

DIVERSITY IN DIETETICS MATTERS: EXPERIENCES OF MINORITY FEMALE
REGISTERED DIETITIANS IN THEIR ROUTE TO PRACTICE

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Dissertation

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ABSTRACT

The dietetics profession, established in 1917, is comprised of practitioners who understand the relationship between food and health. Registered Dietitians (RDs) can work in a variety of fields ranging from acute care hospitals, food service institutions, community settings, and research or marketing arenas. In these various settings, RDs can offer services such as assessing patients for nutrition risk, implementing care plans, providing nutrition education, or writing menus. A wide variety of populations are served by RDs, including minority populations. Several minority populations such as African Americans and Hispanics tend to be at higher nutritional risk, and often have higher rates of obesity and chronic diseases, such as diabetes, hypertension, and cardiovascular disease. Despite the fact that these disparities tend to be related to nutrition, the RDs who serve these populations tend to be primarily white and female (96%). The success of white RDs treating non-white patients has been questioned and could lead to lower quality of care. The purpose of this study is to investigate the perceptions and experiences of minority dietitians in the dietetics profession. Barriers that prohibit minorities from entering the field will also be explored. Diversity in dietetics matters because of the populations served. The aim is that this effort might impart new insight to the profession in hopes of increasing diversity, and becoming more inclusive and possibly successful with nutrition interventions.

In order to explore this phenomenon, minority female dietitians will be interviewed to investigate their perceptions of the field and how they develop a professional identity within this context. The problem that this dissertation will address is the lack of minority dietitians in the United States. This work answers the questions: What are the experiences of minority female professional dietitians regarding training, education, and practice? How do minority female dietitians create a professional identity?

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CHAPTER ONE

INTRODUCTION

As I stand before my classroom at the beginning of the semester, I look out and see what I always see. Students assembling, anxious for the new semester to begin, new personalities, ideas, faces, but one thing remains the same: I am staring at a crowd of whiteness. Perfectionist, upper-middle class white females tend to find themselves fascinated with the nutrition and dietetics realm. There are many reasons for why they are here. Some have an obsessive relationship with food, wellness, and body image. Some are athletes that use nutrition to fuel their sport. Some have been or have had a family member diagnosed with a nutrition-related disease or disorder. Whatever brings them here isn't the problem, but I wonder each day about the profound effect it has on the profession.

Although I work at an urban university, diverse students rarely enter my classroom. In the past, I have taught general nutrition courses and have found much diversity in attendance. Teaching evaluations even reflect that many students from diverse backgrounds have an interest in nutrition and note that they have learned a great deal that can be applied to their everyday lives. Despite this, minority students seldom continue on into the major.

Why are white females driven to the dietetics field? Why aren't minority groups represented in this discipline? Semester after semester I meet more students interested in becoming registered dietitians, but no one of color. White females hoping to change the health of the world through nutrition continue to dominate the academic programs. How will this shape the profession? Why has this problem persisted for decades? How can these students hope to serve minority populations if they have little experience in knowing diverse cultures? These observations drive my research.

Statement of Problem

The dietetics profession remains largely white and female (Ayers, 2012). The lack of minorities affects the quality of care of the patients served, and also has an effect of minority students entering the profession. Though several initiatives to increase diversity have occurred, little has changed in the dietetics profession (Suarez & Shanklin, 2002). The importance of this diversity in the dietetics field matters because of the populations dietitians serve. The obesity epidemic, compounded with alarming statistics regarding the health of minority populations leads one to believe that the current profile of the dietetics profession is not proving to be successful in its endeavors. It should also be noted that the bulk of research regarding diversity in dietetics occurred in the 1990s through the early 2000s. This research is outdated, and further research must be done to address the phenomenon.

The problem that this dissertation will address is the lack of minority dietitians in the United States. Historically, minorities have sought careers in food service management, public health, and family and consumer sciences, and other related fields. However, nine percent of the dietetics profession maintains minority representation.

Historical Perspective of the Dietetics Field

Dietetics is a discipline concerned with the diet and its effects on health and the human body. It is a science-based subject relying on evidence-based research to fuel its practice. The dietetics profession, which studies the science of food and nutrition, includes a rich history that began at the turn of the century (The Academy of Nutrition and Dietetics, n.d.). In 1904, Ellen Swallow Richards, a pioneer in the sciences and home economics, the first woman admitted to the Massachusetts Institute of Technology, and the first woman to earn a degree in Chemistry published *First Lessons in Food and Diet*. This groundbreaking manuscript illustrated the importance of the relationship between nutrition and health at a time when little was known about the field (Stage & Vincenti, 1997). Although Richards had a great understanding of Chemistry, little was known about vitamins, minerals, and their significance. Her writings weigh heavily on the significance of the importance of simple sugars for energy (Richards, 1904). Despite these criticisms of her early work, she recognized the importance of the food and health relationship. Richards also worked tirelessly to advance women's education in the sciences, and went on to publish many books in the home economics realm.

In 1917, Lenna Frances Cooper founded the American Dietetic Association in Cleveland, Ohio after recognizing the need for standardization in the field. Cooper had been a follower of Dr. John Kellogg of the famous Battle Creek Sanitarium in Michigan, known for its radical views for maintaining health and wellness. Kellogg may be more famously remembered for his innovative breakfast cereal products that continue to dominate supermarket shelves today ("National Inventor's Hall of Fame", n.d.). Many said Cooper's views of nutrition and health were also extreme, but her theories and

observations became the foundation of the dietetics profession (“Michigan Women’s Hall of Fame”, n.d.). Both Richards and Cooper, who were white, were trailblazers for women in science during a time when women did not commonly work in these areas. Even though much was done for the advancement of women, diversity was not their focus. They also established innovative theories and practices in the dietetics field when very little was known about the importance of vitamins, minerals, or other relationships between health and food. The dietetics field has drastically changed since that time, due to the on-going developments and understanding of scientific theories.

Pathway to Becoming a Registered Dietitian

The field has drastically changed since 1917, including differences in how dietitians are trained. One difference involves changes made in the pathway to becoming a Registered Dietitian (RD). Major differences include an increase in science courses, which was not originally a part of the home economics core curriculum. The dietetics curriculum is a structured one, and follows the competencies and guidelines set forth by the professional group known as the American Academy of Nutrition and Dietetics (formerly known as the American Dietetic Association. The name changed in January 2012). The curriculum is well-rounded and includes strict focus in chemistry, biochemistry, anatomy, and physiology, in order to understand the body’s complex processes including metabolism. First, one must receive a bachelor’s degree in Nutrition/Dietetics from an accredited program, or a student may choose a non-traditional pathway as a post-baccalaureate, but must complete the core competencies outlined by the Academy. After completing the required coursework, the graduate must complete 1,200 hours of supervised practice in an approved, accredited dietetic internship which is

usually an unpaid position, and in many cases the student pays tuition (The Academy of Nutrition and Dietetics, n.d.). This route is commonly referred to as the didactic program (DP). Some bachelor's programs also offer a Coordinated Program (CP) which aligns coursework with an internship simultaneously. After the coursework and internship are completed, the student must pass a national exam administered by the Commission on Dietetic Registration. Once a student passes the exam they are qualified to work as an RD.

This process of training is lengthy and competitive, and the resulting salary for dietitians is low compared to the cost and sacrifice (White, 2008). Since 1993 the demand for dietetic internships has outnumbered the supply (Wilson, 2010). Fifty percent of those who apply for an internship are not accepted (Wilson, 2010). If an internship is not obtained, a student cannot take the exam and therefore cannot work in the dietetics profession. In addition, they are not able to refer to themselves as a dietitian, as that term is legally protected. The term "nutritionist" is not protected and therefore can be used. The general public has little knowledge of the difference between the terms "dietitian" and "nutritionist", which can lead to confusion, or ultimately, someone receiving medical nutrition therapy from an unlicensed practitioner (Academy of Nutrition and Dietetics, n.d.). The Academy of Nutrition and Dietetics has recognized these issues and has developed a task force in an attempt to alleviate these problems. A call to action has been made to appeal to internship directors and hospitals without internship programs to increase their accessibility (Wilson, 2010).

Where Registered Dietitians Work

Registered Dietitians are fortunate to have many career opportunities. A study by Ward (2011) was conducted that revealed 43% of all RDs work in clinical practice, where they assess patients in hospitals, rehabilitation centers, long-term care or similar facilities. Here they plan menus, assess patients for nutrition risk, write care plans, provide diet education or counseling, or assist with critical care needs such as tube or vascular feeding.

Additionally, Ward's (2011) report states that 14% percent of all RDs work in a community setting, where they may be involved in governmental assistance programs such as a nationwide program meeting the critical nutrition needs of Women, Infants, and Children (known as WIC), outreach programs for land-grant institutions, community clinics, or wellness programs. Smaller representation (9%) is seen in both food management and consultation/business segments. Food management dietitians oversee large-scale foodservice operations in healthcare systems, schools, prisons, or other corporations. Consultants or dietitians in private practice may counsel patients, or work under contract with small healthcare facilities that may not have the need for a full-time dietitian. Only 3% of dietitians work in research. It is difficult to ascertain the number of RDs with a doctoral degree. Informatics studies reveal that 50% hold an advanced degree, which is defined as a Master's or Doctoral degree (Ward, 2011). These varieties of career options also offer a range of pay scale, but the average gross salary of a registered dietitian is \$55,200 according to the 2012 Bureau of Labor Statistics Occupational Outlook Handbook (U.S. Bureau of Labor Statistics, 2012). The profession seeks to require a Master's degree for entry-level practice, as soon as 2024 (American

Dietetic Association, 2008, Accreditation Council for Education in Nutrition and Dietetics, 2016).

Practitioner Statistics

According to a March, 2012 report of the Academy of Nutrition and Dietetics 96% of RDs are female. Their median age is 47 years, with 26% being over 55 years and 27% under 35 years. Only 3% of all RDs are of Hispanic heritage, and overall, 9% indicated they were a race other than White (5% Asian, 3% African American, 1% other) (Ayers, 2012). This indicates that dietitians have a tendency of being primarily white and female.

These statistics directly relate to diversity of students majoring in dietetics at colleges and universities across the United States. Students of color are the minority in dietetics education, which predictably leads to a lack of minorities in the dietetics profession. Reasons for lack of diversity are not well understood at this time, although speculations exist including: barriers to higher education, lack of respect for dietitians in the field, low salary and benefits, and lack of knowledge about the field (Suarez & Shanklin, 2002).

Defining Diversity and Its Importance

For the purposes of this study, I am defining diversity to include only race, or specifically minority groups that are non-white. Gender also tends to be a major issue in dietetics as the majority of practitioners are female, and this study will focus on females only to avoid conflicting problems with males in dietetics. However, for the scope and purpose of this research, I will only focus on race as the primary element of diversity, and all participants will be female. Although diversity can encompass many realms,

including religion, age, gender, sexual orientation, personal experiences, or any element regarding difference, these aspects would be too broad to discuss for this topic.

Additionally, I will use the U.S. Census Bureau's definition of "minority" as the combined population of people who are Black, American Indian, Eskimo, Aleut, Asian, Pacific Islander, or of any race of Hispanic origin.

The importance of this diversity in the dietetics field matters because of the populations dietitians serve. Currently, the United States is experiencing an obesity epidemic, and more than 60% of its citizens are overweight or obese (Centers for Disease Control, 2011). Obesity goes hand-in-hand with a wide array of chronic diseases, including diabetes, hypertension, cardiovascular disease, and sleep apnea (CDC, 2011). These health disparities along with overweight and obesity are often preventable or treatable with changes in diet.

According to the U.S. Department of Health and Human Services Office of Minority Health (2011), African-American and Hispanic adults are twice as likely as non-Hispanic whites to be diagnosed with diabetes; African-Americans are 1.5 times more likely to have high blood pressure and 1.7 times more likely to have a stroke; and African-American and Mexican-American women are 1.7 and 1.3 times more likely to be obese than white women, respectively (Williams, 2011). Minority populations such as African Americans and Hispanics have an increased incidence of chronic disease, and could benefit greatly from nutrition counseling and education by a registered dietitian (Williams, 2011).

With the majority of dietitians being young (age 21-55), white females, questions are raised as to whether or not they are able to properly connect with minority

populations and therefore provide effective, quality care. Meal patterns and food choices can be a culturally sensitive issue of which dietitians must be aware. Additionally, body image perception differs among different cultures, and sometimes a larger body image is preferred (Martin, 2010). This view is shared by minority populations such as African Americans and Latinos (White, 2005). Larger body types are also preferred in cultures where hunger may have been used as a form of oppression (White, 2005). This preference for a larger body image is not shared by white women, who typically prefer a much smaller, thinner body type (Martin, 2010). Concerns lie with the ability of a white dietitian to understand these differences and adjust meal plans and counseling to minimize weight loss to a culturally desired outcome. Ideally, the field of dietetics should be culturally diverse to provide quality care and education to minority populations who have an increased incidence of chronic health disparities. Dietetics education does not always include specific courses on awareness and understanding of a variety of cultural dietary patterns, which are included in the core competencies, set by the Commission on Dietetic Registration (CDR) (CDR, 2008). The understanding of these cultural competencies can vary among institutions, with elements of these topics being taught as a portion of another course.

Understanding of cultural preferences for food is an important topic. If not understood throughout the dietetics curriculum, it could lead to a reduced quality of care in dietetics practice. For example, if a dietetics graduate has a poor understanding of cultural diets and meal patterns, it could lead to negligence by a dietitian in the hospital setting, and could easily result in a very upset patient, reducing the quality of care. Current trends in hospitals include patient-centered initiatives, where they strive for

excellence in care as hospital competition increases as the growing population ages (Frampton & Guastello, 2010). Other authors have noted these situations in my experiences in the hospital setting, and feel that with increased knowledge in these content areas or by increasing cultural tolerance through diversity, dietitians could better serve their patients (Williams, 2012, Campinha-Bacote, 2011).

Initiatives from the Profession

The Academy of Nutrition and Dietetics has put forth initiatives in the past to combat the lack of diversity in the profession. In 2000, they published a free *Diversity Toolkit* available to members and educators. In addition to the toolkit, the Academy offers a biannual \$10,000 grant aimed to promote diversity within the profession (ADA, 2000). This program contains an emphasis on mentorship programs for K-8 and high school students to raise awareness about the profession (ADA, 2000). Networking through member interest groups have been initiated such as the National Organization of Blacks in Dietetics and Nutrition (NOBIDAN), Latinos and Hispanics in Dietetics and Nutrition (LAHIDAN), Chinese Americans in Dietetics and Nutrition (CADN), and several more (The Academy of Nutrition and Dietetics, 2012).

The initiatives have not been overwhelmingly successful. The American Dietetic Association 1999 membership survey results indicate that only 2.4% of registered dietitians (RD) are African American, 2.0% are Hispanic, 5.4% are Asian or Pacific Islanders, and 0.2 % are American Indian, Alaskan Native and Hawaiian Natives. Additionally, 97.4% of dietitians are women, resulting in a change of 1.4% in 13 years. These differences are not extremely significant, and lead many to believe that these

initiatives have not worked. Currently, the Academy of Nutrition and Dietetics has not made any decisions to amend these initiatives.

Diversity Among Other Health Professions

The need for diversity among medical professions has been widely recognized and has heightened with the understanding of the future increase of minority populations. The U.S. Census Bureau projects that the overall U.S. population will increase by 50%, from 263 million in 1995 to 394 million in 2050. Additionally, racial and ethnic minority populations will account for nearly 90% of the increase in the overall U.S. population from 1995 to 2050 (U.S. Census, 2010). Accordingly, there is an increased need for all health professionals to better respond to the population health and health care necessities of minorities (Shaya & Gbarayor, 2006).

The lack of minority health professionals is compounding the nation's persistent racial and ethnic health disparities. From cancer, heart disease, and HIV/AIDS to diabetes and mental health, African Americans, Hispanic Americans, and American Indians tend to receive less and lower quality health care than whites, resulting in higher mortality rates (Shaya & Gbarayor, 2006).

According to the American Medical Association (AMA), "Evidence exists that minority patients are more satisfied with their care from minority physicians than that received from non-minority physicians," (Nelson, 2003). Likewise, minority physicians are more likely to return to their communities to practice. The 1993 Association of American Medical Colleges (AAMC) study of medical graduates found that two-thirds of underrepresented minority medical school graduates planned to specialize in primary care and practice in underserved areas (Steinbrook, 1996). The AMA has made a

commitment to increasing diversity among their profession and has issued statement of action involving increasing funds, identifying kids with potential early on in their education process, and providing supplemental education for them to increase success (Nelson, 2003).

Powerful evidence currently exists for the need for increased diversity among health professions from the Sullivan Commission. The Sullivan Commission on Diversity in the Healthcare Workforce is an outgrowth of a grant from the W.K. Kellogg Foundation to Duke University School of Medicine and was established in 2003. The Commission investigates the diversity among many health professions, but focuses mainly on diversity among physicians, nurses, and dentists. Public health workers, pharmacists, social workers, psychologists, and physical therapists are also explored as they also tend to have lack of diversity in their workforce (Sullivan Commission, 2004).

The Sullivan Commission understands that “increasing diversity will increase the overall health of the nation,” (2004). Their primary focus for the lack of diversity in medical fields is education and the pipeline to become a health practitioner, and they argue that “to increase diversity in the health professions, the culture of health professions schools must change,” (2004). Other principles set forth by the Commission say that new and nontraditional paths to the health professions should be explored in order for effective change to occur. Lastly, strong commitments must be made in order to ensure the success of these tenants (Sullivan Commission, 2004) not just by medical professions and education, but also the community.

The overall message of these findings articulates the need for increased diversity among all health professions, not just dietetics. Medicine, nursing, and pharmacy are

also viewed strongly by the Committee as they were some of the last health professions to allow integration of minority students to their programs (Sullivan Commission, 2004). Furthermore, these findings can discount the idea that minorities do not enter the field of dietetics because of the low salary, as there is also decreased diversity among physicians and pharmacists, who tend to earn much more than dietitians. These findings address a similar problem with a common link: education. Taken as a whole, it is critical to look at these issues as they will have a severe impact on our population as it continues to become more diverse.

Theoretical Framework: Critical Race Theory

To understand reasons for lack of diversity in dietetics stemming from issues in education, I have chosen to use the lens of Critical Race Theory (CRT). CRT became known in the mid-1970s as the United States had a period of stagnation after the Civil Rights Movements and the passing of the Civil Rights Act of 1964. In the 1970s, legal scholars Derrick Bell and Alan Freeman helped develop this framework due to their dissatisfaction of the slow paced movement of racial reform in the United States (Ladson-Billings, 2004). CRT investigates the relationships and intersections among race and power (Delgado, 2001). Tenants of CRT include 1.) Racism is ordinary and exists in everyday life, 2.) The idea of interest convergence and how racism can advance the interests of whites of any social class, 3.) Viewing race through social construction, or the idea that races are a function of social thoughts and relations (Delgado, 2001).

CRT uses storytelling as a means to question racial oppression (Ladson-Billings, 2004). Because the field of dietetics deals primarily with food, which has been known to be a political weapon of oppression (Freire, 1996), CRT is appropriate to use for

framework in this study. Few activities are more culturally defined than eating. Similarly, The Academy of Nutrition and Dietetics can be seen as the oppressors or gatekeepers of the credentials (White, 2008), and the profession is dominated by white females. The field of dietetics is riddled with cultural domination.

By looking through this lens, one can approach the topic of diversity in dietetics in a different way. One can now see how the social constructs that have been previously established in minority communities prevent these groups from being successful in the healthcare field. These constructs are continually perpetuated, resulting in little or no relief of the problem.

With a similar lens, author Jennifer Heller takes this approach of social construction and expands upon the idea of race and social class with her analysis of *white privilege*. Although this research looks at minorities in dietetics and does not investigate social class, the idea of white privilege is important to explore, as it helps us understand the over-representation of whites in desirable situations (Heller, 2010). This theme is apparent in the healthcare setting, and for the future of our health as a nation, there state of healthcare must be diversified.

Professional Identity

The development of professional identity is not well explored in dietetics (MacLellan, Lordly, & Gingras, 2011). Professional identity is the “process by which people selectively acquire the values and attitudes, the interests, skills and knowledge – in short, the culture – current in groups of which they are, or seek to become, a member” (Clouder, 2003, p. 213). Goldenberg and Iwasiw (1993) describe professionalization as “a complex and interactive process by which the content of the professional role

(knowledge, skills, and behavior) is learned and the attitudes, values, and goals integral to the profession and sense of occupational identity which are characteristic of a member of that profession are internalized” (p. 4). One develops a professional identity through a professional socialization (professionalization), whereas professional socialization is a process of learning the formal knowledge, skills and rules associated with becoming a professional (Goldenberg & Iwasiw, 1993).

With the lack of diversity in the profession, one wonders how a professional identity is constructed among diverse groups. Members of diverse groups could be forced to conform to the attitudes and culture of the majority in order to assimilate. The literature does not reflect this phenomenon, nor does it explain when professional identity is developed in dietetics. Could professional identity be developed during formal education, or does it occur in practice?

Subjectivity

Knowing that neutrality is often questioned in qualitative research, I must address my subjectivity. Ideally, I desire to come to this work to question social norms and reject the notions of the current systems of power. But, alas, I am a white female registered dietitian who educates students who will someday work in dietetics. I have led a privileged life because of my race and background. I have had access to good schools, increased opportunities, and benefits not easily awarded to those in minority groups. I attended college, graduate school, a dietetic internship with competitive access, and now am completing a doctoral degree. I realize that much of the success I have enjoyed throughout life can be attributed to white privilege.

I am a true “Gen-X-er” who often questions and mistrusts authority. I believe that the field of nutrition and dietetics has much to offer, but gate keeping systems keep the profession from realizing its true potential. I believe quality health care is a right, and patients should be afforded fair treatment despite any intersectionality (such as race, class, gender, socioeconomic status, size, religion, or ethnicity). This is the outlook I bring to this research.

When I look at the composition of my profession, I am disappointed, and I often feel like I am a stranger among its ranks. I’ve never been a “typical” dietitian in the sense that I do not share a common fixation with an extremely thin body type. I was not drawn to the field through the suffering of an eating disorder or nutrition-related illness like many are; instead I was drawn by an interest in food and the food-body relationship. I believe in moderation in the diet, and that all foods can fit a healthy lifestyle. Dietitians can be unbearably detail -oriented and find great joy in knowing calorie counts to the decimal. I tend to prefer a big picture, and am less focused on minute details. Although I enjoyed learning and practicing clinical dietetics during my schooling and internship, I did not choose this as my career focus. Upon graduation, many job openings existed in the clinical realm, but I saw how unhappy and unappreciated dietitians were in the hospitals. I avoided this career path. I took a job in food management and worked with a diverse staff and over a hundred front-line foodservice employees. This job gave me a different perspective on food and culture that was not a part of my formal education.

The diversity initiatives that have occurred have not been widely successful (Ayers, 2012), and currently the internship shortage and future goal of a Master’s degree will not make it more inclusive. The Academy of Nutrition and Dietetics has a *Diversity*

Taskforce and *Diversity Toolkit*, however, I do not see these initiatives as enough. And, honestly, sometimes when I talk about this problem in small circles of dietetic professionals, I see eyes rolling, negative comments, and body language indicating a complete lack of caring and compassion. Deep down, I don't think that nutrition professionals want to see a lack of diversity in the field, but view it as a problem that can't be solved. It is definitely a problem we cannot seem to solve ourselves. Overall, I believe that the reason we can't solve the issue is due to a lack of diversity and diverse viewpoints. I want to investigate how minority professionals within the field have succeeded, and I want to share that knowledge.

Purpose of Study

The purpose of this study is to investigate the perceptions and experiences of minority dietitians in the dietetics profession, and how the creation of a professional identity is formed. Barriers that exist which prohibit minorities from entering the field will also be explored. Diversity in dietetics matters because of the populations served. The aim is that this effort might impart new insight to the profession in hopes of increasing diversity, and becoming more inclusive and successful.

Research Questions

1. What are the experiences of minority female professional dietitians regarding training, education, and current practice?
2. How do minority female dietitians create a professional identity?

Definitions

The following definitions were obtained from eatright.org, the official website of the Academy of Nutrition and Dietetics.

Registered Dietitians (RD) or Registered Dietitian Nutritionists (RDN) food and nutrition experts who have completed a minimum of a bachelor's degree, have completed an accredited supervised practice program (internship), passed a national examination and completed continuing professional education requirements.

Dietetic Technicians Registered (DTR) work independently or in teams with RDs/RDNs. They must complete at least a two-year associate's degree in an accredited dietetic technician program, pass a national examination, and complete continuing professional education requirements.

Didactic Program in Dietetics (DPD or DP) bachelor's level dietitian coursework that must be completed before completing an approved, accredited dietetic internship, which leads to RD eligibility.

Coordinated Program in Dietetics (CPD or DP) bachelor's level dietitian coursework that includes 1,200 hours or supervised practice for RD eligibility.

The Academy of Nutrition and Dietetics (AND) the organization formerly known as the American Dietetic Association (ADA). It is the world's largest organization of food and nutrition professionals. The membership is made up of over 75,000 RD, RDN, and DTR professionals.

Accreditation Council for Education in Nutrition and Dietetics (ACEND) the Academy's accrediting agency for education programs preparing students. ACEND oversees accreditation for DP, CP, internships, and combined Master's degree internship programs.

Commission on Dietetic Registration (CDR) administers rigorous valid and reliable credentialing processes to protect the public and meet the needs of nutrition and dietetics practitioners, employers and consumers.

The following definitions have been stated for the purpose of this dissertation.

Professional A registered dietitian who has completed the appropriate coursework, internship, and credentialing to practice in the field of dietetics in any sector.

Barriers in this study refer to any gate, obstacle, or difficulty that prevents one from entering the profession of dietetics. Some barriers could be the achievement gap in science education, lack of mentorship opportunities, financial difficulties, poor guidance, among others.

Professional identity is process by which dietitians selectively acquire the culture of which they seek to be a member.

CHAPTER TWO

LITERATURE REVIEW

The dietetics profession, established in 1917, is comprised of practitioners who understand the relationship between food and health. Practitioners or Registered Dietitians (RDs) can work in a variety of fields ranging from acute care hospitals, food service institutions, community settings, and research or marketing arenas. In these various settings, RDs can offer services such as assessing patients for nutrition risk, implementing care plans, providing nutrition education, or writing menus. A wide variety of populations are served by RDs, including minority populations. Several minority populations such as African Americans and Hispanics tend to be at higher nutritional risk, and often have higher rates of obesity and chronic diseases, such as diabetes, hypertension, and cardiovascular disease (U.S. Department of Health and Human Services Office of Minority Health, 2011). Even though these disparities tend to be related to nutrition, the RDs who serve these populations tend to be primarily white and female (96%). The success of white RDs treating non-white patients has been questioned and could lead to lower quality of care (White, 2005; Williams, 2012). The purpose of this study is to investigate the perceptions and experiences of minority dietitians in the dietetics profession, and how their professional identity is created. Barriers that exist which prohibit minorities from entering the field will also be explored. Diversity in dietetics matters because of the populations served. The aim is that this

effort might impart new insight to the profession in hopes of increasing diversity, and becoming more inclusive and possibly successful. The problem that this dissertation will address is the lack of minority dietitians in the United States. This work hopes to answer the questions: What are the experiences of minority female professional dietitians regarding training, education, and current practice? How do minority female dietitians create a professional identity?

Diversity in Dietetics Research

Research regarding diversity in dietetics published by the Academy of Nutrition and Dietetics is minimal. Current discourse surrounding the topic points to studies from the early 2000s and work from the 1990s regarding recruitment and retention initiatives. In 1986, the American Dietetic Association instituted a Minority Recruitment and Retention Project, which was based on a 1984 Study Commission Report. This proposal identified the diversity problem (at that time 97% female and 87% white), and recognized that no prior efforts had been made to neither restrict nor recruit minority individuals into the profession (ADA, 1984). To increase the diversity of the dietetic workforce, the report made recommendations to form an Affirmative Action plan, as well as a Task Force to increase minority recruitment and retention (MRR). In 1989, at the annual ADA meeting, plans for the MRR initiatives were further outlined and members generated a list of activities to increase the diversity of the profession. These activities included: developing career awareness programs, involving members in minority recruitment activities, establishing mentoring programs, promote career enhancement for

members of underrepresented groups, and to help minority dietetic majors become practitioners (ADA, 1984). A diversity committee was established in 1989 as well (ADA, 1990).

Additions have been made to the MMR plan since its inception. Further details of recruitment and retention have been outlined, including the establishment of a recruitment network and enhanced survey and marketing programs to measure outcomes (ADA, 1990). One update on the progress of the MMR project was published in 2000. Key results show that although the profession recognizes the importance of diversity, it “was not sure how to assist with recruiting/retaining minority members,” (ADA, 2000). Future goals for further recruitment and retention initiatives were documented. No other follow-ups to this project have been noted.

After this MRR plan was released, a handful of articles were published overviewing various efforts and ‘best practices’ used throughout the profession. One of these solutions included increasing visibility at career fairs in diverse high schools (Kobel, 1997; Hill-Hogan, 1990; Gitchell & Fitz, 1985; Colson, Smith, and Palan, 1992; Ebro & Winterfeldt, 1994; Fitz & Mitchell, 2002). The thought behind this was that minority students were unaware of the dietetics profession, and would therefore not choose it as a career path. Mentorship and increasing the diversity of college faculty are also highlighted in other research from this time. The first research question in this study

aims to investigate minority female dietitian's experiences regarding training, education, and current practice.

Suarez & Shanklin (2002) studied minority interns and their experiences and Greenwald & Davis (2000) surveyed recent, graduated professionals as well as dietetic program directors. One study took place in 2008 (Felton, Nickols-Richardson, Serrano, & Hosig, 2008) which further investigated perceptions of the field. These readings aim to discover the root of the problem, and wish to understand why minorities choose not to enter dietetics.

Suarez & Shanklin (2002) investigated the experiences of minority interns during their dietetics education by questioning eleven participants from eight different internship programs. This study used both on-site and telephone interviews. In order to assess some understanding of why minority students do not choose dietetics, the authors asked questions about influence of major choice, positive and negative qualities about the profession, and how the number of minorities could be increased in the profession.

These questions have been considered as a part of this study, and perhaps the minority intern experiences can be associated with the minority professional experience. Six of the eleven respondents indicated that dietetics had not been their first career choice. Initial career choices mentioned were nursing, physical therapy, Spanish, and graphic design. Factors influencing their career choice included taking a nutrition course

during their program and having a strong interest in science, health, and wellness (Suarez & Shanklin, 2002).

Notable discussion and results show that minority interns' experiences had a feeling of being an outsider in their program. One intern says, "Some students already have networks. 'We' don't have that convenience. There has never been a black dietitian in my facility." (p. 1675). The author makes it clear that these minority interns left them feeling uncomfortable in their profession, which could lead to future minority students' avoidance to dietetic programs. However, despite these feelings, the authors conclude that the majority of respondents felt satisfied about their career choice (Suarez & Shanklin, 2002).

Even though Suarez and Shanklin identify reasons about how minorities feel in their dietetics programs, their small sample size and lack of discussion for improving these problems leaves the reader feeling unsatisfied. Additionally, the lack of depth in the questions asked makes one wonder why there were no follow-up questions used for further discussion and clarification. It would have been helpful to understand more about the intern's perceptions for how to improve the state of diversity in the field.

It is understandable to think that there could be several reasons for the lack of diversity in the dietetics profession. Greenwald and Davis looked at issues and interventions of minority recruitment and retention in dietetics in 2000 and found that essential changes are needed to alleviate the problem. First, the researchers performed a telephone survey of 80 minority (including males as well as ethnic minorities) dietetic

professionals (Greenwald & Davis, 2000). The aim of the survey was to identify how the respondents entered, or were attracted to the field. These results show the main reason for the respondents' entering the profession was because of their interest in health and nutrition, not for their love of science. Other chosen reasons included family health concerns, personal health, and they personally knew a dietitian (Greenwald & Davis, 2000).

Additionally, the respondents were asked about issues occurring during their education and certification. This study aligns with research question number one, which seeks to identify existing barriers to the profession. Successes included good preceptors and self-perseverance. Negative impacts occurred for 38% of the respondents and included language barrier issues, financial difficulties, poor-quality guidance, and higher-than-expected levels of performance. A male respondent mentioned that he felt he had to "tiptoe around the gals" (p.965) during the length of the program, which led to feelings of difficulty. Additionally, the author points out that some respondents felt they had encountered "bias-related problems, sensing that teachers and preceptors expected them to have academic problems," (p.965) (Greenwald & Davis, 2000)

A particularly insightful portion of this article discusses a success story of a dietetic internship associated with a WIC (Women, Infants, and Children, a supplemental nutrition program federally funded) program. The internship director developed a specialized mentorship program, where students would first work for a year before being able to apply to the internship. The program allows take home exams, additional

assignments, lots of mentoring and extra time to complete assignments. Additionally, students with particular needs have access to additional resources, such as writing workshops. This program also had a 100% pass rate for the dietetic registration exam (Greenwald & Davis, 2000). This program highlights the importance of mentorship for the success of minorities in dietetics, but notes many resources are needed for success. Additional time and attention must be paid to each intern to ensure success, and with the number of internships dwindling may not be a reality. There are several critiques of this article, mainly the lack of discussion regarding the mentorship program. It would have been beneficial to the field to learn more about this program, and how to expand its initiatives, or perhaps how to implement such a program in other communities. The mentorship internship seemed like an afterthought of the article, and it should have been examined further, or could have precipitated additional research. The first research question of this study asks, “What are the experiences of minority female professional dietitians regarding training, education, and current practice?” and hopes to explore experiences like those in the Greenwald and Davis study. Moreover, it is disconcerting that the profession has recognized the diversity problem, and yet there are only a small handful of studies that investigate further.

Finally, in 2008 a study surfaced researching African-American students’ perceptions of dietetics as a major (Felton, Nickols-Richardson, Serrano, & Hosig, 2008). A qualitative, phenomenologic analysis was performed using focus groups of 28 women and 12 men who declared themselves as African-American, black, and/or black

American, and were college students in Virginia. Not all participants were majoring in dietetics, in fact, only 3 of the 28 sampled were dietetics majors (Felton, et al, 2008). This could be considered both a strength and a weakness of the study as others have noted that the profession should take a more “outside the box” to its approach of diversity.

Like Greenwald and Davis, Felton et al delves into reasons for choosing the dietetics major. They include a desire to help others, interest in food, nutrition, or fitness. But, unlike the previous research, this study hones in on the darker side of the story. Felton et al notes that some African-American students were not encouraged to major in dietetics because it required a high grade point average, or because other minorities had not been previously successful. Other key deterrents include low salary and lack of minority representation in the field (including university faculty). An allusion is made to possible future requirements, including the rumored requirement of a master’s degree in order for entry-level practice (Felton, et al, 2008). This requirement, which has been discussed for years, is becoming a reality as a draft of the accreditation standards, commonly referred to as the future education model (FEM) was released in September 2016 (ACEND, 2016). The FEM proposes a required master’s degree to receive the RD credential, along with 1,200 hours of supervised practice.

The lack of understanding of the diversity problem within the dietetics community can often be met with apathy (White, 2008). Dietitians simply do not know how to remedy the problem, and therefore tend to disregard it (Gingras, 2009). A “Future

Connections Summit on Dietetics Practice, Credentialing, and Education” was held in March of 2011 in Chicago, Illinois. The attendees of this summit widely recognized the importance of increasing diversity among the profession, and stressed the importance of modifying the education experience to allow for more inclusion (Boyce, 2011). Quotes and perspectives were reported from the attendees of this summit and understand their perspectives on the importance of diversity in dietetics. The importance of the issue was discussed, but no actionable agendas, deadlines, or follow-ups were instituted. The efforts are promoted, but there seems to be no follow-through or understanding of the progress from the initiatives.

Karen Stein, who has written several analyses of the diversity in dietetics issue, wrote about the “balancing act of diversity initiatives” in 2011 in the Journal of the Academy of Nutrition and Dietetics. She recognized the need to increase diversity in practice to meet the needs of a growing minority population, and defines diversity to mean race and gender. She argues that this could become a difficult attribute to quantify in the future, as it will become increasingly complex to check one box on the forms that assess demographic information, due to the increase in mixed race individuals (Stein, 2011). Even though the author notes understanding of the importance of diversity issues and offers suggestions for improvement, she includes a statement that also hinders the spirit of diversity initiatives:

Although it is admirable that an association would want to increase its diversity to reflect the demographics of society, as once noted by Charles

R. Drew, MD, FACS (1904-1950)—a famed African-American surgeon, teacher, researcher, and founder of two of the world’s largest blood banks—“Excellence of performance will transcend artificial barriers created by man.” This idea highlights an interesting dilemma: Pursuing future representation in the profession by way of quotas emphasizes demographic details over competence, yet demographic composition may have implications particularly in the allied health professions, as multiple studies have shown that “racial and ethnic minority health providers are more likely to serve medically underserved communities and underrepresented minority patients than their white counterparts.” (p.1117)

My critique of this statement is that it could cheapen the definition of diversity, and lead one to believe that diversity initiatives lack importance. This discourse can usually be found when other professions with low diversity look for ways to find solutions. Also, the statement is made by an African-American, and could lead whites to believe it holds more weight than statements made by non-minorities. It also emphasizes the idea of white privilege as well as the CRT tenant of interest convergence that these ideas continue to advance the interests of whites of all classes. Despite the fact that Stein’s efforts in this article could help others design an effective diversity program, this perspective is not helpful for increasing diversity in the field. The research questions closely align with this notion.

Most recently, a collaboration of several AND member interest groups (MIGs) published an article looking at barriers and facilitators of dietetics education. The collaboration was between the National Organization of Blacks in Nutrition and Dietetics (NOBIDAN), Asian Indians in Nutrition and Dietetics (AIND), and Muslims in Dietetics and Nutrition (MIDAN). A mixed methodology was used to sample 1,805 participant responses from students or dietitians with \leq five years of experience (Wynn, Raj, Tyus, Greer, Batheja, Rizwana & Hand, 2017). The sample was reflective of the profession demographics of 5% Asian, 3% African American, 4% Hispanic and 1% other. Several barriers were identified including financial support, internship support, and faculty support. White students reported receiving higher levels of faculty support in all phases of their dietetics education than students from other backgrounds. (Wynn et al., 2017). The study strongly recommended that dietetics educators should be mindful and offer support to minority students to encourage student success (Wynn et al., 2017).

Though the diversity problem has existed for decades, little has been published within the profession to find the answer. In order to know more, one must search for answers outside the field. Searching for answers in education, other medical professions, or understanding the historical perspectives of food as a weapon of power over minority cultures could help piece together more of the story.

The Education Pipeline and Diversity

The dietetics literature surrounding this topic tends to reiterate the idea that minorities do not seek to follow the dietetics career path due to the amount of science and math required in the curriculum (Greenwald & Davis, 2000; Suarez & Shainklin, 2002; & Felton et al., 2008). Research question one aims to understand existing barriers that prevent minorities from entering the profession. If this is a factor, the education pipeline must be explored. Much national attention has been given to the ‘achievement gap’ that occurs in science and math education, where minority students show much lower achievement than their white and Asian counterparts. In 2005, the National Assessment of Educational Progress results showed the gap between Latino and Black fourth graders to be more than 20 points away from their white counterparts in mathematics (Education Commission of the States, 2005). This gap increases to over 26 points for eighth graders. Additionally, a national gap exists between Latinos and African-Americans and whites in overall standardized testing (National Center for Education Statistics, 2001).

Findings from the 2005 Nation’s Report Card (NCES, 2005) report that ‘overall science scores of 8th grade students in the US have not improved since 1996 and that the average scores of US 12th graders has declined. Loucks-Horsley, et al (2003) say “achievement gaps in science have long existed between students of differing genders, cultures, ethnicity, and socioeconomic status,” (p.171). There have been many initiatives to address these gaps with varied levels of success.

This gap could be responsible for the reason minorities choose not to study dietetics. If minority students have poor science and math scores, it is unlikely that they would want to pursue a college degree that involves a rigorous science curriculum. Likewise, this leak in the pipeline could be causing a lack of minority representation in the field of dietetics, which affects the populations served by dietitians.

Explaining the leaks and achievement gap in education brings up a long history of research. Scholars identified cultural deficit theories in the 1960s that suggested children of color were victims of pathological lifestyles, and that most were unable to benefit from schooling (Hess & Shipman, 1965; Bereiter & Engleman, 1966). Further literature, such as the Coleman Report spoke to the benefits of integrated classrooms (Coleman et al, 1966). More recent research in the 1990s -2000s alludes to the idea that a ‘stereotype’ threat exists which contributes to the gap, and that the cultural differences in learning styles are to blame (Steele, 1999; Irvine, 2003, Lee, 2004). Many authors have expressed the need for social justice in the education system and how it should be exposed or addressed.

Lee & Luyks (2006) sort out science education and student diversity in a fair-minded and critical review of the topic found in the *Handbook of Research on Science Education volume 1* (2007). According to their research, leaks exist because of these assumptions: science education assumes that all students have equal access to resources, assumes students speak the English language, and notes that the materials are not

culturally relevant or representative of the diversity in the textbooks. It is also hard to measure science achievement because it is not typically a measure on standardized tests. Diversity in science education is further addressed by Parsons (2014) in volume 2 of the *Handbook of Research on Science Education*. Through unpacking this notion and looking at diversity in education with a critical lens, Parsons identifies to move forward there must be race-focused research and scholarship that will “transform science education,” (p. 182) in order for it to become more equitable and socially just. Current literature on race in science education suggests that the ability to have access matters according to race. White students are positioned more prominently than their minority counterparts to have greater access to superior science education. Parsons suggests that further research should employ the tenants of CRT to the study race in science education.

In an effort to curtail these problems and to recruit more students in the sciences, STEM (standing for science, technology, engineering, and mathematics) education grew out of the competitive spirit of Sputnik in the late 1950s (Woodruff, 2013). With the fear of losing ground to Russia in the space program, Presidents Eisenhower and Kennedy urged the nation to pursue more math and science in the national curriculum. Decades later, the Reagan administration published “A Nation at Risk” (USDE, 1983) to further stress the importance of staying competitive. In the 1990s, the acronym STEM was purposed by the National Science Foundation (Woodruff, 2013).

The American Council on Education (ACE) released a series of publications aimed at improving success for students of color. It focused mainly on the success of minority students in STEM programs at the college level. The report admits that navigating STEM education and successfully completing a STEM degree can be difficult for many. Factors influencing STEM completing included: having a parent with a bachelor's degree or higher (64.4% completers), being enrolled full-time, increased attendance, lack of part-time/full-time jobs during school, and not having a low SES. Negative predictors for completing a STEM degree include following a high school curriculum that is not rigorous, working more than 15 hours a week, and low parental income (National Assessment for Educational Progress, 2006). Although native and African-Americans, and Hispanics make up 19% of the total population, only 8% are represented in the science, math, and technology workforce. Failure is blamed on families and communities they come from, and are perceived as not caring about learning (Monhardt, 2000).

Information and statistics about the achievement gap and science education are alarming. If student from minority backgrounds cannot achieve high grades in the science curriculum during their high school education, what would motivate them to further their academic career in a science field? This problem, compounded with the current internship shortage (White, 2013) creates a monumental barrier preventing access for minorities to enter the field. Lastly, the Academy of Nutrition and Dietetics is currently considering implementing standards requiring an advanced degree for entry-

level practice (ADA, 2008), which would further complicate the amount of education needed, adding yet another barrier. These obstacles, including the escalating cost of education, are insurmountable for many, and with these in mind, one wonders how diversity could ever be increased within the field.

Diversity Among Other Health Professions

The need for diversity among medical professions has been widely recognized and has heightened with the understanding of the future increase of minority populations. The U.S. Census Bureau projects that the overall U.S. population will increase by 50%, from 263 million in 1995 to 394 million in 2050. Additionally, racial and ethnic minority populations will account for nearly 90% of the increase in the overall U.S. population from 1995 to 2050 (U.S. Census, 2010). Accordingly, there is an increased need for all health professionals to better respond to the population health and health care necessities of minorities (Shaya & Gbarayor, 2006).

The lack of minority health professionals is compounding the nation's persistent racial and ethnic health disparities. From cancer, heart disease, and HIV/AIDS to diabetes and mental health, African Americans, Hispanic Americans, and American Indians tend to receive less and lower quality health care than whites, resulting in higher mortality rates. (Shaya & Gbarayor, 2006)

According to the John Nelson, MD, of the American Medical Association, "Evidence exists that minority patients are more satisfied with their care from minority physicians than that received from non-minority physicians," (Sullivan, 2004).

Likewise, minority physicians are more likely to return to their communities to practice. The 1993 Association of American Medical Colleges (AAMC) study of medical graduates found that two-thirds of underrepresented minority medical school graduates planned to specialize in primary care and practice in underserved areas (AAMC, 2000). The AMA has made a commitment to increasing diversity among their profession and has issued statement of action involving increasing funds, identifying kids with potential early on in their education process, and providing supplemental education for them to increase success (Sullivan et al, 2004).

Powerful evidence currently exists for the need for increased diversity among health professions from the Sullivan Commission. The Sullivan Commission on Diversity in the Healthcare Workforce is an outgrowth of a grant from the W.K. Kellogg Foundation to Duke University School of Medicine and was established in 2003. The Commission investigates the diversity among many health professions, but focuses mainly on diversity among physicians, nurses, and dentists. Public health workers, pharmacists, social workers, psychologists, and physical therapists are also explored as they also tend to have lack of diversity in their workforce (Sullivan et al, 2004).

The Sullivan Commission (2004) understands that “increasing diversity will increase the overall health of the nation,” (p. 2). Their primary focus for the lack of diversity in medical fields is education and the pipeline to become a health practitioner, and they argue that “to increase diversity in the health professions, the culture of health professions schools must change,”(p.4) (2004). Other principles set forth by the

Commission say that new and nontraditional paths to the health professions should be explored in order for effective change to occur. Lastly, strong commitments must be made in order to ensure the success of these tenants (Sullivan et al, 2004) not just by medical professions and education, but also the community.

The overall message of these findings articulates the need for increased diversity among all health professions, not just dietetics. Medicine, nursing, and pharmacy are also viewed strongly by the Committee as they were some of the last health professions to allow integration of minority students to their programs (Sullivan et al, 2004).

Furthermore, these findings can discount the idea that minorities do not enter the field of dietetics because of the low salary, as there is also decreased diversity among physicians and pharmacists, who tend to earn much more than dietitians. These findings address a similar problem with a common link: education. Taken as a whole, it is critical to look at these issues as they will have a severe impact on our population as it continues to become more diverse.

In the same vein, the Institute of Medicine published a report titled “Unequal Treatment: Confronting Racial and Ethnic Disparities in Health Care” in March of 2002. Among the major findings of the report, the idea that “bias, stereotyping, prejudice, and clinical uncertainty on the part of the health care provider can contribute to racial and ethnic disparities in health care” (IOM, 2002, p.341). Clinical decision making can be blinded by these prejudices, therefore decreasing the level of treatment provided to a minority patient. How can clinicians overcome this? Betancourt, Maina, and Soni (2005)

suggest awareness and cultural competence as a possible remedy. However, clinicians should be aware that cultural competence is a *process* that cannot be mastered overnight. Instead, it must be more of a journey involving constant exploration and evolution (Camphina-Bacote, 2011).

Dietitians and Professional Identity

Although professional identity has been studied in other health professions such as nursing and medicine, little has been published regarding dietitians and professional identity. According to the literature professional identity is “a complex and interactive process by which the content of the professional role (knowledge, skills, and behavior) is learned and the attitudes, values, and goals integral to the profession and sense of occupational identity which are characteristic of a member of that profession are internalized” (p. 4) (Goldenberg & Iwasiw, 1993). MacLellan, Lordly, and Gingras (2011) propose a model of professionalization for dietetics by applying a framework derived from a review of literature from the field of nursing. Their work suggests that professional identity happens in three phases – preparation or presocialization (occurring before formal dietetics education), formal socialization (occurring during education and clinical training), and post-socialization (occurring during professional practice). Their model serves as a useful model to consider the progression of professional identity as it positions this “complex and stressful process” (p. 40). In the same regard, the development of a professional identity does not stop once a student graduates and enters the field as a practitioner – a dietitian is constantly redefining their professional identity

and integrating new forms of knowledge and new ways of being into their daily practice. Knowledge gaps exist in knowing how minority dietitians develop a professional identity, and with the lack of diversity in the field, this notion is a concern.

Summary

The literature regarding diversity in dietetics as well as diversity in health care lacks answers. Whereas some studies investigate perspectives of minority dietetic interns, a gap exists concerning the perspectives of the minority practitioner. The past initiatives from the profession have not done enough to increase diversity, and current struggles such as the achievement gaps in education suggest that a new approach is warranted. In an attempt to understand how to fill the gaps, this study must investigate the perspectives of the minority practitioner. The lack of diversity also leads to questions about how professional identity is formed by diverse dietitians. How do diverse dietitians become socialized in a profession where they are missing? The purpose of this study is to investigate the perceptions and experiences of minority dietitians in the dietetics profession, and how the creation of a professional identity is formed. The questions this study hope to answer are: What are the experiences of minority female professional dietitians regarding training, education, and current practice? How do minority female dietitians create a professional identity?

CHAPTER THREE

METHODOLOGY

The purpose of this study is to examine the experiences of minorities in the dietetics field. Workforce diversity can be investigated by looking at barriers to entering the dietetics major. What are the experiences of minority dietitians who currently practice dietetics? What are the existing barriers that prevent minorities from entering the profession of dietetics? What perspectives do minority dietitians have regarding the profession, the educational route, and future of the diversity of the profession? How can the stories and experiences of minority dietitians help shape the future of diversity of the profession?

The Knowledge Gap

The bulk of research of diversity in dietetics happened in the late 1990s and early 2000s. This is when the Academy created the ‘Diversity Toolkit’ and began offering grants and awards to those interested in resolving the problem. The result of this initiative is an overall a three percent increase in diversity in the profession (Ayers, 2011). This increase is in the positive direction and shows promise, but the field is still far from where it needs to be.

This disappointing result has caused a slump in diversity research in the profession. The literature shows little research in this realm for at least a decade, and

since the investigative studies by Greenwald & Davis (2000) and Suarez & Shanklin (2002), discussions of this matter have only been discussion-based in the Journal of the Academy of Nutrition and Dietetics. Why has the profession essentially given up on its initiatives? Discussion has included reasons that seem ‘out of the hands’ of the nutrition professionals. These reasons include problems in the science education pipeline, the education gap that exists between minorities and white students, and the cost of education (Stein, 2012).

Additionally, the idea of resilience and perseverance causes could be a factor in success. Resilience has been defined by Rutter (1990) as the “positive pole of the ubiquitous phenomenon of individual difference in people’s response to stress and adversity” (p.181). What are the characteristics of minorities who have successfully completed a dietetics degree, gained an internship, and are practicing in the field today? Currently, the research of resilience among minority dietitians is lacking. Research of resilience in minority education, however, is well-documented (Werner & Smith, 1982, Wang, et al 1994, 1995, 1997). This research hopes to investigate what factors could be necessary for success in the dietetics profession by exploring the research questions: What are the experiences of minority female dietitians regarding training, education, and current practice? How do minority female dietitians create a professional identity?

Qualitative Research

This study uses qualitative research as a means to explain and understand the lack of diversity in dietetics. Qualitative inquiry has many definitions as it is a complex and broad branch of research. Denzin and Lincoln (2005) describe qualitative research as a “situated activity that locates the observer in the world,” and further define it by stating, “qualitative researchers study things in their natural settings, attempting to make sense of, or interpret, phenomena in terms of the meanings people bring to them.” (p.3). Qualitative research focuses on understanding, meaning, and interpretation of how people “make sense of their lives,” (Merriam, 2009).

Qualitative research can be performed in a number of ways including interviewing, story-telling, case studies, or ethnographies. One characteristic of qualitative research is the positioning of the researcher as the primary instrument (Merriam, 2009). The researcher conducts the data collection and analysis for the purpose of understanding the phenomenon. There are advantages and disadvantages to this position. Advantages include the notion that the researcher has control of quantifying data through clarification, non-verbal cues, immediate processing of information, and further exploration of the participant’s responses (Merriam, 2009). Biases are a frequent limitation of qualitative research using the researcher as the primary instrument. Since it is impossible to eliminate all bias, it is important to monitor and address subjectivity and how it can influence the research (Denzin & Lincoln, 2005).

Finally, qualitative research produces rich description like no other method. In place of numbers and statistics, the researcher produces text, quotes, field notes, videos, sound recordings, and other documents to analyze and support findings (Merriam, 2009). These methods are a powerful representation of the phenomenon and help give layers to the depth of understanding needed in the research.

Phenomenology

To further understand the lived experience, phenomenology will be used specifically as the type of qualitative, critical research in this study. Phenomenology is a “study of people’s conscious experience of their life-world” that maintains an emphasis on “experience and interpretation” (Merriam, 2009, p. 25), or reality as it “appears to individuals,” (Gall, Gall, & Borg, 2007, p. 491). The history of phenomenology has roots in philosophy giving rise for transforming experiences into consciousness. In this type of research, the objective is to portray the essence or meaning of the lived experience, and the primary tool for data collection is the phenomenological interview (Merriam, 2009).

Before interviews are conducted with those associated with the phenomenon, the researcher must first explore their own experiences to become aware of their own subjectivity and refrain from judgment (Merriam, 2009). As the primary instrument, the researcher is “infinitely connected with the phenomena being studied” making

phenomenology the “antithesis of quantitative research, which seeks to detach the researcher’s self from the phenomena being studied” (Gall et al, 2007).

Once this subjectivity has been unpacked, the researcher must set these notions aside and refrain from judgment, a process known as *epoche*, a Greek word meaning “refraining from judgment (Merriam, 2009, p. 25). Once these biases are removed, the researcher will be able to fully examine the phenomenon. Many in the research community have debated this process, questioning the degree to which one can truly remove personal biases. This researcher’s subjectivity has been addressed, and the overarching themes of white privilege and interest convergence are a part of those biases. Those predispositions will be bracketed and revisited throughout the data collection process in hopes the assumptions do not cloud judgment.

Other strategies are unique to phenomenological research, such as phenomenological reduction, horizontalization, and imaginative variation. Phenomenological reduction recurrently returns to the essence of the lived experience to create a deeper meaning (Merriam, 2009). Horizontalization lays out the data and treats it as equal value in the analysis state, and imaginative variation views the data from several angles to see things from different perspectives (Merriam, 2009). These strategies will be used in this study to explore deeper meaning of the phenomenon and to understand the subject’s perspective of the problem of diversity in dietetics.

Qualitative Interviewing

The interviewing techniques used in this study will follow an interpretive constructionist approach rather than the positive approach. The positivist philosophy uses surveys, experiments, and statistical approaches to research, and the interpretive constructionist approach uses observational data to interpret results (Rubin & Rubin, 2005). Qualitative researchers argue that deducing data in a positivist manner is limited (Denzin & Lincoln, 2005) and data can be better interpreted in a paradigm that helps the researcher look at the world. Rubin & Rubin state, “If you stop the research at the counting stage, you miss a great deal. You know what people say they earn, but you do not know what that means.” There is much more to the story than the data.

Qualitative interviewing is a process that is good at describing social processes, and investigating how and why things change (Rubin & Rubin, 2005). To determine if a research focus is suitable for qualitative interviewing, Rubin & Rubin say it must answer the following questions: Are you looking for nuance and subtlety? Does answering the research question require you to trace how present situations resulted from prior events? Is an entirely fresh view required? Are you trying to explain the unexpected? (p. 47-48). Attempting to understand the perspectives, barriers, and experiences of minority dietitians can happen through qualitative interviewing.

Critical Theory

Critical theory or critical research goes beyond the rich description of qualitative theory and examines and questions the larger social systems of society. The goal of critical research, according to Merriam (2002) is to “critique and challenge, to transform and empower.” Historically, critical theory is rooted in Karl Marx’s examination of social class and socioeconomic conditions, as well as Paulo Freire’s transformative and emancipatory education, and Habermas’s conceptions of technical, emancipatory knowledge (Merriam, 2002). Questions asked in critical theory aim to understand “who is helped?” and “who is harmed?” It challenges the position of power and gives voices to those who are oppressed (Merriam, 2009). This study attempts to give a voice to those who have not been heard in the literature. The composition of the dietetics profession being largely white and female leads one to question the position of power.

Critical Race Theory

Critical Race Theory (CRT), an application of critical theory, became known in the mid-1970s as the United States had a period of stagnation after the Civil Rights Movements and the passing of the Civil Rights Act of 1964. It investigates the relationships and intersections among race and power (Delgado, 2001). Derrick Bell and Alan Freeman, both legal scholars dissatisfied with the slow progress of racial reform in the United States, grew the CRT movement by questioning the intersections of race, power, and law (Crenshaw, Gotanda, Peller, & Thomas, 1995). CRT is a tool that can be

used to address long-standing problems (Ladson-Billings, 1999), particularly problems experienced by people of color.

Several tenants exist within CRT, three of which apply directly to this dissertation and give this study a theoretical framework from which to begin. First, the assertion that “racism is ordinary” in American society, and is considered an ordinary part of society. Second, the use of storytelling as a way to challenge and analyze the untruths that are pervasive in American culture (Delgado, 2001). Third, the idea of interest convergence, which Ladson-Billings (1999) describes as “those in power only allow advances by subordinated groups when it serves the self-interest of those in power.” There are other premises described in Bell’s work, however these three specifically apply to the framework of diversity in dietetics.

To answer the research questions, minority female dietitians will be interviewed and asked to share their experiences (a form of storytelling) regarding their pathway to the profession. The profound lack of diversity in dietetics suggests that the tenants of CRT – suggesting that reasons for minorities’ underrepresentation could be due to interest convergence and affirmation that racism as ordinary in society.

Design

The purpose of this study was to investigate the perceptions and experiences of minority dietitians in the dietetics profession, and to shed light on the factors that could cause minorities to not succeed in the field. Development of professional identity despite this lack of diversity will also be explored. The research questions are: What are the

experiences of minority female dietitians regarding training, education, and current practice? How do minority female dietitians create a professional identity?

This study is a qualitative design using phenomenology and structured interviews. I chose this type of study in order to focus on this particular phenomenon, which is rich and complex. Structured interviews give more depth and knowledge to answer the research questions. The same questions were asked in the same order to all participants. Priority was made to meet with the interviewees in person, but, due to time constraints and distance, phone interviews and FaceTime was used.

Prior approval was obtained from the University of Akron's Institutional Review Board (IRB) and interview protocol will be developed that will include a script with an introduction and brief explanation of the research. This is included in Appendix A. Participants signed a waiver in order to participate in the study. The interview script discussed ground rules of the interview, and included an explanation of the background, phenomenon, and understanding of the aim of the research. The script is included in appendix B. Rules for the interview were defined, including the use of language and the need for clarification. Interview questions were developed and reviewed for content and validity. In addition, five dietitians reviewed the questions and served as beta-testers. Afterwards, I began contacting possible participants, set up interviews, and made sure the interviewees had the appropriate amount of time to answer the questions in a relaxed, non-rushed environment.

Participants

The sample was a snowball sample, which is a group of cases that are “selected by asking one person to recommend someone else suitable as a case of the phenomenon of interest” (Gall et al, 2007, p. 653). This snowball sample selection was purposeful in order to gain insight from people who have the most to offer on the subject of interest (Merriam, 2002). I used Ohio as my geographical location because of my knowledge and understanding of the area, and am familiar with minority dietitians who work within the state. Ohio also ranks 10th in the nation in the number of dietetics practitioners, with approximately 3,728 dietitians practicing in the state, which is a ratio of 32 RDs to every 100,000 population (Haughton & Stang, 2012). After interviewing several dietitians from Ohio, the snowball sample method led me to participants in many other states, including Wisconsin, Virginia, Missouri, and Illinois. Participants were also sought through the member interest group known as the National Organization of Blacks in Dietetics and Nutrition (NOBIDAN). Seven participants were interviewed. The participants were female, African American registered dietitians from the United States. Their ages ranged from 34 to 70.

Interviews were scheduled with the dietitians separately, and the interviews took place at a jointly agreed upon time and place. The interviews took place in a quiet environment, not at a workplace or noisy setting. Each interview lasted approximately one hour, and no more than seven interviews were collected before saturation occurred and the data collected became similar.

Data Collection

The structured interviews were recorded with the use of an electronic recording device. The interviews were downloaded to a computer and transcribed, using an online transcription software called Transcribe. Transcribed data was coded with the use of Microsoft Excel. The responses were organized by question and three waves of coding were used, and the responses were aligned with the three tenants of CRT chosen for this study. Sentences and phrases were labeled and analyzed. The codes were grouped to align with the research questions. To maintain consistency, the researcher performed all of the transcription and coding.

An *a priori* coding list was developed before the coding process began. Themes that emerged during the coding process were added to the list of themes and included in the data analysis (Saldana, 2012). The main goal was to reduce the data to meaningful records. Coding requires more than once cycle of analysis, and three waves of coding were used in this analysis before data saturation occurred. Data saturation is reached when enough information is obtained, and the study can be replicated (O'Reilly & Parker, 2012; Walker, 2012). General themes will be reported and discussed through the lens of Critical Theory and Critical Race Theory.

The themes that were used in the *a priori* coding list were INTEREST, SUPPORT, SUCCESS, CURRICULUM, SOCIALIZATION, and CULTURE. These themes are explained below.

- INTEREST includes reasons for entering the field, interest in the major, having known someone with a nutrition-related disease or disorder, work environment, eating disorder, knowing a dietitian
- SUPPORT includes a supportive education environment in a coordinated or didactic program, diversity among college faculty, mentorship, family or peer support
- SUCCESS includes factors such as evidence of a strong community or network, supportive friends neighbors, access to recreation, libraries, medical facilities
- CURRICULUM includes notions about changes in the dietetics curriculum to include more diversity awareness, exclusion of the internship or other barriers
- SOCIALIZATION includes the processes for professional identity development, how socialization happened in the professional culture
- CULTURE includes the culture of the profession and how to work within a field when your identity and culture is essentially missing from its ranks

After the interviews were completed, other themes emerged. Face-to-face interviews aim to extend the discussion and prompt detail, depth, and description about the research topic (Rubin & Rubin, 2005). Other themes that emerged in the second and third waves of coding were: GATEKEEPING, FIRST TO GO TO COLLEGE, WORKED HARDER, and BAD INTERNSHIP EXPERIENCE. These results will be

explained further in chapters four and five. During this process, barriers to reliability were noted and are discussed in the discussion section of the final analysis.

Past research has looked at the minority intern experience (Suarez & Shanklin, 2002, Greenwald & Davis, 2000) and focused on reasons why minority students do not choose to enter dietetics. Recruitment and retention efforts have focused on the student, and exposing minority students to the dietetics field in hopes they will follow the career path and diversity will be increased. The literature has not yet asked minority *professionals* who have successfully made it into the field about their experiences, and this study hopes to gain that insight.

Other research has questioned the lack of diversity in the profession asking if it is “by accident or by design” and has examined racism in the community nutrition setting (White, 2008). By using CRT, this research can examine the idea of interest convergence, and the pervasiveness of racism, especially with the interview questions being asked and additional probing questions to clarify meaning. Getting professionals to tell their stories and talk about their experiences gives them the opportunity to explore these layers in-depth. What was their educational pathway like? What (if any) barriers prevented them from succeeding? How did they succeed in this rigorous endeavor? The professional experience should be different from the student experience, in that professionals have the experience to look back at their journey and see it from a different perspective.

Seasoned professionals were possibly better able to discuss weighty topics like racism and unequal distribution of power than a younger, inexperienced student. This perspective is needed, as the interviews seemed to draw out these themes. The results section will describe the demographics of each participant, their pathway through their education, and will explain their observations, experiences, and perspectives in great detail. Their coded responses will be grouped into themes to be discussed individually. Themes that are expected to emerge are changes in the educational route, viewpoints about the future of diversity in the field, and possibly the future effects on minority health disparities. Additional themes emerged, and through analyzing these themes, possible recommendations could be made to add to the body of knowledge and offer for future research.

The decision to end the data collection was determined when saturation of categories had been reached. Saturation of categories used to code data occurs when themes become repetitive and the frequency of new information and categories narrows (Gall, et al, 2007). The emergence of regularities also occurred, where adequate categories and consistencies occurred in the data, and it was determined that the phenomena was sufficiently represented (Gall, et al, 2007).

Validity and Reliability in Qualitative Research

Ensuring validity and reliability in qualitative research is imperative to contribute to the body of knowledge. In order to make this contribution, studies must be conducted

with rigor and trustworthiness (Denzin & Lincoln, 2005). To do this, studies must be approached with “careful attention to a study’s conceptualization and the way in which the data are collected, analyzed, and interpreted” (Merriam, 2009, p.210). The adoption of established research methods is one way to establish trustworthiness, as well as developing a familiarity with the culture of the participants (Shenton, 2004). Another established means of authenticating validity is the strategy of *member checks* or *respondent validation*. This can be used when soliciting feedback from the emerging findings during data collection (Shenton, 2004). Using these strategies increased the validity of the study.

Reliability refers to the ability to replicate research findings (Merriam, 2009), which is more problematic in this study. “Human behavior is never static” (Merriam, 2009, p. 220), and even though the precise replication of this study might not yield the same results, this does not discredit the research. More importantly, the results must be consistent with the data collected (Denzin & Lincoln, 2005). Keeping an audit trail to explain how the researcher arrived at their results is one strategy to increase reliability (Shenton, 2004). A research journal will be kept throughout the data collection and analysis process for this reason.

Summary

The purpose of this study is to investigate the perceptions and experiences of minority dietitians in the dietetics profession, and how the creation of a professional

identity is formed. Seven minority female professional dietitians were interviewed to understand the phenomenon of the lack of diversity in the profession. The theoretical framework is rooted in critical pedagogy, with a focus on Critical Race Theory to explore the depth and nature of the experiences of the study participants. Chapters four and five will provide the findings of this phenomenon and rich discussion of these findings and their contributions to knowledge. Coding lists, interview questions, and definitions will be provided in the appendices.

CHAPTER FOUR

RESULTS

This study aims to examine the experiences of minorities in the dietetics field through the lens of Critical Race Theory (CRT). Three tenants of CRT are especially apparent in this work are 1) racism is ordinary and exists in everyday life, 2) the idea of *interest convergence*, or that racism advances the interests of whites, and 3) social constructs of racism are a function of social thoughts (Delgado, 2001). The participants in this study were asked a series of questions about their early education, dietetics education, internship, and work experience. The participant's responses were recorded, transcribed, and coded for themes. The themes that arose from the interviews are presented through the lens of CRT. This chapter will begin with a description of the participants, followed by an explanation of themes using the perspective of CRT. Further discussion is provided in chapter five. This study aims to answer the questions: What are the experiences of minority female professional dietitians regarding training, education, and current practice? How do minority female dietitians create a professional identity?

Participants

The following table describes the demographic and career information for each participant. All of the participants in this study are female and African-American. They

all maintain current registration and licensure as dietitians, along with some advanced degrees and credentials.

Table 1

Participant Pseudonyms, Demographic, and Career Information

Pseudonym	Location	Age	Current Job
Gail	Ohio	53	Clinical dietitian
LaDonna	Ohio	70	Retired, former systems manager
Leena	Ohio	54	Dietitian recruiter
Sherrie	Virginia	34	Professor, dietetics education
Sylvia	Missouri	58	Professor, dietetics education
Marilyn	Wisconsin	59	Health Coach, business owner
Thea	Alabama	69	Professor emeritus, retired

Gail is a dietitian working in critical care and oncology in an urban setting. She completed her undergraduate education, did not get matched to an internship, worked as a dietetic technician, and received an internship after applying for a third time. Currently, she does not hold an advanced degree, but is interested in going back to school. She also maintains a Certified Diabetes Educator (CDE) credential and was the first in her family to attend college.

When Gail first came to college from her small town, she wanted to be a doctor. Because she did well in her nutrition classes and she had a grandmother who was diagnosed with diabetes, a nutrition-related disease, she felt like dietetics could be the right field for her. There were roadblocks along the way: she was not advised well in college, and was unaware of application deadlines, which prevented her from entrance to a coordinated program. This extended her path to the profession significantly, but she

maintains that it was okay and that it “wasn’t the right time.” She credits her husband, family, and faith as her support systems.

LaDonna is currently retired, but has had a successful and fulfilling career in dietetics. She was born and raised in the south, and is the seventh child of a seventh child with nine other siblings, she completed her undergraduate degree, internship, and master’s degree with much determination. When she was a child, she was charged with reading the newspaper to her parents, as her mother had only completed third grade. She credits this task for giving her confidence in her studies and affirmation that her parents believed in her.

With two scholarships awarded to her at the end of her high school career, she chose the closest university to begin her studies. Her original dream was to be a fashion designer, but her sewing teacher “hated her guts” and was quick to tell her that she “had no talent.” After changing her major to nutrition, she was fascinated with the science, particularly chemistry, until she was “hit on” by her chemistry professor. She was terrified and stopped going to class, which resulted in a failing grade and her losing her scholarship. Her determination kept her going; she worked to pay for school and her nutrition professors took an interest and helped her throughout her undergraduate education.

LaDonna obtained an internship immediately after graduation, got married, and soon discovered she was pregnant. After her first day at the internship, having thrown up on the internship director’s shoes, she was immediately dismissed from the program.

About a year after her first child was born, she took a job where the dietitian offered to create a coordinated program just for her. After completing the program, she took the exam and passed on the second try. She continued to work at the same, prestigious, world-class hospital for her whole career and has been very active in local and national professional organizations. Although she is retired, she continues to give back and currently volunteers at a men's homeless shelter.

Leena works for a contact management company as a recruiter of dietitians across the country. She grew up in an urban setting, attending public schools, and experienced some struggles within the science education pipeline. She attended community college, and received her dietetic technician (DTR) Associate's degree though the science courses were a persistent source of frustration. After working as a DTR for several years, she returned to college to earn a Bachelor's degree, and attended an internship. Still driven, she has completed a master's degree and is currently enrolled in a doctoral program.

Like Gail, Leena also was the recipient of poor advising and was unable to get into a coordinated program. She speculates that because there was a minority student with poor performance in the class before her, the faculty was "leery" of having another minority student in the program. When she decided to apply for internships, her instructors told her that she would not be matched because of her low GPA. She applied anyway and was matched to an internship and had a good experience.

Sherrie is a researcher and dietitian who holds a doctoral degree and teaches at a university in the south. Growing up, she was guided by her mother, a teacher, who

insisted on enrolling her in summer courses, including opportunities to do research with the United States Department of Agriculture Economic Research Services (USDA ERS). Every summer as a high school junior, senior, and above, she could be found working in major research facilities alongside USDA scientists. Her focus was college preparatory tracks and she stayed concentrated on this throughout her education.

Sylvia came to dietetics after a stressful career in the corporate world. After leaving her high-paying job to go back to school for dietetics, she was so well-liked by her faculty, they wrote an internship program for her and asked her to stay on as a full-time faculty member when she completed the master's and internship program. She has been very active in the professional organization and accreditation committees.

Marilyn is a semi-retired dietitian working in her own consulting business after a long career working in the community. Her parents always stressed the importance of education, and as a child, she would constantly ask inquisitive questions like, "Where does the food go after you eat it?"

As a top student in high school, she finished high school early and entered college at age seventeen. This was a difficult experience, as she was on her own at an early age, but she persevered and completed the program without much peer or faculty support. After working in the field, she returned to graduate school to pursue a Master's degree, where she found the cold shoulders of her white peers who worked in study groups without her. These negative experiences didn't stop her, and she is currently pursuing a

doctoral degree and is very active in her professional organizations and member interest groups.

Thea is a professor emeritus and recently served in a high profile leadership position within a dietetics professional organization. Her impressive and humble beginnings from a two-room school in the south have led her through the path of becoming a successful dietitian. Her entire family prioritized education, and her cousins, aunts, uncles, and parents were very successful in their own right. She attributes her success to this, and to the wonderful, highly qualified teachers she had in her formative years at one of the south's Rosenwald schools.

The experience and viewpoint from Thea is noteworthy. Her perspective as a dietitian, educator, and top board member in a professional organization makes her an expert of this content. The interview with this participant is the longest, and contains information that would be appropriate for further research, including a current controversy that Historically Black Colleges and Universities (HBCUs) are slowly losing their dietetic education accreditation status. This will be further discussed in chapter five.

Since the participants have been defined, further codes have been organized and aligned with the research questions and tenants of CRT in Table 2 below.

Table 2

Interview Questions and Coded Themes

Question	First Wave Code	Second Wave Code	CRT Tennant
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What was your formal education experience (early education)?	SUCCESS, SUPPORT	INTEREST	2
What was your formal education experience (higher education)?	INTEREST	1 ST TO GO TO COLLEGE, HAD TO WORK HARDER, SUCCESS, SUPPORT	1,2,3
What was your internship experience like?	INTEREST	POSITIVE /NEGATIVE EXPERIENCE, PERFECTIONISM, BODY IMAGE, DENIED ENTRANCE, HAD TO WORK HARDER, DIVERSITY	1,2,3
Were there other minorities in your program? Was there diversity among the faculty in your program?	NO DIVERSITY		3
How would you describe your career? Describe the workforce in your department. Do you feel supported in your current career?	NO DIVERSITY		3
What factors attributed to your success?	SUPPORT	FAITH, FAMILY	1
Have you maintained membership in dietetic professional organizations? If so, what has been your experience?	SUPPORT	HIGH INVOLVEMENT, ACCEPTANCE,	2
Why (in your opinion) is there a lack of diversity in	SUPPORT	BARRIERS, CULTURE	1,2,3

the dietetics profession?			
Should the dietetics curriculum change? If so, how?	MASTERS PROGRAM, INTERNSHIP CHANGES	HOPELESS, MENTORSHIP, SUPPORT	1,2,3
Given the lack of diversity in the profession, how to minority RDs create a professional identity?	NO PROFESSIONAL IDENTITY		1,2,3

Themes from the Education Pipeline

All participants reported that they did well in school from the elementary to high school years, and there was a high frequency of the code SUCCESS throughout this portion of the interview. Leena noted that she “outpaced the other students” at her school and was put into advanced classes. LaDonna had two scholarships to college when she graduated high school and Marilyn graduated high school early, at age 16. Thea graduated in the top 10% of her class and Sherrie took advanced college preparatory classes and participated in summer research experiences. All participants spoke of their early education experience as positive, and this segment of the interview was the lengthiest.

Only two of the seven participants reported a lack of diversity in their home communities. A majority of the participants expressed fondness of their early education, where they enjoyed a group of friends, extended family, and teachers who “took an interest in you.” No participants mentioned a dislike for school at this age, although

Sylvia changed schools often as a daughter of a military family, and this was the only negative aspect of early education mentioned.

Science education was discussed fondly by several of the participants. Sherrie took part in a “Math and Science Academy” at her school from 4th-6th grade, and took extra math and science courses in the summer.

One account of science education as reported by Thea:

We had the best science teacher you could ever imagine. He should have been teaching somewhere at a college, he wore us out. Oh, gosh - he taught us physics, we did biology by our regular teacher who was, you know, pretty good. This man's name was ----- he taught us physics, chemistry, and what was the other thing he taught us? I can't remember but he taught us everything and we'd go on field trips - and our field trip was to walk out of the classroom (laughs), and walk into the field, the real field with the grass and the trees and the snakes and the frogs, and we had to do that. And we dissected our own animals because we caught them out in the field and brought them into the lab. From that class, we produced five medical doctors - Mr. ----- was just that inspirational. He should have been at a university - but at that time, he would not have been able to get there, so he stayed and taught in high school.

As described, Mr. --- “would not have been able to get there,” because at the time, it was difficult for African-American teachers to find jobs at public universities in the 1960s in the south.

Phrases such as “it was a good experience,” “I was a good student,” and, “I always did well in math and science,” came out during the interview from the participants. One difference was from Leena, who noted that when she lived in the projects, she was called to the principal’s office where she was informed that she was “outpacing the other students.” She was then put in an enrichment program, but soon after, her family moved to the suburbs and she began attending an all-girl, mostly white high school. During high school, she was informed that because of her low GPA, she would have to choose a trade with options such as foodservice and clothing. She said she “chose foodservice because I stunk at sewing,” this led her to the dietetics profession.

Other themes that evolved from this portion of the interview were INTEREST and SUPPORT where participants mentioned how they formed their early interest in dietetics, and how their families helped support them on their educational path.

Themes from Higher Education

Although the early education experience may have been enjoyable, the higher education experience was not as pleasant, as noted by the theme CULTURE that emerged during this part of the interview. Several other themes emerged, including FIRST TO GO TO COLLEGE, SUCCESS, SUPPORT, and HAD TO WORK HARDER. Participants who did not attend a Historically Black College (commonly abbreviated as HBCU) noted difficulties in acclimating to the university culture. Marilyn, who was only 16 years old when she went to college, notes the change in culture as a minority at a primarily white university:

... it was a culture shock. There were very few African-Americans and at any given time, the highest number of African-Americans was about 60 students - so among thousands of students. We faced some discrimination and other issues. It was not an easy feat. But I was really committed to dietetics. The other part was that most of the other students who were African-American - they were in majors like political science and other things like that. None of them went into health or dietetics. I was the only one. There was one other student that came in while I was there, but she did not complete the program. I was the only one to complete the program. That was a hard thing because a lot of the students would study together - and I was always left out. It wasn't until my senior year that one of the students approached me and said, "If you take notes for me, I'll take notes for you. and if I can't go to class that day, I can share my notes" and I thought "that might be kind of nice" but it came out that she missed class more than me, and I only missed class a couple of times. So, I then knew that they worked together to make things easier for each other - but I was never a part of that.

Gail discussed the difficulty and intensity of coursework.

I came from a low income family; I was the first in my family to go to college. I mean, bootstraps. I lean on my faith and my determination. You can tell me "I can't" or I'm going to try even harder. I had tried to change my major to nutrition earlier, but my mom said, "That's not acceptable. You have to roll up your

sleeves and try even harder." There was so much science. I thought I was prepared at the time, because I graduated with honors, but at that time, we were never taught how to prepare for an exam. I had never taken one. So, when I got to college, I had no idea how to prepare for an exam. So, here I'm thinking I come from this good school, but here I had to relearn how to study, learn study habits, you know. I worked at the university as a work study at the same time, there were a lot of late nights. I also lived with five roommates at the time - and they didn't work. They partied. It was hard to find quiet. That's why when people say how bad things are, I'm like, "are you kidding me?"

LaDonna experienced inappropriate advances, which resulted in the loss of her scholarship:

My first year of college, I had chemistry, which I had never had before. Actually, my chemistry professor tried to hit on me. And I stopped going to classes because I didn't know how to handle it. So my grade in chemistry was a D.

Negative experiences occurred in undergraduate and graduate programs. Isolation was experienced by Marilyn:

In my master's program, I was in my class, and I was the only African-American in the class, we had to do assignments on our computer - and I didn't have a computer. I was devastated. I had two kids at the time, I had to go to someone else's house to download things.

Marilyn continues:

It's emotional - other people can say 'you're going to have to dig deeper' - I had that from my parents. For example - in my master's program, I had group work. I never liked group work because no one wanted to work with me. Now, I don't know if this is a Caucasian thing or not, but it's what I experienced. They go too fast - way too fast, and the one would say, "You do this, you do that, this and the other" and it was way too fast. So then, I come back with my work done, we were going to share our answers, I didn't get the same answers as them. They would say "I got this" and move on, and I'd have to say "hold up, hold on, I didn't get that - how did you get that answer?"

Advising seemed to be a problem for minority females in dietetics education as well. LaDonna notes:

I didn't feel like I was advised very well. I didn't know about any pre-professional experiences until my junior year. If I were to get into the CP program, I would have had to repeat my junior year. I couldn't afford to repeat my junior year. So, I graduated and I became a nutrition educator, and then I worked in the hospital as a pharmacy tech.

A similar experience from Marilyn:

I had an advisor, the crazy thing, somehow I was always off in having a regular advisor - because of credits or something. I didn't get the regular advisor, so I was actually advised by the director of the department. When I was a senior, they gave me a regular advisor. It wasn't very consistent.

Participants #4 and #5 did not note similar experiences relating to the theme CULTURE, instead, their themes were related to SUPPORT and SUCCESS.

Themes from the Internship

The application process and completion of a dietetic internship is one of the many barriers to becoming a dietitian. The participants in this study voiced similar themes regarding this topic, including lack of diversity, and both negative and positive experiences during the internship. Six of the seven participants noted that there was no diversity in the student makeup of the program, and no diversity of the faculty and preceptors teaching in the program. Aspects of negative experiences in the program related to lack of support, negative comments surrounding body image, and unreasonable expectations. Some participants noted discrimination from faculty and preceptors, but others felt supported and mentored. Negative experiences of the internship were mentioned more than positive experiences.

The internship selection process involves the completion of an application, several letters of recommendation, official transcripts, the inclusion of a personal statement, application fees, and other items as determined by the individual program.

Currently, there is a 50% match rate for internships (Wilson, 2010), meaning that half of all who apply are not matched. If an internship is not obtained, a student cannot sit for the national exam for registered dietitians. The selection process can be particularly tense as students have spent countless time and effort completing a Bachelor's degree, and if they do not match to an internship, their degree is of little value.

With the severity of the need for an internship, students are very apprehensive. Several participants mentioned the stress of the internship application process and the feelings they experienced if they did not get matched to an internship. Gail recalls, "... when I applied, one of my instructors told me that because of my grade point average, that I would probably not get in. But I applied anyway." Other comments regarding this topic include:

You had to do an internship and at that time, racism was still a big thing, I graduated in '68 right after the Civil Rights Movement began. At that time, the ADA required us to send a picture with our application.

I applied for an internship and didn't get in. But it wasn't the right time, my oldest son was young. I went back, post-bach, and worked on different classes. I applied again and didn't get it. And so, I was fine, because my son was 2. My third time, I applied to CP as well as (an internship). My son was in kindergarten, and I had educational leave from my job. My husband took care of the family, and we just made it work. I was a diet tech at that time.

When the interview shifted its focus to the internship experience, the first response that stood out was from Gail. When asked, “What was your internship experience like?” the immediate response came without pause:

It was horrible. It was horrible. It was horrible. I learned a lot from it. I believe it molded me into the dietitian I am, it taught me that I did not want to precept students. It was constant fear.

She explains that upon her arrival to the internship, she was made aware that an intern from the previous class had been let go, in the final weeks of the program. This put the entire class on edge, as the reason for the student’s dismissal was not explained. Speculation took over, and the interns were extremely cautious with their behavior and performance, fearing that they could be dismissed as well.

Similar experiences were shared by other participants. Marilyn had attended a school in the north, but was accepted to an internship at an HBCU and still experienced discrimination.

...it was an all-African-American hospital where I worked, it had that tradition of being the first and only hospital for black servicemen. I was trained by all African-American dietitians; it was a complete switch over. And some of them because they felt like I was from the north, they felt like I was trying to outshine all of the southern girls.

An opposite problem, Thea had attended a HBCU, but her internship was at a school in the north:

I went to -----, I did well there, I ran into one instructor that was just god awful. She gave me a "C" in diet therapy, and when I tell you she GAVE me a "C" she did - I did not earn it. There were 12 students in the program and over half of them came from those private catholic schools. And so, her notion was, that since I went to a historically black college, I simply could not compete with those girls who had gone to the private catholic schools.

Gail explains that her internship experience was particularly traumatic, "I had some decent rotations, I didn't always get the best support. I lost 30 pounds during the process. Tylenol and Motrin got me through. It was really difficult." She also talked about the expectations of the internship faculty and preceptors, and the notion that her performance was never good enough:

There were a couple of rotations where I was on the border. You had to have a 2.8 to pass. I had one preceptor that gave me low points because she said I never talked to the medical staff. I was like, "did you see me?" Because I could recount the conversations. How does that improve my dietetic work?

Diversity of Students and Faculty

When participants were asked about the diversity among students and faculty, only one out of the seven felt that there was adequate diversity of students, and that was during the internship program. Faculty diversity was only adequate for those participants

who attended HBCUs (two participants). The theme NO DIVERSITY was the only emerging theme from this question. Relevant comments include:

There were six of us from across the country, the furthest was from Hawaii. We helped her make her first snow angel and helped her shop for a winter coat. We still keep in touch, and I did take a vacation to Hawaii to see her.

Thea laughed at the notion of diversity in her program. “No. The diversity of the faculty was that they had one white woman who was a German (laughs). She was Lutheran.”

Sherrie states:

There were twenty of us. No diversity in the program. I was the only African-American, four Asian/Indian. The faculty - one Hispanic, maybe 20% in the whole department, more Asian/Indian. I would have had to search to find someone who looked like me.

During the interviews, the participants talked about the lack of diversity in education as a normal occurrence. They often described the experience in terms of having to work harder than their white counterparts, and that their experience as a minority involved a constant uphill battle that was accepted as commonplace. As one participant said, “You're going to have to overcome it. You may have to work harder for the same thing.” None of the participants expressed any particular frustration or anger with this notion, but instead talked about it as plainly as a casual conversation. This subtle yet powerful assumption aligns with the first tenant of CRT: racism is ordinary and

occurs in everyday life. So much so that it is expected. After hearing these stories, it begins to become clearer why diverse students do not enter the field. The hard work and constant perseverance may not be worth the considerable effort that only results in an average salary.

Diversity in the Workplace

The participants sampled work in a variety of settings including community, education, contract management, clinical dietetics, and leadership. When asked, “How would you describe your career and the diversity of the workforce in your environment?” only two participants felt that there was adequate diversity in their current work environment. LaDonna noted that when she first began her career at the hospital, there were other African-American dietitians in her department. But, as the years passed, they left and were replaced with white dietitians. When probed for reasons why this occurred, she said, “I had heard from black dietitians that the work was too much. There are probably a lot of other factors, but there are lots of black dietitians at (a nearby hospital).” LaDonna worked at a prestigious, world-renowned hospital where dietitians are encouraged to do research along with their daily patient caseload. The salary earned at this facility is not significantly greater compared to other institutions where research is not expected.

Lack of diversity in the workforce could have an effect on the success of the patient-practitioner relationship, especially when the dietitian is white and the patient is a

minority. According to the Institute of Medicine's Unequal Treatment report, sociocultural differences between patient and provider greatly influence communication and clinical decision making (Betancourt, Maina, & Soni, 2005). Gail says, "It works having the minority-to-minority experience. It works. I know their background. I know what they're talking about. I can give real-life alternatives. I don't say eat kale... You have to find alternatives that taste good." This comment suggests that minority health professionals have better reactions and relationships with their minority clients, and with an alarming number of nutrition related diseases and disorders afflicting minority health, increasing diversity in the dietetics profession is a worthy goal.

Success Factors and Resilience

All participants attributed their success to support of loved ones, community ties, and faith. This is not surprising, as factors of academic resilience include supportive families or peers, family life that holds high academic, moral, social expectations, goal setting, and resourcefulness (Wang, 1994, 1995, 1997). At the beginning of each interview, participants were asked, "Tell me your story" and were told to describe their early childhood experiences with school. Every participant mentioned family in the first sentence of their response, and every participant said they had the full support of their family throughout their dietetics education journey. Parents with high expectations were also mentioned, as well as parents who placed a strong importance on education. Faith was also mentioned with high importance by several participants.

My family, husband, my children. I have three children and they were not whiners when I had to leave. I had to travel a lot - my husband raised them. We have three brilliant children. And a supportive network of dietitians.

Leena cites religion and faith: "I have to give it to my lord and savior Jesus Christ, I'm a licensed missionary, I give it all to him first. Then my family. My husband has been very, very supportive." LaDonna credits her mother, "...confidence through strong mentors, mother. I don't believe you can make it without that."

Despite the fact that all participants were supported by family, they often felt alone during their undergraduate and internship experiences. They were typically many miles from family and had to rely on their long-distance support systems, as creating a supportive network was difficult at school. The demeanor and attitude of participants changed dramatically when discussing this part of their lives; they were smiling, content, and more than happy to credit their success to the support of their family, friends, and faith.

Membership in Professional Organizations

With the exception of Gail, all participants were very active in the professional organizations, member interest groups, and state and local dietetic organizations. The themes that emerged with this question include HIGH INVOLVEMENT and ACCEPTANCE. Gail listed cost as a factor for not belonging to the professional organization, citing \$250 as a high price to pay for the return on investment. Membership benefits include access to the Journal of the Academy of Nutrition and

Dietetics, reduced fees for conferences, and a limited number of continuing education credits. When dietitians are not members of the national professional organization, they then cannot become members of the state and local dietetic organizations as a rule, but they can attend meetings for a fee. This is quite limiting when a dietitian could attend local meetings to network and earn continuing education credits.

Despite the cold shoulders and lack of diversity of the profession, the participants are overwhelmingly involved in the national professional organization. The majority of participants have served on committees as chairs, delegates, and have been a part of the diversity leadership programs. Thea is currently serving as the president of the national organization, the highest form of leadership offered by the profession. Many of the participants also belonged to the member interest group known as NOBIDAN, the National Organization of Blacks in Dietetics and Nutrition. This member interest group is also conducting research regarding the lack of diversity in dietetics, and the results have not yet been published. NOBIDAN has also created a mentoring program, intended to mentor students in dietetic programs to increase their success. Some positive comments include:

I got encouraged by meeting dietitians at the local group. There were some that took me under their wings, invited me into their circle, and was able to do some things, I had a paper accepted into the journal, and did some grocery store tours. It has been great for building relationships.

These last few years have been the most rewarding. I have enjoyed being in NOBIDAN and being around those profoundly educated black women. Who would have known?

Involvement yields acceptance in the profession. After navigating the difficulties of higher education and internships, minority dietitians seem excited to be a part of the dietetics world, and work very hard to support the organization for the success of the profession.

Reasons for the Lack of Diversity

The participants in this study were varied in their response to the question “Why, in your opinion, is there a lack of diversity in the dietetics profession?” The most repeated theme throughout this topic was SUPPORT with many responses indicating both financial and educational support is needed to successfully navigate the path to becoming a dietitian. Gail attributed the lack of diversity to the fact that dietetics seems to be a hidden profession, “I think it's not cultivated, it's not explained, no one knows what we do, I don't think the support system is there, lack of dissemination of information, um, it's not real clear how you get to your goal. The internship is an extra step that you have to take- when you could just do nursing.” Similarly, Sylvia compared the disparities of diversity to that of the nursing profession, which is more diverse, “If you look at the mentors - they're mostly Caucasian women. Now, a lot of black girls see black nurses, and therefore they want to go into nursing. There is a black nurse’s

association. They get them to sign up, get mentoring; they are better connected to get the support they need.”

It is clear that there are many reasons for the lack of diversity in dietetics. Earlier research suggested lack of awareness and the increased need for support (Greenwald & Davis, Suarez & Shainklin, 2000, 2002). These reasons remain true, and in this study, other reasons include the need for financial and educational resources, options for alternate pathways, increased advising in high school, and the ability to match to a dietetic internship.

The participants were very passionate in their responses to this question. It was clear that they have a true love for their profession, they are saddened by the lack of diversity, and they have ideas for changing the face of the field. There was great insight in the responses from participants #2, #5, and #6, which was noted by vernacular of their answers. Phrases such as “I can see clearly,” and “After the cloud was lifted” and “I have looked at that many a day and time,” were used. It is evident that the participants have thought about this topic, have worried over it, and were extremely eager to share their viewpoints for this research. They were eager to respond to the question, in hopes that it would be documented and added to the body of knowledge.

I can clearly see that, first of all, there aren't enough programs, and there isn't a pathway that helps you to get in - there is one entry door, now we have the ISPY

program...I think that there need to be altered pathways to help people. We need to get stronger in the 2 year colleges to give people more opportunity.

There are a lot of psychological things - when in my school they told me that you're not college material. And in high school, they steer you based on where they think you fit. They push you to the trades - it makes it harder to be successful when you get to college. They don't know what your abilities are.

One, the science requirement. It's really heavy in science and a lot of times the minorities do not get the support they need at the collegiate level. I have, myself, encouraged students to go to other fields, because they were, you know, taking chemistry four times. So, I'm like, if you can't get through general chemistry, you're not going to be able to get through the program.

The other is the lack of resources. There's not a lot of scholarships to major in nutrition and dietetics, so, if you're majoring in math, engineering, nursing, there are more scholarships available. The other is, the supervised practice. Many don't realize that you have to pay someone to do an internship, why do you have to work for free, I have to answer that question over and over, but a lot of times people don't understand that. They want to get paid, or they want a scholarship or something to do it. That doesn't attract people who are from already

disadvantaged backgrounds. You know, where they need money and resources to get through college.

According to the participants interviewed, more support is needed to navigate through the dietetics education pipeline with success. Minority students need financial and emotional support to be successful. Requiring students to work for 1,200 hours completing an unpaid internship (while paying tuition for the internship) is not feasible. Mentorship programs need to be increased, advising systems must improve, and focusing on the success of minority students is integral to increasing diversity in the profession. Ensuring that minority students increase study skills and achievement in science courses will strengthen retention. An increased marketing campaign could heighten the profile of the profession, and expand the awareness of the careers in dietetics. Lastly, recruitment efforts in middle and high schools would also foster an interest in the field.

What Advice Would You Give a Dietetics Student?

When participants were asked what advice they would give dietetics students today, their responses often cited support, and the code SUPPORT was the most used theme for this part of the interview. The dietitians wanted student to seek out mentors, to find professionals to shadow and network with. One response recommended that the student find someone who has successfully navigated the pathway to becoming a dietitian, “whether they look like them or not.” She felt that having support and mentorship was the most important success factor.

Other suggestions included making sure students understood the curriculum and the steps towards becoming a dietitian. One participant advised that students should not “overwhelm themselves” and to take their time in order to achieve a high GPA to proceed through the curriculum, noting that if the GPA isn’t achieved, students will have to repeat courses and become frustrated. Other responses proposed that students should use their resources available on college campuses: tutoring, writing labs, library systems, etc. Commitment was also stressed, because the system is so difficult to navigate, the participants said that students must be ready for the hard work, but it is achievable.

The Dietetics Curriculum: Should it Change?

When participants were asked about possible changes in the curriculum, there were many different ideas for how this could be done. There was consensus that changes need to occur, and the proposed Master’s degree becoming a requirement by 2024 will not increase diversity in the profession, but will decrease diversity even more. Simple suggestions such as adding more counseling courses, requiring an ethnic food class, and an increased understanding of the research process were discussed. Sylvia shared that she thought all dietetic programs should be coordinated, putting students through the internship along with their coursework. Gail and #3 thought the internship hours should decrease, but didn’t address a specific number of hours to require, “Once you’ve done a rotation, it doesn’t matter what the field is.”

Feelings were somewhat mixed about requiring the Master’s degree. Some thought it would increase the recognition of the profession, and it would be on par with

similar health professions who already require a Master's degree. Others, like Gail, thought it would increase the cost of education greatly, without much return on investment:

I don't feel that it's necessary. I know it will mean more letters to put behind your name as far as education, but will it get you the skill set you need to be a good clinician? I don't think so? Especially for the salary, it's embarrassing. To pay more for education - if you're going to do that, the salary should increase.

Sylvia thought the Master's degree would lead to increased reimbursement, which could advance the profession.

I've been in many meetings with CDR (Commission on Dietetic Registration) and it's true - we can't be left behind if these other health professions are going to the Master's degree - level of credibility, it could increase our reimbursement, we have to keep up. I get it. I agree. It's a train, get on board.

With the requirement of the Master's degree come changes for the Associate's degree program, or the Dietetic Technician, Registered (DTR). The proposed standards for dietetic education reduce the DTR programs and their abilities and autonomy in the clinical setting. The current Bachelor's degree in dietetics would become the new DTR. This proposed change is somewhat upsetting to some participants, as some were DTRs before becoming RDs, or as Gail states:

We have lots of diet techs at the hospital, and they are in these positions because the route to be a dietitian is too challenging. And they stop. That's their choice. In our institution, there's not a lot that a tech can do. To pay for four years of college? So, therefore, I think if you go that route, I think you are going to lose people from the profession.

A sense of hopelessness (code theme HOPELESS) appeared during the coding of this data. The idea that the profession, an overwhelmingly white association, was in control and had made up their minds, and nothing else could be done. Marilyn says, "...there is no incentive for a primarily Caucasian organization to reach out to African-Americans. I don't see why they would be that concerned." Similarly, from Sylvia, "Is it a good idea? We don't have a choice. I think it's going to hurt a lot of people." Similarly, Thea replies, I love my profession, but it's not being responsive, there are so few African-Americans in the profession and we won't be having any more. The diversity will be reduced. We won't be able to serve our clients well. We need the members to raise up. The ones who know are just trying to survive." Lastly, frustrated by rash decisions, Leena states:

I think it's kind of sad in a way. Our target keeps moving, what they need to do is how to get that match rate up higher, looking at other professionals getting their masters - that's not the right thing for us to do. What we need to do first is to figure out what's wrong, fix that first, and maybe then look at the master's degree.

I don't think they are trying to come in at this point. I don't think they've thought that through. They're aging. We're not attracting young folks into the field.

Young folks are going into other areas. I had a young dietitian that wanted to be a pediatrician. Because we have such a solid background of those sciences.

These participants, who have spent years working harder than most to navigate the white-dominated profession of dietetics, who have been increasingly active in professional organizations to advance the profession, have concluded that the future is bleak and their voices are not being heard.

A Professional Identity?

The interview concluded with the question: Given the lack of diversity in the profession, how do RDs create a professional identity? Participants were overwhelmingly unsure of how to answer the question. Their responses were, “I don’t know” or “We don’t.” When asked to expand on this thought, there was not more information to be gained. The code used for this theme was NO PROFESSIONAL IDENTITY as not one participant could describe what their professional identity means to them.

The Problem at the Historically Black Colleges and Universities

An underlying problem emerged during one of the interviews, and should be included with the results. During the interview with Thea, the subject of HBCUs losing their accreditation statuses was brought up. There is currently no research regarding this

topic, but it was explained that the ACEND standards and stringent pass rate requirements (>85% pass rate required) are forcing the HBCUs to put their programs on probation, or to close completely. The HBCUs have been one of the lifelines to increasing diversity in the population, as they provide mentorship and diversity among faculty and students, making them sought out by minority students. If the vast majority of HBCU dietetics programs are disappearing, this could result in a significant reduction of minorities in the profession. Further research is needed to understand this phenomenon.

Aligning the Results with the Research Questions

This study aims to answer the questions: What are the experiences of minority female professional dietitians regarding training, education, and current practice? How do minority female dietitians create a professional identity? The major themes from the data collection demonstrate that the experiences of female minority dietitians align with the tenants of Critical Race Theory (Delgado, 2001). Racism and exclusion were experienced as a part of the training and education. The participants endured hardships and had to work harder than their white peers. The stories they have shared illustrate the barriers that exist in the dietetics profession. Likewise, because of these experiences; minority female dietitians find it difficult to develop a professional identity.

Despite these experiences, the participants were enthusiastic about their profession and maintain active membership in organizations that advance the profession.

Although they are content in their chosen career choice, they are saddened by the direction of the profession, and how the future of dietetics education will be shaped. They owe a great deal of their success to the support of their family, friends, community, and faith. With the lack of diversity in the profession, it is difficult for minority female dietitians to develop a professional identity. Professional identity is developed through professional socialization, and can be a stressful process that could be fostered by building relationships during the education process (MacLellan, Lordly, & Gingras, 2011). With the lack of diversity among faculty and peers, the socialization process is not always facilitated, and a professional identity seems unknown to minority female dietitians.

CHAPTER FIVE

DISCUSSION

This study investigates the phenomenon of the lack of diversity in the dietetics profession through qualitative interviews, through the lens of Critical Race Theory (CRT). This research is driven by the author's experiences as a registered dietitian and a dietetic educator, and through critical inquiry, hopes to understand the experiences of minority female dietitians in the educational route to practice, with the focus of understanding why minorities choose not to enter the field. Only 9% of registered dietitians identify as non-white, and 96% are female (Ayers, 2011), yet the populations served by registered dietitians does not match this demographic. The purpose of this study was to investigate the perceptions and experiences of minority dietitians in the dietetics profession and the barriers that exist which prohibit them from entering the field. Diversity in dietetics matters because of the populations served, who exist at the intersection of culture and food, where food choices have great influence on health and wellness, and the diversity of the dietetics profession could foster a positive impact on health. This chapter will discuss the findings and themes that emerged from the interviews, and how these themes correspond to the three tenants of CRT used in this study: 1.) Racism is ordinary and exists in everyday life, 2.) The idea of interest convergence and how racism can advance the interests of whites of any social class, 3.)

Viewing race through social construction, or the idea that races are a function of social thoughts and relations (Delgado, 2001).

The themes help explain the answers to the research questions: What are the experiences of minority female professional dietitians regarding training, education, and current practice? How do minority female dietitians create a professional identity?

Themes from the Early Education Pipeline

SUCCESS, INTEREST, and SUPPORT were the most common themes from the first part of the interview. Participants were asked to discuss their early childhood and education experiences, describe their towns and communities, and how they came to the field of dietetics. They gave rich descriptions of fond memories of childhood, family, and friends. This part of the interview was the lengthiest, as the participants seemed to want to go on and on, retelling the stories of their youth. All of the participants were high achievers in their early education, and loved school.

These findings are consistent with research surrounding the topic of resilience in education, as many researchers have asked questions about how minority students succeed. The achievement gap is well documented (US Department of Education, 1983 National Center for Education Statistics, 2001, National Assessment for Educational Progress, 2006), and many studies have been conducted to find what increases success in minority students. What has been found corresponds to the findings of this study. Students who have strong communities, families, support systems, and resources have increased success in education (Wang, et al, 1994, 1995, 1997).

Similarly, the participants cited rigid expectations set by their parents. Gail was told by her mother that she would have to work harder than the rest. LaDonna recalled

that her mother, “always thought that I was her smartest child.” Sylvia was a “military brat” whose parents had strict expectancies of her success. These high standards are consistent with resilience literature, and point to the concept that these high expectations are passed on to each generation. The belief that life has meaning and setting high expectations and personal goals is a set of resiliency attributes identified by Benard (1991). Sherrie discussed her mother’s high expectations for education, putting her in summer programs that stressed research and science. This emphasis stems from her mother’s expectations, and because her mother was also a teacher, she knew how to get her daughter involved in these opportunities. She was even awarded scholarships and college credit as a result of these programs.

Strong communities and resources are also important for resilience and success in school (Wang, et al, 1994, 1995, 1997). The majority of the participants reported strong relationships with relatives and friends, indicating extensive social support. Several of the participants also resided in a predominantly minority community. None of the participants felt as if their communities or schools were lacking resources, and discussed the opportunities they had in early education. They spoke of their teachers fondly, recounted their experiences in school, and some also mentioned the success of their peers.

Religion and faith also seemed to play a role in resilience, which is also consistent with the literature. Across ethnic groups and social class, religious beliefs are advantageous and provide standards and expectations that help guide behavior (Wang, et al, 1994). Several participants noted that they “lean on” their faith, or they put their religion first on their list of success factors. One participant disclosed that she was a

licensed missionary and was very active in her church. Masten, et al (1990) identified religious beliefs or relationships with religious protective figures, members of the religious community, or other religious relationships offer a protective factor that contributes to resiliency.

Themes from Higher Education

It was clear that dietetics was not always the minority student's first choice of study. As noted in previous studies (Greenwald & Davis, 2000, Suarez & Shanklin, 2002, and Wynn et al, 2017), significant barriers existed, making success difficult. Themes emerging from this section of the interview were slightly more critical, such as FIRST TO GO TO COLLEGE, INTEREST, and GATEKEEPING. The SUPPORT theme emerged, but in a different context. Participants pointed to a lack of support in the higher education experience. It seemed to be a different environment altogether. The rosy pictures painted of their childhood education quickly changed. Responses were shorter, some tears were shed, and feelings of disbelief were shared that still resonate years after the experience.

All but two of the participants started higher education with a career path other than dietetics. They wanted to be teachers, doctors, clothing designers, and secretaries. This is where the tenants of Critical Race Theory begin to become more apparent as the participants were accused of cheating when they did well on a test or were told they would have to work harder than their white peers. These responses illustrate and further the tenant of interest convergence, that racism is ordinary and apparent in everyday life, which advances the interests of whites (Delgado, 2001). The tenants of Critical Race Theory continue to be apparent in higher education, and into the internship and

professional world. Additionally, the participants reported that their programs had little diversity among faculty.

The theme HAD TO WORK HARDER emerged during this portion of the interview. Participants talked about doing well in early education, but struggled in higher education. If the participants had struggled in early education, they could lean on their established support systems such as family, teachers, and friends. In college, the participants were often hundreds or thousands of miles away from these support systems and often there was no one to turn to. Marilyn discussed the “shock” she received, being a young, 16-year-old teenager, living on her own at college, away from home. There were no African Americans in her dietetics program, and very few African Americans on campus overall. She said it was hard because “a lot of students studied together, and I was always left out.” Participants clearly identified that white students helped each other and had their own “network” which they were not a part of. To make things worse, white professors held them to higher standards, in one instance saying a student couldn’t “compete with the girls who had gone to the private catholic schools.” Poor advising and lack of mentorship were also factors that were included in this section of the interview.

The few studies investigating the lack of diversity in dietetics have identified lack of support and mentorship in dietetics programs as a problem. Suarez and Shanklin (2002) said that some factors minority students were uncomfortable in their programs and felt unsupported because of the lack of diversity. Greenwald and Davis (2000) found that some students felt they “encountered bias-related problems, sensing that their teachers and preceptors expected them to have academic problems.” Additionally, respondents of

this study said they had poorer preparation than non-minorities and craved encouragement and praise from their teachers and preceptors.

Mentorship is a common topic that arises with diversity in dietetics. For decades, the Academy of Nutrition and Dietetics has promoted the idea of mentorship, but has given little indication or instruction for doing so. The Diversity Toolkit and other publications promote mentorship, but the reality is that mentorship takes time, money, and resources to be successful. The lack of diversity in the profession leads to a lack of diversity in the faculty in dietetics programs, where mentorship should be occurring. Can non-minority faculty adequately mentor a minority student? If the participants in this study had significant mentorship in their higher education experience, perhaps they would have had sufficient support and resources that were needed to be successful. Instead they were alone, left to figure it out themselves. Felton, et al (2008) suggested hiring of African American faculty is not enough, but African American faculty must also be mentored through the promotion and tenure process, in order to increase diversity in academic programs and therefore increase mentorship opportunities. Additionally, they argue that faculty who exemplify excellence in advising and mentoring should be recognized and rewarded. These studies do not outline the notion of a successful mentorship program. What standards would be needed to create a successful mentorship program? This is a topic of future research.

Themes from the Internship

The most profound responses were collected during this portion of the interview, and there were many themes that emerged including: BAD EXPERIENCE, PERFECTIONISM, BODY IMAGE, DENIED ENTRANCE, LACK OF DIVERSITY,

HAD TO WORK HARDER, DISCRIMINATION, LACK OF SUPPORT. The majority of the themes were negative experiences, with a few exceptions, as outlined in chapter three. During the first interview with Gail, her response set the tone for this topic. When asked to describe the internship experience she said, “It was horrible, it was horrible, it was horrible. I was in constant fear.” Even in an HBCU internship, Marilyn was made to feel an outsider, as she had gone to a school in the north and therefore was attempting to “outshine the southern girls. Participants dealt with discrimination by their internship classmates who were upper-middle class white females. Some participants were not included in the network of white dietitians, were expected to fail, and felt as if they were set up to be “knocked down,” as Gail noted. The responses indicate that there is not a level playing field in dietetics education, and interest convergence continues to push white students past minority students. These obstacles are likely to keep other minorities from entering the profession, contributing to the disparities in diversity. With the United States projected to become a majority-minority population by 2043 (U.S. Census Bureau, 2012) which will require the need for a racially and ethnically diverse healthcare profession to meet the needs of the patient population. The dietetics profession will not be able to meet that need.

These same results have been echoed in the literature. Most recently, Wynn, et al (2017) found that white dietetics students received the highest level of faculty and preceptor support, and African Americans received the lowest. They also demonstrated that next to the internship application process, student support/mentorship and modeling was the second-highest rated barrier in dietetics education. Lastly, they found that students of diverse backgrounds perceive that they receive less support and that the

system of dietetics education is unfair (Wynn, et al, 2017). These results repeat what the participants of this study suggested: the pathway to becoming a registered dietitian is more difficult for a minority than it is for a non-minority.

Three tenants of Critical Race Theory aligned with these findings during the higher education and internship experiences. The first, racism is ordinary and exists in everyday life. Interest convergence, or the understanding that racism advances the interest of whites is displayed in the responses of the participants. Third, viewing race through social construction, that races are a fix of social thoughts and relations (Delgado, 2001). The struggles of the participants were real. They had to work harder to achieve the same goals as their white classmates, and their resilience and perseverance pushed them through their programs to completion. Similar to findings by White (2005), these women were allowed in to the programs, “but were not permitted to succeed” (p.135). The sacrifices made were not enough to satisfy the gatekeepers of the profession, which aligns with Ladson-Billings and Donner (2000) who conclude that society should “prepare the dispossessed and disenfranchised to better fit the corrupt system rather than rethink the whole system” (p. 290). The lens of CRT in this study works as a rubric to consider difference and inequality (Ladson-Billings & Donner 2000).

Participants as Professionals

After hearing the stories of the participants, one might think they would be cynical, exhausted with, or jaded about the process of becoming a registered dietitian. Surprisingly, this is not the case. After being discriminated against, fighting battles, and working harder than their white peers, the participants continue to speak highly of their profession. The recurring theme in this section of the interview was INVOLVEMENT.

All but one participant is an active member of the Academy of Nutrition and Dietetics. They volunteer with the professional organizations, they are preceptors, chairs, spokespersons, and participate in the committees and member interest groups of the organization. They do this on a local, state, and national level. Many have furthered their education with master's and doctoral degrees. Several participants work or have worked in dietetics education programs, contributing to the future of the profession. They are motivated to share the resilience factors that got them through the process with current students. But as Gail mentioned in her interview, as she physically motioned to grab another by the hand and pull them forward, there is no one there to hold onto. The faces of color are not coming to the profession, they are not entering the programs, and the generation that wants to pull them forward are fading in numbers.

Participant Perspectives for the Lack of Diversity

The participants agreed with the notion that there is a lack of diversity in dietetics. The more repetitive theme in this section of the interview was SUPPORT, along with INCREASE IN PROGRAMS. The internship shortage is not helping the diversity problem, and the future model for dietetics education will also be problematic. Increased program participation, more pathways, and mentorship were all suggested ways to increase diversity in programs. Unfortunately, the future education model does not include any of these options.

Changes in the dietetics education model are expected as soon as 2024. Current bachelor's degree programs will no longer produce dietitians. In order to receive the RD credential, students will have to obtain a master's degree, and complete 1,200 hours of supervised practice. Salaries are not expected to increase, but proponents of this model

agree that in order to be competitive with other health professions, dietitians must have a master's degree to practice. The competencies for dietetics education will also change with this shift, necessitating more demanding requirements to complete the program. Those graduating with the bachelor's degree will no longer be eligible for an internship, and will be able to practice in community and foodservice areas. The clinical jobs will be for the master's program graduates only (Accreditation Council for Education in Nutrition and Dietetics, 2016).

The participants had mixed feelings about the future model for dietetics education. They understand the need to keep up with other health professions, but they also know that increasing the rigor and requirements will keep minorities from seeking the profession. The rising cost of higher education is already a significant problem that transcends race, and adding higher costs without raising salaries will be a significant barrier. As Leena stated, "they throw out a carrot or a target and just about when you're ready to get that target, then they take it away."

When asking the participants, "What advice would you give to a current minority dietetics student?" their responses were very similar: find a mentor. They stressed the importance of not getting overwhelmed, follow the curriculum, and if you are uncertain, ask for help. This is imperative advice for students entering the field; create a network, a support system, a lifeline. The research is clear; mentorship is vital for success in dietetics education (Gitchell & Fitz, 1985, Hill-Hogan, 1990, Greenwald & Davis, 2000, Fitz & Mitchell, 2002, Suarez & Shanklin, 2002, Felton, Nickols-Richardson, Serrano, & Hosig, 2008).

Professional Identity

The second research question was the most difficult to answer. How do minority dietitians create a professional identity? The response from the participants was a resounding “we don’t.” Many were uncertain about the question, and even more uncertain about how to answer it. Defining professional identity didn’t help with responses. One participant noted that NOBIDAN was a game-changer. “If it weren’t for NOBIDAN, I wouldn’t have met such profoundly intelligent African-American women.” Other participants just said, “we don’t have a professional identity.” According to Clouder (2003), professional socialization is the “process by which people selectively acquire the values and attitudes, the interests, skills and knowledge – in short, the culture – current in groups which they are, or seek to become a member,” (p. 213). Thus, in order for the participants to achieve a professional identity, they would have to adapt to the culture of the group, or develop their own. With so few minority dietitians, the majority culture is largely white and female, making it difficult to create a professional identity or assimilate to the one that exists. This is not an ideal situation, and there is need for further research in this area.

Study Flaws

Although qualitative research can provide rich, thick description unlike other research methods, this can also be a flaw. Without numbers and other quantifiable data, it is difficult to determine the validity of the research (Merriam, 2009). I attempted to increase validity through the use of qualitative coding, member checks, and addressing subjectivity. The length of the interviews was a possible flaw. It was difficult to find participants willing to give an hour or more of their time to be interviewed. Likewise, the

transcription process and coding is lengthy. Because story telling is the foundation of Critical Race Theory, it was important to conduct the research with structured interviews. Story circles and focus groups might have been another option to use for increased participation and data collection.

Conclusion and Future Research

This study answered the research questions, and found several topics for further exploration. Seven minority dietitian participants from different backgrounds were interviewed. Even though their backgrounds were very different, many of their stories were the same. I gained insight to their true feelings and experiences they endured during their route to becoming registered dietitians. The process was grueling, and the discomfort was largely unnecessary, yet their resilience carried them through to success. And despite these difficulties in the process, they have become some of the loudest cheerleaders in the profession. I am incredibly humbled that they have shared their experiences with me.

I have many thoughts for future research. The discovery of the HBCUs losing their accreditation has me most intrigued. The accreditation documents need to be re-evaluated to investigate reasons why these programs are on probation. Are the gatekeepers who are the accrediting body preventing these programs from succeeding based on race? If the existing barriers that keep minority students out of the dietetics pipeline, are there more barriers in the accreditation process causing doors to close at HBCUs? I am also interested in the dietitian exam pass rate of minority dietitians. There is very little research in this area, and I am interested in contributing to the body of

knowledge. This study could also be continued by interviewing and comparing the stories of white female dietitians. Did they share similar experiences? If not, why?

Lastly, the door to explaining the diversity problem in dietetics remains open. Many arrows point to reasons for the lack of diversity, but it is truly the underpinnings of racism and interest convergence that keep it this way. Further research is needed to continue to put pressure on these bedrocks that block diversity with their ever-strong hold. A call to action is needed for dietetic educators to spend more time with minority students, to help guide them through every step of the higher education process. Dietetic internship preceptors must also answer this call, to not cause fear and hopelessness in the hearts and minds of minority students, but to lift them up and foster their success. Diversity in dietetics matters because of the populations we serve. If we don't heed the call today, the profession will suffer tomorrow.

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APPENDIX A. IRB APPROVAL



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NOTICE OF APPROVAL

Date: October 14, 2015

To: Jennifer L. Warren, School of Nutrition & Dietetics

From: Sharon McWhorter, IRB Administrator 

IRB Number: 20151007

Title: Diversity in Dietetics Matters: Success Factors from Education to Practice

Approval Date: October 12, 2015

Thank you for submitting your IRB Application for review. Your protocol represents minimal risk to subjects and matches the following federal category for exemption:

- Exemption 1 – Research conducted in established or commonly accepted educational settings, involving normal educational practices.
- Exemption 2 – Research involving the use of educational tests, survey procedures, interview procedures, or observation of public behavior.
- Exemption 3 – Research involving the use of educational tests, survey procedures, interview procedures, or observation of public behavior not exempt under category 2, but subjects are elected or appointed public officials or candidates for public office.
- Exemption 4 – Research involving the collection or study of existing data, documents, records, pathological specimens, or diagnostic specimens.
- Exemption 5 – Research and demonstration projects conducted by or subject to the approval of department or agency heads, and which are designed to study, evaluate, or otherwise examine public programs or benefits.
- Exemption 6 – Taste and food quality evaluation and consumer acceptance studies.

Annual continuation applications are not required for exempt projects. If you make changes to the study's design or procedures that increase the risk to subjects or include activities that do not fall within the approved exemption category, please contact the IRB to discuss whether or not a new application must be submitted. Any such changes or modifications must be reviewed and approved by the IRB prior to implementation.

Please retain this letter for your files. This office will hold your exemption application for a period of three years from the approval date. If you wish to continue this protocol beyond this period, you will need to submit another Exemption Request. If the research is being conducted for a master's thesis or doctoral dissertation, the student must file a copy of this letter with the thesis or dissertation.

Approved consent form/s enclosed

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APPENDIX B. INTERVIEW SCRIPT AND QUESTIONS

Today I will be considering the topic of diversity in dietetics. I am eager to hear about your knowledge and experiences regarding diversity in the dietetics profession.

My interests in facilitating this interview include: understanding ways you define diversity, learning about ways you have experienced or witnessed this phenomenon in your profession, hearing what you consider to be the major issues for lack of diversity in the field, and hearing about avenues you think can be taken to disrupt or change those patterns.

I have some specific questions for you that will guide the discussion, but I am especially interested in your ideas, opinions, and experiences. Please feel free to share as we go through the interview. That said, it is your decision when and how much to share with me. Your participation is voluntary; you should feel free to not answer or to stop at any time. In addition, the data collected here will be rendered anonymously. Nothing recorded today will be transcribed using names or other identifying details and recordings will be destroyed after transcriptions are complete. Do I have your permission to interview you for this study? If so, please check the applicable box below:

I am willing to participate in this study _____(initial)

I am not willing to participate in this study _____(initial)

Date: _____ **ID CODE:** _____

There are a few rules that I should establish before I start:

- 1. Please be thoughtful in your use of language. Refrain from offensive tones, gestures, and words.*
- 2. Please feel free to ask me for clarification if the question does not make sense.*

Thank you for your participation! Let's begin.

1. Please select your race/ethnicity (select all that apply):

- Black (Non-Hispanic)
- Hispanic
- Asian
- White
- Alaskan Native
- East Indian
- Native American
- Pacific Islander
- Other _____

2. What was your undergraduate area of study?

3. Do you have an advanced degree? If so, please elaborate:

4. Do you have additional certifications (CDE, CNSC, etc.)?

5. Have you held positions of leadership within the dietetic community? If yes, please elaborate:

Interview Questions

1. Tell me your story. Who are you? Where did you grow up? What was your life experience as a child? Describe your education through grade school to high school. What was the diversity in your community like as a child?

2. What brought you to the field? Was dietetics your first choice? What was your dream job? Did you have influence in choosing a career path? Who were your biggest supporters?
3. What was your formal education experience?
4. What was your internship experience like? Did any barriers exist in your education/internship? What was your support system like?
5. What was your internship match experience like? What influenced you most when ranking programs?
6. Were there other minorities in your program? Was there diversity among the faculty in your program?
7. What is your current position?
8. How would you describe your career? Describe the workforce in your department. Do you feel supported in your current career? If so, by whom?
9. What factors may have attributed to your success?
10. Have you maintained membership in dietetic professional organizations? If so, what has been your experience?
11. Why (in your opinion) is there a lack of diversity in the dietetics profession?
12. What are your experiences in working with minority clients?
13. Do you feel that patients could have better quality of care with a more diverse dietetics workforce? If so, in what way(s)?
14. What advice would you give to a minority student majoring in dietetics today? Have you or have you ever considered mentoring minority students in dietetics?

15. Do you think the route to becoming a dietitian should change? If so, how?

16. Should the dietetics curriculum change? If so, how?

17. What does professional identity mean to you? Do you feel that you have developed a sound professional identity?

18. How did your route to the profession contribute to your professional identity development and professional socialization?