appendix G) to the participants, as this is required by the Navajo Tribe and the U.S. Department of Health and Human Services to conduct research on the reservation. All participants were advised to call the contact person at the Navajo Research Program if they had further questions on their rights as research subjects or grievances. The name and phone number was included on the disclaimer. The interviews were audiotaped with the participants' consent. Protection of participants was maintained by use of pseudonyms in transcriptions and reports. Participants were informed that tapes would be erased after transcription.

**Data Gathering Questions**

The method of obtaining data was interview, to get the participants' emic views about their perception of recovery from breast cancer. Being a breast cancer survivor [discussed ahead of time], the researcher's perspective influenced the questions asked. Religious and philosophical factors, kinship and social factors, and cultural values and
lifeways from Leininger's Sunrise Model were used to formulate data-gathering questions for this study. Interviews began with grand tour questions (Spradley, 1979) focused on perception of recovery from breast cancer. The grand tour question was: Tell me about your recovery after you were diagnosed with breast cancer. Other data-generating questions included:

How have your spiritual or religious beliefs contributed to your recovery?

What role does your family play in your recovery?

What foods do you eat to stay healthy?

What should you do to keep healthy after your recovery?

Please describe your cultural beliefs or practices that have contributed to your recovery.

For more examples of descriptive questions, see Appendix A.

Data Analysis Plan

According to Spradley (1979), any kind of analysis involves a way of thinking. A systematic examination of something is done to determine its parts, the relationship among parts, and their relationship to the whole. Ethnographic analysis is defined as a search for the parts of a culture, the relationships among the parts, and their relationships to the whole (Spradley, 1979, p. 142). To complete an ethnographic analysis, Spradley (1979) identified the following process: (1) making a domain analysis, (2) asking structural questions, (3) making a taxonomic analysis, (4) asking contrast questions, (5) making a componential analysis, and (6) discovering cultural themes. By using this
process, the researcher discovers the cultural meaning in an ethnographic analysis (Spradley, 1979). The componential analysis was not included in the analysis of data in this study.

**Domain Analysis**

Domain analysis involves a search for the larger units of cultural knowledge called domains (Spradley, 1979). By doing a domain analysis, the researcher searches for cultural symbols which are included in larger categories (domains) by virtue of some similarity. After the symbols are identified, they are organized into categories from which come the initial domains of meaning.

**Structural Questions**

Structural questions enable the researcher to discover information about domains, the basic units in an informant's cultural knowledge (Spradley, 1979). This allows the researcher to find out how participants have organized their knowledge, often with repeated structural questions. An example of a structural question is "What are all the different kinds of traditional ceremonies you had during your recovery?"

**Taxonomic Analysis**

Taxonomic analysis involves a search for the internal structure of domains and leads to identifying contrast sets (Spradley, 1979). Subsets of folk terms are revealed within a domain and the relationship between these subsets.
Contrast Questions

By using contrast questions, the researcher discovers the dimensions of meaning which informants use to distinguish the objects and events in their world (Spradley, 1979).

Cultural Themes

Cultural theme is defined as any cognitive principle, tacit or explicit, recurrent in a number of domains and serving as a relationship among subsystems of cultural meaning (Spradley, 1979, p. 186). The researcher looks over the data collected and identifies recurrent patterns. Theme analysis involves a search for the relationships among domains and how they are linked to the culture as a whole.

Trustworthiness

A researcher must accurately reflect research findings that participants have experienced. Lincoln and Guba (1985) describe four criteria in qualitative research. They are: credibility, transferability, dependability, and confirmability. The additional criteria for assessing quality in ethnographic research are meaning-in-context, recurrent patterning, and saturation.

Credibility refers to the truth of the findings of the researcher regarding the informants' experiences and knowledge (Lincoln & Guba, 1985). This is done by member checks in which after analysis of data, the researcher returns to each participant and asks if the findings reflect her experiences. The researcher had returned to ask the participants if the findings reflected their experiences. The researcher talked to three
participants, one participant was not able to see me, and due to distance and time constraints, the researcher was not able to visit the fifth participant. The three participants read part of chapter four and stated the findings reflected their experiences. One participant stated, "There is a conflict of view between Anglo doctor and Native medicine man. Anglo doctor [bombard a client] with statistics, studies, experiences, and can say things to give you gloomy future in subtle way. Native medicine man will tell you not to believe hospital doctors, to not always believe every word they say [because] once you believe them, you gave your mind to them. It's mind over body through prayers. Herbs are given offers before taking [by mouth]. The herbs are very special because it [is] just for you [client]. [The individual] draw power, "strength" from mother earth and what it can offer through healing."

Dependability is met through obtaining credibility of the findings (Lincoln & Guba, 1985). This can be done by an audit for examining the process and product of the inquiry. In this study the thesis chair, who has experience in ethnographic analysis, and a committee member who is an expert in ethnographic analysis, conducted an audit of the researcher's data and process of analysis. The researcher submitted ongoing results of analysis and received confirmation of accuracy of interpretation and recommendations for further analysis as needed.

Confirmability means reaffirming what the researcher has heard or experienced regarding the phenomena under study (Lincoln & Guba, 1985). To document the confirmability of the findings, an audit trail is left by the researcher which records
activities over time and can be followed by another individual. The thesis chair and thesis committee members audited steps of data analysis to support confirmability.

Transferability means whether the findings of the study have meaning to others in similar situations (Lincoln & Guba, 1985). The researcher must provide a thick description of the data analysis so that other researchers can make judgments on its transferability. In this thesis the researcher provides a thick description of the data analysis process and product.

**Summary**

In Chapter Three, the research design and method were described, in addition to sample, setting, protection of human subjects, data-gathering questions, data analysis and trustworthiness of the research.
Chapter Four is a presentation of the description for the sample, consisting of Dawn, Bah, Shondee, Dee, and Raven; and the results of data analysis, including the taxonomy, with cultural themes, domains and categories.

**Description of the Sample**

The participants who met the inclusion criteria and constituted the sample for this study are described in this first part of Chapter Four. Five women met the criteria and agreed to participate in the study. The participants ranged in age from 45 to 61 years. All of the women were of Navajo heritage and all were raised on the Navajo reservation except for one, who was raised in a small mining town in the southwestern part of the United States. All participants were the first in their family to be diagnosed with breast cancer. All but one woman had children. Two of the women had two children, one had three, and the fourth had four children. The socioeconomic status of the women differed. Three of the women were employed full time. One is a part-time student at a local college, and one was employed as a cook but retired when she was diagnosed with breast cancer. Two of the women were married, and three were divorced. One was divorced when her husband "left me for another woman." She was undergoing radiation treatment at the time. The level of education differed for the women. One had a master's degree, one had a baccalaureate degree, one had an her associate degree, one was working on her
associate degree, and one had received her GED. See Table 1 for more demographic information on the participants. The researcher assigned pseudonyms to protect the identity of the participants. Participants were not asked to choose a pseudonym.

Dawn

Dawn was raised in a large traditional family on a reservation in the southwestern United States. "My family had sheep, cattle, and horses." Her father was a "medicine man who practiced and performed religious ceremonies." Her earliest recollection of her family and grandmother are in relation to participating in traditional ceremonies, which she did not understand until "I grew up." At a young age, she was taught by her father, grandmother, and her elders to offer a prayer every morning and evening. These traditional prayers became a part of her life. Her grandmother's teachings included running every morning to have strength, praying every morning to live in harmony, and having "good thinking, and a good heart as we travel the path of life." When she was about twelve years old, she left the reservation to live with an Anglo family in a city in the southwest. She became a Christian, but she learned that her traditional prayers did not conflict with her Christian beliefs. Both were "compatible in a lot of ways." She lived with the Anglo family until she finished high school. She then pursued her college education obtaining baccalaureate and master's degrees. She is 46 years old, divorced and has no children. Her grandmother was a strong influence in her life, "because of what she had to face, the hardship of herding sheep, and to be a family together."
Table 1. Demographic Characteristics of Participants

<table>
<thead>
<tr>
<th>Characteristics</th>
<th>Dawn</th>
<th>Bah</th>
<th>Shondee</th>
<th>Dee</th>
<th>Raven</th>
</tr>
</thead>
<tbody>
<tr>
<td>Age</td>
<td>46</td>
<td>46</td>
<td>48</td>
<td>45</td>
<td>62</td>
</tr>
<tr>
<td>Ethnicity</td>
<td>Navajo</td>
<td>Navajo</td>
<td>Navajo</td>
<td>Navajo</td>
<td>Navajo</td>
</tr>
<tr>
<td>Occupation</td>
<td>Teacher</td>
<td>Consultant</td>
<td>Student</td>
<td>Teacher</td>
<td>Homemaker</td>
</tr>
<tr>
<td>Level of Education</td>
<td>18</td>
<td>14</td>
<td>15</td>
<td>16</td>
<td>GED</td>
</tr>
<tr>
<td>First Diagnosed with Breast Cancer</td>
<td>10/93</td>
<td>7/93</td>
<td>11/92</td>
<td>1/95</td>
<td>11/95</td>
</tr>
<tr>
<td>Length of Time Since Diagnosis</td>
<td>3 yrs</td>
<td>3 yrs 4mo</td>
<td>4 yrs</td>
<td>1 yr 10 mos</td>
<td>1 yr</td>
</tr>
<tr>
<td>Religion</td>
<td>Traditional</td>
<td>None</td>
<td>Christian</td>
<td>None</td>
<td>Native American Church</td>
</tr>
</tbody>
</table>
Bah

Bah is 46 years old, raised on the reservation in a "Christianity type of life." Her parents became Christians in the early part of her life, so she remembers always going to church, "my family focus on the Christian way of life." Her family did not have traditional ceremonies in the home except for the times her grandmother had "something done and the medicine man came" to her mother's house. She completed high school and married a Navajo man who was abusive. She "prayed and prayed" to keep the family together because "I went through a real bad abusive relationship in my marriage." She remembered that, prior to her divorce, her husband had a traditional prayer performed by his father, who was a medicine man. After her divorce, she did not return to church because, "I was already angry at God." She does not attend church or practice the traditional way but she does "believe in Navajo medicine" and respect her traditions. Bah works with the Navajo tribe, employed as a consultant. She has earned an associate degree. She has one son, one daughter, and two grandchildren.

Shondee

Shondee was raised in a traditional sheepcamp and she remembers she ate "blue cornmeal mush" and loved to drink "goat milk." As a child, she and four sisters lived with their paternal grandparents in a hogan. Their chores were to "chop woods, build fire, haul water and herd sheep." She remembers the "wide open space" watching the sunset and "thought there was no disease." She remembers participating in the traditional ceremonies when the "children were given bitter medicine to keep the evil spirit away,"
and "corn pollen was put on the children" by the elders. She remembers drinking herbs during these ceremonies, and said, "Maybe that's the reason why we're in good health until we move into the modern way of life." She also participated in the Native-American Church when she was ill and took Peyote to get better. During her radiation treatment, she found out her husband was having an affair, subsequently leaving her. A friend took her to church which "brought me back up," and "the Lord really touched me." She still attends the same church today. Shondee is divorced and has a daughter and two sons. The daughter has three children and lives at home. One son is in college, and the younger son is twelve years old. She has three grandchildren. Shondee is determined to obtain an associate degree and possibly continue with her education in the area of social work, "where I'd be helping other people, too."

Dee

Dee is 45 years old. She was raised off the reservation, in a small mining town. Her parents were orphans and had no strong ties to the reservation. They would visit relatives on the reservation twice a year. Her parents had a typical small town lifestyle. Her father worked in the mines, and her mother stayed home. "My mom was always there." The family had meals at regular times, chores were done, and there was consistency. Her parents did not drink, and they raised the children in the Roman Catholic church. Growing up, she led a "very sheltered life" and "we always had food on the table." Dee has two sisters and one brother. Her parents are deceased, her father from cancer, and her mother from "health problems, not cancer related." Now that she is
married and has two children, she and her husband continue to "raise the children where they are not stressed by things outside or in the family." There are no "cultural ties," and they try to "live a clean life." Her husband is one-half Navajo, nontraditional, although he was raised on the reservation, and came from a dysfunctional family. His mother is of Native-American/Hispanic descent from the Midwest and was a big influence in his life. His father was an alcoholic and "with that kind of background, he tries harder to have the kids have a normal life." They are both teachers employed full time. They have a son who is in college and a daughter who is twelve years old.

Raven

Raven is 62 years old, raised on the reservation in the Native-American Church (NAC). She does not know the Navajo traditional way. She was raised by her parents. Her mother "believes in the Navajo traditional" but her father did not believe in the Navajo way or the Christian beliefs. As a child, she would observe her mother having a ceremony but she "never had a Navajo ceremony done" for her. The family joined the Native-American Church in 1959. She is a firm believer in the NAC because "this is the only way we know how to pray." She worked as a cook for thirty-one years and knows about "the four basic foods." She immediately retired after her diagnosis. Her family had livestock and cornfields, but they sold all their sheep because "sheep is a lot of work." They did not plant corn this summer because of the drought. "The grounds are just dry" [and there has been] "no rain all summer." Raven has two sons and two daughters, and is also a grandmother.
Interviews

The interviews began with a grand tour question, "What do you think are the most important characteristics of the Navajo way of life?", which allowed the participants to open up and discuss their thoughts on the Navajo way of life. Most of the participants began with the Navajo beliefs that were taught to them by their parents or grandparents. They then discussed their early upbringing, living on the reservation, and the hardships they encountered such as herding sheep or having to haul water.

All participants responded to the initial grand tour question and additional grand tour questions on cultural beliefs in health and illness, their recovery after diagnosis, spiritual beliefs and family's role in recovery, foods they eat to stay healthy, keeping healthy after recovery, and cultural beliefs or practices that contributed to their recovery.

Results of Ethnographic Analysis of Data

As the researcher conducted each interview the grand tour questions elicited narrative data later used in the identification of domains, categories, and subcategories. Data analysis began after the first interview was transcribed and the researcher began to review the data for emerging themes. As each interview was transcribed, the researcher continued to analyze the data for cultural themes and domains of meanings. The results of the data analysis answer the two research questions: 1. What perspective do Navajo women in recovery from breast cancer have regarding healing and recovery? and 2. What types of biomedical and traditional Navajo healing methods do Navajo women use to recover from breast cancer?
The major domains of meaning identified in this study were: Support Persons and Practices, Power and Strength, Self-Care Practices, Feelings about Breast Cancer, and Biomedical Treatment. Each domain of meaning had categories and subcategories. The taxonomy of domains, categories and subcategories follows.

**Support Persons and Practices**

The three categories identified in the domain of Support Persons and Practices, were: parents, grandparents, and clan; religion (beliefs and practices); and Anglo resources (see Table 2).

**Parents, Grandparents and Clan**

This category of parents, grandparents and clan includes two subcategories: roles, and beliefs and practices of support persons.

**Roles.** The first subcategory is roles. The roles of parents, grandparents, and clan were as support persons in the participants' early lives and during their recovery from breast cancer. Three of the participants had traditional upbringing by their parents, whether it was in the Navajo way or Native-American Church. One was raised in a Christian home. All four participants were raised on the reservation. Dawn's family had sheep, cattle, and horses. She related that Navajo people have always been taught to be healthy in mind, heart, and body. When she was young, she was taught that as a person travels the path of life, they will have good thinking and a good heart. Dawn stated, "My father was a medicine man," who practiced and performed many religious ceremonies. She states, "I never knew or understood what they were until I grew up." She
Table 2. Taxonomy for the Domain, Support Persons and Practices

<table>
<thead>
<tr>
<th>Category</th>
<th>Subcategory</th>
<th>Examples of Data</th>
</tr>
</thead>
</table>
| Parents, Grandparents, and Clan | Roles                        | "My father was a medicine man"
|                                 |                              | "My dad worked"
|                                 |                              | "My mom stayed at home"
|                                 |                              | "My grandmother was a very strong person in my life"
|                                 |                              | Clan relatives came to help with activities
|                                 |                              | Relatives showed love, attention, and understanding
|                                 | Beliefs and practices         | Mother believed in the Navajo traditions
|                                 |                              | "My dad never believed in the Navajo tradition or church"
|                                 |                              | Teaching the traditional ways
|                                 |                              | Participation in traditional ceremonies
|                                 |                              | Elders gave medicine to children to keep the evil spirit away
|                                 |                              | "Hardship of herding sheep"
|                                 |                              | "To be a family together"
| Religion                        | Traditional medicine         | "When someone is sick, they go to a medicine man and ask for help"
| (Beliefs and Practices)         |                              | "The believing and healing go together, and that's how people can be healed traditionally"
|                                 |                              | The Beauty Way ceremony is an all night sing of chants and prayers by the medicine man
|                                 |                              | The Evil Way ceremony is a five day sing attended by the medicine man, patient, family, and relatives
Table 2, continued

<table>
<thead>
<tr>
<th>Category</th>
<th>Subcategory</th>
<th>Examples of Data</th>
</tr>
</thead>
<tbody>
<tr>
<td>Religion</td>
<td>NAC</td>
<td>A person requests a meeting for illness, personal problems, or to do well in school</td>
</tr>
<tr>
<td>(Beliefs and Practices)</td>
<td></td>
<td>&quot;I had a prayer service done for me when I first heard about the breast cancer&quot;</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Preparation involves setting up a teepee, finding herbs, water, sand, and wood</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Members are the &quot;roadmen who is like a priest,&quot; patient, family, relatives, friends, &quot;drummer,&quot; and &quot;firekeeper&quot;</td>
</tr>
<tr>
<td></td>
<td></td>
<td>During the peyote meeting she had a vision that she was going to get well</td>
</tr>
<tr>
<td></td>
<td>Christian church</td>
<td>As a youth, she lived with a Mormon family, she became &quot;real close to my religion and I guess that made me strong&quot;</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Her family were Christian, &quot;they prayed for me&quot;</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Became a Christian when she had a personal crisis</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Church members prayed for her</td>
</tr>
<tr>
<td>Anglo Resources</td>
<td>Support group</td>
<td>Talked to her about side effects</td>
</tr>
<tr>
<td></td>
<td>Counselor</td>
<td>Listened to her when she was having marital problems</td>
</tr>
</tbody>
</table>
remembered his teachings of facing adversity in her life and "to use our adversity experience to become strong." She was thankful for the teachings, because she thought of those teachings when she was diagnosed with breast cancer and "that made me feel like I can handle it." Shondee remembers, "we used to herd sheep, and we lived in a hogan." She also remembered, "We had all that open space to run around." There were no modern appliances, so the family chopped wood, built a fire and hauled water. Dee was raised in a mining town off the reservation. She had running water, a washing machine and dryer and all the modern conveniences. Her father worked and her mother stayed home. She related, "we always had food on the table. It was a very sheltered life." She also stated, "I guess my cultural background is very limited as far as the Navajo way." Her parents were orphans so "they didn't have a strong tie to the reservation."

Grandparents were often mentioned with respect and the support they gave to the participants' lives. Grandmother's traditional teachings were a part of life for Dawn when she was a young child. She stated, "My grandmother was a very strong person in my life." Clan relatives also had roles as support persons. When a person became ill, clan relatives showed their support by helping out during the ceremonies. Dawn mentions that her clan relatives were very supportive when she was diagnosed with breast cancer. They came to help with activities such as ceremonies or other "doings." She appreciated their help and support at this traumatic time in her life. She stated, "They were there to show their love, attention, and understanding."
Beliefs and practices. The second subcategory is beliefs and practices of support persons. Beliefs and practices in the Navajo way were important for three participants. Raven was raised by her parents. Her mother believed in the Navajo traditions, but her father "never believed in the Navajo tradition or church" She observed Navajo ceremonies but did not participate. Her parents joined the Native-American Church when she was young. Shondee was raised by her grandparents, who greatly influenced her in the traditional ways. She would observe the elders leaving for a ceremony but before they left, she remembers, "They used to give us a kind of medicine to keep the evil spirit away from us." "It's called bitter medicine."

Dawn's grandmother was a strong influence in her life. She observed her grandmother herding sheep and the hardships she endured. She stated, "I guess I know it now, because of what she had to face, the hardship of herding sheep, and to be a family together." She stated that her father taught her to "offer a prayer morning and evening." which was always a part of her life. Bah remembers the medicine man coming to her mother's house to do a ceremony for her grandmother. Other teachings were about exercise and prayers. Dawn remembered being taught to "run every morning so we can have strength, and to pray every morning so we can live in harmony with ourselves" (Figure 2). Three of the participants remembered eating blue corn meal mush. It was served as a cereal or a pancake. Raven remembered her mother fixing blue marble corn meal mush and a type of "pancake made with blue corn meal and milk." Another favorite was mutton stew and fry bread.
Figure 2. Navajo Woman Running at Dawn
Religion (Beliefs and Practices)

Under the category of religion (beliefs and practices), there are three subcategories: traditional medicine, NAC, and Christian church.

Traditional medicine. The first subcategory is traditional medicine, which was a significant belief and practice for three of the participants. One participant described the different types of traditional ceremonies performed by the medicine man, such as the "Beauty Way" and the "Evil Way." She stated that, "When someone is sick, they go to a medicine man, and ask for help." If the medicine man recommended the Beauty Way, that ceremony would be performed. The Beauty Way ceremony involved a one-night sing and prayers and restored harmony to the patient. Corn pollen and white corn were used. The Evil Way ceremony lasted five days. Herbs were put on the patient and "then they'd put it on all the people in the hogan." After the ceremony is completed, the patient must adhere to the prayers. For four days, the patient cannot "wash or clean up because that's the only way their illness will go away." Although Bah was raised as a Christian, she stated that her "father-in-law was a medicine man" who did blessings and prayers. She related that it started with the individual who believed in the traditional way because "the believing and the healing goes together, and that's how people can be healed traditionally."

Shondee discussed "witchcraft." A person may become ill because she has been witchcrafted by family members or relatives because "they're jealous of one another." The family will seek a medicine man and ask him to perform a ceremony whereby "an
all-night sing" on the patient will take place, or in some cases "it'll take about five days."

Shondee stated bitter medicine is used to keep the evil spirit away, eagle feathers are used
to protect the person from evil darts, and black ashes from the ceremony are used to
sprinkle inside and outside the home. Black ashes are also used to "help little children
from having nightmares." They are put on the fingertips and toes.

Native-American Church (NAC). The second subcategory of religion (beliefs and
practices) is the Native-American Church (NAC). Although Raven stated this is not the
traditional way, the researcher put it under this category because NAC originated with the
Plains Indians and came down to the Southwest. Raven had been an NAC member for
thirty years. She stated that NAC is a religion in which people will request a prayer
meeting if they are having problems with health, jobs, school, or "if a person wants to
have a good life." She called it a "prayer service." She stated that preparation for a
meeting involves setting up the teepee, finding herbs such as sage, and getting water,
sand, and wood for the ceremony, which will be held all night. She stated a person must
get the "cleanest water," which the family obtains from a natural spring, "pure, white"
sand, which they usually get from the cornfields, and a special wood such as oak or cedar.
This fire must burn all night. "You have to keep your fire going all night long." The
sacraments are the moon shaped from sand and the medicine, which is peyote. The
persons involved in the ceremony are the roadman, similar to a priest, the drummer, and
the firekeeper who watches the fire all night. As prayers are said by the person, cedar is
sprinkle into the ashes as an offering to God, "to answer the prayers the person asks for."
A special smoke rolled up in corn husk is also lighted and smoked as the person prays. Raven had a prayer service done for her by the family when she was informed that she had breast cancer. She had a vision during the peyote meeting. She related that her vision had informed her that she was going to get well and that her cancer was gone. Shondee's ex-husband was a NAC member and got her involved in the religion. After her diagnosis of breast cancer, he encouraged her to take peyote in the form of a juice, but she refused, stating "I didn't want to take that because I found out it wasn't healthy for me since I had breast cancer." NAC members think of peyote as a medicine and will help with any type of illness, even cancer.

Christian church. The third subcategory of religion (beliefs and practices) is Christian church. Dawn left the reservation at a young age and lived with a Mormon family. She stated she was "real close to my religion, and I guess that made me pretty strong." She thought that the Christian religion and traditional way "were compatible in a lot of ways." Bah, who was raised a Christian and is not practicing either traditional or the Christian beliefs, stated that she does not mix the two. After her divorce, she stated "I never went back to church." She related that she was already angry with God and when she was diagnosed with breast cancer, "That made it even worse that this happened to me." She received support from her parents and her children. Her mother is Christian, "so she had everybody praying for me, and she's been praying for me." Shondee became a Christian during her recovery when she went through a personal crisis. Her husband left her, and she was in "shock." and "lost a lot of weight." A friend invited her to church
and the songs and prayers "brought me back up. They prayed for me, and that was when
the Lord really touched me." She had gained many friends in church who were
supportive and she considered them her second family. Dee was raised as a Roman
Catholic.

**Anglo Resources**

This category of Anglo resources includes two subcategories: support
group, and counselor.

**Support group.** Two participants mentioned that they attended support groups off
the reservation. Dawn stated that the support group was there for her. She stated that the
Anglo ladies were helpful, up front, and they didn't hide anything. They told her what to
expect during her chemotherapy treatment, such as losing her hair as well as other side
effects. Shondee also attended a support group at the cancer center to, "talk to other
people with breast cancer." All the women in her group were Anglo and they motivated
and kept her self-esteem up.

**Counselor.** Only one participant, Shondee, had received help from an Anglo
counselor. She was seeing the Anglo counselor at the center, to deal with her diagnosis
and her marital problems.

**Power and Strength**

The four categories identified in the domain, Power and Strength, are: persistence,
spirituality, ceremonies, and family influences (see Table 3).
Table 3. Taxonomy for the Domain, Power and Strength

<table>
<thead>
<tr>
<th>Category</th>
<th>Subcategory</th>
<th>Examples of Data</th>
</tr>
</thead>
</table>
| Persistence      | Self-empowerment          | "I knew I was going to be healthy again"  
                    | Keep on going             | "I made up my mind when I was diagnosed, that I was going to be here for a long time"  
                    |                            | Grandmother told her, "It's up to you"                                                                                                           |
| Spirituality     | Traditional prayers       | Prayers from the Navajo ceremony strengthened and prepared Dawn for her surgery  
                    | Belief in traditional medicine | Bah had a simple Navajo prayer. "After I used the medicine, she [grandmother] told me to give it back to the earth" |
| Ceremonies       | Navajo practices          | Dawn had a 5 day traditional Navajo ceremony before her surgery  
                    | Prayer meetings            | Raven had a prayer meeting when she was first diagnosed                                                                                         |
| Family Influences| Elders' teachings         | Taught Dawn to "be strong if we’re faced with adversity in our lives"  
                    | Parents                   | Influential in Bah's Christian upbringing  
                    | Children                  | She is, "going to be there for his high school graduation"  
                    |                            | Her little boy is what kept her going                                                                                                                                              |
Persistence

The category, persistence, has two subcategories: self-empowerment and keep on going.

Self-empowerment. One participant related how she did not want her family to pity her because "it would weaken the power that I invested in myself." She credits her recovery to self-empowerment. Bah stated that she made up her mind when she was diagnosed that, "I was going to be here for a long time." She mentioned that her family"s support and believing in herself were her motivation. After refusing to return for her third chemotherapy, she stated that her recovery had to do with self-empowerment, "I had to be self-encouraged, self-motivated, believe in myself, and continue to do what I've always done." After she had her NAC prayer meeting, Raven felt relieved from worries, was happy, and she stated, "I will enjoy my life again." All of the participants also mentioned having a positive outlook as another factor in their recovery.

Keep on going. All the participants mentioned that family, friends, and their beliefs were what kept them going despite their diagnosis of breast cancer. Some of the participants mentioned their intention to watch their children grow up, "to see my child graduate from high school," or to become grandmothers. Dawn mentioned that whenever she met adversity in her life, she would remember her grandmother's teaching that, "It's up to you." As a child, the elders would tell her, "It's you that has to decide how you're going to determine your life, and confront adversity in your life. It's up to you. It starts
with you, from your heart." She was determined "to live an old age" and "to live a full life."

**Spirituality**

The category, spirituality, has two subcategories: traditional prayers, and belief in traditional medicine.

**Traditional prayers.** The first subcategory was traditional prayers. For all of the participants, spirituality was a big factor in their recovery. They experienced healing and some believed they were "cured." Dawn had a five-day traditional ceremony when she was diagnosed with her breast cancer. The prayers strengthened and prepared her for surgery, and the feelings continued to stay with her afterwards. She stated that when you are faced with death, "you kick in spirituality because you have to draw on a higher power."

**Belief in traditional medicine.** When Bah's mother and grandparents gave her Navajo medicine, her grandmother advised her that in order for her to be cured, she had to believe. She believed in the Navajo medicine. The medicine that moved her spiritually was her grandmother's medicine. She described how she was "spiritually inspired" after taking her grandmother's medicine and returning it to the "earth" [ground] early in the morning. As she was praying and returning the medicine, she stated that she felt a tingling starting from her feet and up through her body. Her knees became weak, so she knelt down. She began crying and believed at that point that she was cured. Recently
she returned to the Cancer Center and "they said it was clean, so, I was okay." Her sister
and brothers who are Christians, prayed for her.

Ceremonies

The category, ceremonies, has two subcategories, Navajo practices, and prayer
meetings.

Navajo practices. The first subcategory is Navajo practices. Ceremonies were a
part of the participants' upbringing. Shondee stated, "I remember eating, drinking herbs,
because we used to have a lot of traditional ceremonial." The type of ceremony
performed depends on the diagnosis the person has. A patient will go to a hand trembler
first, and that person will advise the patient on what type of ceremony is needed.
Although Bah stated that she was not raised in the traditional sense because she was
raised as a Christian, she remembered observing her grandmother participating in
traditional ceremonies.

Four of the participants had ceremonies performed on them since receiving the
diagnosis, whether it was a simple prayer or a ceremony lasting several days. The
ceremonies were done before surgery or during the participants' recovery from
chemotherapy or radiation. Dawn had a five-day traditional ceremony involving her
family, relatives, and clan members. She stated her ceremony was "intense and
beautiful." Bah had a simple Navajo prayer. "After I used the medicine she
[grandmother] told me to give it back to the earth." She believed her grandmother's
medicine healed and cured her of the cancer. Bah's grandmother is ninety-two years old
and Bah stated that her grandmother put all her love, blessings, prayers, and healing power into the medicine. Shondee had a peyote meeting for an illness and did not know she had breast cancer at the time. A year after her diagnosis, Shondee had a Navajo ceremony done for her depression and health. She believed the ceremony helped her, stating "it brought me back up."

Prayer meetings. The second subcategory is prayer meetings. Raven had a peyote ceremony done when she was first diagnosed with cancer. She believed the prayer meeting cured her of the cancer. She stated that she had a vision during the ceremony, and the vision told her that her cancer was gone and would not return. Shondee explained that the Peyote way was a one-night prayer, "where you have to eat Peyote all night," and involved praying and singing Peyote songs all night.

Family Influences

The categories, family influences, has three subcategories: elders' teachings, parents, and children.

Elders' teachings. Participants were strongly influenced by their elders' teachings. Dawn mentioned her grandparents, who were influential in sharing the Navajo teachings and traditional ceremonies. She remembered the elders' teachings to "be strong if we're faced with adversity in our lives." When she was first diagnosed with breast cancer, she remembered all the teachings, which helped her to "handle it," and "to accept my obstacles in life." Shondee was raised at a sheepcamp and remembered the hardship and
way of life that her grandparents endured. She also remembered and continued to practiced her grandparents' traditional teachings.

Parents. Three of the participants discussed the influence their parents had on their lives. Bah's parents were influential in her Christian upbringing, but she also believed her grandmother was instrumental in healing her cancer. Dee was raised off the reservation, "staying stress-free as far as growing up." Raven's parents raised her with the teachings of the Native-American Church, and she continued, as an adult, to practice that religion.

Children. Children is the third subcategory for the category of family influences. Four participants described the importance of their children's love and support in their recovery. Children were seen as a blessing, strength, power, and energy that kept them going. Bah related how her son finally approached her and told her, he wanted to talk about her cancer, how he was afraid that she was going to die and that he was afraid of losing her. She reassured him that she was, "going to be there for his high school graduation and his college graduation." In addition, she was determined to see her grandchildren grow up. She added, "That's what made me keep going and not sit around and think about my illness or my diagnosis." Shondee related that her children, especially her little boy, are what keep her going. Being a single parent, she stated she had to be strong for her family.
Self-Care Practices

The four categories identified in the domain, Self-Care Practices, were as follows: herbs, diet, exercise, and prayers.

Herbs

The first category, herbs, had three subcategories: herbs as medicine, herbal tea, and cedar and sage (see Table 4).

Herbs as medicine. Four of the participants had used herbs in traditional ceremonies or as a form of medicine from a jar. They all used the term herbs or bitter medicine, but they did not mention the name or types of herbs used. Shondee stated, "They [people] go way up in the mountain, they get herbs." She related that herbs are used for people diagnosed with diabetes or cancer. Bah's mother and grandparents gave her herbs during her Navajo prayer, which she believed had healed and cured her of cancer. Shondee mentioned that, as a youth, she took "bitter medicine" when she was attending traditional ceremonies. She had observed the medicine man apply herbs topically on a patient.

Herbal tea. Shondee remembered that when she was diagnosed with breast cancer, her mother-in-law gave her herbs which she had boiled and made into a strong tea. She put the tea into a jar and advised Shondee to drink it four times a day, which she did. Dawn stated, "I use herbs to relax me."
Table 4. Taxonomy for the Domain, Self-Care Practices

<table>
<thead>
<tr>
<th>Category</th>
<th>Subcategory</th>
<th>Examples of Data</th>
</tr>
</thead>
</table>
| Herbs            | Herbs as medicine | "They [people] go way up in the mountain, they get herbs"  
A type of "bitter medicine" is taken by mouth or applied topically on the patient during a ceremony  
Used for people diagnosed with diabetes or cancer |
| Herbal tea       |                    | Boiled and drunk as a tea  
"I use herbs to relax me" |
| Cedar and sage   |                    | Burned in the fire and "used as offering to God so prayers could be answered" |
| Diet             | Vegetables         | Squash, corn, broccoli |
|                  | Meat               | Chicken, hamburger, turkey |
|                  | Fruits             | Fresh fruit; Peach, cherry, plum, orange, and apple juice |
|                  | Beverages          | Water, coffee, diet soda, tea |
|                  | Traditional food   | Mutton stew, fry bread, blue corn meal mush |
| Exercise         | Walking            | Walking in the hills and mesas, "If I don't take my walk, I don't feel right"  
Walking locally |
|                  | Working in the garden | "I enjoy my plants outside" |
| Prayers          | Time of day        | Morning, evening |
|                  | What to use        | Herbs, corn pollen, white corn |
Cedar and sage. When Raven had her NAC prayer service, cedar and sage were used as an "offering to God so that prayers could be answered."

Cedar and sage are usually tossed and burned in the fire when prayers are said.

Diet

For the category of diet there are five subcategories: vegetables, meat, fruits, beverages, and traditional food.

Vegetables. All the participants ate plenty of vegetables, which were fresh, baked, or boiled. Shondee broiled her potatoes, and Dee's family ate plenty of fresh vegetables. Dee stated she was, "very big on vegetables." She stated she tends to overcook broccoli and "I know that's food from Cancer Society." Raven ate squash, and steamed or roasted corn. Dawn's oncologist informed her that she could "eat the way I always did" and that is what she was doing. She did not drink or smoke.

Meat. All the participants ate fry bread and mutton stew, at least once a month. Dawn loved fry bread and mutton, because they were important to her. Dee cooked the mutton stew then refrigerated it to coagulate the fat. She mentioned that her family watched their fat intake and were weight-conscious. Three of the participants ate chicken, boiled or baked. Bah stated she "always ate what we normally eat." She ate chicken, hamburger, and turkey. She baked or boiled to cut down on greasy foods. Shondee's oncologist advised her to cut down on fatty foods because she had a high cholesterol and to eat in small amounts. Raven knew about the four basic food groups
and ate mostly "white meats." Her oncologist advised her to cut down on the red meat and "eat more white meat."

**Fruits.** All the participants ate plenty of fruits. Dee had a garden in her backyard, and they had two peach trees, a cherry tree, and a plum tree. She stated, "we eat a lot of fresh fruits." She drank a lot of juice such as V-8, apple and grape juice. Raven also drank orange or apple juice.

**Beverages.** All the participants drank plenty of water, because they knew it was important for their body. Three participants drank coffee, at least two cups in the morning, but Bah drank a lot of coffee, although she knew it was not healthy. Dawn did not drink coffee or pop. Raven liked coffee, tea, and diet pop.

**Traditional food.** Traditional foods that the participants ate were mutton stew, fry bread, blue corn meal mush, and steamed or roasted corn.

**Exercise**

The two subcategories for exercise are: walking and working in the garden.

**Walking.** All the participants mentioned exercise as important during their recovery. Dawn mentioned that she had gained weight during her chemotherapy treatment and was often too tired to walk or jog. Since then she had been exercising more and trying to get herself together spiritually, physically, and mentally. She gave it a holistic approach. Bah did not do any exercise although her doctor told her to exercise. She stated she was comfortable with her life but she knew that exercising is important. Shondee did a lot of walking to keep healthy. She stated that after doing her homework,
she took time off to stretch and take walks. She had begun weight training, but she stated there was too much stress on her surgical area, so she stopped. Raven walked in the hills and mesas, saying, "If I don't take my walk, I don't feel right sometimes." She walked with her husband and children. Watching her diet and walking "makes me feel good."

**Working in the garden.** Dee had "gained quite a bit of weight" from Tamoxifen. She did gardening, working in the garden because, "I enjoy my plants outside." She also kept busy by cleaning house and she enjoyed sewing.

**Prayers**

The two subcategories for prayers are: time of day, and what to use.

**Time of day.** The time of day for prayers depended on the individual. Dawn would wake up before sunrise and take her corn pollen outside facing east and pray. She was "taught to pray morning and evening." She would do the same thing again at dusk, facing west after the sun had set. She stated her prayers were very spiritual and strengthened her. Shondee would read her Bible every night and stated, "I always pray for my health." Most of the participants prayed for healing and believed they were healed. Prayers gave them strength and renewed hope of living a long life. Two participants mentioned that people pray to the same higher power whether it was God or the holy people.

**What to use.** The subcategory, what to use, was in relation to substances used during prayers. Herbs, corn pollen, and white corn were used in the Navajo traditional prayers. The NAC members burned cedar and sage when they prayed for a member.
Difficult Feelings About Breast Cancer

The five categories identified for the domain of Difficult Feelings About Breast Cancer were: when first diagnosed, before surgery, after surgery, during chemotherapy, and during radiation (see Table 5).

When First Diagnosed

The category, when first diagnosed, has two subcategories: shock and anger.

**Shock.** The first feeling identified as a subcategory of when first diagnosed was shock. Three participants expressed shock when they were first diagnosed with breast cancer. Dawn stated she felt helpless, powerless, and fear when she was first diagnosed. She was shocked and felt "like somebody taking a rug from under you." Bah was shocked at first and "I didn't know if it was for real." She stated that she immediately accepted her diagnosis. Shondee stated, "Cancer is a stressful issue, and when I got it I was in shock....I thought I was going to die." Dee stated that she felt fortunate to have a sister who was a nurse because when she was diagnosed with the cancer, she called her sister and "we talked about it." Raven stated she was "really down" when she learned about her cancer. She thought "Why me? I never done anything bad in my life, so why did I get this?"

**Anger.** Dawn had felt a lump earlier and had a mammogram, which turned out negative. Then three months later she was diagnosed. She is angry with her doctor, because she feels that he did not do a thorough exam on her and told her after the exam that she was "ok." She wished that he had advised her to go for a second opinion instead
Table 5. Taxonomy for the Domain, Difficult Feelings About Breast Cancer

<table>
<thead>
<tr>
<th>Category</th>
<th>Subcategory</th>
<th>Examples of Data</th>
</tr>
</thead>
<tbody>
<tr>
<td>When First Diagnosed</td>
<td>Shock</td>
<td>Felt “like someone taking a rug from under you”</td>
</tr>
<tr>
<td></td>
<td></td>
<td>&quot;I didn't know if it was for real&quot;</td>
</tr>
<tr>
<td></td>
<td>Anger</td>
<td>Doctor did not advise her to seek a second opinion</td>
</tr>
<tr>
<td>Before Surgery</td>
<td>Needing traditional prayer</td>
<td>&quot;It made me feel like I was ready to go in and have the surgery done&quot;</td>
</tr>
<tr>
<td></td>
<td>Anxiety</td>
<td>Chose to have surgery off the reservation because, &quot;PHS did not have the quality of services for the people&quot;</td>
</tr>
<tr>
<td>After Surgery</td>
<td>Depression</td>
<td>&quot;It was really hard for me&quot;</td>
</tr>
<tr>
<td></td>
<td>Grief</td>
<td>&quot;The hardest part was trying to accept a part of me had been removed&quot;</td>
</tr>
<tr>
<td>During Chemotherapy</td>
<td>Helplessness</td>
<td>“I felt tired all the time and helpless&quot;</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Body feels like it has been assaulted</td>
</tr>
<tr>
<td></td>
<td>Loss</td>
<td>&quot;You don't have hair&quot;</td>
</tr>
<tr>
<td></td>
<td></td>
<td>&quot;You don't have a breast anymore&quot;</td>
</tr>
<tr>
<td>During Radiation</td>
<td>Stress</td>
<td>Husband was not supportive</td>
</tr>
<tr>
<td></td>
<td></td>
<td>&quot;Life was real hard&quot;</td>
</tr>
<tr>
<td></td>
<td></td>
<td>&quot;I went through stress, emotionally, and mentally&quot;</td>
</tr>
<tr>
<td></td>
<td>Depression</td>
<td>Cried a lot</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Lost a lot of weight</td>
</tr>
<tr>
<td></td>
<td></td>
<td>&quot;I felt like I just wanted to die&quot;</td>
</tr>
</tbody>
</table>
of waiting and "watching the lump grow." Bah's reaction was, "Why me?" She stated that she was already angry at God, so the diagnosis "made it even worse that this happened to me."

**Before Surgery**

The two subcategories for before surgery are: needing traditional prayer and anxiety.

**Needing traditional prayer.** Dawn had a prayer done before her surgery. She stated the prayer was spiritual and strengthened her. "It made me feel like I was ready to go in and have the surgery done." Bah stated that, after her diagnosis, it took three weeks to decide on her surgery, but she "accepted the operation and it wasn't very hard."

**Anxiety.** Dee had her biopsy done at an Indian Public Health Service (PHS). She relates that when she found out her biopsy was "cancerous," she decided to have her surgery in a hospital off the reservation because she felt that, "PHS did not have the quality of services for the people."

**After Surgery**

The two subcategories for after surgery are: depression and grief.

**Depression.** The participants talked about the feelings of depression after having a mastectomy or lumpectomy. Dawn was working full time teaching and she stated that it was "really hard for me." Raven had a biopsy done and when it returned positive, her doctor did a "second surgery" whereby her lymph nodes were removed. She stated "That's what got me down."
Grief. Bah stayed home from work for six weeks and she did not remember what happened. She stated that, for a short period after her surgery, "The hardest part was trying to accept that a part of me had been removed."

During Chemotherapy

The two subcategories for during chemotherapy are: helplessness and loss.

Helplessness. Several of the participants who had undergone treatment described how difficult it was and had feelings of helplessness. Three of the participants completed their chemotherapy treatments. One participant had two treatments and then refused to return to the cancer center to complete her chemotherapy. Dawn had six chemotherapy treatments, and she lost all her hair. She stated "The psychological aspect of your life really gets turned upside down." She was tired all the time and felt helpless. She stated that, "You feel like your body's been assaulted because everything's not there anymore."

Loss. Dawn mentioned that, as a woman, a person should have hair and breasts but "you don't have hair and you don't have a breast anymore, and it's hard." Bah stated her first chemotherapy was the hardest. "I resisted it, and I didn't want it, and I refused to take it." She states, "I think that was the first time I cried." She was finally convinced to take the treatment. She went back and completed the second treatment and "I told the doctor that I wasn't coming back....My mind and my body feels that I don't need the treatments." She did not complete her treatment. Her oncologist put her on Tamoxifen. Dee went for treatment "around three or four months." She stated that she did not go through depression, because she had a good insurance that did not put a financial strain
on the family, an employer who was open to her taking leave for checkups, and the support of her sister and immediate family.

**During Radiation**

The subcategories of stress and depression were identified for this category.

**Stress.** One participant had to have radiation treatment, but she also discovered that her husband was having an affair. She mentioned this period as the most difficult time in her life, because her husband was not involved in her treatment and was not supportive. She became a single parent with no job, and trying to support and hold the family together. She stated, "My life was real hard...I went through stress, emotional, and mentally."

**Depression.** Shondee went through a depression, crying all the time and she lost a lot of weight. She stated, "I felt like I just wanted to die."

**Biomedical Treatment**

The four categories identified for the domain of Biomedical Treatment are: surgery, chemotherapy, radiation, and Tamoxifen (hormonal therapy). See Table 6.

**Surgery**

Under the category of surgery are two subcategories: decisions and feelings in relation to the surgery.

**Decisions.** Three of the participants had their surgeries done on the reservation at a Public Health Service hospital. One participant had a mastectomy and two had a lumpectomy. Dee stated, "I had my mastectomy done in [city in S.W.], and the
Table 6. Taxonomy for the Domain, Biomedical Treatment

<table>
<thead>
<tr>
<th>Category</th>
<th>Subcategory</th>
<th>Examples of Data</th>
</tr>
</thead>
<tbody>
<tr>
<td>Surgery</td>
<td>Decisions</td>
<td>Decided to have surgery right away</td>
</tr>
<tr>
<td></td>
<td>Feelings</td>
<td>&quot;The hardest part was accepting a part of me was removed&quot;</td>
</tr>
<tr>
<td></td>
<td></td>
<td>&quot;After surgery, I felt some of those down feelings&quot;</td>
</tr>
<tr>
<td>Chemotherapy</td>
<td>Response</td>
<td>Refused further treatments after completing two treatments</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Did not have depression during treatment</td>
</tr>
<tr>
<td></td>
<td>Side effect</td>
<td>Loss of hair, stressed and tired all the time</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Increased appetite</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Gained weight</td>
</tr>
<tr>
<td>Radiation</td>
<td>Pain</td>
<td>&quot;It burns like if you'd burned it&quot;</td>
</tr>
<tr>
<td></td>
<td></td>
<td>&quot;It just hurt&quot;</td>
</tr>
<tr>
<td></td>
<td></td>
<td>&quot;Black and peeling&quot;</td>
</tr>
<tr>
<td>Tamoxifen</td>
<td>Reasons for</td>
<td>Put on &quot;pills&quot; after she refused to continue chemotherapy</td>
</tr>
<tr>
<td>(Hormonal Therapy)</td>
<td>therapy</td>
<td>On medication &quot;because the doctor tells me to take it&quot;</td>
</tr>
<tr>
<td></td>
<td>Side effects</td>
<td>&quot;Gained quite a bit of weight&quot;</td>
</tr>
<tr>
<td></td>
<td></td>
<td>&quot;Hopefully that will carry me through&quot;</td>
</tr>
</tbody>
</table>
physician that I did see was much more superior than what I had to go through with my biopsy." Bah stated that she accepted her diagnosis and decided to have her surgery right away. Raven found the lump herself and decided to have a lumpectomy with her family's support and approval.

Feelings. Bah stated, "The hardest part was trying to accept that a part of me had been removed. Raven stated, "That's what got me down" because "it was numb and felt funny." Two of the participants had their surgeries done off the reservation. Dawn had a mastectomy, but she was angry with her doctor because during her first exam, he told her, I don't think this is it," and did not give her options such as seeking a second opinion. After the lump had continued to grow she returned to the doctor and had a biopsy, which returned positive. She states "For a while after surgery I felt some of those letdowns, or some of those down feelings, but they weren't there the whole time." She also felt tired and helpless.

Chemotherapy

The category chemotherapy has two subcategories: response, and side effect.

Response. The first subcategory is response to therapy. Three of the participants completed their treatments. One participant, Bah, completed two treatments and refused further treatments. Dee had treatment for three or four months but did not ever go through depression. She thought part of the reason for her lack of depression was her good insurance and family support.
**Side effect.** Side effect, as a subcategory, referred to the side effects the participants experienced during their chemotherapy. Dawn was attending a support group prior to her treatment and she felt prepared because the group had informed her on the side effects. During treatment, she lost all her hair and felt stressed and tired all the time. Dawn's appetite increased in addition to weight gain. She "wanted to get back in shape," but did not have the energy.

**Radiation**

The category radiation has two subcategories: pain and precautions.

**Pain.** Three of the participants completed this treatment. Pain was mentioned often by one of the participant who had six weeks of radiation twice a day. Raven described the treatment as painful, saying, "it burns like if you'd burned it and it just hurt." She had to keep her arm up all the time.

**Precautions.** Precautions as a subcategory was in relation to not putting any type of ointment or medication on the area undergoing radiation. Raven's doctor advised her not to use ointment, cream, lotion, or medicine. She also could not use soap when she showered. After completion of the treatment, Raven described the area as "black and peeling." Her doctor advised her to use cream and she applied medicated vaseline which "helped it." Raven stated the hardest part of the treatment for her was the burn from the radiation.
Tamoxifen (Hormonal Therapy)

The category Tamoxifen (hormonal therapy) has two subcategories: reasons for therapy, and side effects.

Reasons for therapy. Two participants continued to take Tamoxifen. One participant explained her reason for taking Tamoxifen. Bah was put on this medication after she refused to continue chemotherapy. She stated that she had asked her doctor if she could stop taking "the pills" because she was taking it only "because the doctor tells me to take it." He advised her to continue the Tamoxifen for a couple more years.

Side effects. Weight gain as one of the side effects was mentioned by one of the participants. Dee stated that she "gained quite a bit of weight," after she was put on Tamoxifen. She was "irritated" with her doctor because he did not explain the side effects of Tamoxifen after telling her that she would probably have to take the medication for the rest of her life. She continued the medication, stating, "Hopefully, that'll carry me through."

How the domains fit with the purpose of the study is briefly summarized. The research questions were: 1. What perspective do Navajo women in recovery from breast cancer have regarding healing and recovery? 2. What types of biomedical and traditional Navajo healing methods do Navajo women use to recover from breast cancer? Participation in traditional ceremonies supported hope, which reflected traditional approach to recovery. Participants' spirituality and family influences provided strength through prayers and facing adversity, again reflecting traditional approach to recovery.
Self-care practices such as use of herbs to relax or to pray, diet, and walking supported determination and learning reflecting both biomedical and traditional approaches to recovery. Feelings about breast cancer supported the need for Ke (family unity) and traditional prayers reflecting traditional approaches to recovery. Finally, participants' decisions to have biomedical treatment supported the desire to live longer, which reflected biomedical approach to recovery.

**Cultural Themes**

Cultural themes represent the final level of analysis and reflect recurring themes that continually emerged throughout the analysis. There were three cultural themes identified as recurrent throughout the domains. All three can be represented as the beginning of a weaving in a Navajo rug (see Figure 3). The three themes were interwoven throughout each participant's interview. The cultural themes that emerged for the domains are as follows:

1. **Elders' teachings guide the process of recovery and all of lifeways.** All the participants discussed "things my elders told me," representing the foundation of the teachings that guided the participants throughout their lives. This is much like building the loom, gathering the materials, and beginning the process of the rug weaving. The weaver has a picture of the design in her mind and sees how the patterns will fit together in harmony and balance. The base of the loom represents mother earth, and the cord that binds the loom at the beginning of the weaving represents the roots of a seedling. All the participants spoke about their upbringing, ceremonies, traditions, and
Figure 3. Navajo Woman Weaving a Rug
the people who influenced and supported them, such as their parents, grandparents, and relatives, during their illness and recovery.

2. *Ceremonies and beliefs give the power for healing and reflect the spiritual journey that is woven throughout the culture.* The participants' spiritual journeys are interwoven with their culture, whether their beliefs were traditional, Christian, or self-empowerment, and the participants saw biomedical treatment as distinct from healing. The participants convey the importance of their spiritual journey as an awakening that renewed their beliefs and strengthened their ties to their families, clan, and community. The importance of the spiritual journey was expressed in their statements: "I was spiritually inspired," "my prayers were very spiritual and strengthened me," and "I had a vision saying that I'm [going] to get well." The middle part of the rug represents a plant that is beginning to bloom or a pattern that is emerging.

3. *Recovery is important because a long life is desirable.* All the participants expressed the desire to "live a long life," which is the completion of the weaving (Figure 4), which represents a plant in full bloom. The whole pattern has emerged with the completed rug and the strings left hanging at the corners of the rug to represent life, hope, and determination to "look forward to going on with [my] life." Other statements by participants were: "I want to live to an old age," "I want to see my grandkids grow up," and "what's keeping me going is my children." All participants expressed how difficult it was for them when they were diagnosed with breast cancer and during their recovery, but they were determined to live to an old age, abiding by their elder's advice, "it's up to
Figure 4. Navajo Weaving Reflecting a Spiritual and Healing Journey
"you," and "it starts with you from your heart." All the participants prayed to a "higher power" or "God," whether through blessing prayers in the Navajo ceremonies, "prayer service" in the Native-American Church, Christian prayers.

**Summary**

This chapter described the participants, data analysis and results. Discussion of the data analysis as well as the presentation of the domains of meaning with the taxonomies for each domain was also described. A brief summary of how the domains fit with the purpose of the study is included. The chapter concluded with the three cultural themes that were recurrent throughout the domains.
CHAPTER FIVE
DISCUSSION

Chapter Five is a presentation of the discussion of the findings in relation to the review of literature and conceptual framework. This chapter also includes limitations of the study, implications for nursing and recommendations for future research.

Results in Relation to Review of Literature

In the review of literature, there had been no study done on Navajo traditional sings or ceremony on patients prior to their hospitalization before surgery. In this study, one participant had mentioned she had a sing before surgery. Three of the participants had a traditional prayer or ceremony. One participant had a simple prayer during her recovery and another participant had a one-night Beauty Way ceremony done after her radiation treatment to bring harmony back into her life. All the participants mentioned how important their family's support was to them. One participant mentioned clan members who were very helpful in her ceremonies and other "doings." The helpfulness of family in ceremonies and doings is consistent with the literature on Ke, which means family unity (Navajo Times, 1996).

In contrast to Flores (1986), none of the participants was male and none reported drinking alcohol, so Flores' study on comparison of Anglo- and Native-American male alcoholics did not apply to them. Although Zubek (1994) did a study on Native-Americans and whether physicians agreed with their use of traditional medicine while
hospitalized, in this study there was no validation of Zubek's results, because none of the participants in this study mentioned having a ceremony or taking traditional medicine while in the hospital.

The results of this study are consistent with Sprott's findings on biculturalism and the situation of many Native-Americans' attitudes and lifestyle incorporating more than one culture. One participant in this study was practicing the Mormon religion but switched to the traditional prayers when she was diagnosed with breast cancer. Another participant was raised a Christian but had a simple Navajo prayer during her recovery, which, she stated, had no bearing on her beliefs. Another was a Native-American Church (NAC) member but became a Christian during her recovery. She believed she had been witchcrafted with cancer but that when she became a Christian, she did not believe that anymore. These are examples of bicultural elements.

The results of Herth's (1989) study on hope and coping in breast cancer were similar to the results of this study in that strength of religious convictions and performance of family role responsibilities were significantly related to hope and coping. All the participants in this study had levels of hope, indicated by statements such as, "I want to live a long life," and hoping and praying that there would be no recurrence of the cancer. The participants had different ways of coping with their cancer. Two attended support groups to talk to other women who had gone through chemotherapy and were advised on side-effects, such as hair loss or going through depression. Another participant had a peyote meeting and told the members about her diagnosis. They were
supportive of her. Four participants had children and received support from them but also
had anxieties and responsibilities in caring for them. One participant mentioned that it
took her son several months before he was able to approach her and ask her if she was
going to die. She had reassured him and informed him that she was going to be at his
high school graduation. All the participants had support from their families and relatives.

The results of Mickley and Soeken's (1993) study are consistent with the
researcher's study in that psychological and spiritual well-being were important to the
participants. All the participants prayed, attended church, or had traditional ceremonies
during their recovery.

The results of Dodd's (1988) study were consistent with this study in that some
participants were not prepared for chemotherapy and needed more information on the
side effects of treatment. In Bah's case, she refused outright to return for her third
treatment, stating that she was afraid and the treatment was painful. Another study by
Dodd (1984) was consistent with the researcher's findings in that patients who have
information on both drug and how to manage side effects showed increase knowledge in
both areas. Two of the participants who had attended a support group mentioned they
were prepared for the chemotherapy and knew what to expect. Members from the
support group had explained to them the side effects and depression they would
experience.

Braden, Mishel, Longman, and Burns' (in review) findings were consistent with
this study in that some participants had high levels of emotional distress and were not
prepared for adjuvant therapy such as chemotherapy or radiation. One participant refused chemotherapy after completion of two treatments. She had not sought information on cancer, adjuvant therapy, nor was she interested in joining a support group. The findings were consistent with three women in the researcher's study who had high levels of resourcefulness when they enter treatment for chemotherapy. Two had joined a support group and one sought information from her sister who was a registered nurse. They experienced less depression although one went into depression after her radiation treatment due to marital problems. It is also consistent with the authors suggestion that there needs to be more studies done on minority women with breast cancer in the area of psychosocial responses and management so that specific interventions could be developed for them.

Longman, Braden, and Mishel's (in review) findings were consistent with some of the participants' statements that they were often fatigued and had to deal with depression. Result's of Mock's study (1993) on body image were similar to the researcher's in that women treated with conservative surgery were more satisfied with their bodies than women treated with mastectomy. In addition, adaptation to changes in body image and self-concept was ongoing. Participants who had mastectomies stated they felt as if their body had been assaulted with the loss of their breast. They grieved the loss of the body part and did not feel like a total woman and made statements such as, "I didn't have a breast anymore." In contrast to the sample in the study by Reaby, Hort, and Vandervord
(1994), none of the participants in this study had breast reconstruction. None of the participants mentioned wearing a prosthesis.

**Results in Relation to Conceptual Orientation**

The conceptual orientation for this study consisted of the cultural and social structure dimensions from Leininger's Sunrise Model (Leininger, 1991a). The components of the cultural and social structure dimensions relevant for this study were the religious and philosophical factors, kinship and social factors, and cultural values and lifeways. The domains identified in this study reflect the religious and philosophical factors, kinship and social, and cultural values and lifeways, as described in the following sections.

**Support Persons and Practices**

The domain, Support Persons and Practices, relates to the part of the conceptual orientation called religious and philosophical factors. Spiritual strength was identified as being important when illness or a crisis occurred. Spiritual strengthening was through the use of traditional ceremonies or becoming a Christian. Four of the participants had a strong sense of spirituality and thought they had been healed or cured of cancer. One participant was a member of the NAC who had a vision during the peyote meeting. She related that her vision had informed her that she was going to get well and that her cancer was gone. Two participants had Navajo ceremonies before surgery or after radiation treatment. After her traditional prayers, Dawn was hospitalized for surgery and she mentioned that the prayers are what carried her through the surgery and postoperatively.
One participant had a simple Navajo prayer, and she believed that her grandmother's medicine had cured her. Two continue to practice their traditional ceremonies, one attends church, and two do not attend church or practice their traditional ways. Two of the participants stated that either the traditional Navajo ceremony or Christian church way was compatible with their beliefs. Dawn stated that everybody prayed to the same higher power whether a person called it God or the Holy people.

Another part of the conceptual orientation was kinship and social factors. The findings of this study showed that social relationships were very important as a source of input from relatives to keep healthy. Being healthy is a part of the teaching Dawn learned from her parents and grandparents, including the teachings from her grandmother about running early in the morning to have strength and praying every morning to live in harmony with herself. In the Navajo way, family, relatives, and clans help and cooperate with each other when ceremonies or other events are taking place. Dawn's relatives and clan helped out during her traditional ceremony. When Raven was first diagnosed with cancer, her family suggested having a NAC prayer service. She had her prayer service and invited her children, relatives, and neighbors to participate in the meeting. Dee's parents' provided a sheltered and stress-free life for her. Other participants mentioned that the help and support they received from spouses, children, parents, grandparents and relatives was important during their recovery.

Cultural values and lifeways were important for all the participants, especially for the four participants who were raised on the reservation. The struggle and hardships of
living on a reservation was a way of life for the participants. The teachings from the parents and elders, and the process of incorporating it into their daily living was important for them. Although one participant was raised a Christian, she did have a Navajo prayer performed during her recovery. All the participants mentioned that family and relatives' support and participation were important to them during their recovery. This is called Ke in Navajo and means family unity.

**Power and Strength**

All three factors of religion, kinship, and cultural values influenced the participants' power and strength. Their power and strength came from the elders' teachings such as, "It's up to you," to be strong and face adversity. In Bah's case, she was using self-empowerment to keep herself going. By drawing strength from their elders' teachings, their spirituality, and the support of family and relatives, the participants were determined to continue with life. Bah was determined to see her child graduate from high school and used self-affirmations, such as "I will enjoy my life again."

**Self-Care Practices**

Self-care practices also reflected cultural values and lifeways. The participants used herbs for healing ceremonies and also as an herbal tea to help one participant to sleep. Food from the basic food groups was included in their diet, in addition to traditional foods such as mutton stew and frybread. Daily prayers were said to maintain health, strength, and healing. For one participant, prayers were said in the morning and evening. The traditional practice of running in the morning was not practiced. Rather the
participants walked, sometimes because of a lack of energy or fatigue from the side effects of their treatments.

**Difficult Feelings about Breast Cancer**

Religious and philosophical factors, kinship and social factors, and cultural values again played a major part in the participants' feelings about breast cancer. All the participants were shocked when they were told they had cancer. One participant had a Navajo prayer before her surgery. Another participant decided to have her surgery off the reservation because she felt the physician in the city was superior to the PHS physician. Dee sought advice from her sister who is a registered nurse when she was first diagnosed. During her treatment, she did not have depression, and she credits this to her upbringing and family support. The other four participants expressed feelings of depression and related how hard it was living with breast cancer. Despite the difficulties, the participants relied on religious, social, and cultural resources to manage their feelings about breast cancer.

**Biomedical Treatment**

In relation to biomedical treatment, the religious factor was important for most of the participants. Most of the participants expressed spirituality but this increased when they felt their life was threatened. Traditional ceremonies were done prior to surgery and up to adjuvant treatment. Attending church or traditional ceremonies was a way for the participants to pray for healing. Family and relatives' support were important social
factors at this time. The participants did not attach great importance to biomedical treatment.

Cultural values also were an important part of the participants' recovery. Dawn attributed her recovery to her traditional upbringing, Mormon faith, and returning to her traditional ways when she was diagnosed with breast cancer. Some participants turned to family and relatives for support and choose adjuvant treatment. One participant refused treatment, believing that her body and mind felt that she did not need chemotherapy treatment. The women did participate in biomedical treatment but the dominant approaches to healing are from traditional methods. The data suggest that there is a cultural theme of valuing traditional healing methods to a greater extent than valuing biomedical treatment. The researcher's experience may have influenced her interpretation.

There was one major difference in the participants' perceptions on those diagnosed early as compared to the one participant who was diagnosed later. From the five participants, Dee appeared to recover quickly and did not experience depression compared to the four participants. She feels well and continues to work as a teacher (personal communication, November, 1996). Dawn, who was diagnosed three months later, had a recurrence of breast cancer and is now having radiation treatment (personal communication, November, 1996). Shondee stated that she was afraid that she had a recurrence when she felt a lump recently. She stated that she was very happy when the results came back negative. She is continuing her college education and was offered a
job recently (personal communication, November, 1996). The researcher attempted to contact Bah at work, but she was not in her office. Due to time constraints the researcher did not contact Raven.

**Limitations of the Study**

This was a cross sectional study, which did not provide for following changes in the long range of participants' lives. The small sample size of Navajo women was another limitation. In a larger study, there would be more depth, and a broader range of responses to support emergence of cultural themes. Time constraints were another limitation as the researcher had to travel a long distance for the interviews and quickly return to have the tapes transcribed. There was also the language and terminology barrier for some of the participants, which required rephrasing some of the questions so that they could understand what was being said in the interviews. The researcher speaks some Navajo and understands the language.

**Implications for Nursing**

This research was an ethnographic study of the perceptions of five Navajo women who were in recovery from breast cancer and who discussed their cultural and spiritual beliefs and ways of coping with their illness. Nurses should be aware of the strong spiritual and cultural beliefs of Navajo women with breast cancer. To deliver culturally sensitive nursing care, nurses need to move beyond ethnocentrism of the dominant culture to be open to viewing their clients from an emic perspective. Anglo nurses who
are new arrivals to Indian Health Service can strengthen their nursing care by learning about the Native-American cultures.

Often the diagnosis of breast cancer is shocking to Navajo women and they require support not only from family but nurses as well. Providing referrals to other physicians for second opinions, and information on support groups, or referrals to Navajo women who had been diagnosed with breast cancer would be extremely helpful. In addition, referrals to a social worker or a counselor for dealing with the anguish and shock of the diagnosis of breast cancer would provide a possible strategy for alleviating some of the stress for the client and family.

The first cultural theme related how most of the participants in this study discussed the impact their elders' teachings had on their lives and that some participants continue to practice the traditional teachings today. An Anglo nurse working on the reservation for the first time must honor these teachings and traditions. For instance, a Navajo woman may be admitted for surgery related to her breast cancer. The Anglo nurse may find the patient's room filled with family, elders, possibly a medicine man. Because family and extended family are sources of support during illness, the nurse needs to be aware that a hospitalized client may have a large number of family members visiting. The nurse will understand that family and elders are there to provide emotional and spiritual support as well as encouragement that the surgery will be a success. The medicine man may say a prayer while she is hospitalized; this ceremony should be respected and privacy allowed for the patient and family.
In another instance, when a Navajo woman enters the hospital, she may have had a ceremony the night before and may have sacred objects with her, such as a medicine pouch or herbal medicine. Nurses should not take it away or discard it, but they should allow the client to keep it on her person or put it within reach where she can see it. A traditional ceremony or prayers can involve putting corn pollen on top of the client's head by the medicine man. During the woman's hospitalization, nurses should not ask her to wash her hair immediately. Rather, they should allow her to wash her hair the next day if time permits.

If a Navajo woman refuses conventional medicine and chooses the traditional methods of healing such as a "sing" or peyote ceremony, nurses must honor and respect her beliefs. Perceptions of healing for a Navajo women is based on balance and harmony with nature; thus she may seek a medicine man to heal or cure her of illness. The disease process is not emphasized. This is in contrast to the Anglo woman who sees a physician to discover the cause of her illness. In this study, with Navajo women who chose the traditional method of healing, there was a relationship to the second cultural theme whereby ceremonies and beliefs give the power for healing and reflect the spiritual journey that is woven throughout the culture. For some participants, traditional ceremonies and prayers were a very powerful form of healing, and ties to family, clan, and community were strengthened. One participant refused her third chemotherapy treatment because she strongly believed that the Navajo prayers and her self-empowerment were healing factors in her recovery.
Having a nurse visit the client at home after surgery would benefit the client. Home visits allow the nurse to assess the patient's health in addition to assessing the home situation. Does the client have emotional and physical support at home? Does she have modern facilities such as electricity and running water to facilitate cleaning and dressing changes? Does she have a phone or other types of communication as a way of reaching out to others? This is the time for the nurse to offer support and provide teaching to the client on any questions that the client may have relating to her recovery. The client may be more relaxed at home and may communicate her needs more clearly.

All the participants expressed a desire to "live a long life," which touches on the third cultural theme that recovery is important because a long life is desirable. Children, grandchildren, and spirituality were strong motivations in the participants' desire to live to an old age. Nurses need to be aware that Navajo children are considered as blessings from the Holy people and are precious to the parents. In recovery, participants abided by their elders' teachings and continue to practice their spiritual beliefs. Again, nurses must respect and honor the client's spirituality whether it is Christian, traditional prayers, or self-empowerment. Both the elders' teachings and prayers prepared and strengthened the participants for surgery and adjuvant therapy. Teachings such as "it's up to you," or the healing "must come from your heart" helped guide the participants in recovery and lifeways.
Recommendations for Future Research

Further research is needed to explore perceptions of Navajo women in recovery from breast cancer. One recommendation for future research is to have a larger sample size to obtain a broader range of perspectives. In addition, more than one interview with the participant would provide more in-depth data. Longitudinal studies to explore women's perceptions at various stages of breast cancer would capture long-term changes in Navajo women's perceptions of breast cancer. Finally, future ethnographic research might focus on the perceptions of traditional elderly Navajo women with breast cancer, to explore potential differences and similarities between younger and older women's perceptions.

Summary

Chapter Five included a discussion of the results, which reflected the conceptual orientation. Some findings were consistent with previous research. However, some new findings that had not been reported in the literature include: all participants used Ke (family unity) for support and healing, their way of combining traditional and biomedical treatment in their recovery, the use of traditional herbs and peyote to combat cancer, the use of traditional ceremonies and prayers to promote healing of cancer, for some participants, their way of combining traditional prayers and the Christian church to promote harmony and increased spirituality, and finally, combining traditional teachings and the use of support group in their recovery. There was a discussion of the limitations of the study, implications for nursing and recommendations for future research.
APPENDIX A

PERSPECTIVE OF NAVAJO WOMEN IN RECOVERY FROM BREAST CANCER
INTERVIEW GUIDE
PERSPECTIVE OF NAVAJO WOMEN
IN RECOVERY FROM BREAST CANCER

INTERVIEW GUIDE

1. What do you think are the most important characteristics of the Navajo way of life?

2. In the Navajo culture, what beliefs and practices help to keep people healthy?

3. In the Navajo culture, what beliefs and practices are important when a person is ill?

4. Tell me about your recovery after you were diagnosed with breast cancer.

5. How have your spiritual or religious beliefs contributed to your recovery?

6. What role does your family play in your recovery?

7. What foods do you eat to stay healthy?

8. What should you do to keep healthy after your recovery?

9. Please describe your cultural beliefs or practices that have contributed to your recovery.
APPENDIX B

HUMAN SUBJECTS APPROVAL LETTERS
11 April 1996

Veronica Ashley, BSN
c/o Kathleen May, Ph.D.
College of Nursing
PO BOX 210203

RE: PERSPECTIVE OF NAVAJO WOMEN IN RECOVERY FROM BREAST CANCER

Dear Ms. Ashley:

We have received documents concerning your above cited project. Regulations published by the U.S. Department of Health and Human Services [45 CFR Part 46.101(b) (2)] exempt this type of research from review by our Committee.

Thank you for informing us of your work. If you have any questions concerning the above, please contact this office.

Sincerely yours,

William F Denny, M.D.
Chairman
Human Subjects Committee

WFD:js
cc: Departmental/College Review Committee
8 May 1996

Veronica Ashley, BSN
c/o Kathleen May, Ph.D.
College of Nursing
PO BOX 210203

RE: PERSPECTIVE OF NAVAJO WOMEN IN RECOVERY FROM BREAST CANCER

Dear Ms. Ashley:

We received your 25 April 1996 memorandum and accompanying revised subject disclaimer for your above cited project. Protocol change involves addition of observation and/or partial participation in subjects' activities (i.e., Navajo prayers and ceremonies, sweat ceremony, family gatherings, church services and medical appointments of subjects) [reflected in revised subject disclaimer]. Approval for this change in your exempt project is granted effective 8 May 1996.

Thank you for keeping us informed of your work. If you have any questions concerning the above, please contact this office.

Sincerely yours,

William F. Denny, M.D.
Chairman
Human Subjects Committee

WFD:js
cc: Departmental/College Review Committee
21 May 1996

Veronica Ashley, BSN
c/o Kathleen May, Ph.D.
College of Nursing
PO BOX 210203

RE: PERSPECTIVE OF NAVAJO WOMEN IN RECOVERY FROM BREAST CANCER

Dear Ms. Ashley:

We received your 17 May 1996 memorandum and accompanying revised subject disclaimer for your above cited project. Change involves addition of contact information for the Navajo Area Indian Health Service and Institutional Review Board chairperson. Approval for this change in your exempt project is granted effective 21 May 1996.

Thank you for keeping us informed of your work. If you have any questions concerning the above, please contact this office.

Sincerely yours,

William F. Denny
William F. Denny, M.D.
Chairman
Human Subjects Committee

WFD: js
cc: Departmental/College Review Committee
14 June 1996

Veronica Ashley, BSN
c/o Kathleen May, Ph.D.
College of Nursing
PO BOX 210203

RE: PERSPECTIVE OF NAVAJO WOMEN IN RECOVERY FROM BREAST CANCER

Dear Ms. Ashley:

We received your 10 June 1996 memorandum requesting an additional recruitment procedure for the above referenced project. Approval for recruitment of subjects by Indian Health Service physician referral for your exempt project is granted effective 14 June 1996.

Thank you for keeping us informed of your work. If you have any questions concerning the above, please contact this office.

Sincerely,

William F. Denny, M.D.
Chairman
Human Subjects Committee

WFD/js
cc: Departmental/College Review Committee
24 June 1996

Veronica Ashley, BSN
c/o Kathleen May, Ph.D.
College of Nursing
PO BOX 210203

RE: PERSPECTIVE OF NAVAJO WOMEN IN RECOVERY FROM BREAST CANCER

Dear Ms. Ashley:

We received your 20 June 1996 memorandum requesting approval for the collection of demographic data in the above referenced project (instrument submitted for review). Approval for this addition to your exempt project is granted effective 24 June 1996.

Thank you for keeping us informed of your work. If you have any questions concerning the above, please contact this office.

Sincerely,

William F. Denny
William F. Denny, M.D.
Chairman
Human Subjects Committee

WFD/js
cc: Departmental/College Review Committee
APPENDIX C

SUBJECT DISCLAIMER
SUBJECT DISCLAIMER

Perspective of Navajo Women in Recovery from Breast Cancer

The purpose of this research is to explore the perspective of Native American women in recovery from breast cancer, to increase nurses' understanding of Navajo women's cultural beliefs in healing and recovery practices.

Participation in this study is voluntary. By responding to questions in an interview, you will be giving your consent to participate in this study. The interviews will last approximately 30-60 minutes in a location convenient for you. You may ask any questions you have about this research and your questions will be answered. You may choose not to answer some or all of the questions and have the right to withdraw at any time during the interview without any negative consequences. A tape recorder will be used to record the interview with your permission. After the interview is transcribed the audiotape will be erased. A brief second meeting of 10-20 minutes will be requested to share results with you and to get your feedback. The researcher may ask to attend, as an observer, with your permission, a ceremony, service, or appointment related to your recovery process.

Your identity will not be revealed and your confidentiality will be maintained. Only the researcher will have access to the audiotaped interview. The thesis committee chair and members may have access to data in portions of the interview. There are no known risks involved in your participation. There are no benefits except the opportunity to share your ideas. The name, address, and phone number of the contact person at the Navajo Division of Health, Navajo Research Program is listed so that participants can ask questions regarding their rights as research subjects, grievances, etc. Thank you.

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APPENDIX D

DEMOGRAPHIC QUESTIONS
DEMOGRAPHIC QUESTIONS

1. What is your age: ____________

2. What is your ethnicity, in your own words? (for example, Anglo, Navajo) ________________

3. Are you employed outside the home? yes ___ no ___
   If so, what is your occupation?
   Full time ____ or part time ____

4. What is your highest level of education completed? ____________

5. When were you first diagnosed with breast cancer?
   Date __________
APPENDIX E

EXCERPTS OF ETHNOGRAPHIC INTERVIEWS
S: But when I, when I went away to school, um, in Utah, um, I was real close to my religion, too, and I guess that made me pretty strong. It seemed like they were compatible in a lot of ways. And the characteristic that it taught me is to, to live in harmony with myself, to, to be strong, and to, um, persistent, and there's a, in the Navajo way our elderly people taught us to be strong if we're faced with adversity in our lives, then we need to use our adversity experience to become strong. And they always taught us that if we didn't have any adversity in our lives that we will never be strong. And I'm thankful for that because, um, when I was first diagnosed with breast cancer I thought of all those things. I thought of everything that was, I was taught. And that made me feel like I can handle it. And that's what I feel has really helped me to accept my obstacles in life. And I think those are the things that have really prepared me as I get older that I would use, um, if I had difficulty in my life I would use those things to overcome them.

I: Ok. In the Navajo culture, what beliefs and practices help to keep people healthy?

S: Um, I think Navajo people have always been taught to be healthy in your mind and your heart and your, and your, also your body. And as I remember a long time ago when I was growing up with my family, especially my grandmother, she used to teach us to run every morning so we can have strength, and to pray every morning so we can, so we can live in harmony with ourselves. And we will have, um, that we would have a good thinking, a good heart, and a, and as, as we travel the path of life. And I always believed that because that was one of the teachings that they told us when we were really young. Um, although I don't see a lot of Navajos practicing it these days, um, I know the elderly people still talk about that. And how a long time ago they used to run in the morning and they used to pray in the morning, they used to sweat all the time, and they were always constantly having ceremonies, and they were always helping each
and I prayed, and I prayed, and, and I went
through a real bad __________ relationship in
my marriage. And, um, when I got my divorce,
I think I, never went back to church, don't
remember if I prayed maybe, I'm sure I did,
maybe sometimes, but I guess in a way I was
already angry at the, the high power people or
God, um, so at the time when I was diagnosed,
you know, I was already mad at him, so that,
that made it even worse that, you know, this
happened to me. And I, I tell myself, I ask
him and say, you know, why me? Don't you
think I went through enough, you know, why me,
why do I have to go through this? And that's
probably the only time that, um, and, and
traditionally I haven't had anything done. I
believe in the medicine, I believe in, in
Navajo medicine. I was treated, my mom gave
me some medicine that she knew that could help
me, my grandmother gave me medicine that she
needs, that she believes that will help me.
And grandfather, my grandmother's brother,
gave me medicine that he believes that could
help me. But, um, after I used the medicine,
the one that really moved me spiritually was
my grandmother's medicine. I had to take,
after I used the medicine, I had to take it
back, and she told me to give it back to

S: I had to take the used medicine back early
in the morning, and, um, and my grandmother
told me to pray and, um, ________ pray over
there, and, and that's what I did. Grandma
just told ________, I believe, I think that, I
think the medicine in my soul, because I
strongly believed in it, and I, I took it
back, and, and, once I took it back, I started
having these tingling feelings from, from my
feet, up through my knees, all the way up
through my body, and think then, I was
inspired. Seriously inspired. __________
and I couldn't stand any longer, and my knees
were weak, and, um, I knelt down and my tears
came down, and, it wasn't, it wasn't for, that
original tears or that original crying tears,
science degree Spring of 1997, and I'm looking forward to it. And recovery... um, I fear, I fear for my own life, because I always think that, you know, cancer will come back, but I believe in the almighty, like I said, and with church, I have friends in church, I have friends that support me, and the Lord's always my provider, and it's like I said, I don't have a job, and the Lord's always my provider. And I always wonder about my family's well being. Cancer is a stressful issue, and when I got it I was in shock. And I thought I was going to die. And I've been reading books about cancer and I learned how to cope with it. Especially with my treatment. And that, and that (pause) and that, um, after my recovery, I'm very grateful, you know, that my life has been spared, and I think the Lord has always been good to me. When I needed him, he's always there for me, and he touched my life.

I: How have your spiritual or religious beliefs contributed to your recovery? I think you just touched on that, on that. Can you talk about it a little more?

S: Um hum. Um, when I found out my husband left me, and left me in shock, and I went, I lost a lot of weight and, that's when a friend came along, this friend of mine prayed with me, and she told me there's a real good church south of [name of town], and she took me to the church one Sunday, and I was sitting there in the, one of the benches, and the songs they were, the songs they were singing in church really touched my heart. Because, I remember that one song that we sang, that was Precious Memories, and I was recalled that, that brought me back up. And they prayed for me, and that was when the Lord really touched me. And I started going to church after that, and to this day I'm still going to church, and I've grown, I've grown a lot in the Lord. And I read my Bible every night, and I always pray for my health. And sometimes I have a, what do you call it, side effects. My stomach will be cramping and my left shoulder will be
S: Uh, I, I guess my main, I felt my main advantage is my, my parents had a traditional Anglo lifestyle. My dad worked, my mom stayed at home, and my mom was always there. You know, they always had meals at certain times, and we had chores, there was just, there was just that consistency. You know, having someone there all the time. My father didn't drink, my mother didn't drink, and I know that was a problem in some of the families down where we lived. The family was dysfunctional, and, uh, but, I always felt very safe and very well taken care of. And, there was no, no stress, you know. Sometimes I feel like I'm very naive because we were so protected. And it's just like, I must have been, first or second grade, I, I didn't know my mom and dad had another name besides mom and dad, you know. I was just kind of, they were actually, another person I didn't know, you know. And, un, and, just, just, just growing up in a very sheltered, um.... I guess just maybe just staying stress free as far as growing up, you know. I felt very, you know, we, we always had food on the table, you know, it was, just a very sheltered life. And I, I feel like I continued that with my family, um, keep them very sheltered, um, and, uh, and I, I think my husband and I have raised, they're, they're not stressed by things outside, or in the family, but maybe, um, I, I guess in a way, just being a home body, probably how I was raised, and that's how my kids are now. They're very close to the home.

I: Did you come from a large family?

S: No, well, I, there was four children in my family. An older sister and an older brother, then a younger sister.

I: And what about your children?

S: I have just two children, one son and one daughter. My son is going to be 20, he's down in [city in S.W.], he went to the [university in S.W.]. And my daughter is 12, and she will
I: How did your family help you in your recovery?

S: Well, they were a lot of help, my kids and my husband. I was, you know, I was being treated like, like, I was a very special person or something like that. I didn't even have to cook, I didn't even have to clean house, I didn't even have to go anywhere by myself. Not even my laundry, nothing like that. My husband would get up real early in the morning, get the breakfast ready and go to work. And then my daughter would stay here for awhile, and comes back to me and cooks for me at noon, or sometimes she'd say let's go out, mom, let's go drive around, see what's going on out there. And so, they talked to me, they said don't, don't think, don't think on the positive side, always think of the good side, they said. Always think of, uh, always think that you're going to get well, don't think of, you know, something's going to happen to you. That's what my kids said to me. They said think of that you want to get well and you're gonna be ok. So they talked to me in a lot of ways, they said, don't do, worry, don't worry, just gets you down, and all that. That's what the kids said to me. So they, they, they, what we mostly do is pray because, my kids would sit up with me and pray with me, you know. If they, they think I'm worrying or something like that. If I do look, if they look at me and think that I'm worrying, then they, we all sit, sit down and pray together. So then I'll be ok.

I: Ok. What foods do you eat to stay healthy?

S: Like every day or.... I can't remember everything I eat. Well, I, I was working in the kitchen for 31 years, so I was, I know about the four basic foods. So that's what I mostly eat. But now I hardly eat all that, I just mostly eat fruit, and some white meats, like what the doctor told me. Told me not to eat too much red meat, and eat more white meat, so that, that's what, I'm on that now.
APPENDIX F

NATIONAL LEAGUE FOR NURSING PERMISSION
June 28, 1996

Veronica Ashley
3401 N. Columbus Blvd., #5
Tucson, Arizona 85712

Dear Ms. Ashley:

The National League for Nursing is pleased to grant permission to use the following in your Master's thesis at the University of Arizona College of Nursing:


Please note that for this particular usage we are waiving our customary royalty fee. This permission is for one-time use only, English language, world rights. Note also that a complete citation must be noted on printed, reprinted and adapted material (material adapted from), including title, authors, date of publication, and publisher.

Thank you for asking permission and thank you too, for your interest in our publications.

Sincerely,

Catherine Bowles
Administrative Assistant
NLN Public Information Alliances
APPENDIX G

CONFIDENTIALITY CERTIFICATE
Ms. Veronica Ashley  
The University of Arizona College of Nursing  
Health Science Center  
Tucson, Arizona 85721

Dear Ms. Ashley:

I am happy to send you the certificate of confidentiality for the research project "Perspective of Navajo Women in Recovery from Breast Cancer."

Please be sure that the informational statement given to participants accurately states the intended uses of personally-identifiable information and the confidentiality protections, including the protection provided by the certificate of confidentiality, with its limitations and exceptions.

May I ask that you advise me of any situation in which the certificate is employed to resist disclosure of information in legal proceedings. I am at 440D Humphrey Building, telephone (202) 690-5896 (direct dial, sometimes answered by machine) or (202) 690-7100, telefax (202) 690-5882. Internet: jfanning@osaspe.dhhs.gov.

If attorneys for the project wish to discuss the use of the certificate, they may contact the Chief Counsel of the Public Health Service, Mr. Richard Riseberg, at (301) 443-2644.

If you have any questions, or if we can otherwise help, please call.

Sincerely yours,

John P. Fanning  
Senior Policy Analyst  
Division of Data Policy  
Office of Program Systems
TO: The Assistant Secretary for Health

FROM: John P. Fanning
Senior Policy Analyst
Office of the Assistant Secretary for Planning and Evaluation

SUBJECT: Request for Certificate of Confidentiality -- College of Nursing, University of Arizona Health Sciences Center -- "Perspective of Navajo Women in Recovery from Breast Cancer" -- DECISION AND SIGNATURE

Here for your signature is a certificate of confidentiality for a study of cultural perceptions about recovery from breast cancer.

The study presents no special problem. We recommend that you sign the certificate.

The Study

This study does not have Federal funding. It is dissertation research in a college of nursing. It is an ethnographic study of the perspective of Navajo women who have had breast cancer regarding biomedical and traditional Navajo methods of healing, and regarding recovery. According to the investigator, there is little reported research on how native American women with breast cancer cope with their diagnosis, treatment, and recovery.

The study is exploratory and descriptive. It will identify adult Navajo women, on a reservation in the Southwest, who have had a biomedical diagnosis of breast cancer within the past five years. The participants will be identified through referrals by women who have had breast cancer, and, if necessary, through referrals by Indian Health Service physicians.
Subjects will be interviewed, using an interview guide that will elicit information about their reactions and feelings about their illness and treatment. The interviews will be audiotaped. The investigator will also accompany the subjects to Navajo prayers and ceremonies, family gatherings, church services, and possibly appointments for biomedical care.

The project will thus gather a great deal of sensitive information about the subjects' home lives and about their mental state.

Sensitive Data Collected

These are all sensitive matters which warrant a certificate of confidentiality under our standards.

Testing for Communicable Disease

There is no testing for reportable communicable disease.

Review

This project has been reviewed and approved by the institutional review board of the University of Arizona Health Sciences Center.

Recommendation

We recommend that you sign the certificate.
CONFIDENTIALITY CERTIFICATE

issued to

Employees of

College of Nursing,
University of Arizona Health Sciences Center

and Other Participants

conducting research known as

"Perspective of Navajo Women in Recovery from Breast Cancer"

In accordance with the provisions of section 301(d) of the Public Health Service Act (42 U.S.C. § 241(d)) this certificate is issued to protect the privacy of research subjects by withholding their identities from all persons not connected with the research.

Under authority vested in the Secretary of Health and Human Services under that section, all persons who --

(1) are employed by the College of Nursing, University of Arizona Health Sciences Center, and its contractors and cooperating agencies; and

(2) have, in the course of that employment, access to the information which would identify individuals who are the subjects of a research project entitled "Perspective of Navajo Women in Recovery from Breast Cancer"
are hereby authorized to protect the privacy of the individuals who are the subjects of that research by withholding their names and other identifying characteristics from all persons not connected with the conduct of that research, with the exceptions and limitations set forth below.

The purpose of this research project is to describe the perspective of Navajo women who have had breast cancer regarding biomedical and traditional Navajo methods of healing, and regarding recovery.

As provided in section 301(d) of the Public Health Service Act (42 U.S.C. § 241(d)),

"Persons so authorized to protect the privacy of such individuals may not be compelled in any Federal, State, or local civil, criminal, administrative, legislative, or other proceedings to identify such individuals."

The following conditions apply to the protection provided under this certificate:

(1) This certificate does not authorize the College of Nursing, University of Arizona Health Sciences Center, or its contractors or cooperating agencies to refuse to reveal identifying information concerning research subjects if any of the following conditions exist:

(a) The subject (or, if he or she is legally incompetent, his or her guardian) consents in writing to disclosure of identifying information.

(b) Release is required by the Federal Food, Drug, and Cosmetic Act (21 U.S.C. §§ 301 et seq.) or regulations promulgated thereunder (Title 21, Code of Federal Regulations).

(2) This certificate requires that there be no disclosures of identifying characteristics of research subjects in any Federal, State, or local civil, criminal, administrative, legislative, or other proceedings to compel disclosure of the identifying characteristics of research subjects, except as provided for in paragraph (1), above.

(3) The confidentiality certificate does not govern the voluntary disclosure of identifying characteristics of research subjects.
(4) This certificate does not represent an endorsement of the research project by the Department of Health and Human Services.

(5) All research subjects in the project will be given a fair, clear explanation of the protection this certificate affords, and of the limitations and exceptions to the protection.

(6) This certificate is effective upon issuance, and will expire at the end of July 2001, or sooner if the holder is notified of cancellation in accordance with the procedures set out in 42 C.F.R. § 2a.8. The protection afforded by this certificate of confidentiality is permanent (including after death) for persons who participated as subjects in the research during any time the certificate was in effect.

Date: Philip R. Lee, M.D.

Assistant Secretary for Health
REFERENCES


New Mexico Tumor Registry (1993). The Division of Cancer Prevention and Control, National Cancer Institute, National Institutes of Health, Department of Health and Human Services, Contract No 1-LN-67007.


