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Church-Based Intervention on Prostate Cancer Screening for African American Men

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This is to certify that the doctoral study by

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2018

Abstract

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Project Submitted in Partial Fulfillment

Of the Requirements for the Degree of

Doctor of Nursing Practice

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Abstract

African American men have a significantly higher incidence of prostate cancer, they are diagnosed at a later age, have more advanced stages of cancer at diagnosis, and higher mortality rates than other ethnic group. The purpose of this project, guided by the Ottawa decision support framework and the health belief model, was to investigate whether church leaders could be trained to deliver an educational program about the value of prostate cancer screening to African American males in a church setting. The 2 participants were church leaders in a predominantly African American church. The participants were taught about prostate cancer and the value of screening using videos and informative brochures developed by the National Institute on Aging, the American Cancer Society, and the Centers for Disease Control and Prevention. A researcher-designed pre- and posttest questionnaire was used to measure learning. Data were analyzed using a paired sample *t* test. Although small sample size may have contributed to lack of statistical significance, the mean score comparison showed knowledge acquisition, thus enabling the trainers to offer the information to members of their congregation, who could then make informed decisions. This study demonstrated the value of using unconventional educational settings, such as churches, to reach populations who might be unaware of their health risks. The results show that church leaders can be trained to have a positive impact on the physical health of their congregations and promote social change by encouraging health care practitioners to investigate alternative settings and methods to educate vulnerable populations about diseases and disease prevention.

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Dedication

This doctoral degree is dedicated to my Lord and Savior, Jesus Christ as I hold onto his promise in Philippians 4:13. I can do all things through Christ, who strengthens me. To my husband, Jean-Michel Boulay and my three beautiful children: Sheryllyn, Mitchell and Shaynah Michelle Boulay, I love you to infinity and beyond. To my parents, Jean Cenessort Jeune and Jeanne Claudette Jeune. To all my siblings, their spouses and their children: Rooby & Joanne Jeune; Patrick & Kelly Jeune; Evens & Dana Jeune; Claire & Koby Anderson; Sheyla & Kinson Desir, and Daphney & Duwayne Peart.

To Sheila Barthelemy and my goddaughter Shelby Barthelemy, my best friend for life. Thank you for encouraging and pushing me to complete this doctorate degree. You have been the sister of my soul. Our friendship started the first day of nursing school and continues to grow stronger. We have traveled many journeys, some good and some bad. But, in the end, our friendship never wavered. I am glad to call you friend and sister. I love you.

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Table of Contents

List of Table

Section 1: Nature of the Doctoral Project

Introduction

Racial disparities in prostate cancer incidence and mortality are a national concern (Husaini, Reece, Emerson, Scales, Hull, & Levine, 2008). African American men have the highest incidence of disease rates and are close to 2.5 times more likely to die from prostate cancer compared to European American men (American Cancer Society, 2013). For African American men, the risk of developing prostate cancer is now 1 in 5 (American Cancer Society, 2013; Centers for Disease Control and Prevention , 2014). In addition, African American men also have a higher rate of death due to prostate cancer than any other ethnic groups (Centers for Disease Control and Prevention, 2014). This fact is not surprising given the life expectancy for African American men is several years shorter than other ethnic groups (Arias, 2011). According to the American Cancer Society (2013), prostate cancer exhibits the most pronounced racial disparity of all cancers in the United States. In response to increased prevalence of prostate cancer among African American men, a pilot program in a church-based setting was developed to increase knowledge about prostate cancer screenings and decrease the health disparity that exists among this vulnerable group of men.

Problem Statement

Prostate cancer is the most common cancer and the second leading cause of cancer deaths in men (American Cancer Society, 2013). Prostate cancer is the sixth leading cause of death in men worldwide, accounting for 6% of total cancer deaths in men in 2008 (Jemal, Bray, Center, Ferlay, Ward, & Forman, 2011). In 2010, there were 217,730 American men diagnosed with prostate cancer and 32,050 who died from

prostate cancer (American Cancer Society, 2010). In 2013, approximately 238,590 new cases were diagnosed, with 29,790 deaths from prostate cancer occurring in the United States. In Florida, in the same year, the estimated number of new cases of prostate cancer was 17,330, with 2,770 deaths (American Cancer Society, 2013). However, prostate cancer incidence is not uniform across racial and ethnic groups (Friedman, Thomas, Owens, & Hébert, 2012).

According to the American Cancer Society (2013), African American men bear a disproportionate burden for prostate cancer incidence and mortality, having the highest incidence rates, poorest survival rates, and a two-fold higher mortality rate compared to other racial and ethnic groups in the United States. African American men have a 1-in-5 lifetime probability of developing prostate cancer, compared to a 1-in-7 lifetime probability for their European American counterparts. The death rate for prostate cancer is 2.4 times higher in African American men than European American men. African Americans are the only ethnic group that did not meet the Healthy People 2010 goal of reducing prostate cancer mortality rates to 28.8/100,000. With the continuous disparities between African American men and other ethnic groups on prostate cancer incidence and survival rates, a key way to close the gap is individual health promotion, including disease prevention best practices to reduce the behavioral risk factors for prostate cancer (American Cancer Society, 2013; Odedina et al., 2011).

African American men have lower screening rates for prostate cancer compared to European American men (Lim, Sherin, & ACPM Prevention Practice Committee, 2008; Woods, Montgomery, Herring, Gardner & Stokois, 2006). Furthermore, African American men are significantly more likely to be diagnosed with prostate cancer at a

younger age (< 45 year old) compared to European American men (Karami, Young & Henson, 2007). In light of existing disparities in prostate cancer incidence and mortality, consistent screening for cancer has been shown to improve cancer incidence and mortality rates. Screen detected tumors are likely to have a better outcome than clinically detected tumors in between screening tests. Results from a large randomized study that examined prostate cancer screenings and mortality found that screening reduced the rate of death from prostate cancer by 20% (Schröder et al., 2009).

Prior studies have shown that a church-based setting is an acceptable venue in which to provide health information to African American audiences (Campbell et al., 2007). Churches play a significant role in many African American communities and represent a trusted, credible institution that addresses both spiritual and physical health (Drake, Shelton, Gilligan, & Allen, 2010). Church-based organizations represent a promising community setting in which to implement informed decision-making interventions targeted at African American men (Campbell et al., 2007; Holt et al., 2009; Sanchez, Bowen, Hart, & Spigner, 2007). Numerous studies emphasize the need for additional programs in faith-based settings about decision-making processes among African American men (Drake et al., 2010; Campbell et al., 2007; Holt et al., 2009; Sanchez et al., 2007). Therefore, the completed intervention program is an education-based approach for African American men regarding the benefits of early detection of prostate cancer. This program has had far-reaching effects on the education of African American men, providing them with the necessary information to make an informed decision about prostate cancer screenings. This program sought to decrease the health

disparity that exists between African American men and non-African American men by improving the health outcomes of the former group.

Purpose Statement

The purpose of this doctoral project was to collect data to help assess the effectiveness of an educational strategy that promotes prostate cancer screening behavior among African American men in church-based settings in Miramar, Florida. Implementing a program that both increases knowledge and empowerment and encourages behavioral change is important to decrease the health disparity that exists between African American and non-African American men. The specific goals of this doctoral project included (a) increased knowledge about the benefits of prostate cancer screening, (b) increased confidence in men's ability to participate in the decision-making process of prostate screenings, and (c) developing and testing the effectiveness of an educational intervention (Drake et al., 2010; Odedina, 2011). Overall, the purpose of this project was to focus on empowerment strategies that can ultimately promote positive screening behavior in African American men in faith-based settings.

Project Question

The population (or patient)-intervention-comparison-and outcome (PICO) model was used to formulate a question for this DNP project. The formulation of a PICO question was the first step in this evidence-based practice project. One of the main purposes of formulating a PICO question is to provide relevant and best evidence research that can be translated into practice Melnyk, Fineout-Overholt, Stillwell, & Williamson, 2010). The PICO question for this evidence-based practice project was the following:

Among African American men, will an educational intervention based on the Ottawa Decision Support Framework and the health belief model increase knowledge about prostate cancer screenings in a church-based setting?

Nature of this Doctoral Project

Significance

The significance of the DNP project is that it is particularly important for faith-based communities whose members suffer from disproportionately high rates of chronic diseases to assist in mitigating those disparities (Corbie-Smith, Thomas, & St. George, 2003). It has been noted that African American men suffer more from chronic diseases such as prostate cancer, which makes it necessary for further steps to be taken to reduce the occurrence and effects of these chronic diseases. One of the main ways of reducing the effects of prostate cancer is screening individuals who are prone to this disease. Unfortunately, African American men, who are in greater danger of contracting this disease more than any other ethnic group, rarely undergo screenings. Failure to undergo screening may be attributed to their culture in which they rarely talk about some diseases, especially if these diseases affect their sexual anatomy. Furthermore, there is a negative perception among African American men regarding prostate cancer screenings due to the procedure required for the screening. Using African American church leaders as conduits can lead to significant behavioral change among African American men who may be apprehensive about the disease and/or screenings (Kramish, Campbell et al., 2004). Though prostate cancer has shown to be prevalent in African American men, the group shows a great reluctance to participate in screening programs and other health-related studies (Boyd, Weinrich, Weinrich, & Norton, 2001). This reluctance needs to be

confronted as it is the key to reducing the prevalence of prostate cancer among African American men. Church leaders are respected members of society, which is one of the main reasons why African American men may listen to them more than their physician. Furthermore, if male church leaders in the churches attended by African American men encourage the men to participate in prostate cancer screenings, the stigma that African American men associate with the process will be significantly reduced. With time, the problem of low cases of prostate cancer screenings among African American men will improve greatly, leading to earlier detection and lower mortality rates.

Implications for Social Change in Practice

This project empowered church leaders to take initiative in the implementation of prostate cancer screening prevention programs for African American men. Empowering church leaders so they can effectively promote prostate cancer screening programs proved to be effective in changing the social views of African American men regarding prostate cancer screenings. DNP prepared nurses need to constantly search for avenues to improve the public's knowledge and awareness of new health approaches, techniques, and technologies and to formulate strategies to measure outcomes (Bradshaw, 2010).

DNP prepared nurses are front-line providers, and their decisions and input increase knowledge and awareness and foster change in the community (Bradshaw, 2010). By translating the DNP project into practice, I sought to increase the knowledge, decision-making, critical thinking, and confidence level of African American men and church leaders in the prevention of the deadly effects of prostate cancer. DNP prepared nurses are trained well regarding cancer prevention and screenings. They can be very effective when it comes to assisting African American men with understanding the value

of screening for prostate cancer. DNP prepared students can provide information to the church leaders so that as church leaders promote the prostate cancer screening program, they are clearly informed on the issue and thus can disseminate the necessary information to African American men.

Further strategies to (a)create more awareness of the issue of prostate cancer screening, (b) improve participation for African-American men in seeking health information, and (c) improve participation of African American men in studies and clinical trials need to be developed and evaluated (Forrester-Anderson, 2005). The use of African American church leaders significantly helps create greater awareness of health-related activities.

Summary

Racial disparities of prostate cancer occurrences and mortality rates are a matter of national concern today. African American men exhibit higher incidences and mortality rates of prostate cancer compared to European American men. African American men bear a disproportionate burden in prostate cancer incidences and mortality rates as they have higher incidence cases and twice the mortality rates of other racial groups in the United States. Health experts have researched and documented that early screenings and detection of prostate cancer leads to reduced mortality cases. The bad news is that, even though African American men face the most danger when it comes to prostate cancer, they have lower prostate cancer screening rates compared to their European American counterparts.

Consequently, I launched a DNP project where church leaders in African American churches were educated and encouraged to promote healthy behaviors such as

prostate cancer screenings among the African American male population. Studies have indicated that African Americans are more receptive to discussing health issues in church settings. Therefore, it is appropriate that a program was developed where church leaders among African Americans were encouraged to promote prostate cancer screenings. As a result, the mortality rate due to prostate cancer among African American men has the potential to be reduced significantly. DNP prepared nurses have the knowledge required to deal with prevention and screenings for prostate cancer. As a DNP prepared student, I educated church leaders and African American men leading to a greater awareness that prostate cancer is affecting African American men in a major way.

Section 2: Background and Context

Literature Review

I conducted a comprehensive literature review using multiple databases that revealed published reports related to African American men with prostate cancer. The following databases were utilized: Cumulative Index for Nursing and Allied Health Literature (CINAL), MEDLINE, EBCSO and Google Scholar. I targeted literature published between 1990 and 2015 with the inclusion criteria of African American men with prostate cancer. Keyword phrases consisted of *African American males informed decision making,"; prostate cancer screening in African American males, "faith-based settings African American males' prostate cancer, African American males prostate cancer, faith-based health programs,* and *knowledge in prostate cancer screening*.

African American Men with Prostate Cancer

The American Cancer Society estimates that 238,590 men in the United States would develop prostate cancer in 2013, and 29,720 men would die from the disease in the same year. These estimates indicated that, in 2013, prostate cancer would account for 28% of all expected new cancer diagnoses and 10% of all expected cancer deaths. Prostate cancer is the most common cancer and the second leading cause of cancer deaths among African American and European American men. With a 70% higher incidence rate and more than two times higher mortality rate among African American than European American men, prostate cancer exhibits the most pronounced racial disparity of all cancers in the United States.

In response to this problem, the role of church leaders as peer educators is an effective strategy for reaching other African American men in faith-based settings. The

church leaders, if informed effectively by DNP prepared nurses, can become effective peer trainers who guide African American men to develop a positive attitude toward the prostate cancer screening program. African American men are more likely to listen to their faith-based leaders, leading to more active participation in culturally-based project activities. Once leaders are properly informed, they can inform other members of the church about the project and continue to serve as peer educators. In the end, the community will have many members who are more aware of prostate cancer and the necessary steps for increased intervention.

Prostate Screenings in Faith-Based Setting

In developing this innovative program, published reports and expert opinions on information necessary for African American men to make informed decisions about prostate cancer screening was warranted. According to Saunders et al. (2013), religious institutions strongly influence individual behavior and social norms. Church-based organizations have a long history of independently and collaboratively hosting health promotional programs in areas such as health education (Hatch & Derthick, 1992; Wilson, 2000) and screening for cancer prevention and awareness (Davis et al., 1994). Church leaders have been instrumental in motivating others and modeling behaviors that may inspire men in church congregations to take more responsibility for their health. African Americans look favorably toward leadership in church congregations (Litwack, 1998). Findings by Holt et al. (2009) showed that spiritually-based interventions led by church leadership appeared to be more effective. Men read more of their materials in the spiritually-based group than in the non-spiritually based group.

In response to the increased prevalence of prostate cancer among African American men (American Cancer Society, 2013), in collaboration with a local church and as a DNP prepared nurse, I aimed to create an enabling environment that encouraged behavior change that targeted African American men aged 40 to 70. In addition, selection of peer educators is documented in the literature as an element that is critical to program success. Inclusion of key male church leaders is critical in mobilizing the interest of African American men in culturally based settings (Abernathy et

al., 2005). The participation of church leaders led to further interest of African American men in attending educational sessions on prostate cancer in a church setting. Recruitment of African American men into prostate cancer educational programs must focus on a community orientation rather than that of a provider or health site orientation (Weinrich, Boyd, Bradford, Mossa, & Weinrich, 1998). Therefore, using church leaders as peer educators is an effective and culturally appropriate way to promote screening and early detection of prostate cancer among African American men.

In the beginning of the project, church leaders were recruited to be trained as peer educators. They were invited to complete a pre and post test, designed to assess their knowledge of prostate cancer in general. After the informative session, the church leaders were able to provide the information to other church members based on program objectives. Once a month, the church leaders provided informational sessions provided by the American Cancer Society regarding prostate cancer screening. This project intervention focused on decision aids such as videotaped presentations and print materials. Materials such as posters, brochures, and bulletins were distributed. Overall,

innovative activities encouraged participation and promoted a sense of empowerment among African American men.

Evidence-Based Framework

This doctoral project intervention was guided by the Ottawa Decision Support Framework (Rosenstock, Strecher, & Becker, 1998) and the health belief model (Goldman et al., 2003). In the health belief model, participants who considered themselves to be more susceptible to a health condition and viewed that health condition as severe were more likely to take action. In this case, *action* refers to making a decision about screenings. According to the Ottawa Decision Support Framework (Rosenstock et al., 1998), participants used information about the pros and cons of each potential course of action and received guidance in clarifying their values relevant to the options available to them. This approach assisted participants to make informed decisions regarding prostate screenings (Drake et al., 2010).

Relevance to Nursing Practice

Wagner and Lacey (2004) argued that chronic diseases such as prostate cancer have high mortality rates and numerous hospitalization cases. In the nursing practice, most of the time and resources are therefore lost in treating individuals who have been affected by this disease. Resources that would be used in developing nursing care environments are directed to the purchase of medical materials for dealing with this disease. Therefore, a program that helps prevent prostate cancer morbidity and mortality could be very effective in reducing the burden that prostate cancer has placed on the nursing practice as a whole.

Nurses have researched and followed various practices and guidelines as they struggle to reduce the negative effects and outcomes of prostate cancer. In the last few years, success has been noted in the fight against prostate cancer as the cases of prostate cancer among many racial groups other than African American men have been reduced (King & Hinds, 2011). The nursing practice has focused on African American men to reduce the negative effects of chronic disease in this group, in which prostate cancer has been prevalent. The situation is worsened by the fact that a small number of African American men are screened for prostate cancer. The intent of this DNP project was to see an increase in the number of African American men being informed about prostate cancer screenings by church leaders, and ultimately receiving screenings. Ideally, this would lead to a general reduction in prostate cancer prevalence and mortality rates among African American men.

Role of the Doctor of Nursing Practice Student

I studied the effectiveness of the developed program by assessing it as it was implemented in various church localities. When the DNP project program was tested in the church, I collected the data. I used the results obtained from the field to develop a full report that could then be used in assessing the effectiveness of the program. In accordance with the results obtained, I developed recommendations for improvement of the program so that it could be more effective in dealing with the cases of prostate cancer among African American men.

Summary

The literature review revealed that a large number of American men are projected to develop prostate cancer in the next year. Prostate cancer is expected to account for

over 25% of all the new cases of cancer diagnosed in United States. Furthermore, prostate cancer has 70% higher incidence rate and over two times the mortality rate among African Americans than their European American counterparts. It has been noticed that in faith-based settings, people are likely to be more convinced when it comes to making the decision regarding prostate cancer screenings. It was noted that individuals are strongly influenced in terms of their behavior and social norms by the religion they profess (Erwin, 2002). Church leaders have played a vital role in inspiring men and are very effective in inspiring them to be more responsible about their overall health.

As a DNP prepared nurse, I collaborated with a local church to create an enabling environment for African American men aged 40 to 70 years old. African American men are more likely to follow the footsteps of their religious leaders. The church leaders were provided the collected data and left to offer monthly informational sessions, where they offered knowledge regarding prostate cancer as provided by the American Cancer Society. This intervention was vital to the nursing practice and the community as a whole.

Section 3: Methodology

Introduction

The purpose of this doctoral project was to collect data to help assess the effectiveness of an educational strategy to inform church leaders on promoting screening behavior among African American men in the church-based setting. All participants received the educational information delivered by the church leaders using a prostate cancer educational video and brochure, which was developed in collaboration with healthcare experts. A descriptive design was used for this educational program. A pre- and posttest was administered to the convenience sample to assess knowledge regarding prostate cancer and screenings.

Research Design and Methods

Timetable

The pilot program took place from November of 2017 through December 2017. The participants, African American men in a local church-based setting in Florida aged 40-70, made informed decisions regarding about the knowledge they needed about prostate cancer screenings. The data were analyzed and evaluated at the completion of the program (Table 1).

Table 1

Timetable

DATE	11/17	11/17	11/17	12/17	12/17	12/17	12/17	12/17	12/17
Review of published reports and expert opinion on information necessary for African-American men to make informed decisions about prostate cancer screening.									
Shekinah Church Pastor Josue and his assistant to participate in this doctoral project.									
Discussion with Church Leaders									
Recruitment of Participants									
Development of Educational Program									
Training the Leaders									
Implementation of Program									
Complete Program and Data Analysis									

Site for the Pilot Program

The pilot site for the project was Shekinah Church in Miramar, Florida, which has an estimated 100 members. The church's congregation consists of primarily African Americans. In addition, Shekinah Church presents a holistic community outreach that targets the African American community.

Target Population and Sample Size

The target population was African American males who ranged from 40-70 years of age in Broward County, Florida. Shekinah Church was used as the sampling frame. Discussions with church officials took place during the initial stages of proposal development.

Recruitment of the Population

After each service on Wednesdays, Fridays, Saturdays and Sundays, I spoke to the pastor of Shekinah Church. After receiving approval from Shekinah Church officials, the church leaders were recruited to participate in this innovative doctoral project. Participants' confidentiality was guaranteed, participation was completely voluntary, there was no pressure to participate, and participants could withdraw at any time without consequence in this innovative educational pilot program. A convenience sample of participants was recruited through Shekinah Church by pastors and other leaders in the ministry. Announcements were made at different services inviting the leaders to participate. In addition, flyers were posted and information was shared in the church bulletin. Men who were eligible to participate in the intervention were men who (a) self-identified as African American, (b) were between the ages of 40 and 70 and (c) had never been diagnosed with prostate cancer.

Procedure

This educational intervention was delivered from a culturally tailored curriculum based on a peer education model, which was designed for a group format in a church-based setting. This low-cost program was easily implemented and sustained by the local church. Because the program was not very costly, it is likely to have a positive effect on the economy of the country in terms of the resources that are unnecessarily provided when people do not realize they have prostate cancer until the cancer is at a critical stage. Most African American men stigmatize prostate cancer screenings. Various culturally developed myths and beliefs sometimes limit the ability of African American men to make sound decisions concerning their health.

The goal of this doctoral project was to increase informed decision-making about prostate cancer screening among African American men. Prior to the information session, informed consent was obtained from the participants. The informational project included viewing a 10-minute video featuring African American prostate cancer survivors and African American physicians describing prostate cancer risks and the risks and benefits of screening, and discussing screening recommendations and making informed decisions. After the video, an African American physician led a question-and-answer session about commonly held concerns (e.g., sexual functioning following treatment). A key emphasis in the informational session was to dispel myths about screenings, reduce fears and stigma, and emphasize the potential survival benefits of early detection. Participants were provided pamphlets on prostate cancer risks and screening and treatment options produced by the American Cancer Society. This information session lasted approximately 1 hour. Before and after completion of the information session, participants were

prompted to complete a questionnaire that required an additional 10 minutes of their time. A pre- and posttest measure design was administered to the convenience sample to assess knowledge regarding prostate cancer and screenings. At the end of the program, pre and post test scores were compared to evaluate knowledge improvement. After completion of this program, the I thanked the participants for completing the questionnaire.

Staff Selection and Training

Based on prior studies, raising awareness regarding prostate cancer requires partnership between trained healthcare experts and members of a community, with all parties interested in addressing a common problem. This approach requires church leaders to be in full partnership, participating in the planning, development, implementation, evaluation, and dissemination of the information (Israel et al., 2003). Leaders are respected and admired by almost every member in the church, implying that they have a high capability of influencing the African American men of the church. The church leaders were recruited and trained as quickly as possible so they could easily educate African American men on the dangers of prostate cancer and why screening is the best way of preventing extended morbidity and mortality. All church leaders were asked to participate in this doctoral project. I recruited eligible participants, obtaining written informed consent, administering the questionnaires, and delivering the project. All this occurred in one-day workshops that were conducted in the church office. These workshops also sharpened the pastors' and other church leaders' knowledge of prostate cancer. As such, they were able to disseminate knowledge and information in a more appropriate and convincing manner.

Data Collection

Data was collected by trained peer leaders after they received consent from the participants. The questionnaires were delivered in English. A pre and post test were used to assess the impact of the educational intervention. Participants completed self-administered questionnaires immediately prior to and following participation in a small group educational session. Questionnaires included prostate cancer knowledge, decision self-efficacy, and decisional conflict and control preferences. Sociodemographic characteristics (race, age, marital status, and education) and prostate cancer screening history (Have you ever been screened for prostate cancer?) data was collected. The definition for screening included both prostate-specific antigen and digital rectal exams.

To reduce potential participant burden, the relationship between prostate cancer knowledge and health literacy was also considered. To make an informed decision about prostate cancer screenings, men need adequate, plain language, culturally appropriate information, as recommended by Healthy People 2020 (U.S. Department of Health and Human Services, 2011).

Program Analysis

The statistic test utilized for this program was the paired *t* test. The paired *t* test calculates and compares the mean pre-program questionnaire knowledge score to the mean post-program questionnaire knowledge score. A minimum of two participants are needed in both pre-program questionnaire and post program questionnaire phase. The paired *t* test examined the difference in knowledge among participants regarding prostate cancer. For purposes of this pilot program, an alpha level of .05 was used to determine statistical significance. Because the sample size was small, statistical significance is

recognized as $p < .01$. Analysis was determined by using the Statistical Package for the Social Sciences (SPSS).

Human Subjects Protection

This educational intervention sought the approval from Walden University's Institutional Review Board (Walden IRB approval no.11-29-17-0247308) and Shekinah Church. Participants 'confidentiality was guaranteed through informed consents. Participation was voluntary, and there was no pressure for participating or withdrawing from this innovative educational pilot program.

Summary

The purpose of this project was to assess the impact of an educational intervention on prostate cancer screening behavior and knowledge. The program took place for a period of 3 days that spanned from November 2017 to December 2017. The chosen African American population was in Miramar, Florida. The selected site for the project was Shekinah Church, which is located in Miramar, Florida. The project targeted a population of African American men aged 40 to 70 from Broward County, Florida. To get people to participate in the program, a face-to-face invitation was extended to the leaders of Shekinah Church, after which further communication was made in person. Once the contacts were made and arrangements formalized, recruitment of African American men commenced with participants being assured of their confidentiality as they agreed to participate in the project. Pastors and other church leaders were recruited to attend the informational sessions, which were held over the course of 3 days. This project intervention was delivered from a culturally tailored curriculum based on a peer education model designed for a group format in a church-based setting.

The project focused on providing information to African American men so that they could make sound decisions when it came to health matters such as prostate cancer screenings. Participants filled out two questionnaires, one at the start of the session and another at the end of the session. This approach required church leaders to be present, as they are the individuals who play a significant role in bringing African American men to test and screen for prostate cancer. The data was collected in the form of questionnaires that were filled out by the participants. The questionnaires included vital information regarding perception of prostate cancer screenings, prostate cancer knowledge, control preferences, decision self-efficacy, and decisional conflicts. The collected data was compared using the paired *t* test. Afterwards, the data was analyzed using the Statistical Package for the Social Sciences (SPSS).

Section 4

Introduction

This DNP project was carried out to develop a pilot program to increase knowledge about prostate cancer with the help of the Ottawa Decision Support Framework and the health belief model in a church-based setting. The aims of the project were:

- to promote the Healthy People 2020 goal to reduce health disparity among African American males with prostate cancer (Healthy People 2020, 2011),
- to assess the impact of men's prostate awareness (educational intervention) based on prostate cancer screening behavior and knowledge and faith-based physical activity and interventions (Clarke et al., 2013), and
- to increase informed decision-making about prostate cancer screenings among African American men based on comparison of nonspiritual and spiritual-based educational intervention.

Through this project I sought to encourage African American men to participate in prostate cancer screenings to determine their health status. The church leaders facilitated the exercise at Shekinah Church. African American men are generally believed to be more receptive to discussing health issues in church settings, and this evidence led to the selection of this site (Clarke et al., 2013; Baruth, Wilcox, Laken, Bopp, & Saunders, 2008). Most of the members in this church are African American; African American men were the focus of the study as they are more susceptible to this disease than European American men (Durand et al., 2014).

Findings and Implications

The DNP project was focused on educating and improving decision-making among African American men as it relates to prostate cancer screenings. In the DNP project I applied the health belief model and other theoretical frameworks for meta-analysis and systematic reviews of faith-based physical health activities and intervention, health inequalities, and church-based workshops to improve decision-making. At the same time, the findings were used to compare non-spiritual and spiritual-based educational intervention and church-related men's prostate awareness for informed decision-making. I administered questionnaires before and after the educational program to assess the informed level of the participants on prostate cancer screenings (Clarke et al., 2013). The answers provided by the participants in the questionnaires were analyzed to assess the effectiveness of the exercise based on the comparison of answers before and after the educational program. The church leaders made an informed decision to take part on an educational intervention in health-related issues; based on the project, I deduced the role of the church in the provision of health education through the findings from the African American participants from Shekinah Church (Baruth et al., 2008).

I am a family nurse practitioner who is trained and educated on how to provide information effectively to church leaders on prostate cancer patients and the population in general. A large number of African American men lack knowledge on the disease and its health effects; this necessitated educational intervention in the church setting, where most men feel at ease to receive such information (Griffin, 2011). Knowledge on the disease and its effects, as well as the myths associated with it, is crucial in aiding prevention, care, and treatment. This helps reduce the chances of this at-risk population of getting

prostate cancer. The implementation of the project influenced medical practitioners to become more active in the prevention of prostate cancer among the African American male population, as well as all men worldwide. The project results also determined whether an educational intervention is a successful tool in church settings to pass health information along to congregants (Consedine et al., 2007).

Recommendations

Based on the study, I would recommend that future expansion of this program be considered. The program can be incorporated in many other church settings with African American men so that knowledge on prostate cancer can be spread to a wider population. In addition, project funds should be disbursed at the recommended time so that delaying of the project implementation and acquisition of various resources, training, and venue setup can be completed in ample time.

Contribution of the Doctoral Project Team

I was a major part of the project, as much of the medical information from experienced healthcare workers was required during the project implementation process. I was involved in the administration of questionnaires so that the participants could write down their answers for evaluation of the project and offered professional advice when necessary. Additionally, I was involved in assessing the knowledge of the church leaders pertaining to prostate cancer and how to pass educational information effectively to others. I also participated in the medical screening procedures for participants and provided necessary resources to those diagnosed with prostate cancer. During the analysis of the results, I assisted with any issues that needed clarification (Baruth et al., 2008).

Program Analysis

Two church leaders completed pre test covering demographic information such as age, marital status, and education level. They then completed a prostate cancer health history, addressing issues such as participation in previous PSA screening, diagnosis of prostate cancer, family history of prostate cancer, and perception of risk of prostate cancer. Finally, both participants completed the prostate cancer knowledge questions before listening to the 4-minute educational presentation. The educational program included a lecture, questions and answers, and a 4-minute video, featuring two African American prostate cancer survivors who shared their experiences of coping with a prostate cancer diagnosis. Men were encouraged to talk to their pastors, family members, friends, and doctors about prostate cancer. After the educational intervention, the church leaders completed a post test, which contained the same questions as the pre test. Both The scores were calculated by comparing the percentage of correct pre and post education responses to the questions regarding prostate cancer screening. To measure knowledge acquisition, percentages of correct responses were compared between participants' pre and post scores on the 24-item prostate cancer knowledge questionnaire. The mean post questionnaire score was significantly higher than the pre-questionnaire scores.

Strengths and Limitations of the Project

The project was intended to offer various advantages to the participants, including encouraging screening for early detection of prostate cancer and potentially saving lives. Screening for prostate cancer in African American men reduces chances of death through early detection and treatment (Jones, Jensen, Scherr, Brown, Christy, & Weaver, 2015;

Sajid, Kotwal, & Dale, 2012). The church-based education is important in helping participants to understand the disease, its cause, symptoms, complications, and diagnoses, as well as to identify and become familiar with the myths associated with the disease. The program can be applied to an individual or a group of participants, and it will be easy to estimate its impact on African American men. The project design is also favorable to individuals with different learning levels and styles, as the church leaders are familiar with how to address the participants appropriately (Holt et al., 2009).

The project does have some limitations, however. It takes considerable time to inform church leaders on the approach they are to take to gather the participants. Additionally, participants spent time on the review of the information, which means they had to compensate later for the time consumed by the project. The project required meeting with the church leaders in the church vicinity for the purpose of assessing the effectiveness of their knowledge and screening the participants' knowledge on the topic of prostate cancer. It was very labor- and resources-intensive (Clarke et al., 2013). However, the project is inexpensive. It is time-consuming and physically tiring as it involved driving back and forth to the facility to meet the leaders. Assessing the church leaders' knowledge was often frustrating because they were at different levels of knowledge. Another limitation was the uncertainty of whether the informational project was the sole cause of the change of behavior and knowledge before and after the presentation.

Section 5

Analysis of Self

The DNP project is an effective program in mentoring and providing information to the church leaders. This project helped me gain skills in doctoral practice through the preparation and implementation of the project. Additionally, it was significant in enlightening people on prostate cancer, as well as encouraging screening through church settings (Saunders et al., 2013). I have been able to effectively assess the knowledge of participants, as well as carry out screening procedures through the help of the DNP project. Thus, I would like to encourage the health sector to apply for such programs in large scale to help educate and save African American men from prostate cancer (Slater & Gleason, 2012).

In the course of implementing any project, challenges are inevitable. This project wasn't any different. Preparation of the project through writing, proofreading, arranging events in often strict schedules, and preparing a logical layout of the project were the main challenges I encountered in the DNP project preparation. Application of creative and critical thinking techniques helped me in overcoming the challenges and getting experience on how to handle them in future (Baruth et al., 2008).

Summary

Prostate cancer is a deadly illness that has claimed the lives of many African American men. A program on educational intervention in church-based settings is essential in enlightening individuals on the disease. The goal is to reduce prostate cancer cases, provide education on screening procedures, and provide treatment to vulnerable participants. Educational programs were the most effective intervention for improving

knowledge among screening-eligible minority men. Increased prostate cancer screening for African American men will ultimately lead to reductions in the cost of healthcare when the disease is detected early. The role of church leaders as peer educators was an effective strategy for educating African American men in the church congregation, thereby leading to more active participation in culturally based educational activities

Charts, tables, and graphs will be used in data presentation, and dissemination of the project will be done through presentation in conferences and seminars held by the church, as well as in platforms set up to mentor students. An audio and a text copy of the project will be uploaded to the Walden school website to serve as educational material to the online viewers (Jones et al., 2015; Sajid et al., 2012).

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