THE EFFECTS OF INTERVENTION STRATEGIES ON STUDENT AWARENESS OF SCIENCE HOMEWORK COMPLETION

by

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Brett L. Lehner

July 2013
DEDICATION, ACKNOWLEDGEMENTS

Throughout my graduate program one person has always been there during trying times. I would like to dedicate this capstone project paper to my wife who has always helped and supported me. Her support and direction has been the foundation that I could always rely upon.
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The purpose of this action research project was to develop student awareness about late and missing assignments. The reason for developing student awareness was to help increase homework completion rates. Teacher interviews and surveys were used to determine what types of intervention strategies have been successful in the classroom to increase student awareness of homework completion. Two recurrent intervention strategies were selected from these interviews and surveys to create student awareness of how not completing assignments can affect the overall grade. The first strategy required students to fill out a grade sheet of the assignments, due dates, points each assignment is worth, and an area to record any missing assignments as a reminder for students to improve the total amount of homework completed. The second intervention strategy was to send an electronic progress report to parents that gave a grade-by-grade weekly progress report of how well the student was doing in class for the chapter that was covered. Both intervention strategies helped develop awareness of homework completion with the weekly progress report having slightly more influence in developing student awareness and completing more homework assignments by the due date. There was an improvement in the overall average grade in all classes; however, this improvement was not a result of turning more homework on time, but rather more late homework was turned in for a grade.
INTRODUCTION AND BACKGROUND

For the past 3 years I have taught Earth and Space Science and my major concern is the lack of homework completion by students. Earth and Space Science is often used as an introductory science course to provide basic instruction in order to be successful in rigorous courses like Physical Science, Biology, or Chemistry. I need to be able to improve the amount of homework completed not only in my Earth and Space Science classes but also in all of my classes. Some of my students turn in less than half of their assigned homework.

I taught three sections of Earth and Space Science with a total of 64 students. The class is made up of students of different grade levels and academic abilities due to Individual Education Plans (IEPs) and 504 plans making it a more challenging class to teach. This is an American school overseas; therefore, the student population is very diverse and the students have been in several different schools throughout their academic career. All of the classes are made up of students from many cultural backgrounds and academic experiences. In addition, six students received English as a Second Language (ESL) services because their home language is not English. The socioeconomic status of the students depends on the level of education and career advancement of their parent(s). Depending on the military rank of the parent students may be on a reduced or free lunch program. Cost of living allowances are provided to families to support living overseas.

By developing awareness within the students and concentrating on homework completion, this study gave me direction into students’ reasoning, beliefs, and work
ethics toward homework and how students take ownership of their actions in and outside the classroom.

This research will benefit my colleagues because we share several of the same students. If a student is doing all the required homework in one classroom and not another, teachers should be communicating in order to help the student be successful in both classrooms.

The study involved parents by emailing a weekly progress report. The addition of the parents is significant because parent involvement can be a huge influence on how their child approaches their education, what type of values the child has towards their education, and the work ethic a student develops to be successful.

My main concern is for students to develop awareness of their overall earned grade and how this awareness will help show that if they complete their assignments, their overall grade may improve. By developing awareness, students may take more ownership of their efforts and in turn may be able to improve themselves academically.

Support Team

My support team is made up of five individuals from the school at which I teach and the nearby elementary school. Each of these individuals has given me insight and their perspectives on past projects and now my capstone project. I have no doubt they have given constructive feedback and guidance throughout the process of my project. The group consists of science, math, and foreign language teachers as well as an elementary teacher. I have also asked our school educational technologist to provide...
support. They all have experience dealing with students and some type of expertise in the goal that I am working towards. I believe they have all given me honest and beneficial feedback to my topic of homework completion.

HYPOTHESIS AND FOCUS STATEMENT

The hypothesis for this research project is: If using two intervention strategies to increase the amount of homework completed by my Earth and Space Science students will then make students aware of how not completing an assignment can affect their overall grade.

The concern about the lack of student awareness of homework completion in my classes and the negative effects it has on the overall academic achievement led to the primary focus question: How can student awareness of their earned grades affect the amount of homework they complete? I also examined teacher opinions and parent responses to the implemented intervention strategies. The sub-questions that were investigated included:

- What is the impact of learning new intervention strategies from colleagues on my teaching?
- What are the effects of involving parents with student homework completion through emailing weekly progress reports?
- What are the effects of weekly progress reports on student awareness of their earned grades?

CONCEPTUAL FRAMEWORK

Homework is a task assigned to students by school teachers that are intended to be carried out during after school hours. Epstein & Voorhis (2001) researched and analyzed information from a variety of sources and found “10 broad purposes of homework:
practice, preparation, participation, personal development, parent-child relations, parent-teacher communications, peer interactions, policy, public relations, and punishment” (Epstein & Voorhis, 2001, p. 181). According to Alanne & Macgregor (2009), a common purpose of homework is to have students practice material presented in class so as to reinforce learning and facilitate mastery of specific skills. There always seems to be some variety of meaning of what homework is supposed to accomplish. Homework helps develop motivational skills including responsibility, persistence, confidence, goal setting, planning, and the ability to delay gratification (Corno & Xu, 2004).

Homework itself can be a complex issue for teachers. Teachers use homework for a variety of purposes, assign differing amounts of work, as well as have differing expectations as to when it should be completed. Some teachers assign homework, but choose not to assign a grade (Coutts, 2004). “When the children enter school, they may appear excited about the idea of homework, but it takes a remarkably short period of time before many are disillusioned” (Coutts, 2004, p.183).

From a student’s point of view, homework can be boring due to it being regular procedure or it is just not interesting to the student. More often than not, students tend not to have an interest in what the topic is about, and it seems as if they are just going through the motions to get the passing grade and to pass the time. Often students do not understand the teacher’s purpose for assigning homework. In addition, students dislike homework due to the parent-student interactions as well as the time it takes to complete (Coutts, 2004). Coutts (2004) study found that 60% of fifth grade students in the U.S. had negative feelings about homework and that students had more negative feelings
towards homework than class work. In the eyes of the student, homework has the student working independently without the academic and social support found in the classroom.

Epstein & Voorhis (2001) discuss the challenge for teachers is to give homework that is designed to help reinforce learning but in a way that is pertinent and interesting to the student. The costs of homework to the student may seem more than the value behind the purpose of homework. This may be because the time it takes students to complete the task can take away from social time with friends. Homework can be an object that prevents or shortens leisure activities which involve friends like sporting activities or just socializing. “Homework is a daily activity for most students for at least 12 years of schooling” (Epstein & Voorhis, 2001, p. 191). Every assignment takes a time investment for the student and the homework assigned should be a beneficial and effective learning tool for the student.

Another aspect of homework is how students need to be managing homework assignments with self-discipline and responsibility. Homework can be approached not as an after school requirement, but as a focused strategy for increasing understanding of learned material. There are several positive effects of homework on achievement and learning. One positive effect is better retention of factual knowledge and increased understanding of content material (Cooper, Lindsey, Nye & Greathouse, 1998). “In fact, homework has been identified as one of the most important practices for establishing a successful academic environment” (Olympia, Sheridan, Jenson, & Andrews, 1994, p. 85). Olympia et al. (1994) describe three areas that homework completion strategies can be categorized. These are parent training, school-based management, and self-management. Learning to take responsibility is one of the most important benefits to homework.
Homework also provides not only a reinforcement tool for learned knowledge but can develop skills for real world situations. Ramdass & Zimmerman (2011) cite additional benefits of assigning homework. Students learn to set goals, manage their time and environment, attending to a task, and self-efficacy. Homework can provide some type of framework that teaches students to set learning goals and become self-motivated in all daily activities. Students can develop their self-regulation skills by setting their own goals, using strategies to complete homework, and being intrinsically motivated to be successful. The behavior of students towards homework can lead students to be interested in and challenge students to develop motivation to accomplish homework (Ramdass & Zimmerman, 2011).

There are long-term academic benefits of doing homework. Students are learning during their leisure time, which helps to demonstrate that learning can occur outside of the classroom (Cooper, Robinson & Patall, 2006). Other positive effects of homework are the development of critical thinking skills, concept formation, and information processing (Epstein & Voorhis, 2001, p. 192).

A study using student-managed interventions to increase homework completion measured for completion of homework by counting the number of returned assignments per day and was then expressed as a percent. Homework accuracy of completed homework was calculated by counting the number of correct answers on each assignment each day and expressed as a percent. This was also done each day for the entire class to check for overall completion percent (Olympia et al., 1994).

Student motivation was also looked at in this study. The study group was allowed to do extra practice problems where the number of extra problems completed was
recorded to establish any type of interest on the student’s part. If no extrinsic reward, such as extra credit points, are given for doing extra problems, then the measure of intrinsic motivation can be measured for each student (Olympia et al., 1994).

The procedure during each treatment condition used “self-management operations to create three team roles (coach, scorekeeper, and manager)” (Olympia et al, 1994, p.87). The groups were designed for students to help each other in a self-management format to reinforce each other’s learning and to increase homework completion and accuracy. Each subject performed his or her role for 3 days giving the opportunity for each subject to perform another team role. Team meetings were scheduled daily at the beginning of each period lasting 10 to 15 minutes where students handed in their completed homework. Instruction consisted with the teacher presenting the material in a large group format. Worksheets were provided for practice and reinforcement of the topic taught during class. The homework consisted of 20 problems and 10 extra problems, which were corrected the next day, and any questions were answered during a review time (Olympia et al., 1994).

Data collected was then published as a chart format in which baseline scores were compared to the applied treatment. The homework completion condition showed a gain of 25.7% in homework completion from baseline to treatment suggesting an effective treatment. The homework accuracy condition also showed overall improvement gain of 23.8% from the baseline to treatment suggesting an effective treatment. For measure of motivation there was no difference between baseline data and treatment data (Olympia et al., 1994).
The results suggest that students participating resulted in better gains in homework with comparison between baseline and treatment homework assignments by using the self-management program with students. “Twelve of 16 students who participated in the study produced at least 20% more homework assignments during treatment compared to baseline phases” (Olympia et al., 1994, p. 86).

Parents often become involved in the educational process of their child through homework. Homework can let parents know what the child is learning and provide insight into the dynamics of a classroom. Some parents put a lot of pressure on their children to complete their assignments and to perform well in school (Cooper et al., 2006). Parents appear to involve themselves in their children’s homework for three major reasons: they believe that they should be involved; they believe that their involvement will make a positive difference, and they perceive invitations to involvement (Hoover-Dempsey, Battiato, Walker, Reed, DeJong, & Jones, 2001). This involvement can lead students to develop responsibility, planning, and task management skills. Parental involvement in children’s homework appears to influence student outcomes because it offers modeling, reinforcement, and instruction that support the development of attitudes, knowledge, and behaviors associated with successful school performance (Hoover-Dempsey et al., 2001). This illustrates the need for parental involvement with student grades, even in a high school setting.

The use of homework is used by teachers to reinforce classroom learning and improve academic achievement. Cooper, Lindsey, Nye, & Greathouse (1998) found that the more homework students completed, the higher their report card grades and achievement test scores. Research has found some effect with elementary students and
in upper grade levels a strong positive association of homework completion on academic achievement (Theodore, Dioguardi, Hughes, Aloiso, Carlo, Eccles, 2009).

METHODOLOGY

The methodology focuses on homework that is to be completed outside the classroom and how student awareness of homework completion can affect the outcome of a student’s overall grade. The research methodology for the project received an exemption by Montana State University Institutional Review Board (IRB) and compliance for working with human subjects was maintained. (Appendix A). The Japan School District Principal and Superintendent (Appendix B) and the Department of Defense Education Activity (DoDEA) Research and Evaluation Board (Appendix C) concur with the Montana State University IRB as the research investigation is not meant to create generalizable knowledge and, therefore, is classified as action research and approve the research plan.

Instrumentation

The time frame for collecting pre-treatment baseline data consisted of a twelve-week period. Regular grades of worksheet and lab activities were recorded starting at the beginning of the school year. A hard copy grade book was used to collect data. Specific markings in the hard copy grade book were used to indicate if an assignment was turned in late or if the assignment was missing. The percentage of late and missing assignments turned in was determined. This pre-treatment baseline data established the rate of homework each section of Earth and Space Science completed on time during the pre-treatment period.
During the pre-treatment period and throughout the treatment period, I kept a teacher journal that described any classroom observations about work ethic and student responses towards homework completion were recorded. An electronic word document was always open so that initial thoughts about student comments or classroom observations pertaining to homework could be quickly recorded. These thoughts were then elaborated on at the end of the day when more time was available. The number of journal entries was based on the frequency of student comments. For example, several entries were recorded in one day and then a few days would pass without any entries recorded. Comments were also made in the teacher journal about student comments and the effectiveness of the grade sheet and the electronic progress reports throughout the pre-treatment and treatment period. The teacher journal was used to help with evaluating the use of time to conduct the grade sheets and making any modification if necessary.

Before the treatment period and to address the sub-question about the impact of learning new intervention strategies from colleagues on my teaching, the Teacher Survey Questionnaire was given to 10 teachers to complete (Appendix D). The survey used a Likert scale of 1-4 to determine teachers’ views of student awareness and attitudes toward homework completion. The Teacher Survey Questionnaire provided data on what teachers think of using a grade sheet to monitor grades, views on using an electronic grade book system, students’ reasons for not completing homework, and what they believe students’ views on the value of homework are to be successful in the classroom. The responses for each question were coded by assigning a numerical value as a response. Quantitative data was then scored and analyzed to determine the percentage of teachers who chose each response.
A sample of 10 teachers of various grade levels and various years of experience volunteered to participate in the Teacher Interview (Appendix E). The interview focused on information relating to the intervention strategies, how students value homework, and how student awareness of homework completion can affect their overall grade. The interviews were analyzed to determine opinions on values, beliefs about homework, and for teachers to voice their own opinions about homework completion in general.

Data collected from the teacher interview and the teacher survey was used to determine effective intervention strategies that would be best to instill awareness of homework completion and how late or missing assignments affect a student’s overall grade. Two intervention strategies were used to create student awareness about the importance of homework completion. The first strategy required students to fill out a grade sheet of the assignments, due dates, points each assignment is worth, and also contained an area to record any missing assignment as a reminder for students to improve the total amount of homework completed. The second intervention strategy was to send an electronic progress report to parents that gave a grade-by-grade weekly progress report of how well the student is doing in class for the chapter that was being covered.

The main topic questions and sub-questions I want to answer through my action research project are displayed, and in addition to the type of data collection best used to help answer the sub-questions (Table 1). Data collected from direct observations, formative assessment, summative assessment, teacher interviews and surveys, and the teacher daily journal was triangulated to determine the validity and reliability of the intervention strategies used to answer the main question for my action research “How can student awareness of their earned grades affect the amount of homework they complete?”
Table 1
Data Collection Matrix Methodologies

<table>
<thead>
<tr>
<th>Data Collection Questions</th>
<th>Direct Observation</th>
<th>Formative Assessment</th>
<th>Summative Assessment</th>
<th>Teacher Survey</th>
<th>Teacher Interviews</th>
<th>Teacher Journal</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Main Topic:</strong> How can student awareness of their earned grades affect the amount of homework they complete?</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>X</td>
</tr>
<tr>
<td><strong>Sub-question #1:</strong> What is the impact of learning new intervention strategies from colleagues on my teaching?</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>X</td>
</tr>
<tr>
<td><strong>Sub-question #2:</strong> What are the effects of involving parents with student homework completion through emailing weekly progress reports?</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td></td>
<td></td>
<td>X</td>
</tr>
<tr>
<td><strong>Sub-question #3:</strong> What are the effects of weekly grade reports on student awareness of their earned grades?</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Treatment

The treatment was conducted over a twelve-week period with the first six weeks of the treatment period used to implement and determine only the effectiveness of the grade sheets while the last six weeks were used to only implement and establish the effectiveness of the electronic weekly progress reports.

The first six weeks of the treatment period began with students completing a grade sheet with the assignments, due dates, points earned, and total points per assignment for a given chapter (Appendix F). Members of the support team helped develop and design the grade sheet by giving multiple views and thoughts on structuring of the grade sheet to help with developing a grade sheet that would provide students with the information they needed to help improve awareness towards homework assignments.
Teacher journal entries, the number of homework assignments completed, and overall class grades were used to determine the value of the intervention strategies.

At the beginning of each chapter, the grade sheet was handed to each student and the teacher conducted a short discussion about the purpose of the intervention strategy. Any clarification needed was addressed. The grade sheet was reviewed at the beginning of each class period to remind students of assignment due dates. There were a total of three grade sheets used during the treatment period. As students entered the classroom, corrected homework assignments were passed back and students were given time to complete their grade sheet by checking off assignments and recording their earned grade for each assignment. The students then calculated their own earned grade for each of their corrected and returned assignments. During this time, their calculations for completion and accuracy were checked and any immediate questions the students had about their grade were answered. This setup provided an easy way for students to quickly write their earned points next to the total points in order to calculate the percentage that was earned on the assignment. After a chapter was completed, the test score was added to the grade sheet and the entire amount of homework points and points earned on summative assessments were available for students to compare their earned points to the total points for the chapter. Students then calculated an overall grade for the completed chapter. Once the overall grade was calculated, students needed to answer three follow-up questions about what most affected their grade, how many missing assignments they had, and what they need to do to improve their overall grade. As a class, these questions were then discussed and any issues or concerns students had been addressed.
The second intervention strategy included using a computer grade book program that sent out weekly progress reports to parents informing them of what their child has earned on each assignment given during a specific chapter. These weekly progress reports were sent out every Friday to help with the lack of awareness of missing assignments by each student and to inform their parents about their child’s overall grade (Appendix G). The weekly progress reports provided parents and students with a grade earned per assignment and total points earned for a specific chapter being covered. If a student does not turn in an assignment or turns an assignment in late, there was a note placed on their progress report in the location next to the total points earned on the assignment stating that the assignment was late or missing. There was also a parent signature line put on the bottom of the progress report to provide students with an additional incentive to talk to parents about current grades. If students returned to class the following Monday with the parent’s signature on the progress report, they received extra credit points on the chapter test. A check list was made in my teacher journal of students whom I received parent signed progress reports from to determine if any correlation existed between parents signing the progress report and an increase in homework completion.

At the end of the treatment period data was collected and analyzed to determine effectiveness of the use of both intervention strategies and to determine the success that students had by using this approach to help build awareness of how not turning in homework assignments will affect their overall earned grade.
DATA AND ANALYSIS

Data was first collected from the teacher interviews and surveys to assess what other teachers were doing in their classrooms, and to determine the type of intervention strategies used to develop awareness about homework completion throughout the treatment period. Data was collected on student awareness by looking at the percentage of homework assignments being completed on time. The teacher interview and survey data results (Appendix H) helped with determining what type of intervention strategies that have proven to be effective for other teachers and what has not worked. The following table shows the frequency of intervention strategies used by these teachers as determined by the interview (Table 2).

Table 2
Teacher Intervention Strategy Frequency (N=10)

<table>
<thead>
<tr>
<th>Intervention Strategy</th>
<th>Number of Teachers using Intervention Strategy</th>
</tr>
</thead>
<tbody>
<tr>
<td>Student counseling.</td>
<td>4</td>
</tr>
<tr>
<td>Making students complete homework in class.</td>
<td>1</td>
</tr>
<tr>
<td>Incorporating detailed assignment sheets.</td>
<td>3</td>
</tr>
<tr>
<td>Posting assignments on the school website.</td>
<td>2</td>
</tr>
<tr>
<td>Sending email notices home about homework.</td>
<td>1</td>
</tr>
<tr>
<td>Reviewing homework tasks for a few minutes before the end of class.</td>
<td>4</td>
</tr>
<tr>
<td>Giving students the opportunity to redo or make up homework.</td>
<td>3</td>
</tr>
</tbody>
</table>

The teacher interview and survey showed that teachers thought the intervention strategy of having all the homework pre-assigned at the very beginning of the unit and
handing them a sheet with all the homework listed can help increase the amount of homework completed on time. Three of the five interviewees used this method. When looking at the intervention strategies implemented during the treatment period, 80% (N=10) of teachers agreed that students would benefit from completing a grade sheet that reflects their overall current grade. The effectiveness of the intervention strategy is based on the idea that the students know what to expect. A teacher commented, “Sending notes and emails home, which take a huge amount of time to write well, seem to have less than a 50% success rate, and any success seems to be short lived.”

During the pre-treatment period, the teacher journal shows several different student comments associated with homework completion and the teacher’s responses (Table 3).
Table 3

*Student’s Personal Views of Homework*

<table>
<thead>
<tr>
<th>Student Response</th>
<th>Teacher Response</th>
</tr>
</thead>
<tbody>
<tr>
<td>We have homework every day for class?</td>
<td>Yes. I have said this several times that you will have homework every day. You will always have something to turn in everyday you come to class.</td>
</tr>
<tr>
<td>I did not think that assignment you gave me was homework.</td>
<td>I would not waste your time with busy work. Everything I give you is for a reason.</td>
</tr>
<tr>
<td>Is this worksheet homework?</td>
<td>Yes. Everything worksheet or lab activity if not completed during class is homework.</td>
</tr>
<tr>
<td>If I don’t finish it in class, is it homework?</td>
<td>Yes. Everything, worksheet or lab activity, if not completed during class is homework.</td>
</tr>
<tr>
<td>I did most of it. I should get credit for all of it.</td>
<td>That is not the way it works. If you don’t do it, I cannot give you credit for it.</td>
</tr>
<tr>
<td>I did not understand the directions. Too confusing.</td>
<td>What did you not understand about the directions? (I have yet to have a student answer this question. Tells me they never read the directions in the first place.)</td>
</tr>
<tr>
<td>I have it done but I forgot it at home.</td>
<td>I have offered the student the phone to call a parent to bring it in but the student refuses to talk to their parent. Did they actually finish it?</td>
</tr>
<tr>
<td>I will do it at home. Isn’t that why it is called homework?</td>
<td>Why not do it now so if you have questions, I am available to you?</td>
</tr>
<tr>
<td>Is this in our book? Can I get the answers by reading the book?</td>
<td>Yes. The content for the class is coming directly from your book.</td>
</tr>
<tr>
<td>I cannot find it in the book.</td>
<td>What chapter are we on? What section in the chapter are we on?</td>
</tr>
<tr>
<td>I did not know what chapter we are on.</td>
<td>(It is written on the board.) What does the whiteboard say?</td>
</tr>
</tbody>
</table>

One trend with students not completing homework would be that students are not accustomed to doing homework. There were frequent comments such as “We have homework every day for class?”, “I did not think that assignment you gave me was homework.”, or “Is this worksheet homework?” indicates that students haven’t been
exposed to the process of homework. The teacher journal also showed that students who made comments like above or similar comments were typically lower achieving students.

When the topic of student awareness was addressed during the teacher interview, the teachers believe that students have a hard time understanding the impact of individual assignments on their grade. 60% \((N=10)\) of teachers feel that students are not completely aware of their current grade and how missing or late assignments affect their overall grade. Even more, students use the school’s electronic grade book system sparingly to check their current grade. A comment during the interview was, “They just look at the grade. They do not spend the time to see how they have earned the grade.” I am often asked, “If doing this assignment, will my grade go up to a B?” (when they are at a 75%). Student comments recorded in the teacher’s journal about their grades such as “Will that missing assignment hurt my grade?” or “How did I get that grade?” also shows that students are not aware of how late or missing assignments affect their overall grade.

The survey revealed that 90% \((N=10)\) of the teachers believe students understand the directions and often complete their homework in a timely manner by doing homework outside of school while 40% \((N=10)\) believe students understand the value in homework as a necessary tool for student learning.

Additionally, during the teacher interview, teachers believe students prioritize their homework. “If a poor trend of homework completion is noted, then an email is sent to the parents, and then the priority becomes a family issue which can result in the assignments getting done.” This comment shows how parents can be involved in their child’s homework completion and the influence that parents have on their child’s education. 80% \((N=10)\) of those teachers believe other classes’ homework, sports, or
social events contribute to the reason for students not completing homework. Observations such as poor use of class time, noted in the teacher journal support these beliefs. Students are not using their time effectively whether in the classroom or outside the classroom because socialization is a priority for students.

Parent involvement was addressed throughout the teacher interview and 90% ($N=10$) of teachers interviewed agree that parents are important to student academic success. Figure 1 shows the direction of parent response due to the academic performance of the student before the treatment period and then during the treatment period.

![Figure 1. Type of parent communication, ($N=37$).](image)

During the pre-treatment period, most parent/teacher communication was primarily focused on what assignments their child turned in late or was missing. For example, several parents responded, “What assignments can still be turned in and how will turning in the assignments change their grade?” During the treatment period, the parent/teacher communication shifted towards questions regarding the intervention strategies and the updated electronic grade book while responses about missing or late
work decreased. A common response was, “What can we do to help my son/daughter get their assignments turned in on time?” Since the number of responses about possible intervention strategies increased this showed that parents were more aware of the teacher’s goals behind the intervention strategies to help create a higher success rate of their child completing homework on time.

The information collected in the teacher journal showed a positive correlation between communication with a parent and an increase in homework completion of the student. Students whose parent communicated in some way with the teacher about their child’s academic progress increased the student’s overall earned grade. For example, one student whose parent communicated about the intervention strategies, grade increased by 23% during a six-week period.

To measure the effectiveness of the grade sheet intervention strategy during the first six weeks of the treatment period, a percentage of homework assignments handed in on time were analyzed. Figure 2 shows the changes in the percentage of worksheets completed on time with no change for section 1, a decrease of 1% for section 2, and a 1.7% increase for section 3.
Even with the intervention strategy of using a grade sheet to record assignment due dates and scores, Figure 2 shows that there was little to no change in the amount of worksheet homework completed on time. The intervention strategy of using a grade sheet may have made students more aware about the missing worksheet assignments, but did not increase the number of worksheet assignments turned in on time. I believe that this may have been due students not knowing the impact of how missing assignment can affect their overall grade.

Figure 3 shows the percentage of lab activities completed on time had a slightly better overall improvement than the worksheet completion. This may have been due to the lab activities being performed during class time versus the worksheets being assigned to do outside the classroom. Section 1 increased by 1%, section 2 increased by 1.2%, while section 3 had a decrease of 0.4%.

Figure 2. Worksheet assignments turned in on time – Grade Sheet Intervention, (N=64).
Figure 3. Lab activities turned in on time – Grade Sheet Intervention, (N=64).

Even though students were completing the grade sheets there was little change in the percentage of homework completed by the due date. Again, the intervention strategy of using a grade sheet may have made students more aware about the missing lab activities, but did not increase the number of lab activities turned in on time. Information collected in the teacher’s journal suggests student attitudes and values towards homework did not change throughout the first six weeks of the treatment period. I believe this may have been due to students losing interest in completing the grade sheet. The student sighs and complaints was enough of a signal that they did not care for doing the grade sheets. I understand that, however, I think it is important that they are aware of their grades.

To measure the effectiveness of the weekly progress report during the last six weeks of the treatment period, the percentage of homework assignments handed in on
time was measured. The number of assignments turned in on the due date did increase slightly but had similar results to that of the grade sheet. Figure 4 shows the changes in the percentage of worksheets completed on time with a 3% increase for section 1, an increase of 4.1% for section 2, and a 3.7% increase for section 3.

**Figure 4.** Worksheets turned in on time – Progress Report Intervention, \((N=64)\).

The intervention strategy of sending an electronic progress report had a greater effect on the number of worksheets turned in on time. Figure 4 shows that every section had increased the number of worksheets turned in on time. I believe that this may have been due to the involvement of the student’s parents receiving the electronic progress report on a weekly basis and making them more involved in their students’ academic process.

Figure 5 shows that the percentage of lab activities completed on time changed slightly more than the worksheet completion. Section 1 increased by 3%, section 2 increased by 4%, while section 3 increased by 4.4%.
The number of lab activities turned in on time had a similar increase, as did the worksheets turned in on time. Figure 5 shows that every section had increased the number of lab activates turned in on time. As earlier, I believe that this may have been due to the involvement of the student’s parents receiving the electronic progress report on a weekly basis and making them more involved in their students’ academic process.

Students completed more worksheets and lab activities during the last six weeks of the treatment period compared to the first six weeks of the treatment period. The teacher’s journal showed student attitudes and values towards homework changed due to the involvement of the parents during the last six weeks of the treatment period. Several students commented, “I need to complete my homework before the progress report is sent or I will get in trouble.” By involving parents with the weekly progress report there was more of a repercussion for the student for not completing the assignment.

An observation noted in the teacher journal was regarding the increase of late assignments handed in during the entire treatment period. I made a comment about how
“I am spending more time correcting late assignments.” Looking at the effectiveness of both of the intervention strategies during the treatment, the overall percentage of homework or lab activities was calculated by comparing the number of pre-treatment assignment completed after the original due date and post-treatment assignments completed after the original due date. Throughout both treatments, Figure 6 and Figure 7 show an increase in all sections of the number of homework worksheet and lab activities completed after the original due date.

Figure 6. Worksheet assignments turned in after the due date, \(N=64\).
Figure 7. Lab activities assignments turned in after the due date, \(N=64\).

Section 3 had the greatest increase in the number of assignments turned in after the due date. This difference may have been due to the low number of assignments initially turned in on time. The increase in the number of missing assignments turned in after the due date contributed to an overall increase in the class average grade for each section that is shown in Figure 8. Section 1 increased by 3.2%, section 2 by 3.5%, and section 3 by 3.5%.
Other direct observations noted in the teacher journal during the treatment period were students became more active in completing late work during their seminar period and asking for more help with homework. While the percentages of completed assignments only change slightly due to the intervention strategies, overall, most students increased their overall class grade due to turning in assignments after the original due date.

**INTERPRETATION AND CONCLUSION**

The results of the study indicate that students did not turn in more homework assignments on the assigned due date, but students were made aware of how missing assignments can affect their overall grade and students were then more likely to turn in assignment after the due date.

Teacher participants agreed that students see homework as something to do for a grade and may not understand the full extent of what the function of homework is. The topic regarding students just doing the minimum for a grade was a common theme.
Students have been observed calculating how much homework they need to complete in order to get a passing grade. The first sub-question, what is the impact of learning new intervention strategies from colleagues on my teaching, showed that the intervention strategies I used had some impact on student responsibility and awareness, but poor study skills, student priorities, and work ethic often outweigh the effectiveness of these strategies. One significant comment made by a teacher participant was “I try to minimize the number of questions assigned to see if there would be an improvement, but I think it comes down to poor work ethic.” This comment makes me think of how to instill a strong work ethic within students. Is this something that can be taught or is this something that has to come from within the student?

The first intervention strategy of having students complete a grade sheet, did not work as anticipated. The initial thought from the teacher interview and survey supported the idea of developing student awareness through a grade sheet of homework assignments. The awareness can then lead to more accountability and possibly increase their overall grade. One comment made by a teacher participant was “It is easier for students to visualize how low homework scores damage their grades.” Even though students were exposed to the grading process through the grade sheet there was little increase in the number of homework completed on time. I believe students are creatures of habit and the grade sheet intervention strategy did not provide any internal or external motivational factor to get students to complete the assignments on time. Figure 2 and Figure 3 show no change, a slight increase, and even a drop in the number of assignments turn in for section 2 on worksheet completion.
Several students commented on how tedious of a job it was to calculate their own grade and they lost interest in it quickly. By the third grade sheet, most students were resistant to completing the grade sheet correctly and the strategy became very time consuming. The researcher observed a lack of student interest in completing or discussing the follow-up questions. There were few student responses to the follow-up questions and these responses were vague. When students were asked if they would like to continue doing the grade sheets a majority of students responded with a negative response.

The second intervention strategy of sending weekly electronic progress reports focused on the second sub-question of involving parents with emailing weekly progress reports and the third sub-questions of the effects of weekly progress reports on student awareness of their earned grade. This intervention strategy was more successful in providing awareness of how late or missing assignments affect the student’s overall grade. Figure 4 shows the changes in the percentage of worksheets completed on time with a 3% increase for section 1, an increase of 4.1% for section 2, and a 3.7% increase for section 3. Figure 5 showed that section 1 increased by 3%, section 2 increased by 4%, while section 3 increased by 4.4% on lab activity completion.

This intervention strategy involved both parents and the students. This was a great way for parents to initiate the initial questioning about homework completion towards the teacher and the students. The frequency of teacher directed responses from parents or students provided a quantitative measurement of how aware the parents and students are about the student’s homework completion rates. Involving parents and creating awareness in parents first with the weekly emailed progress reports helped with student awareness and more accountability of their progress at school. The teacher
journal showed that very few students took advantage of the reward of extra credit by getting a parent signature on the bottom of the progress report. Very few students ($N=5$) turned in the parent signed electronic progress report so not enough data was collected to determine whether any correlation existed between students who submitted parent signed progress reports and increased homework completion.

Several students indicated that they were motivated to complete more homework so their parents would not be as involved in their education. With the increase in parent communication during the last six weeks of the study, overall, students did better in school when parents communicated with the teacher and were more involved in their student’s education. On average, students increased by 3.6% completion rate for worksheets and 3.8% for lab activities. The type of questions asked by parents changed during the treatment period. Questions regarding late and missing work decreased by 20.4% while questions about possible intervention strategies increased by 14.3% and the electronic updated grade book increased by 6.1%. Frequent communications between parents and teachers helped the student be successful with their education.

It was observed that the weekly progress reports initiated more student conversations where students took more advantage of teaching availability before school, after school, and during seminar period. Students took responsibility for their education by completing more homework even if it was late.

The question, which comes first, ownership or awareness, was contemplated. If students are aware of what is happening with their grade, then they may take ownership of their actions and work to improve their grade. If ownership comes first, then
awareness soon follows with students learning what they need to do to be successful in the classroom.

To revisit the hypothesis, while the intervention strategies did work on more of an individual student level there was not much of an improvement of homework completed on time by the entire group of students. Without collecting data directly from students, it seems the grade sheet and the weekly progress reports did make students more aware of due dates of assignments and the repercussions of not getting assignments turned in on time. Although students were reminded repeatedly about how important homework is and what the implications are when they do not turn in their assignment, several students still did not turn in homework on the assigned due date but rather after the due date which led to the improvement in the average class grade.

These intervention strategies may not have worked as planned because every student has developed their own homework habits throughout previous years and these intervention strategy may have not provide enough structure or motivation to get students to develop new homework habits.

VALUE

This study is valuable to me as a teacher because I was able to implement and identify strategies to improve homework completion in all of my classes. This study can provide information for my colleagues and other educators, especially those who teach introductory level courses. By sharing the results of my project with my colleagues, they may be able to use the intervention strategies that I used and cater them to their own teaching style and classroom dynamics to develop student awareness about homework completion. The teacher interviews showed me not to rely only on my own opinion and
experiences but to communicate with colleagues about different types of intervention strategies and the effectiveness of these strategies. For example, something as simple as having assignments written on the whiteboard so that students can see the type of assignment and the date that they are due. Learning from my colleagues experience in the classroom has been a great benefit to my own professional growth.

This process has made me be a better teacher through the process of creating different ways of implementing intervention strategies and approaching data analysis. It has also shown me how personal reflection is a big part of growing as a professional. Whether the implemented intervention strategies work or not there is value in the results. There was a lot of focus on homework completion that is essential to the learning process for retention and practice of learned material. Although the number of late and missing homework assignments did not change, I did see an overall improvement in the percentage of missing or late assignments turned in. I believe the intervention strategies held students accountable and also showing them firsthand the impact their homework has on their grade.

Even if you do not get the desired outcome you are expecting, you can still learn from failed strategies. One main theme I am taking away from this research is that teachers need to make sure that the homework assignments they require are worthwhile and relevant to the students; otherwise, students do not see the value. For example, telling students that the atmosphere is 21% oxygen and then actually being able to measure the amount through a lab activity can make students understand the connection and value in the lab activity and the lesson.
The benefit of this project helped me realize how just the slightest academic achievement from my students can affect and change the overall dynamics of the classroom. For example, when I complement a class on how well the class did on a test, they will often make a comment before taking the next test on how much better they will do on the next test. This sense of accomplishment can instill an increased level of confidence and motivate students to greater achievements. This lead to higher grades by most students and grades are the backbone of a student’s education. When success is achieved there is a presence of accomplishment within the student and this leads to future success.

Even though the grade sheet intervention only showed an overall increase of 1.2% in homework completed on time I still believe that it can be a valuable tool in helping students with task management and improving the number of assignments turned in on time. The future use of the grade sheet will consists of starting it at the beginning of the school year so it will become part of my teaching practice and students will use the grade sheets are part of the everyday course.

With the electronic progress report there was an overall increase of 3.7% in homework completed on time. I do believe that students whose parents are involved in their formal education tend to do better in school. For example, one student whose parent communicated about the intervention strategies, grade increased by 23%. Parent involvement can be as simple as them conveying high expectations to their children, encouraging them to take risks, or even encouraging them to enroll in rigorous courses. By providing some type of weekly message like the weekly progress report can keep parents informed and active in their students’ education. Because of the increase
of 14.3% in parent communication from the electronic progress report and parent contacting the teacher about ways in which they may be able to help their child be more successful during the treatment period, I have continued to use the weekly progress reports throughout the rest of the school year and will continue it in the future.

I do believe that developing awareness about homework completion can contribute and be partly responsible for increasing grades. I do believe that more research and data is needed to confirm that relationship. For future research I would look at the relationship to completing homework versus test scores for each chapter covered. I can also look at data from the electronic grade book, GradeSpeed, to see how often students access it, reason for accessing GradeSpeed, and compare their grades to the number of times and purpose of accessing GradeSpeed.
REFERENCES CITED


APPENDICES
APPENDIX A

MONTANA STATE UNIVERSITY INSTITUTIONAL REVIEW BOARD
INSTITUTIONAL REVIEW BOARD
For the Protection of Human Subjects
FWA 00000165

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950 Technology Blvd, Room 127
c/o Immunology & Infectious Diseases
Montana State University
Bozeman, MT 59718
Telephone: 406-994-6783
FAX: 406-994-4303
E-mail: cheryl@montana.edu

MEMORANDUM

TO: Brett Lehner and Walt Woolbaugh
FROM: Mark Quinn, Chair
DATE: December 7, 2012
RE: The Effects of Weekly Progress Reports on Student Awareness of Homework Completion [BL120712-EX]

The above research, described in your submission of December 7, 2012, is exempt from the requirement of review by the Institutional Review Board in accordance with the Code of Federal regulations, Part 46, section 101. The specific paragraph which applies to your research is:

X (b) (1) Research conducted in established or commonly accepted educational settings, involving normal educational practices such as (i) research on regular and special education instructional strategies, or (ii) research on the effectiveness of or the comparison among instructional techniques, curricula, or classroom management methods.

X (b) (2) Research involving the use of educational tests (cognitive, diagnostic, aptitude, achievement), survey procedures, interview procedures or observation of public behavior, unless: (i) information obtained is recorded in such a manner that human subjects can be identified, directly or through identifiers linked to the subjects; and (ii) any disclosure of the human subjects’ responses outside the research could reasonably place the subjects at risk of criminal or civil liability, or be damaging to the subjects’ financial standing, employability, or reputation.

(b) (3) Research involving the use of educational tests (cognitive, diagnostic, aptitude, achievement), survey procedures, interview procedures, or observation of public behavior that is not exempt under paragraph (b)(2) of this section, if: (i) the human subjects are elected or appointed public officials or candidates for public office; or (ii) federal statute(s) without exception that the confidentiality of the personally identifiable information will be maintained throughout the research and thereafter.

(b) (4) Research involving the collection or study of existing data, documents, records, pathological specimens, or diagnostic specimens, if these sources are publicly available, or if the information is recorded by the investigator in such a manner that the subjects cannot be identified, directly or through identifiers linked to the subjects.

(b) (5) Research and demonstration projects, which are conducted by or subject to the approval of department or agency heads, and which are designed to study, evaluate, or otherwise examine: (i) public benefit or service programs; (ii) procedures for obtaining benefits or services under those programs; (iii) possible changes in or alternatives to those programs or procedures; or (iv) possible changes in methods or levels of payment for benefits or services under those programs.

(b) (6) Taste and food quality evaluation and consumer acceptance studies, (i) if wholesome foods without additives are consumed, or (ii) if a food is consumed that contains a food ingredient at or below the level and for a use found to be safe, or agricultural chemical or environmental contaminant at or below the level found to be safe, by the FDA, or approved by the EPA, or the Food Safety and Inspection Service of the USDA.

Although review by the Institutional Review Board is not required for the above research, the Committee will be glad to review it. If you wish a review and committee approval, please submit 3 copies of the usual application form and it will be processed by expedited review.
APPENDIX B:

JAPAN SCHOOL DISTRICT PRINCIPAL AND SUPERINTENDENT CONSENT
# PRINCIPAL AND SUPERINTENDENT CONSENT

1. **PRINCIPAL**

   a. I have reviewed the Research Study Request for Brett Lehner

   b. The Effects of Student Awareness to Increase Homework Completion.

   c. I (X one) agree [ ] disagree that my school will participate in this research study.

   I also understand that given my consent, this research will be conducted in accordance with Department of Defense Education Activity (DoDEA) policy.

2. **SUPERINTENDENT**

   a. I (X one) agree [ ] disagree that my school will participate in this research study.

   I also understand that given my consent, this research will be conducted in accordance with Department of Defense Education Activity (DoDEA) policy.

   b. Date (YYYYMMDD) [ ] Superintendent's Name (Last, First, Middle Initial)

   d. Superintendent's Signature

3. **TO BE COMPLETED BY THE PRINCIPAL AND SUPERINTENDENT**

   If you disagreed above, please state your reasons below.

Superintendent: Return to the DODEA: Chief, Research and Evaluation Branch
Fax: (703) 588-3766

*DoDEA FORM 2071.3-F4, FEB 2009*
Brett L. Lehner  
PSC 76 Box 3591  
APO, AP 96319

1 February 2013

Dear Mr. Lehner,

I have reviewed your research proposal, “The Effects of Intervention Strategies on Student Awareness of Homework Completion” and the exemption letter provided by the Montana State University IRB. I concur with your university IRB that as currently defined, your investigation is not meant to create generalizable knowledge and is therefore classified as action research, not true research. As such, your proposal does not require formal DoDEA HQ review or approval.

You may proceed with your action research as planned. However, as mentioned by your university IRB, student participation must be voluntary and students should not be provided any extra credit or punishment based on participation. We are also requesting that you obtain parent consent and student assent for participation.

If the scope of your proposal expands and you intend to disseminate findings from your research or generate information that will contribute to generalizable knowledge, you will need to submit a full research proposal to DoDEA HQ for full review. Also please remember that participation by individuals, including school personnel and students, must be strictly voluntary.

Best of luck, please feel free to contact me if you have further questions.

Sincerely,

Digitally signed by
sandra.embler@hq.dodea.edu
DN: cn=sandra.embler@hq.dodea.edu
Date: 2013.02.01 10:27:21 -05'00'

Sandra D. Embler, Ph.D.
Chief, Research and Evaluation

sandra.embler@hq.dodea.edu
APPENDIX D

TEACHER SURVEY QUESTIONNAIRE
**Teacher Survey Questionnaire**

*Participation in this research survey is voluntary and participation or non-participation will not affect standing in any way.*

**Directions:** The statements in this survey have to do with your opinions and beliefs about student homework completion. Read each statement carefully, and circle the number that best expresses your own beliefs.

<table>
<thead>
<tr>
<th>Very Rarely 1</th>
<th>Rarely 2</th>
<th>Often 3</th>
<th>Very Often 4</th>
</tr>
</thead>
<tbody>
<tr>
<td>Students complete my homework assignments. Why or why not?</td>
<td>1 2 3 4</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Students can benefit from a visual image, such as a graph, that tell them what their current grade is.</td>
<td>1 2 3 4</td>
<td></td>
<td></td>
</tr>
<tr>
<td>If students don't get an assignment done in class, they finish it at home.</td>
<td>1 2 3 4</td>
<td></td>
<td></td>
</tr>
<tr>
<td>I believe students view homework as a necessary tool for student learning.</td>
<td>1 2 3 4</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Homework for other classes gets priority over homework in the classes I teach.</td>
<td>1 2 3 4</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Students turn in assigned homework on time.</td>
<td>1 2 3 4</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Students do not know what their current overall grade is.</td>
<td>1 2 3 4</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Students realize how not turning in an assignment will affect their overall grade.</td>
<td>1 2 3 4</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Students will benefit from completing a chart that reflects their grades on homework assignments. Why or why not?</td>
<td>1 2 3 4</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Students do not understand the instructions or what to do on homework assignments.</td>
<td>1 2 3 4</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Students check GradeSpeed often to see what their current grades are.</td>
<td>1 2 3 4</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Other interests (sports, video games, television, etc.) get priority over homework.</td>
<td>1 2 3 4</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Parent involvement is important to the success of student achievement.</td>
<td>1 2 3 4</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Do you have any additional thoughts or comments you would like to share about homework or this class?</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
APPENDIX E

TEACHER INTERVIEW QUESTIONS
Teacher Interview Questions

Participation in this research interview is voluntary and participation or non-participation will not affect your standing in any way.

1. What type of intervention strategies have you tried in your classroom for completion of homework?
   a. What has worked and what has not worked? Please give specific examples.
   b. Why do you think one strategy worked while another one did not work?

2. Do you think your students know the value in homework?
   a. Do students look at homework as a reinforcement tool or something they must do for the grade? What leads you to this conclusion? Provide examples.

3. Do you see specific types of assignments not completed more than others? (graphing, problem solving)
   a. Why do you think students choose not to complete these assignments?

4. Do you think homework completion correlates with parent involvement? Why or why not?
   a. Do you think parents are more involved in their student’s education with the use of technology? i.e. GradeSpeed, SharePoint.

5. Do your students use remaining class time to complete homework in order to ensure they understand the assignment? Do you allow time for this?
   a. Do they ask clarifying questions to help understand?
   b. Do students use available resources to complete homework?

6. Do you believe students are aware of how they earned their current grade?
   a. Are students familiar with the grading process?
   b. What has worked in making students aware of the effect of homework completion on their overall grade?

7. Do you think making students aware of how missing and late assignments affects their grade will encourage them to complete their homework on time?
   a. In your opinion, what has to happen first in order for students to become aware of how homework completion affects their grade?
   b. Do students recognize the effect missing or late assignments have on their overall grade?
   c. What interventions have worked in bringing about student awareness of how missing or late assignments have on their overall grade?
APPENDIX F

GRADE SHEETS
**Chapter 4 – Rocks Assignment/Test Grade Sheet**

**Directions:** *Use the following chart to calculate your overall grade for the rocks chapter.*

<table>
<thead>
<tr>
<th>Homework Assignment</th>
<th>Due Date</th>
<th>Completed (Check)</th>
<th>Point earned per assignment/Total Points</th>
<th>Grade</th>
</tr>
</thead>
<tbody>
<tr>
<td>Rocks Vocabulary</td>
<td></td>
<td></td>
<td>____/8</td>
<td></td>
</tr>
<tr>
<td>Riding the Rock Cycle Activity</td>
<td></td>
<td></td>
<td>____/12</td>
<td></td>
</tr>
<tr>
<td>Igneous Rocks Worksheet</td>
<td></td>
<td></td>
<td>____/8</td>
<td></td>
</tr>
<tr>
<td>Igneous Rock Clues</td>
<td></td>
<td></td>
<td>____/10</td>
<td></td>
</tr>
<tr>
<td>Metamorphic Rocks Worksheet</td>
<td></td>
<td></td>
<td>____/7</td>
<td></td>
</tr>
<tr>
<td>Identifying Metamorphic Rocks Activity</td>
<td></td>
<td></td>
<td>____/10</td>
<td></td>
</tr>
<tr>
<td>Sedimentary Rocks Worksheet</td>
<td></td>
<td></td>
<td>____/8</td>
<td></td>
</tr>
<tr>
<td>Sedimentary Rocks Activity</td>
<td></td>
<td></td>
<td>____/10</td>
<td></td>
</tr>
<tr>
<td>Extra Credit</td>
<td></td>
<td></td>
<td>____/5</td>
<td></td>
</tr>
<tr>
<td>Rocks Test</td>
<td></td>
<td></td>
<td>____/57</td>
<td></td>
</tr>
</tbody>
</table>

**Chapter 4 – Rocks**

<table>
<thead>
<tr>
<th>Point earned per assignment/Total Points</th>
<th>Overall Grade</th>
</tr>
</thead>
<tbody>
<tr>
<td>Total Points</td>
<td>____/130</td>
</tr>
</tbody>
</table>

**Conclusion Questions:**

1. What is most affecting your grade? Positive or negative.

2. How many missing assignments do you have and what effect is it having on your grade?

3. What do I need to do to improve my overall grade?

---

**Chapter 6 – Views of Earth Assignment/Test Grade Sheet**
**Directions:** Use the following chart to calculate your overall grade for the rocks chapter.

<table>
<thead>
<tr>
<th>Homework Assignment</th>
<th>Due Date</th>
<th>Completed (Check)</th>
<th>Point earned per assignment/Total Points</th>
<th>Grade</th>
</tr>
</thead>
<tbody>
<tr>
<td>Views of Earth Vocabulary</td>
<td></td>
<td></td>
<td>____ /7</td>
<td></td>
</tr>
<tr>
<td>Landforms Worksheet</td>
<td></td>
<td></td>
<td>____ /10</td>
<td></td>
</tr>
<tr>
<td>View Points Worksheet</td>
<td></td>
<td></td>
<td>____ /7</td>
<td></td>
</tr>
<tr>
<td>Latitude and Longitude</td>
<td></td>
<td></td>
<td>____ /7</td>
<td></td>
</tr>
<tr>
<td>Worksheet</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Maps Worksheet</td>
<td></td>
<td></td>
<td>____ /10</td>
<td></td>
</tr>
<tr>
<td>Construction a Topographic</td>
<td></td>
<td></td>
<td>____ /17</td>
<td></td>
</tr>
<tr>
<td>Map Lab</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Extra Credit</td>
<td></td>
<td></td>
<td>____ /5</td>
<td></td>
</tr>
<tr>
<td>Views of Earth Test</td>
<td></td>
<td></td>
<td>____ /50</td>
<td></td>
</tr>
</tbody>
</table>

**Chapter 6 – Views of Earth**

<table>
<thead>
<tr>
<th>Point earned per assignment/Total Points</th>
<th>Overall Grade</th>
</tr>
</thead>
<tbody>
<tr>
<td>Total Points</td>
<td>____ /108</td>
</tr>
</tbody>
</table>

**Conclusion Questions:**

1. What is most affecting your grade? Positive or negative.

2. How many missing assignments do you have and what effect is it having on your grade?

3. What do I need to do to improve my overall grade?

Name___________________________________ Period_______ Date____________________

Chapter 7 – Weathering and Soil Assignment/Test Grade Sheet

**Directions:** Use the following chart to calculate your overall grade for the rocks chapter.
<table>
<thead>
<tr>
<th>Homework Assignment</th>
<th>Due Date</th>
<th>Completed (Check)</th>
<th>Point earned per assignment/Total Points</th>
<th>Grade</th>
</tr>
</thead>
<tbody>
<tr>
<td>Weathering and Soil Vocabulary</td>
<td></td>
<td></td>
<td>7/7</td>
<td></td>
</tr>
<tr>
<td>Weathering Worksheet</td>
<td></td>
<td></td>
<td>9/9</td>
<td></td>
</tr>
<tr>
<td>Mechanical Weathering Lab</td>
<td></td>
<td></td>
<td>10/10</td>
<td></td>
</tr>
<tr>
<td>Nature of Soil Worksheet</td>
<td></td>
<td></td>
<td>7/7</td>
<td></td>
</tr>
<tr>
<td>Soil Sampling Lab</td>
<td></td>
<td></td>
<td>10/10</td>
<td></td>
</tr>
<tr>
<td>Soil Erosion Worksheet</td>
<td></td>
<td></td>
<td>11/11</td>
<td></td>
</tr>
<tr>
<td>Extra Credit</td>
<td></td>
<td></td>
<td>5/5</td>
<td></td>
</tr>
<tr>
<td>Weathering and Soil Test</td>
<td></td>
<td></td>
<td>42/42</td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Chapter 7 – Weathering and Soil</th>
<th>Point earned per assignment/Total Points</th>
<th>Overall Grade</th>
</tr>
</thead>
<tbody>
<tr>
<td>Total Points</td>
<td>96/96</td>
<td></td>
</tr>
</tbody>
</table>

**Conclusion Questions:**

1. What is most affecting your grade? Positive or negative.

2. How many missing assignments do you have and what effect is it having on your grade?

3. What do I need to do to improve my overall grade?
APPENDIX G

PARENT ELECTRONIC PROGRESS REPORT
Chapter 4 - Rocks 1 *

<table>
<thead>
<tr>
<th>Assignment</th>
<th>Assigned</th>
<th>Due</th>
<th>Points Possible</th>
<th>Points Earned</th>
<th>Note</th>
</tr>
</thead>
<tbody>
<tr>
<td>Rocks Vocabulary</td>
<td>Nov-1</td>
<td>Nov-5</td>
<td>8</td>
<td>5.6</td>
<td>Late</td>
</tr>
<tr>
<td>Rock Cycle Activity</td>
<td>Nov-5</td>
<td>Nov-7</td>
<td>12</td>
<td>12</td>
<td></td>
</tr>
<tr>
<td>Igneous Rock Clues Activity</td>
<td>Nov-8</td>
<td>Nov-13</td>
<td>10</td>
<td>9</td>
<td></td>
</tr>
<tr>
<td>Igneous Rock Worksheet</td>
<td>Nov-8</td>
<td>Nov-13</td>
<td>8</td>
<td>8</td>
<td></td>
</tr>
<tr>
<td>Identifying Metamorphic Rocks Lab</td>
<td>Nov-13</td>
<td>Nov-15</td>
<td>10</td>
<td>9</td>
<td></td>
</tr>
<tr>
<td>Metamorphic Rocks Worksheet</td>
<td>Nov-13</td>
<td>Nov-15</td>
<td>7</td>
<td>7</td>
<td></td>
</tr>
<tr>
<td>Sedimentary Rocks Lab</td>
<td>Nov-15</td>
<td>Nov-19</td>
<td>10</td>
<td>Msg</td>
<td>(Missing)</td>
</tr>
<tr>
<td>Sedimentary Rocks Worksheet</td>
<td>Nov-15</td>
<td>Nov-19</td>
<td>8</td>
<td>Msg</td>
<td>(Missing)</td>
</tr>
<tr>
<td>Rocks Test</td>
<td>Nov-19</td>
<td>Nov-19</td>
<td>57</td>
<td>46</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Average</td>
<td>74.31</td>
<td></td>
</tr>
</tbody>
</table>

Parent
Signature ________________________________ Date __________
APPENDIX H

TEACHER SURVEY QUESTIONNAIRE RESULTS
### Table 4

**Teacher Survey Questionnaire Responses (N = 10)**

<table>
<thead>
<tr>
<th>Item</th>
<th>Question</th>
<th>Rating</th>
<th>Very Rarely 1</th>
<th>Rarely 2</th>
<th>Often 3</th>
<th>Very Often 4</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Students complete my homework assignments on time. Why or why not?</td>
<td>N</td>
<td>0</td>
<td>1</td>
<td>7</td>
<td>2</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Percentage</td>
<td>0.0%</td>
<td>10.0%</td>
<td>70.0%</td>
<td>20.0%</td>
</tr>
<tr>
<td>2</td>
<td>Students can benefit from a visual image, such as a graph, that tell them what their current grade is.</td>
<td>N</td>
<td>0</td>
<td>3</td>
<td>5</td>
<td>2</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Percentage</td>
<td>0.0%</td>
<td>30.0%</td>
<td>50.0%</td>
<td>20.0%</td>
</tr>
<tr>
<td>3</td>
<td>If students don't get an assignment done in class, they finish it at home.</td>
<td>N</td>
<td>0</td>
<td>2</td>
<td>7</td>
<td>3</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Percentage</td>
<td>0.0%</td>
<td>20.0%</td>
<td>70.0%</td>
<td>30.0%</td>
</tr>
<tr>
<td>4</td>
<td>I believe students view homework as a necessary tool for student learning.</td>
<td>N</td>
<td>2</td>
<td>2</td>
<td>4</td>
<td>2</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Percentage</td>
<td>20.0%</td>
<td>20.0%</td>
<td>40.0%</td>
<td>20.0%</td>
</tr>
<tr>
<td>5</td>
<td>Homework for other classes gets priority over homework in the classes I teach.</td>
<td>N</td>
<td>0</td>
<td>4</td>
<td>4</td>
<td>2</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Percentage</td>
<td>0.0%</td>
<td>40.0%</td>
<td>40.0%</td>
<td>20.0%</td>
</tr>
<tr>
<td>6</td>
<td>Students do not know what their current overall grade is.</td>
<td>N</td>
<td>2</td>
<td>4</td>
<td>2</td>
<td>0</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Percentage</td>
<td>20.0%</td>
<td>40.0%</td>
<td>20.0%</td>
<td>0.0%</td>
</tr>
<tr>
<td>7</td>
<td>Students realize how not turning in an assignment will affect their overall grade.</td>
<td>N</td>
<td>0</td>
<td>5</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Percentage</td>
<td>0.0%</td>
<td>50.0%</td>
<td>20.0%</td>
<td>30.0%</td>
</tr>
<tr>
<td>8</td>
<td>Students will benefit from completing a chart that reflects their grades on homework assignments.</td>
<td>N</td>
<td>0</td>
<td>2</td>
<td>2</td>
<td>6</td>
</tr>
<tr>
<td></td>
<td>Why or why not?</td>
<td>Percentage</td>
<td>0.0%</td>
<td>20.0%</td>
<td>20.0%</td>
<td>60.0%</td>
</tr>
<tr>
<td>9</td>
<td>Students do not understand the instructions or what to do on homework assignments.</td>
<td>N</td>
<td>5</td>
<td>4</td>
<td>1</td>
<td>0</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Percentage</td>
<td>50.0%</td>
<td>40.0%</td>
<td>10.0%</td>
<td>0.0%</td>
</tr>
<tr>
<td>10</td>
<td>Students check GradeSpeed often to see what their current grades are.</td>
<td>N</td>
<td>0</td>
<td>2</td>
<td>6</td>
<td>2</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Percentage</td>
<td>0.0%</td>
<td>20.0%</td>
<td>60.0%</td>
<td>20.0%</td>
</tr>
<tr>
<td>11</td>
<td>Other interests (sports, video games, television, etc.) get priority over homework.</td>
<td>N</td>
<td>0</td>
<td>3</td>
<td>2</td>
<td>6</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Percentage</td>
<td>0.0%</td>
<td>30.0%</td>
<td>20.0%</td>
<td>60.0%</td>
</tr>
<tr>
<td>12</td>
<td>Parent involvement is important to the success of student achievement.</td>
<td>N</td>
<td>0</td>
<td>1</td>
<td>7</td>
<td>2</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Percentage</td>
<td>0.0%</td>
<td>10.0%</td>
<td>70.0%</td>
<td>20.0%</td>
</tr>
</tbody>
</table>