The Effects of Stress and Coping on Academic Performance

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The Effects of Stress and Coping on Academic Performance

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Abstract

Populations of college students experience high levels of stress and utilize coping mechanisms to manage the source and psychological symptoms. The current experiment surveyed undergraduate students enrolled in Introduction to Biology at the College of Charleston on stress, coping mechanisms, neuroticism and conscientiousness, and social desirability to determine if stress and coping had any effect on academic outcome—measured as a student’s lecture grade in the class. Findings demonstrated conscientiousness was the only significant predictor of lecture grade. Analyses also demonstrated interactions between conscientiousness and avoidance, where avoidance coping benefits individuals who are high in conscientiousness and hinders those with low levels of conscientiousness. There was also an interaction between avoidance and social support demonstrating the effectiveness of avoidance coping is determined by social support coping. The results suggest that personality variables and coping strategies interact to determine academic outcome. Future research could look into the more specific interaction of all personality variables and coping strategies while taking into account students’ overall grades, instead of specific grades in one class.
The Effects of Stress and Coping on Academic Performance

Stress is a psychological state of tension to which no one is immune. The vast majority of individuals experiencing stress employ coping mechanisms to mediate their mental condition. While stress is widespread in all populations, it is particularly prevalent among students in university settings. Students experience stress from a range of sources, including the transition to college, the desire to earn good grades, and the need to plan for the future. Because of this ubiquitous phenomenon, colleges set up programs to manage student stress, establishing peer counseling centers, exam week relief activities, tutoring labs, and supplemental instruction for the most demanding subjects. Researchers have attempted to identify sources of student stress and characterize its physical and psychological effects. Studies also aim to find the most successful coping strategies, and to further understand the success and origination of particular mechanisms.

Stress

Early research demonstrated student stress as originating from four areas: exams, class requirements, teaching structure, and the interaction between home and school life (Shirom, 1986). More current research conducted by David Robotham (2008) suggests that the four main contributors of student stress are studying, exams, transition, and finance. Study stress stems from pressure to meet deadlines, workload, fear of failure, time management, lack of sleep, and temperament while studying; it can also result from (and cause) an array of physical and emotional symptoms (Robotham, 2008). Researchers found that exam stress originates from the anxiety of taking tests, rather than a specific exam or area of study—this is demonstrated by the decrease in anxiety symptoms after beginning a test (Robotham, 2008). Transitional stress occurs especially in college student populations because many of them are adjusting to leaving home for
the first time, taking on new responsibilities, and navigating new social environments—all while feeling an ever-present pressure to succeed (Robotham, 2008). Financial stress results from monetary uncertainty, debt, and working while taking classes (Robotham, 2008). While the main stressors have altered slightly over time, the core concepts are consistent, making the case that stress has been and will continue to be prevalent in university settings and therefore is important in psychological study. Though stress is believed to be a negative emotion, there are study results that demonstrate stress as positive, affecting persistence (Zajacova, Lynch, Espenshade, 2005) and performance. This is consistent with the Yerkes Dodson Law, where moderate anxiety yields maximum performance (Broadhurst, 1957), and was replicated by Rafidah and colleagues (2009), who also concluded that moderate levels of stress contributes to favorable academic performance. According to research conducted on Malaysian students in a pre-diploma program, perceived stress remains at a moderate level throughout a given semester, with the exception of a slight increase in the middle of the semester (Rafidah Azizah, Norzaidi, Chong, Salwani, & Noraini, 2009).

Research has shown that physical indicators of stress that can predict performance. A study conducted by Bardi, Koone, Mewaldt, and O’Connor (2011) compared behavioral and physiological symptoms of stress to exam performance in a population of college chemistry students. The results demonstrated that frequency of displacement activities (DAs) used during exams negatively correlates with academic outcome (Bardi et al., 2011). The researchers monitored tapes of students taking exams, coding the frequency of DAs, including unnecessary movement of pen or paper, massaging oneself, prolonged hand to body contact, expressed anger or discontent, stroking one’s head, and breaking or pausing during an examination (Bardi et al., 2011). Students more frequently displayed these nonverbal, stress-related behaviors later in the
semester, suggesting increased stress during examinations throughout the duration of the class (Bardi et al., 2011). The results also showed that the students who more frequently demonstrated DAs during exams had lower grades and were more likely to receive a D or F in the class (Bardi et al., 2011).

Coping

Because stress is so prevalent, researchers are also interested in what decreases stress, and how stress can be positively channeled. Individuals who have higher levels of perceived control over time are more likely to have lower levels of stress (Nonis, Hudson, Logan, & Ford, 1998). Perceived control over time refers to time management, and promotes problem solving ability and individual well-being. The same study also revealed that while perceived control over time positively affects health, academic stress is much more influential and negatively affects psychological health (Nonis et al., 1998). In a study conducted by Ben-Zur and Zeidner (2012), the students who reported higher levels of perceived stress were more likely to use less effective coping strategies, engage in risky behavior, and experience negative emotions at higher levels. The more threatening a stressor appears to be, the more likely a student will engage in a detrimental coping style (Ben-Zur & Zeidner, 2012), so not only do stressors have direct negative effects, they can also indirectly cause further harm by prompting the use of the incorrect coping strategy.

Stress research has looked into the way in which individuals handle anxiety through coping mechanisms, also considering the effectiveness of coping in various situations. Coping is generally divided into three main strategies: problem-focused coping, emotion-focused coping, and avoidant coping. Problem-focused coping refers to any mechanism—whether it be a thought, action, or specific strategy—employed in response to a stressful event to lessen or end the impact
or the stress itself (Struthers, Perry, & Menec, 2000). Emotion-focused coping concentrates on reducing the emotional effects of the stressor, instead of the stress itself (Struthers et al., 2000). Finally, avoidant coping, as the name suggests, refers to coping by avoiding the stressor. Some researchers theorize that the differences contributing to the application of a coping mechanism might have to do with perception of the stressful situation or a person’s confidence in their capacity to manage a stressor (Struthers et al., 2000). When one perceives a stressor as necessary and uncontrollable one is more likely to employ emotion-focused coping, whereas when it is believed that a situation can be altered, one is more likely to engage in a problem-focused approach (Struthers et al., 2000). Clifton, Perry, and Roberts (2008) point out that coping strategies, unlike other more deeply rooted psychological constructs, possess the ability to continuously develop over time, meaning that coping research could positively influence the impacts of student stress. Researchers believe coping to be both an automatic and a learned behavior (Samms & Friedel, 2013), meaning when coping strategies are practiced over time they have the potential to become innate responses instead of consciously applied approaches.

Researchers Windle and Windle (1996) tested for coping strategies in midadolescents and found that problem-focused coping is associated with positive outcomes, emotion-focused coping predicted negative outcomes, and avoidant coping could be either positive or negative—suggesting there might be a disconnect in the short and long term effects of that particular coping strategy. Asberg (2000) revealed that avoidant coping styles are linked to depressive symptoms, anxiety, and lower life satisfaction, which can be linked to academic performance. But high school based research challenged the well-known idea of avoidant coping as negative, with results suggesting that avoidant coping might be more beneficial in inescapable situations (MacCann, Lipnevich, Burrus, and Roberts, 2011). And researchers have found that greater
academic stress can be linked to both problem-focused and emotion-focused types of coping strategies (Struthers, Perry, & Menec, 2000).

Looking at a Swedish sample, researchers determined eight coping styles: confrontational, evasive, optimistic, fatalistic, emotive, palliative, supportive, and self-reliant (Cronqvist, Klang, & Bjorvell, 1997). They also ranked the coping styles based on self-reports of use and helpfulness, finding that confrontational, optimistic, and self-reliant were the most commonly used and the most helpful styles (Cronqvist et al., 1997). While these coping styles do not directly align with the three main coping strategies previously mentioned, the research does provide support for the success of problem-focused coping. In implementing problem-focused an individual confronts the problem and has confidence in themselves and their ability to overcome the stressor—paralleling the confrontational, optimistic and self-reliant strategies of the Swedish study.

Emotion-focused coping involves seeking social support. According to DeBarard Spielmans, and Julka (2004), social support possesses the potential to buffer students from the negative effects of stress. Social support forecasts positive academic outcomes, some researchers attribute this to the positive correlation between support and life satisfaction, which also positively affects students’ psychological adjustment (Asberg, 2000). Social support was found as the most common coping mechanism for graduate students who are under high levels of stress (Louie-Griffith, 2009). Another study revealed student interaction and increased age as having positive effects on coping (Clifton et al., 2008), meaning that the older students are and the more they engage with other students the more likely they are to engage in positive coping mechanisms.
Though the majority of researchers look at coping strategies separately, it is important to consider how the strategies function dependently. Asberg’s (2000) research demonstrated a connection between avoidant coping and social support, where the two are negatively correlated—the more social support, the lower the use of avoidant coping. Researchers suggest that perception of social support yields courage, which, in turn, encourages an individual to engage with a stressor instead of avoiding it (Asberg, 2000).

There are also several other factors that are correlated with work performance and ability to handle stress. Of the Big Five personality traits, conscientiousness and neuroticism have been deemed the most reliable predictors for work-related performance, with conscientiousness most strongly predicting academic performance (De Feyter, Caers, Vigna, & Berings, 2012). MacCann and colleagues (2011) linked personality traits to coping strategies, with conscientiousness tied to problem-focused coping and neuroticism correlated with emotion-focused coping. The research conducted by De Feyter and colleagues (2012) exposes conscientiousness—categorized by personal diligence and discipline—as predicting motivation, which positively effects academic performance. The same study also revealed a positive correlation between neuroticism and academic performance; the researchers believed this to be the predominant effect of neuroticism over self-efficacy, controlling for low belief in one’s academic ability (De Feyter et al., 2012). Individuals demonstrating low levels of neuroticism only slightly exceed the academic motivation of neurotic individuals, who otherwise demonstrate much higher levels of academic motivation (De Feyter et al., 2012). When focusing on academic performance, individuals with lower levels of neuroticism only slightly exceed more neurotic individuals at the lowest and highest levels of self-efficacy, but otherwise fall below in academic performance (De Feyter et al., 2012).
**Stress and Coping in the Present Research**

The present experiment examines biology students, choosing a challenging and presumably stress-provoking class to test the effects of students’ stress and coping on academic performance. We used self-report measures to assess Introduction to Biology students on their levels of stress, the type of stresses they are experimenting, and their coping strategies to find out whether these factors have an effect on each student’s academic outcome. It was hypothesized that the students who demonstrate high levels of stress and negative coping strategies will be more likely to have a negative academic outcome, resulting in failure of the Introduction to Biology course.

**Methods**

**Participants**

616 students enrolled in Introduction to Biology course at College of Charleston participated in this study. 107 students were not surveyed and 2 students chose not to participate in the study. 19 students were removed because they did not receive a lecture grade or withdrawal status in the biology course. 13 students’ data was removed because they were not enrolled in a science class for the subsequent semester. 11 students’ data was excluded because they were repeating the class. Two students were removed from the data because they stated that they were under severe psychological distress—one student claimed to have depression while the other claimed to have recently begun taking mood altering medication. 10 students were not present in their lab classes to be surveyed. Ultimately 455 students were included in the study.

**Research Design**

The research was collected in survey form. Several different variables were analyzed to determine their effect on academic outcome. Academic outcome refers to a student’s level of
success in the class. Students in the “success” group had earned a passing grade—a C- or above—and were continuing in the next biology course or another science course. Students in the “failure” category had earned a grade of D or F, or had withdrawn from the course. The participants were tested during a lab section of their Biology 111—Introduction to Biology—course. They were presented with several surveys, measuring aspects of stress and coping as well as other potentially confounding factors, including neuroticism, conscientiousness, and social desirability.

**Materials and Procedure**

The participants completed a 188-question survey consisting of the Coping Strategy Indicator, the Daily Hassles Scale, the Marlowe-Crowne, the Neuroticism and Conscientiousness questions from the 60-item short form NEO, and demographic information. The participants were tested in the lab section of their biology course, in groups of 20 to 25 students. They were given consent forms before being prompted to complete the survey. At the completion of the survey the participants’ names were entered into a drawing for a water bottle.

*The Coping Strategy Indicator*

The Coping Strategy Indicator is a 33-question inventory that prompts participants to rank coping mechanisms on frequency of use, with answer options being a lot, a little, or not at all (Amirkhan, 1990). The survey indicates whether and to what extent participants are using problem-solving, social support, and avoidance coping strategies (Amirkhan, 1990).

*The Daily Hassles Scale*

The Daily Hassles Scale is a 119-question inventory that prompts participants to identify daily hassles and, of the identified hassles, rank the severity by choosing “somewhat severe,” “moderately severe,” or “extremely severe” (Kanner, Coyne, Schaefer, & Lazarus, 1981). The
scale identifies hassle count, which can be compared to the average number of hassles that people experience, which is between 25 and 30, therefore, identifying individuals or groups with above average hassles (Kanner et al., 1981). The scale also identifies people whose have severe responses to small frustrations, by allowing for comparison between the number and severity of hassles, dividing hassle severity by hassle count—if the number is more than two the hassles are severe (Kanner et al., 1981). The Daily Hassles Scale was chosen because of greater consistency in measures of stress experienced on a daily basis (Kanner et al., 1981).

*The Marlowe-Crowne*

The Marlowe-Crowne is a 33 question, true-false scale that accounts for participants who engage in socially desirable response tendencies (Crowne & Marlowe, 1960). This scale is used as a control for participants who answer questions in a manner that attempts to maintain a specific image (Crowne & Marlowe, 1960).

*Neuroticism and Contentiousness Measures on the 60-item short form NEO*

The neuroticism measures from the short form NEO were used to control for individuals who are susceptible to stress (Costa & McCrae, 2011). Individuals experiencing neuroticism are prone to psychological distress because of aspects including anxiety, depression, hostility, self-consciousness, impulsiveness, and general vulnerability to stress (Costa & McCrae, 2011). The contentiousness measures were used to identify the presence of individuals’ goal oriented behavior, in areas including, competence, organization, dutifulness, self-discipline, contemplation, and need for accomplishment (Costa & McCrae, 2011).

*Results*

As a group, the students surveyed in the study demonstrated average levels of problem solving, social support, and avoidance coping. The participants reported significantly higher
levels of daily hassles—the average number of hassles for an individual is 25 to 30, and the students’ mean hassles were 38.35. But compared to the mean number of hassles the hassle severity, as a group, was not high. Only 17.99% of students surveyed reported hassle severity that was over two times greater than their total number of hassles, which is considered severe. Overall the students’ demonstrated slightly greater levels of conscientious, compared to neurotic, personality traits. (Table 1)

After conducting a Spearman correlation to distinguish significant correlations among the measured variables, the only variable found to significantly correlate with lecture grade was conscientiousness. Conscientiousness showed a significant positive correlation with problem solving coping, social support coping, and social desirability. It also demonstrated significant negative correlations with hassle count, hassle severity, neuroticism, and avoidance coping. (Table 2)

<table>
<thead>
<tr>
<th>Hassle Count</th>
<th>1.00</th>
</tr>
</thead>
<tbody>
<tr>
<td>Problem Solving Coping</td>
<td>.00</td>
</tr>
<tr>
<td>Social Support Coping</td>
<td>.05</td>
</tr>
<tr>
<td>Avoidance Coping</td>
<td>.42**</td>
</tr>
<tr>
<td>Hassle Severity</td>
<td>.93**</td>
</tr>
<tr>
<td>Social Desirability</td>
<td>-.30**</td>
</tr>
<tr>
<td>Neuroticism</td>
<td>.46**</td>
</tr>
</tbody>
</table>

Table 1: Table of Means and Standard Deviations for each of the surveyed items

<table>
<thead>
<tr>
<th></th>
<th>Problem Solving Coping</th>
<th>Social Support Coping</th>
<th>Avoidance Coping</th>
<th>Hassle Count</th>
<th>Hassle Severity</th>
<th>Social Desirability</th>
<th>Neuroticism</th>
<th>Conscientiousness</th>
<th>Lecture Grade</th>
</tr>
</thead>
<tbody>
<tr>
<td>Mean</td>
<td>25.53</td>
<td>24.42</td>
<td>21.38</td>
<td>38.35</td>
<td>65.72</td>
<td>19.32</td>
<td>24.38</td>
<td>29.78</td>
<td>2.60</td>
</tr>
<tr>
<td>Standard Deviation</td>
<td>3.42</td>
<td>5.46</td>
<td>4.19</td>
<td>19.40</td>
<td>40.64</td>
<td>2.65</td>
<td>8.52</td>
<td>7.21</td>
<td>1.08</td>
</tr>
</tbody>
</table>

Table 2: Correlation matrix of Spearman correlation coefficients (**denotes significant correlation coefficient)

<table>
<thead>
<tr>
<th>Hassle Count</th>
<th>Problem Solving Coping</th>
<th>Social Support Coping</th>
<th>Avoidance Coping</th>
<th>Hassle Severity</th>
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<tbody>
<tr>
<td>Hassle Count</td>
<td>1.00</td>
<td></td>
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<tr>
<td>Problem Solving Coping</td>
<td>.00</td>
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<td></td>
<td></td>
</tr>
<tr>
<td>Social Support Coping</td>
<td>.05</td>
<td>.22**</td>
<td>1.00</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Avoidance Coping</td>
<td>.42**</td>
<td>-.11</td>
<td>-.07</td>
<td>1.00</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Hassle Severity</td>
<td>.93**</td>
<td>-.02</td>
<td>.01</td>
<td>.45**</td>
<td>1.00</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Social Desirability</td>
<td>-.30**</td>
<td>.12</td>
<td>-.06</td>
<td>-.30**</td>
<td>-.29**</td>
<td>.100</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Neuroticism</td>
<td>.46**</td>
<td>-.06</td>
<td>-.02</td>
<td>.49**</td>
<td>.54**</td>
<td>-.36**</td>
<td>1.00</td>
<td></td>
</tr>
</tbody>
</table>
To further analyze the results, a series of multiple regression analyses were conducted to explore the relationships among the variables in more depth. Each of the analyses focused on lecture grade as the dependent variable and controlled for the Marlowe Crowne social desirability measure.

**Conscientiousness and Coping Strategies**

Two factor analyses were used to compare conscientiousness with each of the three coping strategies—problem-solving, social support, and avoidance. For the conscientiousness and problem-solving model there was no significant interaction ($t = -1.14, p = .26$), no significant effect of problem solving ($t = 1.05, p = .29$), and no significant effect of social desirability ($t = -1.75, p = .08$). For the conscientiousness and social support model there was also no significant interaction ($t = -.582, p = .561$), no significant effect of social support ($t = .79, p = .43$), and no significant effect of social desirability ($t = -1.63, p = .10$). For the conscientiousness and avoidance model there was no significant effect of avoidance ($t = -2.77, p = .006$) and no significant effect of social desirability ($t = -1.77, p = .08$). There was a significant interaction between conscientiousness and avoidance ($t = 2.63, p = .009$), meaning for people who have higher conscientiousness the more they use avoidance, the higher their grade, and for people who have lower conscientiousness the more they use avoidance, the lower their grade.

**Neuroticism and Coping Strategies**

The moderation analysis between neuroticism and each of the three coping strategies does not demonstrate any significant interactions. There is no significance with problem solving
and neuroticism ($t < .14, p > .31$). There is no significance with social support and neuroticism ($t < .92, p > .36$). There is also no significance with avoidance and neuroticism ($t < .60, p > .46$).

**Hassles and Coping Strategies**

Three moderation analyses were conducted, analyzing the interaction between hassle severity and each of the three coping strategies while controlling for neuroticism and the Marlowe Crowne social desirability scale. For the hassle severity and problem-solving model nothing was significant (all $t < .33$, all $p > .52$). For the hassle severity and social support model nothing was significant (all $t < .61$, all $p > .52$). For the hassle severity and avoidance model, nothing was significant (all $t < .80$, all $p > .42$).

Three moderation analyses were conducted, analyzing the interaction between number of hassles and each of the three coping strategies. For the hassle count and problem solving model nothing was significant (all $t < .124$, all $p > .20$). For the hassle count and social support model nothing was significant (all $t < 1.00$, all $p > .30$). For the hassle count and avoidance model, nothing was significant (all $t < .89$, all $p > .38$).

**Interactions Between Coping Strategies**

A moderation analysis conducted between social support and avoidance coping indicated a significant interaction between the variables ($t = 1.81, p = .07$). This interaction is interpreted, as the success of social support is dependent on the use of avoidance. The moderation analysis between social support and problem solving showed no significance ($t < .51, p > .18$).

**Discussion**

The current experiment demonstrated a significant correlation between conscientiousness and lecture grade in the Introduction to Biology class. There were other factors that significantly correlated to conscientiousness that did not show significance in terms of grade.
Conscientiousness positively correlates with problem-solving and social support coping mechanisms, which would lead one to believe that these two types of coping would also indicate academic outcome in terms of lecture grade, but this is not the case. Also related would be the variables including hassle count, hassle severity, and avoidance coping that negatively correlate with consciousness, which one might assume would also be negatively correlated with lecture grade, but, again, this is not the case.

After controlling for other variables, there is an interaction between conscientiousness and avoidance. Participants with high levels of conscientiousness who employed avoidance coping had a significantly higher academic outcome than those who did not use avoidance coping. But if individuals had low conscientiousness scores and used avoidance coping they had lower academic outcomes than those who did not employ avoidance coping. This phenomenon, though not found in previous research, could be explained by students’ use of avoidance. Research conducted by MacCann and colleagues (2011) suggested that avoiding a stressor can be beneficial in situations where the problem cannot be solved or the stress cannot be managed, but this theory may not fully explain this finding. MacCann’s (2011) research would suggest that the conscientious students were only avoiding tasks that didn’t have a solution, but in the case of students’, most of their school stress has to be dealt with eventually. Therefore avoidance might serve another unknown function in the way it promotes coping.

Social support can be used to predict lecture grade when covarying with other variables, though this is not statistically significant. After controlling for neuroticism and social desirability, social support positively correlated with lecture grade. With these same controls, the interaction between social support and avoidance demonstrates that the success of social support depends on the use of avoidance, meaning that a higher level of social support coping determines
the effectiveness of avoidance coping. In the same model used for analysis, there was no significant effect of avoidance or social support outside of the interaction. Avoidance might be inconclusive because of an overlap between social support and avoidance. By examining the measures of avoidance on the Coping Strategy Indicator it becomes evident that some of the questions might also be measuring social behaviors (Table 3), for example, watching television may be seen as an avoidant behavior, but it might also be a social activity in which individuals are engaging with family or friends. Furthermore, burying oneself in a hobby or sports activity to avoid the problem is probably a social activity, but it is used as a measure of avoidance in the Coping Strategy Indicator. Other questions regarding avoidance measure truly solitary behavior. When measuring avoidant behaviors, this indicator might also be measuring behaviors that could be classified as social, social behaviors that are used in an avoidant fashion. If one considers the positive psychological effects of social support as suggested by Asberg (2000) Therefore, one could make an argument that there are four coping mechanisms: problem-solving, social support, social support-avoidant, and avoidant.

Limitations

Limitations of the current experiment include limited diversity in sample, lack of control for students engaged in supplemental instruction, lack of information regarding the full academic outcome of the students, and measurement of academic outcome. The experiment was designed to study stress, coping, and academic achievement in college students, so there is not a limitation in the restricted age range, but there is a limitation due to the lack of ethnic diversity in the participant population. There was no control for supplemental instruction (SI), a review program funded for students through the College of Charleston, in which an instructor reviews the material and offers group tutoring. Students engaged in SI programs have higher grades, so it
would have been interesting to use participation in tutoring as a control factor. The final lecture grade, which was considered the academic outcome in the present experiment, only measured students’ academic achievement in one class—Introduction to Biology. To understand how student stress and coping is effecting students in the academic arena, it would be helpful to consider student GPA as a measure of success in all classes. Furthermore, the study of academic outcome as defined by a letter grade—or GPA as the average of all grades—could be misleading, because this does not take into account test taking skills of students and the grade is not necessarily representative of student performance in terms of understanding class material. One could also argue that there is a limitation found in the three-mechanism measure of the Coping Strategy Indicator, with the idea that measures of avoidance are also measures of social support, so neither is being measured properly.

**Direction for Future Research**

Future studies should investigate academic outcome based on stress and coping while controlling for any confounding factors—including socioeconomic standing, diversity levels and its effects on diverse students—not considered in the present study. Research could expand across a four-year period to identify coping mechanisms that are beneficial in long and short-term when dealing with school related stress.

Research could also move in a different direction by analyzing the three main coping mechanisms to determine how effective they are in measuring distinct coping strategies. Furthermore this research could hypothesize that coping is not limited to three mechanisms, therefore not measurable by a limited scale. A scale would have to go into more depth, or divide the mechanisms up into four categories instead of three to properly differentiate between social support and avoidance coping.
Table 3: Avoidance measures on the Coping Strategy Indicator (Note: ** denotes possibly social behaviors)

<table>
<thead>
<tr>
<th>Indicate to what extent you...</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Tried to distract yourself from the problem?**</td>
<td></td>
</tr>
<tr>
<td>Did all you could to keep others from seeing how bad things really were?</td>
<td></td>
</tr>
<tr>
<td>Daydreamed about better times?</td>
<td></td>
</tr>
<tr>
<td>Spent more time than usual alone?</td>
<td></td>
</tr>
<tr>
<td>Watched television more than usual?**</td>
<td></td>
</tr>
<tr>
<td>Avoided being with people in general?</td>
<td></td>
</tr>
<tr>
<td>Buried yourself in a hobby or sports activity to avoid the problem?**</td>
<td></td>
</tr>
<tr>
<td>Slept more than usual?</td>
<td></td>
</tr>
<tr>
<td>Fantasized about how things could have been different?</td>
<td></td>
</tr>
<tr>
<td>Identified with characters in novels or movies?</td>
<td></td>
</tr>
<tr>
<td>Wished that people would just leave you alone?</td>
<td></td>
</tr>
</tbody>
</table>
References


