A Comparison of Health Risk Behaviors among College Students Enrolled in a Required Personal Health Course vs. an Elective Personal Health Course

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Abstract

Research on whether health education, specifically personal health classes affects behavior change is inconclusive. In this study, a sample of students from two large southeastern universities enrolled in a required personal health course and an elective personal health course were administered the National College Health Risk Behavior Survey (NCHRBS) and the Self-Efficacy Scale. These surveys provided information on the overall health risk behaviors, health behavior changes, and self-efficacy levels of the student participants. Significant proportional differences were found within the descriptive and multiple regression analyses of (a) riding in a vehicle with a driver who has been drinking alcohol, (b) tobacco use, and (c) dietary behaviors. However, the small effect sizes indicated that the differences between the two schools were not large. Significant differences were also found among the comparisons of the current survey results to the national survey results collected by the Centers for Disease Control and Prevention in 1995. Further research is needed to determine how generalizable these findings are.

Introduction

Many premature deaths are due to poor individual health behavior choices, such as overeating, using tobacco products, and not participating in physical activities (U.S. Dept. of Health and Human Services, 2002). Some of these health behavior ideas and choices are often incorporated in the early adulthood years of life, which can affect the risk levels of chronic diseases that can occur later in life. As a result, knowing that poor individual health behavior choices can affect one's lifespan has the potential to be vitally important in preventing health problems, especially in the early adulthood years. Although major resources for health education are the health education courses offered in colleges and universities, the value of these courses is not known due to the poor documentation of health knowledge among the students taking these courses (Price & Nicholson, 1991).

Through extensive research, documentation of college students' overall health behaviors seems limited. Research tends to focus on one or two behaviors without examining the comprehensive health risk behaviors of college students. The Centers for Disease Control and Prevention (CDC) conducted a national survey analyzing college students' overall health risk behaviors in 1995 (Douglas et al., 1997). By analyzing college students enrolled in four- and two-year institutions, Douglas et al. (1997) found that "many college students' behaviors jeopardize their current and future health status" (p. 66). The results indicated that college students showed risky behaviors when it came to the use of alcohol and tobacco, failing to protect themselves from sexually transmitted diseases during sexual intercourse and using contraceptives inconsistently, having poor dietary habits, and participating in physical fights (Douglas et al., 1997). Although this information is important to understanding health behaviors among young adults, it is important to note that this study, being the most current national study performed by the CDC on college students, was performed over ten years ago.

Many factors can affect the behavior changes of students enrolled in college and university level health education courses and programs. Some of these factors include: the types of non-curriculum programs offered by the college or university (Haines & Spear, 1996; Lindsey, 1997; Lipnickey, 1998; Ramsey, Greenberg, & Hale, 1989; Schwitzer, Bergholz, Dore, & Salimi, 1998; Wechsler, Davenport, Dowdall, Moeykens, & Castillo, 1994; Ziemelis, Bucknam, & Elfessi, 2002), the teaching methods used to teach university and college level health education courses (Cleary & Birch, 1996; Petosa, 1984; Springer, Winzelberg, Perkins, & Taylor, 1999), and the self-efficacy of the students (Bandura, 1997; Stretcher, DeVellis, Becker, & Rosenstock, 1986).

College and university faculty have incorporated various health behavior programs and information into their curriculum and campuses to help educate the students in making healthy behavior choices and leading healthier lifestyles. Incorporating alcohol/binge-drinking programs, eating disorder programs, AIDS awareness programs, stress management programs, and health education courses are a few methods colleges and universities have taken to improve the students' health and educate them about health and wellness, as well as improving the accuracy of the perceptions of college student behaviors (Haines & Spear, 1996; Ramsey et al., 1989; Rehnberg & Barabasz, 1994).

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Teaching methods used in the health education courses may also impact the effectiveness of the course on the students. Many different methods have been incorporated into the higher education health courses, above and beyond lecture, with an attempt to increase the students' knowledge about health and health behavior changes. When looking at overall health behavior changes, journals (Lottes, 1995), health portfolios (Cleary & Birch, 1996), and behavior change contracts (Petosa, 1984; Wilson & Eisenhauer, 1982) are a few examples that have been incorporated into the health education courses to enhance the knowledge and behavior changes of the students. These instruments are being used to enable the students to reflect and apply their health knowledge to their everyday lives and make healthy choices.

Along with external factors that may affect health behavior change among students enrolled in a health education course, internal factors, such as self-efficacy, may also play an important role in health behavior change. Self-efficacy is the internal feeling one has that he or she can successfully perform a health behavior and achieve the desired outcomes (Rosenstock, Stretcher, & Becker, 1988). Self-efficacy is defined by Bandura (1977) as "the conviction that one can successfully execute the behavior required to produce the outcomes" (p. 79). Low self-efficacy or a lack of self-efficacy can be a perceived barrier to performing or changing a health behavior. In order to create positive lifelong changes in one's health behavior lifestyle, an increased level of self-efficacy is necessary before any positive change can occur (Glanz, Rimer, & Lewis, 2002; Rosenstock et al., 1988; Stretcher, Champion, & Rosenstock, 1997).

Purpose

The purpose of this study was to measure changes in health risk behaviors among a sample of undergraduate college students enrolled in elective and required personal health courses. Data examining the health risk behaviors was obtained at the beginning of the semester to be analyzed and compared (in a pre and post fashion) to the data measuring the health risk behaviors again at the end of the semester. The study attempted to answer the following research questions:

- What are the major health risk behaviors among the enrolled students of the required and elective personal health classes?
- Is there a relationship between the health risk behaviors among the students, the total self-efficacy level of the students, and the type of course the students are enrolled in?
- How do the health risk behaviors among the enrolled students of the personal health classes differ from the 1995 National College Health Risk Behavior Survey results?

Significance

Measuring the health risk behaviors among college students will provide colleges and universities with health needs data regarding health behavior among the students. As a result, instructors may be better able to direct the course material to the lifestyles the students are leading in today's era. Comparing the health behavior differences among the students enrolled at the two public universities in the southeastern United States and examining the differences in self-efficacy levels will also allow the schools to see if there are people with varied lifestyles entering into the classes, and whether the differences between the two schools are related to measures of behavior change. When comparing differences of behaviors among the students in the elective and required courses it may be seen that students choosing to enroll in a personal health class may be more willing to make pertinent changes to their health behaviors compared to those required to take the course. The comparison of the state universities to the national data may also give insight to the current college student behaviors and how they compare to the national averages.

Methods

Sample

The target population for this study was undergraduate college students enrolled in the freshman level personal health courses. The students were either enrolled in an elective course or a course that is a core requirement for graduation. The students' educational backgrounds were varied, as these courses were not restricted to specific majors or class levels. Students' demographic backgrounds were also varied. The demographic section of the survey asked students their age, gender, current year in college, fraternity or sorority participation, and ethnicity, along with other demographic questions. If 90 percent or more of the responses fell in one category, that variable was not used for comparison. These variables included being a full-time student and marital status. Over 90 percent of the students were full-time students and single.

Procedures

Two surveys were administered during the Fall semester of 2003. At the beginning of the Fall 2003 semester, students enrolled in an elective personal health course at one university and the students enrolled in a required personal health course at the second university voluntarily completed the Centers for Disease Control and Prevention's National College Health Risk Behavior Survey (NCHRBS) and a general self-efficacy scale survey. At the end of the semester, the NCHRBS was administered a second time in the same classes. The self-efficacy survey was administered only at the beginning of

the semester to acquire baseline information. Once the data was compiled, the pre and posttest results were merged into one file to analyze the differences.

Instrumentation

National College Health Risk Behavior Survey (NCHRBS).

The NCHRBS was created by the CDC to measure the health risk behaviors of college students. Specifically, it measures six types of behaviors: (a) behaviors leading to intentional or unintentional injury, (b) tobacco use, (c) alcohol and other drug use, (d) sexual behaviors, (e) dietary behaviors, and (f) physical inactivity (Douglas et al., 1997). According to Douglas et al. (1997), many of the questions included on the CDC's Youth Risk Behavior Survey (YRBS) were also included on the NCHRBS. The YRBS was developed based on a review of leading causes of death among adolescents and other age groups (Brener, Collins, Kann, Warren, & Williams, 1995). These causes were categorized into the same six health risk behaviors measured by the NCHRBS. Through research and testing the reliability and validity of the questions by the CDC, a final version of the questionnaire was developed and included questions in each of the behavior categories listed above. This final version is the NCHRBS used for the 1995 national study conducted by the CDC along with this current study.

Self-Efficacy Scale.

The total self-efficacy score obtained from the Self-Efficacy Scale (Sherer et al., 1982) was used in this study to examine the outlook of self-confidence and personal mastery among the students in the personal health courses. The items on the Self-Efficacy Scale focus on three main areas: "(a) willingness to initiate behavior, (b) willingness to expand effort in completing the behavior, and (c) persistence in the face of adversity" (Sherer et al., 1982, p. 665). The Self-Efficacy Scale can be used to assess self-efficacy expectations. According to Sherer et al. (1982), past experiences and tendencies tend to create patterns in behaviors and responses indicating that the Self-Efficacy Scale is a useful tool in assessing the success of behavior changes.

Analysis

Descriptive statistics were used to analyze the health risk behaviors among the enrolled students of the required and elective personal health classes. Multiple regression procedures were used to see if there was an interaction between the type of course in which the students were enrolled and the health risk behaviors; an interaction between the level of self-efficacy of the students and the health risk behaviors; and if the level of self-efficacy of the students can predict health behavior change, while controlling for background variables and pretest scores for the students. Along with the multiple regressions, standardized residuals were used to assess the proportionate differences of health risk behaviors between the two types of courses. Finally, one-sample *t*-tests were used to compare the health risk behavior differences among the enrolled students of the required versus elective personal health classes with the 1995 NCHRBS results. The test variables were the overall health risk behavior responses obtained from the required and elective courses. These were compared to the health risk behavior responses of the 1995 survey administered nationally by the CDC.

Results

Background Characteristics

Overall, 891 students completed the pre NCHRBS and the self-efficacy survey (Elective: n = 622; Required: n = 269) and 829 students completed the post NCHRBS (Elective: n = 593; Required: n = 236). Once all of the data were collected, it was edited to include only the students who completed the pre and post NCHRBS and the self-efficacy survey. This reduced the respondents to a total of 577 (Elective: n = 375; Required: n = 202) students for a 65 percent overall response rate. Individually, the students in the elective course yielded a 60 percent response rate and those in the required course yielded a 75 percent response rate.

The mean age of all students was 19.5 years and an overall majority of the students were female (female: 63%; male: 36%). Ninety-two percent of the students fell between the ages of 18 to 21 years of age. Eighty-two percent of the students also classified themselves white: non-Hispanic. Finally, most of the students (60%) in the total sample were in their first or second year of college and were not members (82%) of a fraternity or sorority.

Elective versus Required Courses

Two-way contingency tables were created for each risk behavior question and the two groups of students. Standardized residuals were calculated to assess the proportionate differences of health risk behaviors between the two courses. The results showed that students in each type of course had no significant differences for many health risk behaviors. However, on several questions there were proportionately more or less students performing a specific health risk behavior at one school compared to the other. The students in the required course had proportionately less risky behaviors than those in the elective course with behaviors related to: (a) consuming alcohol while boating or swimming; (b) consuming alcohol while operating a vehicle; (c) using any form of cocaine; (d) engaging in sexual intercourse with males or females; (e) using condoms; and (f) performing exercise and stretching activities. Students in the elective course had proportionately less risky behaviors than those in the required course on behaviors related to: (a) smoking cigarettes on fewer days out of a seven day period; (b) eating

green salads with greater frequency; and (c) participating in more college sports teams.

A series of hierarchical multiple regression analyses were also used to look at the health behavior differences among the two courses. Specifically, the relationship between the health risk behaviors of the students and the course the students were enrolled in while controlling for the students' background variables and their pre-course responses was examined. In each analysis, the risk behavior question was the dependent variable, the background variables and survey pretest variables were entered first, and the course distinction was entered second. The results are shown in Table 1.

The results showed that three health behaviors were significantly related to the course the students were enrolled in. The first behavior involved students riding in a vehicle with a driver who has been drinking. While significant, multiple R-squared, or the proportion of the variance accounted for by riding in a vehicle with a driver who has been drinking, increased by only 0.5 percent (R^2 Change = 0.005, p = 0.034). The coefficient for the course variable turned out to be negative indicating, overall, that the students enrolled in the elective course tended to increase their behavior of riding in vehicles with a driver who has been drinking alcohol at the end of the semester more than those enrolled in the required course.

The second behavior involved the students' habits of eating fruits and vegetables, which increased the multiple R-squared by 0.8 percent (R^2 Change = 0.008, p = 0.014). The coefficient for the course variable was positive, indicating that the students enrolled in the required course tended to have an increase in their behavior of eating fruits and vegetables with greater frequency than those enrolled in the elective course by the end of the semester.

Finally, the third behavior was the students' consumption of high fat foods, which increased the R-squared by 1.1 percent (R^2 Change = 0.011, p = 0.006). The coefficient for the school variable was positive, indicating that the students enrolled in the required course tended to have an increase in their behavior of eating more high fat foods at the end of the semester than those enrolled in the elective course.

Although the results of the past three behaviors were statistically significant, at the 0.05 level, their effect size, in terms of percent of variance accounted for, was very low. All of the questions had an effect size below 0.2 indicating that the course, itself, had a very low effect on the change in the health risk behaviors. With the type of course having little effect on the change of health risk behaviors, this could indicate that participating in an elective personal health course may not be a sign of the students' desire or readiness to make changes to their health behaviors. Other factors may be stronger predictors of change.

Effects of Self-Efficacy Health Risk Behaviors

Hierarchical multiple regression analyses were used to observe if a relationship existed between the health risk behaviors among the students and their total self-efficacy level. The analyses were similar to the regressions described above, except that self-efficacy was added as an independent variable prior to adding the course status. The results are shown in Table 1. When controlling for self-efficacy, riding in cars with drivers who has been drinking alcohol and eating high fat foods are no longer significant changes, while eating fruits and vegetables still is. Also, tobacco use is significantly related to the self-efficacy level. Since the nonsignificant results are never close to being significant, the results of this test are very similar to the hierarchical multiple regression results analyzing the relationship between the type of course and the health risk behaviors. This may indicate that the self-efficacy level did not greatly affect the health risk behaviors, except for the fruits and vegetables variable and the tobacco variable.

In regards to the tobacco use, when analyzing the number of days cigarettes were smoked within a 30 day period, the multiple regression results indicated that adding the total self-efficacy variable improved the proportion of the variance accounted for by 0.3 percent (R^2 Change = 0.003, p = 0.027). Also, when analyzing the number of cigarettes smoked within a 30 day period, the multiple regression results showed that adding the total self-efficacy variable improved the proportion of the variance accounted for by 0.3 percent (R^2 Change = 0.003, p = 0.013). Interestingly, when observing the correlations between self-efficacy and the number of days cigarettes were smoked and the number of cigarettes smoked, a positive result showed that as the self-efficacy level increases, so did the number of days cigarettes were smoked and the number of cigarettes smoked.

Finally, the multiple regression analysis of the fruit and vegetable consumption behavior indicated that self-efficacy significantly improved the proportion of variance within the health behavior. The total self-efficacy variable accounted for 1.0 percent (R^2 Change = 0.010; p = 0.008) of the variance within the behavior of eating fruits and vegetables, while controlling for the background variables and the pre test score of the students. A positive correlation was also found with the total self-efficacy indicating that as the students' self-efficacy level of the increases, there is an increase in the frequency of eating fruits and vegetables.

Once again, although significant results were found, the effect sizes were very low. Each result had an effect size below 0.2 indicating that the self-efficacy variable had a very low effect on the change in the health risk behaviors.

Comparison of the Course Results to the National Data

One sample *t*-tests were performed on 22 health risk behaviors that represented the six health risk behavior categories established by the CDC: (a) intentional or unintentional injury; (b) tobacco use; (c) alcohol and other drug use; (d) sexual behavior; (e) dietary behavior; and (f) physical inactivity. In this analysis, the samples of students from the two universities were combined to compare the data of the entire sample to the national data. In each test, the mean of the combined student sample was compared to the mean of

Table 1

Multiple Regression Results Showing Regression Coefficients and R-Square Changes Between the Types of Courses and Self-Efficacy

Question	Model	R square change	F-change	Sig.
23 - Ride in car with person who has been drinking	Course [a]	0.005	4.541	0.034 *
	Course [b]	0.005	4.593	0.033 ◊
24 - Drinking and driving	Course [a]	0.000	0.000	0.995
	Course [b]	0.000	0.000	0.993
36 - # of days cigarettes smoked in past 30 days	Course [a]	0.000	0.296	0.587
	Course [b]	0.000	0.433	0.511
37 - # of cigarettes smoked in past 30 days	Course [a]	0.000	0.140	0.708
	Course [b]	0.000	0.253	0.615 †
43 - # of days having at least 1 drink in past 30 days	Course [a]	0.000	0.031	0.861
	Course [b]	0.000	0.038	0.846
44 - # of days having 5+ drinks in past 30 days	Course [a]	0.000	0.101	0.751
	Course [b]	0.000	0.102	0.749
47 - # of times used marijuana in past 30 days	Course [a]	0.000	0.005	0.944
	Course [b]	0.000	0.001	0.975
50 - # of times used any form of cocaine in past 30 days	Course [a]	0.003	2.490	0.115
	Course [b]	0.003	2.352	0.126
56 - # of times used alcohol & illegal drug in past 30 days	Course [a]	0.000	0.000	0.995
	Course [b]	0.001	0.558	0.455
63 - # of times had sexual intercourse in past 30 days	Course [a]	0.000	0.225	0.635
	Course [b]	0.000	0.278	0.598
64 - How often was a condom used in past 30 days	Course [a]	0.003	2.577	0.109
	Course [b]	0.003	2.543	0.111
75 - Diet to lose or keep same weight in past 30 days	Course [a]	0.000	0.057	0.811
	Course [b]	0.000	0.092	0.762
76 - Exercise to lose or keep same weight in past 30 days	Course [a]	0.002	1.458	0.228
	Course [b]	0.002	1.494	0.222
81-84 - Yesterday, # of times fruits and vegetables eaten	Course [a]	0.008	6.045	0.014 *†
	Course [b]	0.007	5.540	0.019 ◊
85-87 - Yesterday, # of times high fat foods eaten	Course [a]	0.011	7.489	0.006 *
	Course [b]	0.011	7.481	0.006 ◊
88 - # of days played sports in past 7 days	Course [a]	0.000	0.241	0.624
	Course [b]	0.000	0.323	0.570
90 - # of days strengthening exercises used in past 7 days	Course [a]	0.000	0.026	0.871
	Course [b]	0.000	0.035	0.852

Course [a] = Multiple Regression results analyzing health behaviors controlling for course type only. Course [b] = Multiple Regression results analyzing health behaviors controlling for self-efficacy and course type. * $p < .05$ when controlling for type of course only. † $p < .05$ when controlling for self-efficacy only. ◊ $p < .05$ when controlling for self-efficacy and type of course

the national CDC sample. These results are shown in Table 2. Of the 22 risk behaviors tested here, 20 were significant at the .05 level, and 18 were significant at the .001 level. Overall, the combined samples had riskier health behaviors than the national average. They had riskier behaviors in all of the categories except for the dietary behavior and physical inactivity behavior categories. The students enrolled in both types of courses tend to eat vegetables with greater frequency and high fat foods with less frequency than the national sample. They tend to participate in healthy physical activities with greater frequency than the national sample, as well.

Conclusions

First, there are several limitations to this study. The most important limitation is that pre-existing conditions may exist between the students enrolled in the required and the elective courses. These conditions include acceptance

Table 2

t-tests Comparing CDC National Data to Required and Elective Course Data

Question	Mean (required & elective)	Test value (CDC)	*t*-value	*d*	sig.
23 - ride in car w/ person who has been drinking	2.06	1.70	6.957	0.288	0.000*
24 - drinking and driving	1.60	1.53	1.729	0.069	0.084
36 - # of days cigarettes smoked in past 30 days	2.62	2.20	5.153	0.213	0.000*
37 - # cigarettes smoked in past 30 days	2.48	2.03	6.587	0.276	0.000*
43 - # of days having at least 1 drink in past 30 days	4.38	2.60	24.503	1.021	0.000*
44 - # of days having 5+ drinks in past 30 days	3.47	1.90	23.418	0.973	0.000*
47 - # of times used marijuana in past 30 days	2.00	1.31	12.210	0.506	0.000*
50 - # of times used any form of cocaine in past 30 days	1.10	1.01	5.425	0.216	0.000*
56 - # of times used alcohol & illegal drug in past 30 days	1.31	1.16	4.508	0.183	0.000*
63 - # of times had sexual intercourse in past 30 days	3.28	2.88	4.674	0.194	0.000*
64 - How often was a condom used in past 30 days	3.40	2.39	10.528	0.438	0.000*
75 - Diet to lose or keep same weight in past 30 days	1.62	1.69	-3.332	-0.143	0.001*
76 - Exercise to lose or keep same weight in past 30 days	1.36	1.46	-5.029	-0.207	0.000*
81 - Yesterday, # of times fruit was eaten	1.91	2.00	-2.447	-0.010	0.015**
82 - Yesterday, # of times drank fruit juice	1.88	1.99	-2.789	-0.120	0.005**
83 - Yesterday, # of times green salad was eaten	1.60	1.45	5.241	0.221	0.000*
84 - Yesterday, # of times cooked vegetables eaten	1.56	1.80	-7.990	-0.335	0.000*
85 - Yesterday, # of times eat high fat meats	1.29	1.43	-5.904	-0.239	0.000*
86 - Yesterday, # of times fries or potato chips eaten	1.48	1.49	-4.630	-0.015	0.643
87 - Yesterday, # of times eat high fat desserts	1.58	1.69	-3.341	-0.144	0.001*
88 - # of days played sports in past 7 days	3.76	3.05	8.466	0.350	0.000*
90 - # of days strengthening exercises in past 7 days	2.97	2.60	4.419	0.186	0.000*

Note: Significance level set at .002 with the Bonferroni Method.

* $p < .002$. ** $p < .05$

requirements for each university, the location of the school, and the socioeconomic status of the students enrolled in the school. These pre-existing conditions make it difficult to know the reason for why the schools differed. The best that could be done here was to control for a number of student background variables. These variables were age, gender, class standing, current year in college, fraternity or sorority participation, and ethnicity.

Another limitation is the difference of teaching styles between the two classes. The two courses have the same objectives, namely to enhance the health behavior knowledge and self-confidence of the students, and their content is nearly identical. Nevertheless, other differences exist. The elective course sample had an approximate total of 700 enrolled students and was taught by lecture, video, and classroom discussion. On the other hand, the required course sample had an approximate total of 300 enrolled students and was taught using lecture, video, and classroom discussion, similar to the elective course, but also incorporated many activities to complete outside of the classroom, such as Passport activities.

Based on the data from this study, very few statistically significant (at the .05 level) health behavior changes could be attributed to the type of course in which the students were enrolled. Although self-efficacy was shown to have a positive correlation with tobacco use, it still had a very small effect size indicating that it has little interaction with behavior change, as well. However, given the fact that statistically significant results and positive correlations did occur, it would be beneficial to point out the teaching styles of the courses. The required course tends to incorporate additional interactive assignments (i.e. Passport activities) in the curriculum for the students to complete. This may allow the students to learn, understand, and relate to health risk behaviors that they may have or their peers may have at a different level. Some of the riskier health risk behaviors found within the study included (which could be analyzed further) are: (a) drinking alcohol while boating or swimming; (b) drinking alcohol under the age of 21; (c) regular use of alcohol; (d) binge drinking; (e) marijuana use; (f) sexual behaviors (sexual intercourse under the age of 18; unprotected sexual intercourse); (g) HIV/AIDS testing; and (h) dietary and activity behaviors for the purposes of weight loss.

This study showed that, overall, the students tend to have riskier health behaviors when compared to 1995 national data. Once again, the national survey was performed in 1995, over ten years ago. It is important to recognize that the health behaviors of the selected students in both samples are riskier and this may indicate that the health behaviors of college students are at a riskier level than they were over ten years ago. The CDC was planning on conducting the NCHRBS again in the year 2005 depending on the available resources (Senior Health Information Specialist, personal communication, March 9, 2004). However, the study has yet to be completed. This data could show that the national trend is toward riskier behavior. In that case, it would be very interesting to compare the new data to this study's data, or run the survey again, and compare it to the new national data. Whether the pattern of riskier health behaviors turns out to be a current trend among college students or if the results only relate this study and not generalizable, would be critical for health educators to know. Health risk behaviors may change over time and looking at current data would help with making a true comparison and understanding the current trends.

Finally, even though the data analyses did not show many statistically significant results in comparing elective versus required courses, the descriptive data acquired from this study would be beneficial to health instructors teaching personal health courses or in other education settings to observe what types of health risk behaviors are the current trends of college students. Current trends should be observed allowing for the course curriculum to be altered. Those teaching personal health or other health education courses could apply this information by adjusting the curriculum to review the current health risk behaviors relevant to college students and address current issues at hand within their courses. This may allow the students to learn, understand, and relate to health risk behaviors that they may have or their peers may have. This may also allow for the instructors to better relate to the students in understanding what types of health issues they may be facing on a regular basis along with seeing the positive and negative changes over time. With the CDC's continual effort to analyze the nation's health behavior trends and the continual analysis of the current local trends, a reduction in the risky health behaviors among the college students may be obtained.

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