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Operation Overload:
Career Planning Education in South Dakota

by

Amber Hulse

A Thesis Submitted in Partial Fulfillment
Of the Requirements for the
University Honors Program

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The University of South Dakota
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The members of the Honors Thesis Committee appointed
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ABSTRACT

Operation Overload:
Career Planning Education in South Dakota

Amber Hulse

Director: Julia Hellwege, Ph.D.

This thesis examines South Dakota's workforce issues and their potential relations to career planning education curriculum, policies, and practices in the state based on students' perspectives. Using 8-12th grade students' responses from consumer satisfaction surveys taken before and after a roughly hour-long career planning workshop the study provides several pieces of evidence of gaps in career planning education. Based on this evidence and national career planning curriculum standards or best practices the thesis recommends three actions to improve career planning education delivery: increasing access to counselors/hiring counselors, updating curriculum include comprehensive subjects and more often to current with the job market, and finally introducing short workshops online or in person to fill in the gaps and help the disparities of Career and Technical Education (CTE) district to district. These recommendations could help play a role in stopping the ripple effect failing CTE has on workforce development issues such as brain drain in South Dakota.

KEYWORDS: Career planning, CTE, workforce development, brain drain

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INTRODUCTION

South Dakota, the land of infinite variety, except when it comes to attaining higher education. The Rushmore state faces numerous issues in the area of higher education and workforce development, namely rural brain drain. The lack of highly educated individuals staying in the state could be due to a variety of reasons. Starting at the beginning of the process of achieving higher education is the preparation of students for higher education: career planning. Could the way that South Dakota initially prepares students to obtain higher education contribute to rural brain drain and other workforce development issues in South Dakota? This thesis seeks to determine if career planning is one possible solution to these problems by identifying potential gaps in career planning policy and processes for South Dakota students and how these gaps could be closed by updating career planning education policies, practices, and curriculum based on high school students' response to how the state prepares them for their futures. These findings could eventually lead to solving existing workforce development issues in the state such as rural brain drain.

To determine the gaps in career planning education and curriculum, this thesis uses data from satisfaction surveys from high school students in the state of South Dakota. By comparing the data from the surveys with national curriculum standards or best practices deemed by professionals in the career education field, the study aims to draw comparisons and potential correlations between where South Dakota is not meeting the mark in comparison to national standards and best practices. This thesis seeks to further determine if the data from the surveys further demonstrates these gaps in services

and career planning education and the potential rippling impacts the gaps can cause and may already be causing.

After comparing the state of South Dakota's current career planning education with the established best practices from experts in the field and national curriculum standards, identifying the gaps, and comparing these gaps to the survey data, this thesis will propose policy solutions or proposals to improve the delivery of career planning education and curriculum standards. By using survey feedback from high school students, this thesis will display where the current policies and curriculum standards are potentially falling short and ultimately use students' feedback to argue how policy changes and curriculum updates could make career planning education in South Dakota better.

Chapter one of this thesis reviews the literature surrounding career planning, how Career and Technical Education (CTE) is formally delivered or taught to students, how former studies have shown students respond to and receive this information, and why it is important students are taught this information. Chapter two covers specifically how South Dakota delivers career planning to students and the state's current career planning curriculum standards. Chapter three covers the workforce problems South Dakota currently faces regarding workforce development and higher education attainment. Chapter four reviews the data and methods for the study and survey. Chapter five examines the findings of the student surveys. Chapter six discusses these findings in comparison to the national standards and previous studies reviewed in chapters one and two. In addition, chapter six provides policy recommendations and potential political or government motivated potential solutions to any gaps displayed in the student surveys.

CHAPTER 1: LITERATURE REVIEW

What is career planning?

Career planning is defined as “a student-driven, adult supported process in which students create and cultivate their own unique and information-based visions for post-secondary success, obtained through self-exploration, career exploration, and the development of career management and planning skills” (“Academic Career Planning in Wisconsin, Implementing Academic and Career Planning”, 2016, 4). For the purpose of this thesis, career planning can more simply be defined as “the process through which students come to make career-related decisions” (Witko et al., 2005, 35). The process of career planning can differ depending on age or grade level. This thesis focuses on career planning in grades 8-12. For this age group, in the United States, career planning can generally consist of three types of formal education including: 1) career planning course or class, often referred to as Career and Technical Education (CTE), 2) career counseling or getting information about further education and financial assistance from a school guidance counselor, and 3) career exploration or work experience programs like internships or shadowing, career specific summer camps, and attending job fairs (Witko et al., 2005). Other than these three main methods, “the career planning process may also involve informal means such as considering a number of different occupations based on interests and skills and discussing one’s career plans with a variety of individuals (e.g. parents, friends, teachers, people working in the field, etc.)” (Witko et al., 2005, 35). This thesis focuses primarily on the career planning methods of formal career education or CTE classes and career counseling.

Formal Career Education Classes

In the United States, CTE or career classes often differ state-to-state as the federal government encourages states to establish high standards of college- and career-readiness but does not mandate curriculum, leaving what students should be taught, how it should be taught, and even what counts as a career class up to the state and local levels of government to determine (“College- and Career-Ready Standards”). In many cases, this creates a wide diversity of what will qualify as a CTE class and what career planning classes consist of. Moreover, the federal government’s high standards only focus primarily on the subjects of English language arts and mathematics (“College- and Career-Ready Standards”). Along with encouraging high standards in these subjects, the national government also encourages states to develop assessments based on these two subjects to determine if their curriculum is adequately preparing students to be college- and career-ready (“College- and Career-Ready Standards”). In addition to the diversity of what formal career planning education looks like, this means nationwide college- and career-ready assessments are not based on the information being taught in CTE or career classes but rather the information taught in core subject classes such as English language arts and mathematics (“College- and Career-Ready Standards”).

Career Counseling

National standards require what school counselor’s guidance must provide students. The Strengthening Career and Technical Education for the 21st Century Act, often referred to as Perkins V, is the national act pertaining to CTE which passed on July 31, 2018. The act added the following requirements for school guidance counselors:

- “Provide career exploration and career development activities through an organized, systematic framework

- Provide professional development for a wide variety of CTE professionals
- Provide within CTE the skills necessary to pursue high-skill, high-wage or in-demand industry sectors or occupations
- Support integration of academic skills into CTE programs
- Plan and carry out elements supporting the implementation of CTE programs and programs of study that result in increased student achievement” (“Legislative Affairs: American School Counselor Association”, n.p.).

In addition to these requirements, school guidance counselors usually work within three domains: academic development, career development, and social/emotional development (“ASCA Mindsets & Behaviors for Student Success: K-12 College- and Career-Readiness Standards for Every Student”). The American School Counselor Association outlines these domains as follows:

- “Academic Development – Standards guiding school counseling programs to implement strategies and activities to support and maximize each student’s ability to learn.
- Career Development – Standards guiding school counseling programs to help students 1) understand the connection between school and the world of work and 2) plan for and make a successful transition from school to postsecondary education and/or the world of work and from job to job across the life span.
- Social/Emotional Development – Standards guiding school counseling programs to help students manage emotions and learn and apply interpersonal skills” (“ASCA Mindsets & Behaviors for Student Success: K-12 College- and Career-Readiness Standards for Every Student”, 3).

Even though school counselors play numerous roles in a school environment, the access and availability of counselors varies state to state. The American School Counselors Association recommends at least one counselor for every 250 students. In the U.S. there is an average of 444:1 student-to-counselor ratio nationally and 47 states and the District of Columbia do not meet the recommended student-to-counselor ratio (“State-By-State Mandates for School Counseling”, 2019). Access to a counselor or “smaller student-to-counselor ratios are associated with higher rates of college enrollment and more knowledge of postsecondary education” (“State-By-State Mandates for School

Counseling”, 2019, n.p.). Additionally, there is an 11% difference in the number of students taking college entrance exams like the ACT and SAT at schools with low ratios versus schools compared to schools with high ratios. Despite these statistics, there are 20 states in the U.S. that do not require school counselors for grades K-12; 30 states nationwide require counselors for grades 9-12. (“State-By-State Mandates for School Counseling”, 2019).

Why is career planning important?

Regardless of how, or by which method, students receive career planning information, it is imperative students receive the information for a variety of reasons. “Researchers, Educators, and policy makers agree that college and career readiness are essential components of a P-12 education, however, there is no clear definition of what this means (Hilling, 2017, 10). Career counseling and planning overall exists to either prevent or remediate career related problems for individuals (Brown & Lent, 2012 as cited in Hilling, 2017), this can include career changes, educational debt, poverty, and unhappiness. Career and work are often an immense part of people’s lives. Career counseling, planning, and education can be very valuable and helpful for an individual’s overall happiness, and to resolve work related issues (Hilling, 2017). Career planning not only benefits the individual by increasing happiness, but also by increasing the individual’s human capital, social capital, and providing better supported life and career transitions (Hooley & Dodd, 2015). Additionally, career planning can have significant benefits not only for the individual receiving it, but also for economic benefits such as increased labor market participation, decreased unemployment, enhanced skills and knowledge base in the populous, as well as a flexible and mobile labor market (Hooley &

Dodd, 2015). These benefits can lead to second and third order positive impacts such as overall improved population health, decreases in crime, increased tax revenue, and a decrease in benefit costs, reduction in the deficit, increase productivity, higher living standards, and increased economic growth (Hooley & Dodd, 2015).

How do students receive career planning information?

Period of Instruction

It is important to look into how students receive career planning information through the formal methods of career planning education and what method of career planning education is received or digested the best. National policy standards and educators agree that the younger career planning education can begin the better, recommending “to begin talking to students about their academic and career interests during elementary and middle school” (“Career Planning: Students Need Help Starting Early and Staying Focused”, 2). Additionally, career counseling experts suggest that childhood is a critical stage in the process of lifelong career development (Cai, 2019). However, experts in the field realize at many schools or districts or does not always happen at such an early age. (Curry).

“The misconception that high school is the time to begin career and college preparation is nothing new, but vastly incorrect. Like any area of development, career development is sequential and builds over time. For example, we don’t expect students to arrive to high school and take algebra, geometry, or calculus without any prior math courses. Can you imagine how they would react? Yet, there are some schools and districts where the same thing happens with career and college development; some students are not given a cohesive career curriculum until they are in late secondary education and are still expected to know how to make thoughtful career and college choices. In order to properly prepare, students should have access to quality, elementary career and college curriculum that is consistently delivered through a comprehensive school counseling program” (Curry, 1).

However, despite experts stating that starting early is the way to go when it comes to career planning, that does not mean if a student does not receive comprehensive school counseling like described by Curry they are set up to fail. Some short, but effective doses of career planning education may also be effective. While some older studies show a positive correlation between academic achievement and the quantity of education (Wiley & Harnishfeger, 1974; Kidder, O'Reilly, and Keisling, 1974), research also indicates “that when students experience greater quantities of allocated time, their achievement is only very slightly better than those experiencing lesser quantities” (Cotton, 1989, 5). This means that while teaching career planning is important and should be started as early as possible, if a school district cannot implement K-12 career education curriculum, small amounts of time teaching career planning topics, or any topic for that matter can be valuable. For career planning, it truly is quality over quantity, as in some cases studies have shown “curriculum and instructional quality appear to have a much greater effect on achievement than do total hours of instructional time” (Baker, Fabrega, Galindo, & Mishook, 2004, n.p.). For example, a past study done over only five weeks showed progress in career planning for 11th graders (Hilling, 2017). While this form of career education was only a 5-week course, instead of curriculum infused into K-12 education, students still showed progress. This evidence shows that any information students can gather or learn can be helpful in the career planning process as one piece of knowledge could help a student decide on a career path or have better success in pursuing that pathway.

Supply of Information

It is not only important to discuss how long students should be taught this information, but also important to discuss where students choose to get their career planning information. In previous studies, students' inclination and preference to get career planning information or seek advice from sources other than their school counselor is "well documented" (Truong, 2011, 5). Previous studies have shown students' "primary confidantes included parents, friends and teachers" (Bardick et al., 2004 as cited in Truong, 2011, 5). These studies further noted students perceived their teachers as having more useful advice than their school counselors, their school counselors' services not "being tailored to their needs", and their parents as their primary resource for career planning needs (Bardick et al., 2004, 2005; Bernes & Magnusson, 2004; Gibbons et al., 2006; Magnusson & Bernes, 2002 as cited in Truong, 2011). These perceptions and findings are problematic as "besides stressing the importance of education, parents were unsure of how to effectively help their children with career development" (Bardick et al., 2005; Gibbons et al., 2006, as cited in Truong, 2011, 6). Additionally, parents, teachers, and especially other students are not trained or educated like school counselors in professional career education counseling. If a student seeks inaccurate or inadequate information or career planning education from a source that is not suitable, appropriate, or trained to provide the education or information necessary, severe impacts could occur to that student's decision-making process, awareness, and ultimately future career. There is a lack of research regarding students using the internet as a career planning resource. This thesis adds to the current literature by examining students' perceptions of the internet as a viable career planning education resource.

Factors in Students' Career Decisions: Awareness of Options/Opportunity, Motivation, & Initiative

How students make career decisions with and without career planning present is an important question. Lack of student motivation or initiative and awareness of information and opportunities (or lack thereof) are factors. "Student initiative is a key partner to effective counselling practice" (Truong, 2011, 5). Despite high student to counselor ratios in some schools, studies have "noted guidance professionals being underutilized, referencing as low as 8% of students to no more than 40% of students seeking assistance from counsellors" (Truong, 2011, 5). This means if a student is in the majority and does not attend a school with K-12 career planning education and does not possess the initiative to reach out to the school counselor, the student could lack pertinent and necessary information to plan their future.

Students' Feelings About Current Career Planning Methods

Studies have shown students expressed interest in career planning and reported that they seek support from parents and friends as well as their teachers. The students also expressed dissatisfaction with the current system of career counseling (Alexitch & Page 1997; Aluede & Imonikhe 2002; Hutchinson & Bottorff 1986; Tomini & Page 1992). The studies also found that fewer than one-third of students reported they received information from their high school counselor about career planning or post-secondary opportunities (Witko et al., 2005). The students in the studies also stated that the advice from their teachers about career planning was significantly more useful than the advice they had received from their high school guidance counselors. Hutchinson and Bottorff (1986) found large discrepancies between the services students reported needing

and the services they actually received, of which the most significant was career counseling. Of the students who reported having needed career counseling in high school (89%), 40% of students indicated that they had received career counseling and 20% of students who required college information reported having received it (Witko et al. 2005). Generally, prior studies have shown students are dissatisfied with the information they are receiving from their counselors if they are receiving any at all, and are seeking information from other sources, such as their teachers, parents, and peers (Truong, 2011; Witko et al. 2005). It still remains to be determined if receiving information from sources other than a school counselor is the best way for students to get their career planning information.

This chapter covered the review of the literature, what national career counseling best practices, standards, and curriculum are, what career planning education can consist of, and how students typically receive or feel about current CTE delivery methods. Chapter two will discuss the state of South Dakota's CTE standards and policies.

CHAPTER 2: CAREER PLANNING IN THE STATE OF SOUTH DAKOTA

As previously discussed, career planning varies widely and can be executed in various ways. This thesis examines the state of South Dakota's career planning processes and policies. In South Dakota,

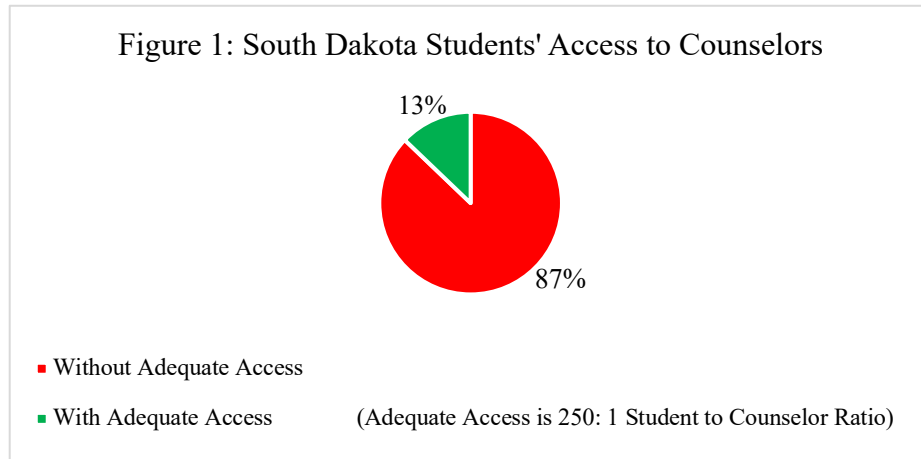
“the standards for career development guide the school counseling program to provide a foundation for the acquisition of skills, attitudes, and knowledge to make successful transitions from school to post-secondary training to the world of work throughout the life span. Employing strategies to achieve future career success, job satisfaction, and an understanding of the relationship between personal qualities, education and the world of work is an integral part of this domain” (Bardhoshi & Duncan, 2013, 10).

While the South Dakota Department of Education's mission or standard statement of career development reflects the importance of this type of education and immense benefits, the actual standards only go as far as recognizing 16 career clusters. These career clusters are designed to teach students the information and skills for their future education and careers (Bardhoshi & Duncan, 2013). However, there is no additional information regarding scholarships, financial aid, standardized testing, or other pieces in the career planning process. In comparison to other subjects such as mathematics, reading/writing, and even physical education, the current required career planning curriculum is more than lacking in substance. For perspective, physical education standards in South Dakota is a sixty plus page, researched and cited document (“Standards and Grade-Level Outcomes for K-12 Physical Education”, 2014). Additionally, education standards in South Dakota “are typically scheduled for review and adoption on a five-year rotation for career & technical education and seven years for core content” (“South Dakota Standards Revision and Adoption Timeline”, 2018, 1).

This means career and technical education standards are only updated every 5-7 years, far behind the rapid pace of the constantly shifting economy.

On top of the lack of detailed standards in the state of South Dakota, the state is one of twenty that does not require counselors in kindergarten through 12th grade. (“State-By-State Mandates for School Counseling”, 2019). On top of these statistics, if a student is lucky enough to attend a school with a counselor, their workload usually exceeds recommended levels. In South Dakota, the workload averages 306 students to 1 counselor, with about a dozen counties reporting students who have access to police officers or school/campus cops or resource officers but no counselors. The lack of school counselors in South Dakota could be due to the lack of competitive pay. South Dakota pays counselors less than average, lower than all neighboring states except Minnesota (“What Is the Average School Counselor Salary...”, 2020). The thirteen following school districts, many of which are small, rural schools, do not have a counselor: Buffalo, Doland, Emery, Langford, Howard, Mt. Vernon, Murdo, Oelrichs, Rosholt, Tulare, Summit, Waubay, and Webster (“South Dakota High School Counselors Directory”, 2018). The state has 448 counselors (Whitaker et al., 2019) for 697 schools (“List of school districts in South Dakota”), 290 of which are high schools (“South Dakota High Schools”). As shown in Figure 1, this means that 113,710 of the 130,471 (“List of school districts in South Dakota”) students in South Dakota experience a lack of adequate and recommended access to a counselor (Whitaker et al., 2019). With around 87% of students experiencing a lack of counselors, this is not an issue just for small rural schools. Sioux Falls, the state’s largest city, has one counselor for every 320 students on average for its three high schools. Roosevelt High School, the state's largest campus, sees the

largest ratio at 400:1 (Conlon, 2019). Overall, based on national standards, best practices, and comparisons to other states, South Dakota does not have adequate counselors or career planning curriculum.



Supplemental Career Planning Programs

Despite the lack of counselors and adequate career planning curriculum standards, South Dakota does have a variety of programs focused on career planning education and aiding school districts in preparing students for their futures. The two most notable programs that South Dakota state agencies provide are the WIOA (Workforce Innovation and Opportunity Act) and the interactive online educational website SDmyLife. WIOA

“is designed to help job seekers access employment, education, training and support services to succeed in the labor market and to match employers with the skilled workers they need to compete in the global economy” by connecting citizens with various labor programs and employers” (Hultman, n.p.).

One of the programs in South Dakota to help with career planning within the Workforce Innovation and Opportunity Act (WIOA) is the Title I Youth statewide funding which is utilized by both the Department of Labor and the Department of Education as the two departments partner

“to support 10 DLR [Department of Labor] staff located in local school districts across the state. The primary responsibility of these Career Launch SD Career

Advisors is to increase work-based learning opportunities for students. Work-based learning creates awareness of career options, especially those in South Dakota, resulting in informed decisions about career and educational pathways. To broaden the impact and reach of the Career Advisors, a regional model will be implemented as part of the 2020 Workforce Plan, with one Career Advisor serving several school districts. Each advisor will assist school districts in developing work-based learning opportunities, provide classroom presentations, coordinate business speakers, job shadows, internships, and industry tours. Career Advisors will also provide one-on-one career guidance” (South Dakota Unified State Workforce Plan, 2020, 1).

While these DLR Career Advisors aim to fill the gaps the high counselor to student ratio and lack of counselors in South Dakota creates, ten employees simply cannot reach every student that currently faces the reality of a lack of access to a counseling professional. Additionally, while these DLR staff are also assisting the school districts to better their career planning education with various supplemental educational opportunities, it does not change the fact that most students in South Dakota do not have adequate access to a counselor or proper formal career planning education according to national standards. This is evident as state agencies are hiring staff statewide to help school districts fill the gaps from these breaches as there are numerous ripple effects that can come from a lack of access to a counselor and career planning education that the current state of South Dakota workforce development cannot withstand.

The second most prevalent way South Dakota delivers career planning to its students is through SDmyLife which is described on the website itself as “an online career exploration and academic program for South Dakota students and educators” (“Welcome to SDmyLife”, n.p.). SDmyLife is the “one stop shop” for students in South Dakota when it comes to career education as it includes activities, resources and information to help students. The platform is used widely in curriculum in formal career planning classes as the platform’s “goal is to help students understand how their interests,

skills, and knowledge relate to real-world academic and career opportunities” (“Welcome to SDmyLife”, n.p.). While the website is a more accessible resource as it is located online for all South Dakota students, students need to get access to use the website from their school—leaving out homeschool children or students who attend schools that are not proactive or do not utilize the website without access the information it provides. Additionally, while the website provides a wealth of information for students on how to find their career path, it does not fully cover the entire process of pursuing a post-secondary path as information such as the financial aspect of higher education is rather thin. For example, the website only has seven scholarships listed and does not include links to South Dakota state school scholarships or financial aid offices or webpages. Additionally, while the website mentions the Federal Application for Student Aid or FAFSA, the link to the FAFSA is broken and SDmyLife does not provide any further resources to answer questions regarding how to apply for the FAFSA or even when the deadline is to apply (“Financial Resources SD My Life”). Overall, the website is informational and educational to help students find their career path or explore career paths but does not specifically cover central steps in the career planning process such as financial resources for the costs of higher education.

CHAPTER 3: SOUTH DAKOTA WORKFORCE PROBLEMS

As mentioned above, South Dakota’s career planning processes do not meet standards considered to be adequate by experts in the field. However, in order to determine if this is the root of some of the workforce issues in the state, first, we must explore what the various workforce issues are in the state.

Brain Drain

South Dakota is home to numerous workforce development issues. Most notable and investigated recently is an effect called rural brain drain. According to the study, called “Losing our Minds: Brain Drain Across the United States,” South Dakota’s most highly educated citizens are moving away at a higher rate than in nearly every other state (United States Joint Economic Committee). The study shows that the loss of skilled, educated residents can slow the state’s economic growth as well as cause further political polarization in the state and nation (United States Joint Economic Committee). In every census since 1960, South Dakota was shown to have experienced a net loss of people in the top third of educational attainment. In 2017, the most recent year for which data is available, South Dakota had the second-highest rate of gross brain drain in the country. None of South Dakota’s neighbors, meanwhile, made the top 10 list for gross brain drain, meaning they retained more of their highly educated children into their 40s. South Dakota also had the third-highest rate of net brain drain in 2017, meaning the state was third worst in the country at replacing its losses of highly educated people with highly educated people from somewhere else (Lowrey, 2019). Due to brain drain and other factors, only 52.4% of the students who did receive degrees in the last 5 years were employed in South Dakota (“SDBOR Graduate Placement Dashboard”).

Lack of Economic Growth

On top of battling the impacts of rural brain drain, South Dakota is already “on the low end of the spectrum in economic growth. South Dakota’s growth in annual Gross State Product is generally smaller than national GDP growth. “The state's \$51.6 billion GDP in 2018 is the fourth smallest in the nation. The five-year GDP annual growth rate of 2.9 percent is the 16th smallest. The national average is 4.1 percent” (Harkness, 2019, n.p.). While unemployment in the state is low due to a surplus of jobs (Harkness, 2019), other factors such as blizzards, flooding, drug addiction, low tax revenue, and poverty plague the states’ ability to faster economic growth (Groves, 2019).

Low Wages

In addition to minimal economic growth, South Dakota is also home to low wages in general and for teachers. “In 2017, average teacher salaries in states surrounding South Dakota ranged between \$5,300 and \$11,200 more per year than in the Rushmore State” (Lowrey, 2019, n.p.). “South Dakota has the third-lowest average wage for employed people in the country behind only Arkansas and Mississippi. People who don’t have technical training or a college degree are at a huge wage disadvantage in South Dakota, according to the federal wage data” (Pfankuch, 2019, n.p.).

Lack of College Matriculation & Higher Education Attainment

Not only are uncompetitive wages making it hard to fill positions that require higher education on top of educated people leaving South Dakota. Additionally, high-school graduates in South Dakota are choosing to not pursue higher education. More than a third of high school graduates from Sioux Falls, do not enroll in college in the two years after earning their diploma (Raposa, 2017). By 2020, 65% of jobs in South Dakota

will require some level of postsecondary credentialing. Yet statewide, every year almost 3,000 seniors in the state of SD are not furthering their education after high school (“SDBOR College Matriculation Dashboard”). In 2017, only 28.1% of South Dakotans 25 and older held a bachelor’s degree or higher. In December 2018, only 38.9% of the state’s population held an associate degree or higher (Ross, n.d.).

Failing to meet College Readiness Standards

Not only does South Dakota lack highly educated people, but the state also lacks when it comes to students’ college readiness. Only 33 percent of students met all of the college readiness benchmarks in 2015-2016 statewide. Narrowing the data by race shows that only 4 percent of Native American students met all of the college readiness benchmarks in the same timeframe for the state. Additionally, 17 percent of students are not eligible to enter or are not prepared for higher level education, training, or advancement opportunities offered by the U.S. Armed Forces (“South Dakota State Report”).

Lack of Needs-Based Financial Aid

In addition to the college readiness hurdles South Dakota students face, South Dakota remains the only state in the nation without a state needs-based scholarship. The state is in the process of creating a needs-based scholarship commonly referred to as ‘Dakota’s Promise’ (“Need Based Scholarship Program”). The policy has been approved, but the funding has not (Epp, 2019). Due to the lack of financial aid for students with high financial assistance need, South Dakota students are #1 in the country for the amount of student loan debt they incur, #3, if taking into account cost of living (“South Dakota Continues to...”, 2018).

Lack of College Entrance Exam Testing

On top of the lack of needs based financial aid, South Dakota also lacks in standardized testing when it comes to the SAT. Nationally in 2017, 60 percent of students took the ACT (Gewertz, 2019), and 54 percent of students took the SAT (“Class of 2017 Results...”, 2019).

In 2015-2016, 65 percent of students in South Dakota took the ACT (“SDBOR College Matriculation Dashboard”). However, in 2018 only **three percent** of South Dakota students took the SAT (“SAT Suite of Assessments...”). This lack of SAT testing could mean that students in South Dakota may be less educated on alternative testing options such as the SAT and therefore less competitive for college acceptance and scholarships. This is due to the SAT not having a science section like the ACT and South Dakota students performing the worst on the science section of the ACT in terms of college readiness standards (“The ACT Report Profile State”). For example, taking the SAT as a strategy to gain a higher test score if the ACT science section is pulling a student’s composite score down, could allow a student to meet benchmarks for admission and scholarships they would otherwise not meet with their ACT score.

CHAPTER 4: DATA & METHODS

This thesis studied the effectiveness of SD's career planning policies and career planning education curriculum in action and further determined if these planning and policies could be the root of workforce issues in the state, by surveying students on their perspective of their career planning education at schools across South Dakota receiving career planning workshops/presentations. From September 10th, 2019 to November 22nd, 2019 students at 24 schools across South Dakota in 20 counties participated: Pennington, Jackson, Bennett, Tripp, Potter, Edmunds, Hyde, Hand, Douglas, Davison, Bon Homme, Hutchinson, Turner, Union, Lake, Minnehaha, Brookings, Codington, Spink, and Beadle. To connect with the school districts and set up the workshops/presentations during which the surveys were taken, the author of this thesis sent an email out to all of the school counselors in the state listed on the South Dakota School Counselors Association School Counselors Directory explaining the initiative and asking if the school would be willing to have a workshop/presentation at their school. Due to the number of counselors that responded, over 2,300 7-12th grade students at 24 different schools (See Figure 2) received workshops/presentations, about career planning, higher education, and entering the workforce, offering the students tips and tricks on how to successfully navigate their own individual paths whether it be directly entering the workforce, technical or trade school, military, or a four-year school/university.

Figure 2: Number of Students at School Visit by School District

School/ District Name	Number of Students in Workshop/Presentation
Students Not Offered Survey/ Technical Issues= *	
Arlington*	20
Doland	30
Kadoka	40
Centerville	40
Hoven	40
Bison	50
Mount Vernon	60
Florence	65
Colome	75
Henry	80
Hill City	80
Rutland	80
Alcester/Hudson	80
Highmore	80
Sioux Valley	100
Bowdle	100
Avon	100
Bennett County*	100
Rapid City Central (Library)*	100
Wolsey-Wessington	103
Great Plains Lutheran (Watertown)	120
Corsica/ Stickney	200
Garretson	300
Dell Rapids	300
Total Number of Students Receiving Presentation/Workshop:	2343

These workshops/presentations lasted around an hour with attendance ranging from six students to 300 students in them due to the size disparity in school districts in South Dakota. Students were not required to take the surveys but were highly encouraged. Due to technological and time constraints not every student at every school in every workshop took the surveys. Students took a survey prior to the workshop/presentation and a second survey after the workshop/presentation, referred to as the Pre-Survey and Post-Survey. If time permitted, a third longer survey was distributed. Below is a description outlining the surveys in length.

Survey Description

Three surveys were given to the students who received the workshops/presentations. Two of the surveys were pre- and post-surveys for before and after the workshop/presentation. These surveys were 5 questions in length and included virtually the same questions for comparison before and after the workshop/presentation. The questions focused on students' feelings about their preparedness and career planning information offered at their school. Additionally, the two shorter surveys asked what topics the students wanted to know more about/ what topics were most helpful during the workshop/presentation. Below is a list of the questions on both short surveys (pre and post).

Pre-Workshop Survey Questions:

1) From your own experience, what difficulties have you faced in planning your career and making decisions for your future? Check any that apply: Choosing a Major/ What to Study, Finding Career Related Experiences (Internships, Shadowing, Camps), Getting a Job, Navigating Military Options, Picking a School or Employer, Scholarships & Financial Aid, Speaking to a Military Recruiter, Standardized Testing, None of These, Other

2) Are you satisfied with the career planning education, resources, and information your school offers? Yes or No

3) Using the 6 statements below, how do you rate your present feelings about planning your career and making decisions for your future. (For example, if you feel completely prepared, put a circle around 5)

I feel overwhelmed -- I feel well prepared

I feel alone -- I feel supported

I am inexperienced -- I have the skills

I am unsure what to do -- I feel confident to go ahead

I feel uncomfortable -- I feel comfortable

I feel skeptical -- I am committed to previously made decisions

4) What subjects below would you like to learn more about today? Dual credit classes, financial aid, making career decisions, military academies, military, scholarships, choosing a school, standardized testing, summer camps/ internships, other

5) Is there anything else you'd like us to know? (Short Answer, Not Required)

Post-Workshop Survey Questions:

1) Has the workshop dealt with some of your difficulties in planning your career and making decisions for your future? Yes or No

2) After participating in this workshop, but not including this workshop, do you feel that your school is adequately preparing you to make a career decision and plan your future with the career planning resources it offers? Yes or No

3) Using the 6 statements below, how do you rate your present feelings about planning your career and making decisions for your future. (For example, if you feel completely prepared, put a circle around 5)

I feel overwhelmed -- I feel well prepared

I feel alone -- I feel supported

I am inexperienced -- I have the skills

I am unsure what to do -- I feel confident to go ahead

I feel uncomfortable -- I feel comfortable

I feel skeptical -- I am committed to previously made decisions

4) Was the workshop helpful on any of the following subjects? Dual credit classes, financial aid, decisions, military academies, military, scholarships, choosing a school, standardized testing, summer camps/ internships, other

5) Is there anything else you'd like us to know? (Short Answer, Not Required)

The third survey was 36 questions in length and focused more on students' career choices and how they made those decisions. This survey used branch logic to direct students to questions specifically regarding their chosen paths (university, trade/tech school, military, directly entering the workforce). Additionally, like the pre and post surveys, the longer survey asked what areas the students felt the least prepared as well as where they receive career planning information along with this resource's effectiveness. In contrast from the pre and post surveys, this longer survey asked students where they would like to receive career planning from and focused more on how students would like to receive their information in the future/ in what way it would be more effective.

Survey Descriptive Statistics, Demographics, Size, & Sample

There are 290 high schools total in South Dakota ("South Dakota high schools"). This study surveyed students at roughly 21 of them. Based on student enrollment numbers for 2018 when this study was created, there were 37,972 students in grades 9-12 in South Dakota ("Student enrollment, SD Department of education"). This means approximately 455 students was the ideal sample size for high school students in SD with a 99% confidence level and a 4.7% margin of error. meaning all three surveys are in the range of being representative for their population. The pre-survey received 608 responses, the post survey received 610 responses, and the longer survey received 423 responses. Slightly more than 2,000 students received or attended the presentations/workshops. However, only around 600 students completed the surveys, making the response rate around 30% or one in three students. Explanations and more descriptions surrounding the conditions of the schools and the situations that may have contributed to the lower response rate are included in the next section.

Demographics were not collected from students in the pre and post surveys, however the longer surveys asked students about their grade, gender, race, and whether or not their parents attended college. According to the data, approximately 135-137 students did not answer the demographic questions, meaning the demographic data is only representative of two thirds of the total students who responded. This is presumably due to time constraints, the students simply ran out of time to complete the last 5 questions of the survey. That said, there were 64 freshman, 69 sophomores, 51 juniors, and 85 seniors. Three students responded they had already graduated, and 14 7th and 8th graders responded to the survey. These 7th and 8th graders most likely attended the sessions at smaller schools where middle schoolers and high schoolers attend classes in the same building, rather than having a separate middle and high school. Of the students who answered the demographic questions, 166 were females, 114 were males, and 6 preferred not to say. Sixty students responded they were potentially first-generation college students as their parents had not attended college. Two hundred sixty-six student respondents responded their parents had gone to college. Forty-nine of the students were American Indian or Alaska Native, four Asian or Asian American, six Black or African American, ten Hispanic or Latino, two-hundred twelve White or Caucasian, and six responded “another race.” While the distribution of race may not exactly reflect the diversity of South Dakota, the number of minority respondents was surprising as many of the schools that received the presentations/workshops and responded to the surveys attended small, rural schools with a lack of diversity in their student population, making the 212 statistic not surprising, but the number of minority students responding at least somewhat helpful to represent the diversity of students in South Dakota.

School District Descriptions, Background, & Realities

As stated previously, the schools the surveys and workshops/presentations were diverse in almost every nature. The schools were in a variety of conditions with various levels of technological access. At Bennett County School my cellphone did not have cell service. Doland was under construction and much of the school was unusable. The “office” was very difficult to find and was more of a closet with a few desks for administration. In contrast, Bison had a brand-new school and relatively updated technology despite the small size of the district. The smallest school visited was Doland, South Dakota with a total enrollment of 30 students grades 9-12. The largest school visited was Central High School, which serves over 1,000 students grades 9-12. However, the largest group of students that received a workshop/presentation was at Dell Rapids High School with a total enrollment of around 300 students grades 9-12th. Some of the schools were in rather large cities with numerous stores and lively main streets. Other towns did not even have a gas station or restaurant. Many of the schools were consolidated school districts, meaning that the district served more than one city or area like Corsica-Stickney and Alcester-Hudson.

Due to consolidated school districts choosing central locations in the county, many of the schools were located in very rural areas. Most of them required at least a two-hour drive from interstate 90 in South Dakota and over three-hour drive from Sioux Falls, South Dakota. Students at smaller schools continuously expressed their gratitude for the workshop/presentation. Many of them felt overlooked by the system because of the size of their school. They expressed that they felt as if they did not matter, or no one cared about what they did after high school as no one had ever taken the time to give

them information or help in the career planning process.

Due to the small size of many of the districts, several of the schools had limited staff. Hoven, for example, divided the workload of a counselor between different teachers. The English teacher handled the local scholarship applications, the history teacher handled SDmyLife, and so on. At Colome, the counselor had a medical accident, and the principal and secretary were attempting to pick up the workload on top of their own. Almost all of the schools had a K-12 counselor and at some of the schools the counselor went to other nearby school districts on certain days of the week. Even at schools with a full-time counselor, the students were hearing much of the information offered during the workshop/presentation for the first time. At more than one school, the counselor admitted that the workshop had taught them new material on multiple topics.

Due to the diversity of school districts, at some of the schools visited, not every student that attended the presentations was able to complete a survey or both the pre and post surveys. This was primarily due to technological restrictions: the students not being allowed to have their personal devices, not having a personal electronic device, the availability of service or Wi-Fi, and the QRL code to the survey not working properly. Additionally, time constraints from school schedules also made difficulties if the presentation started late or went long due to questions, leaving little time for the surveys or not giving the students time to complete the surveys in totality. All of these factors may have affected the data and outcomes, particularly for low-income students without access to technology and students at rural schools without adequate internet, cellphone service, or WIFI access.

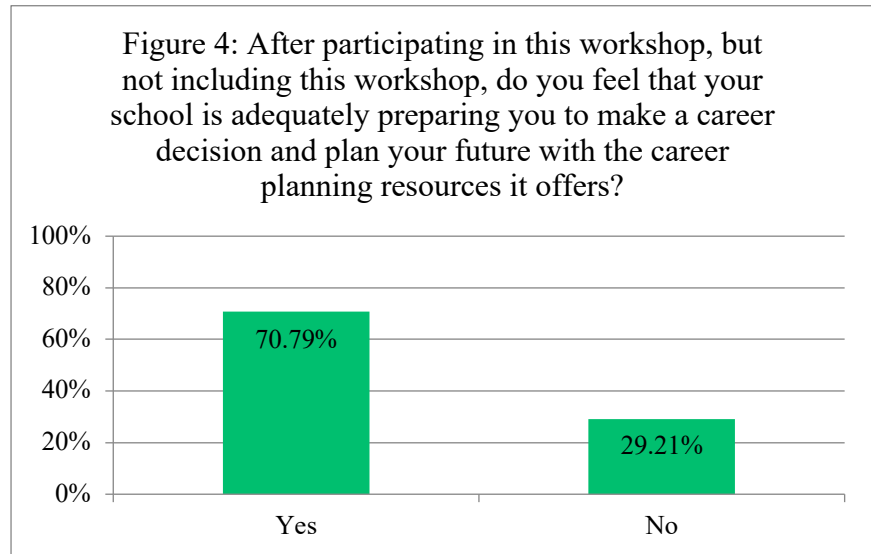
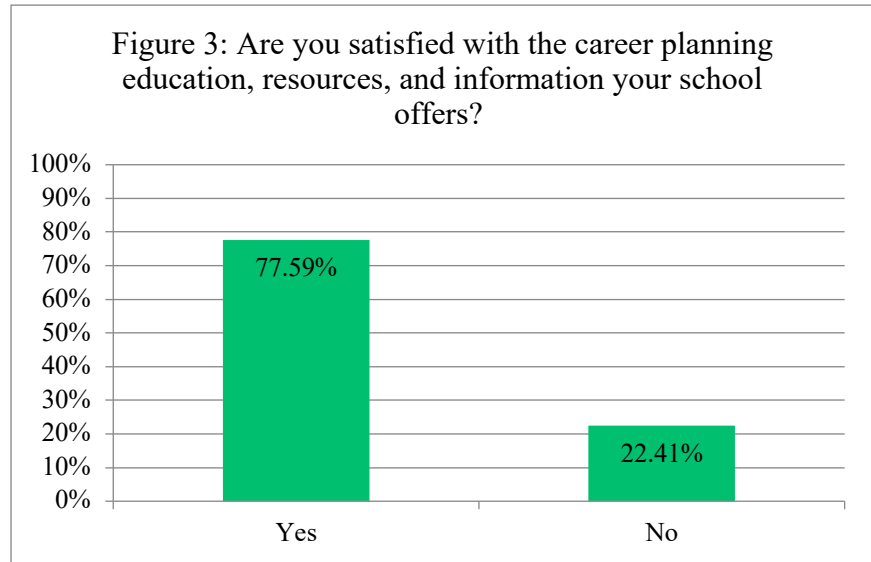
CHAPTER 5: SURVEY FINDINGS

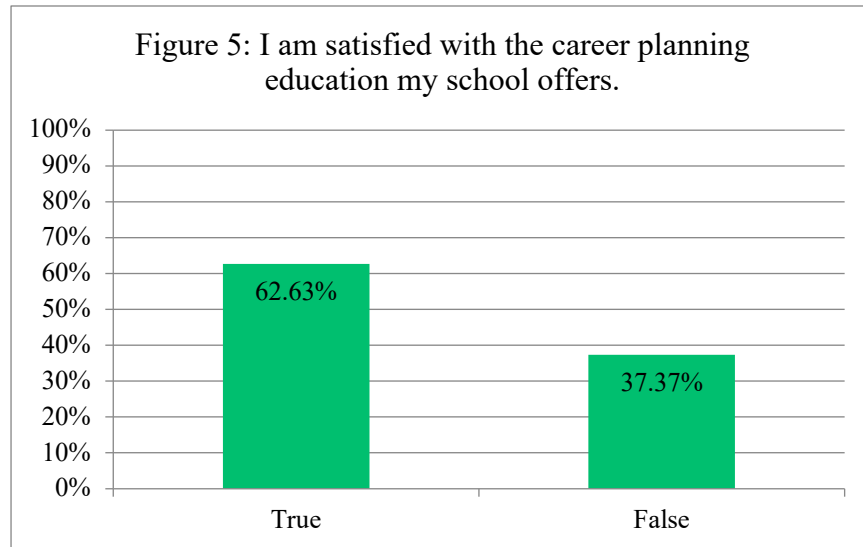
The findings of the three surveys expressed a variety of interesting results in three main areas: Students' Perception of Resources, Students' Preparedness, and Sending and Receiving Information to Students. While all of these topics are interrelated and overlap in some of the data, for better analysis the following divides these results into these three veins.

Perception of Resources

As shown in Figure 3 and Figure 4, before the workshop/presentation, 77.59% of students said they are satisfied with what their school offers for career planning information/education. After the workshop/presentation, 7% of students changed their minds and responded "No" when asked if they felt their school offers adequate career planning resources. This shows there is a false perception of resources to students, meaning that students are unaware of the lack of resources available to them. This could be due to students not realizing that there are resources not being made available to them, as they do not know the resources exist until they are made available. As discussed above, student initiative and awareness are factors in career planning education. Almost a fourth of students are not satisfied with their career planning education to begin with and after a career planning education presentation close to a third of students feel they do not have adequate career planning education. This change of mind shows students could be unaware of their lack of knowledge or have a lack of perception of the resources they do or do not have, which could make the actual adequacy and satisfaction levels of South Dakota career education even lower once students are exposed to and aware what adequate career planning education would be like. Figure 5 shows data from the longer

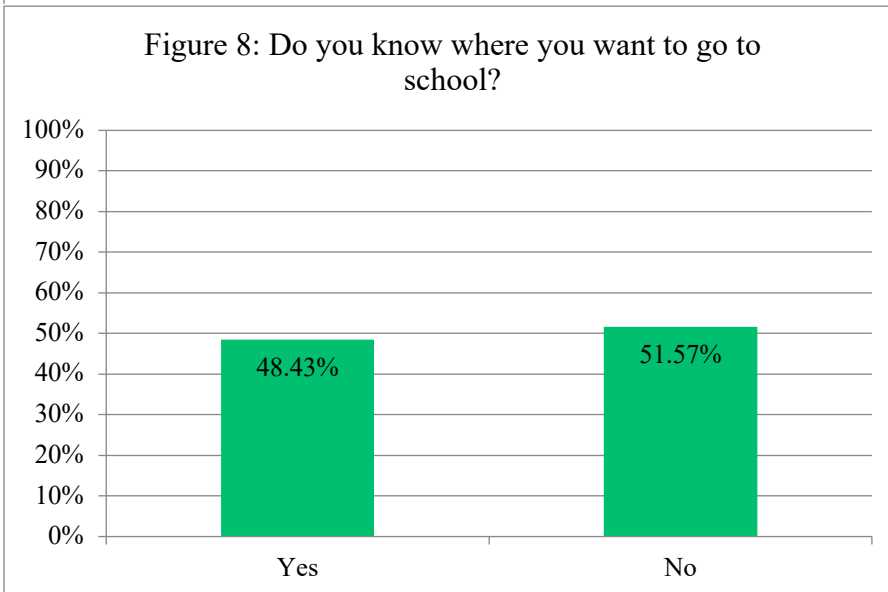
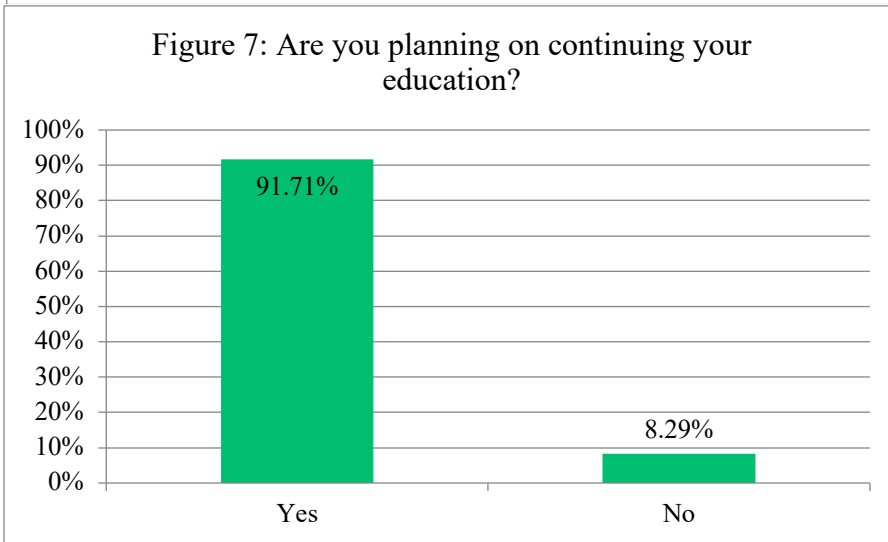
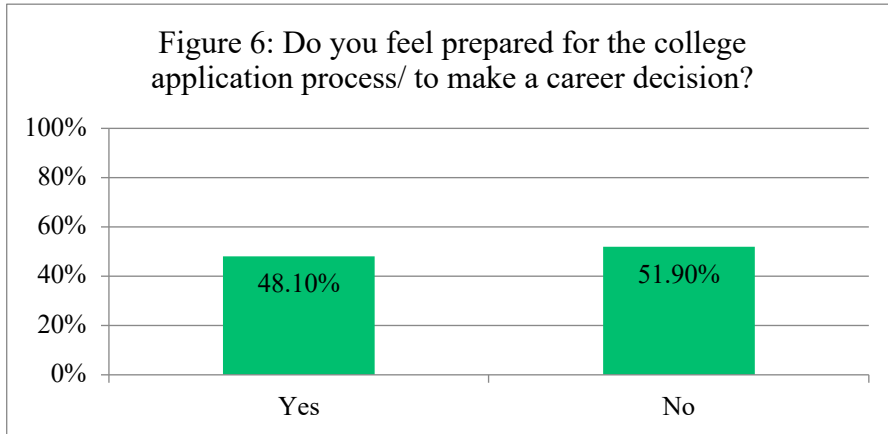
stand-alone survey, conveying a slightly higher percentage of that students (37%) are not satisfied with the career planning education at their school.

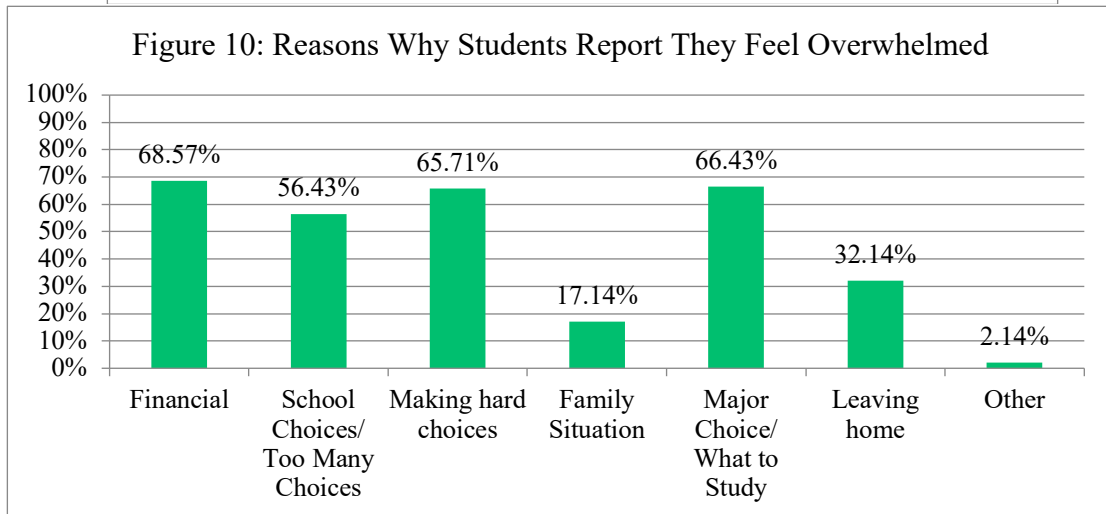
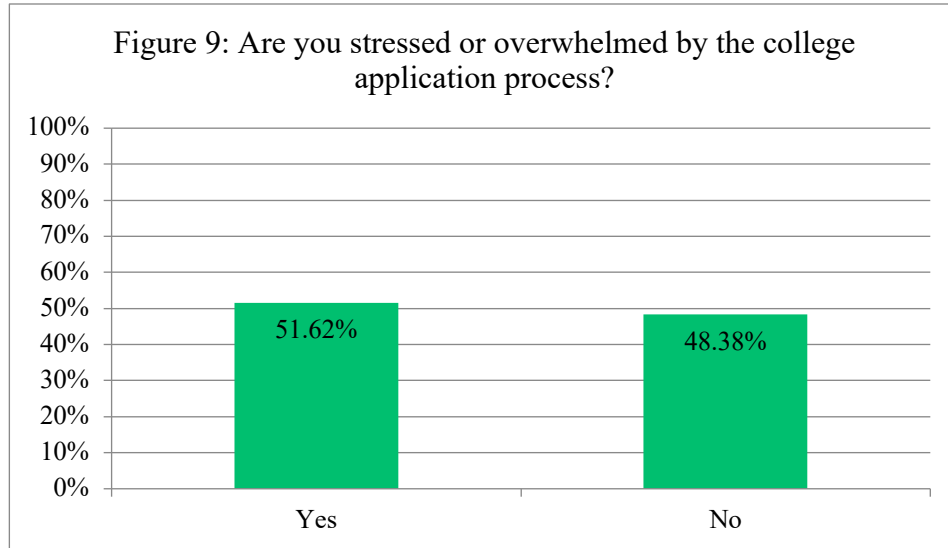




What is interesting and shown in Figures 6-10, is while a majority of students do not perceive the career planning resources their school offers as inadequate, almost 99% of students expressed some sort of struggle or stress regarding the career planning process. As shown in 7, almost 92% of students plan on continuing their education. Yet, as shown in Figure 6, 51% of students feel they are not prepared for the college application process or to make a career decision and in Figure 8, 51% of students do not even know what school they would like to attend. Figures 9 and 10 delve more specifically into the reasoning behind the stressors and show that slightly over half (51%) of the students surveyed felt stressed or overwhelmed by the college application process. Figure 10 conveys the various reasoning behind the stress or feelings of overwhelming for the students. The responses, shown in Figure 10, that were the highest when asked where the stress and overwhelming feelings derived from mostly deal with financial issues and making decisions with all the responses 50%+ relating to the cost of education (68%), choosing a major (66%), choosing a school (56%), and making these hard decisions in general (65%). Furthermore, using this data, it is not only obvious students are feeling unprepared and may require better career education, but it is arguable students

have a lack of perception, realization, or awareness of the information they are not receiving and could be through adequate career planning.

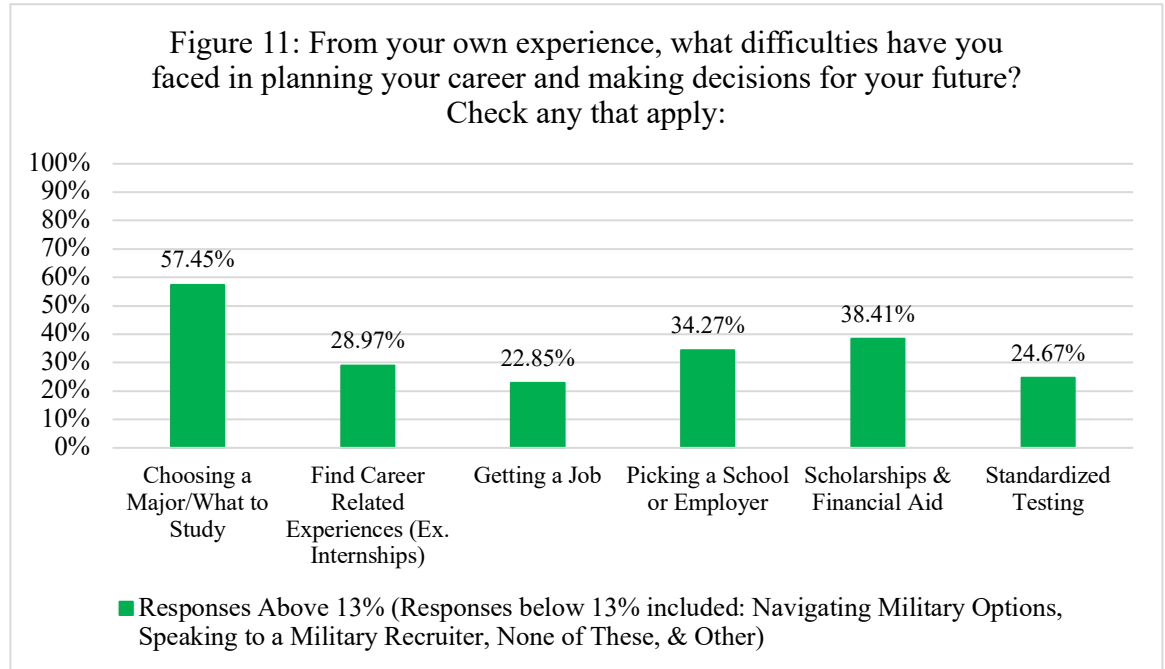




Students Preparedness

As evident from the responses in Figures 3-10, career planning education in South Dakota is not adequately serving many students, whether or not they are aware of it, demonstrated by the high percentages of students facing various struggles or stressors due to a lack of adequate career planning education. What can these high levels of responses showing students feeling stress and overwhelmed regarding the career planning process tell us about their level of preparedness? Figure 11 numerates various difficulties students responded they face in the career planning process. The highest response sitting at 57%, choosing a major or what to study, with the second highest response being scholarships

and financial aid at 38%. These responses show a correlation, the responses regarding the highest stressors or overwhelming reasonings in Figure 10 are also the highest responses for the most common difficulties faced by the student respondents in Figure 11. From this data, it is arguable that choosing a course of study and how a student will afford to financial that particular course of study are the top two issues students in South Dakota struggle with or are not receiving adequate career education covering these topics. Figure 11 also shows that only 12% of students felt they faced none of the difficulties outlined. This means that 88% of the student respondents face some sort of difficulty in the career planning process, another statistic that points to inadequate preparedness for the workforce or higher education and thus a lack of adequate career planning education.



Figures 12-16 show data from the same two Likert scale questions in three different ways. The student respondents were asked to rank on a scale from 1 to 5 (1 being the least or worst and 5 being the most or best) how they felt regarding their career decisions/ plans for after high school and their career education thus far. The students were asked the same question before and after the career planning presentation/workshop. As shown in Figure 14, the average of the responses sits around 3 out of 5, meaning most students felt somewhere in-between each of the polar answers. While Figures 12 & 13 show the exact number of student respondents for each response both before and after the workshop, Figures 15 & 16 demonstrate the overwhelming majority of students who feel somewhere in the middle when it comes to an overall feeling of preparedness. While students ranking 5 (meaning the most or best) on the responses outnumber the students who ranked 1 (meaning the least or worst) in almost every category before and after the workshop, the percentage of students who ranked 5 never exceeds 22%, with the 22% only occurring in one of the responses (I feel alone – I feel supported). This response decreases by less than 1% post-workshop, meaning 6 students after the workshop changed their minds and felt less supported, which could be another indicator of a lack of perception of resources and support. Nonetheless, after the workshop the weighted average of students' responses went up in all five responses, most notably from 3.05 to 3.37 for "I feel overwhelmed – I feel well prepared". This arguably shows as discussed previously that while K-12 career education injected into formal curriculum is preferred, that does not mean short sessions with large doses of information are not helpful for students to receive career planning education. Though, the next session further discusses the students' responses regarding the receipt and sources of career planning information.

Overall, these five charts show on average, the student respondents do not feel overwhelmingly prepared in a variety of ways for the next step in their lives. This is arguably due to a lack of adequate career planning education.

Figure 12: Pre-Workshop	1	2	3	4	5
	Number of Students	Number of Students	Number of Students	Number of Students	Number of Students
I feel overwhelmed -- I feel well prepared	54	93	273	143	44
I feel alone -- I feel supported	41	46	186	195	137
I am inexperienced -- I have the skills	34	86	242	158	75
I am unsure what to do -- I feel confident to go ahead	48	102	211	165	78
I feel uncomfortable -- I feel comfortable	31	60	234	180	97
I feel skeptical -- I am committed to previously made decisions	36	78	260	162	70

Figure 13: Post Workshop	1	2	3	4	5
	Number of Students	Number of Students	Number of Students	Number of Students	Number of Students
I feel overwhelmed -- I feel well prepared	31	73	217	208	75
I feel alone -- I feel supported	26	47	163	233	131
I am inexperienced -- I have the skills	23	59	234	200	79
I am unsure what to do -- I feel confident to go ahead	32	68	203	201	95
I feel uncomfortable -- I feel comfortable	25	49	194	221	108
I feel skeptical -- I am committed to previously made decisions	27	69	215	210	81

Figure 14: Weighted Average of Student Responses Before & After Workshop

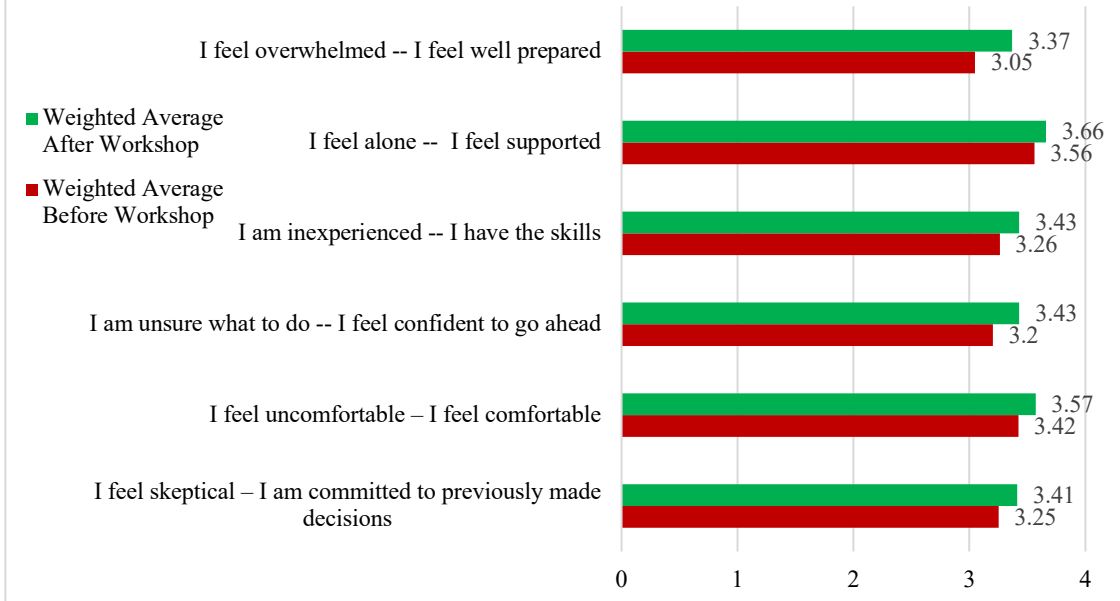


Figure 15: Percentage of Students For Each Response Before Workshop

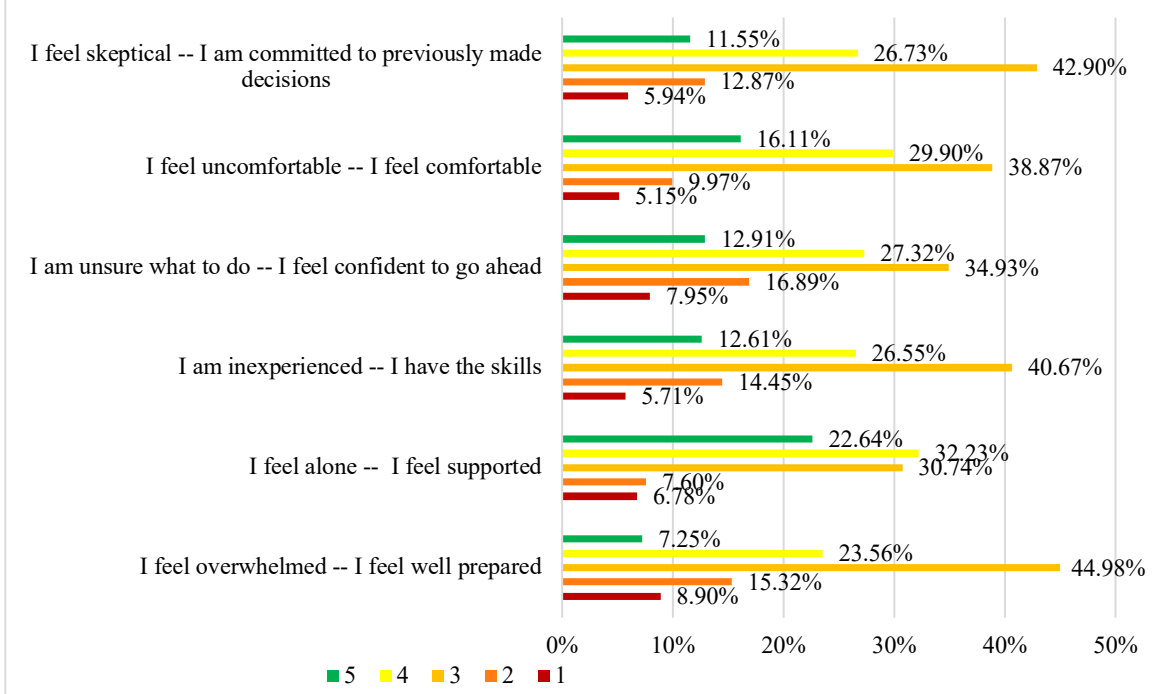
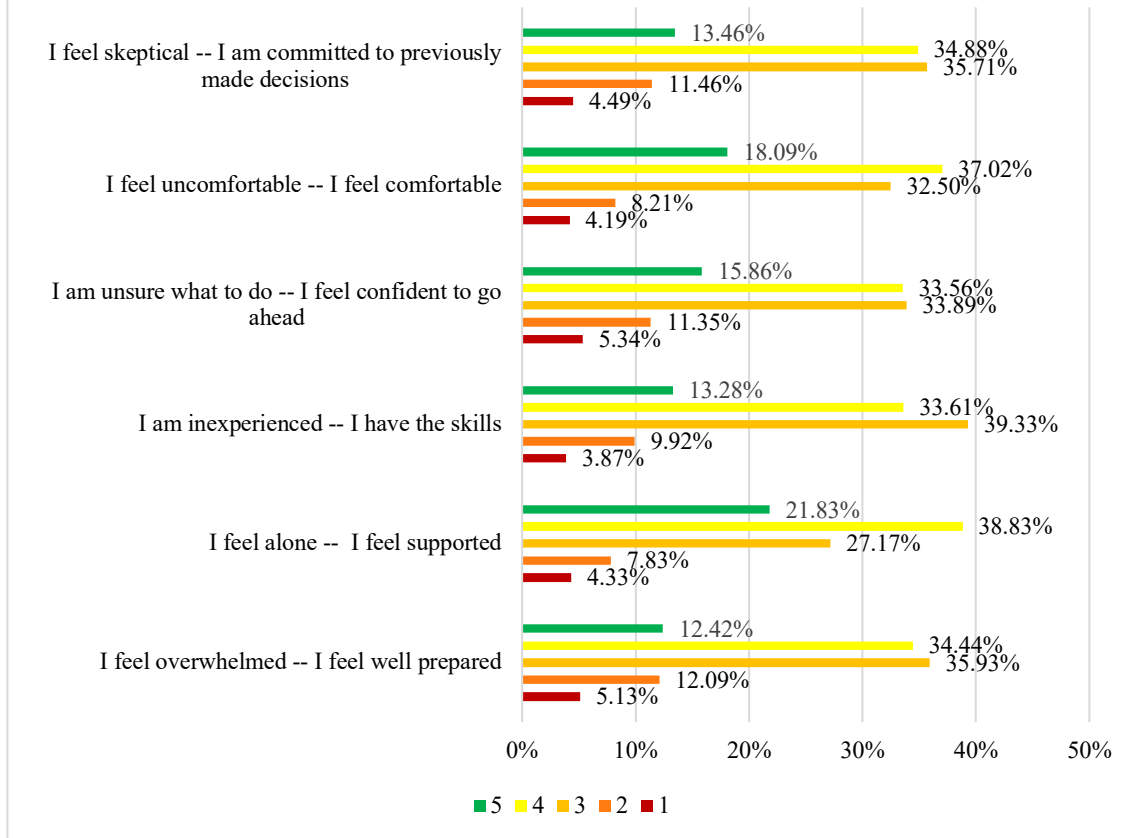
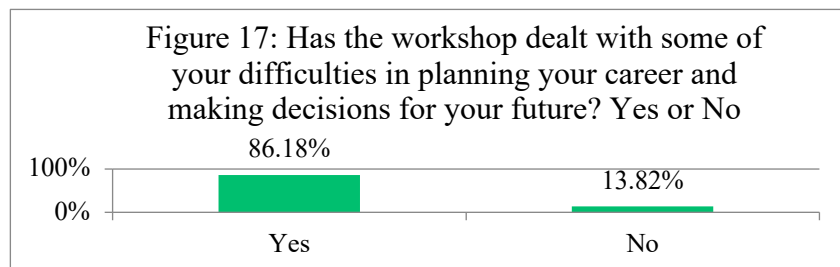


Figure 16: Percent of Students for Each Response After Workshop



Sending/Receiving Information

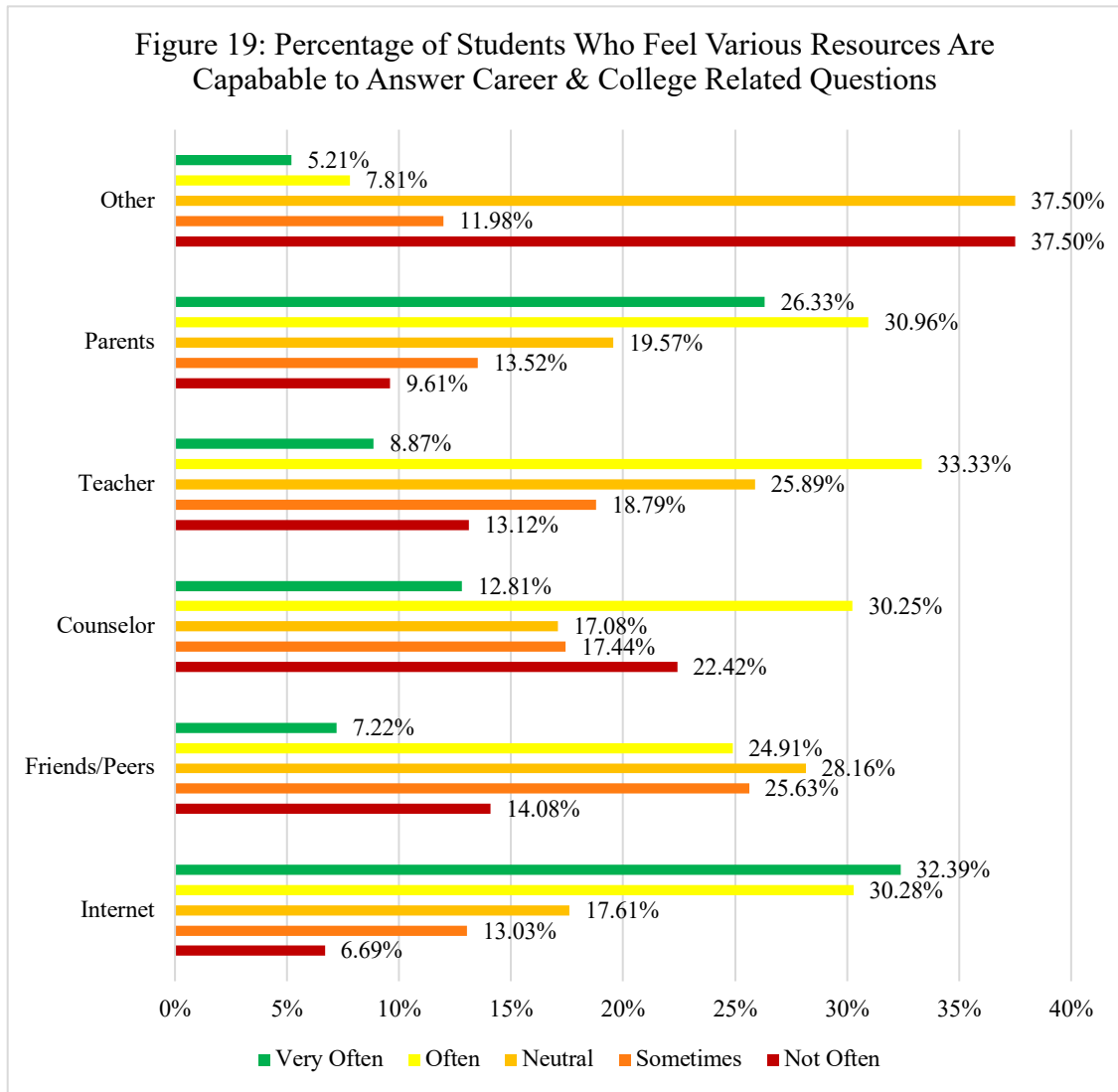
Continuing with discussion of how student receive information regarding their career planning education and decision-making process, as previously mentioned, Figure 14 shows evidence of a 45 minute to hour long presentation increasing students’ feeling of preparedness to make career decisions or plan for the next steps in their lives. Figure 17 also supports this theory, as 86% of students responded the workshop had dealt with some of the difficulties outlined in previous questions.



Figures 18, 19, and 20 show the same data in three different ways and discuss the various sources students get their career planning information from and which sources provide answers to their career planning questions. As shown in figure 20, the highest average weighted responses are for two sources: the Internet and parents. School counselor ranks fourth out of the six sources listed including “other”, only beating friends and peers out of specified sources of career planning information. In Figure 21, around 30% of student respondents find counselors can answer their career planning related questions “often,” yet 22% of student respondents “not often” to the same question. At 22% of students feeling their counselor can “not often” answer their questions, school counselor is the highest percentage “not often” source other than the “other” category. This could mean in some school districts students feel their counselor is a resource able to answer their questions and in others a different situation may be the reality. The internet wins as the source the most students (32.9%) feel can answer their questions “very often.” This could be due to the accessibility of incredible technology and search engines that can answer almost anything in seconds. However, this data could also show students are resorting to the internet to answer career planning questions because they are not getting adequate formal career planning education in their curriculum or from their school counselor. The responses regarding parents as a source for answering career planning information are also high in the “often” and “very often” categories, as shown in Figure 19. Students finding their parents as sources that answer career planning questions often and very often is also evident in Figure 20, where parents trail only the internet at 3.51 in the weighted average of responses. Both the internet and parents are the only two sources to break a 3.5 weighted average out of 5.

Figure 18: Which of these sources provide you with answers to any questions you may have?

	Not Often		Sometimes		Neutral		Often		Very Often		Total Responses
Internet	6.69%	19	13.03%	37	17.61%	50	30.28%	86	32.39%	92	284
Friends/Peers	14.08%	39	25.63%	71	28.16%	78	24.91%	69	7.22%	20	277
Counselor	22.42%	63	17.44%	49	17.08%	48	30.25%	85	12.81%	36	281
Teacher	13.12%	37	18.79%	53	25.89%	73	33.33%	94	8.87%	25	282
Parents	9.61%	27	13.52%	38	19.57%	55	30.96%	87	26.33%	74	281
Other	37.50%	72	11.98%	23	37.50%	72	7.81%	15	5.21%	10	192



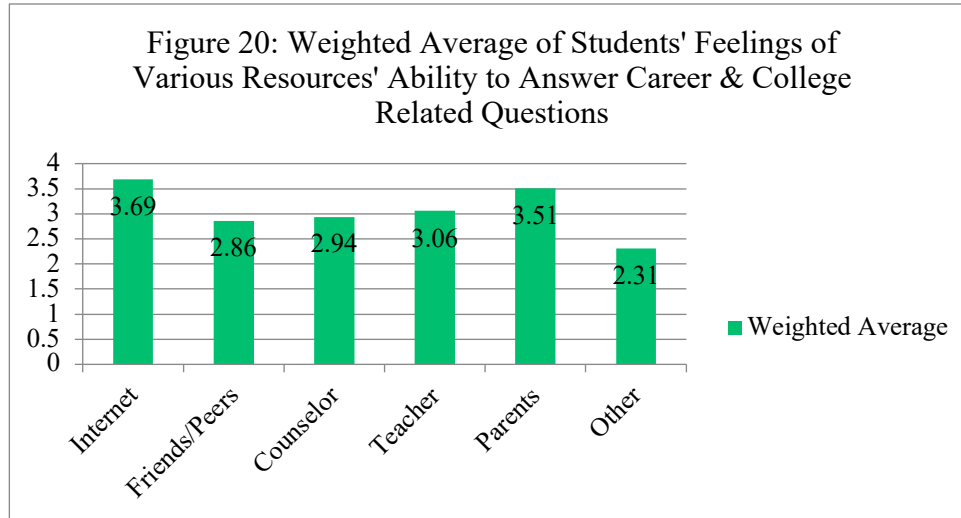


Figure 21 shows slightly different data regarding where students get their career planning information. The categories of “internet,” “parent,” and “teacher” still all outperform school counselor, however this data shows more students are getting their information from their parents and teachers than the internet, unlike the data in Figures 18-20. Due to the use of two different surveys, these types of discrepancies can be expected. However, both data sets reinforce the notion that students are going to their parents, their teachers, and especially their computers before their school counselors for answers to their career planning questions and for their career planning information. This could be problematic in a series of ways. A discussion of the implications of these findings is included in the following section.

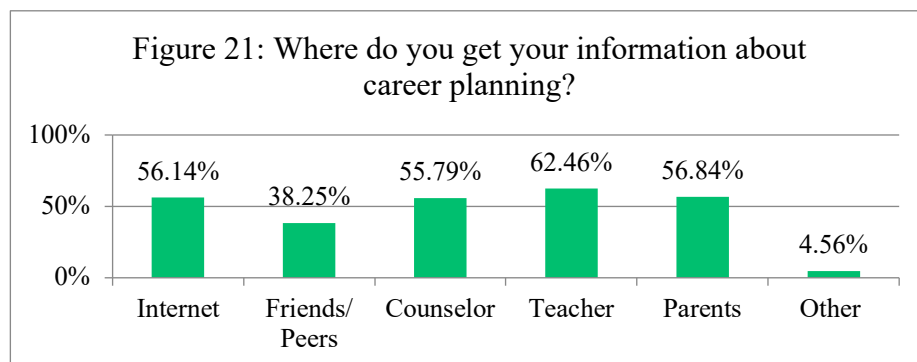


Figure 22 shows what students feel is the best source to receive their career information from, a slightly different question than where they are in reality getting the information or who/what source is answering their questions. Figure 22 shows the internet is still king in students' minds as 59% of students responded the internet was the best avenue. Teacher and counselor sit at 54% of respondents and parents just below at 50%. This is interesting as while student respondents seem to know that counselors and teachers are the best avenues to receive their career planning information other than the internet, students' weighted responses in Figure 20 show parents are answering their career related questions more often. Overall, all of these Figures including the internet as a source for career planning information had high percentages of students responding that the internet was the best source or the source, they felt provided answers the most often. This again could indicate a lack of access to other sources such as a counselor and also opens up the discussion if a student does not have an adequate support system at home with their parent(s), does not have a teacher discussing career options, and does not have access to a counselor, is providing information online the last hope? While a professional counselor educated to provide this education is obviously preferred, is internet education, especially in the post online learning era of COVID-19, a potential way to combat students falling through the cracks and receiving no career education at all? This discussion will continue in the next section. Figure 23 shows that close to one third (27%) of students do not feel they "have a place or person to go to get counseling or advice for career planning or decision-making." These students could use the internet to answer their questions and could be struggling to find tailored, accurate, and adequate information usually encompassed in formal career planning education.

Figure 22: What Students Feel is the Best Avenue to Recieve Career Planning Information

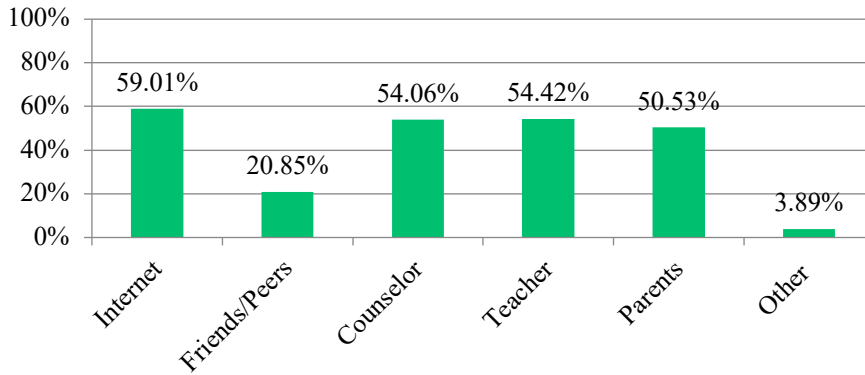
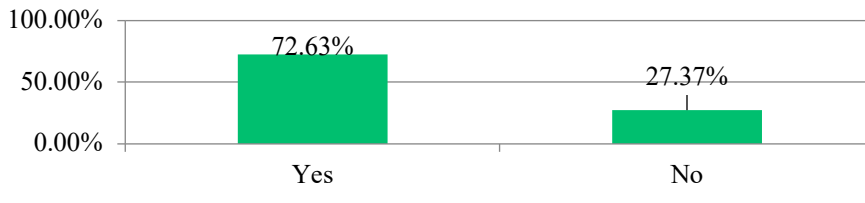


Figure 23: Do you feel like you have a place or person to go to get counseling or advice for career planning or decision-making?



CHAPTER 6: DISCUSSION & RECOMMENDATIONS

Based on the results from the student satisfaction surveys as well as national career planning curriculum and career counseling standards, there are several areas where the state of South Dakota could improve career planning education curriculum and delivery methods in order to avoid any potential workforce development pitfalls that could occur as ripple effects due to a lack of proper career planning education in K-12.

South Dakota diverges from national career planning policy standards/best practices when it comes to number of counselors and amount of access to counselors. South Dakota does not meet the national standard ratio of students to counselors in most areas or school districts. This is also supported by the student responses regarding where students are getting their career planning information and education from. Almost a third of students do not feel as they have a place or person to get counseling or advice for career planning or decision-making processes (Figure 24). Additionally, students' responses show they are choosing to rely on the internet to answer their questions, then their teachers and parents, before going to a counselor or seeking information from their school counselor. Thus, this thesis provides evidence that South Dakota needs to focus on hiring counselors or making it a priority to increase the access to school counselors for students in areas where the ratio is not being met.

Other than counselor access, a second issue this thesis points out is South Dakota's career planning curriculum requirements leave a number of topics out, particularly financial aid and how to choose what to study, which is evident in student's responses showing these are the areas of highest concern. While the state does teach the 16 career clusters to education students on the potential pathways and job options the

curriculum lacks the counseling or coaching to help students chose what path to go down. Again, this is evident in a high rate of students' responses showing struggle or stress regarding how to choose a major or what to study. While South Dakota has started to focus more on CTE career planning with Gov. Noem's recent Apprenticeship program for sophomores, the curriculum in South Dakota is lacking, in part because it is only updated every seven years, far behind industry standards. In the time this study was conducted, the coronavirus pandemic took place. Just in 2020 the job market and education system has changed significantly. If South Dakota CTE is not staying up to date with the job market and speed of business, we are preparing our students to be behind when they enter the workforce, which could be the beginning of the ripple impacts of workforce issues like brain drain in South Dakota. Thus, the curriculum should be updated to include more than just the 16 career clusters and further should be updated more frequently to reflect new industry standards and follow the speed of business.

In addition to curriculum standards and a lack of counselors, a third recommendation that could be gathered from this data is potential solutions to deliver career education while the curriculum is being updated or as a short-term solution. Short workshops/seminars from outside organizations or online could be a solution if hiring a full-time counselor is not realistic due to budget constraints or shortage of qualified applicants. The data from the surveys show that even 45-60 minutes of information help students feel better prepared to make career decisions. If in person seminars are not possible, building online mandated or required curriculum programs/ online seminar classes schools could use through SDmyLife is another potential solution. Most of the

information already exists on SDmyLife and developing an online seminar students could go through several modules at whatever pace each school district deems fit or can fit into their existing curriculum and class schedules. Many students expressed that the internet was the best way or avenue for them to receive career planning information, thus this could be another solution to combat the lack of counselors and uncomprehensive curriculum standards. These online education seminars could also help the disparity between school districts' career planning education across South Dakota. A students' zip code or school district should not be the reason they are behind in their career or higher education preparedness. Online education seminars might help close gaps between school districts and zip codes so kids in large cities like Sioux Falls at large schools are not falling through the cracks and students at rural schools in small towns like Doland are not left without information or access to resources.

Overall, students are not feeling supported or ready to make the next step when it comes to planning their careers and attaining higher education. This could be causing a ripple effect, attributing to matriculation rates, and further economic growth/ workforce development for South Dakota. Overtime, the lack of support in career development and fostering of students' passions and interests, further showing them pathways that could lead to successful careers in the state of South Dakota could be ultimately leading to detrimental impacts like brain drain. This thesis focuses primarily on career planning education in high school or prior to higher education, but future studies could be done to determine the same impacts at the collegiate level and more in-depth focus on students in South Dakota who do not advance to higher education and directly enter the workforce from high school.

CONCLUSION

South Dakota, dubbed as the land of infinite variety, does in fact face issues in the area of workforce development and higher education attainment and retention, namely regarding the lack of needs-based financial aid, student debt, and keeping its most highly educated, young citizens from leaving to seek jobs in other states. The Rushmore state's educational issues could be due to a variety of reasons. It is arguable these issues start at the beginning of the process of achieving higher education: career planning. This thesis examined if the way that South Dakota initially prepares students to obtain higher education contribute to rural brain drain and other workforce development issues in South Dakota. Based on responses from students in South Dakota and national standards and best practices from the field of career planning, South Dakota could improve their career planning process and education delivery in three ways. The first by hiring more counselors or improving the counselor to student ratio for better access to school counselors. The second by updating curriculum policies regarding career planning education to include more than just the 16 career clusters and by changing the timeline for the curriculum updates to less than seven years to keep up with the speed of industry and changing job markets. Lastly, by developing online education seminars or providing short in person workshop seminars to supplement career education for schools where hiring a counselor is not possible due to budget constraints or otherwise while the curriculum is in the process of being updated. These online seminars can also close the career education disparity between districts, providing education uniformity across the state on this subject. While these solutions, backed by data from students' responses, are only a few of many potential solutions to the multi-faceted workforce issues South

Dakota faces, starting at the beginning, with career planning, could be one way to kickstart South Dakota's workforce development and future economy by providing better support to the future of South Dakota, its youth, while they plan their future careers, hopefully staying in South Dakota, where they can seek opportunities and potential living up to its nickname: infinite variety.

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