Native Hawaiian Health and Well-Being in the "Ninth Hawaiian Island," Las Vegas

By

Jane Hansen Lassetter

A Dissertation

Presented to Oregon Health & Science University School of Nursing in partial fulfillment of the requirements for the degree of Doctor of Philosophy

August 1, 2008

APPROVED:

Nancy Press, PhD, Dissertation Co-Chair

Sheila Kodadek, PhD, RN, Dissertation Co-Chair

Joan H. Baldwin, DNSc, RN, AHN, Committee Member

Lynn C. Callister, PhD, RN, FAAN, Committee Member

Saundra Theis, PhD, RN, Interim Dean, School of Nursing

ACKNOWLEDGMENT OF FINANCIAL SUPPORT

This dissertation was supported by

By Oregon Health & Science University School of Nursing Dean's Award

And

By a Brigham Young University College of Nursing Research Grant

ACKNOWLEDGMENTS

I wish to express sincere gratitude to the following:

- My study participants. I am deeply grateful to the 27 amazing men and women who so willingly gave of their time and energy to participate. You taught me so much.
- My dissertation committee: Nancy Press, Sheila Kodadek, Joan Baldwin, and Lynn Callister. I appreciate your wisdom, patience, and encouragement throughout this process. I am proud to call you my mentors.
- Faculty at OHSU SON. I am thankful for everything you taught me. I especially wish to acknowledge Judy Kendall for her thoughtful guidance as I began my doctoral journey and Gail Houck for her reliability and encouragement throughout the process.
- Brigham Young University. I greatly appreciate the financial support that made my doctoral studies possible.
- Faculty and staff at BYU CON. Through their gracious support, my co-workers have made such a difference in my life. I am grateful to three deans: Sandra Rogers, who remembered me 16 years after being my first nursing instructor and encouraged me to further my education; Elaine Marshall, who courageously hired me and persuaded me to attend OHSU's doctoral program; and Beth Cole, who tirelessly cheered me on this last year. Thanks also to Associate Dean Mary Williams for your kindness and wisdom and Ken Robinson for always having Polycom ready to go.
- My OHSU co-hort: Glenda Christiaens, Donna Freeborn, Chrissy Linton, and Dallen Ormond. You brought joy to this journey.
- My best friend forever: Peggy Anderson. Thanks for eloquently reminding me that there's more to life than dissertations.

- My brothers, sisters, and their spouses. Thank you for the countless meals, practical jokes, respite vacations, and listening ears. You are the best and then some.
- My parents. I am blessed to have the world's finest parents. You are my heroes, everything I wish I could be. Thanks for teaching me I could do anything I put my mind to.
- Great Grandma Jensen. I have not known her in this life. She was the first nurse in my family, and stories of her tender care remind me of the reasons I became a nurse.
- My sons, John and Andrew. I am in awe of who you are. I am delighted you both beat me to graduation. I love you.
- My daughter, Laura. You can scarcely remember a time when I was not in school.
 You have been by my side every step of the way, through all the ups and downs.
 Words are insufficient vehicles to convey my gratitude and love.
- Finally, my dogs and faithful companions, Bugsy and Snickers. You spent millions of hours at my feet or in my lap as I worked on this dissertation. You loved me unconditionally, even when I could not find the right words. Through it all, you have become true PhDs – pretty high-falutin' dogs.

ABSTRACT

TITLE: Native Hawaiian Health and Well-Being in the "Ninth Hawaiian Island," Las Vegas

AUTHOR: Jane Hansen Lassetter

Approved:

Nancy Press, PhD

RATIONALE: Migration is often a challenging process. Native Hawaiians are migrating to Las Vegas at an impressive rate, but no research has explored how migration from Hawaii to Las Vegas impacts Native Hawaiian health and well-being. Exploring their perceptions of health and well-being is the first step toward culturally competent nursing care and improving Native Hawaiian migrants' health and well-being.

PURPOSE: The purpose was to describe how Native Hawaiians perceive their health and well-being and any changes therein since migrating from Hawaii to Las Vegas.

METHOD: A qualitative descriptive design was used, and 27 participants took part in semi-structured interviews. Data analysis involved: 1) transcribing interviews, 2) reading

transcripts, 3) coding related segments, and 4) identifying themes and categories.

RESULTS: Most participants perceived no changes in health and minor changes in wellbeing, but the period shortly after migration was a vulnerable time. Many maintained their well-being by adapting valued activities to their new circumstances. However, a few were deeply burdened by life in Las Vegas or longing for Hawaii, and their well-being suffered. They tended to identify barriers to well-being rather than ways to foster it.

IMPLICATIONS: Increased vulnerability shortly after migration suggests a need for early access into the health care system. One way health care providers can help is by encouraging and facilitating Native Hawaiian migrants' participation in valued activities.

TABLE OF CONTENTS

Approval page	
Acknowledgement of Financial Support	iii
Acknowledgements	iv
Abstract	vi
List of Tables	X
Chapter One Introduction	1
Native Hawaiian Migration	
Native Hawaiian Migration to the Mainland	2
Native Hawaiian Migration to Nevada	
Economic Incentives for Migration to Nevada	
Native Hawaiian Health and Well-Being	5
Migration and Health and Well-Being.	
Problem Statement	9
Research Purpose and Aims	10
Chapter Two Review of the Literature	12
Method	12
Impact of Migration on Health and Well-Being of Voluntary Migrants	14
Evidence of Good Health in Voluntary Migrants	16
Evidence of Poor Health in Voluntary Migrants	22
Factors that Influence Migrants' Health	
Summary of the Impact of Migration on Health	36
The Relationship between Health Perceptions, Health, and Well-Being	37
Factors that Influence Health Perceptions	38
Association between Perceptions of Health and Mortality	46
Association between Perceptions of Health and Health Outcomes	48
The Influence of Health Perceptions on Health-Seeking Behaviors	49
Contradictory Findings	50
Native Hawaiian Migration to the Mainland	51
Native Hawaiian Migration to Nevada	52
Economic Considerations for Migration	
Las Vegas, an Established Hawaiian Enclave	
Disparities in Hawaii	
Health Disparities in Hawaii	
Educational Disparities in Hawaii	60
Economic Disparities in Hawaii	60
Summary	63

Chapter Three Research Design and Methods	65
Context	65
Participants	67
Definition of Native Hawaiian	68
Description of the Sample	69
Method and Design	72
Semi-Structured Interviews	72
Demographic Data	73
Fieldnotes	73
Reflexive Journal	74
Procedure	74
Recruitment Procedure	74
Consent Procedure	75
Data Collection Procedure	76
Follow-up Procedure	77
Protection of Human Subjects	77
Institutional Review Board Approvals	77
Informed Consent	77
Maintaining Confidentiality	78
Reasonable Compensation	
Data Analysis	
Interviews	79
Demographic Data	81
Fieldnotes	81
Reflexive Journal	81
Methodological Rigor	81
Audit Trails and Theoretical Memos	81
Verification, Validation, and Validity	82
Chapter Four Results	84
Perceptions of Health – One Piece of the Puzzle	
A Perception of Health Puzzle Piece with a Different Shape	
Access to Health Care	
Well-Being – Putting the Puzzle Together	98
Nurturing Relationships with Family	
Nurturing Relationships with Friends	
Improving Financial Security	
Gaining Independence	
Helping Others	
Teaching Others about the Hawaiian Culture	
Enjoying Hawaiian Crafts	
Enjoying Hawaiian Music	
Communing with Nature	
Feeling Safe	
Traveling	
Eating Hawaiian Food	

Factors that Negatively Impact Well-Being				
Conclusion				
Chapter Five Discussion	145			
Migration and Health				
Comparison to Literature Showing Poor Health in Migrants	146			
Comparison to Literature Showing Good Health in Migrants	147			
Transition Theory	148			
Health Perceptions	151			
Limitations of the Study				
Uniqueness of the Setting	153			
Representativeness of the Sample	155			
Ethnicity of the Researcher	157			
Implications for Practice	157			
Implications for Health Policy				
Implications for Research				
Summary				
References	163			
Appendix A Interview Guide				
Appendix B Demographic Questionnaire				
Appendix C Fieldnote Record Form	190			
Appendix D Recruitment Flier	192			
Appendix E Consent Form	194			

LIST OF TABLES

Table 1. Mortality Rates and Life Expectancy.	
Table 2. Birth Outcomes	19
Table 3. Risk of Illness	21
Table 4. Patterns of Deteriorating Health	23
Table 5. Native Hawaiian Demographics in Nevada	67
Table 6. Participant Demographics	71

Chapter One

Introduction

People are more geographically mobile today than at any point in human history. Not only are people more readily able to visit distant places than their ancestors did, but migration occurs frequently. Migration has been defined as a boundary crossing, including cultural, geographic, and political boundaries (Messias, 1997) with the intention of a substantial or permanent stay (Hull, 1979). Estimates indicated that 150 million people worldwide lived outside their country of birth in 2001 (Martin, 2001). In the United States (U.S.), nearly 39 million people migrated in 2004, of whom 7.3 million migrated to a different state, and nearly 1.3 million migrated to another country. The other 30.4 million people moved within their state of origin (U.S. Census Bureau, 2005).

Health issues associated with migration are a longstanding concern. Screening international migrants entering the U.S. began in the late 1800s in an effort to control public health problems, such as yellow fever, tuberculosis, and cholera. These concerns were so significant that the research laboratory at the Marine Hospital on Staten Island, where these health screenings originated, evolved into the National Institutes of Health (Evans, 1987; National Institutes of Health, n.d.). Today concerns focus not only on the impact of migrants' health on the health of the host society, but also on the impact of migration experiences on migrants' health (Messias & Rubio, 2004).

Changes associated with migration can have a variety of positive or negative impacts on the health and well-being of migrants (Hull, 1979). Researchers have associated these changes with stress, climate changes, racism, separation from family members, and modifications in migrants' physical environment, lifestyle, and cultural milieu (Elliott & Gillie, 1998; Frisbie, Cho, & Hummer, 2001; Robertson, Iglesias, Johansson, & Sundquist, 2003; Steffen & Bowden, 2006; Steffen, Smith, Larson, & Butler, in press; Williams & Hampton, 2005). In the proposed study, qualitative methods will be used to examine the impact of migration on the perceptions of health and wellbeing for one migrant group, Native Hawaiian adults in Nevada.

Native Hawaiian Migration

Native Hawaiian Migration to the Mainland

Native Hawaiians migration from Hawaii to the mainland occurs at a fairly brisk pace. According to U.S. Census 2000 results, 401,162 people in the U.S. identified themselves as Native Hawaiian alone or in combination with one or more Pacific Islander groups or other races (U.S. Census Bureau, 2001b). In Hawaii, 239,655 Census 2000 respondents identified themselves as Native Hawaiian alone or in combination with one or more Pacific Islander groups or other races (U.S. Census Bureau, 2001b). Thus, approximately 60% of Census 2000 respondents who identified themselves as partially or entirely Native Hawaiian resided in Hawaii, but 40% resided on the mainland. In 1986, 68.6% of Native Hawaiians in the U.S. resided in Hawaii (Blaisdell, 1993), suggesting an increased migration of Native Hawaiians from their homeland since 1986.

Native Hawaiian Migration to Nevada

One major destination for Native Hawaiian migrants is the landlocked desert state of Nevada. Las Vegas has become such a popular vacation (Leong, 1997) and relocation destination for Native Hawaiians that it is frequently referred to as the ninth Hawaiian island (Reeder, 1999). Between 1995 and 2000, 12,079 people moved from Hawaii to Nevada compared to 1,853 people migrating in the opposite direction (U.S. Census Bureau, 2000b). Thus, "the flow of migrants from Hawaii to Nevada was an amazing six times the size of the reverse flow" (Perry, 2003, p. 7). These data include all migrants, not just Native Hawaiians, but they indicate that migration from Hawaii to Nevada occurs at an impressive rate and suggest many migrants might not be returning to Hawaii.

Significant growth in the Native Hawaiian population of Nevada can be identified through careful comparison of the 1990 and 2000 censuses. According to Census 1990 results, in which respondents were limited to one race category when indicating their racial identities (U.S. Census Bureau, 2001b), 1,534 respondents in Nevada identified themselves as Native Hawaiian (U.S. Census Bureau, 1990). According to Census 2000 results, in which respondents could choose multiple race categories when indicating their racial identities, 8,264 respondents in Nevada identified themselves as Native Hawaiian alone or in combination with one or more Pacific Islander groups or other races (U.S. Census Bureau, 2001a), including 3,471 respondents who identified themselves as Native Hawaiian alone (U.S. Census Bureau, 2000a) and 4,793 respondents who identified themselves as Native Hawaiian and at least one other race or Pacific Islander group (Association of Asian Pacific Community Health Organizations, n.d.). Comparing the Native Hawaiian category of Census 1990 to the Native Hawaiian alone category of Census 2000 suggests a 126.3% increase in Native Hawaiians in Nevada. However, comparing the Native Hawaiian category of Census 1990 to the Native Hawaiian alone or in combination with one or more Pacific Islander groups or other race category of Census 2000 suggests a 438.7% increase (Association of Asian Pacific Community Health Organizations, n.d.). Although Nevada ranks third (Native Hawaiian alone or in combination with one or more Pacific Islander groups or other races) and fourth (Native

Hawaiian alone) for the size of its Native Hawaiian population among mainland states, Nevada had the fastest growing population of Native Hawaiians in the U.S. – even faster than Hawaii – based on growth rates between 1990 and 2000 (Association of Asian Pacific Community Health Organizations, n.d.).

Economic Incentives for Migration to Nevada

Economic necessity might provide a motive for many Native Hawaiians to migrate to Nevada (Association of Asian Pacific Community Health Organizations, n.d.; Reeder, 1999). In fact, referring to the influx of migrants from Hawaii to Nevada between 1995 and 2000, Perry (2003) stated, "Hawaii's economic downturn in the mid-1990s and Nevada's fast-growing economy may have been important factors in shaping this particularly lopsided migration pattern" (p. 7).

In comparison to non-Hispanic Whites, Native Hawaiians do not fare well economically in Hawaii. According to Hawaii's socio-economic indicators from Census 2000, Native Hawaiians (alone or in any combination) had a per capita income (\$14,199) that was less than half the per capita income of non-Hispanic Whites (\$30,199). In addition, approximately 36% of Native Hawaiian (alone or in any combination) adults lived below the poverty line compared to 15% of non-Hispanic White adults (U.S. Census Bureau, 2001a). Accordingly "the population [of Native Hawaiians] belongs to the lowest socioeconomic stratum on the [Hawaiian] islands, receiving the poorest education and health care access" (Association of Asian Pacific Community Health Organizations, n.d., p. 1).

Economic constraints in Hawaii likely influence some Native Hawaiians to migrate to the mainland in search of economic relief, but ultimately migration might or might not provide the economic panacea for which they hoped. As will be explored further in Chapter Two, housing costs and other living expenses in Hawaii are high compared to costs in much of the mainland U.S. (National Low Income Housing Coalition, 2005a; Pearce & Brooks, 2003), providing possible incentives for migration. For example, the median price of a home in Hawaii was \$364,840 in 2004, while the median price of a home in Nevada was \$202,937 (U.S. Census Bureau, 2006a), which is still out of the financial reach of many. While these numbers provide a fairly stark contrast, the practical aspects of migration are poignantly expressed by one migrant from Hawaii to Las Vegas:

A lot of people ask me, "Why would you want to leave a tropical island to go to the desert?".... Hawaii may be beautiful but when you're struggling to (make ends meet), it's difficult to enjoy the beauty. (Reeder, 1999, p. 4)

Native Hawaiian Health and Well-Being

A literature review failed to produce any published study focusing on how migration to the mainland impacts Native Hawaiian migrants' perceptions of their health and well-being; however, some authors suggest the health and well-being of Native Hawaiians in Hawaii are enhanced by their feelings of connection to the land of Hawaii (Kanahele, 1986; Oneha, 2000, 2001). For instance, Oneha (2000) examined the relationship between feelings of connection with the land, or "sense of place" (p. 2), and the well-being of Native Hawaiians living in Waianae, Hawaii. Oneha found this population deeply reveres their town and island as the sacred ground of their ancestors, which provides them with great solace and benefits their health and well-being (Oneha, 2000, 2001). Even the U.S. Congress, perhaps of political necessity, acknowledged this relationship in a formal apology for the overthrow of the Hawaiian kingdom, as noted in this excerpt:

Whereas, the health and well-being of Native Hawaiian people is intrinsically tied to their deep feelings and attachment to the land . . . [Congress] apologizes to Native Hawaiians on behalf of the people of the United States for the overthrow of the Kingdom of Hawaii. (Hawaii Nation, 1993, p. 4)

Indigenous knowledge also suggests that Native Hawaiian health is connected to their land. For example, Kumu Maikaio Hee, a respected native healer or *kahuna* in Kahuku, Hawaii, warned that Native Hawaiians should not leave the islands because the land is the source of their strength. His concern was that Native Hawaiians who leave will weaken and become susceptible to illness and other challenges of life (personal communication, June 2005).

It is not known if the voices above are representative of Native Hawaiians in general or of Native Hawaiian migrants in Las Vegas specifically. Like other migrants, at least some Native Hawaiian migrants might have concerns they consider more important than where they live, such as economic necessity or a desire for personal growth. This study should contribute to understanding Native Hawaiian migrants' concerns.

Migration and Health and Well-Being

As previously stated, no literature was located on how migration to the mainland impacts the health and well-being of Native Hawaiians; however, research on the impact of migration on the health and well-being of several migrant groups to Western countries has been conducted. This literature will be reviewed in greater depth in Chapter Two, but in general, the relationship between migration, health, and well-being is extremely complex with conflicting results in the literature.

Some researchers have found that new migrants are less healthy than their counterparts, but migrants' health does not continue to deteriorate over time. For example, in a study in Sweden, foreign-born women were more likely than Swedish-born women to experience "limiting long-standing illness;" however, the health of these migrants did not become proportionately worse compared to the Swedish-born women over an eight-year period (Robertson et al., 2003, p. 99).

In contrast, several researchers found a pattern of declining health among migrants. For instance, Frisbie and associates (2001) included Native Hawaiians, most of whom were born in the U.S., in the Pacific Islander group when they compared the health of U.S.-born and immigrant Asians and Pacific Islander adults. In general, the Asian Pacific Islander immigrants reported better health and fewer activity limitations than their counterparts born in the U.S., but their health advantages diminished the longer they remained in the U.S. (Frisbie et al.). Similarly, South Asian Fijian women who migrated to British Columbia, Canada experienced a variety of harmful effects on their overall health and well-being after migration, including fatigue, physical discomfort and illness related to climate change, family discord, prohibitive cost of travel to visit extended family, and increased abuse from their husbands (Elliott & Gillie, 1998). Likewise, as migrants from around the world, including Polynesia, acculturated to the new stresses associated with life in the U.S., their blood pressures often increased (Steffen et al., in press), which can lead to cardiovascular and/or cerebral vascular complications. In addition, Hispanic-American migrants to the U.S. reported that they experienced racism

after migration, which positively correlated with sleep disturbance and depression (Steffen & Bowden, 2006).

Native Hawaiians who migrate to the mainland U.S. might experience challenges to their health and well-being that are similar to those reported by other groups who have migrated from their homelands. For instance, while racial animosities exist in ethnically diverse Hawaii (26.5% non-Hispanic white in 2004; Romero & Hoffman, 1995; U.S. Census Bureau, 2006b), racism might take a different form or be more or less of a challenge in Las Vegas, which is less ethnically diverse (82.5% non-Hispanic white in 2004; U.S. Census Bureau, 2006c). Thus, Native Hawaiians' experiences with racism might change, intensify, or decrease when they migrate to Las Vegas, which could impact their sense of health and well-being.

Many immigrants come to the U.S. in hopes of finding better circumstances for themselves and their families, but often barriers to improving their situations exist, particularly barriers to health care. For example, Marshallese immigrants in Arkansas are constrained from seeking necessary health care by a variety of factors, including a cultural belief that acknowledging illness results in negative consequences, an inability to pay for care, prejudice, and the lack of culturally competent care (Williams & Hampton, 2005). In addition, Marshallese immigrants tend to distrust U.S. health care because of their previous experiences in the Republic of the Marshall Islands, which involved destruction of a significant amount of their homeland by the U.S. military. This lack of trust contributes to Marshallese immigrants' unwillingness to seek care in the U.S. (Williams & Hampton). Native Hawaiians' experience of colonization is not unlike the Marshallese experience, and Native Hawaiians' distrust of Westernized health care is evident in Hawaii (Blaisdell, 1993). Similar distrust might exist and perhaps intensify among Native Hawaiians who migrate to the mainland. Health care providers on the mainland are less likely than health care providers in Hawaii to be aware of Native Hawaiian cultural health beliefs and practices, which could heighten distrust. This might make it less likely that Native Hawaiians on the mainland will seek health care, potentially impacting their overall perceptions of health and well-being.

It is important to note that Native Hawaiian migrants are somewhat anomalous. From one perspective, like the Marshallese migrants discussed above and many international migrants, Native Hawaiian migrants have experienced colonization over many generations and migrate a great geographic distance. One the other hand, they are U.S. citizens, with all or most of the associated benefits and challenges, and, thus, might be similar to other U.S. migrants who migrate between states. Whether or not they are more like international or internal migrants is yet another unknown but important detail about Native Hawaiian migrants that this study should elucidate.

Problem Statement

Review of the literature reveals that migration can impact the health and wellbeing of migrants in a variety of ways, but little is known about the impact of migration on Native Hawaiians' perceptions of health and well-being. In addition, Native Hawaiians living in Wainae, Hawaii have been reported by at least one source to feel a deep connection to Hawaii, which might to contribute to their well-being (Oneha, 2000, 2001). Nevertheless, many Native Hawaiians are leaving the islands, and it is unknown if or how this migration affects their perceptions of health and well-being. In order to provide culturally mindful care to Native Hawaiians on the mainland, it is essential to understand Native Hawaiians' perceptions of health and well-being and the possible impact of migration on those perceptions.

Research Purpose and Aims

The purpose of this qualitative descriptive study was to explore the following research question: How do Native Hawaiian adults who have migrated directly from Hawaii to Las Vegas, Nevada describe the impact of migration on their health and well-being?

Specific Aims

The specific aims of this study were:

- To describe the perceptions of health and well-being of Native Hawaiian adults who have migrated directly from Hawaii to Las Vegas, Nevada
- To explore changes in perceptions of health and well-being through the experience of migration.

Inasmuch as Native Hawaiian migration from Hawaii to the mainland is occurring at increasing rates, understanding the strengths and needs of Native Hawaiians is becoming increasingly important to nurses on the mainland. Awareness of the relationship between migration and perceptions of health and well-being is essential in development of culturally competent nursing interventions for Native Hawaiians on the mainland. Such understanding will enable nurses to more readily recognize Native Hawaiian migrants' strengths and some of the barriers to health care migrants face on the mainland. This can pave the way for effective collaboration in meeting Native

Hawaiians' health care needs.

Chapter Two

Review of the Literature

The purpose of this review of the literature is to support the need for this qualitative descriptive study. No research was located that focused on Native Hawaiian health; therefore, it was necessary to more broadly examine the impact of migration on the health of voluntary migrants in Western countries. First, the literature regarding the impact of migration on health and well-being will be reviewed along with the literature on the relationship between health perceptions, health, and well-being. The literature on the impact of migration on health and well-being is foundational, yet the issue is so complex and results so contradictory that it was decided that the literature on relationship between health perceptions, health, and well-being would help explain this complicated issue. Indeed, understanding these bodies of literature provides important contextual information for exploring Native Hawaiian migrants' perceptions of health and wellbeing. Next, to better understand Native Hawaiian migration, possible rationale for their migration and the current health, educational, and economic disparities faced by Native Hawaiians in Hawaii will be presented. The chapter will end with a summary justifying the need for this study.

Method

Systematic searches were conducted to locate the literature included in this review. In the first search on migration and health, the terms migra*, immigra*, and health were searched in MEDLINE and CINAHL from 1995 to 2008 with the limits of peer-reviewed, research, and English language. The original search yielded 3463 articles. Included articles were selected through the following process: (1) reading the title and abstract, (2) eliminating articles in which the focus was not on the health impact of

voluntary internal or external migration in Western countries, (3) reviewing the text of selected articles, and (4) identifying additional relevant articles in the reference lists of pertinent studies, some of which are literature reviews or predate 1995. Although articles were not scored for quality, they were excluded if they were not peer-reviewed. Additionally, articles were excluded if authors focused on health care utilization or policy, health promotion, the impact of migrants on the health of the host country's population, undocumented migrant (if specified in articles) or refugee health, or internal and external migration to non-Western countries. Infectious diseases migrants bring with them are not the result of migration and are, therefore, beyond the scope of this literature review. The search was limited to voluntary migration to Western countries because it occurs more frequently than voluntary migration to non-Western countries (Central Intelligence Agency [CIA], 2008) and seems similar to Native Hawaiian migration to the U.S. mainland. These limits led to a reduction of the literature reviewed to 58 studies, 6 literature reviews, 1 unpublished doctoral dissertation, and 1 meta-analysis on migration and health.

The next step involved synthesis of this literature. Selected literature was thoroughly reviewed, and findings were compared, contrasted, and summarized.

A second search, selection, and synthesis process was conducted to find literature on the relationship between health perceptions, health, and well-being. The search term "perceptions of health" was searched in MEDLINE and CINAHL from 1995 to 2008 with the limits of peer-reviewed, research, and English language. This initial search yielded 480 articles. Articles were not limited to a focus on voluntary migrants, but articles were excluded if the researchers did not focus on the relationship between health perceptions, health, and well-being. Findings from 38 studies, 2 literature reviews, 1 unpublished doctoral dissertation, and 5 books were synthesized for this part of the literature review.

Impact of Migration on the Health and Well-Being of Voluntary Migrants

People are more geographically mobile today than at any point in human history. Not only can they more readily visit distant places than their ancestors did, but they migrate more frequently. In fact, approximately 150 million people worldwide lived outside their country of birth in 2001 (Martin, 2001) with prevalent migration to Western countries. Migration rates (per 1,000 population) to Western countries in 2007 included 1.6 migrants to the European Union, 2.17 migrants in the United Kingdom, 3.05 migrants to the United States (U.S.), 3.78 migrants to Australia, and 5.79 migrants in Canada (CIA, 2008). By comparison, negative migration rates (per 1,000) occurred in 2007 throughout much of Africa, including -0.58 migrant in Ghana and -2.46 migrants in Chad, and in Central and South America, including -2.31 migrants in Guatemala, -4.08 migrants in Mexico, and -1.18 migrants in Bolivia (CIA).

Migration in the United States (U.S.) is of particular interest in this research. In the U.S., nearly 39 million people migrated in 2004, of whom 7.3 million migrated to a different state, and 1.3 million migrated to another country. The other 30.4 million people moved within their state of origin (U.S. Census Bureau, 2005).

Voluntary migration is the willing crossing of a cultural, geographic, or political boundary (Messias, 1997) with the intention of a substantial or permanent stay (Hull, 1979). While voluntary migration involves physical relocation from nation to nation, state to state, city to city, or rural to urban areas and vice versa, it is "regarded as a human process rather than a discrete event" (Evans, 1987, p. v). For many voluntary migrants, a complicated decision-making process begins long before actual physical relocation (Hull; Messias, 1997). Together with family and friends, potential migrants carefully analyze the "push factors" of deteriorating or negative conditions in the place of origin and the "pull factors" of attractive qualities in a specific destination (Gmelch, 1980, p. 140). Following physical relocation, voluntary migrants often experience other life transitions, such as family role modifications, occupational and socioeconomic changes, and cultural and social network alterations (Messias & Rubio, 2004). Such transitions can make voluntary migration a challenging and long-lasting process. Indeed, no identifiable marker has been established to signal the conclusion of migration, suggesting it might be a never-ending transition (Messias, 1997).

Health issues associated with voluntary migration are a longstanding concern. Screening international migrants entering the U.S. began in the late 1800s in an effort to control infectious diseases, such as yellow fever, tuberculosis, and cholera (Evans, 1987; National Institutes of Health, n.d.). Today concerns focus not only on the impact of voluntary migrants' health on the health of the host society, but also on the impact of migration experiences on voluntary migrants' health (Messias & Rubio, 2004). Nurses and other health care providers need to be aware that voluntary migration can have a variety of positive or negative impacts on migrants' health (Hull, 1979). Researchers have associated these health changes with stress, climate differences, racism, separation from family members, and modifications in migrants' physical environment, lifestyle, and cultural milieu (Elliott & Gillie, 1998; Frisbie, Cho, & Hummer, 2001; Robertson, Iglesias, Johansson, & Sundquist, 2003; Steffen & Bowden, 2006; Steffen, Smith, Larson, & Butler, 2006; Sharareh, Carina, & Sarah, 2007; Williams & Hampton, 2005). This section contains discussion of the literature on the health of voluntary internal or external migrants in Western countries and several factors that moderate or otherwise influence the impact of migration on health.

Although it is difficult to determine if voluntary migrants' health is influenced more by their pre-migration health or post-migration experiences, there is evidence of both good and poor health among voluntary migrants into and within Western countries. The impact of migration on health is extremely complex with contradictory findings from various studies, most of which used quantitative methods. This suggests that use of another approach, qualitative methods, might help unravel some of the complexities. Nevertheless, evidence from the existing literature is presented below.

Evidence of Good Health in Voluntary Migrants

Many researchers found evidence that migrants are relatively healthy, which supports the healthy migrant hypothesis. According to the healthy migrant hypothesis, people who voluntarily choose to migrate (i.e. they are not fleeing from danger) are typically in better health than either their ethnic counterparts born in Western host countries or their non-migrating peers in their places of origin. Basically, there is selection bias in migration – those who voluntarily migrate tend to have healthy lifestyles and low rates of chronic illness (Franzini & Fernandez-Esquer, 2004; Frisbie et al., 2001; Marmot, Adelstein, & Bulusu, 1984; Messias, 1997; Messias & Rubio, 2004; Singh & Miller, 2004; Uitenbroek & Verhoeff, 2002; Wingate, Swaminathan, & Alexander, in press). Inasmuch as Native Hawaiians in Las Vegas are voluntary migrants, who are not fleeing from widespread danger in Hawaii, the healthy migrant hypothesis might apply to them. Evidence of good health in voluntary migrants is found when examining mortality rates and life expectancy, birth outcomes, and risk of illness.

Mortality rates and life expectancy. Researchers examining mortality rates found evidence that many migrants were healthier than their non-migrating counterparts. Since Marmot and associates' (1984) landmark study comparing the mortality rates of migrants to England and Wales with their non-migrating peers who remained in their countries of origin, most researchers who examined mortality rates and life expectancies found similar evidence of the relative health of migrants. The exceptions were identified when examining disease-specific mortality rates or ethnic variability. See Table 1 for a summary of this research.

When evaluating mortality data supportive of the healthy migrant hypothesis, it is important to consider "the salmon bias effect," which refers to the tendency of foreignborn individuals to return to their place of origin to die (Franzini & Fernandez-Esquer, 2004, p. 1630), and the unhealthy remigration hypothesis, which identifies a tendency for migrants with health or adaptation challenges to return to their places of origin (Razum, Zeeb, Akgun, & Yilmaz, 1998; Uitenbroek & Verhoeff, 2002). To the extent this remigration occurs, it produces artificially low mortality rates among foreign-born residents. To test salmon bias, Abraido-Lanza, Dohrenwend, Ng-Mak, and Turner (1999) examined mortality rates of Cuban and Puerto Rican migrants in the U.S., who are not subject to the salmon bias effect because either it is difficult to return to Cuba or deaths in Puerto Rico are counted in U.S. mortality statistics. They found low mortality rates among Cubans and Puerto Ricans in the U.S. that salmon bias could not explain (Abraido-Lanza et al.).

Authors	Migrant Population	Host Country	Findings
Marmot et al. (1984)	Migrants from Italy, Poland, the Caribbean, and Ireland	England and Wales	 Migrants from Italy, Poland, and the Caribbean, had lowe mortality rates than their counterparts who remained in their country of origin. The mortality rate of Irish male migrants in England and Wales was higher than the mortality rate of Irish males in Ireland. For Irish migrants in England and Wales, "lack of restriction on immigration may make social and health disadvantages a stimulus rather than a barrier to migration" (Marmot et al., 1984, p. 1456).
DesMeules et al. (2004)	Migrants from all regions of the world	Canada	 Compared to the general population of Canada, migrants had lower all-cause mortality rates. Migrants had lower mortality rates than the general Canadian population for specific causes, including cardiovascular disease, respiratory diseases, diabetes, and accidents. Migrant mortality rates for infectious and parasitic diseases were similar to those of the general population.
Muennig & Fahs (2002) Hummer, Rogers, Nam, & LeClere (1999)	Foreign-born residents Foreign-born residents	U.S. (New York City) U.S.	 Foreign-born residents had significantly lower mortality rates than either Puerto Rican-born or U.Sborn residents Foreign-born residents had lower mortality than native-born residents across all age groups.
Razum, Zeeb, & Gerhardus (1998)	Turkish migrants	West Germany	 Migrants had a lower mortality rate from cardiovascular disease than Germans.
Uitenbroek & Verhoeff (2002)	Foreign-born residents	Holland (Amsterdam)	 The life expectancy of migrants exceeded that of Amsterdam residents of Dutch descent. Migrants of Mediterranean descent had an 86 year life expectancy at birth, which surpassed the life expectancy of Amsterdam residents of Dutch descent by 4.3 years for males and 7.0 years for females.
Rubia, Marcos, & Muennig (2002)	Foreign-born residents	U.S.	 All-cause mortality rate of foreign-born people was lowe than that of their U.Sborn counterparts. Foreign-born people had lower mortality rates from chronic disease than U.Sborn people but higher rates from accidents and non-acute infectious disease, such as tuberculosis. Compared to U.Sborn women, foreign-born women had higher mortality rates from heart disease and stroke and lower mortality rates from diabetes mellitus, chronic obstructive pulmonary disease, and neoplastic disease.
Singh & Miller (2004)	Migrants from various countries	U.S.	 Life expectancies of male and female migrants averaged respectively 3.4 and 2.5 years longer than their U.Sborn counterparts. Life expectancies differed between ethnic groups. Black and Hispanic migrants had longer life expectancies than their U.Sborn counterparts, but Chinese, Japanese, and Filipino migrants had shorter life-expectancies than their U.Sborn counterparts.

 Table 1. Mortality Rates and Life Expectancy

Birth outcomes. Other researchers compared birth outcomes of migrants and non-

migrants. Infants born in the U.S. of foreign-born women tend to have better birth

outcomes than infants of U.S.-born women. See Table 2 for a summary of this research.

Authors	Migrant Population	Host Country	Findings
Rumbaut & Weeks (1996)	Foreign-born residents	U.S. (San Diego County)	 "Infant mortality rate was lowest for Southeast Asians (6.6 per 1,000), followed by other Asians (7.0), Hispanics (7.3), non- Hispanic whites (8.0), American Indian (9.6), and African American (16.3)" (p. 343). There was a high proportion of immigrants and low socioeconomic status in groups with the lowest infant mortality rates.
Alexander, Mor, Kogan, Leland, & Kieffer (1996)	Japanese migrants	U.S.	• U.S. infants of foreign-born Japanese women were at less risk of low birth weight than infants of U.Sborn women of Japanese ethnicity.
Howard, Marshall, Kaufman, & Savitz (2006)	Infants born to foreign-born black women	U.S.	• Infants of foreign-born Black women had lower risk of adverse birth outcomes than infants of U.Sborn Black women.
Brown, Chireau, Jallah, & Howard (2007)	Infants of African American, White, and Hispanic women with Medicaid coverage	U.S. (Duke University Medical Center)	 Compared to infants of White women, infants of Hispanic women had significantly lower odds of preterm birth. Compared to infants of African American women, infants of Hispanic women were significantly less likely to be born preterm, be small for gestational age infants, or experience fetal death. The differences in adverse outcomes cannot be explained by poverty or insurance status, as these variables were comparable among the three groups.

Table 2. Birth Outcomes

In addition to evidence that infants of foreign-born women in the U.S. have better birth outcomes than infants of U.S.-born women, there is evidence that interstate migration in the U.S. also has positive effects on birth outcomes. Compared to their nonmigrating counterparts, U.S.-born women of Mexican descent who migrated to another region of the U.S. had reduced risks of having small-for-gestational age infants and low birth weight infants (Wingate & Alexander, 2006). Similarly, infants born to non-Hispanic Black women had more positive birth outcomes if their mothers migrated within the U.S. prior to giving birth than if their mothers did not migrate. Specifically, compared to infants born to non-migrating mothers, infants born to migrating mothers were at less risk of being born prematurely, having low birth weight, or being small for gestational age (Wingate et al., in press). Findings such as these support the healthy migrant hypothesis.

Risk of illness. In a classic 1970 study, Reed, Labarthe, and Stallones (1995) hypothesized that deteriorating health would be found in Chamorros from the Mariana Islands of the Western Pacific who migrated to California compared to their counterparts in Rota, where there was little Western influence, and Guam, where there was some Western influence. As they anticipated, Reed and associates found that the degree of Western influence corresponded with food and language preferences, level of education, occupation, and attitude scores. However, "measures of migration and mobility were not associated with any measure of illness. Similarly, there was no substantial evidence of any relationship between the measures of sociocultural orientation and morbidity indices" (Reed et al., p. 109). Thus, Reed and associates did not find evidence of deteriorating health in Chamorro migrants.

Since this landmark study, other researchers have found evidence that voluntary migrants might be less likely than their ethnic counterparts born in the host country to experience illness. See Table 3 for a summary of this research.

Table 3. Risk of Illness

Authors	Migrant Population	Host Country	Findings
Frisbie et al. (2001)	Asian Pacific Islander migrants	U.S.	 Migrants had significantly less risk for limitations in their daily activities and were significantly less likely to spend a week or more per year in bed because of illness than U.Sborn Asian Pacific Islanders.
Muennig & Fahs (2002)	Foreign-born residents	U.S. (New York City)	 Based on analysis of hospitalization rates in New York City, foreign-born residents were significantly less likely to be hospitalized than U.Sborn residents were. As percentages of foreign-born people in a neighborhood increased, the rate of hospitalization for infectious disease, cancer, mental illness, circulatory conditions, and nervous system conditions decreased. This might suggest a protective effect associated with living in ethnic enclaves or that some migrants choose not to go to hospitals when ill or that they were healthier to begin with.
Sundquist & Winkleby (1999)	Mexican-born migrants	U.S.	 Mexican-born migrants to the U.S. had healthier cardiovascular profiles than U.S born Spanish speaking and U.Sborn English-speaking people of Hispanic ethnicity. U.Sborn Spanish speakers of Hispanic ethnicity had the poorest cardiovascular profiles of the three groups. U.Sborn English-speakers of Hispanic ethnicity had the highest levels of education and medical insurance coverage and the lowest level of poverty of the three groups. These factors likely contributed to the cardiovascular profiles of U.Sborn English speakers of Hispanic ethnicity being healthier than those of U.Sborn Spanish speakers of Hispanic ethnicity.

When examining studies that support the healthy migrant hypothesis, it is difficult

to determine if some migrants are healthier than comparison groups to begin with or if

migration improves their health (Messias, 1997). Further research on migrants' health is

needed to determine if and when the healthy migrant hypothesis applies to specific migrant groups. Some researchers found evidence of poor health in voluntary migrants, suggesting the healthy migrant hypothesis is not universally applicable.

Evidence of Poor Health in Voluntary Migrants

There is also evidence that some people experience poor health after voluntary migration. One explanation for this is the acculturation hypothesis, which is that migrants from cultures with protective health practices experience deteriorating health the longer they remain in Western host countries and adopt the host countries' unhealthy cultural practices (Franzini & Fernandez-Esquer, 2004). It is not known how protective contemporary Native Hawaiian cultural health practices are or if they differ from health practices in Las Vegas. So, it is difficult to know if the acculturation hypothesis applies to Native Hawaiian migrants. An alternative explanation, which might apply to some Native Hawaiian migrants who migrate because of perceived economic necessity, contrasts with the healthy migrant hypothesis and is that some migrants are unsuccessful in their place of origin and migrate out of desperation (Messias, 1997). These migrants are often not in good health and then face the challenges involved in the migration process (Messias & Rubio, 2004), which results in deteriorating health. Indeed, many researchers found migration took a toll on the health of indigenous people who migrated to a variety of locations. Hudson-Rodd (1994) summarized the impact of migration on health by saying, "the ill health of indigenous peoples . . . is directly related to place or more correctly to dispossession from place" (p. 122). Evidence of poor health in voluntary migrants is seen when examining patterns of poor or deteriorating health, coronary heart disease, body mass index (BMI), blood pressure, and depression.

Patterns of deteriorating health. There is also some evidence of deteriorating general health among voluntary migrants. For example, Southern European labor migrants in Sweden were more likely than Swedes to rate their own health as poor (Sundquist, 1995). Sundquist concluded, "being a migrant was a risk factor of equal importance to more traditional risk factors such as lifestyle factors" (p. 128). See Table 4 for a summary of evidence of patterns of deteriorating health in adult migrants.

Authors	Migrant Population	Host Country	Findings
Newbold &Danforth (2003)	Foreign-born residents	Canada	 There was a continuous decline in migrants' self-rated health and other health indicators with increasing length of Canadian residency.
Elliott & Gillie (1998)	South Asian Fijian female migrants	Canada	 Within months after migrating, South Asian Fijian women reported health problems, which they attributed to stress and climate change.
Lee, Rodin, Devins, & Weiss (2001)	Chinese migrants	Canada	 The experience of being a migrant played a key role in the poor health and chronic fatigue of these migrants. Physical symptoms, including headache, joint and muscle pain, and gastrointestinal dysfunction, developed progressively after migration.
Frisbie et al. (2001)	Asian Pacific Islander migrants	U.S.	 Asian Pacific Islander migrants' risks for limitations from illness increased the longer they remained in the U.S., eventually approximating the risks of U.Sborn Asian Pacific Islanders.
Uretsky & Mathiesen (2007)	Foreign-born residents	U.S. (California)	 Foreign-born participants in the California Health Interview Survey assessed their own health more favorably than U.Sborn participants did; however, the odds of being in poor health increased with migrants' length of residence in California.

 Table 4. Patterns of Deteriorating Health

_

This pattern of health deterioration was also seen in children of migrants. Using absences from school, chronic illness, learning disabilities, and use of prescription medications as health indicators, non-citizen migrant Asian children in the U.S. exhibited better health than their counterparts born in the U.S. and non-Hispanic White children, but migrant children who were naturalized citizens did not differ significantly from U.S.born children (Yu, Huang, & Singh, 2004). Migrant children who were naturalized citizens had been in the U.S. longer than non-citizen migrant children, presumably resulting in similar health to U.S.-born children. It is important to note, however, that non-citizen migrant Asian children might have less access to care, which could mean they are less likely to be diagnosed and treated. In addition, there is a strong emphasis on education in Asian cultures, which could result in these children going to school with symptoms that would keep many non-Hispanic White children home (Yu et al.).

Coronary heart disease. One specific condition that has been researched in migrants is coronary heart disease. In a landmark series of studies on coronary heart disease in Japanese men, a prevalence gradient was discovered from Japan to Hawaii to California (Marmot et al., 1975; Nichman et al., 1975; Robertson, Kato, Rhoads, Kagan, & Marmot, 1977; Winkelstein, Kagan, Kato, & Sachs, 1975). Japanese men in Japan had the lowest incidence of coronary heart disease, and those in California had the highest incidence. Japanese men in Hawaii had an incidence rate between those found in Japan and California. This prevalence gradient was also seen in cholesterol and glucose levels (Marmot et al., 1975; Nichman et al.), angina pectoris, and possible myocardial infarction (Marmot et al., 1975). This pattern suggested an association between increasing levels of acculturation to U.S. culture and increasing prevalence of coronary heart disease, which has implications for migrants to the U.S. mainland. Exceptions to this pattern included age-adjusted prevalence of hypertensive heart disease, which was highest in Japan and

lowest in Hawaii (Marmot et al., 1975), and blood pressure (BP) levels, which were highest in California and lowest in Hawaii (Winkelstein et al.).

More recently, ethnic German migrants from the former Soviet Union in Germany had lower all-cause and cardiovascular mortality rates than the general population in Germany. This was unexpected because there is a high cardiovascular mortality rate in the former Soviet Union. Researchers suggested the migrants' low mortality rates might be explained by migrants having either better pre-migration health than the general population in the former Soviet Union or improved socioeconomic status in Germany (Ronellenfitsch, Kyobutungi, Becher, & Razum, 2006).

BMI. Being overweight is a risk factor for several illnesses, and migrants tend to gain weight after residing in the U.S. over time. On average female and male migrants initially have BMIs that are 2 to 5 % lower than U.S.-born residents. However, within 10 years and 15 years respectively, female and male migrants have BMIs that approximate American BMIs (Antecol & Bedard, 2006). In another study, 8% of migrants who had resided in the U.S. less than one year were obese compared to 19% of migrants who had lived in the U.S. for 15 years or longer (Goel, McCarthy, Phillips, & Wee, 2004).

As will be discussed further in an upcoming section on health disparities, Native Hawaiians in Hawaii have a propensity toward obesity (Hawaii State Department of Health, 2005), which might make them different from participants in the studies mentioned above. In addition, Native Hawaiians migrating from Hawaii to Las Vegas are internal migrants to whom the research above may or may not apply.

Blood pressure. Migration has been associated with increases in BP. Nearly ten percent of a sample of migrant Latino women in the U.S. reported having high BP (Marshall et al., 2005). Similarly, after migrating to Westernized areas of New Zealand, both genders of Tokelauans, Pacific Islanders from an atoll where a subsistence lifestyle is the norm, experienced greater BMI increases than their counterparts who remained in Tokelau, and the male migrants had significantly higher systolic and diastolic BP levels than their non-migrant counterparts. To some extent, the increased BP levels were explained by weight gain, but the increased diastolic pressures were largely unexplained (Salmond, Prior, & Wesson, 1989). Interestingly, Tokelauan male migrants of high social status who embraced non-Tokelauan cultural values had significantly higher BP levels than their counterparts who tenaciously retained their Tokelauan cultural values (Salmond et al.). Likewise, Marmot and Syme (1976) found Japanese migrants to the U.S. who retained their traditional lifestyle had lower BP levels than their counterparts who acculturated to Western lifestyle. Thus, the impact of migration on BP might be mitigated by retention of traditional lifestyles.

Depression. Migration experiences can contribute to depression. For example, Brazilian female migrants in Australia expressed feeling depressed, which they attributed to homesickness, loneliness, lack of family support, lack of cohesiveness among Brazilians in Australia, and a sense of not belonging in Australia. Some of them did not trust other Brazilians in Australia and avoided the Brazilian community (da Silva & Dawson, 2004). Similarly, female migrants from the former Soviet Union to the U.S. had high depression scores, which were associated with the demands of migration (Miller & Chandler, 2002). Depression was also experienced by Hindu and Asian Indian migrants
to the U.S. who retained the culturally prescribed male domination and female subordination of their home country (Conrad & Pacquaio, 2005) and who faced extreme pressure to succeed in professional pursuits (Bhattacharya & Schoppelrey, 2004; Conrad & Pacquaio).

Summary of good and poor health in voluntary migrants. As has been shown, the relationship between migration and health is indeed complex, with contradictory findings in the literature. Depending on what study is examined, migration might have a positive or a negative impact on health. Evidence of good health in migrants is seen when examining research on mortality rates and life expectancy, birth outcomes, and risk of illness. Evidence of poor health in migrants is seen when examining research on patterns of deteriorating health, coronary heart disease, BMI, blood pressure, and depression. There is still much to learn about migrant health in general and Native Hawaiian migrant health specifically, especially since Native Hawaiian migrants have not been included in previous research. There are likely many factors that have not been identified; however, researchers have discovered some factors that influence migrant health.

Factors that Influence Migrants' Health

Multiple factors impact the health of voluntary migrants, either positively or negatively. Some of these factors have been briefly discussed in the previous section on migrant health. This section contains further discussion on factors that likely influence migrants' health, including length of residence and acculturation, disease exposure, life style and living conditions, risky behaviors, healthy habits, social support networks, cultural and language barriers, and experiences with racism.

Length of residence and acculturation. In contrast to research demonstrating a positive impact of migration on health, but in line with research demonstrating a detrimental impact of migration on health, some researchers identified a downward spiral in migrant health; however, they suggested the rate of the deleterious impact of migration on health might diminish several years after migration. For example, recent migrants from the former Soviet Union in Israel were more likely to report suboptimal health than migrants who had lived in Israel longer, and researchers concluded that the stress of acculturation largely accounted for this difference (Baron-Epel & Kaplan, 2001). Similarly, in a recent meta-analysis involving migrants worldwide, Steffen and associates (2006) concluded the stress of cultural change following migration does greater damage to BP than the typical dietary and physical activity changes among migrants. They concluded, "immigrants to the United States and Europe from Africa, Asia, Latin America, and Polynesia have consistently shown higher BP with increasing levels of acculturation to western society" (p. 386). However, the effect sizes of acculturation on BP were greatest during the first few years in a new location, and decreasing effect sizes corresponded to the length of time the migrants remained in the new location and to their level of acculturation. After migrants had remained in the host country for 15 years, there was no longer any significant difference between migrants' BP levels and those of ethnic minority groups born in the host country (Steffen et al., 2006). Likewise, foreign-born women in Sweden were at increased risk for long-standing illness compared to nativeborn women, but the risk for long-standing illness did not increase more for foreign-born women than it did for native-born women over an eight year period (Robertson, et al.,

2003). Therefore, it appears the downward spiral of health after migration could level off after a few years.

Disease exposure. Migrants are subject to the diseases of their homeland and of their new location. Pre-migration exposure to disease can impact the quality of life for some time after migration, and different diseases can be prevalent in the new location, potentially increasing the migrants' risk of illness. Some migrants bring diseases prevalent in their places of origin with them to their new locations, potentially putting others at risk and occasionally stigmatizing migrants (Flaskerud & Kim, 1999; Hull, 1979; Messias, 1997; Williams & Hampton, 2005). Thus, for some migrants, disease exposure contributes to diminished health.

Lifestyle and living conditions. Lifestyle and living conditions in migrants' new locations might differ from their places of origin. Weather, sanitation, pollution, housing conditions, and access to nutritious food, recreational facilities, education, and health care might be different from what migrants are accustomed to, and these changes can impact health positively or negatively, depending on the circumstances. Changes in socioeconomic status can also impact health. For example, if an employment promotion led to the migration, socioeconomic status could be enhanced, potentially improving lifestyle. Alternatively, some migrants, especially professionals, find less profitable employment opportunities in their Western host countries than they had in their countries of origin, which decreases their socioeconomic status. In addition, the health-promoting habits of migrants might be enhanced or diminished. For instance, breastfeeding mothers might find continuing this healthy practice either more or less challenging after migration, which can have an impact on the health of infants (da Silva & Dawson, 2004;

Evans, 1987; Gmelch, 1980; Hattar-Pollara & Meleis, 1995). As previously discussed, migrants tend to be healthier if they had healthy lifestyles prior to migration and maintain them after migration (Abraido-Lanza et al., 1999). Therefore, depending on the circumstances, changes in lifestyle and living conditions can have a positive or negative impact on migrant health.

Risky behaviors. Some migrants are less likely than comparison groups to engage in risky behaviors. Compared to U.S.-born Black and White men, foreign-born Black men who migrated from Africa and the West Indies to the U.S. were significantly less likely to use tobacco or drink heavily (Lucas, Barr-Anderson, & Kington, 2003). In addition, Puerto Rican migrants in the U.S. mainland were somewhat less likely to consume alcohol than Puerto Ricans in Puerto Rico (Rios-Bedoya & Gallo, 2003), and Latino migrants were less likely than their U.S.-born peers to smoke (Wilkinson et al., 2005) and less likely than non-Latino Whites to smoke or consume alcohol (Abraido-Lanza, Chao, & Florez, 2005). However, risky behaviors may increase with length of U.S. residence (Wilkinson et al.; Abriado-Lanza et al., 2005). Although researchers used different comparison groups, either ethnic counterparts in the U.S. mainland or ethnic counterparts in the migrants' place of origin, researchers suggest that new migrants are not as likely as the comparison groups to engage in consumption of alcohol or smoking.

Healthy habits. Some migrants might adopt healthy habits the longer they remain in the U.S. For example, increased acculturation was associated with the likelihood of recent exercise among Latino migrants in the U.S. (Abriado-Lanza et al., 2005). Additionally, Asian Indian migrants who had lived in the U.S. more than 20 years were more physically active, took more responsibility for their own health, and managed stress better than Asian Indian migrants who had been in the U.S. less than 20 years. This might be explained by increased use of preventative measures with advancing age or the prevalence of health education in the media (Misra, Patel, Davies, & Russo, 2000). Thus, migrants who adopt healthy habits might experience associated health benefits.

Native Hawaiian migrants might be less inclined to exercise outdoors during the Las Vegas summer heat than they were in Hawaii. On the other hand, if their economic circumstances improve and they work fewer hours, they should have more leisure time and might use it to exercise.

Social support networks. Migration can significantly impact migrants' social support network. Migrants often feel lonely in their new locations, a situation that is heightened when illness strikes (da Silva & Dawson, 2004) or when a life transition, such as giving birth, occurs (Callister & Birkhead, 2007). For some migrants, this downside of migration can be softened substantially if they settle in an area with an established community of people from the migrants' cultural background. Such ethnic enclaves can provide much of the social support found in places of origin and can have a positive impact on well-being (Callister & Birkhead; Flaskerud & Kim, 1999; Hattar-Pollara & Meleis, 1995; Hull, 1979; Messias, 2002). Inasmuch as the Native Hawaiian population in Nevada is growing rapidly (U.S. Census Bureau, 1990; U.S. Census Bureau, 2001a), it is possible that Native Hawaiians in Las Vegas are aware of each other and provide support to one another.

Cultural and language barriers. Cultural and language barriers might contribute to the poor health status of some migrants. For instance, health care providers' lack of awareness of migrants' strengths and challenges and their cultural health beliefs and

practices can be a barrier to health care. There are examples of this in the literature. In a recent study in Canada with migrant women from 13 countries, participants defined health more holistically than providers did, and participants felt providers were unaware and disrespectful of these differences. This translated into communication problems and dissatisfaction with care (Weerasinghe & Mitchell, 2007). In another study, female Brazilian migrants in Australia expressed feeling more vulnerable when they became physically ill in Australia than they had in Brazil. An increased sense of isolation accompanied their illness, and they lacked trust in Australian health care providers. These women pointed to lack of a holistic care, insensitivity, language barriers, inability to purchase medications frequently used in Brazil, and short-duration appointments as reasons for their distrust of Australian health care providers (da Silva & Dawson, 2004). Similarly, Marshallese migrants in Arkansas reported feeling alienated and frightened by health care providers' explanations of the detrimental effects of non-adherence to their plan of care. According to Marshallese cultural beliefs, open acknowledgment of illness results in negative consequences, so they avoid discussions about illness. Sometimes health care providers view Marshallese quietness as consent to treatment, but often it is a negative response (Williams & Hampton, 2005).

Cultural stigmas associated with certain illnesses can be another barrier to health care. For example, the stigma of mental illness led some Asian Indian migrants to hide mental illness in order to protect their children's marriage arrangements (Conrad & Pacquaio, 2005). In Asian Indian culture, illness might be seen as punishment for actions in past lives. Consequently, revealing symptoms of mental illness, even when a family member's well-being is threatened, can be considered unethical. Admitting a need for mental health care is regarded as humiliating, especially in the context of mental health care in the U.S., which might involve group therapy. Therefore, many Asian Indians with mental illness waited until a crisis to seek care or returned to India for treatment (Bhattacharya & Schoppelrey, 2004; Conrad & Pacquaio).

Cultural differences between health care providers and internal migrants can also have an impact on access to health care and self-reported health. Rhoades, Manson, Noonan, and Buchwald (2005) examined this issue with American Indians and Alaska Native (AI/AN) participants. AI/ANs typically migrate from reservations to cities to obtain education and/or employment and return to reservations to maintain family relations, reconnect with their native cultural identities, and access traditional health services (Rhoades et al.). In fact, "more than half the AI/ANs in our nation [the U.S.] live in towns and cities but, because their needs are generally unrecognized and scant data have been gathered about their health, urban AI/ANs have been called the invisible minority" (Rhoades et al., p. 470). This situation likely contributes to the life expectancy of AI/ANs being almost five years less than their non-native counterparts (Rhoades et al.).

Additionally, nearly half of their AI/AN urban-dwelling participants had a history of circular migration, defined as "regular travel between reservations and urban settings" (Rhoades et al., p. 465). Compared to participants without circular migration histories, participants with circular migration histories were more likely to be enrolled tribal members, identify more strongly with their native culture(s), report dissatisfaction with Western health care, and access traditional AI/AN medical services if available (Rhoades et al.). Despite these associations, Rhoades et al. did not find many significant associations between circular migration and self-reported health. Lung, thyroid, and nonpsychotic mental health problems were the only self-reported health conditions significantly related to circular migration, and the direction of the relationships was not consistent. Participants with lung problems were more likely to participate in circular migration, but participants with thyroid or non-psychotic mental health problems were less likely to participate in circular migration (Rhoades et al.). Thus, they did not find a particularly strong link between circular migration and self-reported health, but AI/ANs who strongly identify with their native cultures are more likely to be dissatisfied with Western health care, which might delay their access to health care.

In addition, many Mexican elders living along the U.S.-Mexico border speak limited English and have trouble comprehending it. Frequently health care providers do not speak Spanish, are unaware that these patients do not understand them, and lack understanding of cultural nuances. Such language and cultural barriers contribute to misunderstandings (Guo & Phillips, 2006). For instance, being polite and showing respect are important cultural values for many Mexicans. Thus, Mexican elders might verbally agree with health care providers to demonstrate respect but not comply with the prescribed treatment. Instead they travel to Mexico to seek care from Western health care providers or traditional healers who spend time talking with them, a valued aspect of care they find lacking in the U.S. (Guo & Phillips).

It is possible that Native Hawaiians in Las Vegas could experience cultural and language barriers to health care. Some might rely on their Hawaiian cultural health practices to promote health and prevent illness, and health care providers in Las Vegas might not be familiar with these practices. This could have an impact on health care interactions. In addition, some Native Hawaiians are more comfortable communicating in Pidgin vernacular, which is a combination of English and Hawaiian languages with some words from the languages of the early migrants to Hawaii (Leong, 1997). Native Hawaiian migrants might feel uncomfortable with extended conversations in English or use some Pidgin words or phrases during health care interactions that are unfamiliar to health care providers in Las Vegas. To the extent this happens, it could make some Native Hawaiian migrants hesitant to access health care in Las Vegas.

Experiences with racism. For visible minorities, migration often includes experiences with racism, which are frequently associated with ill effects on health. Native Hawaiians are a visible minority and might have different experiences with racism in Las Vegas than they had in Hawaii. Regarding the complicated relationship between migrant health and the way migrants are treated, Robertson et al. (2003) stated, "the pathways by which migration contributes to health outcomes are complex and involve many mechanisms that may be of a biological, social and cultural nature. Moreover, the complexity also includes the attitudes towards migrants and the reception of migrants" (Robertson et al., 2003, p. 103). One example that illustrates this complex relationship is Iranian migrant women in Sweden who identified experiences with racial discrimination as the "greatest threat to their health" (Sharareh et al., 2007, p. 349).

Researchers have identified an association between racism and depression. For Hispanic-American migrants, perceived racism was significantly associated with increased sleep disturbance and increased symptoms of depression (Steffen & Bowden, 2006). Additionally, sleep disturbance mediated the relationship between depressive symptoms and perceived racism, and there was a significant positive correlation between length of time in the U.S. and sleep disturbance. However, the relationships between time in the U.S. and perceived racism and between time in the U.S. and depressive symptoms were not significant (Steffen & Bowden). By comparison, Finch, Kolody, and Vega (2000) discovered an association between high levels of discrimination and high levels of depression in Mexican-American migrants. Their participants were more likely to report discrimination as they acculturated to the U.S. and learned English. Finch et al. hypothesized that Spanish-speaking migrants are likely more isolated and less aware of cultural nuances until they learn English and begin to understand "the language of individual-level discrimination" (p. 309). As key factors in discrimination experiences, migration status, racism, and perceived racism should be included in health disparity studies (Lauderdale, Wen, Jacobs, & Kandela, 2006).

Summary of the Impact of Migration on Health

The relationship between migration and health is extremely complex and convoluted. Even limiting the review of the literature to voluntary migrants in Western countries did not simplify the issue enough to provide definitive answers about this important relationship. While some researchers found that migration has a beneficial impact on migrants' health, others determined migration has a detrimental impact on migrants' health. Possible explanations for the contradictory findings include differences between migrant groups, methods used, and outcomes of interest.

Voluntary migrants in Western countries come from all over the globe. While they share the important similarity of being strangers in new locations, they have many differences that make comparison problematic. Migrants bring with them their strengths, challenges, health histories, cultural beliefs and practices, and definitions of health. Each of these variables might impact how migrants adjust to their new location, maintain and promote their health and well-being, and seek or avoid health care. In addition, they migrate to a variety of locations, each with its own challenges and opportunities. Therefore, it is unlikely that any single description of the relationship between migration and health will apply to all migrant groups, and it is difficult to know which, if any, of the reviewed findings apply to Native Hawaiian migrants in Las Vegas.

In addition, few researchers have used qualitative inquiry to examine various aspects of migration and health. Many researchers have used quantitative methods to examine specific health outcomes in migrants, such as blood pressure changes, mortality rates, or risk of illness. Although the information gained from such research is valuable, the quantitative approach limits researchers' ability to deeply and broadly explore the relationship between migration and health. This has left gaps in the literature about many factors that researchers are unable to identify a priori. Therefore, using qualitative methods to listen to the voices of Native Hawaiian migrants describe how they perceive their own health and well-being and the impact of migration experiences on their health and well-being would help identify some of these factors and enhance the depth and breadth of understanding of migrants' health. Before this can be done, however, it is important to learn how perceptions of health moderate health and well-being by reviewing the body of literature on this topic.

The Relationship between Health Perceptions, Health, and Well-Being

The relationship between migration and health is so complex that qualitatively examining it from a different angle, migrants' perceptions of their own health and wellbeing, should provide a more holistic understanding. Therefore, an overview of the research on another intricately interwoven relationship, the relationship between health perceptions, health, and well-being, will provide contextual understanding of the topic and the necessary background to develop the interview guide for this research. The overview will include the factors that influence perceptions of health that are most salient to this research and the relationships between perceptions of health and mortality, health outcomes, and health-seeking behaviors. As a reminder, this section is not limited to research involving participants who are voluntary migrants.

As background information, it is important to note that distinctions between health and well-being are difficult to delineate. While some people consider health to be a state of well-being, others view health and well-being as different but related concepts. For example, South Asian Fijian women who migrated to Canada conceptualized health as spiritual, emotional, and physical well-being (Elliott & Gillie, 1998). In contrast, Ethiopian refugees in the United Kingdom (U.K.) viewed health and well-being as separate but reciprocal concepts. For them, well-being depended on fulfillment of dreams, a bright future, happiness, and lack of worry (Papadopoulos et al., 2003). Because of this overlap, both health and well-being will be explored with participants in this dissertation.

Factors that Influence Health Perceptions

Forming a perception of one's own health is a multifaceted process. Numerous factors influence health perceptions, and a great deal of research has been done in this area. For example, many researchers found interesting relationships between health perceptions and a variety of demographic variables, including race (Coward et al., 1997; Pourat, 2000), gender (Benyamini, Leventhal, & Leventhal, 2000; Brouwer & van Exel,

2005; King, Thomlinson, Sanguins, & LeBlanc, 2006), and age (Pourat; Rakowski & Cryan, 1990). Each of these variables is worthy of independent research; however, review of the literature on them is beyond the scope of this dissertation. Instead, the focus of this section is on factors that influence health perceptions that were determined to be most pertinent to this research, including definitions of health, objective health measures, cultural norms, physical functioning, health competence, the presence or absence of healthy habits, and sense of place.

Definitions of health. The culture in which people were raised and live influences how they define health, and their definitions provide a framework for self-assessment of health (Pourat, 2000). Across many cultures "the human body is more than just a physical organism fluctuating between health and illness. It is also the focus of a set of beliefs about its social and psychological significance, its structure and function" (Helman, 2000, p. 12). Therefore, the culture in which people were raised influences how they define health, perceive their health and well-being, and interpret physical, social, and psychological changes (Conrad & Pacquaio, 2005; Flaskerud & Kim, 1999; Helman).

Cross-cultural migrants frequently bring their cultural definitions of health with them when they migrate (Flaskerud & Kim, 1999), and many migrants' definitions of health differ from the definition familiar in Westernized countries. Many Europeans and Euro-Americans adhere to the World Health Organization (1948)'s definition of health as "a state of complete physical, mental and social well-being and not merely the absence of disease or infirmity" (p. 1). However, many cross-cultural migrants have a more holistic view. In addition to physical, mental, and social aspects, they add spiritual, environmental, and cultural components to their definitions of health (Conrad & Pacquaio, 2005; Elliott & Gillie, 1998; Papadopoulos, Lay, Lees, & Gebrehiwot, 2003). For instance, some migrants consider happiness to be both a contributor to and evidence of health (Elliott & Gillie; Papadopoulos et al.). Furthermore, migrants from collectivistic cultures tend to consider health as more than a concept about an individual; instead, vital components of health also include the health of family members, maintenance of harmonious relationships with others, and the ability to provide for the material needs of one's family (Elliott & Gillie; Papadopoulos et al.).

Native Hawaiian definition of health. No literature on Native Hawaiian migrants' health definitions was located, so it is not known if they define health differently than Native Hawaiians in Hawaii. Blaisdell (1993) stated that many Native Hawaiians in Hawaii defined health holistically, with health including:

the ability to grow, develop and function by adapting to, while interacting with, a changing natural and societal environment. This adapting no longer means relinquishing their traditions in favor of the dominant Western society. On the contrary, for Kānaka Maoli [Native Hawaiians] it means rediscovering their heritage and thus restoring a confident self-identity as a people. (p. 149)

Perceiving health as far more than the absence of disease, this definition encompasses growth, adaptation, confidence, and integration of cultural traditions. Whether Native Hawaiians on the U.S. mainland define health like some of their counterparts in Hawaii, their definitions of health will still likely impact how they perceive their own health and well-being.

In this dissertation, participants were not asked how they defined health, but they were asked about changes in health since migrating to Las Vegas and what they do to stay healthy. They were not directed to discuss physical symptoms, but were free to discuss any aspect of health that they chose.

Objective health measures. Objective health measures by themselves do not fully account for people's perceptions of their health (Burroughs, Desikan, Waterman, Gilin, & McGill, 2004). For instance, more than half of Kosovar and Albanian political asylum seekers in Finland indicated they had serious health problems, but their attending physicians often did not share this view (Koehn, 2006). Additionally, there was an insignificant association between objective health parameters, such as pulmonary and coronary function tests, and the health perceptions of participants with chronic obstructive pulmonary disease or congestive heart failure (Arnold, Ranchor, Koeter, de Jongste, & Sanderman, 2006). Such situations may not be unusual because, in some research, objective health status does not explain more than 40% of the variance in people's perceptions of their own health (Benyamini, Idler et al. 2000).

When there is incongruence between self-reported health and objective health measures, it is often because people judge themselves to be healthy despite illness or disease (Benyamini, Idler et al., 2000; Chipperfield, 1993). In one study, over half of the participants rated their own health more favorably than their health appeared to be by objective measures, but self-rated health and objective health measures were congruent in 39% of the cases. Extreme overestimations were rare (6%), and extreme underestimations were even more rare (1%; Chipperfield). By comparison, self-rated health and objective health measures were congruent for 33% of the participants in Mossey and Shapiro's (1982) study. However, nearly 15% of these participants rated their health as fair or poor despite objective health measures that suggested favorable health, and 20% rated their health as good or excellent despite objective health measures that suggested fair or poor health (Mossey & Shapiro).

As will be discussed further in an upcoming section on health disparities, the Office of Hawaiian Affairs (2002) found that many Native Hawaiians, who responded to a survey in Hawaii, rated their own health favorably despite a high prevalence of various chronic illnesses among Native Hawaiians (Hawaii State Department of Health, 2005). This suggests that, like participants in the studies above, some Native Hawaiians in Hawaii might have objective health measures indicative of poor health yet rate their own health favorably. This may or may not be the case with Native Hawaiian migrants in Las Vegas. Although objective health measures were not a part of this study, Native Hawaiian participants in Las Vegas were asked how they perceived their own health and well-being and any changes therein.

Physical functioning. When people rate their own health, they might be influenced less by objective health measures than by illness-imposed limitations on physical functioning (Arnold et al., 2006), which many people judge based on what they can and cannot do (Benyamini, Idler et al., 2000). In fact, higher levels of physical impairment were associated with less favorable health perceptions in people over the age of 55 years (Rakowski & Cryan, 1990), and self-reported physical functioning was significantly related to the general health perceptions of participants with congestive heart failure or chronic obstructive pulmonary disease (Arnold et al.).

The relationship between physical functioning and health perceptions was also demonstrated in studies involving young adults in England. "Self-rated health and limiting illness were strongly associated at both ages 23 and 33 and for both sexes" (Manor, Matthews, & Power, 2001, p. 601). Among members of the U.K. armed forces, there was a strong negative relationship between self-perceived health and number of symptoms experienced and post-traumatic stress syndrome scores (Rona, Hooper, French, Jones, & Wessely, 2006). In summary, the strong association between self-rated health and limiting illness suggests the underlying burden of disease is reflected in selfrated health (Manor et al.).

In this study, participants were not directly asked about limitations in physical functioning. However, they were asked about lifestyle changes, including recreation and exercise, since migrating to Las Vegas.

Health competence. Perceived health competence, the degree to which a person feels capable of controlling health outcomes, was significantly associated with general health perceptions (Arnold et al., 2006). The healthier participants perceived themselves to be, the more in control they felt. Additionally, when reassessed four years later, participants who initially perceived their health as good were more likely to use effective strategies when dealing with health challenges than participants who had initially perceived their health to be poor (Menec, Chipperfield, & Perry, 1999). Therefore, people who perceived their health to be good felt capable of managing their health and dealing with health challenges.

Health competence was examined in this study by asking participants what they do to stay healthy; what, if any, cultural health practices they have continued in Las Vegas; and where and when they receive health care. Answers to these questions helped determine how comfortable participants were with maintaining their health.

Healthy habits. The presence or absence of healthy habits in people's lives can influence their perceptions of health. Lower perceptions of health were related to fatigue, functional limitations, less exercise, and low levels of physical activity (Benyamini, Leventhal, & Leventhal, 1999). On the other hand, positive indicators of health, such as exercise, social support, activity, and mood, were more strongly associated with selfperceptions of health than negative indicators, such as functional abilities, negative moods, and medication use (Benyamini, Idler et al., 2000). Likewise, Brouwer and van Exel (2005) discovered healthy habits influenced their participants' estimates of their own life expectancies. Participants who assessed their own behaviors as healthier than the behaviors of others expected to live longer than participants who assessed their own behaviors as less healthy than the behaviors of others. In contrast, participants who smoked expected to live 2.8 years less than non-smoking participants did (Brouwer & van Exel). Finally, rural dwellers believed their environment and the type of work they did "contributed to their well-being" and made them less susceptible to coronary artery disease (King et al., 2006, p. 1099).

As previously mentioned, participants in this study were asked what they do to stay healthy and about their use of cultural health practices. To learn more about healthy habits participants might want to integrate into their daily lives, they were asked what cultural health practices might be helpful to Native Hawaiians living in Las Vegas.

Sense of place. Some researchers suggest having a sense of place is beneficial to health. Place is "a piece of the whole environment that has been claimed by feelings" (Shamai, 1991, p. 347), and those feelings are often referred to as a sense of place. Additionally, sense of place incorporates an "at-homeness involving a sense of

insidedness" – understanding the everyday norms, values, and individual role expectations associated with life in a particular community (Cuba & Hummon, 1993, p. 549). For indigenous people, sense of place has been associated with feelings of security, identity, personal priorities, self-esteem, cultural pride, spiritual well-being, and overall health and well-being (Gallager, 1993; Hudson-Rodd, 1994; Kanahele, 1986; Lal, 2004; Oneha, 2000, 2001; Thomashow, 1995).

There is limited research on Native Hawaiians' sense of place and well-being. In the only published research specifically focused on this topic, Oneha (2000; 2001) discovered Native Hawaiians residing in Waianae, Hawaii had a strong sense of place, which contributed to their sense of health and well-being. It is not known if sense of place is an important concept of among Native Hawaiians in Nevada and, if so, to which place(s) they feel this connection. However, establishing a sense of place in Las Vegas could have health benefits for Native Hawaiians in Las Vegas. In discussing ways to ease the transitions associated with migration, Hull (1979) suggested, "participation in community networks and the security and support achieved through a sense of belonging is likely to help the incongruities of status and other social reasons for psychological stress that may predispose to illness" (p. 29).

Participants in this study were asked several questions related to sense of place. For example, they were asked what helped them adjust to life in Las Vegas; what had been the best and worst parts of the move; and where home is now. Answers to these questions provided insight into their sense of connection to Hawaii and Las Vegas.

Thus, when perceiving their own health, people consciously or subconsciously evaluate many factors. While many of these factors have been discussed, there are likely others that are unknown. Regardless of whether these factors influence perceptions of health or vice versa, people's perceptions of their own health have been associated with mortality, health outcomes, and health-seeking behaviors.

Association between Perceptions of Health and Mortality

Perceptions of health are consistently associated with mortality risk in recent literature. Before Mossey and Shapiro's (1982) seminal study, self-rated health was considered an indicator of overall well-being and a questionable substitute for objective health measures. Then Mossey and Shapiro discovered a remarkable link between selfrated health and mortality by finding that participants who perceived their own health as poor were nearly three times as likely to die within 7 years as participants who perceived their health to be excellent. Specifically, compared to people who rated their health as excellent, people with poor self-rated health had 2.92 times the mortality risk within 3 years and 2.77 times the mortality risk from 4 to 7 years (Mossey & Shapiro). This mortality risk was unchanged after controlling for objective health status, age, gender, income, urban or rural residence, and life satisfaction. In addition, self-reported health more accurately predicted who would die than objective health measures obtained from physicians. Age was the only variable more predictive of mortality than self-rated health (Mossey & Shapiro).

Since Mossey and Shapiro's (1982) study, other researchers have found similar mortality risks associated with self-rated poor health. Lavretsky and associates (2002) found both self-rated poor mental health and self-rated poor physical health were predictive of mortality. Menec and associates (1999) discovered their participants who rated their own health as poor or bad were 3.4 times more likely to die within 3 to 3¹/₂ years than participants who rated their health as excellent. Similarly, institutionalized

Chinese elders who rated their own health as poor had six times the mortality risk of institutionalized Chinese elders who rated their own health as good (Leung, Tang, & Lue, 1997).

Specifically examining additional variables, such as the presence of a disability or poor physical functioning, has increased understanding of the relationship between selfrated health and mortality. Consistent with previously mentioned studies, Benyamini and associates (1999) discovered their participants who rated their health as poor or fair had a 3.2 times higher 5-year mortality risk compared to participants who rated their health as very good or excellent. Participants' subjective accounts of physical functioning accounted for most of the relationship between self-rated health and mortality, and those who had difficulty performing activities of daily living or faced chronic fatigue rated their health unfavorably and had a higher risk of 5-year mortality (Benyamini et al., 1999). Likewise, van den Brink and associates (2005) found self-rated poor health predictive of mortality, but participants with disabilities had twice the risk of mortality as participants without disabilities. Participants with severe disabilities who also rated their health poorly had the highest risk of mortality (van den Brink et al.).

Incongruence between self-rated health and objective health measures can affect mortality risk. By categorizing elderly participants as well, ill, or typical (neither well nor ill) based on reported health problems and asking participants to rate their own health, Chipperfield (1993) found that overrating and underrating sometimes changed mortality risk. Compared to counterparts with congruent health ratings, well participants who underrated their health had a heightened risk of mortality, and typical and ill participants who overrated their health had an increased chance of survival. However, typical participants who underrated their health were no more likely to die than their counterparts with congruent health ratings (Chipperfield).

The relationship between self-rated health and mortality is complicated, but researchers agree they are related. As Menec and associates (1999) stated:

That health perceptions are a strong predictor of mortality has now been repeatedly demonstrated. . . . However, 15 years after Mossey and Shapiro's

(1982) seminal study on this topic, we are still no closer to understanding what

mechanisms account for this relation. (p. P92)

Nearly a decade later this statement remains applicable. There is much to learn about the relationship between self-rated health and mortality.

Association between Perceptions of Health and Health Outcomes

While the relationship between perceptions of health and mortality has been replicated in several studies, the relationship between perceptions of health and other health outcomes is less clear. Some researchers have found indications of a relationship between perceptions of health and health outcomes (Benyamini, Idler et al., 2000; Brown & Rawlinson, 1975; Garrity, 1973a, 1973b; Kirpalani et al., 2000; Manor et al., 2001), but others have found little or no indications of such a relationship (De Jong, Moser, & Chung, 2005; Menec et al., 1999).

Some researchers found that positive perceptions of health impacted health outcomes for the better. For example, the degree of parental hope influenced differences in health-related quality of life in children with spina bifida. Physicians predicted healthrelated quality of life for these children based on physical limitations identified during neonatal neurophysical exams, but these objective findings were not as predictive of health-related quality of life in these children as the degree of parental hope (Kirpalani et al., 2000). Parental hope and positive perceptions of health are different concepts, but they share the important similarity of anticipating good health outcomes. Likewise, self-rated health was predictive of returning to work and morale for participants who had experienced their first myocardial infarction (Garrity, 1973a, 1973b), and among participants recovering from open heart surgery, there was a positive association between self-rated health and the tendency to renounce their sick roles (Brown & Rawlinson, 1975).

Other researchers suggest self-rated health is associated with morbidity. Manor and associates (2001) found participants who rated their own health as poor at 23 years of age were likely to have poor health at 33 years of age. Correspondingly, self-rated poor health predicted new morbidity, decreased functional ability, health care utilization, and hospitalization in another study (Benyamini, Idler et al., 2000).

Little or no relationship between health perceptions and health outcomes was identified by some researchers. In one study, baseline health perceptions were related to health perceptions 4 years later, but they were not predictive of morbidity (Menec et al., 1999). In addition, health perceptions accounted for only 5% of the variance in healthrelated quality of life in another study (De Jong et al., 2005).

The Influence of Health Perceptions on Health-Seeking Behaviors

Researchers have reached varying conclusions about the influence of health perceptions on health-seeking behaviors. Rakowski and Cryan (1990) found higher health care utilization among people who rated their health as poor than among people who rated their health as excellent. Similarly, the better participants perceived their health to be, the less likely they were to have physician visits, regardless of actual health or need (Pourat, 2000). In contrast, people with low expectations for quality of life and elderly people from cultures that do not expect good health in old age tended to use less health care when they perceived their own health to be poor (Brouwer & van Exel, 2005; Pourat). Likewise, women who defined health as an absence of disease performed breast self-exam less frequently than women with more holistic definitions of health (Gasalberti, 2002). Finally, among the U.K. armed forces, there was no association between self-rated health and willingness to visit a medical doctor (Rona et al., 2006). Whether or not perceptions of health impact health-seeking behaviors appears highly context specific. In other words, equivalent perceptions of health influence one person to seek care and another to avoid health care providers.

Contradictory Findings

Self-perceptions of health are determined from multiple factors and appear to impact health. In general, perceptions of excellent health tend to be the norm, and perceptions of poor health might indicate a health risk (Benyamini et al., 2003). There is a preponderance of evidence that self-rated poor health is associated with mortality risk. The evidence is less conclusive regarding the association between mortality risk and selfrated good health or underestimating and overestimating self-rated health compared to objective health measures. Research on the impact of perceptions of health on health outcomes is also less decisive than the research on self-rated poor health and mortality risk. Some researchers suggest positive self-rated health has beneficial impact on health outcomes, and negative self-rated health is predictive of future poor health. The impact of health perceptions on health-seeking behaviors is inconclusive, but context appears to be an important component. Overall, there is variability in the relationship between perceptions of health and objective health, but this might be because of the highly complex nature of the relationship. It is likely that perceptions of health play a role in the health of migrants.

Native Hawaiian Migration to the Mainland

Each of the preceding bodies of literature has immense worth but might not be obviously applicable to Native Hawaiian migrants to the mainland. Given that Native Hawaiians are English-speaking U.S. citizens, their migration experiences are likely to be somewhat different from the experiences of non-English-speaking migrants to the U.S. These differences are important to keep in mind. However, Native Hawaiian migrants share important similarities with many cross-cultural migrants, including separation from extended family and homeland; overseas migration; climate change; the potential stress associated with lifestyle, dietary, and culture change; possible differences in health definitions compared to mainstream U.S.; and experiences with racism and discrimination that visible minorities might encounter after migration to the U.S. mainland.

As background for this study, it is important to review what is known about Native Hawaiian migrants to the U.S. mainland. For many decades, political events and economic pressures have influenced Native Hawaiian migration to the mainland. Shortly after colonization of Hawaii began, many young Native Hawaiian males responded to economic pressures by accepting employment on whaling ships (Halualani, 2003). When the ships docked along the west coast of the U.S., some remained on the mainland, intermarried with American Indians, became fur traders, or sought their fortunes in California's gold rush. In fact, enough Native Hawaiian men participated in California's gold rush that they were able to create their own Kānaka [Hawaiian] Village (Halualani).

When World War II began, it became even more difficult for Native Hawaiians to find employment at home because much of the land was designated for U.S. military purposes, leaving less land for plantations and employment thereon. In fact, "Hawaiian men joined the U.S. military in numbers that were 'double the national average'" (Halualani, 2003, p. 2). Many of the Native Hawaiian troops were stationed in the southern and northwestern regions of the mainland. Those who eventually returned to Hawaii often had difficulty finding employment and securing a Hawaiian homestead; some decided migration to the mainland was in their best economic interests. Similarly, many Native Hawaiian women married mainlanders, perhaps in search of economic relief (Halualani).

More recently, some believe Native Hawaiian migration to the mainland is influenced by the rapidly rising cost of living and the declining socioeconomic status of Native Hawaiians in Hawaii (Association of Asian Pacific Community Health Organizations, n.d.; Halualani, 2003). In lieu of returning to Hawaii, many Native Hawaiian migrants choose to settle on the mainland and raise their families. "Since the 1950's, 'off-island' Hawaiians have produced three generations of mainland Hawaiian youth and a distinctive Hawaiian culture in the continental U.S." (Halualani, p. 4).

Native Hawaiian Migration to Nevada

As discussed in Chapter One, a regular migration destination for Native Hawaiians in recent years has been Las Vegas, Nevada. Nevada offers Native Hawaiians a number of possible incentives for migration, including modest economic advantages and an established Native Hawaiian enclave.

Economic Considerations for Migration

Economic comparisons reveal modest advantages for migrating from Hawaii to Nevada. For instance, Nevada has no state income tax, a fact that might entice some Native Hawaiian migrants to choose Nevada as their new home (Reeder, 1999). Comparisons of unemployment rates, cost of living, home prices, and rental housing costs between Hawaii and Nevada follow.

Unemployment rates. No obvious advantage for migrating from Hawaii to Nevada can be seen by comparing the two states' total unemployment rates. Between 1995 and 2000, when six times as many people migrated from Hawaii to Nevada as made the opposite migration (Perry, 2003), the U.S. Department of Labor (2006) reported comparable and generally declining unemployment rates in Hawaii and Nevada: Hawaii's unemployment rate was 5.5% in 1995 and 4.0% in 2000 compared to Nevada's unemployment rate of 5.6% in 1995 and 4.5% in 2000. The U.S. Census Bureau reported somewhat different unemployment figures, revealing Hawaii's civilian unemployment rate as 3.5% in 1990 and 6.3% in 2000, while Nevada's civilian unemployment rate remained unchanged at 6.2% in 1990 and 2000 (Clark & Weismantle, 2003). Comparison of more recent unemployment data suggests a disadvantage in migrating from Hawaii to Nevada. In 2005 Hawaii had the lowest unemployment rate (2.8%) in the U.S., and Nevada's unemployment rate was somewhat higher (4.1%; U.S. Department of Labor, 2006). Evaluating civilian unemployment rates specifically for Native Hawaiians and other Pacific Islanders reveals a slight advantage for this group to migrate from Hawaii to Nevada. The civilian unemployment rate in 2000 for Native Hawaiian and other Pacific Islanders in Hawaii (11.59%) exceeded Hawaii's total civilian unemployment rate (6.3%; Yu & Choe, 2003) and Nevada's civilian unemployment rate for Native Hawaiian and other Pacific Islanders (5.3%; U.S. Census Bureau, 2006d). The difference in civilian unemployment rates for Native Hawaiian and other Pacific Islanders between Hawaii and Nevada may reflect that people who are healthy enough to migrate are also healthy enough to be employed or that employment is easier for them to find in Nevada. More recent data specific to Native Hawaiians are not available.

Cost of living. Cost of living is often an important consideration for migrants. Pearce and Brooks (2003) used the Self-Sufficiency Standard to rank Honolulu and ten other relatively expensive cities in the U.S. (Atlanta, Denver, Las Vegas, New York, Miami, Phoenix, Salt Lake City, San Diego, San Francisco, and Seattle) from most (1) to least (11) expensive cost of living. Honolulu was not the most expensive of the eleven cities but consistently ranked near the top in all four categories of family types (single adult; single adult, preschooler; single adult, preschooler, school-age; and two adults, preschooler, school-age). Honolulu ranked second, third, third, and fifth in the respective categories. By comparison, Las Vegas ranked ninth in the single adult category and eleventh (the least expensive) in the final three categories (Pearce & Brooks). Thus, according to this analysis, it would be easier, though perhaps not easy, for families to make financial ends meet in Nevada than in Hawaii. *Current residential real estate prices*. The cost of housing in Hawaii is high and rising, despite Hawaii having the second largest negative net migration rate in the U.S. (Franklin, 2003). Negative net migration is usually associated with declining home prices, but that has not been the case in Hawaii. In fact, Honolulu recently ranked as the fourth most overpriced city in the U.S. with median home prices of \$625,000 for the first quarter of 2006, an increase of 18% over the same period in 2005 (Forbes.com, 2006). Climbing real estate prices might be from increasing numbers of people from the mainland U.S. and Asia who purchase vacation homes in Hawaii (Roy Horner, personal communication, July 2005). Absentee homeowners contribute to escalating housing costs, with 40% of all homes currently sold in the U.S. being purchased by Americans buying a second home as an investment or as a vacation home (Knox, 2006).

The Las Vegas real estate market is also considered overpriced. One national analyst estimated the average home price in Las Vegas at \$296,500, which was determined to be 28% higher than economically warranted. A second group of analysts placed the median home price in Las Vegas at \$282, 600, which they determined to be 41.8% higher than economically warranted (Associated Press, 2006).

Current rental housing costs. Hawaii had the most expensive rental housing in the U.S. in 2005 (Ohlemacher, 2005). To be considered affordable, rental costs should not exceed 30% of the renter's income (National Low Income Housing Coalition, 2005a). The fair market rent (FMR) for a two-bedroom apartment in Hawaii was \$1,159 per month. In order to reasonably afford this FMR, an individual working a 40-hour work week needed to earn \$22.30 per hour. However, a minimum-wage-worker in Hawaii earned only \$6.25 per hour. Without exceeding 30% of income on housing, there had to

be 3.6 minimum-wage- earners in a household, each working 40 hours per week, or one minimum-wage-earner working 143 hours per week to afford this FMR (National Low Income Housing Coalition, 2005a). The average wage for a renter in Hawaii was estimated at \$11.04 per hour. In order to afford the FMR for a two-bedroom apartment, a renter with this average wage had to work 81 hours per week, or there had to be two average-wage-earners per household, each working 40-hour weeks (National Low Income Housing Coalition, 2005a).

The 2005 FMR for a two-bedroom apartment in Nevada was \$852. In order to reasonably afford this FMR, an individual working a 40-hour workweek needed to earn \$16.38 per hour. However, a minimum-wage-worker in Nevada earned only \$5.15 per hour. Without exceeding 30% of income on housing, there had to be 3.2 minimum-wage-earners in a household, each working 40 hours per week, or one minimum-wage-earner working 127 hours per week to afford this FMR (National Low Income Housing Coalition, 2005b). The average wage for a renter in Nevada was estimated at \$12.12 per hour. In order to afford FMR for a two-bedroom apartment, a renter with an average wage had to work 54 hours a week, or there had to be 1.4 average-wage-earners per household, each working 40-hour weeks (National Low Income Housing Coalition, 2005b).

To summarize the economic considerations for migration, the differences in unemployment rates are minimal and likely play a marginal role in informed migration decisions. While Nevada's cost of living, home prices, and rental housing costs are high, they are not quite as prohibitive as these indicators in Hawaii. These differences might figure into the migration decisions of some Native Hawaiians.

Las Vegas, an Established Hawaiian Enclave

Las Vegas is so popular among people from Hawaii that it is nicknamed "the ninth Hawaiian island" (Reeder, 1999, p. 1). The Nevada Commission on Tourism markets heavily in Hawaii (Nevada Commission on Tourism, 2003), and Las Vegas is the most frequent travel destination for Hawaii's residents (Lynch, 2000). Some Native Hawaiians initially come to Nevada to vacation and, after a few visits, decide to migrate (Reeder).

An ethnic enclave of Native Hawaiians in Las Vegas has developed as newly arrived Native Hawaiian migrants join friends and family who migrated before them. Evidence of an established Hawaiian community in Las Vegas includes the Las Vegas Hawaiian Civic Club (Las Vegas Hawaiian Civic Club, 2006) and Aloha Park, honoring the Hawaiians of Las Vegas (Reeder, 1999). Additionally, there are stores and restaurants that cater largely to Native Hawaiians, including the Kamaaina Gift Shop, where an estimated 98% of customers are Native Hawaiian (Reeder); six ABC stores, Hawaiian convenience stores (ABC stores, 2004); and six L&L Hawaiian Barbeques, Hawaiian fast-food restaurants (L&L Franchise, 2004). These establishments are popular gathering spots for Native Hawaiians in the Las Vegas area. Furthermore, music plays a significant role in Hawaiian culture, and Las Vegas has a radio station, KLAV 1230-AM, that regularly features Hawaiian music (Reeder). With all these reminders of Hawaii, it is possible that Las Vegas is seen as a cultural haven where Native Hawaiians can escape the disparities they face in Hawaii.

Disparities in Hawaii

Describing Native Hawaiians in Hawaii, Blaisdell (1993) said, "Kānaka maoli [Native Hawaiians] are triply disadvantaged. They tend to have less education, have difficulty translating their education into higher level occupations, and then are discriminated against in attaining higher incomes at given occupational levels" (p. 125). Thus, as might be expected, contemporary Native Hawaiians in Hawaii experience health, educational, and economic disparities compared to other residents.

Health Disparities in Hawaii

The uninsured. In 1974, Hawaii enacted the Prepaid Health care Act to ensure the majority of employees would have health insurance, and Hawaii once claimed a 2% uninsured rate (Associated Press, 2003). Currently, Hawaii has one of the lowest uninsured rates in the U.S., with only 9.6% of Hawaii's total population being uninsured. However, a disproportionate share (14.5%) of Hawaii's uninsured identify themselves as Native Hawaiians and other Pacific Islanders (Hawai'i Uninsured Project, 2006).

Substance abuse. Abuse of addictive substances is prevalent among Native Hawaiians in Hawaii. The use of tobacco, alcohol, and illegal substances is substantial and increasing among Native Hawaiian adolescents, and with few exceptions, use of such substances is higher among Native Hawaiian adolescents than the rest of Hawaii's adolescents (Office of Hawaiian Affairs, 2002). It is possible that some Native Hawaiian parents view migration to the mainland as a means of protecting their children from substance abuse.

Health status. The health status of Native Hawaiians is among the poorest in Hawaii (Palafox, Buenconsejo-lum, Riklon, & Waitzfelder, 2002). For example,

Hawaii's total prevalence of being overweight or obese was 49.5% in 2004 with Native Hawaiians having the highest prevalence (67.2%) among included ethnic groups (Hawaii State Department of Health, 2005). Additionally, Native Hawaiians 45 years of age and older have consistently higher prevalence rates of diabetes and hypertension than comparable age groups of other ethnicities in Hawaii, with the highest prevalence rates occurring between ages 65 and 74 at approximately 25% and 60% respectively (Hawaii State Department of Health). In Hawaii, diabetes afflicts Native Hawaiians at more than double the rate for Whites, and Native Hawaiians are 5.7 times more likely to die from diabetes than are Whites (Hirokawa et al., 2004; U.S. Department of Health and Human Services Office of Minority Health, n.d.). Furthermore, Native Hawaiians have a consistently higher prevalence of asthma than other ethnic groups in Hawaii, again peaking between ages 65 and 74 at approximately 15% prevalence (Hawaii State Department of Health). In the face of these physical health disparities, it is interesting to note that over half of Native Hawaiians in Hawaii perceive their own health as either excellent (28.3%) or very good (30.5%; Office of Hawaiian Affairs, 2002).

Life expectancy. Disparities in life expectancies between various ethnic groups in Hawaii are also apparent. Despite the increase in life expectancy for Native Hawaiians in Hawaii from 32.58 years in 1910 to 74.01 in 1980 (Luomala, 1989), comparing life expectancies of ethnic groups in Hawaii again reveals disparity. Comparisons of data for ethnic groups living in Hawaii show that Japanese and Chinese people have the longest life expectancy, but Native Hawaiians have the shortest life expectancy of any ethnic group in Hawaii – five years lower than the average life expectancy in Hawaii (Busch, Easa, Grandinetti, Mor, & Harrigan, 2003).

Educational Disparities in Hawaii

Educational disparities also compromise Native Hawaiians in Hawaii. It is noteworthy that 21% of Native Hawaiian high school students in Hawaii, compared to 12% of their non-Hawaiian counterparts, have been retained in a grade and did not graduate within four years. However, overall high school graduation rates for Native Hawaiians in Hawaii are only slightly below the number of Native Hawaiians enrolled in high school (Cooke, 2001). According to Census 2000 results, the proportion of Native Hawaiians (25 years of age and older) who have earned a high school diploma or higher (85%) equals that of Hawaii's total population (85%; U.S. Census Bureau, 2001a). However, the proportion of Native Hawaiians (25 years of age or older) who have a bachelor's degree or higher (12.6%) is considerably lower than that proportion of Hawaii's total population (26.2%; U.S. Census Bureau, 2001a). Between July 1999 and June 2000, nearly half (46.9%) of the 843 Native Hawaiian graduates from University of Hawaii campuses received certificates of achievement (17%) or associate degrees (29.9%). During that same period, approximately one-third (35.1%) of the 6,395 non-Hawaiian graduates received certificates of achievement (4.5%) or associate degrees (30.6%; Office of Hawaiian Affairs, 2002). Thus, more Native Hawaiian students stopped short of a more advanced degree than their counterparts did.

Economic Disparities in Hawaii

As a group, Native Hawaiians in Hawaii are economically disadvantaged. In fact, the Native Hawaiian population is in the lowest socioeconomic category in Hawaii (Association of Asian Pacific Community Health Organizations, n.d.). Native Hawaiians account for approximately 28% of the welfare recipients in Hawaii (Office of Hawaiian Affairs, 2002) but less than 9% of the state's population (U.S. Census Bureau, 2006b). Over one-third (36%) of Native Hawaiian (alone or in any combination) adults were below Hawaii's poverty level in 2000, compared to 20.6% of Hawaii's total adult population and 15% of Hawaii's White adult population (U.S. Census Bureau, 2001a). Likewise, the median family income for Native Hawaiians (\$49,282 in 1999 dollars) was less than the median family income for Hawaii's total population (\$56,961 in 1999 dollars; Cooke, 2001; U.S. Census Bureau, 2001a). These comparisons suggest Native Hawaiians are economically disadvantaged and likely struggle more to secure basic human needs than other residents of Hawaii do.

The impact of the Hawaiian Homes Commission Act. The Hawaiian Homes Commission Act, enacted by Congress in 1921, made 200,000 acres of homesteads available to Native Hawaiians with 50% or greater Hawaiian ancestry (Library of Congress, 1997). Unfortunately, this act has done little to ameliorate the housing needs of Native Hawaiians. Only 22,539 people, or less than 2% of Hawaii's total population, resided on Hawaiian homesteads in 2000, and only 14% of people who identified themselves as only Native Hawaiian resided on Hawaiian homesteads (U.S. Census Bureau, 2001b). More than 14,000 eligible Native Hawaiian applicants are on a waiting list for a Hawaiian homestead; many have been waiting for more than 40 years. Others have died without receiving a Hawaiian homestead (Baker, 1997; Halualani, 2003).

The guidelines of the Hawaiian Homes Commission Act do not allow selfidentification of ethnicity but require proof of 50% blood quantum, or percentage of Hawaiian ancestry, and this stringent requirement might contribute to homelessness among Native Hawaiians in Hawaii. In addition, Cooke (2001) estimated more than 60% of Native Hawaiians in Hawaii had less than 50% blood quantum, which would disqualify a sizeable portion of the Native Hawaiian population from becoming homestead recipients. Meanwhile, an estimated 29.8% of Hawaii's homeless population was Native Hawaiian between July 2000 and June 2001 (Office of Hawaiian Affairs, 2002).

The issues of poverty, homelessness, and the inadequacies of the Hawaiian Homes Commission Act provide important contextual understanding of Native Hawaiian migration from Hawaii to places with more affordable housing. In fact, Halualani (2003) identified barriers to acquiring a Hawaiian homestead as driving forces in the migration of Native Hawaiians from Hawaii because the lack of affordable housing in Hawaii encourages exploring housing options in other locations.

Several possible reasons for Native Hawaiian migration from Hawaii to Nevada have been presented, including modest economic incentives, an established Native Hawaiian enclave in Las Vegas, and disparities in Hawaii. However, it is not known if Native Hawaiians choose to migrate in order to improve their economic status, to join family members, to escape disparities in Hawaii, or for some other reason(s). Whatever the rationale, examination of evidence reveals many Native Hawaiians are choosing to migrate to the mainland and specifically to Nevada. As discussed in Chapter One, 40% of Native Hawaiians in the U.S. reside on the mainland (U.S. Census Bureau, 2001b), and Nevada has the fastest growing population of Native Hawaiians in the U.S. (Association of Asian Pacific Community Health Organizations, n.d.).

Like all people, Native Hawaiians deserve culturally competent health care whether they are in Hawaii or elsewhere. Understanding the impact of migration on their
perceptions of health and well-being is essential to being able to provide culturally competent care. Inasmuch as Native Hawaiian migrants are largely absent from health care literature an important first step is to understand the impact of migration on their health and well-being.

Summary

Migration is rapidly changing the demographic face of the U.S. Migrants come in all races, ethnicities, ages, genders, socioeconomic classes, and health statuses. They bring many of their strengths and challenges with them, and nurses have a responsibility to recognize migrants' strengths and help them overcome their health challenges. In fact, "the development of interventions to improve health status depends on knowledge of predictors of health status" (De Jong et al., 2005, p. 155). Researchers have found migration can have positive or negative impacts on health, but "the existing research does not do justice to the wide diversity of immigrants currently living in the United States and their varying immigration contexts" (Messias & Rubio, 2004, p. 127).

In addition, people's perceptions of their health appear to moderate their health and well-being. While the research is somewhat inconclusive, perceptions of poor health appear to influence health negatively, and perceptions of good health appear to influence health positively. Definitions of health provide a framework for people to assess their own health, and culture plays an important role in the formation of these definitions. Cross-cultural migrants to the mainland U.S. bring their own definitions of health with them, and these definitions likely influence how migrants perceive their own health. Therefore, migration experiences and health perceptions weave a complex tapestry of migrant health. The Asian and Pacific Islander population is a poorly understood minority whose health care challenges are ineffectually acknowledged and addressed (Frisbie et al., 2001). Native Hawaiians are a subgroup of the Asian and Pacific Islander population who face significant health, educational, and economic disparities in Hawaii. Whether Native Hawaiians migrate from Hawaii because of these disparities or for other reasons is not known, but many Native Hawaiians are migrating to Las Vegas.

Finally, Native Hawaiian migrants are a virtually invisible minority in the research literature, and it is unknown how migration impacts their perceptions of health and well-being. In order to provide culturally competent care to Native Hawaiians in Las Vegas and elsewhere on the mainland, it is essential to understand how migration impacts their perceptions of health and well-being. With this understanding, nurses can more effectively collaborate with Native Hawaiians and build on their cultural strengths in health promotion efforts and in enhancing their health care experiences.

Chapter Three

Research Design and Methods

The purpose of this qualitative descriptive study was to explore the following research question: How do Native Hawaiian adults who have migrated directly from Hawaii to Las Vegas, Nevada describe the impact of migration on their health and wellbeing? The variables affecting Native Hawaiians' perceptions of health were not known a priori. Thus, a qualitative descriptive design fit the nature of this complex research question and provided straightforward answers "unencumbered by pre-existing theoretical or philosophical commitments" (Sandelowski, 2000, p. 337). Through simultaneous data collection and analysis, the researcher identified patterns across the data, synthesized findings, and generated concepts and themes (Morse & Field, 1995; Morse & Richards, 2003; Sandelowski) that yielded rich insights into Native Hawaiians' perceptions of health and well-being and constancy or change in these perceptions following migration.

Context

Las Vegas, Nevada was selected as the site for this research because Nevada has the fastest growing Native Hawaiian population in the U.S., based on growth rates between 1990 and 2000 (Association of Asian Pacific Community Health Organizations, n.d.). Nevada's Native Hawaiian population skyrocketed from 1,534 (Native Hawaiian alone) in 1990 to 8,264 (Native Hawaiian alone or in any combination with any other racial group) in 2000 (U.S. Census Bureau, 2001a), for a growth rate in excess of 400%. By comparison, Nevada was the fastest growing state in the U.S. during the same time period, with its total population increasing 66.3%, and Las Vegas, Nevada-Arizona was the fastest growing metropolitan area in the U.S., with its population increasing 83.3% (Perry & Mackun, 2001). Thus, the growth rate of the Native Hawaiian population outpaced the overall growth rate in the fastest growing state and metropolitan area, suggesting there is a sizeable pool of Native Hawaiian migrants in Las Vegas who might be willing to participate.

The Native Hawaiian population in Nevada is clustered mostly in and around Las Vegas. In 2000, only 2 of the 17 counties in Nevada had more than 100 Native Hawaiians (alone or in combination with any other racial group; hereafter Native Hawaiians): Clark County with 7,096 and Washoe County with 756 (U.S. Census Bureau, 2001a). Three of the cities in Clark County had Native Hawaiian populations greater than 100 and were home to 55% of the Native Hawaiians in the county: Las Vegas with 2,396, Henderson with 957, and North Las Vegas with 530 (U.S. Census Bureau, 2001a). This is comparable to the distribution of the total population of Clark County, with nearly half of the total population living outside the five city boundaries in unincorporated, urban areas (Clark County Nevada, n.d.; U.S. Census Bureau, 2001a). See Table 5 for demographic information about the Native Hawaiian population in Clark County Nevada.

The boundaries between Las Vegas and the rest of Clark County are not obvious to the casual observer. The southern municipal boundary of Las Vegas is Sahara Avenue, which places most of the Las Vegas Strip, the University of Nevada Las Vegas, the airport, and the convention center outside the Las Vegas city boundaries (Clark County Nevada, n.d.). Many residents say they live in Las Vegas, but they actually live in Clark County (Wikipedia, 2006). For the purposes of this study, "Las Vegas" will refer to the area in and around Las Vegas, including urban unincorporated areas of Clark County.

Characteristic		Ν	%
Gender			
Female		3529	49.7
Male		3567	50.3
Age			
<18 years		2345	33
18 - 25 years		1070	15.1
>25-65 years		3330	46.9
>65 years		351	4.9
Educational attainment (for popu	lation 25 years & over)		
High school graduate or	higher	3211	87.23
Bachelor's degree or higher		389	10.6
Number in work force (16 years & over)		3207	

Table 5. Native Hawaiian Demographics in Clark County, Nevada

Total Native Hawaiian (alone or in combination with any other racial group) population (N = 7,096)

(U.S. Census Bureau, 2001a)

This study is situated within the context of the Las Vegas community. Participants were recruited by placing fliers at Hawaiian restaurants and businesses throughout Las Vegas and snowball sampling. Interviews occurred at locations selected by participants, including their homes, restaurants, and offices.

Participants

Selection of participants was purposive and criterion-based, meaning participants were chosen because they had specific characteristics important for this study (Denzin & Lincoln, 2005; Morse & Richards, 2002). To be included, recruits had to 1) be adults (18

years of age or older) with the apparent ability to respond to questions appropriately, 2) identify themselves as Native Hawaiian, according to the definition below, 3) have lived in Hawaii prior to migrating to the Las Vegas area, and 4) consent to be a participant.

These criteria were based on the following rationale. The interview questions required thoughtful reflection about migration, health, and well-being, and adults are developmentally capable of this and able to consent to participation. It was important that participants be Native Hawaiian because that was the ethnic population of interest. Finally, they had to have previously lived in Hawaii, because the purpose was to describe the impact of migration from Hawaii to Las Vegas.

Definition of Native Hawaiian

Defining and properly using the terms connected to the indigenous people of Hawaii is complicated and often controversial. The early indigenous people of Hawaii called themselves *Kānaka maoli*, and the colonizers coined the terms *Hawaiians* and *Native Hawaiians* (Blaisdell, 1999). While *kānaka maoli* is often used in literature regarding the sovereignty movement, *Hawaiian*, *Part-Hawaiian*, *native Hawaiian* (with a lowercase *n*), and *Native Hawaiian* (with an uppercase *N*) are the terms associated with the indigenous people of Hawaii in most healthcare literature and by state and national government agencies.

Being a descendent of the original inhabitants of the Hawaiian Islands is a key element shared in current definitions. The U.S. Congress concisely defined a Native Hawaiian as "any individual who is a descendent of the aboriginal people who, prior to 1778, occupied and exercised sovereignty in the area that now constitutes the State of Hawaii" (Hawaii Nation, 1993, p. 5). Furthermore, according to the mandate requiring inclusion of the Native Hawaiian and Other Pacific Islander category in census and federal data collection, simply being born in Hawaii does not qualify an individual as a "native Hawaiian" or a "Native Hawaiian" (Cooke, 2001). For the purposes of this study, Native Hawaiian was defined as any individual who self-identifies as *kānaka maoli*, Hawaiian, Part-Hawaiian, native Hawaiian, or Native Hawaiian and claims any amount of Hawaiian ancestry predating the arrival of James Cook in 1778.

Description of the Sample

When designing the study, it was estimated that 30 to 60 participants would be needed to reach saturation. Numerous factors were considered to reach this estimate, such as the study design and anticipating "the quality of the data, the scope of the study, the nature of the topic, the amount of useful information obtained from each participant, the number of interviews per participant, the use of shadowed data" (Morse, 2000, p. 3). Interviewing each participant once and the complex nature of the topic suggested this number of participants would be needed. However, many participants were reflective and articulate and provided rich data, and saturation was reached with fewer participants than anticipated.

Thirty-one Native Hawaiians contacted the researcher to learn more about the study after seeing a recruitment flier or hearing about it from someone. Four did not participate because they either did not come to their interview appointment or did not meet the inclusion criteria. In the end, 27 Native Hawaiians living in Las Vegas participated in the study.

Efforts were made to ensure diversity in the sample that reflected the adult Native Hawaiian population of Clark County. When participants with specific demographic characteristics were lacking, the researcher asked participants and other Native Hawaiians in Las Vegas to refer people with the demographic characteristics needed to build a representative sample. The population of interest is divided evenly by gender, and approximately 70% of the adults are between 25 and 65 years of age. Roughly 77% of adults over 25 years of age had graduated from high school but had not received a bachelor's degree (U.S. Census Bureau, 2001a). See Table 5 for more detail.

The sample was quite reflective of the population. Participants ranged in age from 23 to 62 years (M = 40 years). There was a slight male gender bias with 11 female (40.75%) and 16 male (59.25%) participants. Marital status in the sample included 18 married participants (66.6%) and 9 single participants (33.3.6%). Participants claimed between 10 and 75 percent Hawaiian blood quantum (M = 42.5%), and they migrated to Las Vegas between 4 months and 39 years ago (M = 7.45 years). See Table 6 for more detail.

Socio-economic status was assessed indirectly by requesting participants' highest level of education. The sample was slightly more educated that the population of interest with 74% being high school graduates who had not received a bachelor's degree. Specifically, 3 participants had graduate degrees; 4 graduated from college; 4 graduated from technical school; 11 attended some college or technical school; and 5 graduated from high school. In addition, 22 participants (81.5%) were employed, and 20 of them had at least one full-time job.

Table 6. Participant Demographics

Participant Demographics (N = 27)

Age Range	23-62 years (M = 40)	
Characteristic	Ν	%
Gender		
Female	11	40.7
Male	16	59.3
Marital Status		
Married	18	66.6
Single	9	33.3
Years since migration		
0.33-5 years	14	51.9
>5-10 years	9	33.3
>10-15 years	2	7.4
>15-25 years	1	3.7
>25-40 years	1	3.7
Educational attainment		
Graduated from high school	5	18.5
Some college or technical school	10	37.0
Graduated from technical school	4	14.8
Graduated from college	5	18.5
Graduate degree	3	11.1
Employment status		
Unemployed	5	18.5
Employed	22	81.5

Method and Design

Semi-Structured Interviews

Intensive, semi-structured interviews conducted and audio-taped in natural settings and guided by interpretive constructionist philosophy were well suited to this study. Rather than asking participants to respond to a predetermined set of choices with assumed uniform meaning, as would occur in a quantitative descriptive study (Rubin & Rubin, 2005), a rich understanding developed as participants reflected on and shared their insights about the impact of migration on their health and well-being. A facilitative interview environment was created by explaining that there were no right or wrong answers and asking participants to share their feelings and impressions in ways and words that were comfortable for them. Being careful not to assume meaning was understood or shared, the researcher listened attentively with minimal interruptions and asked follow-up probes to clarify meaning or develop information further (Morse & Richards, 2002; Weiss, 1994).

A qualitative descriptive design allowed the flexibility to adjust the interview guide as understanding of the phenomenon grew from ongoing data analysis (Polit & Beck, 2006). The interview guide (see Appendix A) was based on a thorough review of the migration and health literature, but the impact of migration on the health and wellbeing of Native Hawaiian adults in Las Vegas had not been explored previously. Therefore, the components of the phenomenon that drove this study forward were not known a priori. This circumstance made the use of an emergent qualitative descriptive design essential (Polit & Beck). The researcher was the research instrument in simultaneous data collection and analysis (Rubin & Rubin, 2005). Through ongoing analysis of interviews and fieldnotes, aided by NVivo7 (a software program for qualitative data organization and analysis), the researcher determined which components of the phenomenon needed more in-depth exploration and adjusted remaining interviews accordingly (Polit & Beck, 2006; Rubin & Rubin). Additionally, ongoing analysis allowed the researcher to determine when major themes and categories became saturated (Polit & Beck).

Saturation was reached when the data became repetitive in the major themes and categories, and no new questions emerged. In other words, when the interviews ceased to produce new information and questions, it was assumed that understanding of the phenomenon was rich and thick (Morse & Field, 1995; Morse & Richards, 2002). As much as possible, saturation was assured by purposefully sampling individuals who offered viewpoints that conflicted with emerging themes and categories (Morse & Richards; Polit & Beck, 2006). This "disconfirming evidence" challenged the researcher to thoroughly examine the range of the phenomenon and strengthened the comprehensive description that resulted (Polit & Beck, p. 334).

Demographic Data

Participants were asked to provide key demographic data by completing a brief questionnaire (see Appendix B). These data guided purposive and criterion-based sampling and were used to describe the sample.

Fieldnotes

Fieldnotes (see Appendix C) are records of observable data noted during interviews and other encounters, such as cultural events (Morse & Richards, 2002; Polit

& Beck, 2006). Observable data included perceptions of the interview, including the community and interview settings; observations about participants dress, demeanor, and nonverbal communication; and observations of cultural experiences. To minimize loss of data, these records were completed shortly after each interview.

Reflexive Journal

A reflexive journal was maintained throughout data collection and analysis. Because the researcher is the instrument in qualitative research (Polit & Beck, 2006), it was important to note any biases and feelings that could have influenced the research process and findings and how the researcher attempted to minimize such bias.

Procedure

Recruitment Procedure

Carefully planned recruitment was essential to the successful completion of this study. Recruitment fliers, containing a brief description of the study and contact information for the researcher (see Appendix D), were developed and then approved by two Institutional Review Boards (IRB). With the guidance of a Native Hawaiian research assistant who lived in Las Vegas for a few years, restaurants and businesses frequented by Native Hawaiians were identified. Next the researcher and research assistant personally visited these restaurants and businesses to seek managements' permission to place recruitment fliers. In total, 16 business and restaurant managers were contacted, and 12 allowed recruitment fliers to be placed in store windows or next to the cash registers.

In the recruitment flier, anyone interested was asked to call or email the researcher for more information about the study. Only one recruit emailed, and the rest phoned the researcher. During the initial contacts, the researcher used easily understood language and told recruits, "I teach nursing at Brigham Young University and take students to Hawaii each summer to work in clinics and small hospitals. I am also a student at Oregon Health and Science University. I am in Las Vegas to interview Native Hawaiians who have recently moved here about their health and well-being. An interview will take about an hour to an hour and a half. It will be tape-recorded and transcribed. The tapes, computer discs, and papers will be securely carried and stored in a locked file cabinet. I might call you after the interview to make sure I understand what you told me. I hope this study will help health-care providers understand the needs of Native Hawaiians and help improve Native Hawaiians' health and well-being. If you are interviewed, I will give you a \$25 Wal-Mart gift certificate." Recruits who showed interest were screened to determine if they met the inclusion criteria. Appointments were scheduled at times and locations convenient for those who met the inclusion criteria. Participants chose their homes (18), restaurants (6), or their offices (3) for interview locations.

Consent Procedure

Informed consent was obtained before the interview began. The researcher reminded participants of the purpose of the study by saying, "I want to learn how moving from Hawaii to Nevada has impacted your health and well-being and the health and wellbeing of your family and friends. I hope this study will help health-care providers better understand the needs of Native Hawaiians and help Native Hawaiians improve their health and well-being." Participants were reminded that an interview would last an hour to an hour and a half and that they might be contacted after their interview if the researcher had questions about what they told her. Participants were also reminded of the measures to protect confidentiality and the option to withdraw at anytime without penalty. After having any questions answered, participants were asked to read and sign a consent form (see Appendix E; National Institutes of Health Office of Human Subjects Research, 2000).

Data Collection Procedure

The researcher conducted one in-depth, audio-taped interview with each participant, lasting 1 to 2 hours. The researcher was respectful of participants' time by keeping the interview on topic and covering the interview guide in a timely manner, and most interviews did not exceed the hour and a half maximum estimated length. However, two interviews lasted 2 hours. On these occasions, participants were asked if they wanted to continue beyond an hour and a half, and they expressed a desire to continue.

Each interview followed the same pattern. Before initiating each interview, efforts were made to minimize background noises, such as cell phones, televisions, and radios that would conflict with thoughtful reflection and obscure audio recording. Then according to Hawaiian protocol, the interview began by asking where (in Hawaii) the participant was from. Requesting this information at the beginning of the interview helped establish rapport by demonstrating respect and honor for Hawaiian protocol and matters of widespread importance to Native Hawaiians: their home and their family (Meyer, 1998). Next the researcher asked open-ended questions regarding the impact of migration on the health and well-being of the participant and other Native Hawaiian migrants, access to health-care, and changes in cultural health practices. For more details see the interview guide in Appendix A.

Follow-up probes were asked when participants introduced new or contradictory ideas, if their statements seemed overly simplified, or if clarification was needed. For

instance, asking for examples to illustrate a participant's point or for clarification of terms helped build understanding (Rubin & Rubin, 2005).

Finally, participants were asked to complete a brief demographic questionnaire (see Appendix B) after the interview. Participants took 5 minutes or less to complete the questionnaire.

Follow-Up Procedure

Concepts, categories, and themes were identified as transcribed interviews were read and reread. As concepts and themes began to emerge, areas needing increased focus in future interviews were identified, thereby filling in the gaps and saturating the data.

Follow-up conversations with a few participants occurred by phone or in person for clarifications and member checks. Member checking involved soliciting participants' responses to data interpretations and findings (Polit & Beck, 2006) and was considered an important technique for establishing credibility (Denzin & Lincoln, 2005).

Protection of Human Participants

Institutional Review Board Approvals

Every effort has been made to protect the rights of participants in this low-risk, non-interventional study. A research proposal was submitted to and approved by the Oregon Health and Science University Research Integrity Office IRB. Then it was submitted to and approved by Brigham Young University's IRB.

Informed Consent

Informed consent (see Appendix E) was obtained from all participants. The consent form was written "in language understandable to someone who has not completed high school" (National Institutes of Health Office of Human Subjects

Research, headed section j) and included the three essential elements identified in the *Belmont Report*:

- Information provided about the research was adequate and balanced, including the purpose and title of the study, inclusion criteria, anticipated time commitment, and a balanced description of the risks and benefits.
- Information was presented in a way that was easy for participants to comprehend.
- Information was presented without coercion, and participants freely chose to provide consent and participate (Department of Health and Human Services Office of Inspector General, 2002; Polit & Beck, 2006).

It was noted in the consent form that interviews would be audio-recorded and that anonymous quotes from participants would be used in presentations and publications (Morse & Richards, 2002). Anticipated time commitments associated with participation in this study, including the hour to an hour and a half interview length and the possibility of a follow-up call for member checks, were stated in the consent form. Additionally, informed consent was an ongoing, dynamic process (National Institutes of Health Office of Human Subjects Research, 2000), allowing participants to withdraw at any time (Polit & Beck, 2006). As noted previously, interviews ranged from 1 to 2 hours. No one chose to withdraw from the study.

Maintaining Confidentiality

The confidentiality of the data was carefully guarded. To protect confidentiality, each participant was assigned a code name, and all identifying information was removed from the data during transcription. The code names provide brief demographic information about each participant as they include gender (F or M), age in decades (20s, 30s, 40s, 50s, or 60s), and participant number (1-27). The resulting code name formulation is gender-age in decade-participant number. The tapes and transcripts were securely stored in the researcher's office in a locked filing cabinet. Only the researcher, research assistants, and dissertation committee had access to the raw data.

Reasonable Compensation

Participant burden was considered in determining reasonable compensation for participants' time and effort. Participation was free of coercion. This means there were neither threats for failing to participate nor excessive rewards, such as generous monetary incentives, for agreeing to participate (National Institutes of Health Office of Human Subjects Research, 2000; Polit & Beck, 2006). It was determined that a \$25 Wal-Mart gift certificate was reasonable compensation for participation in this study, and each participant received one.

Data Analysis

Data analysis in a qualitative descriptive study "is a process of fitting data together, of making the invisible obvious, of linking and attributing consequences to antecedents. It is a process of conjecture and verification, of correction and modification, of suggestion and defense" (Morse & Field, 1995, p. 126). The purpose is "to organize, provide structure to, and elicit meaning from the data" (Polit & Beck, 2006, p. 397). *Interviews*

Analysis of the interviews began by repeated listening to audio-recordings of the interviews, transcribing them, and reading and rereading transcripts. Audio-recordings were needed to hear how people really express themselves, including pauses, incomplete

sentences, and inflections (Riessman, 1993). The researcher transcribed the tapes verbatim as quickly as possible following each interview, usually within 1 week. Careful transcription helped the researcher pay close attention to participant responses and to how interview questions were asked and received (Morse & Richards, 2002; Rubin & Rubin, 2005). Reading and rereading the transcripts enhanced understanding of participants' meanings. This process helped refine future interviews and led to insights that shaped analysis (Mishler, 1991; Riessman; Rubin & Rubin).

Coding and categorizing were the next steps and were aided by use of NVivo7. Coding and categorizing involved analyzing data and developing abstract labels for the various categories. "The processes of making a category involve discovering a new idea and naming it, holding it in mind, and linking it in the growing understanding of your work" (Morse & Richards, 2002, p. 133). Beyond mere labeling, coding made resilient and traceable links from a piece of data to an abstract idea and from an abstract idea to all data segments pertaining to it and then to the whole document and phenomenon (Morse & Richards). Data was initially coded according to topic by identifying related segments, labeling them, and pasting all related segments together in a separate document under that label (Morse & Richards). Next, analytic coding was used to build categories and involved "coding around the topic to establish its significance and meaning" (Morse & Richards, p. 120). Finally, coding for themes occurred as the researcher contemplated overlying ideas that ran through the data without being confined to specific segments (Morse & Richards).

Demographic Data

Demographic data was organized using Excel. Descriptive statistics of the sample were compared to community demographics to estimate the representativeness of the sample.

Fieldnotes

Fieldnotes provided important contextual information about participants' nonverbal behaviors and appearance, the setting, trends in the data, and questions raised from interviews. This contextual information was interwoven in the data analysis and enhanced understanding.

Reflective Journal

The reflective journal contained notations about personal characteristics, feelings, and biases that could influence the research process. Reflective journaling made these subjective assessments and the researcher's efforts to manage them somewhat transparent.

Methodological Rigor

Audit Trail and Theoretical Memos

Relying on "research principles and common sense," the researcher kept an audit trail and wrote theoretical memos during data collection and analysis (Morse & Richards, 2002, p. 177). An audit trail is a systematic collection of activities and decisions with the purpose of illustrating "as clearly as possible the evidence and thought processes that led to the conclusions" (Streubert Speziale & Carpenter, 2003, p. 38). Writing theoretical memos helped the researcher analyze the data and record emerging themes and ideas. Raw data, including interview transcripts and fieldnotes, and process notes, such as notes about member checks, are also part of the audit trail (Polit & Beck, 2006).

Verification, Validation, and Validity

Meadows and Morse (2001) identified verification, validation, and validity as the components of rigor. A description of the specific strategies and techniques associated with these components follows.

Verification. Strategies for verification are techniques "internal to inquiry" that contributed to the outcome of this valid study (Meadows & Morse, 2001, p. 189). First of all, this study was firmly grounded on a thorough review of the literature, which established the need for the study and familiarized the researcher with prior research in the area of interest. Information from the literature review provided a "comparative template" for emerging data, but was bracketed and not used as a conceptual framework for the study (Meadows & Morse, p. 192). In addition, the study design allowed the researcher to move fluidly between recruitment, sampling, data collection, and analysis, providing the flexibility integral to naturalistic inquiry. This fluid design was essential because "the most significant feature that makes qualitative research a systematic and rigorous process is the iterative data collection and data analysis" (Meadows & Morse, p. 198). Finally, data collection continued until saturation was reached in all major categories, allowing for rich description (Meadows & Morse).

Validation. Validation was a continuous process accomplished using techniques to ensure the study remains sound while in progress. For instance, during member checks participants scrutinized interpretive summaries, clarified meaning, and expounded on

their experiences. In addition, use of NVivo7 software assisted in data organization and analysis, thus enhancing validation (Meadows & Morse, 2001).

Validity. "Validity is one of the outcome goals of a project" (Meadows & Morse, 2001, p. 197) and implies there is little or no reason to doubt the findings. Subject to external evaluation, validity of this study is supported by rich description of evidence sustaining the conclusions of the study.

Chapter Four

Results

With Native Hawaiians migrating to Las Vegas at a high rate, it is important to learn the impact of migration on their health and well-being. The purpose of this qualitative descriptive study was to explore the following research question: How do Native Hawaiian adults who have migrated directly from Hawaii to Las Vegas, Nevada describe the impact of migration on their health and well-being? The specific aims of this study were:

- To describe the perceptions of health and well-being of Native Hawaiian adults who have migrated directly from Hawaii to Las Vegas, Nevada
- To explore changes in perceptions of health and well-being through the experience of migration.

Review of the literature in Chapter Two revealed that the relationship between migration and health and well-being is extremely complex. Many researchers used quantitative methods to study specific health outcomes. Some found that migration has a beneficial impact on migrants' health, but others determined migration has a detrimental impact on migrants' health. Therefore, to enhance the depth and breadth of understanding of migrants' health, it was decided to use qualitative methods to study Native Hawaiian migrants' health and well-being. Based on data analysis, it was determined that, with few exceptions, Native Hawaiians who migrate from Hawaii to Las Vegas perceive no health changes related to migration and minor changes in their well-being.

Well-being is a complex concept, and the researcher likened Native Hawaiian well-being to a puzzle with migration and health perceptions accounting for a few

interlocking pieces. Migration presented challenges to all participants, but the perceived degree of difficulty varied, and most participants found ways to maintain their well-being in Las Vegas. Among the sample of 27 participants, only 5 (3 women and 2 men) seemed to have prolonged and great difficulty adjusting to life in Las Vegas, and their well-being suffered. From this analysis, the following questions arose, "why do the puzzle pieces of some participants fit together nicely, but others struggle to make the puzzle whole?" and "what was different about the well-being puzzle pieces of the 5 participants who had the most difficulty adjusting to life in Las Vegas compared to the puzzle pieces belonging to the other 22 participants?" As analysis continued, interesting findings evolved that help explain these differences. In order to describe the differences between participants whose well-being suffered and participants who maintained their well-being, the two groups are compared and contrasted in the following sections on perceptions of health and well-being.

As a reminder, each participant was assigned a code name that provides brief demographic information, including gender (F or M), age in decades (20s, 30s, 40s, 50s, or 60s), and participant number (1-27). The resulting code name formulation is genderage in decade-participant number.

Perceptions of Health – One Piece of the Puzzle

It is important to briefly review the key terms, health and well-being, and their application in this study. Health was defined broadly. In addition to acknowledging the World Health Organization's (1948) definition of health as "a state of complete physical, mental and social well-being and not merely the absence of disease or infirmity" (p. 1), it was recognized that many cross-cultural migrants often add spiritual, environmental, and cultural components to their definitions of health (Conrad & Pacquaio, 2005; Elliott & Gillie, 1998; Papadopoulos, Lay, Lees, & Gebrehiwot, 2003). Participants were not asked to define health, but they were asked about changes in their own health and in the health of family and friends since migration. Well-being was defined as what brings joy and gives meaning to life. Participants were asked what brings them joy and gives meaning to their lives and about any changes in these since migration. Initially, perceptions of health and perceptions of well-being were analyzed separately; however, it became apparent that well-being was the big picture in the puzzle. Health perceptions impacted well-being and were one piece of the intricate well-being puzzle.

Perceptions of health were explored through demographic questionnaires and in interviews. On the demographic questionnaires (See Appendix B), participants rated their health "now," "shortly after migration," and "shortly before migration" on 5-point Likert scales, with 5 as "excellent" and 1 as "bad." The largest improvement in health was 1 "shortly before migration" to 5 "now." The largest decline in health was a 4 "shortly before migration" to 2 "now." For most participants, however, there was little variability in their self-rated health over these three time periods (range of means = 3.5-3.83).

This same trend of migration having little or no impact on health perceptions was also evident in participants' interviews. A few participants stated that they had always been healthy, and the move to Las Vegas had not changed that. For example, when asked if he had noticed changes in his health since moving to Las Vegas, a participant stated:

I'm fortunate because at one point in my life, when I was living abroad as well as in Hawaii, I didn't have health insurance. And so, being so fortunate not to get sick, I mean common cold was one thing, but it didn't go beyond that. So, moving here, the last 3 years, I didn't really – I haven't experienced – thank God I haven't experienced anything different about my living or my health. (M-40s-#21)
Conversely, a few participants mentioned that they had never been very healthy, and moving to Las Vegas had not changed that. When asked about changes in his health after migrating to Las Vegas, one man stated, "I don't really think there is any change in my health. It's always been not real good, you know" (M-50s-#8). Regardless of whether they felt they were basically healthy or unhealthy, many participants perceived that migration had not impacted their health.

The slight exception to this was the period shortly after migration. Referring to this time, some participants noted that it took a while to adjust to the Las Vegas environment. This is reflected when F-30s-#3, a fairly recent migrant, stated, "I'm kind of just hoping that me and my children will get adapted to the weather change and everything and . . . we're gonna be back to how we was in Hawaii." The health challenges they experienced were dry skin and colds, which she attributed to the climate. Her hope for a return to pre-migration health was based on experiences of family members who migrated a few years before she and her children did. Likewise, when asked if she had seen any changes in her health, F-20s-#25 stated, "I haven't. I got sick a little bit more here, only because when I first moved here, I wasn't used to it - theweather, but other than that, it's really just the same." She blamed the climate for being sick a bit more, but she seemed to feel this was rather insignificant and time-limited. Thus, some participants perceived that the Las Vegas climate initially impacted their health, but with time their bodies adapted and maintained a healthy state. As will be discussed further in Chapter Five, this pattern is consistent with transition theory.

Additionally, when participants acknowledged changes in health, they usually did not attribute any changes to migration, but to other factors, such as aging and nutrition. For example, one woman stated, "*I've been on high blood pressure pills ever since [moving to Las Vegas]... My cholesterol is a little high, but that comes with age and what I eat*" (F-50s-#24). M-60s-#1 also associated changes in his health with aging rather than migration. When asked if his health had changed since migration, he replied, "*I think it's, as you get older it starts to change, you know? I mean – I had a bad year last year.*" He had developed several chronic illnesses but did not feel migration had been a factor in his health challenges.

A perception of health puzzle piece with a different shape. When comparing the perception of health puzzle pieces belonging to participants whose well-being suffered with the perception of health puzzle pieces belonging to participants who maintained their well-being, some interesting differences were noted. Whether or not participants maintained their well-being, most denied that migration had impacted their health. In fact, only one participant, a woman whose well-being suffered in Las Vegas, openly expressed that migration had an impact on her health. She stated:

I'm a bit more exhausted. It's hot. My skin is dry all the time. The weather change here – it's a drastic weather change. It can be hot today, and cold in two days. So, it's just getting adjusted to the weather. I miss the rain that [town in Hawaii]'s got. I work a lot, so I am always exhausted. As far as being healthy, I don't eat right cause I'm always on the go. So as far as health change, I think there has been a drastic change. It's a different type of food. (F-40s-#5) Similar to some other participants, she perceived the Las Vegas climate presented some health challenges. However, unlike other participants, she connected migration with detrimental lifestyle changes, such as work-related stress and nutritional alterations, and felt the combination resulted in a "*drastic change*" in her health. She did not give specifics about the changes in her health, other than dry skin and exhaustion, so it is not known if she experienced more serious health challenges. Nonetheless, her perception of a "*drastic change*" likely altered the shape of her health perception puzzle piece so that it did not fit neatly into her well-being puzzle. This likely contributes to her diminished well-being in Las Vegas.

Similar to participants who maintained their well-being, the other 4 participants whose well-being suffered denied that migration had an impact on their health. However, 3 of them shared information about substantial health challenges, including osteoarthritis, hypertension, and a neurological condition. This made their health perception puzzle pieces different from the health perception puzzle pieces belonging to participants who maintained their well-being. These 3 participants spent much of their time and energy seeking relief and, in one case, a diagnosis. To varying degrees, these health challenges limited their abilities to seek employment, travel, and care for themselves and others – activities they valued. Although they acknowledged that these health challenges intensified after migrating, they did not perceive a connection between their declining health and migration, as evidenced in exemplars like this: *"I've had terrible health problems, but I don't know if it's related to moving here because I started osteoarthritis when I was very young. I was maybe in my early 40s."* (F-50s-#13). Thus, she was diagnosed several years before she migrated, which gave her a starting point for her

health challenges that pre-dated her migration. This might help explain why she did not connect her declining health with migration. From an outsider's perspective, it seems that major health challenges prevented participants like her from doing some activities that brought them joy, ultimately impacting their well-being. Although such health challenges are probably not a consequence of migration, they still alter the shape of their health perceptions puzzle piece, making it difficult to have a completely intact well-being puzzle.

It seems plausible that migrants who develop chronic conditions after migration might be inclined to perceive a cause-effect relationship between migration and their health challenges, but this was often not the case. An excellent example of this is another participant, who developed several chronic conditions after migrating, but he did not associate his health challenges with migration and, perhaps most importantly, perceived his health to be good. He stated:

Well, the polycythemia is something I gotta live with, but the bone marrow will eventually slow down and stop producing so much blood, so I am all set. Atrial fibrillation – it's an abnormal heartbeat – I take no medication now. I feel great, you know? Hopefully I can get the diabetes down, but other than that, I'm in the best shape of my life. (M-60s-#1)

Each of the chronic conditions mentioned was diagnosed after he migrated to Las Vegas, yet his well-being seemed to improve. His situation was somewhat unique because he retired just before migrating to Las Vegas, where he began exercising regularly. He had not exercised in Hawaii because of high work demands, but enjoyed exercising in Las Vegas, especially with other Native Hawaiians. He explained: I'm like the mayor of the fitness center, you know? The Hawaiians come in, and . .. I can be at the spa for 3 hours and I can talk for like an hour. I mean, as long as there is Hawaiians, I'm going to talk. (M-60s-#1)

An important difference between this man and the other participants who experienced chronic illness is that his health challenges did not limit his activity. He had actually been able to increase participation in exercise and socialization, activities that he enjoyed. This suggests that the degree of limitation resulting from health challenges has more impact than migration on perceived health and, by association, on well-being. Thus, activity limitations may misshape the health perception puzzle piece more than the presence of health challenges or sequencing of migration and development of chronic illnesses.

Access to health care. Access to health care was a major concern for most participants. With few exceptions, participants felt access to health care was worse in Las Vegas than it had been in Hawaii. Their major issues were obtaining and managing health insurance and a perceived lack of caring in interactions with health care providers. Although most participants, regardless of whether or not they maintained their wellbeing, had similar opinions about access to health care in Las Vegas, 3 of the 5 participants whose well-being suffered had activity-limiting health challenges that necessitated frequent healthcare interactions. This resulted in these 3 participants having a heightened awareness of problems with access to health care, which was distressing for them.

Migrating from Hawaii, one of the highest ranked states for health insurance coverage of its residents, provided an contrasting backdrop to issues with obtaining and managing health insurance in Las Vegas. State policy helped Hawaii achieve remarkable health insurance coverage. Enacted in 1974, Hawaii's Prepaid Health Care Act ensures the majority of employees in Hawaii have health insurance by requiring employers to provide health insurance to employees who work at least 20 hours a week (Befitel, 2005). Hawaii was recently ranked the second best state in the country for 3-year average percentage of people without health insurance coverage from 2003 to 2005 with only 9.5% of the state's population being uninsured. By comparison, Nevada was 44th in the nation with 18.4% of the state's population being uninsured (DeNavas-Walt, Proctor, & Lee, 2006). This difference likely exists because unlike Hawaii, Nevada state law does not require employers to offer health insurance to employees (Pollitz, Libster, Bangit, Lucia, & Kofman, 2007).

Like many in the sample, participants whose well-being diminished after migrating to Las Vegas had difficulty obtaining health insurance, especially if employerbased insurance was not an option. One woman with diminished well-being had preexisting conditions and claimed she is currently insured only because she and her husband were "*fortunate enough*" to find an insurance agent who told them about Health Insurance Portability and Accountability Act (HIPAA). The participant and her husband contacted numerous insurance companies before finding one that would insure her. If they had not eventually found a particular insurance agent, the participant feared she would be uninsured like her Native Hawaiian friend with diabetes, who shares insulin and supplies with the participant's husband who has diabetes. Regarding the insurance agents who the participant and her husband contacted prior to learning about HIPAA, this participant stated: Nobody ever said anything to me about a HIPAA plan. . . . One broker even sent me an application . . . and on the block where it had HIPAA plan, she had a big X through it, even though I explained to her why I needed insurance, the situation – same thing I explained to [name of the insurance agent who told them about HIPAA]. . . . Shame on these people! They should be letting people know. (F-50s-#13)

Although she was grateful to have insurance to help defray her health care expenses, the stress of obtaining insurance and paying approximately \$1000 per month to insure her and to supplement her husband's Medicare were hardships that made the adjustment to life in Las Vegas difficult.

Some low income participants had Medicaid, but they perceived obtaining Medicaid in Las Vegas as more difficult than it was in Hawaii. In fact, only 7% of Nevada's non-elderly population was covered by Medicaid compared to 11% in Hawaii and 14% nationwide (Henry J. Kaiser Family Foundation, 2007). In addition, Medicaid is somewhat less reliable than other health insurances because eligibility for it fluctuates with changing life circumstances. For example, one of the participants with diminished well-being had periodic Medicaid coverage since he migrated. He explained the how stressful this was by saying:

It's a type of Medicaid from welfare, but to get it – only my kids could qualify for it. And then I was sick, and my doctor wrote a note. They actually just decided to give it to me, but it's so hard. As soon as they give it to me, they take it back. (M-30s-#4)

In addition, frequent lapses in coverage disrupted his health care, as he explained:

The day before the day of my surgery I was supposed to get. . . a piece of camera material in your chest, a revealer, that what it's called, that monitors what's happening in your heart. . . . Right when I was supposed to do that, they told me I had to go home as my insurance wouldn't cover it. (M-30s-#4)

This participant's health challenges began in Hawaii and became so debilitating in Las Vegas that he had not been able to work since migrating, and the frequent issues he faced with health care coverage compounded his difficult situation. Although he did not associate his declining health with migration, in part because his health challenges began in Hawaii, the problems he experienced with access to health care contributed to his stress and made it hard for him to enjoy life in Las Vegas. It is difficult to know if he would have had similar experiences with access to health care in Hawaii had he not migrated.

Most participants described caring relationships and interactions with health care providers in Hawaii, but perceived a lack of caring from health care providers in Las Vegas. Several participants described longstanding relationships with their health care providers in Hawaii. In fact, some had never changed doctors prior to migration, and the same doctors provided health care for everyone in participants' nuclear and extended families. For example, one participant who moved from Oahu to Las Vegas explained:

Well, being in Hawaii, you knew who your provider was. . . . cause our family doctor has been our doctor for – he was my mom's doctor, my dad's doctor, my sister's doctor, my brother's, his wife, me, my x-wife, my younger brother, his wife, so it's just the same person. You grew up with them [doctor in Hawaii]. You knew them. They knew you. They knew your family history. (M-30s-#14) This participant valued the continuity of care he experienced on the most populated Hawaiian island, and trust was established through years of positive interactions between the care provider and the participant and his family.

When describing the perceived differences between health care interactions in Hawaii and Las Vegas, participants did not seem as concerned about *what* care was provided as they were with *how* care was provided and preferred how care was provided in Hawaii. For example, M-40s-#16 explained a difference he has noticed by saying:

The doctors in Hawaii will call you in when you get your test results back and pretty much explain and do a little bit more comfort. . . . But here, they just call you on the telephone and go, "we need you to go and get another test because there's abnormalities in your blood count. Okay, go there, and thank you. Goodbye." So, no explanation. . . I mean I was a nervous wreck!

Taking a few minutes to explain and comfort seems like a simple action, but whether or not such actions occurred made an important difference in health care encounters. With few exceptions, participants related similar positive experiences with their health care providers in Hawaii.

In contrast, dehumanizing metaphors were used to illustrate the actions of health care providers during health care encounters in Las Vegas. One participant who successfully maintained his well-being in Las Vegas represented the impression of many in the sample when he stated, "*a lot of them [health care providers in Las Vegas] are like robots or whatever. They don't give a rip about how you feel. It doesn't matter how sick you are*" (M-60s-#22). Comparing health care providers to robots suggests health care is an emotionless, mechanical task. Although the task itself may be technically correct,

healing human interaction is lacking. Another participant whose well-being suffered in Las Vegas related several incidences in which she felt devalued and described being treated like "*cattle*" and a "*sack of potatoes*" (F-50s-#13). Participants' use of such metaphors emphasized the lack of caring they experienced during health care interactions in Las Vegas.

F-50s-#13 related specific poignant encounters with health care providers. In these instances, health care providers neglected her basic needs. Regarding a post-operative hospital stay in Las Vegas, she explained:

I never felt so helpless in all of my life. So helpless, you needed to depend on the nurses or aides or whatever for everything. And to be left of the bedpan, you know, and you're worried that it's spilling on the bed. . . . The bathroom was, I felt, dirty for a hospital. Because we had extra people [her roommate's family members] staying in the room, the rubbish can was overflowing with paper towels from other people using it. And you know, I wanted out of there so bad. (F-50s-#13)

In another incident a physical therapist fitted F-50s-#13 for a back brace and taught her to wear it only when she was up and walking. Later that day the nurse prepared her for transport to the medical imaging department. Despite the participant relaying the physical therapist's instructions, the nurse insisted the participant wear the brace while lying on the stretcher. The participant shared:

I'm in so much pain, and I'm laying on this brace, and then finally when I got in the room, I told them, "they told me I need to wear this cause you're gonna stand me up." And they told me, "no, we're not. You're gonna x-ray laying down." So, I'm getting angry, and then she [the radiology technician] says, "did physical therapy get you up and out of bed yet?" I said, "no." "Well, you shouldn't be here then. We don't x-ray until after physical therapy has walked you." You know, by then I'm steaming. Then I have to wait my turn for transport to take me back to my room [still laying on the stretcher in the brace]. (F-50s-#13)

The participant was angered by the miscommunication that occurred and the lack of respect shown to her.

Health care interactions like these are dissatisfying for most people. They may contribute to the burdens of some participants not only because they are dissatisfying in and of themselves but because, as previously discussed, they had more satisfying health care interactions in Hawaii. It seems that well-being can be affected when health is declining and interactions with providers increasing, especially if health care providers are perceived to be uncaring or disrespectful.

The health perception piece of the well-being puzzle is dynamic and affected by a variety of factors. Most participants did not associate changes in their health with migration. Instead they perceived other factors were involved, such as changes in nutrition and aging. Despite no identified link between health and migration, participants expressed diminished well-being after migration if their health declined and limited their involvement in valued activities. This suggests that physical limitations may have more of an impact on well-being than migration. Finally, most participants expressed concerns about access to health care in Las Vegas, but those who experienced significant health challenges had more interaction with health care providers and more need for reliable health care insurance, which added to the stress they experienced after migration.

Well-Being – Putting the Puzzle Together

In order to assess well-being, participants were asked what gives meaning to their lives or brings them joy. Any changes in well-being were explored by asking if and how those things changed after migrating to Las Vegas. Through analysis, it became evident that most participants found ways to maintain their well-being by modifying how they found joy in their new setting. However, participants who expressed diminished wellbeing in Las Vegas had not been as successful in making such modifications. This section contains discussion on the several key patterns identified across interviews, including nurturing relationships with family and friends, improving financial security, gaining independence, helping others, teaching others about the Hawaiian culture, enjoying Hawaiian crafts and music, communing with nature, feeling safe, traveling, and eating Hawaiian food.

Nurturing relationships with family. Consistent with the collectivistic nature of Hawaiian culture (McLaughlin & Braun, 1998), participants cherished family relationships. Typically participants made statements about their families like this one, "my kids are what brings me joy. I'm really a family-oriented person, and I love to be with my family" (F-30s-#3). Like this woman, participants valued family members who moved with them to Las Vegas, but they also appreciated and missed family who remained in Hawaii. This exemplar is representative of the type of comments participants made about their family in Hawaii: "what I miss about Hawaii is your [my] cousins and, you know, every weekend and stuff like that, so I gotta get him [infant son] back home" (M-20s-#6). In a similar way, another participant shared the story of her first
Thanksgiving away from her extended family in Hawaii and the loneliness she felt when she expressed:

The hardest time we had was Thanksgiving, because back in Hawaii, families would gather. We'd all go over to my grandmother's house, and I mean from 9 o'clock in the morning till 2 days later. We had cousins coming in, cousins going out, cousins coming in, cousins going out. When we moved, we had the most loneliest Thanksgiving ever. It was just the six of us. We learned to adjust to it, but that was the hardest Thanksgiving, cause it was so quiet. We just didn't know what to do with ourselves. Nobody's comin over." (F-50s-#18)

As might be expected when anyone moves away from extended family, she felt a void; however, she noted that they *"learned to adjust."* Like many other participants, she found ways to compensate.

Spending family time differently was one way many participants compensated for missing family in Hawaii. Although most participants did not spend as much time with extended family members as they had in Hawaii, several related that they spent more time with the family members who migrated with them. This additional nuclear family time was valued by participants and helped fill any void left by not having frequent interaction with family in Hawaii. For example, although she missed her family in Hawaii, one woman explained, "*I spend a lot of time with my husband. We are best friends; enjoy each other's company. . . . We love each other and can't get enough of each other*" (F-40s-#17). Having a lot of time to be with her husband, uninterrupted by extended family expectations, contributed to her well-being and actually seemed more important to her than time with her extended family. Likewise another woman related:

In Hawaii, I was working every other Saturday, so I spent less time with my kids. Now, I found a job where I'm off Friday, Saturday, Sunday, so now I can spend like the whole weekend with my boys. I love that. (F-30s-#3)

In this exemplar, one might suppose that the additional family time was related solely to an improved work schedule, but she further explained:

I think I've done a lot better since I got here. Cause in Hawaii, you know, your families are all close, and your friends are all close, and the drama is just as close. But here, you know, most of the drama stays there, and there's more things for me and the kids to do. (F-30s-#3)

Participants who experienced "*drama*" or conflicts with extended family in Hawaii often were relieved to be less involved in those day-to-day strains. In such situations, decreased family-related stress contributed to more enjoyable time with family members in Las Vegas. Thus, participants did not have to divide family time between their nuclear and extended families, and for some, migration eased family-related stress, resulting in more enjoyable, concentrated time with their nuclear family members.

Nevertheless, nurturing relationships with family members who live in Hawaii was also important. Many participants who successfully maintained their well-being cultivated those relationships through telephone conversations. After relating how difficult it had been to separate his children from their grandparents, one man explained the ways he had found to compensate by stating:

Ya, I became an independent representative of a telecommunications company that offers this phone [pointing to his cell phone] and free calling. Seriously, I did that, so we call often and just communicate that way. Hopefully soon we'll have our video phones, and we can contact that way. (M-40s-#10)

In his situation, communication with family in Hawaii was important, but finances were tight. So, he found a creative way to provide the desired communication. In addition, he continually seeks ways to improve communication with family in Hawaii. This communication helps him maintain important family relationships.

Another man, whose wife lives in Hawaii with their younger children while he lives in Las Vegas with their older children, explained the importance of their telephone conversations with her by saying:

I know that wherever we [participant and his wife] are, we're still together, and we are moving together in the same direction, even though she's way over there, and I'm over here. We're moving in the same direction. I have this [pointing to the cell phone clipped to his shirt] because at any minute she'll call me, and we talk about whatever it is she wants to talk about, and then we'll confer that we're moving together in the same direction of what we want to do. Because I'm able to do that, then everything else falls into line for me. (M-50s-#26)

In his circumstances, phone conversations had become a vital surrogate for daily face-toface communication. Thus, the ability to talk frequently with family members in Hawaii helped compensate for the distance between them and was fundamental to participants who successfully maintained their well-being.

Visits from family members who live in Hawaii are also essential in maintaining well-being. Surprisingly, some participants see extended family more often in Las Vegas than they had in Hawaii. F-40s-#5, who migrated from Oahu, explained:

My sister-in-law lives on the island of Kauai, and they come up here three times, four times a year! But, when I lived in Hawaii, I rarely saw her, because she lived on Kauai. I would see her maybe – maybe once a year, maybe. Here I have already seen her several times.

According to her, air travel from Las Vegas to Hawaii is quite reasonable, often comparable to flying to a neighboring island, and she added, *"it [Las Vegas] is the ninth island for Hawaii. Everyone flies here."* Although she was one of the participants whose well-being suffered in Las Vegas, these visits were important to her, and several participants who successfully maintained their well-being in Las Vegas also valued such visits.

However, measures like phone conversations and visits were insufficient compensation for some participants whose well-being suffered in Las Vegas. For example, when asked where home is now, F-50s-#13, tearfully responded:

On the phone (in a quiet voice) just talking to the kids and the grandkids (pauses, reaches for Kleenex and wipes her nose, and begins crying). You know this to me is just a house. At home, every weekend there was somebody there. . . . We had a really big wide driveway, and the grass was right there in the front, and we had a rock wall coming around. So, the kids used to play (crying continues). So, every weekend, somebody was there, and that was the happiest time of my life, sitting out in the front, watching the kids play in the yard.

Though she valued being able to talk to her children and grandchildren on the phone, she really longed to be with them. To her and others like her, phone conversations were valuable but poor compensation for being together.

Nurturing relationships with friends. Participants also found joy in relationships with friends. In fact, when participants did not have extended family in Las Vegas, friends helped fill the void. All of them discussed joy from gatherings with friends in Hawaii, and those who were most successful in maintaining their well-being nurtured friendships in similar ways in Las Vegas. Frequently the most valued friendships were with Native Hawaiians they had known prior to migration or met afterward. For example, when asked if he gets together with Native Hawaiian friends, M-20s-#6 said:

Definitely! Every week. We have a circle of friends that go to school at UNLV [University of Nevada Las Vegas].... We get together every week and play music.... It keeps us grounded.... It helps us like stay sane I guess cause we're so far away, so far away from our family. So, they are like our family away from our country, kind of thing. They help us whenever we need help, you know, moving, taking her [participant's wife] to the doctor's, or anything. They are always there for us.

In situations like this, close friends filled roles that might be expected of extended family, such as helping with errands or assisting with healthcare needs. This helped compensate for lack of extended family nearby.

The role of close friendships in maintaining well-being seems evident, and some formal organizations provide venues for Native Hawaiians to come together and establish friendships. Many participants who were successful at maintaining their well-being were involved in organizations intrinsically linked to the Hawaiian community, such as the Las Vegas Hawaiian Civic Club and the University of Hawaii Alumni Association. M-50s-#19 explained: We come together as a group, whether it be with the University of Hawaii [Alumni Association] or with the Ho'olaule'a [an annual festival sponsored by the Las Vegas]Hawaiian Civic Club, but it gives us that one time that we can connect with our island style and then make new friends from there. And then you end up going to their house, and it's like home.

Although there are other ways for people to meet, several participants valued these organizations partly because they helped them begin or renew friendships with other Native Hawaiians, which helped them feel more at home. Other participants discussed establishing friendships through organizations that were not inherently linked to the Hawaiian community, such as their churches. For example, M-40s-#10 explained how friendships made at church helped him feel at home by saying:

Our church is another area that we have our spiritual family that we are part of, and we see that no matter what part of the world we are in. So, ya. . . I think we brought some of that with us – just the island flavor of it all, being an ohana [family].

By describing his relationships at church with the terms "*island flavor*" and "*being an ohana*," he suggests these interactions feel culturally familiar. However, he did not specify the ethnicity of his friends at church, suggesting the possibility of having an "*island flavor*" in relationships with people who are not Native Hawaiian.

One way of preserving the *"island flavor"* in relationships is through potluck gatherings, which are very popular in Hawaii. M-50s-#19 provided a specific example of how potluck gatherings impacted his well-being by saying:

People just coming together and everybody – potluck. I believe in potluck weddings, potluck funerals, potluck birthdays. I mean when you share food and break bread, that makes me happy. Cause if I don't like you, trust me, I won't break bread with you. And to me, that's a very important part of my life – watching people eat and have fun. I'm okay sitting on the couch watching the show way on the other side. I'll take the last seat. I'm happy watching people be happy. And when I don't see that, that's when I'm not so happy.

Continuing a joyful, lifelong tradition of potluck gatherings in Las Vegas was vital in maintaining his well-being. Breaking bread or eating together seemed almost sacred, done only with those he trusts. In addition, there is an element of self-sacrifice in nurturing relationships as exemplified by taking "*the last seat*" to be sure that everyone else is happy. Assuring the comfort and happiness of others was part of his upbringing in Hawaii. These same patterns of participating in potluck gatherings and helping friends feel happy were present across interviews and reflect ways participants adapted these practices to Las Vegas and maintained joy and meaning in their lives.

Despite the importance of nurturing relationships with friends, several participants noted changes in the way many Native Hawaiians interact in Las Vegas. These changes were noted by participants whose well-being suffered as well as by some who maintained their well-being. M-50s-#19, who previously discussed the value of potluck gatherings, was distrustful of Native Hawaiians in Las Vegas who he did not know well because he feared they might try to take advantage of him. He explained:

We [Native Hawaiians in Las Vegas] become cold. We become very cautious [about] who we open our doors to. Cause for us, when we open door, that's our heart. So, we become very cautious, and then we become cynical. When somebody says, "aloha, how are you? Are you from the islands?" [I think,] "Oh, what do you want?"

This suggests that he perceives some Native Hawaiians are more concerned about what they can get from him than in establishing friendships with him.

This cynicism seems to be based in a perception that some migrants are not invested in the Hawaiian community in Las Vegas, as M-40s-#21 explained:

They don't wanna bother with anything. They're doing their own thing. You know, I mean maybe they haven't lost the aloha spirit. It's just that they're so influenced by what's going on in their life that they don't have time for the Hawaiian people or Hawaiian events or to be part of this community.

In addition to competing interests and lacking time, he mentioned three other possible explanations: the climate and atmosphere, greed, and fear of rejection. Comparing the Hawaiian communities in Las Vegas and California, he said:

When people [from Hawaii] move to California, it's just more easily said and done versus coming here. . . When you move up there, because the weather's like Hawaii, the whole atmosphere is like Hawaii, people are more likely to share. Here, we're not. . . . I don't know if it has something to do with greed or just the attitude of them – they have to get something in return, or they won't do it. . . . I mean some of us, we still have the aloha spirit, but see we don't want to associate now. We don't want to start bringing it out in the community because we don't want to be rejected. (M-40s-#21) While his interpretation could explain why some Native Hawaiians are not involved in the Hawaiian community in Las Vegas, others might simply not be interested in maintaining cultural ties or establishing friendships with other Native Hawaiians. Native Hawaiians who chose to participate in this study are likely to be among the most culturally involved Native Hawaiians in Las Vegas, and this could make them quite different from the Native Hawaiians that participants perceived were not invested in the Hawaiian community.

Feeling rejected by other Native Hawaiians likely contributes to diminished wellbeing for some migrants. One participant whose well-being suffered in Las Vegas explained the rejection he felt from other Native Hawaiians in casual settings and from Native Hawaiian organizations. After stating that he felt many Native Hawaiians in Las Vegas lost their aloha, he described a few of his experiences. When seeing other Hawaiians, he said:

You go "hi, what's up?" or something like that, and they look at you like "crazy!" I had a bad experience when I first moved here. We went to [a casino], and I opened the door for an elderly Hawaiian woman, and she actually went around and went out the other door. She didn't want to go out my door, and I mean that hurt me. (M-30s-#4)

Although this woman might have chosen to use the other door for different reasons than he assumed, he was offended by her actions and perceived a loss of aloha in her.

Regarding the Las Vegas Hawaiian Civic Club, he stated:

They have a very big Hawaiian Civic club here in Nevada. I applied for it all in Hawaiian [language], and I got rejected. . . . Maybe it's the people who was

running it. Maybe he didn't understand what I said, but there is whole thing on the website, that they teach Hawaiian language and all that. I thought it would be cool to write it all in Hawaiian. I felt really bad, and we never got anything back. Maybe it's a political thing, or I don't know. (M-30s-#4)

As with the first situation he described, there are other possible explanations in this case too. For instance, the Las Vegas Hawaiian Civic Club might not have received his application or felt it was unnecessary to respond. Whatever the reality might be, he perceived other Native Hawaiians were rejecting him. His sensitivity might have been heightened by how much he values the Hawaiian culture and by his reluctance to migrate to Las Vegas. Nevertheless, such interactions hurt his feelings, potentially damaging his well-being, and other Native Hawaiian migrants in Las Vegas whose well-being suffers might have similar experiences and perceptions.

Another difference between those whose well-being suffered and those who maintained their well-being was that the former tended to stress differences between friendships in Hawaii and Las Vegas rather than how they nurture friendships in Las Vegas. For example, F-40s-#5 described her interactions with friends in Hawaii by saying, "Sometimes we'd get together with friends and just go down to the beach and just hang out, talk story, listen to the waves. You can't do that here." She perceived that the lifestyle and surroundings in Hawaii allowed opportunities and time for friends to be together. In contrast, when talking about relationships with friends in Las Vegas, she said:

The lifestyle here is so different that it's hard to have that cultural experience, and yet they have all these different organizations, which I have never called. I think, most of us when we move here, we want to better our lives, so we're looking at just work, to buy a home, you know. We are busy working and so forth... quite often we really don't have time for ourselves.... When I talk to friends from

Hawaii, they're just busy, going here, and going there, doing stuff. (F-40s-#5) She perceived the Las Vegas lifestyle to be fast-paced, leaving little time to care for herself, participate in Native Hawaiian organizations, or nurture relationships. Perceptions like these suggest a sense of isolation from others, which could contribute to the diminished well-being experienced by some participants.

Improving financial security. Financial security means being able to afford the basic human needs of shelter, food, and clothing without excessive stress. Although still striving to reach their financial goals, many participants feel more financially secure in Las Vegas than they had in Hawaii. Some of them perceived this directly enhanced wellbeing. For example, F-40s-#17 explained:

In order to have that sense of well-being, I feel that I need to feel like a responsible individual, capable of taking care of myself and anyone with me, which is something that I couldn't really do when I was in Hawaii.... When I was an adult living there [Hawaii], it just costs too much to live there. So even though we were making all right money, it still wasn't enough to live comfortably, and to actually make our bills. We never really made our bills [in Hawaii].... Here in Las Vegas, I am able to generate a decent income, pay all of my bills, and provide for myself. And that makes me feel good.

There was clearly a link between financial security and well-being for this participant, and migrating to Las Vegas enhanced her financial security and consequently her sense of well-being. By comparison, 3 of the 5 participants whose well-being suffered in Las Vegas continued to struggle financially or have employment issues, which led to feelings of financial insecurity and seemed to diminish their well-being.

When living in Hawaii, most participants experienced financial insecurity significant enough for it to be a push factor in their decision to migrate. As one participant summarized, "*I moved only because financially I was having a hard time back home [Hawaii]. I came over here to try to get a fresh start, and I'm getting it*" (F-50s-#11). Likewise, participants perceived the cost of living in Las Vegas to be lower, and this was a drawing force to Las Vegas. One participant felt so strongly about the financial advantages of Las Vegas that he desperately wanted his children to migrate too and explained, "*I wish they were all four here. They have nothing in Hawaii. I don't want to go back to Hawaii. They [participant's children] have nothing; they will have nothing*" (M-60s-#1). Although the search for financial security was not the only reason for migrating, many participants had significant financial challenges while living in Hawaii, and they were attracted to Las Vegas because they perceived it to be more affordable. In such instances, whether or not participants improved their financial stability after migration seemed to impact well-being.

Participants seemed to perceive the ability to own a home as an important indicator of financial stability. Most participants were not home-owners in Hawaii but hoped to purchase houses in Las Vegas. A few had reached this goal. Regarding the nice but unpretentious house he owned, one man shared:

There's no way we'd have a place like this [in Hawaii].... This is more than what we'd ask for, but there's no way we could afford something like this in Hawaii. And we [participant and his wife] both have good jobs. I mean we can afford to live the way we do, but in Hawaii, I wouldn't be sitting here talking to you, because I'd be working (M-50s-#12)

His response suggested that not only would he be unable to own a comparable house in Hawaii, he would also need to work more to provide for his family's needs. Living in Las Vegas relieved these strains, leaving time and energy for well-being enhancing pursuits. Even when home ownership was not yet a reality, many participants remained hopeful. For example, when asked what the best part of migration had been, one woman responded:

I think it was financially. Knowing that my dream is there -I'm almost there - to reach my dream of buying a home. In Hawaii, it was like -I couldn't foresee it, but here I know it will happen - it will happen soon. (F-50s-#11)

Like this woman, most participants tended to view owning a home in Hawaii as unachievable, but in Las Vegas, it had become either a viable possibility or a reality. This was a new and refreshing prospect.

This also seemed to be the case for 3 participants whose well-being suffered in Las Vegas. F-40s-#5's main reason for migrating to Las Vegas was to be able to buy a house. She had lived in Las Vegas for a year and a half when she explained:

We were doing fine in Hawaii, but we wanted to buy a home. It's very expensive in Hawaii. I told my husband, "we are getting older in our years, and I can't foresee us paying \$2500 plus mortgage a month. . . . I can't see working harder in our later years to pay off a high mortgage." Whereas here, we can get a beautiful home for less. It might not be my dream home, but it's a home, and that's my dream... And that – that was the positive of moving here. We haven't seen it yet.

Although she seemed a bit discouraged that she has not reached this goal, her determination to own a home remained intact. She hoped to purchase home that will increase in value sufficiently that she can sell it, return to Hawaii, and own a home there. She continued, "and I know that in the future I can always retire back in Hawaii. That's my ultimate goal – is to go back home and to retire" (F-40s-#5). Similarly, F-50s-#27 migrated 4½ years prior to stating, "we're trying to own [purchase] a house here, but Hawaii is still home. Hawaii will always be home, no matter what. . . . We live in Vegas, but Hawaii's always home."

Although both of these participants wanted to purchase houses in Las Vegas, they perceived Hawaii to be their home and wanted to move back to Hawaii within a few years. However, this plan was not unique to participants whose well-being suffered in Las Vegas. Many participants who successfully maintained their well-being shared the vision of homeownership in Las Vegas as a steppingstone to return to Hawaii with greater financial security.

If homeownership is a goal, it seems that being able to purchase a home would usually enhance well-being. On the other hand, failure to reach this goal might damage well-being. While this simple formula might be true in some cases, the situation of Native Hawaiian migrants in Las Vegas is complex. Regardless of the condition of their wellbeing, most participants remain optimistic that they can achieve this goal. Pragmatically they realize that residential real estate is more expensive in Hawaii than in Las Vegas, making this goal more obtainable in Las Vegas. However, it seems probable that the longer migrants remain unable to purchase a home, the more likely it is that they will become discouraged and experience diminished well-being. Further research is needed to determine if this is the case.

In addition, only 2 participants had owned homes in Hawaii. Compared to the other participants, they were not as enthusiastic about being able to own a home in Las Vegas. One, who successfully maintained his well-being, still owned his home in Oahu as well as his Las Vegas home. The other one, whose well-being suffered in Las Vegas, had owned her home in Hawaii and sold it before migrating. She found little satisfaction in the house she owned in Las Vegas, describing it as "*just a house*." She perceived her situation to be different from that of many other Native Hawaiian migrants and explained:

I always tell people "ya, [in Las Vegas] you can go to the market, and the food is cheap. You can go buy clothes cheap." I do find that real estate has gone up [in Las Vegas], not like it was before. To buy a home here is getting very expensive too. But if you're a young family with a lot of kids, ya, I can see where living here, you'll be able to eat a little bit better, have clothes for your children, maybe possibly buy a home sometime. You know, so like they say 'ninth island,' ya, lots of island people here. And I think for a lot of them, it has been a wonderful move, an opportunity for them. But I would say in our case, it wasn't so. Our children were grown already. My house [in Hawaii] was paid for. (F-50s-#13)

She did not share the goal of homeownership because she had achieved it in Hawaii and Las Vegas, differentiating her from most participants. From her perspective, migrating to Las Vegas has practical advantages for young families and those who struggle financially in Hawaii but not for her. It may be that migrants who do not perceive significant financial advantages are at increased risk for diminished well-being.

The cost of living was another important financial concern for many participants, most of whom seemed energized by the overall lower cost of living in Las Vegas. For instance, when asked what the best part of the move was for him, one man answered, *"the very best part would be – we have a little bit more money in our pocket. That's the very best – ya, that's the best!"* (M-40s-#16). Although this participant felt his well-being had suffered since migrating to Las Vegas, he appreciated the financial advantages in Las Vegas. To the same question, another man responded, *"well, stability, not having to work two or three jobs – financial stability"* (M-50s-#12). Similar to many participants, these men and their wives worked multiple jobs in Hawaii to meet their families' needs. After migrating to Las Vegas, most participants and their spouses only need to work one job each to meet their families' needs and still have money left over to save or spend as desired. As might be expected, this was usually perceived as a benefit of living in Las Vegas.

By comparison, participants whose well-being suffered in Las Vegas continued experiencing financial struggles even though they appreciated the lower cost of living. M-30s-#4 was particularly impressed by the lower cost of groceries and explained:

The cost of food here – when we first got here, it was like we hit the jackpot! ... Everybody keeps telling me how much more expensive Nevada is becoming, but they have no idea how expensive Hawaii really is. I tell everybody, "you should be grateful." [In Hawaii] bread is like three dollars, and that's a small loaf. The cheapest thing you can get is eggs. Despite appreciation for lower grocery prices, he and his wife struggled financially. As mentioned previously, he had not been able to work since migrating due to poor health, and his wife had difficulty finding employment. He explained:

My wife got a job from her aunt, and we were going to have a brand-new start moving here, and it just didn't work out as planned. She didn't get that job. We were stuck trying to find another job. . . . It took her forever to find a job here, but she finally found a job. (M-30s-#4)

Shortly after she started working, she became ill, lost her job, and had to find other employment. When illness impacts a person's ability to work, financial challenges can easily happen. These interrelated health and financial challenges were heavy burdens and likely contributed to his diminished well-being. Although these challenges might have occurred anywhere, they happened to the participant and his wife shortly after migrating, which could impact how he feels about living in Las Vegas.

Another participant whose well-being suffered in Las Vegas had taken a second job to meet the needs of her family. She found that grocery and utility costs were rising more quickly than her pay and explained:

I had to take on a second job. With what me and (husband's name) was bringing in, it was just enough to cover the bills and buy groceries and stuff, but not enough to do anything, you know, to go to the movies and or go out and have a nice dinner at the buffet. (F-50s-#27)

She expressed that her jobs were very stressful, and having two jobs, instead of one, added to her stress and took away from time she might have spent in well-being enhancing pursuits.

Their search for improved financial security brought many participants to Las Vegas. Most hoped to buy a home. A few had been able to buy homes, and the others remained hopeful that they would be able to do so. Though probably not as exciting as buying a home, feeling justified in the hope of being able to do so someday seemed to be a positive experience for participants who maintained their well-being and for those with diminished well-being. For participants who had owned a home in Hawaii, owning a home in Las Vegas did not seem to be a milestone. One participant owned a home in Hawaii and Las Vegas, and he seemed to successfully maintain his well-being, but the participant who sold her home in Hawaii experienced diminished well-being. She did not perceive personal financial advantages in Las Vegas buy acknowledged they existed for young families and those who struggle financially in Hawaii. In addition, most participants with diminished well-being continued to experience financial struggles in Las Vegas. Not surprisingly, those who experience continued financial struggles after migrating might be at greater risk for diminished well-being than those who emphasize the financial advantages. Thus, financial security seems to be a piece of Native Hawaiian migrants' well-being puzzle.

Gaining independence. Most participants who migrated in their 20s and 30s discussed gaining independence as a well-being enhancing outcome of their migration. Only one of the participants whose well-being suffered in Las Vegas was in his 30s, and he did not divulge any change in his sense of independence. The others whose well-being suffered were older, and they all seem to have established their independence prior to migration. Therefore, while gaining independence was perceived as an important benefit of migration for some participants, those whose well-being suffered had previously

established their independence and did not experience this benefit as many young adult participants did. It is important to note, however, that several participants who were older and had seemingly established their independence prior to migration were able to maintain their well-being in Las Vegas.

Those who discussed feeling more independent in Las Vegas usually identified a desire for independence as a reason for migrating. Reflective of others who migrated in their 20s or 30s, M-40s-#21 migrated in his thirties and explained his pre-migration decision process by saying:

My father didn't want me to move, but I moved because I just needed to get away. It was something I needed to do. Cause I come from a foundation where, you know, you're gonna be home forever. So, in my father's eyes, I'm supposed to be home, but I had my own ideas. You know, I wanted to experience life and do other things.... And so, I just wanted time for myself. I wanted my own life.

Participants whose well-being suffered did not share this reason for migration. This is important because the desire for independence was second only to a search for financial security as a reason for migration. When present, the desire for independence went handin-hand with a desire for financial security, and typically these participants experienced some measure of success in both areas. This combination gave these participants two positive experiences in achieving goals, which further bolstered their self-esteem and well-being.

Although none of the participants who had a desire for independence experienced long-standing diminished well-being, they were not immune from feeling homesick and missing their families. This seemed especially true shortly after their arrival in Las Vegas. F-20s-#25 had been in Las Vegas less than a year and had experienced some difficult adjustments related to employment and being on her own when she stated, "*it*'s been hard, cause like I said, I've never been without them [her parents and siblings]. So the first couple months it was hard for me. I just was depressed, didn't want to be here, ready to go home." Fortunately she had extended family in Las Vegas who encouraged her during those first few months and helped her persevere through the challenging initial adjustments. Her life brightened considerably when she found suitable employment. Other participants who sought independence also expressed the importance of having family or friends in Las Vegas to sustain them through the adjustment period. These support people seem vital, especially as migrants are learning to stand on their own two feet.

When participants discussed their feelings about being more independent, they seemed to exude enthusiasm. For example, F-20s-#7 expressed:

I think for both of us [participant and her husband], it [the best part of the move] would be finding ourselves. I mean back home we were dependent on our parents. We lived with his parents. You know – no rent. How do you pay a bill? How do you write a check? You know. Living out here we learned to be independent. . . . I just think we've grown up. Like we know who we are now. Back home I think we were just kids, and now we've grown into adulthood. We know how to do things for ourselves now, whereas in Hawaii, we weren't really that independent – as we thought we were. It is totally different.

Unless parents migrate with participants, migration puts geographic distance between participants and their parents that seems to make it easier for participants to establish independence. Growing up in a micro culture focused on the group and a macro culture focused on the individual likely contributes to the benefit of distance from parents for those seeking to gain independence.

As with many aspects of research, it is difficult to determine how participants differ from Native Hawaiian migrants who did not participate. It is certainly possible that there are Native Hawaiians in their 20s and 30s in Las Vegas who migrated in hopes of establishing their independence but have not been successful in their quest. Some might have returned to Hawaii feeling defeated. However, based on analysis of the data acquired in this study, it seems that Native Hawaiians who migrate with a desire to gain independence often triumph. Indeed, they seem more resistant to diminished well-being than those who migrate solely in hopes of establishing financial security.

Helping others. A desire to help others was characteristic of many participants, and helping others usually brought joy. For example, when asked what brought him joy, one man expressed, "*people thinking that I'm always there to help them if they need it, especially my close friends and family*" (M-30s-#14). Another participant was more specific about how she finds joy in helping others when she stated:

I think . . . seeing that people are happy. . . . When I see people complaining, I feel bad for them because I can't change their mind. They have to change their own mind. I would just listen to them. Most time that's all they want – listen. Like my alcoholic cousin, I just listen to her. Same story – ten thousand times already, but she feels better after I listen. I'm happy when I can be of help to somebody. (F-50s-#24) In these exemplars and many others, participants found joy in good deeds, consequently enhancing their well-being.

In contrast, some participants whose well-being suffered in Las Vegas felt other people rejected their help. When asked what he brought with him that was important, M-40s-#16 explained:

I brought with me my love and my aloha that my mom instilled in me. So, I can share it with the other people here, but they don't want it. So, you know, I still give it, even if they don't want it. . . . I brought my heart, and living in Las Vegas, it's gotten a little bit black. And I don't like it, so I want to go somewhere less where I can make my heart nice and red again. You know, they made me hard here. I'm not a hard person. You know, I'm a loving and caring person.

Like several other participants, he acknowledged that his mother raised him to express aloha through caring, helpful actions. He valued aloha and felt sharing it kept his heart red or enhanced his well-being. In Las Vegas, he felt his aloha was rejected, and he determined to migrate somewhere that people would appreciate his willingness to share and help. He believed this would restore his well-being or make his heart "*red again*."

Whether participants perceived that other people accepted or rejected their help seemed to impact their well-being. While a couple of participants who experienced diminished well-being felt others did not readily accept their help, many participants who successfully maintained their well-being related positive experiences and feelings associated with helping others. Thus, other Native Hawaiian migrants might be at risk for diminished well-being if they want to help others but perceive their help is not well received. *Teaching others about the Hawaiian culture*. Another way some participants maintained their well-being was teaching others about the Hawaiian culture. One participant, who was a Hawaiian healer or kahuna, felt an urgent need to share his knowledge with others. He stated:

Now I'm over 50 years old. I don't have that much time left on earth, so I wanna help as many people as I can. I wanna spread the mana'u [knowledge] because the word kahuna, the keeper of the secret – well, it's really not a secret. It's really mana'u or knowledge, and I don't wanna be the only keeper. I wanna pass it. . . . That's what gives meaning to my life – helping people. . . . I have done some good stuff for people throughout life that has filtered down. So, ya that gives meaning to life. (M-50s-#8)

Similarly, when asked what brought her joy, another participant shared:

Educating mainstream [society] on the deeper values of what it is to be Hawaiian, not just the hula skirt, not just a lei and nice aloha shirt, things like that. The culture itself and extending that culture to everybody to understand what a deeper life we can have if we take things very seriously and bring importance to our lives via where we come from. (F-50s-#18)

Whether interested specifically in Hawaiian ways of healing or more generally in a Hawaiian way of being in the world, as in these exemplars, several participants perceived the Hawaiian culture as a reservoir of knowledge that can benefit many people, regardless of ethnicity. Sharing what they value most in their Hawaiian culture brings them joy.

Among the 5 participants whose well-being suffered in Las Vegas, only one related efforts to teach others about Hawaiian culture, specifically hula. Hula is more than

a form of dance; it is an expression of Hawaiian culture, often relaying accounts of Hawaiian heritage. M-30s-#4 taught hula lessons in Las Vegas for a short time until his health challenges made it *"unbearable."* Although he still teaches his family, as his health and energy allow, he expressed sorrow that he could no longer teach hula classes. This seems to have more to do with declining health than migration. Had he not migrated, he likely would have had similar experiences in Hawaii. Nevertheless, being unable to teach hula saddened him.

Although not all participants expressed finding fulfillment in teaching others about Hawaiian culture, some did. Likewise, the well-being of some Native Hawaiian migrants in Las Vegas might be enhanced by finding avenues to share their cultural knowledge and values with others.

Enjoying Hawaiian crafts. Several participants enjoyed Hawaiian crafts. Most of them were among those who successfully maintained their well-being, but two of them experienced diminished well-being. For the participant whose well-being seemed most diminished, Hawaiian crafts appeared to one of a very few bright spots of her life in Las Vegas. Her countenance brightened as she told about discovering a gourd farm during her mainland travels. Since finding this gourd source, she has been crafting gourds into decorative bowls and ipu, instruments sometimes used in hula. Through this craft, she experiences a spiritual connection to her ancestors, which she described by saying:

I always had this vision, and I used to tell my hula teacher, "it must be the kapuna," or the ancestors that have gone that have been sending me these vibes, what to do with these gourds, because I just pictured in my mind what I wanted to do with these gourds. You know, I wanted to burn them. And I wanted all earthy colors. I wanted to dye them earthy colors, and just – I knew what I wanted to do. And I used to tell him all the time "it must be our kapuna sending me all of this stuff." (F-50s-#13)

Although her overall well-being suffered in Las Vegas, this activity connected her to her cultural heritage and brought her joy. Had she not discovered a source of gourds, she might have experienced even more diminished well-being.

Like the decorative bowls and ipu, many Hawaiian crafts are made from materials indigenous to Hawaii, which can be hard to find in Las Vegas. The other participant who enjoyed Hawaiian crafts but experienced diminished well-being had difficulty obtaining suitable craft supplies. She described this challenge by saying:

I enjoy doing crafts, but my creativity has been suppressed over here.... I had a business on the side in Hawaii that I did crafts.... I don't do it here.... Normally I use the authentic materials, which we don't have here. So, I have to improvise with certain things, so it's a little different. I don't have time to go out and gather the things I need, and I can't gather it here. I miss all of that. (F-40s-#5)

While scarcity of "*authentic materials*" was a barrier for her, other participants overcame this barrier by having craft supplies sent to them from Hawaii. Thus, several participants enjoyed creating decorative Hawaiian items, and, unless barriers were perceived, this activity seemed to help them maintain their well-being in Las Vegas.

Enjoying Hawaiian music. In addition, some participants discussed the emotions they experienced listening to or playing Hawaiian music. While such feelings did not differentiate participants whose well-being suffered from those who maintained their well-being, it did impact participants differently. Many enjoyed listening to or singing Hawaiian music in Las Vegas, but a couple participants felt these activities increased their homesickness.

Participants who found Hawaiian music helped them feel more at home were likely to express something similar to this: "*I like Hawaiian music – local music. That's why I'm calling home. I'm like, 'can you guys send me some Hawaiian music PLEASE?*'" (F-20s-#25). For participants like her, hearing the music associated with their home and culture gladdened and comforted them.

A couple of participants, however, experienced emptiness when they sang Hawaiian music in Las Vegas. M-40s-#10 was one of them, and he expressed:

When I do it [sing Hawaiian music] here, you know, it's just the strangeness, the strange feeling of singing Hawaiian music out here. . . . [in Hawaii] I'd get my ukulele out, and we lived a block away from the beach. . . so I'd bring my instrument and as the sun was setting, I'd serenade myself and whoever else wanted to listen to it. I'd just get a whole three dimensional setting to the music. Whereas here – well, it's different. . . I think I probably don't play it as often because it makes me a little bit homesick.

Singing Hawaiian music intensified the homesickness he experienced. Other migrants may have similar experiences. So, it is important to remember that reminiscences of home, like music, might make some Native Hawaiian migrants feel more, rather than less, homesick. *Communing with nature*. Many participants valued having a connection with nature and described a positive relationship between their well-being and the natural surroundings in Hawaii. For example, M-40s-#16 related:

Like the view of the mountains, the Ko'olau mountains, the rainbows, you know, the nice sunshine. It's nice and bright and the atmosphere. . . . just the green lush mountains with the rainbow and the nice beautiful ocean you can look across. You can go down to – like North Shore or someplace, just sit on the rocks and watch the ocean, watch the waves. You know, those kind of things.

The serenity he experienced in these quiet moments seemed palpable. Other participants related similar experiences, and none related negative feelings about the natural surroundings in Hawaii. In each case, participants enjoyed communing with nature in Hawaii.

After migrating to Las Vegas, participants miss these everyday encounters with the natural surroundings they so value. One participant explained the void she felt by saying:

I'm so used to the ocean. There's no water here unless you go to Lake Mead, and that's a far trip. Driving on the freeways and highways, looking over the bridge, thinking there's gonna be water right there, and there's just a whole bunch of cars - a whole lot of cars. (F-20s-#25)

Next to missing her family and difficulty finding employment, her greatest challenge seemed to be adjusting to the differences in her new surroundings. These differences seemed most jarring when doing routine tasks and almost subconsciously anticipating an encounter with nature that could not happen in her new environment. M-40s-#16 also described the impact of realizing the environmental differences between Hawaii and Las Vegas when he said:

When I see green things, things that's growing, things that's living and alive, it makes my spirit a lot happier. It didn't dawn on me for the first year I lived here. I mean the first time I noticed, it was like, "wow, there's a lot of rocks here!" Cause where I'm from, there's trees and grass and bushes. And I come over here – it's nothing but rocks. There's hardly any trees. You can tell the trees are suffering cause they're not as green and lush and bright. . . . I miss the rain [in Hawaii]. I miss the ocean. The rain just like washes everything away. It's like – stay in the house and watch the rain, or go on your patio and you can see all the rain drops and, you know, it's a spiritual thing.

Something inherent in encounters with nature in Hawaii fed his spiritual well-being. However, in Las Vegas, his well-being suffers because those natural elements are scarce or missing. He perceives communing with nature in Hawaii as fundamental to his wellbeing and that it is difficult, if not impossible, to compensate for this in Las Vegas.

Although participants who maintained their well-being also missed Hawaii's natural surroundings, several found ways to compensate. For some, visiting the ocean along the Pacific coast helped. M-30s-#14 explained, *"the second hardest part [of migration] was not having no ocean. Me and my fiancé, we go to San Diego probably every 3 months just cause I need to see the ocean, smell the ocean."* Like some other participants, he enjoys visiting the ocean, and occasionally traveling to California helps compensate for the absence of daily encounters with the ocean and beaches of Hawaii. In

addition, a few participants enjoyed the natural surroundings in Nevada. Aware of the difficulty other Native Hawaiian migrants experience, a participant advised:

Well, you know, if anyone from a different place, especially from the Pacific Basin, moves into a country like this, they cannot be overwhelmed by what they see. Cause this is desert – no water out here. You can't look at things so critically, being so nitpicky about oh – it doesn't have this, it doesn't have that. You have to appreciate the new surroundings. I appreciate this place. I love the desert. (M-50s-#26)

He looked for the positive, the different beauty in Nevada's natural surroundings, and encouraged others to do likewise. Thus, missing the beautiful surroundings of Hawaii is challenging for many Native Hawaiian migrants, and one way to help might be encouraging them to find ways to compensate.

Feeling safe. A few participants discussed the relationship between feeling safe and well-being. As might be expected, feeling safe was associated with comfort and a sense of security, and feeling unsafe was associated with worry and anxiety. Although only 4 participants discussed the importance of feeling safe, it is noteworthy that the participant who feels more safe in Las Vegas than she did in Hawaii was among those who successfully maintained well-being, and the 3 participants who feel less safe in Las Vegas were among the participants whose well-being suffered.

Feeling unsafe in her neighborhood in Hawaii was a push factor in F-30s-#3's migration decision. To explain why she feels safer in Las Vegas, she said:

The area that we lived [in Hawaii] wasn't exactly the safest area. It wasn't always drive-by shootings, but I wouldn't let my sons go outside and play unless I

was right there with them. And even if I was there, I just didn't want to.... There was some drug scenes in one area. There was kids cussing, and I didn't want my sons around that. Here, I can actually let my sons go outside and play and feel comfortable with it. We can go to the park and not have to worry about being around an area that they'll be in danger.... The overall best part [of migration] – living in a safer neighborhood. I still watch the news and know that there is bad things happening in Vegas too, but I still feel comfortable in my house, knowing my next door neighbors aren't selling drugs, that this person over here isn't beating up his wife.... I feel a lot safer with my kids.... I think this is the best feeling because they are safe, and they're taken care of better. So, that clears my conscious a lot.

As it is for many parents, her sons' safety was of utmost importance to her. She perceives her Las Vegas neighborhood as safer than her previous neighborhood in Hawaii, which eases her burdens as a mother. This improved sense of safety helps her feel comfortable in her new home and gives her freedoms that her fears in Hawaii extinguished. These benefits combine to reduce her stress.

By comparison, 3 participants whose well-being suffered felt less secure in Las Vegas than they did in Hawaii, and this increased their worry. Some concerns focused on participants' children and were influenced by their new physical and social environments. For example, F-40s-#5 found comfort in the isolation of the islands and sensed sinister undertones in the vast expanses surrounding Las Vegas. She explained:

My daughter can walk home from school in Hawaii, and I wouldn't think of someone grabbing her. I mean, it could happen. It has happened, but here – her

school's right around the corner – I worry. I worry because I hear all the time about girls getting picked up, and, if something like that happened, God forbid, they're gone, cause you can just drive to another state. In Hawaii, you go around in a circle. I mean, where you goin to go? They'll shut down the airports for that if you notify them. Here, you probably won't ever see them again. And I think that worries me. (F-40s-#5)

Thus, living on a continent caused her to worry that her children could be taken and easily disappear. In contrast, she felt protected by the isolation of the Hawaiian Islands.

She also missed having a reliable safety net of neighbors, which she explained by stating:

In Hawaii, I would say, even if she [participant's daughter] was home by herself, it was safe as a community. We all get to know each other and watch out for each other's children. Here they don't know you. . . . It's scary here. (F-40s-#5)

After a year and a half in Las Vegas, she knew only a few of her neighbors' names and had not established trusting relationships with any of them. Migration had replaced the security she felt amidst trusted neighbors with nameless faces living near her.

After sharing her safety concerns, she reflected that they could be the reason for her unhappiness in Las Vegas as well as for her declining health. She stated:

Maybe that's why I was happier in Hawaii. Cause, you know, even though I worked so hard, I was happier as I knew my children were safe. I didn't have to worry about strange things happening, or this strange place that we live in, because I'm familiar. It's home. Here, it's just a totally different world.... You never know, and I think that's why... my health is not all that great here. It's because I worry too much. . . . I can't sleep, and I've been having sleepless nights. (F-40s-#5)

Her safety concerns were significant enough that they impacted her happiness and her ability to sleep, which she felt damaged her health. Overall, there was a sense of comfort and safety in the familiar surroundings of Hawaii but fear and worry in her relatively new, unfamiliar location.

In addition, participants whose well-being suffered in Las Vegas also feared violent reactions from others. M-40s-#16 perceived Las Vegas to be *"life threatening"* and explained:

Nothing [in Hawaii] was life threatening like it is here. . . . You can say something wrong to somebody [in Las Vegas], and they can just shoot you right there. Or you can look as somebody the wrong way, and they can shoot you or stab you or do something to you. It's not like how it was back there [in Hawaii]. I gotta lock everything up, and I can't trust anybody [in Las Vegas]. And I can't help anybody out who needs help on the side of the road, or I can't give a person a ride who is hitchhiking on the road, or all that stuff we used to do back home. People ask for help, and you can't help them cause you don't know what that person's gonna do, cause this place is so corrupt.

He fears how others might act, and concern for safety restrains him from reaching out to help as his cultural and familial upbringing suggests he should. To some extent this fear seems based in differences in confrontation norms between Hawaii and Las Vegas. He expounded on these differences by saying: In Hawaii, we're gonna take care of it [a disagreement] by fist fighting. Here, we [others in Las Vegas] are gonna take care of it. We're gonna shoot you. We're gonna shoot you and your whole family. So, is there fear in the Hawaii people that are here? Absolutely, because they [Native Hawaiian migrants] are so used to communicating it out, talking about it, and then fist fighting, where here they [Native Hawaiian migrants] can't do that, because their fear of losing their life is so much different. (M-40s-#16)

Although exaggerated, the sharp contrast between verbal confrontation and fist fighting and shooting an entire family serves to illustrate his fear about interacting with others in Las Vegas.

Although only 4 participants discussed safety issues either in Hawaii or Las Vegas, safety was a major concern for them. No participant who maintained well-being mentioned feeling unsafe in Las Vegas, but 3 participants whose well-being suffered said they feel unsafe in Las Vegas. There are likely other Native Hawaiian migrants who feel unsafe in Las Vegas.

Traveling. Several participants stated that they hoped to travel more frequently and easily after migrating to Las Vegas. Participants who had actually been able to travel more enjoyed these opportunities and were among those who maintained their wellbeing. In comparison, 1 participant whose well-being suffered had hoped to travel more after migration, but her health precluded much travel, and her few travels had been disappointing to her.

Some participants who maintained their well-being were so impressed with their new opportunities to travel that they identified this as the greatest benefit of migration.

Frequently, they compared travel on the mainland to travel in Hawaii. For example, F-50s-#24 stated:

The best part – I can travel. Not on the plane if I don't want to. I've been able to see other places. . . . At home [Hawaii] you gotta go from one ocean to another ocean. I felt like a bumper car. You get to that ocean and boink, turn around. You gotta go back the other way, boink, turn around. You know, there's an end. It's a rock. It's a nice rock, sweet smelling, very nice and all that, but it's a rock! So here, it's a bigger rock. You gotta go waaaay over there to boink and turn around. (F-50s-#24)

Likewise, another participant stated:

You know what, the best part [of migration] is that you can drive endless, ya. You don't just drive around the island or just fly over to the next island and drive around that. But here, you can actually get in the car and just go! Ya, that's actually what makes it so well worth it. . . . You know, experience different things, places, cities. (M-40s-#21)

Improved opportunities for travel created a sense of freedom to see and do things that they had previously only heard or read about. The results were often an energizing sense of accomplishment and personal growth.

One participant whose well-being suffered also discussed a desire to travel more as a reason for migrating to Las Vegas. Actually, this desire belonged more to her husband than to her. She described his desire and their experience by saying:

He [participant's husband] said, "it [his reason for wanting to migrate] is growing up on a little island," Ya, born and raised there. He worked hard all of his life. You know, he worked for (company name) 40 years. . . . He thought he's gonna move here. He wants to be able to jump in a car and just drive and travel and have this whole different life – this space. You know, and it [migration]

She related some fairly challenging and disappointing trips that occurred shortly after they migrated and a recent inability to travel because of her health challenges. In fact, she said they had traveled less since migrating than they did while living in Hawaii. It is unlikely that the reduction in their travel due to her declining health would have been any different if they had remained in Hawaii, but they did migrate and were disheartened with their subsequent travel experiences and the lack thereof.

happened, and it [the travel] wasn't like what he thought. (F-50s-#13)

Eating Hawaiian food. Food is an integral part of Hawaiian culture. Overeating seems to have roots dating back to ancient Hawaii. Historical records suggest that obesity was accepted and even encouraged among early Native Hawaiians, especially for women. Social standing and desired appearance were connected with plentiful access to food (Pukui, Haertig, & Lee, 1972). "An ideally beautiful woman had 'a face as round and full as the moon'" (Pukui et al., p. 7), and it was especially important for royal women to be large. For instance, it is reported that one [Native Hawaiian] princess would eat 13 *haupia* [coconut] pies in a setting" (Pukui et al.).

Most participants discussed joy associated with eating, but there is an interesting dichotomy surrounding food. Some participants identified food as "*dangerous*" when discussing health (M-20s-#20), but many, including those who perceived health dangers, associated eating with a soothing calmness that enhances well-being. In fact, overeating remains a culturally sanctioned indulgence that many participants enjoy. M-20s-#20

described this practice by saying, "kanak attack is the way they say it in Hawaii, but the English way of saying kanak attack is Hawaiian paralysis. They [Native Hawaiians] just eat. You don't eat till you're full. They say you eat till you're tired." In other words, when Native Hawaiians eat, especially at gatherings, they often overeat to the point of exhaustion.

After moving to Las Vegas, many participants noted that food was more affordable, making it more accessible, and some participants were more likely to overindulge. In fact, a participant noted:

We don't know how to cook little! Everything's in big pots! When we first moved here, it was crazy. . . . You know, you go to the store, five cucumbers for a dollar, how many pounds tomatoes for a dollar, three heads cabbage for a dollar. You go, "wow!" (F-50s-#24)

Like her, several participants expressed excitement that groceries were more affordable in Las Vegas than they were accustomed to in Hawaii. This often led to buying too much food and then eating it to avoid wasting it. In addition, participants enjoyed the plethora of relatively inexpensive buffets in Las Vegas. Regarding his tendency to overeat at buffets, M-50s-#9 quipped, "*they used to call me buff man when I came here, and now they call me buffet man. I picked up about 30 pounds, but, you know, I can still walk.*" All-you-can-eat buffets and the culturally accepted practice of overeating combine in Las Vegas to create an atmosphere that many participants enjoy in spite of acknowledging the health risks.
While participants enjoyed many kinds of food, most seemed to revere Hawaiian food. In fact, simply eating Hawaiian food comforts them and enhances their well-being. For instance, M-30s-#15 expressed:

When I eat Hawaiian food or poi [mashed taro] or whatever, it rejuvenates me. You know, it gives me the strength, the mana, the power. If I eat Hawaiian food, it's like, "okay, I don't miss it [Hawaii] anymore." You know, that kind of feeling. But then, you always do [miss Hawaii].

When he eats Hawaiian food, it gives him a momentary connection to home that seems to simultaneously feed his well-being and rejuvenate him. Although he longed to visit Hawaii, his financial circumstances prohibited it and only occasionally allowed him to eat in Hawaiian restaurants, which he perceived as "*the next best thing*" to visiting Hawaii. So, one way he accesses Hawaiian food is through a Native Hawaiian co-worker who sometimes brings him poi and other Hawaiian foods. He described such experiences by stating:

It [the poi] is so—it's like gold! He [participant's co-worker] has friends from Hawaii that comes over and brings him some smoked meat, and he freezes it, and he gives it to me, and it's like – I treasure it, you know, because I haven't eaten that in years. So when you get it, you're like, "oh my God, thank you so much!" You're so grateful. And, when you're eating it, you smell the trees, you know. I used to love to go up in the mountains and just walk and just sit down and lean against the trees and look around, and you miss that. You know, the food you eat, and all that, it just brings you back [to Hawaii]. (M-30s-#15) While he clearly enjoys the food, the sharing of it seems to strengthen a treasured friendship, which he also enjoys. Like this participant, others also described an array of positive, well-being enhancing emotions and memories when eating Hawaiian food.

The many Hawaiian restaurants in Las Vegas are not only access points for Hawaiian food; they are also likely locations to connect with other Native Hawaiians. For some, this is an added incentive to eat in Hawaiian restaurant. F-50s-#18 described the role of Hawaiian restaurants in relieving homesickness when she stated:

Because people [Native Hawaiian migrants] are homesick, the emotional tie of eating that reminds them of being back home and what they miss because they're far away. . . . That's how I see them feeling very connected to where they came from is by the food they eat. And another thing too – that's where the Hawaiians gather [at Hawaiian restaurants]. So, they know they're gonna run into somebody from Hawaii. I mean, how could you not?

Hawaiian food is integral to Hawaiian culture and brings Native Hawaiians together. Thus, the role of Hawaiian food in Las Vegas may be even more important to well-being in Las Vegas than it is in Hawaii, where they were more likely to connect regularly with other Native Hawaiians.

Pleasure from eating Hawaiian food did not differentiate participants whose wellbeing suffered from those who maintained their well-being; no one felt Hawaiian food diminished well-being. However, 1 participant whose well-being suffered felt her access to familiar fresh fruits and vegetables was not good. F-50s-#13 expressed that the watercress, papaya, mangos, and pineapples were not good quality and very expensive, so she does not buy them in Las Vegas. It is important to note that many participants were recruited through fliers placed at Hawaiian restaurants throughout the Las Vegas area or by referral from friends who were recruited through these fliers. This is noteworthy because they all enjoyed eating Hawaiian food. It is possible that some Native Hawaiians in Las Vegas do not enjoy Hawaiian food and are quite different in this important way from the participants in this study.

Factors that negatively impact well-being. There were a couple of themes across interviews that had only negative impact on well-being. One was participants' perceptions of other people in Las Vegas as rude, and the second was disagreement between partners or spouses regarding the decision to migrate to Las Vegas.

Several participants, including all 5 participants whose well-being suffered in Las Vegas and some who maintained their well-being, discussed experiences in which they perceived rudeness in other people in Las Vegas. In fact, for M-40s-#16:

The most difficult part [of migration] is getting accustomed to the attitude and the way of living and their mindset. It's like – their rudeness here. . . . They cut right in front of you. Like we can go to Wal-Mart, we're just pushing our cart around, and they just cut right in front of you, or cut in line, or just bang your wagon and don't say "excuse me," I think one of the major differences is – Hawaii we're raised and taught it's not about self. It's about others. And here, they're raised – it's about self. . . . They're not concerned about anybody else in the Wal-Mart, because it's all about self. But we're raised – if we're walking and see an elder, if you [we] see children, "oh honey, come on," you know. You back away. You let them go. Here – they don't care. [They say], "Move outta my way! And if I ram

you, so what?" You know, and that you find in every aspect of your career, your working, your neighbors, your drivers, the clerks at the grocery store, your doctor's office, in general, you know, your banking institution.

The difference in focus, on self or others, seems to have its roots in upbringing or culture. As the newest and most distant state, Hawaii could well be the least Westernized state in the country. In particular, Native Hawaiians seem more concerned about others than many residents in Las Vegas, who numerous participants expressed, were selfishly concerned about themselves. With few exceptions, participants perceived this focus on self as "rude," and they became angered or saddened by encounters with people they perceived to be rude.

Only one participant commented that people in Las Vegas were friendly, and this perception had an important impact on him. When asked what was better about Las Vegas than he hoped it would be before migrating, M-30s-#15 paused and then responded:

It would probably be the people. I thought they weren't friendly. I don't know – you see things on TV. I think it was New York or whatever, you see people who are totally like, "Get away from me!" You know, that kind of thing. I thought it was like it here, because I've never been to a big city. So, I figured all big cities was the same. And when I got here, I was amazed on how nice people were. . . . I mean, don't get me wrong, there's some kinda mean people out there, but I was surprised! From what I've seen and how I've introduced myself, people are willing to say hi. When you go, "Hey, hi!" They're like, "Oh! Hi!" instead of being like, "Hey! Screw you!" So, it really surprised me about the people. It took me a while to answer that, but now that I realize, ya, it was the people.

Though it may seem a small thing, his positive perception of others made an important difference in his life. It helped him feel more at ease and bolstered his courage to interact with others, which resulted in discovery of previously unrealized capacities and personal growth. As a young adult, he likely would have experienced some personal growth if he had remained in Hawaii, but, encouraged by the way others treated him in Las Vegas, he took advantage of many opportunities that would not have been available in his hometown. The consequences were achievement and enhanced self-confidence.

The detrimental impact of disagreement between partners or spouses regarding the decision to migrate is interesting to consider. Of the 20 participants who were married or in committed relationships, 4 had major disagreements with their significant other about migrating. In each case, the partner who did not want to migrate had great difficulty adjusting to life in Las Vegas.

Among the 5 participants whose well-being suffered in Las Vegas, 3 had opposed migration but migrated at the insistence of their significant other. Their reluctance to migrate seems to play a key role in their diminished well-being. For F-50s-#27, pangs of regret began as soon as she saw Las Vegas. She related:

When we were flying in, I looked out the window, and the first thing I said was, "What the hell did I do?" And I was like, "What the hell are you doing (participant's name)? You're so dumb, you're so stupid. What the hell are flying into Vegas for, following a man?" Despite what seems to be a healthy, strong relationship, she demeaned herself for joining her boyfriend in Las Vegas. Ten years have passed since that day, and she remains unhappy with her life in Las Vegas and continually yearns for Hawaii. She is married now and says her husband has been very supportive; they have agreed to re-migrate within a few years.

Likewise, when asked what brought her joy and gave meaning to her life, F-50s-#13 replied:

They are all at home in Hawaii. . . . I loved it. I love it. And so, to have to leave Hawaii and leave that, leave the halau [hula school], my kumu [hula instructor], cause I was really active in halau, and move here was really hard. . . . That [migration] was [participant's husband's] retirement dream. We had many discussions and fights before the move and after the move, and I couldn't get him to see a lot of things. I don't know if maybe he sees them now and will not admit it. You know, that man pride! Cause, ya, there have been a lot of issues that have come up that have totally frustrated him. So I cannot help but feel that he's feeling this move too.

Nearly 4 years later, the migration issue continues to be a significant source of friction between the participant and her husband. It seems that everything she values, except her husband, is in Hawaii. She tries to compensate by staying busy with her hobbies, but nothing seems to remedy her longing for home. Although she never directly addressed the possibility of re-migration, it was evident that she would gladly do so if her husband would agree to it. Only 1 participant among those who maintained well-being in Las Vegas told about spousal disagreement regarding migration. In this instance, the participant highly favored migration and readily embraced life in Las Vegas. On the other hand, his wife vehemently opposed migration and, after 7 years, still disliked living in Las Vegas. He said:

I tell you the truth – I like it here. My wife took 2¹/₂ years. She hated this place. She made a comment when we are back in Hawaii, "if we ever had a house," which we didn't. We went from apartment to apartment. . . . We never had a house. [She said], "if we ever have a house, yard, blah, blah, blah." Now we have one, but it's in the wrong state! It took her about 2¹/₂ years to finally accept that Vegas is okay. If she was here, and you ask her if [she] likes it here, she will tell you "no." Ask me, I'll tell you "yep." (M-60s-#1)

He apparently noticed some change in his wife's attitude 2½ years after migrating; nevertheless, he recognizes that her aversion to Las Vegas remains intact. As he described her unhappiness with being away from their children and the places she loved, it seemed apparent that her well-being had suffered in Las Vegas.

Migration is a major turning point. It appears that those who migrate at someone else's insistence may be at increased risk for long term diminished well-being. Future research on the role of spousal consensus in migration adjustments could help determine its relevance and identify interventions to help maintain personal well-being and harmony within committed relationships.

Conclusion

When putting a jigsaw puzzle together, many people assume that each piece fits in a specific location and proceed with the goal to have all the pieces come together and resemble the picture on the box. Each piece is carefully analyzed to determine its place in relation to the other pieces and to the whole. This process is time-consuming and sometimes tedious, but one can rely on the right answer, the picture on the box, for guidance. Once the pieces all fit together, the puzzle is solved.

Putting together a puzzle as complex as well-being is far more challenging. It feels like a multi-dimensional puzzle tucked inside a riddle and bound with a question mark. Indeed, this puzzle has unique challenges. The pieces that go along the edge might not all have a straight side, making it difficult to know where to start. Instead of fitting in one specific location, a few pieces might fit interchangeably but not blend aesthetically unless correctly positioned. Still other pieces change over time and need to be reshaped or even replaced, and a few are missing because so little is known about them. Perhaps the hardest part of all is that there is no picture on the box. There is no right answer. Well-being is so individualized that each person determines the form and function of his or her completed puzzle.

Nevertheless, there are commonalities in participants' well-being puzzles. Many experienced increased vulnerability shortly after migration when both health and wellbeing seemed somewhat at risk. In addition, there were certain elements that, when encountered, seemed consistently harmful, such as activity-limiting poor health, perceptions of others as rude, and disagreement between partners about migration. Although only a few participants experienced activity-limiting poor health and disagreement between partners, numerous participants perceived other people in Las Vegas as rude.

Despite these discouraging factors, most participants had positive attitudes and determined to make the best of the opportunities associated with migration. They continued to find meaning and joy in their lives, often by slightly reshaping their puzzle pieces or adapting to their new circumstances the same kind of experiences they had always valued. Specifically, they maintained their well-being through family, friends, financial security, independence, service to others, nature, safety, travel, and several aspects of Hawaiian culture, including crafts, music, and food. In fact, migration allowed some participants to recreate their well-being into a more pleasing form. This was perhaps the most eloquently explained by M-40s-#10 as he reflected on his well-being since migration. He stated:

The best [part of migration] was, I think, just like turning over a new leaf. The move was so huge for us that it is almost – closing a chapter to this book, and opening up a whole new one, or possibly closing a book and opening a whole new one for us, and for me. I was just feeling kinda burned out on the island. It has brought about a new beginning.

Unfortunately, not all participants had such positive feelings about migration. A few were deeply burdened by longing for special places, friends, and family in Hawaii, and this wounded their well-being. Compared to participants who maintained their wellbeing, they were more likely to identify barriers to well-being than ways to foster it. This handful of participants and other Native Hawaiian migrants like them are of particular concern. For them, several puzzle pieces were unruly, misshapen, or absent. They are the ones who could benefit most from nursing intervention. Although it might not be possible to help every Native Hawaiian migrant maintain well-being, the following chapter contains implications for practice that may be of assistance.

Chapter Five

Discussion

There is a paucity of research on the health of Native Hawaiian migrants to the U.S. mainland. This study began with the goal of gaining an understanding of the impact of migration from Hawaii to Las Vegas on Native Hawaiian migrants' perceptions of health and well-being. A qualitative descriptive design was used to allow 27 Native Hawaiian participants to share how their migration experiences impacted their perceptions of health and well-being. Data analysis revealed that with few exceptions, most participants who migrated from Hawaii to Las Vegas perceived no health changes related to migration and minor changes in their well-being. This chapter contains discussion of this study's contributions to the literature on health and migration and to the literature on health perceptions, limitations of the study, and implications for nursing practice, health policy, and future research.

Migration and Health

As discussed in Chapter Two, no research was located that specifically focused on Native Hawaiian migrants' health and well-being; however, there is a large body of research on the impact of migration on migrant health. In addition to providing fundamental information about Native Hawaiian migrants' health and well-being, this study contributes to the broader literature on migration and health. One fundamental difference between this study and much of the literature is that health perceptions were qualitatively explored rather than quantitatively measuring health indicators and outcomes, such as BMI, blood pressure, or mortality rates. This difference is important to remember when comparing and contrasting the findings of this study and many other studies. The literature on migration and health is extremely complex and contradictory, with some studies showing migrants experience poor health and other studies showing migrants experience good health. Findings from this study will be compared to the literature showing poor health in migrants and to the literature showing good health in migrants. In addition, the application of transition theory to findings in this study will be discussed.

Comparison to literature showing poor health in migrants. In contrast to the part of the literature in Chapter Two that indicated deteriorating health in voluntary migrants, most participants in this study perceived their own health to be unchanged as a result of migration. This differs from much of the research in which either measurable health outcomes or participants' perceptions of their own health were examined. For instance, Sundquist (1995) found that Southern European labor migrants were more likely than Swedes to rate their own health as poor; Newbold and Danforth (2003) found that foreign born migrants experienced a steady decline in self-rated health and other health indicators with increasing length of Canadian residency; and Uretsky and Mathiesen (2007) found the odds of foreign-born residents assessing their own health as poor increased with length of California residency.

There are a few possible explanations for the differences between findings from this study and studies like those presented above. First, unlike this study, most of the reviewed studies involved international migrants to whom the acculturation hypothesis may apply. The acculturation hypothesis is that migrants adopt the unhealthy cultural health practices of their new host countries and subsequently experience declining health (Franzini & Fernandez-Esquer, 2004). This hypothesis may not apply as well, however, to participants in this study who migrated within their country of origin. In other words, healthy and unhealthy cultural practices may be similar enough in Hawaii and Nevada that migration has little impact on Native Hawaiian migrants' health practices. Another possible explanation is that participants in this study who had health challenges were reluctant to connect them with migration, attributing them instead to aging or poor nutrition. As discussed in Chapters Two and Four, health and well-being are very complex concepts, influenced by many factors. In this qualitative descriptive study, participants were free to discuss the influence of a variety of factors on their health and well-being rather than respond to a predetermined checklist as would be the case in quantitative descriptive studies. Thus, the depth of exploration in this study may help explain why participants in quantitative studies on migration and health might not have had that opportunity.

Comparison to literature showing good health in migrants. Findings from this study support the body of literature demonstrating unchanged or good health in migrants. Without a comparison group in Hawaii, it is difficult to unequivocally state that this study supports the health migrant hypothesis, which is that people who voluntarily choose to migrate are typically in better health than either their ethnic counterparts born in Western host countries or their non-migrating peers in their places of origin (Franzini & Fernandez-Esquer, 2004; Frisbie et al., 2001; Marmot, Adelstein, & Bulusu, 1984; Messias, 1997; Messias & Rubio, 2004; Singh & Miller, 2004; Uitenbroek & Verhoeff, 2002; Wingate, Swaminathan, & Alexander, in press).

This study's unique contribution to the body of literature showing unchanged or good health in migrants again resulted in part from the design and method, which allowed participants' voices to be heard as they discussed the benefits and detriments of migration. This allowed health, well-being, and migration to be examined from a different angle than quantitative studies in which mortality rates, birth outcomes, or risk of illness were studied and demonstrated health benefits from migration. For instance, one rather unexpected finding in this study was the importance young adult migrants placed on the independence they gained as a result of migrating away from their parents. This newly found independence contributed greatly to their well-being and would have been difficult to discover in a quantitative study, especially if it had been unanticipated a priori.

Transition Theory. It is interesting to consider the findings of this study through the lens of Transition Theory, which provides an enlightening framework of the components and processes of transition. Meleis, Sawyer, Im, Hilfinger Messias, and Schumacher (2000) identified migration as one type of transition, and the actual physical relocation is "an identifiable marker event," meaning that it is an easily identified event in the migration transition (p. 21). They further explained that there are "critical points and events" in transitions, which are marked by "increasing awareness of change or difference or more active engagement in dealing with the transition experience. . . periods of uncertainty. . . [and] periods of heightened vulnerability" (Meleis et al., p. 21). This is consistent with the finding in this study that the period shortly after physical relocation is a time of increased vulnerability, when many participants experienced a period of diminished health and well-being. This critical time is also supported by findings in the

literature. For instance, participants in Elliott and Gillie's (1998) study experienced health declines shortly after migration and attributed the changes to stress and climate change; Baron-Epel and Kaplan (2001) found that recent migrants from the Former Soviet Union in Israel were more likely to report suboptimal health than migrants who had lived in Israel longer; and Steffen and associates (2006) found that effect sizes of acculturation on BP were greatest during the first few years in a new location, and decreasing effect sizes corresponded to the length of time the migrants remained in the new location and to their level of acculturation. Thus, the results of this study and the studies cited above suggest that the period shortly after migration is a time of increased vulnerability and is one of the "critical points and events" in Transition Theory (Meleis et al., 2000, p. 21).

Specific components of Transition Theory that seem particularly applicable to this study include the positive "process indicators" identified as "feeling connected," "interacting," and "developing confidence and coping" that lead to the "outcome indicator" of "mastery" (Meleis et al., 2000, p. 17). Consistent with "feeling connected" and "interacting," many participants found positive, supportive connections through relationships and interactions with their Native Hawaiian friends and extended family. As one participant explained, gathering with Native Hawaiian friends in Las Vegas "*help[s] us like stay sane I guess*" (M-20s-#6). This is consistent with the literature demonstrating that ethnic enclaves provide much of the social support found in migrants' places of origin (Callister & Birkhead; Flaskerud & Kim, 1999; Hattar-Pollara & Meleis, 1995; Hull, 1979; Messias, 2002). Additionally, "developing confidence and coping" and "mastery" might help explain why some participants maintained their well-being and

others experienced diminished well-being after migration. Participants who maintained well-being experienced multiple successes since migrating, and their confidence grew. They seemed to thrive in their new environment and were determined to make the best of the opportunities migration afforded them. By comparison, participants who experienced fewer successes struggled with feelings of uncertainty and occasionally doubted the wisdom of their decision to migrate. Such doubts might contribute to the diminished well-being some participants experienced in Las Vegas.

According to Transition Theory, anticipatory preparation before physical relocation impacts transition. Meleis et al. (2000) identified lack of anticipatory preparation as a transition inhibitor. In other words, when people do not know what to anticipate, they often have difficulty adjusting. Participants in this study were not asked about anticipatory preparation, but some whose well-being suffered expressed that Hawaii *"seems like a whole other world"* (M-40s-#16). Meleis et al. identified this type of expression as an indication of a lack of anticipatory preparation, which may help explain the difficult adjustment some participants in this study experienced.

Another piece of Transition Theory that informs this study is the recognition that "community conditions" impact the transition process of migrants (Meleis et al., 2000, p. 23). One community condition Meleis et al. identified that facilitates transition for migrants is the presence of ethnic restaurants and other businesses within a community. This is in harmony with the importance Native Hawaiian participants placed on Hawaiian restaurants in Las Vegas. Participants in this study enjoyed eating at Hawaiian restaurants because the food was a comforting reminder of home and because these restaurants were likely places to encounter other Native Hawaiians and renew or begin friendships. Interestingly, Meleis et al. also said that distrust prevents some migrants from engaging in their ethnic communities. This description fit a few participants in this study who were distrustful of other Native Hawaiians in Las Vegas and the Brazilian migrants in Australia who participated in da Silva and Dawson's (2004) study.

One interesting finding in this study was the difficulty participants experienced if their significant other wanted to migrate, but the participant did not. In these situations, reluctant migrants experienced great difficulties adjusting to life in Las Vegas. Migration adjustments are complex and are the result of multiple factors beyond the discrete decision to migrate. Nevertheless, discord about the migration decision is probably a factor in their difficult adjustments, and Transition Theory can help explain this. For instance, Meleis et al. (2000) stated, "the meanings attributed to events precipitating a transition and to the transition process itself may facilitate or hinder healthy transitions" (p. 21-22). Participants who were reluctant migrants perceived migration as a separation from special friends, family, and place. In contrast, they related that their significant others perceived migration as an opportunity for a new adventure or improved circumstances. Thus, participants who migrated reluctantly attached a negative meaning to migration, which might have hindered their transition.

Health Perceptions

The findings from this study also contribute to the literature on health perceptions. In this study, participants with activity-limiting health challenges perceived their health to be poor and experienced diminished well-being. This is consistent with other researchers' findings that when assessing their own health, people consider limitations on physical functioning, rather than the physical disorders or chronic illnesses themselves (Arnold et al., 2006; Benyamini, Idler et al., 2000; Manor, Matthews, & Power, 2001). In other words, when chronic conditions limit the ability to care for oneself or participate in valued activities, poor health is perceived.

By comparison, participants in this study who had chronic illnesses that did not limit activity perceived their health to be quite good. In such cases, health challenges had little impact on well-being. One participant was especially interesting because he had a lengthy list of chronic conditions, yet he maintained a positive attitude and perceived himself to be in the "*best shape of my life*" (M-60s-#1). His chronic conditions had not prevented him from going to the gym several times a week to enjoy exercise and socialization. Thus, his multiple chronic conditions did not limit his activity or damage his perceived health.

Another component of health perceptions identified in the literature was sense of place, defined as an "at-homeness involving a sense of insidedness" – understanding the everyday norms, values, and individual role expectations associated with life in a particular community (Cuba & Hummon, 1993, p. 549). Oneha (2000; 2001) discovered Native Hawaiians residing in Waianae, Hawaii had a strong sense of place, which contributed to their sense of health and well-being. By comparison, participants in this study were asked where home is for them now. Only 4 participants exclusively identified Las Vegas as home. The remaining participants either identified Hawaii as home (n=13) or both Hawaii and Las Vegas as home (n=9). Participants who identified Las Vegas as home enjoyed living in Las Vegas and seemed comfortable. Those who identified both Las Vegas and Hawaii as home and some who exclusively identified Hawaii as home also seemed comfortable in Las Vegas. However, participants who migrated reluctantly

at someone else's insistence were among those who exclusively identified Hawaii as home, and they were unhappy in Las Vegas. It seemed their diminished well-being could be partially explained by living somewhere other than the location to which they felt a strong sense of place. Thus, the findings of this study suggest that, depending on the situation, a sense of place can have a positive or negative impact on the well-being of some migrants.

Limitations of the Study

Like any study, this study has some limitations. The identified limitations include: 1) the uniqueness of the setting, 2) representativeness of the sample, and 3) the ethnicity of the researcher.

Uniqueness of the setting. Las Vegas is a unique location for several reasons. First of all, it is rapidly growing. In fact, as discussed in Chapter Three, Las Vegas was the fastest growing metropolitan area in the U.S. between the 1990 and 2000 censuses (Perry & Mackun, 2001). People move to Las Vegas from a variety of locations, resulting in a population that is mostly new to the area. This can be challenging for migrants as M-30s-#14 explained:

Everybody [in Las Vegas] is a transient from somewhere else, LA, Utah, Arizona, New Mexico, Idaho, Wyoming, Hawaii. . . . That's what I think is hard about living in Vegas is that everybody is from somewhere else. So, it's hard adapting to everybody else's cultures, you know, how they grew up. People in LA grew up different than people in Wyoming.

Complicating matters further is an impression that people do not move to Las Vegas with the intention of living there long term. For example, M-40s-#10 stated, "*I understand Las*

Vegas has a 4 year turn-around time," which meant that people who move to Las Vegas typically move away within 4 years. These two factors combine to create an impression that a large portion of the Las Vegas population is new to the area and does not plan to remain there for more than a few years. Thus, migrant experiences in rapidly changing Las Vegas communities might differ in important ways from locations with more stable populations.

Although the above comments by M-30s-#14 and M-40s-#10 were referring to the general population of Las Vegas, they likely apply to the Native Hawaiian population in Las Vegas as well. As discussed previously, most participants did not identify Las Vegas as their only home, and many expressed a desire to eventually re-migrate. Native Hawaiians who migrate to other mainland U.S. locations might be more inclined to remain in those locations rather than re-migrate. This could make the Native Hawaiian population in Las Vegas quite different from Native Hawaiian populations in other mainland locations.

The climate is another factor that makes Las Vegas unique and could be one reason that participants wanted to re-migrate. Although Las Vegas winters are fairly mild and present few challenges, the heat of the summer surpasses typical summer temperatures in Hawaii. The average high temperature in Las Vegas during the summer months is 99 to 104 degrees Fahrenheit compared to average high temperatures in Honolulu of 87 and 89 degrees Fahrenheit (Weather Channel, 2008). Las Vegas is also much drier than Hawaii. Nevada has average yearly rainfall of 7.9 inches compared to 23.5 inches in Hawaii (Weather Channel). The harsh, dry summer heat contributes to the uniqueness of Las Vegas and presents a challenging adjustment for many participants and likely for other Native Hawaiian migrants. Other mainland locations, like California, have climates more comparable to Hawaii than Las Vegas, and Native Hawaiian migrants might not find the climate in these locations as challenging as it is in Las Vegas.

Representativeness of the sample. The sample was purposively selected; participants had to identify themselves as Native Hawaiian and have migrated from Hawaii to Las Vegas. These inclusion criteria fit the purpose of the study, and 27 Native Hawaiian adults participated. This number is slightly fewer than the sample size estimated before the study began (30 to 60 participants); however, saturation was reached in the major categories, and further sampling was not required. The sample reflected the Native Hawaiian population in Las Vegas with the exception of a male gender bias (59.3% male) and being somewhat more educated than the population of interest. Additionally, the relatively small, purposively selected sample fit the theoretical underpinnings of the study and allowed in-depth analysis of participant responses. The results are transferable, based on the readers' assessment of similarities to other Native Hawaiian migrant populations of interest.

Nevertheless, it is important to remember that, like any qualitative study, the results do not prove causation. As discussed in Chapter Four, most participants made a variety of adjustments that helped maintain their well-being, but 5 participants either did not make these adjustments or made a few adjustments that were insufficient to maintain their well-being. Failure to make important adjustments might explain, at least in part, why some participants experienced diminished well-being, but other potential explanations exist. For example, the proportion of the sample that experienced diminished well-being is small and might not be different from the proportion of the

general population that experience diminished well-being for an array of reasons, many of which have nothing to do with migration. An alternative explanation is that at least some of the 5 participants whose well-being suffered in Las Vegas might have had emotional or psychological vulnerabilities that were either more damaging to their well-being than migration or impaired their ability to make the adjustments necessary to maintain well-being. So, while there seems to be an association between migration and diminished well-being for some of the participants, the results of this study cannot determine if migration led to their diminished well-being or vice versa, or if the association between migration and health is a complex, reciprocal interaction.

It is also important to consider what might not have been learned because of differences between participants and non-participants. As mentioned in Chapter Four, many participants were recruited through fliers placed at Hawaiian restaurants throughout the Las Vegas area or by referral from friends who were recruited through these fliers. This is noteworthy because participants all discussed enjoying Hawaiian food. It is possible that some Native Hawaiians in Las Vegas do not enjoy Hawaiian food and differ from participants in this regard. Likewise, most participants were involved in Hawaiian culture in some way, and Native Hawaiians who are not involved in Hawaiian culture might be less likely to participate in a study like this and could have experiences, interests, and opinions quite different from those of the participants. Among Native Hawaiian migrants that did not participate are those with major health challenges who did not feel well enough to participate and those who were dissatisfied with Las Vegas and re-migrated to Hawaii or migrated elsewhere. Their experiences might differ in important ways from those of participants. *Ethnicity of the researcher*. It is important to note that the researcher is not Native Hawaiian but does have a lifelong interest in Hawaiian culture and a deep respect for Native Hawaiians. Despite differences in ethnic backgrounds, the participants appeared to be comfortable with the researcher. Nevertheless, there may have been things they might have told a Native Hawaiian researcher that they were not willing to divulge to the researcher. In addition, the researcher had to be vigilantly mindful of her positive bias toward Native Hawaiians and guard against it by sampling as broadly as possible; asking interview questions about both positive and negative experiences and perceptions; ensuring that the full spectrum of the codes, categories, and themes had been analyzed; and presenting the findings with intellectual honesty, even when they did not necessarily reflect well on Native Hawaiians.

Ultimately, the researcher's perspective is etic or that of an outsider. Had the researcher been a Native Hawaiian living in Las Vegas, she would have had an insider's or emic perspective, which may differ from the etic perspective.

Implications for Practice

This study provides nurses and other health care providers with a deeper understanding of the impact of migration on the health and well-being of Native Hawaiian migrants in Las Vegas. Such understanding can lead to improved health care interactions and interventions to help ease challenges related to migration. This section explores implications for practice.

Although most participants perceived little impact on their health and well-being as a result of migration, the period shortly after migration appears to be a period of increased vulnerability. This underscores new migrants' need for early access into the health care system. Once access is gained, health care providers would be well advised to educate newly arrived Native Hawaiian migrants about the possibility of a perceived decline in health and well-being shortly after migration and to explore adaptive behaviors that could be helpful. Possible interventions based on the results of this study include: 1) encouraging participation in activities that Native Hawaiian patients value because participants' perceived health declined when such activities were limited, and their wellbeing improved when they participated in valued activities; 2) discussing any safety concerns and problem-solving to identify actions that could be taken to improve their sense of safety because participants who felt unsafe in Las Vegas experienced diminished well-being; and 3) exploring the nutritional habits of Native Hawaiian patients and, if needed, collaborating on culturally appropriate adjustments to their diet that could help prevent obesity-related illnesses.

When interacting with Native Hawaiian patients, health care providers would do well to remember the tendency for participants in this study to perceive people from the mainstream U.S. culture as self-focused and rude. Participants identified simple things, such as a smile or a warm greeting, that can go a long way in helping Native Hawaiians (and others) feel more comfortable. Simple acts of kindness can make a difference in health care encounters and, more importantly, in the well-being of others. In addition, when caring for Native Hawaiians who are hospitalized, it would be helpful to discuss whether Hawaiian music or items reminiscent of Hawaii would help them feel more at ease. It was surprising to learn that such music and items made a few participants feel more homesick rather than helping them feel more at home. So, it is important to be aware that what is helpful to some may be detrimental to others. A brief discussion can help the health care provider know what would be most helpful for each individual patient.

Finally, disseminating the key findings from this study with Native Hawaiians in Hawaii who are considering migration to Las Vegas would enlighten their pre-migration decision making process and is based on Meleis et al.'s (2000) finding that anticipatory preparation facilitates transition but the lack thereof inhibits transition. Information in lay terms could be shared in Hawaii during health care encounters or through pamphlets placed in clinic waiting rooms. Based on the findings in this study, key discussion points should include: 1) participants' health and well-being seemed most vulnerable during the period shortly after migration; 2) many migrants found financial advantages associated with migration to Las Vegas, but these advantages were not always as good as some participants had hoped for; 3) young adult participants found migration helped them establish their independence; 4) social support networks, whether extended family or friends, helped participants adjust to life in Las Vegas; 5) the climate and environment in Las Vegas can be a challenging adjustment for Native Hawaiian migrants; and 6) participants who migrated reluctantly at the encouragement of their significant other were susceptible to diminished well-being.

Implications for Health Policy

Access to health care is a compelling topic in the U.S. This study augments the statistics indicating a need to improve access to health care by letting some individual voices be heard. Participants in this study are unique because they have migrated from Hawaii, a state with legislation requiring employer-based insurance and a high percentage of the population that is insured, to Nevada, a state without such legislation and a lower

percentage of the population that is insured (Befitel, 2005; DeNavas-Walt et al., 2006; Pollitz et al., 2007). Thus, participants have had the opportunity to experience both ends of the access to health care spectrum in this country. With few exceptions, participants seemed more satisfied with their access to healthcare in Hawaii than they are in Las Vegas. In particular, participants were concerned about disrupted care in Las Vegas that resulted from insurance issues. This suggests a need to improve access to health care in Las Vegas.

Access to health care in Nevada could be improved through various means. One helpful action would be to make information about where and how to access low-cost health care more readily available throughout the community. This might seem simplistic, but several participants indicated that they did not know where to go for health care. Making this information more readily available through social marketing via the media and billboards could help eliminate lack of awareness as a barrier to health care. Another action to improve the situation would be judicious legislation geared toward increasing the number of residents with insurance, Medicaid, or some other form of health care coverage. Nurses and other health care providers are well-equipped to help guide such efforts.

Implications for Research

Insofar as could be determined, this is the first study to explore Native Hawaiian migrant health and well-being in the U.S. mainland. In order to gain a better understanding of the impact of migration on Native Hawaiian health and well-being, similar studies could be conducted in other mainland locations or with Native Hawaiians who have re-migrated to Hawaii. Such studies would provide a broader and deeper understanding of frequently occurring challenges and further clarify direction for appropriate interventions.

An interesting finding in this study was that the period shortly after migration seems to be the most challenging. This is consistent with transition theory but deserves further exploration to determine what might be most helpful to Native Hawaiian migrants during this phase. A study involving participants who migrated within 1 year could further elaborate on the most challenging aspects during this critical time and help clarify appropriate interventions.

Another interesting finding was the significant role of food, particularly Hawaiian food, in migrants' lives. In Las Vegas, eating Hawaiian food was a comforting reminder of Hawaii, and restaurants that served Hawaiian food were important gathering spots for Native Hawaiians. This focus on food is important given the high rates of obesity and obesity-related illness, such as diabetes and hypertension, that Native Hawaiians experience (Hawaii State Department of Health, 2005; Hirokawa et al., 2004; U.S. Department of Health and Human Services Office of Minority Health, n.d.). Further study on the impact of migration on nutritional habits of Native Hawaiians could provide greater understanding of the cultural value placed on food and help identify culturally appropriate diet modifications that could help reverse the Native Hawaiian obesity rates. Insofar as migration impacts access to food, a two-site comparative study (Hawaii and a mainland location) could further illuminate changes in nutritional habits that might result from migration.

Finally, Native Hawaiians are not the only Pacific Islander group migrating to the U.S. mainland. Other groups include Tongans, Samoans, and Fijians. Studies involving

161

participants from these groups could identify similarities and differences in migration experiences and their impact on health and well-being. Important cultural differences exist between the various Pacific Islander groups, and it should not be assumed that interventions appropriate for Native Hawaiians would be equally appropriate for other Pacific Islander migrant groups.

Summary

Through this qualitative descriptive study, a deeper understanding has been gained of the impact of migration on the health and well-being of Native Hawaiians in Las Vegas. Overall, they have adjusted admirably to their new circumstances and maintained their health and well-being. Even when participants identified changes in their health, they usually attributed them to nutrition or aging rather than to migration. Participants found joy through family, friends, financial security, independence, service to others, nature, safety, travel, and various aspects of Hawaiian culture, including crafts, music, and food. What brought them joy and gave meaning to their lives did not change as a result of migration, but participants usually had to adapt these activities and relationships to their circumstances in Las Vegas. A few participants were deeply burdened by life in Las Vegas or longing for Hawaii and are perhaps most in need of attention. It is hoped that this research will increase awareness of Native Hawaiian migrants in Las Vegas and elsewhere on the U.S. mainland and help health care providers recognize the strengths and challenges of this unique group and collaborate with them to improve their health and well-being.

References

- ABC stores. (2004). ABC news and events. Retrieved August 16, 2006, from http://www.abcstores.us/news_events.html
- Abraido-Lanza, A. F., Chao, M. T., & Florez, K. R. (2005). Do healthy behaviors decline with greater acculturation?: Implications for the Latino mortality paradox. *Social Science and Medicine*, 61, 1243-1255.
- Abraido-Lanza, A. F., Dohrenwend, B. P., Ng-Mak, D. S., & Turner, J. B. (1999). The Latino mortality paradox: A test of the "salmon bias" and healthy migrant hypotheses. *American Journal of Public Health*, 89(10), 1543-1548.
- Alexander, G. R., Mor, J. M., Kogan, M. D., Leland, N. L., & Kieffer, E. (1996).
 Pregnancy outcomes of U.S.-born and foreign-born Japanese Americans.
 American Journal of Public Health, 86(6), 820-824.
- Antecol, H., & Bedard, K. (2006). Unhealthy assimilation: Why do immigrants converge to American health status levels? *Demography*, *43*(2), 337-360.
- Arnold, R., Ranchor, A. V., Koeter, G. H., de Jongste, M. J. L., & Sanderman, R. (2006).
 Consequences of chronic obstructive pulmonary disease and chronic heart failure: The relationship between objective and subjective health. *Social Science and Medicine*, 61, 2144-2154.
- Associated Press. (2003). *Hawaii's uninsured population grows*. Retrieved August 23, 2006, from http://www.cnn.com/2003/HEALTH/10/21/hawaii. uninsured.ap/index.html

- Associated Press. (2006). *Two analysts say Las Vegas housing overpriced*. Retrieved October 14, 2006, from http://www.lasvegassun.com/sunbin/stories/nevada /2006/sep/17/091710546.html
- Association of Asian Pacific Community Health Organizations. (n.d.). *Native Hawaiian*. Retrieved March 2, 2006, from http://www.aapcho.org/site/aapcho/content. php?type=1&id=9694&print=1

Baker, D. J. (1997). Ea and knowing in Hawaii. Critical Inquiry, 23(3), 640-659.

- Baron-Epel, O., & Kaplan, G. (2001). Self-reported health status of immigrants from the former Soviet Union in Israel. *Israel Medical Association Journal 3*, 940-946.
- Benyamini, Y., Blumstein, T., Lusky, A., & Modan, B. (2003). Gender differences in the self-rated health-mortality association: Is it poor self-rated health that predicts mortality or excellent self-rated health that predicts survival? *The Gerontologist*, *43*(3), 396-405.
- Benyamini, Y., Idler, E. L., Leventhal, H., & Leventhal, E. A. (2000). Positive affect and function as influences on self-assessments of health: Expanding our view beyond illness and disability. *The Journal of Gerontology*, 55B(2), 107-116.
- Benyamini, Y., Leventhal, E. A., & Leventhal, H. (1999). Self-assessments of health.What do people know that predicts their mortality? *Research on Aging*, 21(3), 477-500.
- Benyamini, Y., Leventhal, E. A., & Leventhal, H. (2000). Gender differences in processing information for making self-assessments of health. *Psychosomatic Medicine*, 62, 354-364.

- Bhattacharya, G., & Schoppelrey, S. L. (2004). Preimmigration beliefs of life success, postimmigration experiences, and acculturative stress: South Asian immigrants in the United States. *Journal of Immigrant Health*, 6(2), 83-92.
- Blaisdell, K. (1999). Sovereignty advocate. In M. J. Harden (Ed.), Voices of wisdom: Hawaiian elders speak (pp. 102-111). Kula, HI: Aka Press.
- Blaisdell, R. K. (1993). The health status of the kanaka maoli. *Asian American and Pacific Islander Journal of Health*, 1(2), 116-160.
- Brouwer, W. B. F., & van Exel, N. J. A. (2005). Expectations regarding length and health related quality of life: Some empirical findings. *Social Science and Medicine*, 61, 1083-1094.
- Brown, H. L., Chireau, M. V., Jallah, Y., & Howard, D. (2007). The "Hispanic paradox": An investigation of racial disparity in pregnancy outcomes at a tertiary care medical center. *American Journal of Obstetrics & Gynecology*, 197, e1-e9.
- Brown, J. S., & Rawlinson, M. (1975). Relinquishing the sick role following open-heart surgery. *Journal of Health and Social Behavior*, *16*, 12-27.
- Burroughs, T. E., Desikan, R., Waterman, B. M., Gilin, D., & McGill, J. (2004).Development and validation of the Diabetes Quality of Life Brief Clinical Inventory. *Diabetes Spectrum*, *17*(1), 41-49.
- Busch, J., Easa, D., Grandinetti, A., Mor, J., & Harrigan, R. (2003). Healthy people in Hawaii?: An overview of ethnic health disparities in Hawaii for the Healthy People 2010 initiative targeted health concerns. *Hawaii Medical Journal*, 62(1), 10-14.

- Callister, L. C., & Birkhead, A. (2007). Mexican immigrant childbearing women: Social support and perinatal outcomes. In D. R. C. Frane & T. Heaton (Eds). Families in poverty: An interdisciplinary approach, pp. 181-197. Thousand Oaks, CA: Sage.
- Central Intelligence Agency. (2008). *The 2008 world factbook*. Retrieved March 25, 2008, from https://www.cia.gov/library/publications/the-world-factbook/geos/us.html
- Chipperfield, J. G. (1993). Incongruence between health perceptions and health problems. *Journal of Aging and Health*, *5*(4), 475-496.
- Clark County Nevada. (n.d.). *About Clark County*. Retrieved July 22, 2006, from http://www.co.clark.nv.us/Public_communications/About_clark_county.htm
- Clark, S. L., & Weismantle, M. (2003). *Employment status: 2000. U.S. Census brief.* Retrieved October 7, 2006, from http://www.census.gov/prod/2003pubs/c2kbr-18.pdf
- Conrad, M. M., & Pacquaio, D. F. (2005). Manifestation, attribution, and coping with depression among Asian Indians from the perspectives of health care practitioners. *Journal of Transcultural Nursing*, 16(1), 32-40.
- Cooke, J. (2001). A report on the state of Native Hawaiian keiki in Hawaii. Honolulu, HI: Pacific American Research Center.
- Coward, R. T., Peek, C. W., Henretta, J. C., Duncan, R. P., Dougherty, M. C., & Gilbert,G. H. (1997). Race differences in the health of elders who live alone. *Journal of Aging and Health*, 9(2), 147-170.
- Cuba, L., & Hummon, D. M. (1993). Constructing a sense of home: Place affiliation and migration across the life cycle. *Sociological Forum*, 8(4), 547-572.

- da Silva, A. L., & Dawson, M. T. (2004). The impact of international migration on the health of Brazilian women living in Australia. *Texto Contexto Enferm*, 13(3), 339-350.
- De Jong, M. M. J., Moser, D. K., & Chung, M. L. (2005). Predictors of health status for heart failure patients. *Progress in Cardiovascular Nursing*, 20(4), 155-162.
- Denzin, N. K., & Lincoln, Y. S. (2005). *The Sage handbook of qualitative research* (3rd ed.). Thousand Oaks, CA: Sage
- Department of Health and Human Services Office of Inspector General. (2002). *Clinical trial websites: A promising tool to foster informed consent*. Retrieved July 6, 2006, from http://oig.hhs.gov/oei/reports/oei-01-97-00198.pdf
- DesMeules, M., Gold, J., Kazanjian, A., Manuel, D., Payne, J., Vissandjee, B., et al.
 (2004). New approaches to immigrant health assessment. *Canadian Journal of Public Health*, 95(3), 122-126.
- Elliott, S. J., & Gillie, J. (1998). Moving experiences: A qualitative analysis of health and migration. *Health & Place*, *4*(4), 327-339.
- Evans, J. (1987). Introduction: Migration and health. *International Migration Review*, 21(3), v-xiv.
- Finch, B. K., Kolody, B., & Vega, W. A. (2000). Perceived discrimination and depression among Mexican-origin adults in California. *Journal of Health and Social Behavior*, 41, 295-313.
- Flaskerud, J. H., & Kim, S. (1999). Health problems of Asian and Latino immigrants. *Nursing Clinics of North America*, *34*(2), 359-380.

- Forbes.com. (2006). *Most overpriced places*. Retrieved August 12, 2006, from http:// www.forbes.com/2006/07/10/cx_lr_0711featslide_4.html?thisSpeed=6000?forwa rdName=cx_lr_0711featslide
- Franklin, R. S. (2003). Domestic migration across regions, divisions, and states: 1995 to 2000. Washington, D.C.: U. S. Census Bureau.
- Franzini, L., & Fernandez-Esquer, M. E. (2004). Socioeconomic, cultural, and personal influences on health outcomes in low income Mexican-origin individuals in Texas. *Social Science and Medicine*, 59, 1629-1646.
- Frisbie, W. P., Cho, Y., & Hummer, R. A. (2001). Immigration and the health of Asian and Pacific Islander adults in the United States. *American Journal of Epidemiology*, 153(4), 372-380.
- Gallager, W. (1993). The power of places: How our surroundings shape our thoughts, emotions, and actions. New York: Harper Perennial.
- Garrity, T. F. (1973a). Social involvement and activeness as predictors of morale six months after first myocardial infarction. *Social Science and Medicine*, *7*, 199-207.
- Garrity, T. F. (1973b). Vocational adjustment after first myocardial infarction:Comparative assessment of several variables suggested in the literature. *Social Science and Medicine*, *7*, 707-717.
- Gasalberti, D. (2002). Early detection of breast cancer by self-examination: The influence of perceived barriers and health conception. *Oncology Nursing Forum*, 29(9), 1341-1347.
- Gmelch, G. (1980). Return migration. Annual Review of Anthropology, 9, 135-159.

- Goel, M. S., McCarthy, E. P., Phillips, R. S., & Wee, C. C. (2004). Obesity among U.S. immigrant subgroups by duration of residence. *Journal of the American Medical Association*, 292(23), 2860-2867.
- Guo, G., & Phillips, L. (2006). Key informants' perceptions of health care for elders at the U.S.-Mexico border. *Public Health Nursing*, 23(3), 224-233.
- Halualani, R. T. (2003). *Hawaiians at "home" on the mainland*. Retrieved January 6, 2006from www.pbs.org/pov/pov2003/americanaloha/pdf/aloha_mainland.pdf
- Hattar-Pollara, M., & Meleis, A. I. (1995). The stress of immigration and the daily lived experiences of Jordanian immigrant women in the United States. Western Journal of Nursing Research, 17(5), 521-539.
- Hawai'i Uninsured Project. (2006). *Health coverage update*. Retrieved August 23, 2006, from http://www.healthcoveragehawaii.org/pdf/Coverage%20Update. Feb%202006.pdf
- Hawaii Nation. (1993). United States public law 103-150. 103d Congress joint resolution 19. Retrieved March 17, 2006, from http://www.hawaii-nation.org/publawall.html
- Hawaii State Department of Health. (2005). *Hawaii health survey*. Retrieved August 26, 2006, from http://www.state.hi.us/health/statistics/hhs/hhs_04/index.html
- Helman, C. G. (2000). *Culture, health, and illness* (4th ed.). Oxford, England: Butterworth-Heinemann.
- Helmer, C., Barberger-Gateau, P., Letenneur, L., & Dartigues, J.-F. (1999). Subjective health and mortality in French elderly women and men. *Journal of Gerontology*, 54B(2), S84-S92.

- Hirokawa, R., Huang, T., Pobutsky, A., Nogues, M., Salvail, F., & Nguyen, H. D. (2004). *Hawaii diabetes report, 2004*. Retrieved August 26, 2006, from http:// www.hawaii.gov/health/family-child-health/chronic-disease/diabetes/ pdf/diabetesreport.pdf
- Howard, D. L., Marshall, S. S., Kaufman, J. S., & Savitz, D. A. (2006). Variations in low birth weight and preterm delivery among Blacks in relation to ancestry and nativity: New York City, 1998-2002. *Pediatrics*, 118(5), e1399-e1405.
- Hudson-Rodd, N. (1994). Public health: People participating in the creation of healthy places. *Public Health Nursing*, *11*(2), 119-126.
- Hull, D. (1979). Migration, adaptation, and illness: A review. Social Science and Medicine, 13A, 25-36.
- Hummer, R. A., Rogers, R. G., Nam, C. B., & LeClere, F. B. (1999). Race/ethnicity, nativity, and U.S. adult mortality. *Social Science Quarterly*, 80(1), 136-153.
- Kanahele, G. H. S. (1986). Kū kanaka, stand tall: A search for Hawaiian values.Honolulu, HI: University of Hawaii.
- King, K. M., Thomlinson, E., Sanguins, J., & LeBlanc, P. (2006). Men and women managing coronary artery disease risk: Urban-rural contrasts. *Social Science and Medicine*, 26, 1091-1102.
- Kirpalani, H. M., Parkin, P. C., Willan, A. R., Fehlings, D. L., Rosenbaum, P. L., King,D., et al. (2000). Quality of life in spina bifida: Importance of parental hope.*Archives of Disease in Childhood*, 83, 293-297.
- Knox, N. (2006, April 5). Second homes 40% of market. Highest level ever helps drive up prices. *USA Today*, p. 1.
- Koehn, P. H. (2006). Health care outcomes in ethnoculturally discordant medical encounters: The role of physician transnational competence in consultations with asylum seekers. *Journal of Immigrant and Minority Health*, 8(2), 137-147.
- L&L Franchise. (2004). *L&L Hawaiian barbeque*. Retrieved May 11, 2006, from www.hawaiianbarbecue.com/locations.html#
- Lal, B. V. (2004). *Pacific places, pacific histories*. Honolulu, HI: University of Hawaii Press.
- Las Vegas Hawaiian Civic Club. (2006). *Scholarship program*. Retrieved May 11, 2006, from http://lvhcc.org/ScholarshipInf_o.html#FAQ
- Lauderdale, D. S., Wen, M., Jacobs, E. A., & Kandela, N. (2006). Immigrant perceptions of discrimination in health care. *Medical Care*, *44*(10), 914-920.
- Lavretsky, H., Bastani, R., Gould, R., Huang, D., Llorente, M., Maxwell, A., et al.
 (2002). Predictors of two-year mortality in a prospective "UPBEAT" study of elderly veterans with comorbid medical and psychiatric symptoms. *American Journal of Geriatric Psychiatry*, 10(4), 458-468.
- Lee, R., Rodin, G., Devins, G., & Weiss, M. G. (2001). Illness experience, meaning and help-seeking among Chinese immigrants in Canada with chronic fatigue and weakness. *Anthropology and Medicine*, 8(1), 89-107.
- Leong, C. S. (1997). "You Local or what?" An exploration of identity in Hawaii. Unpublished doctoral dissertation, School of the Union Institute, Honolulu, HI.
- Leung, K. K., Tang, L. Y., & Lue, B. H. (1997). Self-rated health and mortality in Chinese institutional elderly persons. *Journal of Clinical Epidemiology*, 50, 1107-1116.

- Library of Congress. (1997). 105-19 *Hawaiian Homes Commission Act*. Retrieved May 11, 2006, from http://thomas.loc.gov/cgi-bin/cpquery/T?&report= sr019&dbname =105&
- Lucas, J. W., Barr-Anderson, D. J., & Kington, R. S. (2003). Health status, health insurance, and health care utilization patterns of immigrant black men. *American Journal of Public Health*, 93(10), 1740-1747.
- Luomala, K. (1989). Polynesian religious foundations of Hawaiian concepts regarding wellness and illness. In L. E. Sullivan (Ed.), *Healing and restoring health and medicine in the world's religious traditions* (pp. 287-326). New York: Macmillan.
- Lynch, R. (2000). *Aloha Air will launch daily Las Vegas service*. Retrieved September 4, 2006, from http://starbulletin.com/2000/10/05/news/story3.html
- Manor, O., Matthews, S., & Power, C. (2001). Self-rated health and limiting longstanding illness: Inter-relationships with morbidity in early adulthood. *International Journal of Epidemiology*, 30, 600-607.
- Marmot, M. G., Adelstein, A. M., & Bulusu, L. (1984). Lessons from the study of immigrant mortality. *The Lancet*, 8392, 1455-1457.
- Marmot, M. G., & Syme, S. L. (1976). Acculturation and coronary heart disease in Japanese-Americans. *American Journal of Epidemiology*, *104*, 225-247.

Marmot, M. G., Syme, S. L., Kagan, A., Kato, H., Cohen, J. B., & Belsky, J. (1975).
Epidemiologic studies of coronary heart disease and stroke in Japanese men living in Japan, Hawaii, and California: Prevalence of coronary and hypertensive heart disease and associated risk factors. *American Journal of Epidemiology, 102*(6), 514-525.

- Marshall, K. J., Urrutia-Rojas, X., Mas, F. S., & Coggin, C. (2005). Health status and access to health care of documented and undocumented immigrant Latino women. *Health Care for Women International*, 26, 916-936.
- Martin, S. F. (2001). Global migration trends and asylum. *Journal of Humanitarian Assistance*. Retrieved August 4, 2006, from http://www.jha.ac/articles/u041.htm
- McLaughlin, L. A., & Braun, K. L. (1998). Asian and Pacific Islander cultural values: Considerations for health care decision making. *Health & Social Work*, 23(2), 116-126.
- Meadows, L. M., & Morse, J. M. (2001). Constructing evidence within the qualitative project. In J. M. Morse, J. M. Swanson & A. J. Kuzel (Eds.), *The nature of qualitative evidence* (pp. 187-200). Thousand Oaks, CA: Sage.
- Meleis, A. I., Sawyer, L. M., Im, I.-O., Hilfinger Messias, D. K., & Schumacher, K. (2000). Experiencing transitions: An emerging middle-range theory. *Advances in Nursing Science*, 23(1), 12–28.
- Menec, V. H., Chipperfield, J. G., & Perry, R. P. (1999). Self-perceptions of health: A prospective analysis of mortality, control, and health. *Journal of Gerontology*, 54B(2), P85-P93.
- Messias, D. K. H. (1997). Narratives of transnational migration, work, and health: The lived experiences of Brazilian women in the United States. Unpublished doctoral dissertation, University of California San Francisco, San Francisco.
- Messias, D. K. H. (2002). Transnational health resources, practices, and perspectives:
 Brazilian immigrant women's narratives. *Journal of Immigrant Health*, 4(4), 183-200.

- Messias, D. K. H., & Rubio, M. (2004). Immigration and health. Annual Review of Nursing Research, 22, 101-134.
- Meyer, M. A. (1998). *Native Hawaiian epistemology: Contemporary narratives*. Unpublished doctoral dissertation, Harvard University, Boston.
- Miller, A. M., & Chandler, P. J. (2002). Acculturation, resilience, and depression in midlife women from the former Soviet Union. *Nursing Research*, 15(1), 26-32.
- Mishler, E. G. (1991). Representing discourse: The rhetoric of transcription. *Journal of Narrative and Life History*, 1(4), 255-280.
- Misra, R., Patel, T. G., Davies, D., & Russo, T. (2000). Health promotion behaviors of Gujurati Asian Indian immigrants in the United States. *Journal of Immigrant Health*, 2(4), 223-230.
- Morse, J. M. (2000). Determining sample size. Qualitative Health Research, 10(1), 3-5.
- Morse, J. M., & Field, P. A. (1995). *Qualitative research methods health professionals* (2nd ed.). Thousand Oaks, CA: Sage.
- Morse, J. M., & Richards, L. (2002). *Read me first for a user's guide to qualitative methods*. Thousand Oaks, CA: Sage.
- Mossey, J. M., & Shapiro, E. (1982). Self-rated health: A predictor of mortality among the elderly. *American Journal of Public Health*, 72(8), 800-808.
- Muennig, P., & Fahs, M. C. (2002). Health status and hospital utilization of recent immigrants in New York City. *Preventive Medicine*, *35*, 225-231.
- National Institutes of Health. (n.d.). *Historic development–National Institutes of Health*. Retrieved November 13, 2006, from http://oamp.od.nih.gov/NewsEvents/ NIHHistory/nihhistory.pdf

- National Institutes of Health Office of Human Subjects Research. (2000). *Guidelines for writing research protocols*. Retrieved July 6, 2006, from http://www.nihtraining. com/ohsrsite/info/sheet5.html
- National Low Income Housing Coalition. (2005a). *Out of reach 2005 Hawaii*. Retrieved December 14, 2005, from www.nlihc.org/oor2205/data.php?getstate =on&getcounty =on&county%5B%5D=_...
- National Low Income Housing Coalition. (2005b). *Out of reach 2005 Nevada*. Retrieved March 3, 2006, from http://www.nlihc.org
- Nevada Commission on Tourism. (2003). *Nevada tourism mission introduces Hawaiians to Reno-Tahoe attractions*. Retrieved September 4, 2006, from http://gov.state. nv.us/pr/2003/07-02TOURISM.htm
- Newbold, K. B., & Danforth, J. (2003). Health status and Canada's immigrant population. *Social Science and Medicine*, *57*, 1981-1995.
- Nichman, M. Z., Hamilton, H. B., Kagan, A., Grier, T., Sacks, S. T., & Syme, S. L. (1975). Epidemiologic studies of coronary heart disease and stroke in Japanese men living in Japan, Hawaii, and California: Distribution of biochemical risk factors. *American Journal of Epidemiology*, 102, 491-501.
- Office of Hawaiian Affairs. (2002). *Native Hawaiian data book: Statistical profile of the Hawaiian population in Hawaii*. Retrieved August 25, 2006, from http://www.oha.org/pdf/databook_6_02.pdf#search=%22life%20expectancy%20%2B% 20Native%20Hawaiians%22
- Ohlemacher, S. (2005). *Housing costs lifting rentals out of reach*. Retrieved December 14, 2005, from http://www.ksl.com/?sid=139058&nid=153

- Oneha, M. F. (2000). Ka mauli o ka 'āina a he mauli kānaka (The life of the land is the life of the people): An ethnographic study from a Hawaiian sense of place.
 Unpublished doctoral dissertation, University of Colorado Denver, CO.
- Oneha, M. F. (2001). Ka mauli o ka 'āina a he mauli kānaka: An ethnographic study from an Hawaiian sense of place. *Pacific Health Dialog*, 8(2), 299-311.
- Palafox, N. A., Buenconsejo-lum, L., Riklon, S., & Waitzfelder, B. (2002). Improving health outcomes in diverse populations: Competency in cross-cultural research with indigenous Pacific Islander populations. *Ethnicity & Health*, 7(4), 279-285.
- Papadopoulos, R., Lay, M., Lees, S., & Gebrehiwot, A. (2003). The impact of migration on health beliefs and behaviours: The case of Ethiopian refugees in the U.K. *Contemporary Nursing: A Journal for the Australian Nursing Profession, 15*(3), 210-221.
- Pearce, D., & Brooks, J. (2003). *The self-sufficiency standard for Hawaii*. Retrieved November 14, 2006, from http://www.sixstrategies.org/files/HI%20FESS %20fullreport%20FINAL1.pdf
- Perry, M. J. (2003). State to state migration flows: Census 2000 special reports. Retrieved August 4, 2006, from http://www.census.gov/prod/2003pubs/censr-8.pdf
- Perry, M. J., & Mackun, P. J. (2001). Population change and distribution: Census 2000 brief. Retrieved July 21, 2006, from http://www.census.gov/prod/2001pubs /c2kbr01-2.pdf
- Polit, D. F., & Beck, C. T. (2006). *Essentials of nursing research: Methods, appraisal, and utilization* (6th ed.). Philadelphia: Lippincott, Williams and Wilkins.

- Pourat, N. (2000). Perceptions of health and use of ambulatory care: Differences between Korean and White elderly. *Journal of Aging and Health*, *12*(1), 112-134.
- Prochaska, D. O., & DiClemente, C. C. (1983). Stage and processes of self-change of smoking: Toward an integrative model of change. *Journal of Consulting and Clinical Psychology*, 51, 390–395.
- Rakowski, W., & Cryan, C. D. (1990). Associations among health perceptions and health status within three age groups. *Journal of Aging and Health*, 2(1), 58-80.
- Razum, O., Zeeb, H., Akgun, H. S., & Yilmaz, S. (1998). Low overall mortality of Turkish residents in Germany persists and extends into a second generation: Merely a healthy migrant effect? *Tropical Medicine and International Health, 3*, 297-303.
- Razum, O., Zeeb, H., & Gerhardus, A. (1998). Cardiovascular mortality of Turkish nationals residing in West Germany. *Annals of Epidemiology*, 8, 334-341.
- Reed, D., Labarthe, D., & Stallones, R. (1995). Health effects of Westernization and migration among Chamorros. *American Journal of Epidemiology*, 142(7), 673-691.
- Reeder, S. (1999). Lagging Hawaiian economy has islanders landing in LV. Retrieved June 20, 2006, from www.lasvegassun.com/sunbin/stories/text/ 1999/jun/13/508920184.html
- Rhoades, D. A., Manson, S. M., Noonan, C., & Buchwald, D. (2005). Characteristics associated with reservation travel among urban Native American outpatients. *Journal of Health Care for the Poor and Underserved*, 16, 464-474.

Riessman, C. K. (1993). Narrative analysis. Newbury Park, CA: Sage.

- Rios-Bedoya, C. F., & Gallo, J. J. (2003). The association of alcohol use and depression among Puerto Ricans in the United States and in Puerto Rico. *Journal of Ethnicity in Substance Abuse*, 2(1), 1-13.
- Robertson, E., Iglesias, E., Johansson, S.-E., & Sundquist, J. (2003). Migration status and limiting long-standing illness: A longitudinal study of women of childbearing age in Sweden. *European Journal of Public Health*, 13(2), 99-104.
- Robertson, T. L., Kato, H., Rhoads, G. G., Kagan, A., & Marmot, M. G. (1977).
 Epidemiologic studies of coronary heart disease and stroke in Japanese men living in Japan, Hawaii, and California. Incidence of myocardial infarction and death from coronary heart disease. *American Journal of Cardiology, 39*, 239-243.
- Romero, H. G., & Hoffman, M. J. (1995). Cross-cultural caring: Positive outcomes in Hawaii. *Caring 14*(12), 26-30.
- Rona, R. J., Hooper, R., French, C., Jones, M., & Wessely, S. (2006). The meaning of self-perception of health in the UK armed forces. *British Journal of Health Psychology*, 11, 703-715.
- Ronellenfitsch, U., Kyobutungi, C., Becher, H., & Razum, O. (2006). All-cause and cardiovascular mortality among ethnic German immigrants from the former Soviet Union: A cohort study [Electronic Version]. *BMC Public Health*, 6.
 Retrieved December 1, 2007 from www.biomedcentral.com/1471-2458/6/16.
- Rubia, M., Marcos, I., & Muennig, P. A. (2002). Increased risk of heart disease and stroke among foreign-born females residing in the United States. *American Journal of Preventative Medicine*, 22(1), 30-35.

- Rubin, H. J., & Rubin, I. S. (2005). *Qualitative interviewing. The art of hearing data* (2nd ed.). Thousand Oaks, CA: Sage.
- Rumbaut, R. G., & Weeks, J. R. (1996). Unraveling a public health enigma: Why do immigrants experience superior perinatal health outcomes? *Sociology of Health Care*, 13B, 337-391.
- Salmond, C. E., Prior, I. A. M., & Wesson, A. F. (1989). Blood pressure patterns and migration: A 14-year cohort study of adult Tokelauans. *American Journal of Epidemiology*, 130(1), 37-52.
- Sandelowski, M. (2000). What ever happened to qualitative description? *Research in Nursing & Health, 23*, 334-340.
- Shamai, S. (1991). Sense of place: An empirical measurement. *Geoforum*, 22(3), 347-358.
- Sharareh, A., Carina, B., & Sarah, W. (2007). The health of female Iranian immigrants in Sweden: A qualitative six-year follow-up study. *Health Care for Women International*, 28(4), 339-359.
- Shinitzky, H. E., & Kub, J. (2001). The art of motivating behavior change: The use of motivational interviewing to promote health. *Public Health Nursing*, 18(3), 178-185.
- Singh, G. K., & Miller, B. A. (2004). Health, life expectancy, and mortality patterns among immigrant populations in the United States. *Canadian Journal of Public Health*, 95(3), 114-121.

- Steffen, P. R., & Bowden, M. (2006). Sleep disturbance mediates the relationship between perceived racism and depressive symptoms. *Ethnicity & Disease*, 16, 16-21.
- Steffen, P. R., Smith, T. B., Larson, M., & Butler, L. (2006). Acculturation to Western society as a risk factor for high blood pressure: A meta-analytic review. *Psychosomatic Medicine*, 68, 386-397.
- Streubert Speziale, H. J., & Carpenter, D. R. (2003). *Qualitative research in nursing* (3rd ed.). Philadelphia: Lippincott.
- Sundquist, J. (1995). Living conditions and health: A population-based study of labour migrants and Latin American refugees in Sweden and those who were repatriated. *Scandinavian Journal of Primary Health Care, 13*, 128-134.
- Sundquist, J., & Winkleby, M. A. (1999). Cardiovascular risk factors in Mexican-American adults: A transcultural analysis of NHANES III, 1988-1994. American Journal of Public Health, 89(5), 723-730.
- Thomashow, M. (1995). *Ecological identity: Becoming a reflective environmentalist*. Cambridge, MA: Massachusetts Institute of Technology.
- Uitenbroek, D. G., & Verhoeff, A. P. (2002). Life expectancy and mortality differences between migrant groups living in Amsterdam, the Netherlands. *Social Science* and Medicine, 54, 1379-1388.
- Uretsky, M. C., & Mathiesen, S. G. (2007). The effects of years lived in the United States on the general health status of California's foreign-born populations. *Journal of Immigrant Health*, 9, 125-136.

- U.S. Census Bureau. (1990). *American factfinder: Detailed tables*. Retrieved August 4, 2006, from http://factfinder.census.gov/servlet/DTTable?_bm=y&-context=dt&-ds_name=DEC_1990_STF1_&-CONTEXT=dt&-mt_name=DEC_1990_STF1_P007&-tree_id=100&-redoLog=true&-all_geo_types=N&-geo_id=04000US32&-search_results=01000US&-format=&-_lang=en
- U.S. Census Bureau. (2000a). *American factfinder: Detailed tables*. Retrieved August 4, 2006, from http://factfinder.census.gov/servlet/DTTable?_bm=y&-context=dt&-ds_name=DEC_2000_SF1_U&-CONTEXT=dt&-mt_name=DEC_2000_SF1_U&-CONTEXT=dt&-mt_name=DEC_2000_SF1_U_PCT008&-tree_id=4001&-redoLog=false&-all_geo_types=N&-geo_id=04000US32&-search_results=01000US&-format=&-_lang=en
- U.S. Census Bureau. (2000b). Domestic in-migration to the state of Hawaii: 1995-2000;
 Domestic out-migration from the state of Hawaii: 1995-2000. Retrieved
 December 14, 2005, from www.hawaii.gov/dbedt/gis/maps/migration.pdf
- U.S. Census Bureau. (2001a). *American factfinder*. Retrieved March 29, 2006, from http://factfinder.census.gov
- U.S. Census Bureau. (2001b). *The Native Hawaiian and Other Pacific Islander* population: 2000. Census 2000 brief. Retrieved December 15, 2005, from www.census.gov
- U.S. Census Bureau. (2005). Table 1. *General mobility, by region, sex, and age: 2004*. Retrieved August 4, 2006, from http://www.census.gov/population/socdemo/ migration/cps2004/tab01-1.xls

- U.S. Census Bureau. (2006a). American factfinder: Median housing value of owneroccupied housing units (dollars): 2004. Retrieved August 11, 2006, from http://factfinder.census.gov/servlet/ThematicMapFramesetServlet?_bm=y&geo_id=01000US&-tm_name=ACS_2004_EST_G00_M00608&-ds_name= ACS_2004_EST_G00_&-_dBy=040#?152,263
- U.S. Census Bureau. (2006b). *State and county quickfacts: Hawaii*. Retrieved July 25, 2006. from http://quickfacts.census.gov/qfd/states/15000.html.
- U.S. Census Bureau. (2006c). *State and county quickfacts: Nevada*. Retrieved July 21, 2006, from http://quickfacts.census.gov/qfd/states/32000.html
- U.S. Census Bureau. (2006d). American factfinder. P150E. Sex and employment status for the population 16 and over (Native Hawaiian and other Pacific Islander alone)[15]: Census 2000 summary file 3 (SF-3) sample data. Retrieved October 14, 2006, from http://factfinder.census.gov/servlet/DTTable?_bm=y&-context=dt&-ds_name=DEC_2000_SF3_U&-mt_name=DEC_2000_SF3_U&-mt_name=DEC_2000_SF3_U_P150E&-CONTEXT=dt&-tree_id=403&-all_geo_types=N&-geo_id= 04000US15&-geo_id=04000US32&-search_results=01000US&-format=&-__lang=en
- U.S. Department of Health and Human Services Office of Minority Health. (n.d.). *Native Hawaiians/Other Pacific Islander profile*. Retrieved August 26, 2006, from http://www.omhrc.gov/templates/browse.aspx?lvl=2&lvlID=34
- U.S. Department of Labor. (2006). *Labor Force statistics from the current population survey*. Retrieved October 6, 2006, from http://www.bls.gov/cps/home.htm

- van den Brink, C. L., Tijhuis, M., van den Dos, G. A. M., Giampaoli, S., Nissihen, A., & Kromhout, D. (2005). The contribution of self-rated health and depressive symptoms to disability severity as a predictor of 10-year mortality in European elderly men. *American Journal of Public Health*, *95*(11), 2029-2034.
- Weather Channel. (2008). *Monthly averages*. Retrieved July 1, 2008 from http://www.weather.com
- Weerasinghe, S., & Mitchell, T. (2007). Connection between the meaning of health and interaction with health professionals: Caring for immigrant women. *Health Care for Women International*, 28, 309-328.
- Weiss, R. S. (1994). *Learning from strangers. The art and method of qualitative interview studies.* New York: The Free Press.
- Wikipedia. (2006). *Clark County, Nevada*. Retrieved July 21, 2006, from http:// en.wikipedia.org/wiki/Clark_County,_Nevada
- Wilkinson, A. V., Spitz, M. R., Strom, S. S., Prokhorov, A. V., Barcenas, C. H., Cao, Y., et al. (2005). Effects of nativity, age at migration, and acculturation on smoking among adult Houston residents of Mexican descent. *American Journal of Public Health*, 95(6), 1043-1049.
- Williams, D. P., & Hampton, A. (2005). Barriers to health services perceived by Marshallese immigrants. *Journal of Immigrant Health*, 7(4), 317-326.
- Wingate, M. S., & Alexander, G. R. (2006). The healthy migrant theory: Variations in pregnancy outcomes among U.S.-born migrants. *Social Science and Medicine*, 62, 491-498.

- Wingate, M. S., Swaminathan, S., & Alexander, G. R. (in press). The influence of maternal mobility on birth outcomes of non-Hispanic Blacks. *Maternal Child Health Journal*.
- Winkelstein, W., Kagan, A., Kato, H., & Sachs, S. T. (1975). Epidemiologic studies of coronary heart disease and stroke in Japanese men living in Japan, Hawaii, and California: Blood pressure distributions. *American Journal of Epidemiology*, *102*, 502-513.
- World Health Organization. (1948). *Preamble to the constitution of the World Health Organization*. Retrieved May 30, 2006, from http://www.who.int/about/ definition/en/
- Yu, E.-Y., & Choe, P. (2003). Table 4. Unemployment rate People in labor force 16 years and older - by state and race/ethnicity, 2000. Retrieved October 7, 2006, from http://www.calstatela.edu/centers/ckaks/census/71803_table4.pdf #search=%22unemployment%20rate%20%2B%20ethnicity%20%2B%20Hawaii %22
- Yu, S. M., Huang, Z. J., & Singh, G. K. (2004). Health status and health services utilization among U.S. Chinese, Asian Indian, Filipino, and other Asian/Pacific Islander children. *Pediatrics*, 113, 101-107.

Appendix A

Interview Guide

Native Hawaiian Health and Well-Being in the "Ninth Hawaiian Island," Las Vegas Interview Guide

- 1) Hawaiian Protocol Greeting
 - a. What island are you from? What part of the island? Please tell me about your hometown.
- 2) HEALTH AND MIGRATION
 - a. PARTICIPANT'S HEALTH
 - i. How has your health changed since you moved to Las Vegas?1. If changes, what do you think led to the changes?
 - ii. How have your health habits changed since you moved to Las Vegas? (What do you do to stay healthy?)
 - 1. If changes, what do you think led to the changes?
 - iii. In what ways, if any, has your health improved since you moved to Las Vegas? (ask if not covered in previous responses)
 - iv. In what ways, if any, has your health declined since you moved to Las Vegas? (ask if not covered in previous responses)
 - v. What do you do to stay healthy?
 - vi. What would you have done differently in Hawaii to stay healthy?
 - b. HEALTH OF OTHERS
 - i. How has the health of your family members or your Native Hawaiian friends changed since they moved to Las Vegas?
 - ii. If changes, what do you think led to these changes?
 - c. ACCESS TO HEALTH CARE
 - i. How has your ability to get health care changed since you moved to Las Vegas?
 - ii. Where do you receive health care?
 - iii. When do you receive health care?
 - iv. What might you have done differently in Hawaii for health care?
 - d. CHANGES IN CULTURAL HEALTH PRACTICES
 - i. How has your use of Hawaiian cultural health practices changed since you moved to Las Vegas?
 - 1. Possible probes:
 - a. Lomilomi
 - b. Traditional healers
 - c. Immersion in the ocean
 - d. Ho'oponopono
 - ii. What cultural practices that affect health were you able to bring with you from Hawaii?
 - 1. Possible probes
 - a. Alo'e
 - b. Herbs

- c. Hula
- d. Outrigger canoeing
- e. Dietary habits
- f. Religious beliefs
- g. Spear fishing, surfing, throw net
- h. *Kanakapila* (play local music and talk story)
- i. Digging holes for the imu (underground oven)
- iii. What cultural health practices might be helpful to Native Hawaiians living in Las Vegas?
- 3) WELL-BEING AND MIGRATION
 - a. How has your move affected what brings you joy and gives meaning to your life?
 - b. If there has been a positive change, to what to you attribute that change?
 - c. If there has been a negative change, to what do you attribute that change?
- 4) MIGRATION
 - a. How does your employment in Las Vegas compare to the employment you had in Hawaii?
 - b. What has been the best part of the move?
 - c. In what ways has your lifestyle changed since moving to Las Vegas?
 - i. Possible probes:
 - 1. Social aspects
 - 2. Family
 - 3. Financial aspects
 - 4. Diet
 - 5. Recreation/exercise
 - 6. cultural change
 - d. What has been the most difficult part of the move?
 - e. What has helped you adjust?
 - f. What did you leave behind in Hawaii that is important to you?
 - g. What did you bring with you when you moved to Las Vegas that is important to you?
 - h. What did you find in Las Vegas that is better than you hoped?
 - i. Where is home now for your?
 - j. Is there anything else you want to tell me?

Appendix B

Demographic Questionnaire

Native Hawaiian Health and Well-Being in the "Ninth Hawaiian Island," Las Vegas Demographic Questionnaire

Gender: Male 🗆 Female 🖵

How old are you? _____

What is your percentage of Hawaiian ancestry or blood quantum?

What is the highest grade of education you completed?

 I attended some high school I graduated from high school I attended some college or technical school I graduated from technical school I graduated from college I attended some graduate school I have a post-graduate degree 		
Are you employed? Yes No		
If yes, do you work part- or full-time? Part-time Full-time		
Are you self-employed? Yes No		
Were you employed in Hawaii before you moved to Las Vegas?		
Yes No		
How long ago did you move from Hawaii to Las Vegas?		
Rate your health now (Circle one).		
1-Bad 2-Poor 3-Fair 4-Good 5-Excellent		
Rate your health soon after migration (Circle one).		
1-Bad 2-Poor 3-Fair 4-Good 5-Excellent		
Rate your health shortly before migration (Circle one).		
1-Bad 2-Poor 3-Fair 4-Good 5-Excellent		

Appendix C

Fieldnote Record Form

Native Hawaiian Health and Well-Being in the "Ninth Hawaiian Island," Las Vegas Fieldnote Record Form

Participant Code #

Interview date

Starting time

Ending time

Pre-interview goals for interview:

Location of the interview:

People present:

Description of participant:

Description of environment (including community and interview setting):

Nonverbal behaviors noted:

Content of the interview:

Researcher's Impressions (including participant's discomfort and emotional responses):

Analysis (questions raised, tentative hunches, trends in data, emerging patterns):

Technical Problems:

Appendix D

Recruitment Flier

Appendix E

Consent Form



Oregon Health & Science University

Consent and Authorization Form

IRB#: 3352

Protocol Approval Date: _02/01/07_____

OREGON HEALTH & SCIENCE UNIVERSITY Consent and Authorization Form

<u>TITLE</u>: Native Hawaiian Health and Well-Being in the "Ninth Hawaiian Island," Las Vegas

PRINCIPAL INVESTIGATOR:	Nancy Press, PhD (503) 494-2535
CO-INVESTIGATOR :	Jane H. Lassetter, MS, RN (801) 422-7198

SUPPORTED BY:

Brigham Young University College of Nursing provides financial support for this study.

PURPOSE:

You have been invited to be in this research study because you are a Native Hawaiian adult who moved from Hawaii to Las Vegas in the last five years. The purpose of this study is to learn about the health of Native Hawaiians who move from Hawaii to Las Vegas. This will help nurses understand Native Hawaiians' strengths and needs. What we learn might be used in health promotion efforts for Native Hawaiians. Participating in the study will take an hour to an hour and a half. Thirty to sixty Native Hawaiian adults in the Las Vegas area will participate in this study.

PROCEDURES:

You will be interviewed one time. The interview will be tape-recorded and will take an hour to an hour and a half. You will be asked about your health and the health of your family and Native Hawaiian friends. Some questions will be about what you do to stay healthy. Other questions will be about what you do when you are sick. You will be asked about the good and bad parts of moving to Las Vegas.

Then you will fill out a one-page questionnaire that will take about five minutes. Most questions ask about you. For example, how old you are and if you are employed. You will be asked who lives with you and your relationships to others.

The researchers will compare your answers with other subjects' answers. They will look for similarities between interviews. In this process, the researchers will begin to draw conclusions. The researchers will want to ask some subjects if their conclusions seem reasonable. The researchers may call you after the interview and ask if you agree with the conclusions being drawn. If you disagree with the conclusions, the researchers will ask you how you think the conclusions should be changed. Notes will be taken, but you will not be recorded during this telephone conversation. If you have any questions regarding this study now or in the future, contact Nancy Press (503) 494- 2535 or Jane Lassetter (801) 422-7198.

RISKS AND DISCOMFORTS:

Although we have made every effort to protect your identity, there is a minimal risk of loss of confidentiality.

You might feel emotional discomfort when answering questions about personal beliefs and experiences. Every effort will be made to make you feel comfortable. You may refuse to answer any of the questions that you do not wish to answer.

BENEFITS:

You will not benefit from being in this study. However, by serving as a subject, you may help us learn how to benefit people in the future.

ALTERNATIVES:

You may choose not to be in this study. Deciding not to be in this study will not affect any care that you might receive at OHSU.

CONFIDENTIALITY AND PRIVACY OF YOUR PROTECTED HEALTH INFORMATION:

We will not use your name or your identity for publication or publicity purposes.

If you sign this form, you are agreeing that OHSU may use and disclose protected health information collected and created in this research study. The specific health information and purpose of each use and disclosure are described in the paragraph below:

The health information collected from you will be limited to your answers to questions in the interview and on the one-page questionnaire. The purposes of our use and disclosure of this health information are to learn more about the health of Native Hawaiians in Las Vegas and to teach others.

The persons who are authorized to use and disclose this information are all investigators listed on page one of this consent and authorization form and the OHSU Institutional Review Board.

The persons who are authorized to receive this information are those at the Office for Human Research Protections.

We may continue to use and disclose protected health information that we collect from you in this study until the completion of the study and all publications from the study.

Interviews will be audio-recorded and transcribed word for word. The tapes will be destroyed when this study and all publications from the study are completed.

You have the right to revoke this authorization and can withdraw your permission for us to use your information for this research by sending a written request to the principal investigator listed on page one of the research consent form. If you do send a letter to the principal investigator, the use and disclosure of your protected health information will stop as of the date she receives your request. However, the principal investigator is allowed to use and disclose information collected before the date of the letter or collected in good faith before your letter arrives. Revoking this authorization will not affect your health care or your relationship with OHSU.

Under Oregon Law, suspected child or elder abuse must be reported to appropriate authorities.

COSTS:

It will not cost you any money to participate in this study. If you finish the interview and questionnaire, you will receive a \$25 Wal-Mart gift certificate.

LIABILITY:

If you believe you have been injured or harmed while participating in this research and require immediate treatment, contact Nancy Press at (503) 494-2535.

The Oregon Health & Science University is subject to the Oregon Tort Claims Act (ORS 30.260 through 30.300). If you suffer any injury and damage from this research project through the fault of the University, its officers or employees, you have the right to bring legal action against the University to recover the damage done to you subject to the limitations and conditions of the Oregon Tort Claims Act. You have not waived your legal rights by signing this form. For clarification on this subject, or if you have further questions, please call the OHSU Research Integrity Office at (503) 494-7887.

PARTICIPATION:

If you have any questions regarding your rights as a research subject, you may contact the OHSU Research Integrity Office at (503) 494-7887.

You do not have to join this or any research study. If you do join, and later change your mind, you may quit at any time without any loss of benefits to which you are entitled.

If you request it, a summary of the findings will be sent to you.

If you choose not to complete the interview and questionnaire, you will not receive a \$25 Wal-Mart gift certificate.

We will give you a copy of this form.

SIGNATURES:

Your signature below indicates that you have read this entire form and that you agree to be in this study.

Subject signature

Signature of person obtaining consent

Date

Date