

The Inherent Desire to Learn: Intrinsically Motivating First Grade Students

by Lara Hansen

Lara Hansen teaches in an elementary school in Arcadia, California, U.S.A.

Introduction

It was a simple question, innocently asked by one of my first grade students that served as the inspiration and motivation for this study. My class was preparing to begin a project for a math unit. After I explained and discussed the directions, guidelines, and expectations for this project, Kate raised her hand and asked, "What do we get when we are done?" Acting confused (in reality I was not-- I knew exactly what she meant) I asked her to explain the meaning behind her question. Quite matter-of-factly she went on to make clear that she was simply curious as to whether or not the class would be rewarded for doing this particular activity. Although innocent, Kate's question immediately burdened me with feelings of inadequacy. If my students felt they needed to be bribed with rewards to complete required class work, then I clearly lacked the skills required to motivate them.

It was this event that spurred my attempt to figure out how to intrinsically motivate my students. I was determined that, if I could find this information, I would commit myself to applying whatever strategies or techniques were recommended in order to create an environment where my students could write, read, create, solve, question, and grow -- all for the love of learning.

The Conception of My Action Research Study

Personal Contexts

Intrinsic Motivation has a number of definitions. Kohn (1993) defined intrinsic motivation as "enjoying what one does for its own sake" (p.68). Intrinsically motivated people tend to "pursue optimal challenges, display greater innovativeness, and . . . perform better under challenging conditions" (Lashaway-Bokina, 2000, p.6). When people are intrinsically motivated they feel interest and enjoyment in what they are doing. They also feel a sense of capability and determination. What they don't feel is tension, stress, and anxiety (Deci, 1985).

Extrinsic Motivation is the antithesis of intrinsic motivation. Extrinsic motivation is when learning or behavior is manipulated by an outside or tangible factor. Examples of extrinsic motivators are: stickers, candy, praise, and grades. Essentially, extrinsic motivation is synonymous with external rewards.

In my classroom I have seen students who lack the motivation to learn. They scowl at work. They are reluctant to participate. They complain when work goes home and when it does they do not do it. The tragedy in all of this is they are only first graders. I feel a great responsibility to

help build a foundation for these children where good attitudes, positive behavior, and effective habits are established. This foundation will hopefully provide for my students the beginning of a successful education where they are learning for the intrinsic value of what they are mastering and not for the external reward.

I came to this study with plenty of assumptions. It seemed reasonable to me to presume that teachers would want to cultivate in their students the tendency to love learning regardless of any external expectations, rewards, or consequences. Although it is sometimes much easier to offer a tangible incentive to acquire immediate results from students, I believed extrinsic rewards did nothing more than this. It is well known that the instant gratification of receiving a reward does not pay off in the long run, as it smothers a child's inner motivation. Knowing this, I set out to find how to foster in a child an internalized love for learning.

Review of the Literature

There was a common theme threaded through much of the existing research on motivation. This, put simply, was that reliance on extrinsic rewards does not enhance intrinsic motivation; in fact, it does the opposite-- it decreases it. For example, Deci and Ryan (1985) showed, "that whenever rewards are experienced . . . they will adversely affect children's intrinsic motivation for learning" (p.248). Holt added, "we destroy the . . . love of learning . . . in children by encouraging and compelling them to work for petty and contemptible rewards . . ." (as cited in Deci & Ryan, 1985, p.247).

After learning that extrinsic rewards did in no way encourage intrinsic motivation, I looked for techniques by which I could help my students develop an intrinsic motivation to learn. I found that there were three common factors, repeated throughout the literature, that were thought to promote intrinsic motivation. The first was teacher enthusiasm. Patrick, Hisley, Kempler, and College suggested that, "enthusiasm may act somehow as a spark to reignite the flame of curiosity and interest for students, giving their intrinsic motivation a jump start. . . ." (2000, p.219). In support of teacher enthusiasm, Cordova and Lepper (1996) said, "presenting learning activities, even those involving abstract operations, in meaningful contexts of some inherent appeal to children should have significant beneficial effects of children's intrinsic motivation and learning" (p.715). Wlodkowski and Jaynes asserted that enthusiastic teachers "can inspire students who are looking for adults whose beliefs and approach to their vocation say, without words, that these truly are important things to learn" (1986, p.28).

The second common factor in helping students become intrinsically involved was allowing for student choice. Kohn (1993) wrote, "deprive children of self-determination and you deprive them of motivation" (p.221). Swanson (1995) agreed with Kohn when he stated, "the . . . classroom must be structured so that the students become ultimately, and as quickly as possible, capable of making good . . . decisions on their own" (p.49). When students are given choice, they are given control over their learning. Regarding the correlation between motivation and choice, Dev (1997) said, "teachers can enhance the intrinsic motivation of their students by allowing the students to feel that they are in control of their own learning" (p.27).

The final suggested strategy for promoting intrinsic motivation was cooperative learning. Kohn (1993) made the argument that "anyone thinking about learning and motivation . . . must attend to the relationships among students in the classroom and consider the importance of collaboration" (p.215). Deci (1985) pointed out that "because competition has been shown to decrease intrinsic motivation and dampen creativity, competitive learning settings are interpreted as less intrinsically motivating and cooperative learning settings as more intrinsically motivating" (p.257-8).

Once I knew what promoted intrinsic motivation, I wanted to know what characteristics to look for that would indicate inherently motivated students. I discovered many behaviors, ranging from speed and accuracy of an assigned task to an increased attention span. Dev (1997) claimed, "a student is said to be [intrinsically] motivated when he or she chooses to spend time on an activity until it is completed, selects an activity purely for the sake of learning more about the related concepts, and experiences a rise in self-esteem on completion of that activity or mastery of a skill" (p.25). In a recent Texas study, college interns were sent into elementary school classrooms to observe and identify characteristics of intrinsically motivated students. These interns found, among many qualities, these to be the most common: a desire to work independently, an ability to take risks, enthusiasm, speed, accuracy, a love for challenging material, and no need to seek out praise (Lashaway-Bokina, 2000).

My Research Question

The questions driving this research paper could be summed up as the following: Can I increase the intrinsic motivation of my first grade students through three suggested teaching approaches? In addition to this question, I wanted to know which of the three approaches-- teacher enthusiasm, student choice, or cooperative learning-- was the most effective at intrinsically motivating my students. I used a qualitative approach because I felt it would be the most conducive to exploring and finding an answer to my question.

The Design of the Study

Participants

The participants selected for this study were my 20 first grade students. The ethnic backgrounds included Asian, Hispanic, White, Turkish, and Indian. Of my 20 students, 17 were bilingual. In addition to English, several other languages were represented, including Chinese, Korean, Thai, Spanish, Turkish, and Arabic. Four students attended a 30-minute ELD (English Language Development) class four days a week. There were six students who attended "Chinese School" for three hours each day after leaving my class. Two students came from a low socioeconomic background and three were living in single parent households. With the exception of a few, the students in this class were performing at or above grade level.

Setting

The study took place in my classroom at Mountain View Elementary School (all proper names are pseudonyms), which is located in a suburban city in the southwest of the United States, over

a period of two months. Mountain View Elementary is a multi-cultural school, which draws a large immigrant population (71% Asian, 22% White, 6% Hispanic, and 1% Other). At the time of this study the student enrollment was 577 (K-5).

Activities for the Participants

I carried out my study in three curricular areas, using a different motivating strategy in each. I implemented enthusiasm in our writing. I used the method of student choice in math. Cooperative learning occurred during reading.

Enthusiasm

I began our thirty-minute writing time with a mini-lesson, for the purpose of modeling proper writing habits and conventions for my students. To model enthusiasm, it was suggested that I do the following: dramatize what I know, be emotional about what I teach, show interest in anything that I teach, be an expert at what I teach, and be a "fan" of what I teach (Wlodkowski, 1986, 46). For nonverbal actions, it was recommended that I use variation in pace, volume, and intonation; open my eyes wide; use demonstrative gesturing and large body movements; show facial emotion; and create in myself a high level of energy (Patrick et al.). I incorporated these techniques into my writing lessons throughout the course of this study. For example, if I wrote about something that was exciting, my face would light up and my vocal intonation would increase. The students were given 15-20 minutes to write on their own following my mini-lessons.

Student Choice

The study done in math began when our class started a new unit-- addition and subtraction. I began the unit by explaining to my class that they were going to have the opportunity to decide how they wanted me to teach them the principle of addition and subtraction. The students then proceeded to state their ideas, which included learning with computers, math games, money, studying with our third grade reading buddies, and also through stories. I was systematic in implementing each idea throughout this particular unit. On the computer each student created an addition representation using pictures and numbers. Pennies were used as manipulatives to help the students add and subtract. In addition to pennies, we practiced counting by fives and tens with nickels and dimes. Also, our reading buddies helped the students with their math facts using flashcards.

Cooperative Learning

In my class, 40 minutes each day was dedicated to guided reading. During this time the students read grade level material, either as a whole group, in small groups, or individually. We also spent 30 minutes doing Self-Selected Reading (SSR). I began this time by reading a story to my class and then turned over the remaining time to the students to read any grade level material of their choosing.

As I thought of ways to incorporate cooperative learning into our guided reading, I was reminded of Brophy's (1987) suggestion to ". . . permit students to work together in pairs or small groups to tutor one another, discuss issues . . . or to work as a team . . . participating in a simulation game, or producing some group project" (p.46). A great deal of time had to be given to explaining, discussing, teaching, and modeling how cooperative learning was to be carried out in our two reading blocks. During SSR, my students were given the chance to read with a partner or in groups. They were encouraged to help each other with difficult words and tell one another about the books they were reading. I had three students who struggled severely with reading, so I put them in a group and asked another student to help these students with high frequency word flashcards.

I used an assortment of cooperative learning activities in our guided reading block. The students participated in an activity called "Play School Groups." In groups of four, the students literally played school. One student was assigned to be the teacher and his or her job was to help the remaining three students read the story we were working on during the week. In another activity, commonly referred to as a "jigsaw" technique, the students were put in groups of four and each student was given the task of teaching the other students a specific reading strategy. When the students weren't participating in an organized cooperative learning activity, they were simply encouraged to constantly give help to others.

Gathering the Data

I gathered my data in ways that I thought would best validate and contribute to the reliability of my study. I did a considerable amount of observing. I observed my students before I began my study and noted all the characteristics and signs I thought reflected a non-motivated student. I also observed my students throughout the study as I watched for and recorded the changes and evident traits of a motivated student.

I asked two other first grade teachers to test one of the motivational strategies in their classes. I asked for their thoughts, opinions, and personal observations regarding the particular strategy they used. During our student-led conferences, I interviewed my students' parents. In addition to asking for the opinions of teachers and parents, I collected samples of student writing before and then after my study in order to identify any that reflected progress and improvement.

My Findings and Interpretations

Findings from Enthusiasm

Of the three strategies I employed for this study, enthusiasm was, in my opinion, the least effective. It was unfortunate that I used this in our writing block, as this was the area in which I felt my students were the least motivated. This is not to say that I did not see results, but they were not as apparent as in relation to the other two strategies. Looking back to the notes I made before the initiation of this study, I observed frustration, boredom, and discouragement in my students as they attempted the task of writing. During our writing time they were reluctant to put forth effort, afraid to try, and hesitant to make and learn from their mistakes. They lacked confidence and independence.

In each writing lesson I delivered with enthusiasm I noticed my students mirroring whatever I did. When my eyes got big, their eyes got big; when I smiled, they smiled. I noticed two girls in particular who would move their mouths in imitation of mine. To me this was evidence that they were interested in what I was saying, and, furthermore, they were actively paying attention.

There were other behaviors I found that indicated motivation. I began noticing my students becoming slightly more independent in their individual writing. There were fewer requests to spell words; fewer students claiming they could think of nothing to write about; and a decline in seeking my praise and approval. I found various students asking for more time to complete the writing assignment before them. As I read and studied my students' writing, I saw them using word choices and expressions that enhanced the tone in their writing. I saw many students making progress in the amount they wrote as well. I was especially pleased with three students who, before this study, would struggle to write one complete sentence in the entire writing time. In a matter of a month these children were making significant progress (see Appendix C for writing samples).

Although my enthusiasm was contagious and certainly produced a fair amount of excitement, laughter, and noise, this was precisely what I was not prepared for. I was certainly glad to see my students become energized over writing, but I found it difficult to get them settled down enough so they could put pencil to paper and produce a piece of writing. After my writing lessons there was valuable time being wasted, as my students were incessantly talking and laughing. I found it difficult to get my students to channel all of this excited energy into writing, which was precisely my ultimate goal.

Findings from Student Choice

Never before had I thought to ask my students how they wanted me to teach them. And I didn't think first graders were capable of making such choices. I was the teacher, so I decided how to teach my students. I went into this study not knowing what to expect. My students' reactions to my question "How would you like me to teach you addition and subtraction?" was the first clue that the results of this were going to be positive. My students had excellent answers to this question. In disbelief, one student asked if I was kidding. Indeed I was not.

The reasons for choosing math for part of this study were plentiful. Prior to embarking on this study, I had observed that my students' attention spans shrank during our math time. I noticed heads on desks, pointing to a lack of desire. I watched as students failed to listen or pay attention, and then inquired about when math was going to be over. I had two students at two separate times come and tell me that they didn't feel like doing math. For those who found ease and simplicity in math, boredom was evident. For those who found difficulty and complexity, frustration was obvious. Although I am sure all teachers deal with similar behaviors, I knew I had to do something to stimulate these students. This study seemed like an ideal avenue.

For my students, there was a sense of fascination in choosing how they wanted to be taught. They were amused at my commitment to use their ideas as I taught math. I first began noticing a change in my students' attitudes. Their attention spans grew and the complaints ceased. Two days after the initiation of this study, a student asked anxiously when math was going to start--

something unheard of before they were given the opportunity to choose how to learn. It was apparent that these students were more apt to engage themselves in learning when they were in control of *how* they were learning.

Throughout the month, my students became more autonomous and I didn't have to constantly hover over them to ensure they were on task. I began hearing students ask if they could work on their own and at their own speed instead of having me pace them as we worked as a whole group.

Probably the most defining moment in this study was the day my principal came in to observe me do a math lesson. After school we discussed what had gone well and what had not gone well during this lesson. As he was reflecting upon his observations he told me that my students seemed to be really motivated. His comment offered validation to the truth that, when given the opportunity to make choices in their learning, my students could indeed be motivated for the intrinsic value of what they had chosen to work at.

Findings from Cooperative Learning

Before introducing cooperative learning into our reading blocks, I took note of the behaviors that concerned me and that reflected a lack of motivation. After going over these notes I realized there were seven students in particular who were having a great deal of difficulty. These seven varied in reading ability-- two were my lowest readers and one was my top reader. I found these students to be disruptive to others and, in discreet ways, doing anything to distract themselves from their reading. They turned pages quickly and switched books often, obviously not reading for content, comprehension, or enjoyment. These students were the first to express relief once a particular reading block was over. One might think these behaviors stemmed from books at an inappropriate reading level, or that the inability to read was turning them off from books and the task of reading. I certainly considered these to be possible reasons for the improper behaviors, but was not convinced. These students could all read-- some better than others, but they could all read. Furthermore, during our two reading blocks, a variety of books were available representing diversity in level, genre, and subject. I sincerely felt these students were simply bereft of motivation.

I also perceived an air of competition in my class. My students were hesitant to help each other. They seemed to constantly look out only for themselves. I observed students laughing at their peers as wrong answers were delivered or words were stumbled over. I found that my students would not think to ask a friend for help in pronouncing, sounding out, or reading a word correctly. Research, wisdom, and experience has taught me that not only are students capable of helping one another, but that they should also feel an obligation to take on this responsibility. Needless to say, I anticipated the onset of this study with hope of seeing improvement.

Before beginning this study, our Self-Selected Reading block was a time when my students read by themselves and to themselves. Once I changed this time into a cooperative effort, the results were apparent. Although it seemed too good to be true, the outcomes were immediate. I was thrilled to witness my 20 first grade students happily reading in groups of two, three, and four. I was amazed a few days into the study when, for the first time during SSR, I looked at the clock

and realized we had gone over time. What at first had seemed like a chore, was now an activity where the students were involved, engaged, and motivated.

Eventually, this reading block became a time eagerly anticipated by my students. They were genuinely disappointed when the time was up. They were seeing their peers as a valuable source of help, rather than as an opportunity for competition. I paid the closest attention to the seven students I mentioned earlier. Their progress brought me the greatest awareness of success, as they were no longer disrupting and distracting others, but rather reading contentedly and successfully. I realized I had executed a strategy that for these particular students was essential in facilitating their motivation to read.

I found in the beginning how inexperienced my students were with the task of working as a team. I supposed the reason for this could be attributed to their young age. However, I soon realized that their age was not really a limitation on their ability to work collaboratively. They could do it and they would do it; they merely needed to be taught how.

At the beginning of this study my students were quite abrasive with each other as they began working cooperatively. I heard conceit in the tone of their voices. I witnessed eyes being rolled in disgust. And I saw shoulders slump with humiliation. At this point I knew I had not taught and modeled thoroughly enough, which led me to scramble in an effort to make up for this deficiency. I should have spent more time stressing appropriate behaviors, reactions, and feedback. I determined that I should have built a more stable foundation that addressed the issues of constructive criticism, consideration for the feelings of others, and the value of praise.

There was one particular method I used in a variety of ways that was the most successful in motivating my students-- the student acting as the teacher. The benefits were clear when the students played the role of "teacher" to their peers. I found my students took on this responsibility with interest and eagerness. This was the cooperative strategy that was requested the most by my students. These activities revealed various signs of intrinsic motivation-- enthusiasm, a high attention span, persistence, and a rise in self-esteem.

Insights from Parent Interviews

I felt it necessary to find out if my students were able to go home and still be motivated in the areas of reading, writing, and math. I talked to the parents of the students I felt had improved the most during the course of this study. These interviews not only provided the answer to my question, but also verified what I was seeing in my classroom-- an increase in intrinsic motivation.

I learned that the motivation these students were experiencing in the classroom was carried over to home as well. One parent noticed her child becoming extremely curious about math, as he was constantly asking questions and creating opportunities to practice what he was learning at school. Another parent explained to me that at the beginning of the year her daughter had experienced frustration in writing. However, she confirmed that of late her daughter had been less discouraged and was developing an eagerness to write. One student who struggled in all three areas had been going home anxious to do her homework and daily reading.

It seemed natural that, as these students were finding interest, success, and enthusiasm in learning, they would indeed bring these feelings to environments outside of our classroom. I regret talking to these parents only about behavioral changes they had noticed in their children. I believe my perspective would have been broader and clearer had I discussed other topics with them, such as how they motivated their children in non-academic areas and also whether or not they rewarded their children for work done at school.

Insights from Similar Studies

As I neared the end of my study, I asked two of my colleagues, both first grade teachers, if they would carry out a similar, yet informal, study with their classes. I asked one to use cooperative learning and the other to use student choice. I encouraged them to integrate each method in the same manner I had.

After discussing the observations and results with these two teachers, I was pleased to learn their findings were in line with mine. Both teachers found their students to be more focused and able to stay on a particular task for a greater length of time. They also felt their students were better in tune with what was being taught and what was to be learned. This offered support and validation that cooperative learning and providing students choice in their learning, along with teacher enthusiasm, increases intrinsic motivation.

Discussion of the Results

The effectiveness of the three strategies prominent in the literature was clearly demonstrated in my study. However, the three strategies were not equally successful. I felt that cooperative learning was the most effective, and teacher enthusiasm the least. Throughout the study there was an ever-growing amount of teamwork, excitement, independence, focus, and motivation. Every child benefited from and responded to this study, although some more than others. In addition to my class, parents, teachers, and other first grade students confirmed the soundness of applying these particular approaches.

Being motivated intrinsically is the ideal. It means we are working toward something that we recognize to be inherently beneficial; something that will broaden our perspectives, strengthen our character, and enhance our work ethic. As a teacher, I want more than anything to see my students motivated to learn for the intrinsic value of what they are learning. Intrinsic motivation is not something that can be taught. It is something that is developed. "Student motivation to learn is an acquired competence developed through general experience but stimulated most directly through modeling, communication of expectations, and direct instruction . . ." (Brophy, 1987, p. 40).

My first grade students verified the accuracy of this statement as they went from being distracted and unfocused to being autonomous, enthusiastic, and overall better students. What concerns me at this point is making sure this motivation is constantly nurtured. While these students are in my class, I can monitor this; but I worry about what will happen as they move on through each grade. Unfortunately, there is no assurance that they will continue to grow and develop as

motivated students unless their teachers are aware of, and committed to, implementing the strategies and techniques that influence intrinsic motivation.

What I Have Learned About My Teaching

During this study my heart and mind were wrapped up in making this the most effective endeavor I was capable of producing. I carefully prepared, planned, and observed every day for the duration of this project. At the close of the study as I stopped the faithful journal writing and monitoring and shifted my energy to producing this paper, I noticed something disheartening and disappointing. I saw myself slipping back into old habits where cooperative learning, student choice, and teacher enthusiasm were not as prevalent as they once had been. This leads me to conclude that, albeit challenging, it is necessary and crucial to recommit myself every day to putting into practice the strategies and methods that will enhance my students' innate desire to learn.

I also realized that, before I began this study, I was a rather directive teacher. I made all the decisions and expected my students to comply without complaint. To ask my students to decide how they wanted to learn addition and subtraction was completely out of my comfort zone. It was uncomfortable for me, but the results of doing so made me stand back and re-evaluate the limitations of teaching when one remains within the boundaries of one's comfort zone. I think teaching without being willing to take risks leads to the probability of becoming a stale and boring teacher. And although implementing the strategies to the extent that I did was a small risk, it was a crucial step that proved to be productive and successful. I have learned that taking risks is necessary if I want to grow, improve, and master the art of teaching.

What I Have Learned About My Students

It is possible to intrinsically motivate first grade students through specific teaching methods. I have witnessed a great change in various students whom I once deemed to be unmotivated and slothful. At one time I didn't give my first grade students the credit they deserved regarding their ability to choose for themselves and work collaboratively with their peers. However, as I discovered, although they were young, they were capable. I was surprised to see that, when they were given the opportunity to make important choices, they did so with seriousness, maturity, and responsibility.

I was extremely happy to see my students teach each other and, by doing so, transform themselves into higher achieving and more motivated students. I have also come to recognize more fully that students learn and are motivated in different ways. Not every student was equally motivated by each approach I used. There was a variety of differences in their responses and reactions. Because of this, I feel it is necessary to experiment with various teaching techniques so each child has the opportunity to expand his or her inherent desire to learn.

Conclusion

As I was researching the topic of intrinsic motivation in various books and journals, I noticed a lack of details in the studies and examples relating to the primary grades and, specifically, to first

grade. I became frustrated as I continually found studies performed on college students. I found it difficult to use these as examples and models for my own study because of the significant age gap. For this reason, I tried to design a study that would be advantageous to the grade level I was teaching and would provide the answers and evidence for the questions I was researching.

However, it seemed that the results I was seeing were too good to be true, which led me to think the cause could be that I was looking too closely at details that, in other circumstances, would have been seemingly unimportant. I constantly wondered if my students were becoming better readers, writers, and mathematicians not because I was deliberately enthusiastic or allowed cooperative learning to invade the curriculum, but because their brains were developmentally ready to progress. In other words, I struggled with giving the credit of increased motivation and growth to my study. I learned that my students' minds were developing, and this would have happened with or without the implementation of these three strategies. However, I felt my study proved that, by enhancing and elevating each student's intrinsic motivation, a greater amount of success, growth, excitement, and progress could result.

I never tired of this topic because it forced me to master an important aspect of teaching. I learned a tremendous amount, which had a positive and direct impact on my students. I was in constant communication with my colleagues, who were not only appreciative to hear of my findings, but had questions and insights that challenged me to think further on the issue of intrinsic motivation. I can foresee the success I can achieve as a teacher if I continue to research, question, design, and implement studies for the purposes of refinement and excellence.

The end of this project will not be an end to my quest to find ways of increasing the intrinsic motivation of my students. I will continue to read through the literature I have accumulated, all the while experimenting with different teaching methods. I can only anticipate that doing this will make me a wiser and more skillful professional.

Intrinsic motivation is not exclusive to the teaching profession. I believe it is a quality that, when developed, will help eliminate greed, selfishness, and disappointment-- something worth being passed down through generations. Perhaps doing this will prevent students like Kate from expecting a tangible prize or token for completing a task. Hopefully they will know the prize or token is something that will be found within their hearts, minds, and souls-- something that can be defined as an innate eagerness and yearning to learn.

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