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Improving Critical Thinking Skills in History

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April 10, 2008

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Abstract

The purpose of this action research project was to investigate approaches and techniques that would improve critical thinking skills in history classes at the secondary level. Students demonstrated apathy and boredom in history classes where the emphasis was on rote memorization and the regurgitation of accepted facts and conclusions. The problem was to determine which teaching and learning strategies, techniques, and methods were the most effective in improving critical thinking skills in history. The research methodology consisted in a comparison of the inquiry or interactive method of teaching history with the lecture method. Two groups of high school students were chosen. One group was taught history using the lecture method. The other group was taught using the inquiry method. The criteria were whether students were able to analyze, evaluate, conceptualize, and synthesize information, not just whether they could memorize facts. A comparison of student performances on tests, essays, quizzes, and assignments was used for assessment, evaluation, and comparison. The inquiry strategies included role playing, simulations, re-enactments, examining and analyzing multiple texts, studying oral and visual presentations, analyzing bias by examining different viewpoints and perspectives, and analyzing documents and original and primary sources. The research results demonstrated that when critical thinking skills were emphasized under the inquiry method, students achieved higher scores on tests, quizzes, and assignments and gained a deeper and more meaningful understanding of history. The research results showed that the inquiry method improved critical thinking skills based on the comparison of test and quiz score grades but yielded results when critical thinking skills were integrated with content matter and when students were motivated and engaged and possessed an attitude that placed value on critical and higher order thinking. Finally, the lecture method was more effective in presenting the background and introduction to a topic or issue than the inquiry method was. In conclusion, critical thinking skills were shown to be effective in achieving a more in-depth and meaningful understanding of history by high school students, but relied on the integration of the critical thinking skills with subject content and on student motivation. Educators need to incorporate strategies that emphasize critical thinking skills in order to improve the understanding of history, but the strategies must be integrated with the content matter. Student attitude and motivation must also be stressed.

Improving Critical Thinking Skills in History

Introduction to Project and Topic Question

The research problem that was investigated was how critical thinking skills could be encouraged in teaching history at the secondary level. The issue is important because students show apathy and boredom with history. History is considered worthless and useless because all you do is memorize accepted, dry, and dead “facts”. Researchers have found that in teaching history the critical component is missing in the traditional lecture presentation or “transmission” approach (Foster & Padgett, 1999). There is no “enduring understanding”, no analytical or critical reflection or evaluation and long-term synthesis (Foster & Padgett, 1999; Goodlad, 1984; Loewen, 1995; Schug, Todd, & Beery, 1984; Schug, Todd, & Beery, 1984; Shaughnessy & Haladyna, 1985; Shaver, Davis, & Helburn, 1979). Foster and Padgett emphasized that “authentic historical inquiry”, which focuses on critical thinking skills, is needed to counter the transmission mode and rote-memorization approach in teaching history (Foster & Padgett, 1999).

The focus question of my action research was: How do you create a more critical approach to history? What teaching strategies and methods will increase or improve the critical thinking skills of students? Critical thought is a central focus of the Michigan Department of Education benchmarks and standards for Social Studies. The critical thinking benchmark for history is as follows:

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“Strand I. Historical Perspective

Standard I.3 Analyzing and Interpreting the Past.

All students will reconstruct the past by comparing interpretations written by others from a variety of perspectives and creating narratives from evidence. History is not a succession of facts marching to a settled conclusion. Written history is a human construction and conclusions about the past are tentative and arguable. Documents, eyewitness accounts, letters, diaries, artifacts, photos, historical sites, and other fragments of the past are subject to analysis and interpretation. Credible reconstruction of the past draws upon a variety of records and compares interpretations that reveal more than one perspective on events. One can engage in “doing history” by assessing historical narratives written by others or by creating a narrative from evidence that has been compiled, analyzed, and interpreted.”

My plan for the action research project consisted of designing a research project to answer this question: How do you motivate students in history classes at an alternative education high school and regular education high school to perform better on tests and to

engender greater enthusiasm for the study of history? The problem in alternative education, as is true in regular education schools as well, but to a lesser extent, is that students are apathetic and show disinterest in history? How do you motivate students? What techniques or strategies work to motivate students?

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Review of Literature and Theory

The research on improving critical thinking skills and student engagement and involvement has suggested various strategies and techniques that have been successful in other settings. Mark Otten, et al., in “Performing History” from 2004, found that dramatizations of historical events contributed to creating greater enthusiasm and greater involvement in history (Otten, Stigler, Woodward, & Staley, 2004). Elise Calabresi, in “A Plan for Enhancing Student Achievement in an Eleventh Grade Large Classroom American History Course through a Multicultural Curriculum”, a practicum from 1993 presented as a paper at Nova University, was able to stimulate enthusiasm and higher academic achievement in an ethnically diverse course by focusing on the economic, gender, ethnic, racial, make-up of the classroom and relating them to the issues taught in the course (Calabresi, 1993). Topics in history were chosen because they related to the characteristics of the classroom. For example, the classroom was majority Hispanic, so the lessons were tailored to have relevance and meaning for Hispanic students and minorities. The lessons were made relevant and topical by having students make oral

presentations and discuss current events as they related to them. The program was successful. An important element of getting students to connect or identify with a historical event or issue is by making it relevant and personal to them. In this way there is engagement and connectedness to the issue. This is effective strategy in reducing apathy

and boredom and lack of interest.

In “Improving the critical thinking skills of ninth grade world history students by integrating critical thinking skills and course content”, Henry Milton found that student critical thinking skills could be improved when the skills were applied and implemented in a ninth grade world history class (Milton, 1993). The students in the class examined and studied eight different historical issues or themes. Each issue had an accompanying critical thinking skill that was used to resolve the issue. The focus was on eight critical thinking skills. Students identified the frame of reference, determining the viewpoint or perspective. The critical or crucial elements inherent in an issue were determined. Students distinguished between the factual or evidentiary and speculative bases for conclusions. Students identified the main concepts or ideas presented. The consequences and implications or ramifications of the issues were analyzed. Assumptions were identified. Students distinguished between valid or “justified” inferences and those that were “faulty” or invalid. Finally, the students synthesized the content and concepts that were examined. Students applied the skills assembled in small groups or working

independently. Assessment was made based on written and oral assignments and exercises. Based on the analysis of test results, Milton concluded that students had “progressed from intellectually functioning at the more basic levels of Bloom's taxonomy to the more advanced levels” (Milton, 1993). Benjamin Bloom’s hierarchy progressed

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from knowledge, comprehension, application, analysis, synthesis to evaluation. Milton also found that critical thinking skills were mastered more effectively when they were taught concurrently with the subject matter of the course rather than separately.

A strategy used to improve critical thinking skills was the use of multiple texts which allowed students to see different viewpoints and perspectives on historical issues and problems (Hynd, 1999; Rothman, 1987; Stahl, Hynd, Britton, McNish, & Bosquet, 1996). When high school students were presented multiple texts and documents on the Tonkin Gulf Incident, the strategy was found to be of limited value because it was found that students do not benefit from multiple texts or viewpoints unless “some specific instruction in integrating information” is given by the teacher (Stahl, Hynd, Britton, McNich, & Bosquet, 1996). Using multiple texts has resulted in an overall improvement in student critical thinking skills and in their level of intellectual sophistication (Shanahan, 2003).

The use of position or research papers was found to improve higher-level thinking skills (Mitchell, 1993). Students increased their mastery of critical thinking skills when

they were required to write research papers on historical issues. Critical thinking skills were also increased when there was a cooperative learning format that used the jigsaw approach, when there were structured research experiences, and when there was student role playing and game situations (Mitchell, 1993).

Critical viewing skills were emphasized in order to counteract the manipulation and

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distortion of the media (Payne, 1993). Students need to be taught media literacy if they are to develop critical thinking skills in the classroom. Students need to make distinctions between entertainment and media spin and information. Media images and sound-bites present a distorted and manipulated view. Students need to understand that reality is complex and not black and white, not Manichean, and that ambiguity is present in all complex phenomena (Payne, 1993; Hynd, Hubbard, & Holschuh, 2004).

Different theories and approaches on the role of history have been suggested by researchers. A postmodern approach should be adopted that regards history as inherently subjective and relative in nature, based on the particular experiences of nations, cultures, and peoples (Norman, 1996). These approaches emphasize hermeneutics, how we understand and interpret texts, epistemology, how we know what we know, phenomenology, and historiography (Kidwell, 1996). History should be taught using the constructivist approach that emphasizes why and how we study history. Critical thinking skills and the importance of individual perspectives are central in these approaches to history.

The inquiry approach has been emphasized in the teaching of social studies in order to develop and reinforce critical thinking skills (VanFossen & Shiveley, 1997). In the inquiry or “inquiry learning” approach, the first step is to define the purpose for the inquiry, the problem. Tentative answers or solutions to the problem are then postulated. The hypotheses are then tested. Tentative conclusions can then be drawn from these

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results. Finally, the conclusions can then be applied to new situations or scenarios.

Critical thinking skills are most effectively developed and learned when they are taught in conjunction or embedded with content, not in isolation (Warren, Memory, & Bolinger, 2004). Moreover, student attitudes, motivations, and dispositions are crucial in determining whether students retain, internalize, and use critical thinking skills in the future (Warren, Memory, & Bolinger, 2004). Infusion and immersion approaches were applied in analyzing the Vietnam War. In the infusion approach, students learn content in the process of solving real-world issues or problems, which is usually collaborative and promotes engaged learning that focuses on authentic tasks. In the immersion approach, an in-depth understanding of the content is emphasized over critical thinking skills, because thinking develops naturally when students are engaged in the pursuit of knowledge and does not need to be emphasized. They developed critical thinking exercises by having students break up into groups. They then were assigned readings that presented different viewpoints and perspectives on the Vietnam War. The starting point was the revelation by U.S. Senator Bob Kerrey that when he was a soldier in Vietnam in 1969, he killed

Vietnamese civilians. The conclusion was that student critical thinking skills were increased because students compared, contrasted, and evaluated different viewpoints and gain meaningful experience and understanding of how authors seek to persuade and convince. The immersion approach was seen as the most effective because it allowed students to fully understand the content of the subject matter and did not emphasize

critical thinking skills in isolation (Warren, Memory, & Bolinger, 2004).

Research on improving critical thinking skills in the teaching of history at the secondary level focuses on designing lesson plans, assignments, and activities that challenge students to evaluate different viewpoints and perspectives, to examine multiple texts in studying an issue, to rely on factual evidence and primary sources and documents, to be able to analyze deceptive and misleading arguments that distort and manipulate the issues, to develop critical viewing skills, and to be able to synthesize and conceptualize information. Group role play activities, oral history presentations, the study of primary sources and original documents, the study of multiple textbooks and textbooks from different countries, and student research projects were strategies that improved critical thinking skills.

The methodology I used consisted in designing activities and assignments that would test the strengths and weaknesses of various teaching approaches to see which induced the greatest enthusiasm and understanding of history. I designed activities that comprised group role play activities, simulations of historical events, dramatizations of history,

visual presentations of history, and oral presentations. The goal was to determine which approaches generated the greatest increase or improvement in critical thinking skills and created the most enthusiasm and engagement for history. I assessed the results by tests, student participation and interaction, and by student input. I combined a qualitative with a

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quantitative approach, making the evaluation based on hard test score results, and by the quality of the improvements, by the depth and breadth of their understanding of history. I collected data by tabulating the test score results and making statistical comparisons with test scores before the new techniques were applied. I also used questionnaires, essay questions, and surveys, to determine a qualitative improvement and to gauge their improvement in critical thinking skills and their commitment and enthusiasm.

I used the results to make future changes in the curriculum at my alternative education high school. I retained the most effective strategies and techniques and incorporated them in the lesson planning and curriculum design for the history courses I taught and in developing lesson plans for upcoming units.

Critical Thinking Skills

Critical thinking skills are essential in history because all students need to evaluate, assess, analyze, conceptualize, and judge what is presented as information or facts.

Critical thinking skills are important in a democracy where citizens need to be informed in order to make judgments and decisions. Critical thinking skills consist of fundamental

concepts of how we understand and learn and are the epitome of education (Shaughnessy, 1985). The student is able to distinguish between fact and opinion and bias from reason. The student can distinguish between primary and secondary sources, can evaluate information sources, can recognize deceptive or misleading arguments, and can recognize ethnocentrism and stereotypes. Critical thinking is “the careful and deliberate

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determination of whether to accept, reject, or suspend judgment about a claim” (Moore & Parker, 2007). Critical thinking is “the process of evaluating what other people say or write to determine whether to believe their statements.” Critical thinking consists of “assessing authenticity, accuracy, and worth of knowledge claims and arguments.”

The impetus for improving critical thinking skills gained momentum in the 1980s when many schools, districts, and states began placing a greater emphasis on critical thinking skills in teaching, curriculum design, and testing (Paul, 1984). In 1985, California 8th grade students took the first state-wide history tests which emphasized critical thinking skills. The U.S. National History Standards (1994) which were incorporated in Goals 2000 encouraged critical thinking skills, active learning, and the use of primary sources and documents. Critical thinking skills are emphasized in the Michigan standards or benchmarks for history and social studies.

Backward Design

History is a subject that has been disparaged because students merely memorize accepted truths and the accepted wisdom, without critically thinking about the subject

matter. History becomes merely memorization of dates and key “facts” (Milton, 1993).

Henry Milton analyzed the results of the "Cornell Critical Thinking Test, Level X" and a teacher-constructed questionnaire that showed that students spend more time in memorizing subject matter than they do in synthesis, evaluation, or analysis (Milton,

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1993).

The goal of education, however, is to achieve “enduring understandings”, to gain meaningful understanding of history, not just to memorize and regurgitate memorized facts. The “backward design” approach developed by Grant Wiggins and Jay McTighe emphasizes meaningful learning and understanding (Wiggins & McTighe, 2005).

Backward design begins with the end or goal of the lesson in mind. Backward design requires the teacher to begin with the end in mind, the desired results, the goals or standards, and from there designs the curriculum based on the evidence of learning, or “performances”, “called for by the standard and the teaching needed to equip students to perform.” The problem with the traditional lecture approach is that teachers merely “cover” the text and students engage in activities where there is no focus on a big picture and no plan to ensure that meaningful learning has occurred.

The backward design process consists in teachers designing lesson plans in three stages, each with a focus question. In the first stage, the teacher determines the following: What is worthy and requiring of understanding? In stage two, the question is: What is

evidence of understanding? In stage three, the teacher seeks to determine: What learning experiences and teaching promote understanding, interest, and excellence.

The issue that was researched and investigated was how critical thinking can be encouraged and developed in teaching history at the secondary level. The issue is important because students demonstrate apathy and boredom with history. History is

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considered worthless and useless because all you do is memorize accepted, dry, and dead “facts”. In teaching history, the critical component is missing. There is no “enduring understanding”.

My focus question was: How do you create a more critical approach to history? What teaching strategies and methods will increase the critical thinking skills of students?

Research Methodology

Both qualitative and quantitative approaches can be used effectively for doing action research in my history classroom at the high school level to determine effective teaching methods to increase critical thinking skills in history. I used both approaches, a mixed approach, using both qualitative and quantitative approaches. Both approaches have strengths and weaknesses.

My research question was the following: How do I most effectively teach critical thinking skills to my students in history? A corollary to the first question was: How do I motivate students to change their negative attitudes and apathy about history?

I designed an experimental action research project at my school which compared the effectiveness of two different methods of instruction. One method of instruction was to lecture using the traditional lecture format. The other method was to present the material in an interactive format, by combining an inquiry format and a discussion format, and by using group role play activities. These were the independent variables.

Students in the different hours of my history classes were exposed to either the

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lecture method of teaching or the interactive method of teaching. The conceptual knowledge of the students was then tested and the results compared between the hours that were taught by the different methods. Student learning in each hour or group was assessed or measured using an objective test. The average scores on these objective tests, which were the dependent variables, were used to measure or evaluate the effectiveness of the two teaching methodologies.

The first and second hour classes were both American History II classes that were both studying the same period in US history and using the same textbook and taking the same quizzes and tests. The lecture method was randomly chosen for the first hour class and the interactive method was chosen for the second hour class. The students in the classes had not been pre-selected in advance. I controlled for extraneous variables such as time, materials, age, gender, grade level, student ability level or aptitude, and teacher characteristics. Both classes had the same female to male ratio in the classes. Both classes consisted of 11th and 12th grade students. They were all the same age range of 16-17

years old. The classes were both in the morning at roughly the same time of the day: First Hour: 8:00-9:00 AM; Second Hour: 9:00-10:00 AM. The same textbook, *The American Nation*, was used and assignments, quizzes, and tests were administered in both classes. The ability level was comparable for both student groups. The same room was used with the same equipment and teaching materials: A Power-point presentation on the TV screen

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and computer and the use of transparencies and video clips.

The timeline for implementing the two methodologies, lecture versus interactive format, consisted of two, four week periods that would cover two units in the semester. The lecture format was followed for the first hour period while the interactive method was followed in the second hour period.

I made every attempt possible to ensure the internal validity of the research results by controlling for extraneous variables and uncontrolled variables. A systematic random assignment of students to treatment groups was not possible. The intact classes were already in place before the action research was conducted. The classes were so similar that the extraneous variables were accounted for and controlled to the best extent possible.

The third and fifth hours were also American History II classes that consisted of students from the same population pool as those in the first and second hours. The third and fifth hour classes were the comparative or control groups. The traditional straight

lecture format method of instruction was applied in the third and fifth hour classes. The lecture format was thus applied to the first, third, and fifth hour classes. The interactive teaching format was applied to the second hour class.

The action research project timeline continued over the entire semester, for approximately 12 weeks. Mid-term and final semester grades were assigned using

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the selected teaching methods.

Both qualitative and quantitative approaches were applied. One way I used qualitative research in my school for action research was to create simulations using group or team role play or role playing. I created simulations of historical settings that were based on the period we were studying. For example, in studying the Cold War, the class simulated the United Nations General Assembly. The class was divided into three groups or teams. One group represented the U.S. Another group would represent the U.S.S.R. A third group represented the other UN member nations. The class then engaged in role play activity, or a simulation of the Cold War conflict. We examined the 1949 Berlin Crisis and Berlin Airlift by having the groups act out or role play as the UN delegations from the countries they were assigned to represent.

Another interactive teaching approach that was used was to have the class discuss the role that minorities and women played in key historical events in American history, such as World War I, World War II, the Great Depression, and the Civil Rights Movement.

The students were assigned research projects that they presented to the class for discussion and debate. This assignment was successful in that the levels of student engagement, enthusiasm, participation, and interest were radically increased. There was a concomitant large improvement in critical thinking skills because students were able to personally relate to the issues and to have a deeper understanding of the underlying issues and problems involved.

Data Collection Procedures

.Data collection for the quantitative component consisted primarily of student scores on assignments, quizzes, and examinations or tests, the dependent variables. For the qualitative component, I kept a log book daily journal to assess and evaluate a separate participation, discussion, and activity score. The time frame consisted of two, four week periods where two units were covered.

I graphed the results on a bar or line graph. The x axis represented the type of instruction that was used for the lessons, lecture and interactive. The y axis was a tabulation of the student scores. I created both a line and bar graph that reflected a generalized and more individual breakdown of the results. I plotted the score of each student within each class and the average scores for the entire class. A line graph was used for a more individualized breakdown of each student score plotted on the graph. I also plotted assignment scores, quiz scores, and test scores individually, and I plotted the overall student grade in the course.

The qualitative research component consisted of observations and evaluations and assessments of student participation. I taught all the classes as an active and direct participant, so I was able to observe the degree and level of participation, motivation, interest, engagement, and critical thinking. The simulation role play format was a data collection tool and was assessed based on its effectiveness as a teaching method. The research results demonstrated that role play simulation activities and assignments gave

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students a better understanding of historical events by allowing for greater empathy and sympathy and greater internalization. Students were able to experience the events and to develop improved critical thinking skills. Ultimately, the students had a fuller understanding of the issues which was revealed in higher essay and test scores.

Test scores were compared between the classes where role playing was used with those classes where role playing did not occur, in the first, third, and fifth hours. The action research showed that students who engaged in role play gained a greater and more meaningful understanding of the subject. Their understanding was deeper and more thorough and meaningful. They learned to appreciate the complexities, uncertainties, and ambiguities inherent in all historical issues and problems.

I created rubrics that specifically measured or assessed the degree and level of student interaction and participation. I assigned students points based on the originality of their presentations, how involved they were in the debate, how critical they were of the assumptions of the textbook, how creative and independent were their presentations and

discussions, and how effectively they used critical thinking skills in resolving the issues and problems presented. I also designed essay questions which assessed the same characteristics. I then was able to obtain a qualitative assessment using these data collection procedures which allowed me to determine whether the interactive or the lecture format was more effective in increasing critical thinking skills. Based on the action research results, the interactive method of instruction was more effective in

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improving student critical thinking skills.

The research relied on test scores and student achievement and also examined changes in student attitudes about critical thinking. I prepared a questionnaire or survey that each student in all the history classes answered. I then tabulated the results to determine if student attitudes had changed. I asked the second hour class students to evaluate and assess the interactive teaching format. I asked the students in the classes where the lecture format was used to assess and to evaluate that method. I then compared the results. This occurred in the last two weeks of the eight week action research project. The results demonstrated that an overwhelming majority of the students in the interactive format class preferred that method of instruction over the lecture format. Conversely, in the lecture format classes, the majority of students were dissatisfied with the lecture format. For future practice, I designed lesson plans that incorporated interactive and role play assignments and activities. For future lessons, I retained a lecture format but added simulations and interactive activities.

Data Collection Tools

In the qualitative research portion, the research tools consisted of observations logged in a daily journal, surveys, questionnaires, interviews, videotaped presentations, and a log book.

In the role play simulations, the equipment in the classroom was used: Computers, chairs, desks, TV screens, VCR monitors, and video, audio, and TV recording equipment.

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These were all used as data collection tools.

Analysis of the Data

I tabulated the assignment, quiz, and test scores for each student in all the hours. I then computed the averages for the entire class for each hour. I compared the average of the overall assignment, quiz, and test scores for each class or hour, comparing the second hour class scores with the first hour class scores, and then compared these average class scores with those from the comparative or control group classes, the third and fifth hour classes.

I then graphed the results on a bar graph. The method of instruction, lecture versus interactive, was the independent variable on the x axis. The dependent variable, the test scores, was plotted on the y axis. I then generated a bar graph which showed which teaching method resulted in the highest average test score. This was the quantitative component of the research. Based on these results, the interactive teaching method resulted in the highest test scores.

I then analyzed the data collected, both qualitative and quantitative. After I plotted the results on the bar graph, I compared the scores of all the classes to determine whether there was a difference in the scores for the interactive format class when compared to the straight lecture classes. The difference in the test score results was large. Both average and individual student test scores were much higher when the interactive teaching format was used. Based on these results, I was encouraged to design a future

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action research plan that would further assess interactive teaching strategies and methods. Based on the test score results, I concluded that there was a substantial difference between the interactive and lecture formats that warranted making future changes in how I approached teaching the history classes and in designing lesson plans and class assignments and activities. Because there was a marked difference in the results for the two teaching methods, I would encourage other teachers to replicate my research methods to determine whether critical thinking skills are improved when they use the interactive format. This would increase the “generalizability” or external validity of my results or findings.

A frequency polygon was constructed to show graphically the scores achieved by the two groups. The raw scores for the student group taught by the interactive or inquiry method were listed on the left column in the table and the raw scores for the group taught by the lecture method were listed on the right. The frequency of the scores was then determined. The frequency chart data was then used to construct or plot a frequency

polygon graph that tracked the performance of the two groups comparatively. The frequency graph showed that students taught by the interactive method consistently had higher test scores than those in the lecture group.

Finally, I examined potential threats to the internal validity of my results. One possible threat was data collector bias. I may have skewed the results because I wanted a pre-conceived result or outcome. I may have looked for only certain answers and ignored

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or discounted others because they did not fit into my prior expectations. I wanted to find an improvement in critical thinking skills. This pre-set conviction guided my research. Implementation and attitude can also threaten internal validity. I was a priori biased against the straight lecture format and wanted or expected to find an improvement in test scores when the interactive format was used. This may have had an impact on how I implemented my methods of instruction and my research collection.

The second hour class, the subjects of the research, may also have learned that they were being taught a different way than the other hours. This may change their attitude. This “Hawthorne effect”, conscious knowledge on the part of participants that they are receiving “special” attention, may have skewed the results in a more positive direction, resulting in inflated results. Moreover, these second hour students may have been more active and more participatory in the interactive approach due to novelty, as a channeling of attention-seeking behavior, as a way to avoid the lecture format, and as a way to accommodate the instructor and to receive a higher grade.

Conclusion

This project can be designed or replicated as either a practical action research project, which would address the issue of student apathy and disinterest to history classes at a local high school, or a participatory action research project that would address ways of increasing student critical thinking skills in schools in the entire district by increasing the stakeholders to include other students and teachers and administrators in the district.

Rethinking and reflection was the final step in the action research process. I have

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learned that the interactive or inquiry method of teaching history ensures that students will achieve a more meaningful understanding of the subject matter. This method also creates greater engagement and interest in the issues and motivates and polarizes students. The lecture format is necessary, however, to establish the background information and to present the fundamental concepts and terms. In my future lesson plan designs, I will retain the lecture format but add interactive assignments and exercises. This action research project showed that an interactive teaching method, which includes group role play and simulations, gave students a better understanding of historical events by allowing for greater empathy and sympathy and greater internalization that resulted in improved critical thinking skills. The research results of this action research project could be used to design future lessons in high school history courses that would increase student critical thinking skills. By implementing an interactive teaching format, teachers can increase student scores on tests and the level of student engagement. This

improvement would be reflected in higher grades and improved academic achievement. I have used the results to make changes in my own classroom and have made the research results available to other teachers in the school.

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Table A

Test Scores for Group I
Taught by the Inquiry Method

3, 8, 8, 10,
11, 12, 12, 13, 13, 14,
15, 15, 15, 16, 16, 17,
17, 17, 17, 18, 18, 19,
19, 19, 20, 20, 21,
21, 21, 21, 21, 21,
22, 22, 22, 22, 22,
23, 23, 23, 23, 23,
24, 24, 24, 25, 25,
26, 26, 26, 26, 26, 27,
28, 29, 30, 30, 30
31, 32,

Test Scores for Group II
Taught by the Lecture Method

5, 7, 7, 7, 9, 9, 9,
 10, 10, 11, 11, 12, 13,
 13, 13, 13, 14, 14, 14,
 15, 15, 15, 16, 17,
 17, 17, 17, 17, 18, 18, 18,
 19, 19, 20, 20, 20, 20,
 20, 20, 20, 20, 21,
 21, 21, 21, 22, 22,
 23, 23, 23, 23, 24,
 24, 24, 25, 26, 28,
 28, 29, 30

Table B

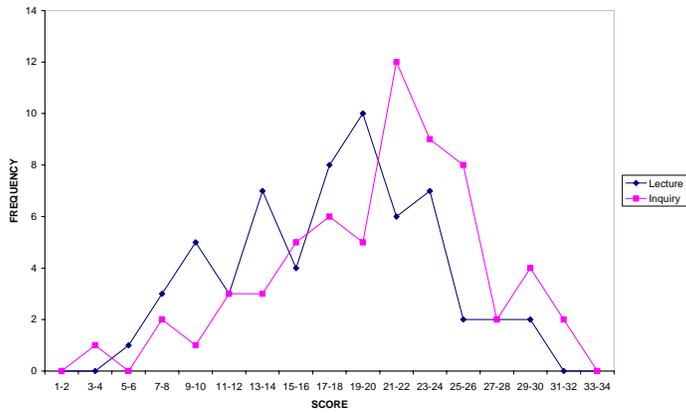
Group I Taught by
Inquiry Method

Score	Frequency
31-32	2
29-30	4
27-28	2
25-26	7
23-24	9
21-22	11
19-20	5
17-18	6
15-16	5
13-14	3
11-12	3
9-10	1
7-8	2
5-6	0
2-4	1

Group II Taught by
Lecture Method

Score	Frequency
31-32	0
29-30	2
27-28	2
25-26	2
23-24	7
21-22	6
19-20	10
17-18	8
15-16	4
13-14	7
11-12	3
9-10	5
7-8	3
5-6	1
2-4	0

FREQUENCY GRAPH: INQUIRY VS. LECTURE



Appendix C

Analyzing Bias

Information Source	Author Background/ Affiliation	Text Source/ Publication Date	Author Data Source	Neutral/ Objective Stance	Partisan/ One- Sided
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Source 1
Source 2
Source 3
Source 4
Source 5

Information Content	Reliance on Facts or Opinion	Logical Inferences	Illogical Reasoning/ Conclusions	Emotional Appeal	Cognitive Appeal
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Source 1
Source 2
Source 3
Source 4
Source 5

Persuasion Techniques	Glittering Words	Bandwagon Appeal	Stereotypes	Author Bias?	Credible Data?
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Source 1
Source 2
Source 3
Source 4
Source 5

Appendix D

Analyzing Multiple Texts

U.S. Textbook

Soviet Textbook

Cold War Responsibility/Origins:

Who was responsible for starting the Cold War and why?

Ideology/Economic and Political System: What is the nature and what are the objectives of capitalism and communism? What role, if any, do they play in the way the nation is governed?

Arms Race: Is an arms race necessary and why? Who is responsible for fueling the arms race?

Foreign relations: Is détente and peaceful coexistence possible? Is confrontation necessary, and, if so, why?

Atomic Bomb/Nuclear Armament: Who is responsible for the atomic bomb? Is nuclear disarmament possible?

Motivations: What motivates Americans and Russians during the Cold War? What similarities and differences exist?

Comparison: Which system is superior and more free, the U.S. or Soviet system?

Perception: How do you see each other, as a rival, an antagonist, competitor, or an enemy?