Background: It is surmised that a majority of women, especially college-aged women, lack sufficient knowledge about heart disease and the risk factors. There has been an abundant amount of research done regarding the risk perception and awareness of heart disease in the older generation, but there is a gap of knowledge about these risks and perceptions among college-aged women (ages 18-25).

Objective: To determine if there is a lack of knowledge among college-aged women regarding perceived risk and knowledge of risk factors for heart disease.

Method: The instrument for data collection was a 14 item survey. The instrument was distributed to 67 participants. Demographic items regarding race and age, as well as scales to determine the participants’ level of activity and rating of perceived risk (no risk to definite risk), were included in the survey. In addition, the survey included a list of 15 actual risks for heart disease. The participants were asked to “circle as many as you consider a threat”.

Results: Data showed that the level of knowledge regarding perceived risk of heart disease was very low among the 67 participants. The results concluded that 16 percent of participants were only able to identify less than five of 15 risks for heart disease. Fifty-eight percent of the participants were able to identify on average 5 to 9 of the 15 risks that were presented, and 21 percent identified 10 to 15 risks for heart disease. Out of all 67 participants only four percent were able to identify all 15 risks factors for heart disease.

Problem

Heart disease is a significant cause of mortality in the United States that affects both men and women. Historically, research conducted in this area has focused on males. During the past decade more studies have included focusing on the older female population. However, most of the recent research conducted on heart disease in relation to women has been focused on the older female
population. Little attention in research has been focused on college-aged women and their awareness of risk factors for heart disease or their perceived risk for the disease. Therefore, increased awareness and education for the younger female population is needed to help decrease the gap in knowledge about heart disease later in life and quite possibly help lower the rate of heart disease if changes are made early in life.

**Purpose**

The purpose of this research study was to describe the perceived risk factors for heart disease as identified by female college students ages 18-25, and to examine their current knowledge about heart disease using a quantitative research approach.

**Theoretical Background and Selective Review of Related Research**

A majority of women, especially college-aged women, lack sufficient knowledge about heart disease and the risk factors. Research has been done regarding the risk perception and awareness of heart disease in the older generation but there is a gap in knowledge about the risk perception and awareness of heart disease among college-aged women. Collins, Dantico, Shearer, and Mossman conducted a landmark study regarding heart disease awareness among college students in 2004. In this study, the researchers observed that, “women show lower levels of knowledge about heart disease than men, and often fail to identify heart disease as the greatest cause of death for women or their most important health concern” (Collins et. al, 2004, p. 406). According to Crouch (2011), women’s health issues tend to focus on female related health issues, such as menopause and breast cancer, creating a misperception that cardiovascular disease is not an important health concern for women (p. 239). Smith, Dickerson, Sosa, McKyer, and Ory (2012) discussed the idea that college students do not appreciate the perceived risk of heart disease. Furthermore, these researchers found that students do not acknowledge the risk of developing diseases that are precursors for heart disease, such as diabetes and obesity, (p. 104).

**Research Question**

The research question for this study was “What do college-aged women know about heart disease and do they perceive themselves to be at risk?”

**Setting**

The study was conducted on the LaGrange College campus, in front of the dining hall. LaGrange College is a private college located in LaGrange, Georgia.
Design

A descriptive design was used to determine the knowledge and risk perception of heart disease among female college students. This design allowed the researchers to examine the variables in a natural setting without manipulating variables.

Sampling Procedure and Characteristics

Inclusion criteria for this study were students of female gender, between the ages of 18-25, and currently attending LaGrange College. Excluded were any nursing or medical majors as well as any males regardless of major. Researchers were able to recruit 67 subjects using a convenience sampling method. Researchers, standing outside the college cafeteria, approached and invited students to participate in the study. An informed consent, requiring a signature to participate in the study, and an overview of the study was reviewed with each subject prior to completion of the survey.

Data Collection and Strategy

In 2006, Lynch, Liu, Kiefe, and Greenland developed the 14 item survey instrument used in this study. A copy of the survey and permission to use the survey was obtained from the publisher. The instrument was distributed to all 67 participants. Demographic items regarding race and age, as well as scales to determine the participants’ level of activity (1-10) and rating of perceived risk (no risk to definite risk) were included in the survey to determine if those characteristics of the women influenced their answers. The survey included demographic items regarding race and age, as well as scales to determine the participants’ level of activity (1-10) and a rating of perceived risk (no risk to definite risk). In addition, the survey included a list of 15 actual risks for heart disease. The participants were asked to “circle as many as you consider a threat”. The original instrument also included measurement of blood pressure and cholesterol; however, these variables were not being examined in the current study and were excluded.

Storing, Retrieving, and Analyzing Data

The data was gathered by using the above mentioned survey in a confidential and anonymous manner from female students on the Lagrange College campus. The data was untraceable to each participate and stored in a confined, locked file, only accessible to members of the team. Analyzing the data was completed by using summary statistics and graphing with the Statistical Package for the Social Sciences (SPSS) program. Upon completion of data analysis, all information was destroyed, to protect confidentiality of the subjects.
Ethical Considerations

All participants were required to sign an informed consent form prior to filling out the survey. The surveys were completely anonymous, and were stored in a secure location. These informed consents were held in a separate envelope away from the surveys. No human rights were violated throughout the course of this study.

Discussion and Conclusion

SPSS was used to analyze the data received from the 67 participants. The data collected showed that the level of knowledge was fairly low among the participants. However, the data did not present a clear reason why. Neither race nor age resulted in showing any significance in determining the participants’ knowledge or perceived risk of heart disease. A larger sample size may have been beneficial in showing a greater significance. It is suggested that another study be conducted on this subject using a larger sample.

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Sixteen percent of participants were able to identify less than five out of 15 actual risks for heart disease. Fifty-eight percent of participants were able to identify 5-9 out of 15 of the risks. Twenty one percent of participants identified 10-15 risks. Only four percent of participants were able to identify all 15 actual risks for heart disease. This data confirmed that there is a knowledge deficit regarding heart disease among this group.

The results proved that as the knowledge of causes of heart disease increased, so did the participants’ perceived risk of developing heart disease. The results showed that as the number of causes of heart disease recognized increased, so did the participants’ perceived risk. Therefore, the results confirmed that more teaching needs to be done with this age group regarding heart disease. The more these women learn about heart disease, the more personal it becomes. This could lead to an increase in self-care behaviors in the future.
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References


