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IMPLEMENTING STUDENT-CENTERED LEARNING STRATEGIES FOR
MULTILINGUAL LEARNERS THROUGH A SOCIAL JUSTICE LENS

by

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CHAPTER ONE

Introduction

Overview

The education system has many different components and factors that go into educating our students and helping them to achieve. There are different methods and styles that teachers can implement in their classrooms to help students understand the materials and apply them to their lives. Currently, most methods are teacher-centered through lecturing, testing and individual work. Students are required to memorize the materials for tests and regurgitate the information they have learned in class. Students merely memorizing materials in a content area fails to provide them with the skills needed to be successful in life.

In this chapter, I will begin by laying out why I am interested in researching the topic of student-centered learning. I will reflect upon my personal journey both as a student and as an educator explaining the importance of my research. My current role as a middle school English Language teacher has played a very important part in my journey and passion about my research. I have come to see that this is something that needs to be researched and is an important part of our educational system. We, as educators, need to give our students a voice; we can do this if we center our teaching methods around students. We can help them to perform well in school and in the real world so they are making a positive impact on society.

The question I will be exploring in this project is, *How can we create an equitable student-centered environment through project and problem based learning?* This project will be creating a curriculum for a 7th grade Social Studies unit of study of the Foundations of Systems of Power in the United States from 1787 - 1800. There are better methods that teachers can use with students to show their understanding of the material. "...it has been suggested students who participate more actively in their learning environment will improve their generic skill set, including their collaborative, analytical, and problem-solving abilities, in tandem with gaining better appreciation of the content"(Worthington, 2018, p. 139). student-centered learning methods help students to build a wide variety of skill sets as well as understanding of the content.

Project based learning and problem based learning are two student-centered methods that will be explored further in depth in this paper. These methods help students to understand real world problems while creating a connection to their own lives. "Also, problems in the real world are never quite so neat and clearly defined as homework problems in the back of a textbook" (Duda, 2014, p. 44). Furthermore, teachers need to create an equitable learning environment creating a curriculum that embodies different cultures to honor the voices of students using culturally responsive teaching or CRT. "CRT teachers reshape the prescribed curriculum by broadening the materials they use, for example by integrating non-mainstream content (e.g., works of authors of color, materials/resources from students' home communities) into traditional curriculum."(Glazewski & Ertmer, 2020, p. 693). These culturally relevant materials will

help students to understand the connection with the content being taught and their own lives.

It is very important that we use methods that help our students perform at the highest levels they can. We need to be using effective ways to assess our students' understanding of the materials being presented since students have different learning styles and ways they comprehend content. Student-centered methods provide different avenues for students to show their understanding of materials. Classroom environments can be created in which the learning process is focused on the student. Assisting students through the process of problem-solving and collaboration skills supports them to perform at a high level. Both of these skills are also essential in helping them in everyday life.

Personal Connection

Through my educational experiences as a student, tutor, and teacher, I have had many different experiences that have led me to be passionate about researching my question. Personally, I feel the traditional testing is an ineffective way to show students' knowledge of most topics and does not accurately represent what they learn. We should be preparing our students for the real world and to make a positive impact on society, not just memorizing materials so they can get a good score on a test.

As a student, I excelled when we did projects instead of taking tests. I was never really taught how to study, how to prepare for exams properly. Asking the question of how much effort is put into preparing for (and how to prepare for) tests by the students should be considered. It has been difficult to find specific research that shows data in a way that can be useful. Questioning how students learn is something we need to look at.

For example, I am a visual learner so I learn by doing things myself, not by just reading about a topic. Using differentiation and scaffolds support all students. This is why my research question is important to me. *How can we create an equitable student-centered environment through project and problem based learning?*

The things I learned best and actually retained were project based or involved something I felt passionate about. I learned more when I was able to give a presentation to either an individual or a group. This was true for me as early as elementary school. I remember several of the projects I did. I enjoyed science fair projects because I could show everyone what I learned and how I learned it. I remember another impactful moment in my early educational career. I dressed up as Ben Franklin and was then interviewed by my classmates. This made such a strong connection for me that I actually felt like I was Ben Franklin. “Activities such as games, role-plays, and simulations can increase students’ understanding of not only historical events but also help them develop great appreciation of historiographical issues.....” (Worthington, 2018, p. 139). My historical understanding grew, along with my confidence and made learning fun.

My experiences in high school were similar, the units I learned more from were project and collaborative based. Anyone growing up in Minnesota probably remembers working on their history day project. Groups chose topics to further research and eventually present to judges. We learned our topic and how to be part of a team. We were given a voice to explain and show what we learned. My personal experiences have motivated me to create a curriculum for students that is student-centered, to aid in their understanding of processes and content while being relevant to their own lives.

Professional Connection

Our job as educators is to help students to understand processes and become productive members of society. Using assessments such as tests and quizzes in certain situations can show the student's understanding. However, there are limitations to these methods of assessment in preparing students to become productive members of society. To effectively do our jobs as educators we need to present real world problems and connections.

Project-based assessments help students engage and show what they understand. We can assess their overall understanding of content and help them to perform at a high level. "David Meltzer, a physics education researcher, has pointed out that "highly successful students ... are active learners. They continuously probe their own understanding of a concept." (Duda, 2014, p. 44). Encouraging engagement supports students to be "active learners" and helps in comprehending content at a high level.

In my adult educational journey, I have worked with students on many different levels teaching, coaching and tutoring. Through these experiences, I have come to understand that students need to have an equitable learning environment. In working with emerging multilingual learners I see the gaps in learning and therefore, the necessity for differentiation in lessons. "Teachers draw on their understanding of writing development for ELLs and select appropriate strategies to scaffold students' learning, differentiate instruction based on the writing needs of the students in the class and use

classroom-based assessments of writing performance to guide instruction and provide evidence of writing growth” (Wright, 2015, p. 232). These strategies can help more than just the multilingual learners through scaffolds and ensure an equitable environment for all students.

In my experience as an AVID (Advancement Via Individual Determination) tutor, I definitely saw many different opportunities to create a student-centered environment. Tutorial sessions for students have them present to a group of their peers and ask questions. Group work helps them to find the answers by collaborating with their peers. This is a skill that is necessary to play a successful role on many different levels in the real world.

Collaboration skills are something that all people need to do to be successful both in and outside of work.

Vygotsky (1978) believed that learning was a social process in which learners developed understanding through interaction with the environment around them. He argued that the most effective learning environment would provide learners with the ability to explore concepts that were of interest to them, and discuss and negotiate the meaning of those concepts with other learners. (as cited in Brush & Sayre, 2000, p. 80)

There are very few jobs that do not require collaboration. The importance of collaboration skills can often be overlooked, but is necessary in helping our students to succeed.

Summary

In this chapter, I have covered and outlined what exactly I am going to be researching and why it is important to me and to education. Our educational system is ever-changing and teachers can always use new ideas and new theories to supplement

their teaching. My personal and professional experiences have helped me to formulate my research question of *How can we create an equitable student-centered environment through project and problem based learning?*

The educational system as a whole will have students take tests individually in order to assess their performance. This does not help the students be prepared for many real-life situations; it just has them memorize materials for information they may not even retain. Assessing students in many different ways can help more effectively understand their abilities and skills. I believe this can be done more effectively if we use student-centered teaching practices.

Through my own educational experiences, I have discovered that student-centered teaching is a more effective method of teaching our students and also helps students to retain and understand information. As a student in elementary through college, I had experiences that were both student-centered and collaborative that I learned from. The frustrations I remember were when I would be required to take a test and memorize the materials as opposed to presenting the materials.

As an educator, I have seen that student-centered teaching needs to be more beneficial to the students. Working as an AVID tutor at different schools they used student-centered practices. These practices were also collaborative and had the students work together to solve problems they were having with materials in certain classes. This is a useful tool for students in life because they are going to encounter different situations in work and in general that they will need to work in a group.

In the next chapter, I will be presenting the research behind student-centered, differentiated and collaborative based learning. I will be analyzing what the experts report on the topic of student-centered learning and the impact it can have on students' overall understanding of materials being taught. I will reflect on how the research supports and refutes my overall question of how we can best motivate our students to achieve success not just in school but in life. Also connecting the research to how it will improve communities and how the students will become productive members of society.

CHAPTER TWO

Literature Review

Introduction

There are many different methods of teaching involving all different sorts of approaches to connecting with our students. Student-centered learning is not new but is still not frequently used by many educators. There are several studies and research on the advantages and disadvantages of student-centered learning in different classrooms. This research delves into the question *How can we create an equitable student-centered environment through project and problem based learning?*

In this chapter, I will be synthesizing the research that has been done on the effectiveness of student-centered learning and different approaches that can be utilized. There are different levels of achieving student-centered learning environments, from problem-based learning, project-based assessments, creating an equitable environment, and collaboration. These approaches take different angles on how we can best serve our students.

The research and studies have shown many positive ways in which we can help our students to better understand the concepts that we are teaching. This project will use research to create a curriculum for a 7th grade Social Studies unit of study of the Foundations of Systems of Power in the United States from 1787 - 1800. This chapter will be outlining the research that is done to support the relevancy and need to create such a curriculum.

Problem-based learning (PBL) is the first approach I will examine in this paper. This approach gives students specific problems to solve and helps their learning by

giving them the skills to be able to find solutions to problems that connect with real-world problems. “PBL is designed to develop problem-solving strategies, disciplinary knowledge bases and skills simultaneously by placing students in the active role of problem-solvers” (Beringer, 2007, p. 445). Thus, creating an environment where students can feel welcome to share ideas and seek connections to their lives.

The next approach is project-based assessments that require students to assess or analyze real-world scenarios. Students use hands-on learning when assessing new information they have been given. “The projects act as a “hook” to get students interested in what are sometimes very abstract concepts” (Duda, 2014, p. 44). This coincides with getting students motivated and understanding the relation to certain topics of social justice issues in which they may have an interest but would like to learn more about.

The third approach I will examine is creating a student-centered equitable environment. Using diverse approaches helps us to reach all students on more levels in their learning journey. “In diversity classes, collaborative learning also helps students to learn how to discuss controversial topics in diverse settings, a valuable skill” (Goldsmith, 2006, p. 266). This approach creates an environment for students at different levels of social and economic backgrounds.

This leads into the final approach where I will examine how to implement differentiation for students in a diverse classroom. “Differentiated instruction is a research-based model of classroom practice intended to support teachers in developing curriculum and instruction likely to maximize the capacity of a diverse group of learners”

(Tomlinson, 2015, p. 203). With these ideas, students again learn how to look at different social justice issues that they can further delve into and stay motivated to learn.

Problem-Based Learning

Giving students real-world problems to analyze helps them to better understand the world around them. Researchers such as Beringer (2007) and Chua, Tan & Lin (2016), authored papers to support this claim. “PBL first started in medical schools with the aim of developing professional behaviours through classroom teaching” (Chua, Tan & Lin, 2016, p. 191). If they have problems that they may face in their current life and in the future depending on their career path, helping to teach them how to address these problems in school can help them in the future. This type of learning benefits students in ways so that they are able to use their own prior knowledge to understand what they are being taught. They better understand the concepts in school and how they will relate to their everyday lives.

Problem-based learning is an alternative to the typical mainstream method that teachers use when they are implementing situations and strategies for students. “PBL is designed to develop problem-solving strategies, disciplinary knowledge bases and skills simultaneously by placing students in the active role of problem-solvers” (Beringer, 2007, p. 445). This will help the students to understand “authentic problems” that will be seen in real life and they will have to deal with these problems in the world.

This type of learning also does not have a black and white answer, so the students have to open their minds and discover new ways of understanding topics. Problem-based learning helps students to understand that things are not always concrete and to look at

issues and problems on a more abstract level. “PBL approaches can encourage higher-order thinking and integration for knowledge. It can encourage learners to be more autonomous and innovative and to be more reflective of what and how they have learnt.” (Beringer, 2007, p. 446). This method of problem-based learning uses reflection of the students to help better understand what they are learning.

One of the biggest challenges in implementing problem-based learning is that in mainstream education, the majority of students are taught using teacher centered learning strategies. In part, this challenge can be linked to the concern of many teachers in standardized testing. “One concern teachers raised about using student-centered activities was that they are not necessarily helpful in preparing students for standardized tests” (Pedersen & Lie, 2003, p. 69). In order to implement PBL there would have to be a paradigm shift in the educational system and in the mindset of many teachers, “...instead the teacher becomes a facilitator of knowledge construction” (Beringer, 2007, p. 448). PBL requires the teacher to be more empathetic to the situation of the students or to use more student-centered practices. “With a better understanding of how learners employ cognitive functions in each PBL stage and across the PBL cycle, there can be more mindful facilitation and development of students’ thinking processes”(Chua, Tan & Lin, 2016, p. 198). In other words, there would have to be a drastic change in certain cases for teachers to implement these systems.

Problem-based learning is also effective because students work in groups, developing the skills and benefits of collaboration. Problems can be shown from different viewpoints, promoting “multiple perspectives, generating many ideas” (Chua,

Tan & Lin, 2016, p. 197). This can lead to more thoughtful and thought provoking solutions. A struggle with this may be that one student may do more work than another group member. However, students need to learn how to work as partners. This becomes an important life long skill as most workers will, at some point, be required to solve problems with their peers.

Problem-based learning can help to motivate the students, promote a sense of freedom and teach personal responsibility. Students often ask, “Why?” Using the PBL approach helps the students to deeper understand why they are doing this project and what real world relations they can have. This can better motivate students to be an active participant in their own educational journey. All aspects of PBL lead the student to better understand situations and how they can apply what they are learning to real life.

Problem-based learning is a student-centered approach helping students become more engaged in their learning. “Solving unstructured real-world problems in a PBL environment engages learning in thinking processes such as exploring perspectives, questioning assumptions, looking for connections and synthesising information” (Chua, Tan & Lin, 2016, p. 191). Not all students learn alike. Many will excel in this type of environment than others. This approach to teaching needs for an open-minded educational environment where the teacher gives more control to the students than is traditionally witnessed in our classrooms, “... students who learned through PBL were able to transfer the knowledge, skills and dispositions acquired during problem-solving practice to professional practice” (Chua, Tan & Lin, 2016, p. 192). PBL engages students

and gets them to think at a higher level on their own in order to solve real world problems.

Research has shown that there are many benefits to problem-based learning in classrooms to help students. If implemented in an effective manner it can impact the students' engagement and motivations. "In general, students found the approach more nurturing and enjoyable, and were more stimulated, challenged and satisfied as evidenced by 64 percent of respondents in 2004 saying they 'strongly agree' that the approach and synthesis were worthwhile" (Berringer, 2007, p. 451). It will take a paradigm shift both in the students and teachers in order to become successful, but definitely is a practice that can advantage students. The ways it can do this is seen in the prior section demonstrating how students can connect to real world problems. It encourages students to think at a higher level. " In addition, it has been suggested that the PBL approach can encourage higher-order thinking and integration of knowledge" (Berringer, 2007, p. 453). Higher-order thinking can lead to "more autonomous and innovative" (Berringer, 2007) p. 453) thinking and hold our students to a higher standard.

Project-Based Learning

In this section, I will be examining the research on implementing project-based learning to create a student-centered environment. Authors Gintaras Duda and Jason Ravitz have conducted research to support project-based learning. This coincides with problem-based learning and gives the students the power to be able to guide their own learning and understanding of the world around them. This type of learning also uses collaboration and interaction with other students and helps the students work together to

solve the problems at hand. Having them create something that will show their true understanding of different topics or concepts.

Project-based learning builds on the aspect of problem solving seen in problem-based learning. “It consists of teaching by providing students with complex, ill-defined but real-world problems that draw them organically into learning” (Duda, 2014, p. 43). It goes further than just solving real world problems, but implements a hands on approach to students learning. In this role, the teacher is also the facilitator and leaves the learning in the hands of the students.

Similarly to problem-based learning, it will take a shift of thought in the minds of educators from what has been thought of as the traditional, effective way of teaching. In a study done by Brush and Saye (2000), the classroom teacher does not seem to implement project based learning in an effective manner, leading to frustrations in both the students and the teacher. “The teacher understood that students should have unique roles and responsibilities within the group, but she did not effectively define and establish those roles” (Brush & Saye, 2000, p. 88). With such a paradigm switch teachers must understand that they need to clearly objectify what the students are to be doing.

There is some agreement on what the teacher’s role is “Most teachers used the term *facilitator* to describe their role both during their regular classHowever, the activities the teachers described in this role differed somewhat” (Pedersen & Liu, 2003, p. 66). To be able to properly implement project based learning and a student-centered environment the role of the facilitator has to be clearly defined, this will help the teacher to define the roles for the students.

A key component for the teacher to be a successful facilitator is knowing how to support students. “I am responsible for providing scaffolding and the prompts for learning, but the students are responsible for their own learning and managing the use of precious in-class time.” (Duda, 2014, p. 43). This begs the question of how can we hold the students accountable for working together in groups. Scaffolding and differentiation can be done in many different ways which I will examine in creating an equitable educational environment.

Engaging students and holding them to high standards can be done with project-based learning. “It consists of teaching by providing students with complex, ill-defined but real-world problems that draw them organically into learning.” (Duda, 2014, p. 43). The teacher takes a facilitator role and gives the students the tools to master the skills. This leaves the learning in the hands of the students. Students build skills to be successful in the real world, while having a teacher facilitate understanding before being students are on their own.

Implementing project-based instruction helps personalize the learning environment for the students in their educational journey. “Thus, in successful simulations students are active participants, just as in real life when an individual must use evidence and resources, along with problem-solving, collaborative, inquiry and higher-order thinking skills to solve a given situation” (Worthington, 2018, p. 139). Active participation leads students to take personal ownership of their education. Student engagement is heightened and moves thinking toward a higher level, while preparing them for real world situations.

Student engagement and performing at a higher level can be fostered through project-based learning. It will not be an easy task but one worth taking. The more hard work and open minds of teachers will help with this process and thus be used as a better tool to educate the future leaders of the world. Students can use the collaboration skills they learn and translate them to their everyday lives. Project-based learning will help students to be more engaged in their learning, by putting it into their own hands. This is one part of answering the question of creating a student-centered environment while promoting engagement and educational achievement.

Equitable Educational Environment

Equality in education is a topic that has a long history and is still an issue in education today. Schools in the United States continue to face an achievement gap. This achievement gap is “a matter of race and class. Across the U.S., a gap in academic achievement persists between minority and disadvantaged students and their white counterparts” (Ladson-Billings, 2006, p. 3). This is a topic we need to focus on because there are procedures that can be implemented to help all of our students to be able to get a fair education.

In our schools and in our communities, we need to create a welcoming environment for people of all backgrounds. This can help to create open dialogues that help us better understand the people we live and work with in such a diverse society. “Adopting an intentional focus on students’ existing cultural identities during the design of learning environments expands the opportunities to make these environments more responsive, relevant and durable” (Glazewski & Ertmer, 2020, p. 684). As educators we

can help to create safe environments for all students in our classrooms and model to our students how to create a better society. This is not inclusive to race or gender, but for students from different social and economic backgrounds and brings all of our students together.

Revisiting the problem-solving style of learning, we can see that this type of learning can help to create a better environment for all of our students. Students can more freely express ideas and opinions, leading toward greater understanding and different outlooks on many situations. “In diversity classes, collaborative learning also helps students to discuss controversial topics in diverse settings” (Goldsmith, 2006, p. 266). Having students with their different viewpoints definitely helps them to see the world in a different light and discover a better understanding of ideas on how to solve particular school and real world problems.

This type of group work can lead to a better understanding of how the world works by bringing in different ideas to think about. In this way, students can “challenge themselves as they reflect on ideas” (Goldsmith, 2006, p. 266). This will lead them to make better, more informed choices pertinent to problem solving and conflict resolution. Students may disagree on certain issues or problems. However, this can lead to a growth as students are now better prepared for real life issues that they will have to face in everyday life when collaborating with their peers.

Other studies that have shown that student-centered learning in a diverse environment can help students to narrow the “achievement gap”. Successes of this were found through my research “...minority students in Learner Centered classrooms were

able to close the performance gap with their non-minority peers” (Salinas & Garr, 2009, p. 235). These findings were based on standardized test scores comparing teacher centered learning environments and student-centered learning environments.

Diverse classrooms that create a student-centered learning environment can help students to succeed in the real world. “Moreover, we also found that in the LC schools had higher scores in a number of areas, including Self Efficacy, Curiosity, Active Learning Strategies, Master orientation, Initiative, Innovation and value of Diversity, skills that are very valuable in a competitive marketplace in which mere knowledge of mathematics and language can only assure a low-skills job.” (Salinas & Garr, 2009, p. 236). When we implement such practices in all of our schools, students will gain skills, not just in the content areas, but life skills to help them be successful. Comments from students in Berringers survey are an example of this. “PBL research sessions were interesting. Learned more, learned different skills, forced to think about work” (Berringer, 2007, p. 453). In essence this is what student-centered education is all about, getting students to learn and think at a higher level.

Educators need to create classroom environments in which we honor the voices of all students. Gloria Ladson-Billings has done much work towards this and suggested a pedagogy to support cultural relevance. Culturally relevant pedagogy is “...a theoretical model that not only addresses student achievement but also helps students to accept and affirm their cultural identity while developing critical perspectives that challenge inequities that schools (and other institutions) perpetuate” (Ladson-Billings, 1995, p. 467). Implementing this has helped minority students succeed better in classrooms where

the needs are focused on the students cultural backgrounds. “Their work indicated that the composition of a school (who attends it), the students’ sense of control of the environment and their futures, the teachers' verbal skills, and their students’ family background all contribute to students' achievement.” (Ladson-Billings, 2006, p. 4). Educators need to understand that their students all have varying needs and this can be a factor because of their upbringing in a different cultural or economic background.

Diversity is still a prevalent topic in education and one that needs to be focused on in order to close the “achievement gap” and to give a fair education to all of our students. Using a student-centered learning environment can help for all of our students to become successful not only in school but in life. The student-centered learning approach gives all of the students a voice in our classrooms and in the world today. Implementing the practices to ensure equitable classrooms is one step in creating a student-centered environment that promotes engagement and success. The strategies discussed in this section show that minority students are more likely to succeed if our focus is on the students.

Differentiation

student-centered learning can be a great tool for educators to use when addressing how to meet the needs of all students.. “Learning is a very personal journey for the teacher and the student...” (Tomlinson, 2008, p. 208). Different things motivate different students in a diverse educational environment. It is figuring out ways to teach and motivate these students and keep them engaged in their learning, while holding them to high standards of learning.

There are many different ways and theories on how people learn and how they process information. “Some researchers have investigated individual differences in terms of ‘learning style’, defined as an individual’s natural, habitual, an preferred way(s) of absorbing, processing and retaining new information and skills” (Lightbrown & Spada, 2017, p. 83). Through my professional journey as an English language teacher I have seen this on many different levels with English language learners. In language there needs to be different scaffolds and differentiation strategies for students to be able to learn equitably.

Scaffolding for language, can be advantageous to all students, learning styles don’t always coincide based on language ability. “...scaffolding refers to a process in which, for example, a more knowledgeable (or expert) speaker helps a less knowledgeable (or novice) learner by providing an interactional framework that the learner can build on” (Lightbrown & Spada, 2017, p. 146). This strategy can help students of all levels, to either use the scaffolds, such as sentence starters, or it can create creativity to make their own.

Supports such as these can also lead to collaboration among students to bring new ideas to the classroom. This is supported by a sociocultural perspective theory “Vygotsky’s theory assumes that cognitive development, including language development, arises as a result of social interaction” (Lightbrown & Spada, 2017, p. 118). Further supporting creating collaboration among students to help promote engagement. Implementation of scaffolds will in turn help students on all different levels and echoes the previous sections of research conducted.

Continuing to look at scaffolds and how we can implement them to support all of our students and be equitable in our classroom. Examples beyond sentence starters are EL strategies such as” A word wall is a wall display of words arranged alphabetically under each letter in type large enough for students to read from their desks”(Wright, 2015, p. 245). These word walls not only can help English language learners, but also other students who learn in visual ways.

These scaffolds can be used across different content areas to aid the curriculum for students and are not just inclusive to EL students. For the purposes of this paper, I am going to examine how to create a curriculum in Social Studies courses. Language in Social Studies courses can be difficult for all students. The vocabulary alone is more difficult because it is abstract “Concepts such as government, law, democracy, freedom, rights, justice, poverty, immigration, and elections cannot be illustrated with simple drawings, and they frequently defy simple explanations” (Wright, 2015, p. 284). This supports the need for different language supports that can help students to further understand certain topics.

Summary

Educational practices have reflected the teacher centered style of educating our students. For a lot of teachers, this is the standard implementation of educating our students in their classrooms. Teachers, unfortunately too often are teaching to the test. This in part is due to our educational system basing a lot of the judgment of the ability of teachers on how well students score on standardized testing. This chapter has shown research on how we can address the question, *How can we create an equitable*

student-centered environment through project and problem based learning? Exploring alternative methods that educators can use to help students become more motivated and learn how to become successful in school and in their daily lives.

All of the different theories correlate to a student-centered environment, but they also all have unique ways to help our students become successful. In the problem-based learning aspect students look at real world problems that they need to solve and find real world solutions to these problems. This helps them to become better problem solvers in general so that when they do go into the workforce they can use these skills to be successful in whatever career path they choose to take.

Project based learning places students' learning in their own hands and helps them to know how to motivate themselves to become a better learner. It gives them the tools they need to solve the problems and create a project but it is not just a teacher standing in front of them telling them what is good and what is not. Examples of this are "Develop effective problem-solving skills...Become effective collaborators.....Become intrinsically motivated to learn." (Berringer, 2007, p. 446). This approach helps the students to learn collaboration skills which is something that everyone will need to do at some point in their life and in their career. Having these skills and creating a project shows a better understanding of what the students are learning. This project will help teachers to do this through creating a curriculum for a seventh grade social studies unit of study of the Foundations of Systems of Power in the United States from 1787 - 1800.

As research shows, in the articles "From the Achievement Gap to the Education Debt: Understanding Achievement in U.S. Schools" and "Teaching for Excellence in

Academically Diverse Classrooms” creating a diverse learning environment and helping all of our students to understand things on an even level, can help to shorten the “achievement gap”. Having multiple perspectives can help our students to look at problems at different angles that they may not have thought of and deepen their understanding of real world problems. Creating this environment also helps to give all students a voice in and outside of the classroom and can help to better understand our peers and the world around us.

The last subtopic of equitable learning encompasses all of the theories that were previously discussed in this chapter. Motivation is the key to success, but is also one of the hardest things for educators to do when dealing with adolescents. student-centered learning is based on individualism and self motivation, so helping the students to become more excited about their education is a key step in motivating students. I have seen first hand in classrooms how certain cultures may be honored and not others. Diverse classrooms can create a collectivist culture, where students work together and build a strong sense of community by honoring all voices. Beneficially for students, this helps them hold on to their cultural identities and feel a sense of belonging.

Research on student-centered learning overall has shown that students do score better and learn more in their classrooms. The main obstacle of implementing this type of learning can be the teachers not having an open mind or not being willing to change the ways that they present the materials to the students. This poses the issue of getting all of the teachers on board and willing to test out other theories such as student-centered

learning. Students do all learn in different ways and some will become successful with the traditional teacher based approach.

However, as educators we need to be open minded and use all the tools that we can to reach our students and prepare them for life. In saying that in the next chapter I will propose a project that will create a curriculum to implement student-centered learning. This project will study teachers and students in a specific classroom and show how we can implement student-centered learning and create an environment for our students to become successful in school and be productive members of society.

CHAPTER THREE

Project Description

Introduction

Creating a student-centered environment in our classrooms can be a challenging paradigm switch for many educators, as the standard teaching practice has been to have a teacher-centered environment. In the past chapters, I have explored why I feel this is an important topic in education and why it is important to me personally. I have analyzed the research on different aspects of student-centered learning and how it has been implemented in certain situations and how it can benefit many of our students. All of this supports the need to explore my central question, *How can we create an equitable student-centered environment through project and problem based learning?*

In this chapter, I discuss the prospect of implementing a student-centered learning environment by creating a curriculum for a 7th grade Social Studies unit of study of the Foundations of Systems of Power in the United States from 1787 - 1800. I delve into the steps to show how and what I will be doing with my research. I formulate a plan to create a program for teachers to be able to use this as another tool in educating our students in different ways. The importance of a student-centered learning environment can be used on all different levels. When done properly it will help students and educators alike to work towards a more beneficial experience for all.

This chapter overviews the project and explains the research-based steps detailed in previous chapters. This chapter also outlines my methods and explains why I have chosen them in undergoing my research and implementations of research. Finally, this

chapter will present who my audience will be, while also summarizing the initial time frame I will take to work through the project and creating a student-centered environment curriculum tool to be used by teachers in a 7th grade social studies classroom in St. Paul Public Schools.

Project Overview

The project creates a curriculum for a 7th grade social studies unit of study of the Foundations of Systems of Power in the United States from 1787 - 1800. This curriculum implements different project and problem based lessons, connecting these lessons with social justice issues that have been present in our country since its founding. Finally, these lessons will include different scaffolds and supports through language to help not only emerging multilingual students, but all students.

The purpose of creating this curriculum is to help our students better connect with content. The curriculum helps students understand the importance of history and how it relates to the world today. In addition, the language scaffolds will help support students in their writing and literacy skills. It will serve as a tool for teachers to use to help create a student-centered environment in the classroom.

The unit consists of three separate essential questions with learning targets for the content. The first learning target focuses on the Constitution and students' understanding of what the Constitution is and how it is used. The second learning target is about the system of powers created by the Constitution and how it was used by the government. The last learning target explores how the people advocated for their own democracy and resisted oppression.

For each target, I will be creating activities for the students to complete along with the reading and writing for the unit. The activities being a mixture of individual and group activities based on problem and project ideas. The lens of social justice will be included by connecting how people were treated in 1787 - 1800 and how they are treated in the present day. Social justice means living in an equitable society for all. Issues of social justice people call for action or change in society for this equitable living for all. The curriculum will include different language scaffolds to support learners, along with language objectives to be included for each target.

Research

In the previous chapter I outlined theories and practices that have led me to understand how and why student-centered learning can be an effective tool for students. Students who work in an environment that is more student-centered have a deeper understanding of the topics in which they have learned and gain a higher knowledge of these topics. This type of learning helps students understand the connections of their learning to their everyday lives and how it can be important to not only what they are doing in their educational journey but how it is connected to the real world.

Diverse classrooms have shown that student-centered learning can help to create a safe environment for our students. Creating a student-centered environment helps to bring in perspectives of all of the students to share their thoughts and opinions. This helps to also create a culturally diverse environment for our students giving them all a voice and opinion in the projects they are working on. This something many educators struggle with and can be yet another great tool for them to help students on all levels.

Reasoning

In the classroom setting, a diverse environment is a key in the development of student-centered learning. Bringing in different thoughts and ideas is a great way to showcase how well student-centered learning can work. It is better to have a more diverse set of values among the students and the teacher in order to help create this kind of environment. The students are free to choose the projects and topics that they like so they will be able to show their understanding of this in their own way.

Setting/Audience

The curriculum will be created for Farnsworth Aerospace Upper Campus 7th grade American Studies teachers and students. The student population at Farnsworth has a high rate of English Language Learners, coming from different cultural backgrounds. These backgrounds consist of Hmong, Karen, Hispanic, Somali, African American, and Navtive American backgrounds. At Farnsworth 2/3 of the population speak a different language at home and 1/3 of the population qualify for English Language support. Nearly all of the 603 students at Farnsworth live below the poverty level and 100% receive a free breakfast and lunch. This will serve as a tool that teachers can use to better understand and support their EL students specifically. The intent of the project is to create a more equitable support system for teachers to use in their classrooms. There is also a need for the teachers to implement more student-centered activities and become facilitators of the students learning process.

Timeline

This curriculum will be implemented at the beginning of the 2020-2021 school year. It will cover the first unit of study for American Studies, spanning 2 - 3 weeks. It will serve as the basis for my work in co-teaching American Studies and implementing different strategies and ideas to build supports for future units. I will continue to use what I have learned through the writing of the curriculum to help in planning curriculum for units throughout the school year.

Summary

This project will help to create a better environment for students, especially in a diverse classroom to relate to content in schools. By creating a curriculum for a 7th grade Social Studies unit of study of the Foundations of Systems of Power in the United States from 1787 - 1800. This curriculum will serve as another tool for teachers to be able to help students understand topics in history. This project will help to answer my research question, *How can we create an equitable student-centered environment through project and problem based learning?* Using research and ideas that can be implemented in classrooms to better serve our students.

CHAPTER FOUR

Reflection

Introduction

This project was created to implement student-centered learning while creating an equitable learning environment in a 7th grade social studies classroom. Exploring the question, *How can we create an equitable student-centered environment through project and problem based learning?* The intent of this project is to support students in their learning using different methods that focus on problem solving and creating projects to assess student learning. The curriculum created is for the first unit of study in the 7th grade social studies classroom at Farnsworth Aerospace 5 - 8 in the St. Paul Public School district. The unit covers the founding of the system of powers in the United States government, building connections to students' lives today.

This chapter is a reflection of my work through writing, researching and constructing curriculum to be used in the classroom. In this chapter, I discuss what I have learned through this process and how understanding led to the completion of the project. This includes adjusting to a greater focus on the project and uncovering the working parts of creating curriculum to include student-centered learning. I address how my research and literature review connect and help shape the development of the curriculum. In this chapter, I analyze the limitations that I discovered when working on the project, varying from curriculum formatting to encompassing all different facets of my research question. Finally, I reflect on how the implementation of the project will benefit the teaching

profession by helping teachers use more relevant teaching methods to engage and motivate students.

Enlightenments

Experiences in education, as a teacher and as a learner, have shown me different approaches to learning and have shaped my view of education. The process of writing, researching and creating this project has affirmed many beliefs I have previously held, and opened my eyes to different ways of thinking and understanding. Education for both students and teachers should be an organic journey, one that helps us better relate to the world we live in and become more knowledgeable of the world around us.

In writing this project, I learned a lot about myself as a student and also as an educator. It reminds me of how I learn and what made me passionate as a learner. What I learned specifically, I am motivated by being an active learner in my education, not a passive note taker. This is what led me to create a student-centered curriculum for the students I educate. I want them to have a more engaging experience. Through research I found that many of my ideas were supported by others and in past research. The ideas being project based and problem based learning can help students become more engaged and motivated.

Creating a curriculum with a culturally relevant template provided by St. Paul Public Schools helped me to understand how to break down each lesson. Using different pieces of the template focused my thoughts and aided in formulating lessons that make sense and answer the essential questions being asked. I also found that determining the end goal of the unit and each lesson itself helped to focus the lesson and my thoughts to

become a more sensible unit. My difficulties lie in being able to condense certain lessons, but also have a lesson that would address the essential questions of the unit.

These enlightenments have helped me to better understand the work that goes into writing curriculum. Through this project I have learned how to focus my work and use different approaches to creating lessons that are student-centered. Reflecting on what I learned is a necessary step in my role as an educator so that I can bring this understanding to my classroom. This will help me to move forward in my professional career and better serve our students as a whole.

Connecting to the Literature Review

The literature review helped immensely in guiding my planning of the units in the project. The research analysis helped to reaffirm the importance of student-centered learning through project and problem based learning. Researching the question of, *How can we create an equitable student-centered environment through project and problem based learning?* In answering this question I explored different studies and different ways that student-centered learning has been a success in the classroom. Not only does student-centered instruction help students learn, but it also helps to create a safe and equitable environment for students. This is seen by honoring students' voices and making connections to their own lives.

The project and problem based learning research was the most useful in creating the student-centered curriculum. "The road to a project-based classroom" by Gintras Duda 2014 was helpful in looking at ways that projects have been useful in specific classrooms and how students better understand. When creating activities for the project,

I used “Letting Students Control Their Own Learning: Using Games, Role-Plays, and Simulations in Middle School U.S. History Classrooms” By Tracy Worthington 2018. The article showed how games were used in different classrooms and the positive feedback and results from students. The two articles that I used to guide my problem based learning activities were: “Journey into the problem-solving process: cognitive functions in a PBL environment” by Chua, Tan and Liu 2016 and “Application of Problem Based Learning through Research Investigation” by Jason Berringer 2017. Both of the articles gave insight into how students could improve their abilities in problem based learning. Creating ideas of how to use problem based learning to better connect the students to the content.

The research provided answers to many different questions I had in how exactly to create the curriculum and what has worked in the past. Research showed using different language supports can help all students, not just emerging bilinguals. The research did help to point out some of the limitations of using certain thoughts and ideas in the actual classroom. My findings helped guide me to be able to be more conscious of teaching practices that can be used in the classroom.

Limitations

Teachers in their classrooms have the ability to use curriculum in the way that they see fit for their students. Using a student-centered unit of study may not provide help for all students in the classroom. There are students who do exceed when the content is being presented through a teacher-centered classroom. However, the lesson plans do provide flexibility for student assessment if this so happens to be the case then students

who do thrive in a different environment have the choice to be assessed in a different way.

One thing I did struggle with while working through this project was making sure activities and assessments would cover the basic standards. The lessons are for a American Studies class in a unit that explores systems of power from 1787 - 1800. For some lessons I had to take a step back and make sure I still incorporated the historical importance of certain topics. In addition, ensuring to include the equitable piece at times I felt limited to the specific standards and topics addressed in the unit. I felt the need to explore such civil rights issues, the teacher may not understand the civil rights issues students' families face every day. This can make it difficult to help the students' fully understand the connections between civil rights issues in the past and those that are faced today.

Benefits of Implementation to Teaching

Expressed throughout this paper is the need for students to be able to connect to content and see the real world applications of learning in the classroom. The lesson plans and curriculum created through this project can serve as a beneficial tool for teachers to use in their classrooms. Guiding future lesson planning so that it is student-centered and equitable for our students and expanding on the ideas of past lessons. Language supports used in any lesson not only support our emerging bilingual students, but help to support students on all levels.

Student-centered classrooms can be beneficial for both students and teachers in different ways. Teachers can create an equitable and safe learning environment for

students to grow and share their thoughts and ideas. Students can take control of their own learning and understanding of different topics. The role of teacher in the classroom turns into more of a facilitator role for the students, being a tool for teachers to be more diverse in their strategies and lesson planning for the future.

Communicating the Results

My project of creating a curriculum that is student centered and equitable will be shared with other teachers in my school through departmental meetings. Co-teaching social studies as an EL teacher is a platform that I can use to communicate with other teachers' ideas of the curriculum. By using this curriculum it allows me to better understand what works for the students and what doesn't. Which is something that can be shared with others who are interested in using the curriculum or implementing similar practices in their classrooms.

Summary

The importance of educating our students about historical events and connecting the events is now more prevalent than ever. Keeping our students engaged and motivated to learn and understand the world around them can help so they may be empowered to create a better future. Learning through real world problems connects the content of mainstream education to why it is important for students to learn and understand. Using a model to create a student-centered classroom is one tool that teachers can use to help students learn.

Using a student-centered approach also helps in creating the equitable environment for students. Students who work on projects of their own choosing can

show how their own culture has shaped the work they have done. Educators need to find different and better ways to connect with students and their cultural backgrounds. Along with the student-centered approach using different language supports and scaffolds can also help to create an equitable environment for students to learn.

Completion of this project has helped to motivate myself and understand how as an educator I can connect with students. Classrooms need to be a welcoming and safe environment for students to be in. In doing this we can help our students to engage in activities to feel the work they are doing is more than just taking a test or working on an assignment, but something that they can use throughout their lives. In conclusion, I look forward to using some, if not all of the lessons and activities I created in a co-taught American Studies classroom for years to come.

REFERENCES

- Beringer, J. (2007). Application of problem based learning through Research Investigation. *Journal of Geography in Higher Education*, 31(3), 445-457.
Doi: 10.1080/03098260701514033
- Brush, T and Saye, J. (2000). Implementation and evaluation of a student-centered learning Unit: A Case Study. *Educational Technology Research and Development*, 48(3), 79-100.
- Chua, B. L., Tan, O.S., Liu, W.C. (2016). Journey into problem-solving process: cognitive functions in a PBL environment. *Innovations in Education and Teaching International* 53(2), 191-202.
- Duda, G (2014). The road to a project-based classroom. *Change: The Magazine of Higher Learning* 46(6), 42-45.
DOI: 10.1080/00091383.2014.969183
- Goldsmith, P (2006). Learning to understand inequality and diversity: gettings students past ideologies. *Teaching Sociology*, 34(3), 263-277.
- Glazewski, K & Ertmer, P. (2020). Fostering complex problem solving for diverse learners: engaging an ethos of intentionality toward equitable access. *Educational Technology Research and Development* 68, 679-702
DOI: 10.1007/s11423-020-09762-9
- Ladson-Billings, G. (1995). Toward a theory of culturally relevant pedagogy. *American Educational Research Association*. 32 (3), 465-491.

- Ladson-Billings, G. (2006). From the achievement gap to the education debt: understanding achievement in U.S. schools. *Educational Researcher*, 35 (7), 3 - 12.
- Lightbrown, P & Spada, N. (2013). *How languages are learned*. Oxford: United Kingdom, Oxford University Press.
- Pedersen, S & Liu, M. (2003). Teachers' beliefs in the implementation of a student-centered learning environment. *Educational Technology Research and Development*, 51(2), 57-76.
- Ravitz, J. (2010). Beyond changing culture in small high schools: reform models and changing instruction with project-based learning. *Peabody Journal of Education*, 85(3), 290-312.
- Salinas, M. & Garr, J. (2009). Effect of learner-centered education on the academic outcomes of minority groups. *Journal of Instructional Psychology*, 36(3) 226-237
- Tomlinson, C. (2015). Teaching for excellence in academically diverse classrooms. *Society*, 52(3) 203-209.
- Wright, W. (2015). *Foundations for teaching english language learners: research, theory, policy, and practice*. Philadelphia, PA: Carlson Publishing.
- Worthington, T. (2018). Letting students control their own learning: using games, role-plays, and simulations in middle school U.S. history classrooms. *The Social Studies* 109(2), 136-150.
- DOI: 10.1080/00377996.2018.1460791