The Effect of Workload on Student Evaluations of Teaching

Jennifer Kramp
Cleveland State University

Follow this and additional works at: https://engagedscholarship.csuohio.edu/etdarchive

Part of the Psychology Commons

How does access to this work benefit you? Let us know!

Recommended Citation

Kramp, Jennifer, "The Effect of Workload on Student Evaluations of Teaching" (2010). ETD Archive. 455.
https://engagedscholarship.csuohio.edu/etdarchive/455

This Thesis is brought to you for free and open access by EngagedScholarship@CSU. It has been accepted for inclusion in ETD Archive by an authorized administrator of EngagedScholarship@CSU. For more information, please contact library.es@csuohio.edu.
THE EFFECT OF WORKLOAD ON STUDENT EVALUATIONS OF TEACHING

JENNIFER KRAMP

Bachelor of Arts, Psychology
The Cleveland State University
May, 2002

Submitted in partial fulfillment of requirements for the degree

Master of Arts in Psychology
at
The Cleveland State University
May, 2010
This Thesis has been approved

For the department of Psychology

And the College of Graduate Studies by

__________________________
Dr. David Grilly

__________________________
Department & Date

__________________________
Dr. Brian Blake

__________________________
Department & Date

__________________________
Dr. Gary Pettrey

__________________________
Department & Date
ACKNOWLEDGEMENTS

I would like to thank everyone for all of their help and support over the years. To Dr. David Grilly, under whose supervision this thesis was undertaken, thank you for all of your assistance and patience. I would also like to thank the members of my thesis committee, Dr. Brian Blake and Dr. Gary Pettey for their comments and suggestions regarding the preparation and reporting of this study. Thank you for letting the final fruition of this thesis happen so quickly.

I would like to thank my parents for all of their support and help throughout the years and for encouraging me to follow my dreams. Without your help I would not be completing my master’s degree.

I would also like to thank my husband Keith. There have been times that I wondered if you thought that I would ever get my master’s degree. You have been my love and my best friend and encouraged me to do whatever it is that my heart desires. For this I am so grateful. To my daughter Kallie I hope that one day I can explain to you how important this was and encourage you to follow your dreams as others have encouraged me.
THE EFFECT OF WORKLOAD ON STUDENT EVALUATIONS OF TEACHING

JENNIFER KRAMP

ABSTRACT

There are several intermingled factors that have been proposed to influence the results seen on student evaluations of teaching (SETs). Two suggested factors are workload and expected grade. Research has suggested both a positive and negative correlation with scores seen on SETs and workload levels. However, the direction of the relationship may depend upon whether the workload was perceived as “good” or “bad.” For the purposes of this study, good workload can be defined as work that the student felt increased his or her knowledge of the subject at hand. Bad workload can be defined as work that the student considered to be “busy work,” and did not help to advance his or her knowledge of the given subject. This study set out to determine if students that perceive higher levels of good workload and lower levels of bad workload report higher SET scores. It also explores the relationship between expected grade and SET ratings. Students from eight undergraduate courses were surveyed and asked questions similar to those seen on SETs. These included questions about good and bad workload levels, expected grade, teacher and course satisfaction as well as other questions that may influence a student’s perception of the course. The results indicated that the amount of perceived good workload was positively correlated with SET scores and the amount of perceived bad workload was negatively correlated with SET scores. Expected grade was also positively correlated with SET ratings. Good and bad workload values significantly predicted
course value. Although the relationships were in the predicted direction for the instructor satisfaction portion of SET ratings, they were not significant. The direction of the relationship may be due to chance as non significant results are not considered reliable. Research results suggest that expected grade plays a role in determining a student’s satisfaction with a given course. Perceived good and bad workload may play a role in determining overall course satisfaction and possibly a smaller role in instructor satisfaction
# LIST OF TABLES

<table>
<thead>
<tr>
<th>Table</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>I. Means and Standard Deviations to all Variables for Survey Responses</td>
<td>17</td>
</tr>
<tr>
<td>II. Correlation Matrices for Surveys</td>
<td>18</td>
</tr>
</tbody>
</table>
# TABLE OF CONTENTS

<table>
<thead>
<tr>
<th>Section</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>ABSTRACT</td>
<td>iv</td>
</tr>
<tr>
<td>LIST OF TABLES</td>
<td>vi</td>
</tr>
<tr>
<td>CHAPTER</td>
<td></td>
</tr>
<tr>
<td>1. INTRODUCTION</td>
<td>1</td>
</tr>
<tr>
<td>1.1 Rationale for the Study</td>
<td>7</td>
</tr>
<tr>
<td>1.2 Hypotheses</td>
<td>8</td>
</tr>
<tr>
<td>2. METHOD</td>
<td>10</td>
</tr>
<tr>
<td>2.1 Participants</td>
<td>10</td>
</tr>
<tr>
<td>2.2 Materials</td>
<td>10</td>
</tr>
<tr>
<td>3. PROCEDURE</td>
<td>12</td>
</tr>
<tr>
<td>4. RESULTS</td>
<td>13</td>
</tr>
<tr>
<td>5. DISCUSSION</td>
<td>19</td>
</tr>
<tr>
<td>REFERENCES</td>
<td>25</td>
</tr>
<tr>
<td>APPENDICES</td>
<td>27</td>
</tr>
<tr>
<td>A. Web Address for form X used by The University of Washington</td>
<td>28</td>
</tr>
<tr>
<td>B. Consent Form</td>
<td>29</td>
</tr>
<tr>
<td>C. Questionnaire administered to students</td>
<td>30</td>
</tr>
<tr>
<td>D. Permission for use of Form X</td>
<td>32</td>
</tr>
</tbody>
</table>
CHAPTER 1

INTRODUCTION

Student evaluations of teaching (SETs) are commonly given to students to determine a student’s satisfaction with and the effectiveness of a particular instructor or course. A course is considered to be effective if it taught the student what it was intended to teach. One question that has surfaced many times has asked how reliable such ratings are. Richardson (2005) advises that SETs “…might be biased by the effects of extraneous background factors.” Some of the background factors that have been proposed to bias SETs include grading leniency, class size, and workload. Background factors are important in assessing SET scores because they can make people skeptical of the results of SETs. It is common for many professors to feel as though background factors can have a significant effect on SET results. They may also make people skeptical of the implications of such measures. For example, results of SETs can help determine raises, promotions, and/or tenure for professors.

It has been determined that there is no single factor that will predict a student’s satisfaction with a particular course or instructor. Each factor has an impact by itself and
when combined with other factors (Richardson, 2005). Richardson also advises that
“…Research on this topic suggests that student satisfaction is a complex, yet poorly
articulated idea that is influenced by a variety of contextual factors…”

While most researchers agree that background factors exist, there is dispute over what
factors are involved and how important the roles of these background factors are. Some
people feel that they are weak and do not cause bias (Marsh, 2001 & Richardson, 2005),
while others disagree (Gillmore & Greenwald, 1997). Research in this area is somewhat
limited, but the focus of background variable effects on SETs has primarily concentrated
on two areas. These areas are grading leniency and workload. Of the two, grading
leniency has been more widely studied.

In order for a student to learn a given subject, he or she must put time and effort into
it. Some people feel that by assigning lower levels of workload, a professor could obtain
higher SET scores, particularly in the areas of teaching effectiveness and overall
effectiveness (Gillmore & Greenwald, 1997). The responses given by students to these
two questions help determine a students’ overall satisfaction with the course and
instructor.

Prior research in the area has led to a variety of conclusions regarding the impact of
course workload on SET ratings. Some researchers have focused solely on expected
grade or workload, while others have focused on a combination of the two. For example,
Tressa (2005) reported results indicating that students’ expected grade in a course
(presumably affected by the instructor’s grading leniency) is negatively related to
workload, but grading leniency is positively related to SET scores. In contrast, in a study
by Marsh and Roche (2000), it was found that expected grades and course workload
individually correlated positively with SET scores. It was also found that when the effects of expected grades on SET scores were controlled, the effect of workload on SET scores was positive. In other words, as workload scores increased, SET scores increased independently of the expected grades in courses. This led the authors to conclude that the total effect of workload on SET scores outweighed the effect of expected grades on SET scores. Marsh and Roche (2000) explain that “the positive direction of the workload effect makes a workload bias untenable.” What the authors mean is that since workload is positively related to SET scores, it is unlikely that workload would negatively impact SET scores (as thought by many professors).

In addition, Marsh and Roche (2000) reported a slight quadratic function between perceived workload and SET scores. While the correlation between the two variables is positive, this is only true to a point. That is, Marsh and Roche claimed that while perceived workload is positively correlated with SET scores, once workload hits a certain level, its correlation with SET scores levels off. Therefore, students may not mind high levels of workload, as long as they are kept reasonable. Once the amount of workload hits a certain point, it no longer causes SET ratings to increase. Marsh (2001) cautions that even workload deemed as valuable to the student can have a negative impact on SETs if it is excessive. This may be because at high levels students consider work to be busy work and unnecessary. Overall, faculty members are unsure how to interpret SETs. As stated earlier, many professors feel that lowering workload will result in higher SET scores. However, some studies have shown that workload is positively correlated with SET scores except when it is given at very high levels or seen as busy work by the
student (Marsh, 2001). Thus, it is not completely clear whether workload is negatively or positively correlated with SETs.

Although a large amount of the existing research has shown that workload is positively correlated with SET scores (Marsh and Roche, 2000), some research has shown that SET scores can be negatively related to workload (Greenwald & Gillmore, 1994). Thus, many people question the results of SETs and feel that they are biased by workload. SET scores sometimes show a positive correlation with workload, but this does not mean that students like high workload levels. Marsh and Roche (2000) explain that students with higher GPAs may be more inclined to take more difficult courses (courses that these students are most interested in). Naturally, more difficult courses would require higher levels of workload. They also suggest that students with high GPAs value learning more when it requires a great deal of challenge and commitment. For example, students with higher GPAs may appreciate an “A” in a course with a high workload more so than he or she would appreciate the same grade in a course that has a minimal workload.

Similarly, Bjornsen (2003) argued that the most important thing that students think about when evaluating a course is the amount that they learned. Therefore, students will tolerate extra effort as long as it leads to increased knowledge of the subject. When assignments are seen as having a higher quality, students view their work as valuable. Therefore, courses with these “high quality assignments” receive higher overall ratings (Marsh & Roche, 2000). Marsh and Roche also caution that nearly half of the relationship between SET ratings and assignment quality can be explained in terms of background variables like prior subject interest or GPA. In other words, students that have high levels of subject interest or higher GPAs may see the required work as necessary in order to
learn the subject or earn a high grade. Conversely, a student taking a particular course to fulfill a requirement may view the majority of work for that course as unnecessary. Students with lower GPAs would also view the work as unnecessary because earning a high grade may not be a large motivator for them.

Given that workload may have such an important impact on SET results, it is important to note the factors that influence a student’s perception of workload. These include “…difficulty, pace and hours per week spent out of class” (Marsh & Roche, 2000). Other things that are sometimes thought to influence workload are frequency of assignments, exams, or quizzes and the amount of work required for the course in question versus other courses that the student has taken. A student’s perception of workload is determined by more than just the effort that he or she has expended for a given course. Levy and Peters (2002) found that students prefer in-class activities, which are viewed as an example of good workload. These, among other things, can influence a student’s perception of workload. Kember (2004) reported that strong friendships among students in a course also have an impact on SET scores, because class friendships impact student morale, which also effects perceived workload. Student morale can also be influenced by student-teacher relationships (Kember, 2004). Other suggested factors of workload perception include intrinsic motivation (how motivated the student is to learn the subject at hand or earn a high grade), curriculum (the planned material or work for the course and/or other courses that the student is taking), and learning environment (Kember, 2004). For example, an environment that is conducive to learning makes it easier to complete the required work. However, an environment that is disruptive makes completing required work more difficult for the student.
Gillmore and Greenwald (1994) attempted to display the workload/SET relationship by finding items that accurately measure workload. To do this they used another form of student teacher evaluations developed by The University of Washington known as Form X. The link for this form can be seen in Appendix A. This new form was first used during the 1991-1992 school year at the University of Washington. The form included an item which helped Gillmore and Greenwald (1997) differentiate between good, bad, and overall workload. The item that is used to determine overall workload asks “on average, how many hours per week have you spent on this course, including attending classes, doing readings, reviewing notes, writing papers, and any other course related work?” The item used to determine good workload asks “from the total average hours above, how many do you consider were valuable in advancing your education?” For both questions, the student chooses from two hour increments ranging from less than two to more than twenty-two hours. Bad workload is determined by subtracting the student’s response in the second question from the response given for the first question.

Greenwald and Gillmore concluded that it is not the amount of time spent on a particular class, but the amount of time that students deem valuable that is important (1994). They advise that “…overall ratings are predicted by a combination of the ratio of valuable hours to total hours, grades, and the challenge or effort needed to succeed in the course.” To summarize, Greenwald and Gillmore (1994) felt that workload is seen along a dimension. Work hours that students view as valuable are proposed to increase student ratings, but work hours seen as bad or not valuable are proposed to decrease ratings, i.e., if students view assignments to be no more than busy work SET scores will decrease.
Thus, one suggestion given by Greenwald and Gillmore is for faculty to explain to students why certain assignments are valuable, which would increase ratings.

Marsh (2001) criticized the work done by Greenwald and Gillmore, stating that good and bad workload can not be combined into a single workload factor. He advised that SETs have demonstrated multidimensionality (they measure more than one construct), but argues that Greenwald and Gillmore treat them as if they are unidimensional by combining both good and bad workloads into one workload factor (by using a total workload variable). Marsh (2001) explains that SETs “…cannot be understood adequately if their multidimensionality is ignored.”

Using the same data as used in the Greenwald and Gillmore study, Marsh (2001) conducted a factor analysis to show that good workload is positively correlated with SETs, but bad workload is negatively correlated with them. He further explained that when Greenwald and Gillmore combined good and bad workload into one factor the results became confounded. According to Marsh, teachers that produce more learning by having a higher amount of good workload obtain higher SET scores. Thus, he argues that if a professor would like higher SET scores, then he or she should increase workload that is seen as valuable to the students and decrease busy work.

1.1 RATIONALE FOR THE STUDY

SETs can impact the lives of many people. Results of these evaluations can determine such things as promotions, tenure, and salary for professors. They also have the capability of influencing overall course effectiveness for future students that may take the course being evaluated (in cases in which professors alter the workload for a given course based
on prior results). Richards (2005) explains that SETs can also determine the financial resources allocated to the university. Given the potential impact of SETs, it is important to gain an understanding of what influences students’ responses. By understanding background variables, professors can be more effective in methods of instruction, and institutions can control for these background variables when evaluating a professor’s performance.

The following study will work through the controversy involving the influence of workload on SETs. It will also focus on what types of workload negatively and/or positively impact SET results. In addition, it will explore the impact of expected grade. For the purpose of this study, workload can be defined as the amount of work that is required of a student to be successful in a particular course. Good workload can be defined as work that the student felt increased his or her knowledge of the subject at hand. Bad workload can be defined as work that the student considered to be “busy work,” and did not help to advance his or her knowledge of the given subject. An attempt will be made to identify the type of relationship that workload has on SET ratings.

1.2 HYPOTHESES

Hypothesis I: Students that expect a higher grade will report higher course evaluation scores.

Hypothesis II: Students that expect a higher grade will report higher instructor evaluation scores.

Hypothesis III: Students that perceive higher levels of good workload will report higher course evaluation scores.
Hypothesis IV: Students that perceive higher levels of good workload will report higher instructor evaluation scores.

Hypothesis V: Students that perceive higher levels of bad workload will report lower course evaluation scores.

Hypothesis VI: Students that perceive higher levels of bad workload will report lower instructor evaluation scores.
CHAPTER 2

METHOD

2.1 PARTICIPANTS

A survey was completed by undergraduate psychology and communications students at the same time as the university mandated end of semester SETs. There were a total of eight courses surveyed. Each participant was given instructions and signed a consent form (see Appendix B). Subjects were advised that participation was voluntary. A total of one hundred forty-three undergraduate psychology and communications students were asked to complete an eleven question survey. In exchange for being permitted to administer the survey in the courses, the researcher offered to collect and hand in university mandated SETs for professors.

2.2 MATERIALS

For the purpose of data collection an eleven question survey was developed (see Appendix C). The survey questions were based on literature which indicated different
factors that may influence workload perception and SET scores and the research done by Greenwald and Gillmore (1994). Three questions were intended to gauge the students’ satisfaction with the course (questions 1, 2, and 5). Two questions were intended to determine the students’ satisfaction with the instructor (questions 3 and 4). The next three questions were used to screen for proposed background factors. Question 6 asks the student about the contribution of other students to his or her understanding of the subject matter. Question 7 asks about prior subject interest and question 8 investigates the factor most often suspected to influence SET scores, that is expected grade. The final three questions are variations of the Gillmore and Greenwald study intended to measure good, bad, and total workload, respectively. Unfortunately the last question was faulty as it did not specify to the student to indicate total hours spent per week. This question was eliminated from further data.
CHAPTER 3
PROCEDURE

Data was collected during the summer and fall semesters of 2007 at the same time that students were asked to complete university mandated SETs for the courses. The survey was completed in class and collected by the researcher.
CHAPTER 4

RESULTS

For the purposes of data interpretation, a numeric code was assigned to the first eight questions. The numbers assigned to questions 1-6 were as follows: an answer of “A” was coded with a 6, an answer of “B” was coded with a 5, and answer of “C” was coded with a 4, and answer of “D” was coded with a 3, an answer of “E” was coded with a 2, and answer of “F” was coded with a 1. The numbers assigned to question 7 were as follows: an answer of “enthusiastic” was rated 6, an answer of “interested” was rated 5, an answer of “somewhat interested” was rated 4, an answer of “neutral” was rated 3, an answer of “somewhat disinterested” was rated 2, and “definitely disinterested” was rated 1.

Question 8 concerned expected grade and was coded as follows: “A” was coded as 9, “A-” was coded 8, “B+” was coded 7, “B” was coded 6, “B-” was coded 5, “C+” was coded 4, “C” was coded 3, “D” was coded 2, and a grade of “F” was coded 1.

First, descriptive statistics were run on the data and indicated that the independent variables of good and bad workload were positively skewed. Because of this transformations were made by taking the square root of each independent variable to
normalize distributions. Even after transformations were made the bad workload variable was positively skewed. This can be attributed to a floor effect, since more than half of the cases used for bad workload were reported as zero. Histograms indicated some non-normal distributions because of this floor effect, but were otherwise normally distributed. Multivariate normality and homoscedasticity were assessed with residual plots and indicated that the data are normal.

Additional descriptive statistics were run on the variables expected grade, good workload, bad workload, course evaluation scores, and instructor evaluation scores to determine the means and standard deviations. This information can be seen in Table 1. It shows the mean for expected grade at 6.02 with a standard deviation of 2.29. Good workload had a mean of 2.19 and a standard deviation of .83. The mean for bad workload was .71 with a standard deviation of .89. The course value mean was 4.62 with a standard deviation of 1.06 and finally the mean of the instructor value was 4.94 with a standard deviation of 1.15.

The first two hypotheses in this study predicted that expected grade is positively correlated with both course evaluation and instructor evaluation scores. The second two hypotheses predicted that good workload is positively correlated with course evaluation and instructor evaluation scores. The final two hypotheses predicted that the measure of bad workload would be negatively correlated with course and instructor evaluation scores. A bivariate correlation matrix was run using the transformed variables for good and bad workload to test each of the hypotheses and can be seen in Table 2. The results indicated that expected grade was significantly positively correlated with course evaluation scores \((r=.41)\) and instructor evaluations \((r=.26)\). Good workload was
significantly positively correlated with course evaluation scores ($r = .22$). It was positively correlated with instructor evaluation scores, but not significant. Bad workload was significantly negatively correlated with course evaluation scores ($r = -.35$). It was also negatively correlated with instructor evaluation scores, but not significant. Additionally, relationships were seen among the independent variables. Expected grade and good workload were negatively correlated, but not significant. Expected grade and bad workload were significantly negatively correlated ($- .22$). Finally, good and bad workload were positively correlated, but not significant.

Each of the correlations was in the predicted direction. The positive correlation ($r = .41, p<.01$) between expected grade and course evaluation scores indicate that the higher the grade that the student anticipates receiving for a given course, the higher the rating he or she will give that course on the SET. Similarly, the higher the grade the student anticipates receiving for the course, the higher the rating he or she will assign for the instructor of that course as indicated by the positive correlation between the two variables ($r = .26, p<.01$). Next, the positive relationship between good workload and course evaluation scores ($r = .22, p<.01$) suggest that as the amount of perceived good workload increases the scores given for course evaluation also increase. As perceived good workload increases the scores given for the instructor evaluation increase ($r = .16, \text{n.s.}$). Last, results suggest that as perceived bad workload increases course evaluation scores decrease ($r = -.35, p<.01$) as do instructor evaluation scores ($r = -.17 \text{ n.s.}$). While some of these correlations were not significant, they are all in the predicted directions. In these cases one can not make reliable assumptions about the relationship between good workload and instructor evaluation scores or bad workload and instructor evaluation.
scores. If the research was repeated in a different population one may not receive the same results.
Table I

Means and Standard Deviations of All Variables for Survey Responses

<table>
<thead>
<tr>
<th></th>
<th>Mean</th>
<th>Standard Deviation</th>
</tr>
</thead>
<tbody>
<tr>
<td>Expected Grade</td>
<td>6.02</td>
<td>2.29</td>
</tr>
<tr>
<td>Good Workload</td>
<td>2.19</td>
<td>.83</td>
</tr>
<tr>
<td>Bad workload</td>
<td>.71</td>
<td>.89</td>
</tr>
<tr>
<td>Course value</td>
<td>4.62</td>
<td>1.06</td>
</tr>
<tr>
<td>Instructor value</td>
<td>4.94</td>
<td>1.15</td>
</tr>
</tbody>
</table>
Table II

Correlation Matrix for Survey Responses

N= 143.

<table>
<thead>
<tr>
<th></th>
<th>Course Evaluation</th>
<th>Expected Grade</th>
<th>Good Workload</th>
<th>Bad Workload</th>
</tr>
</thead>
<tbody>
<tr>
<td>Course Evaluation</td>
<td>--</td>
<td>.41**</td>
<td>.22**</td>
<td>-.35**</td>
</tr>
<tr>
<td>Expected Grade</td>
<td>--</td>
<td>--</td>
<td>-.03</td>
<td>-.22*</td>
</tr>
<tr>
<td>Good Workload</td>
<td>--</td>
<td>--</td>
<td>--</td>
<td>.12</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th></th>
<th>Instructor Evaluation</th>
<th>Expected Grade</th>
<th>Good Workload</th>
<th>Bad Workload</th>
</tr>
</thead>
<tbody>
<tr>
<td>Instructor Evaluation</td>
<td>--</td>
<td>.26**</td>
<td>.16</td>
<td>-.17</td>
</tr>
<tr>
<td>Expected Grade</td>
<td>--</td>
<td>--</td>
<td>-.03</td>
<td>-.22*</td>
</tr>
<tr>
<td>Good Workload</td>
<td>--</td>
<td>--</td>
<td>--</td>
<td>.12</td>
</tr>
</tbody>
</table>

** Correlation is significant at the .01 level (2-tailed).
*Correlation is significant at the .05 level (2 tailed).
CHAPTER 5
DISCUSSION

There have been a variety of background factors proposed to impact SET results. However, researchers have generally disagreed on what background factors are involved and how large of an impact these factors actually have. In the past the two factors that have been reviewed the most are expected grade and workload. SETs help to determine a student’s satisfaction with the course and the instructor. However, the results of SET ratings can impact the lives of students and professors. Therefore, it is important to gain an understanding of what background factors impact the SET ratings given by students. This study builds on research done by Gillmore and Greenwald (1994) which separated workload into good and bad measures. It also explores the relationship between expected grade and SET scores.

The data analysis showed that expected grade is positively correlated with both course evaluation scores and instructor evaluation scores. Additionally, good workload showed a positive relationship with course evaluation scores. In other words, as perceptions of
good workload increased students scored their satisfaction with the course at higher levels. Similarly, bad workload was negatively correlated with course evaluation scores. Therefore, as levels of perceived bad workload increased student satisfaction scores for the course evaluation scores decreased. Furthermore, the good and bad workload had relationships with the instructor satisfaction score in the predicted direction (positive correlation and negative correlation, respectively); however the results were not significant. Since the results were not significant this may be due to chance or it may be because a student may view the work as part of the course and therefore not relate it to the instructor as much as he or she relates it to the course.

The first hypothesis in this study suggested that students that expected higher grades would assign higher course satisfaction ratings. The research supports this hypothesis as shown by the significant positive correlation between the two variables. The second hypothesis suggested that students who expected higher grades would assign higher instructor satisfaction scores. Again, the research supports this hypothesis. In both the first and second hypotheses the null hypothesis can be rejected because the relationship seen with the data were significant. In other words, as expected grade increases for a student he or she is likely to give higher course and instructor evaluation ratings.

Hypotheses three and four focused on good workload. The third hypothesis predicted that as perceived good workload increased so would course evaluation scores. Because this relationship is significant the null hypothesis is rejected. This suggests that students that perceive higher levels of good workload assign higher course evaluation ratings. However, even though the relationship was positive (as predicted) for good workload and instructor evaluation ratings, the relationship was not significant and may be due chance.
Therefore this research fails to support the hypothesis and it can not be determined if perceived good workload is a good predictor of instructor evaluation scores.

The last two hypotheses focused on the relationship between bad workload ratings and SET scores. Hypothesis five predicted that as levels of perceived bad workload increased course evaluation ratings would decrease. The research revealed that a significant negative correlation exists between these two variables. Therefore, the research supports the hypothesis, suggesting that as levels of perceived bad workload increase scores assigned by students for course evaluation ratings decrease. Last, bad workload was negatively correlated with instructor evaluation scores as predicted. However, the relationship was not significant and may be due to chance. Therefore it fails to support the hypothesis.

There were also several inter-correlations seen with the results of this study. Interestingly, good workload was negatively correlated with expected grade. However, the correlation was small. This may be because regardless of the type of workload it still takes effort from the student to earn a high grade for a course. In other words, the more work it takes to succeed in the course the more difficult it is to obtain a high score. It could also be due to an indirect effect that workload had on expected grade. Expected grade was also negatively correlated with bad workload, if a student sees the work assigned as busy work and not necessary for learning course material a high grade may be seen as more unattainable than it would in courses that assign meaningful work. This is supported by the fact that the correlation between good workload and expected grade was much lower than that seen with bad workload and expected grade. Finally, good and bad workload were positively correlated, suggesting that even though some types of work
may be perceived as valuable and some types may be viewed as busy work, it is viewed along a dimension. This supports the research done by Greenwald and Gillmore (1994). Even perceived good workload takes time and effort from the student. Additionally, bad workload may not always be viewed as such by a student who trusts that a professor is assigning work to help him or her learn the material.

This study supports what past research has found regarding the multidimensionality of SETs. It demonstrates that SET scores can be explained by a variety of factors. One of these factors is perceived workload. The primary focus of this research when it began was to specifically assess the effect of workload on SET scores. It is now apparent that students do not always consider workload to be a one-dimensional construct. Students appear to understand that some work is necessary to advance their understanding of the subject matter.

The present study is different from the majority of previous research in that it separates workload into two constructs, good and bad. Some finding of this study mirror results seen in previous studies. For example, Greenwald and Gillmore (1994) and Marsh (2001) showed similar findings. They found a positive correlation between good workload and SET ratings and a negative correlation between bad workload and SET ratings. However, their research does not separate SET scores into two independent sections- course evaluation scores and instructor evaluation scores. There are similarities in studies that do not separate workload into two factors as well. Marsh and Roche (2000) report that workload is positively correlated with SET scores. The present study more thoroughly investigates these findings explaining that only one part of workload is positively correlated with SET scores (good workload). In the same study, the authors
suggest a quadratic function between workload and SET scores. This is most likely because they did not consider perceived bad workload as a separate construct when evaluating the data. Based on the results seen in the present study bad workload would decrease SET ratings (especially the course satisfaction portion of these ratings). In addition, there are also similarities seen in the study by Tressa (2005) to the inter-correlations seen in this study. Tressa found that grading leniency (expected grade) was negatively related to workload. This study found similar results. Grading leniency and workload were negatively correlated regardless of whether the student perceived the workload as good or bad.

A more recent study done by Remedios and Lieberman (2007) found that overall, SET scores were determined by the quality of teaching. These researchers administered a questionnaire to students before the start of the course to ascertain student goals. At the end of the course students were given a course evaluation questionnaire to determine what students thought about the course in question. Remedios and Lieberman found that a small amount of variance (about 2%) was accounted for by expected grades. “Good teaching,” they concluded, “leads to better learning, and this is turn leads to both good grades and high course ratings (Remedios and Lieberman, 2007). In other words, grades and workload are related to how much a student learns and how much the student learns determines the SET ratings that they give to a particular course.

The results of the present study illustrate the relationships among the many variables that impact SET scores. As Richardson (2005) explained, each factor has an impact by itself and when combined with other factors.
Several limitations of the present study lie in the sample from which the data was taken. The sample size was relatively small. Initially the goal was to run a multiple regression analysis to determine the predictability of SET scores from workload. However with a sample size of only 143 the results were unreliable. This is one suggestion for future research. The majority of the courses surveyed were undergraduate psychology courses. Therefore, it is not clear as to whether these results could be generalized to other departments or graduate level courses where workload levels may be different or students have a different perception of what is necessary to succeed. This would also be a good subject for future research. Additionally, the data was collected from a variety of professors, who most likely require different amounts of workload. It would be interesting (although sample size would be limited) to gauge perceived workload for different courses taught by the same professor.

It is important to determine the factors that influence SET ratings so that courses can continue to be improved upon while also providing effective feedback for faculty and universities. Doing this will allow researchers to control for variables such as expected grade and workload that influence SET ratings. In turn, it will improve the quality of education for students everywhere.

In sum, these results provide support for the idea that SET scores can be influenced by background factors. However, many factors combine to determine the satisfaction value that a student will give to a particular course or instructor. It appears (based on these results and prior research) that SETs are truly multidimensional and that “…no single factor will predict a student’s satisfaction with a particular course or instructor…” (Richardson, 2005)."
REFERENCES


APPENDIX
APPENDIX A

Form X student evaluation form used by Gillmore and Greenwald can be found at this link:

http://www.washington.edu/oea/pdfs/course_eval/FormX.pdf
APPENDIX B (Consent Form)

Dear Student,

We are asking you to complete a survey being administered to psychology students at Cleveland State University. The purpose of this study is to investigate survey approaches for evaluating teaching and courses. With this research we hope to gain an understanding of the factors that can impact the views of students regarding effective teaching.

Your response to this survey will be anonymous. Your name will not be collected or appear anywhere on the survey. Complete privacy will be guaranteed.

Participation is completely voluntary and you may withdraw at any time without penalty.

For further information regarding this research please contact Dr. Grilly at (216)687-3749, email d.grilly@csuohio.edu.

There are two copies of this letter. Please keep one copy for your record and return the other one.

Please indicate your intent to participate by signing below.

I am 18 years or older and have read and understood this consent form and agree to participate in this study. I have also been given the opportunity to ask questions.

Signature: ___________________________________________

Name: ________________________________________________ (Please Print)

Date: ________________________________________________
APPENDIX C

For questions 1-5: please rate the following with A=Excellent, B= Very Good, C= Good, D= Fair, E= Poor, F= Very Poor. Circle your response.

1). How would you rate the contribution of this course to your understanding of the subject matter?  A  B  C  D  E  F

2). What is your evaluation of the content of this course?  A  B  C  D  E  F

3). What is your evaluation of the instructor’s contribution to this course?  A  B  C  D  E  F

4). The effectiveness of the instructor teaching this course was:  A  B  C  D  E  F

5). The value of this particular course was:  A  B  C  D  E  F

6). How would you rate the contribution of the other students in this course to your understanding of the subject matter?  A  B  C  D  E  F

7). Prior to taking this course, what was your level of interest in the subject?

Enthusiastic  Interested  Somewhat Interested  
Neutral  Somewhat Disinterested  Definitely Disinterested

8). What grade do you expect to receive for this course?

A  A-  B+  B  B-  C+  C  D  F

9). On average, how many hours per week spent on this course (reading, reviewing notes, studying, writing, or any other course related work) did you consider to be valuable in increasing your knowledge of the subject or advancing your education? ___________
10). On average, how many hours per week spent on this course did you consider to be “busy work” that did not help to advance your education or increase your knowledge of the subject? __________

11). On average, how many hours, in total, did you spend on this course? __________
Hi Jennifer,

We would be pleased if you would like to use modified versions of the workload items from the Instructional Assessment System forms, making appropriate reference to the source. Note that these items appear on all IAS forms (see http://www.washington.edu/oea/services/course_eval/forms/index.html). Although these items were introduced at the time Form X was created, this was not the reason for development of the form. Form X was created to provide departments with evaluations relating to student learning outcomes as an alternative to other IAS forms focusing on instructional format.

Our website includes a page with links to technical reports including the article you reference below (see http://www.washington.edu/oea/services/course_eval/reports.html).

Good luck with your research.

-- Nana