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Examining Teacher Self-Efficacy of General Educators in Inclusive Settings in Northwest Arkansas Secondary Schools

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EXAMINING TEACHER SELF-EFFICACY OF GENERAL EDUCATORS IN INCLUSIVE SETTINGS IN NORTHWEST ARKANSAS SECONDARY SCHOOLS

By

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Acknowledgments

Many people have guided and supported me throughout this educational journey. I would like to take the time to acknowledge those who have played a role in this achievement. First and foremost, I would like to thank Dr. John Freeman, my professor and advisor, who was always there to support me and answer my questions along the way. You were always available to provide guidance, answers, clarity, and continuous words of encouragement that drove me to keep writing when I needed it most. I am sincerely grateful to have had you as my advisor throughout this journey.

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Lastly, to my fiancé Jason, you are always the light at the end of my hardest days. Throughout this journey, you have continuously supported me, encouraged me, and told
me I could continue when I wasn’t sure if I could. Thank you for your patience when I was frustrated, and your unwavering support for anything I want to do. You never complained if I had to cancel plans to write, but would ensure I had a quiet house and snacks so I could get the most work done. I am thankful that you are in my corner and that you are the person I get to continue this life with.
The purpose of this mixed methods study was to examine teacher self-efficacy among general education teachers in inclusive settings in the Northwest region of Arkansas. The study further explored factors that contribute to the perceived level of efficacy, and the role of teacher education programs and professional development sessions in the level of self-efficacy. For the quantitative portion of this study, 101 general education teachers from six districts in Northwest Arkansas completed a survey with Likert-style questions. Qualitative data were provided through six follow-up interviews among participants that participated in the survey. Results from the study indicate that the overall level of self-efficacy in teaching students with disabilities is fairly high, especially efficacy in instruction. However, qualitative data indicated the teachers’ ability to consistently implement instructional strategies, behavioral strategies, and student IEPs in the classroom is low, indicating a disconnect between knowledge of strategies and consistent implementation in the classroom. This study also revealed that general education teachers feel the least amount of confidence in collaborating with parents of students with disabilities. Furthermore, findings revealed that general education teachers feel their teacher preparation program did not prepare them to meet the needs of students with disabilities and that more experienced-based training would have better prepared them. Lastly, among the teachers studied, they indicated they would like more relevant professional development sessions regarding teaching students with disabilities and
meeting the diverse needs of the classroom. Using data from this study, school and
district leaders and teacher education programs should reflect on their current practices
for supporting general education teachers in teaching students with disabilities, and
implement positive systematic changes that address the needs of their current teachers in
Northwest Arkansas.

Keywords: teacher self-efficacy, inclusive practices
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Chapter I: Introduction

Due to educational policies, legislation, and the increased efforts of advocates for the rights of people with disabilities, the number of students with disabilities being educated in mainstream classrooms alongside their non-disabled peers continues to grow each year (Forlin & Chambers, 2011; Mullings, 2011). In the U.S. public education system today, over 450,000 students with disabilities are being educated in general education classrooms for more than 80% of their school day (National Center for Education Statistics, 2019). As this inclusive movement continues to gain momentum, schools across the globe are identifying and implementing inclusive practices to ensure all students receive high-quality instruction alongside their peers (Byrd & Alexander, 2020; McMaster, 2012; Miskovic & Curcic, 2016).

As a result of the advancement of inclusive practices and educating students with disabilities alongside their peers, the general education teacher now plays an important role in the success of inclusive programs and meeting the academic and non-academic needs of diverse learners in their classrooms (Abbas, 2016; Forlin & Chambers, 2011). Due to the added roles of inclusive practices, the perceived level of preparedness of general education teachers to adequately teach students with disabilities in their classrooms continues to saturate current educational research and literature, indicating general education teachers do not feel adequately prepared to teach students with disabilities in their classrooms (Byrd & Alexander, 2020; Flower et al., 2017; Kantor 2011; Mullings, 2011; O’Conner et al., 2016; Sammon et al., 2020). Furthermore, Tschannen-Moran and Woolfolk-Hoy (2001) relate teacher perception of his or her preparedness and capability to produce positive outcomes of student learning to teacher
self-efficacy, and these beliefs influence persistence, resilience, effort, and level of aspiration in the classroom, all of which have positive effects on student achievement. Due to the increased roles of general education teachers stemming from high levels of inclusion, there is a current need to target the level of teacher self-efficacy as it relates to teaching students with disabilities in general education classrooms. This will provide insight on how to better prepare our teachers and give them the tools needed to provide high-quality instruction to every student in their classroom.

This study addressed the current level of secondary, general education teacher self-efficacy in teaching students with disabilities in mainstream classrooms. An in-depth look into this topic provides more information relevant to teacher preparation programs, professional development sessions, and better outcomes for students with disabilities in general education classrooms.

**Background of the Study**

Before the passage of the Individuals with Disabilities Education Act (IDEA) in 1975, mainstream education routinely excluded millions of children with disabilities (Demonte, 2010). These children were often educated in alternative settings until IDEA identified the concept of Least Restrictive Environment (LRE) requiring students with disabilities to be educated alongside their general education peers, or as close as possible to the general education expectations (Mullings, 2011). In response to IDEA and identifying the LRE for all students regardless of disabling conditions, more legislation such as No Child Left Behind (NCLB) in 2001, the most recent amendment to IDEA in 2004, and Every Student Succeeds Act (ESSA) of 2015 continue to ensure fair treatment for students with disabilities (Mullings, 2011). Because of the continued push for
equitable educational opportunities, schools and districts across the country began to move toward inclusive practices with the intent to maximize education for all students (Burstein et al., 2004).

As a result of inclusive practices, the percentage of students with disabilities being educated alongside their general education peers has risen steadily. In 1990 only 33% of students with disabilities were educated at least 80% of the time in a general education classroom, compared to 65% in 2019 (National Center for Education Statistics, 2019). That means that in 2019, more than 450,000 students with disabilities were being educated in mainstream classrooms for the majority of their school day. The significant increase has played a major role in the research regarding inclusive education and teacher preparation as it relates to teaching students with disabilities in mainstream classrooms.

Research suggests the increase of inclusive practices provides positive outcomes for students with disabilities and general education students alike. Specifically, outcomes for students with disabilities include academic, social, and behavioral gains, fewer absences, and better post-secondary outcomes regarding employment and independent living (Bui et al., 2010). Although concerns are often raised regarding the educational impact for typical peers in inclusive settings, research indicates no differences in instructional time and student engagement. There is evidence to indicate that it results in a greater number of typical students progressing in reading and math as compared to non-inclusive general education classes (Bui et al., 2010).

Increased legislation and ongoing research regarding inclusive practices have triggered a significant increase in opportunities for students with disabilities to access general education courses and curricula, however, research continues to suggest that
general education teachers feel unprepared to serve students with disabilities in their classrooms (Burstein et al., 2004). Kantor (2011) indicated that general education teachers who were teaching in mixed-ability classrooms felt they were not adequately prepared for reaching all students and revealed the need for staff development that targets specific student populations and environmental supports. In another study conducted by Idol (2006), only 42% of general education teachers felt they were adequately skilled at making adaptations for students with disabilities in their classrooms. Based on these data, the researcher recommended that increased training be provided to current general educators to provide effective inclusive practices in elementary and secondary schools and increased educational opportunities for preservice teachers (Idol, 2006).

Along with providing appropriate adaptations and supports in the general education setting, O’Connor et al. (2016) conclude that general education teachers are lacking essential information about IDEA, and teachers are typically misinformed regarding the basics of special education law. They suggest that teachers need increased education and training regarding the laws surrounding special education. Findings from the study conducted by Grskovic and Trzcinka (2011) are consistent with other research, indicating that content knowledge is taking precedence over pedagogy in teacher training programs, but it is inconsistent with the current needs of teachers who work in inclusive classroom settings.

Bandura (1994) defines self-efficacy as the belief one has about his or her ability to perform a task which ultimately influences how they think, feel, and act. A teacher’s self-efficacy is derived from his or her ability to produce and master pedagogical strategies and content-related curriculum at a high level to meet the needs of the students
in the class and produce increased learning (Zee & Koomen, 2016; Zundans-Fraser & Lancaster, 2012). Researchers argue that specific variables such as knowledge, training, and experience are influencing teachers’ attitudes towards inclusive practices and can have a negative impact on teacher self-efficacy on teaching students with disabilities. Not only do teachers need a positive attitude towards inclusion, but they also need to possess the skills for the program to be successful (Dawson & LaRon, 2013). In a study conducted by Zundans-Fraser and Lancaster (2012), researchers found the level of self-efficacy preservice teachers hold towards teaching students with disabilities plays a key role in the outcome of the inclusive practice. Essentially, teachers are expected to provide high-quality instruction to every student that comes into their class, yet they continuously report feeling inadequately prepared, which in turn negatively affects teacher self-efficacy.

Problem Statement

Students with disabilities are receiving their education alongside their general education peers now more than ever. In the U.S., 65% of students with disabilities are being educated in mainstream classrooms (National Center for Education Statistics, 2019). However, research suggests that preservice general education teachers do not believe that teaching students with disabilities is their responsibility. They continue to report feeling unprepared (Burstein et al., 2004; Grskovic & Trzcinka 2011; Kantor, 2010; Mullings 2011; O’Connor, 2016) and lack feelings of self-efficacy (Boling, 2007). In a time when general education teachers are being called to provide high-quality instruction to students with disabilities through inclusive practices, there is now a need for more targeted research to explore the level of self-efficacy in their ability to teach
students with disabilities in an inclusive setting, and the factors that influence their level of self-efficacy.

The problem addressed in this study was the fact current general education teachers reportedly feel underprepared to teach students with disabilities in their classrooms. This in turn leads to lower perceptions regarding students with disabilities in the classroom and impacts the outcome of inclusive practices. To combat the current perceptions regarding inclusive practices and increase high-quality instruction for students with disabilities, this targeted research attempted to aid in a better understanding of the factors associated with secondary, general education teachers’ self-efficacy towards teaching students with disabilities in their classrooms and better inform teacher preparation programs for preservice teachers and professional development activities for established teachers.

**Purpose of the Study**

The purpose of this mixed methods study was to explore secondary, general education teachers’ current level of self-efficacy in teaching students with disabilities in mainstream classrooms. Further analysis was performed to identify perceived strengths and weaknesses and factors that influence self-efficacy as it relates to providing high-quality instruction to students with mixed abilities.

**Research Questions**

The following qualitative and quantitative research questions guided this mixed methods, explanatory sequential design study (Creswell & Creswell, 2018). For the quantitative portion of this study, the data were collected via survey and the research questions were as follows:
1. What is the current level of self-efficacy of secondary, general education teachers on teaching students with disabilities in general education classrooms?
   a. What is the current level of self-efficacy among secondary, general education teachers within the three factors, efficacy to use inclusive instruction, efficacy in collaboration, and efficacy in managing behavior?

2. Is there a difference in self-efficacy among secondary, general education teachers and years of teaching?

3. Is there a difference in the level of education and the self-efficacy of secondary, general education teachers?

4. Is there a difference in the type of certification and the level of self-efficacy of secondary, general education teachers?

5. Is there a difference by school district on the level of teacher self-efficacy among secondary, general education teachers?

   Qualitative data were gathered through interviews with general education teachers who instruct students with disabilities in their classrooms alongside non-disabled peers. These data were gathered to further explain areas of low self-efficacy from the quantitative survey. For the qualitative portion of this study, the research questions were as follows:

6. What factors contribute to perceived strengths and weaknesses regarding self-efficacy of secondary, general education teachers teaching students with disabilities?
7. What roles do teacher education programs and continuing professional development workshops play in the perceived levels of teacher self-efficacy for general education teachers instructing students with disabilities?

**Theoretical Framework**

Bandura’s (1986) self-efficacy theory, grounded in social cognitive theory, serves as the theoretical foundation for this mixed methods, explanatory sequential design study. Bandura (1986) defined self-efficacy theory as “people’s judgment of their capabilities to organize and execute courses of action required to attain designated types of performance” (p. 391). Bandura (1997) indicated that a person’s perception of their performance will ultimately affect their desired outcome. In this study, the researcher attempted to identify current levels of teacher self-efficacy regarding teaching students with disabilities in mainstream classrooms and identify variables that contribute to low self-efficacy. Chapter II includes a more detailed description of this theoretical foundation.

**Significance of the Study**

The educational system in the U.S. constantly evolves to reflect current research and practice, as well as societal needs. Increasing numbers of students receiving special education services in the general education classroom have led to frustration among general education teachers as they attempt to produce high-quality instruction for all students. Because of the growing number of diverse and inclusive school programs, general education teachers should become better equipped to provide differentiated resources, modifications, and accommodations in their classrooms while also
implementing various strategies based on the student’s individualized education plan (IEP), and become increasingly collaborative with special education teachers.

This study attempted to add to the body of literature by investigating general education teachers’ current self-efficacy for teaching students with disabilities in the inclusive classroom setting. The results of the study may act as a call to action that will encourage teacher education programs to improve the preparation of preservice general education teachers regarding inclusive practices. This study may also provide school districts with a foundation to create professional development activities that target factors contributing to low teacher self-efficacy when teaching students with mixed abilities.

**Research Design**

A mixed methods explanatory sequential design was used to determine the current level of secondary, general education teacher self-efficacy when teaching students with disabilities in general education classes and to identify factors that contribute to low levels of teacher self-efficacy. The explanatory sequential design is a two-phase design concerned with obtaining qualitative data to explain in more detail the previously reported quantitative data (Creswell & Creswell, 2018). Because the study participants teach in multiple settings, subject areas, schools, and teach students with varying degrees of abilities and class sizes, the follow-up qualitative data provided the researcher with an in-depth look into the specific factors or variables that impact teacher self-efficacy.

For the quantitative portion of the study, the researcher sent surveys to all secondary, general education teachers teaching in one of six school districts in northwest Arkansas, and who teach students with disabilities in their classrooms alongside general education students. The quantitative data utilized Sharma et al.’s (2012) *Teacher Efficacy*
to Implement Inclusive Practices (TEIP) survey, which is a Likert-scale survey on teacher self-efficacy for teaching students with disabilities in a general education classroom (See Appendix A).

For the qualitative portion of this study, the researcher used purposive sampling of the participants in the same six districts for follow-up interviews, with the ultimate goal of capturing multiple perspectives and experiences to gain a deeper understanding of the current level of self-efficacy and factors that influence the self-efficacy among participants. The data from the interviews were collected through the use of a protocol consisting of a standardized, open-ended instrument (See Appendix C). A standardized, open-ended instrument uses questions determined in advance of the interview, asked in an open-ended manner to allow participants to respond in any manner they wish. The advantage of this style of interviewing is that it allows for probing questions by the interviewer when a point arises unexpectedly (Patton, 2015). The interviews attempted to provide a more in-depth understanding of the quantitative data and assist in identifying factors related to self-efficacy.

The collection of both quantitative and qualitative data took place over four weeks in November and December of 2021. During week one, the self-efficacy surveys were distributed via QuestionPro®, an online survey instrument tool, and participants had two weeks to complete the survey. Using the TEIP scale, results were then analyzed using means, standard deviations, one-way ANOVAs, and an independent samples t-test.

A total of six interviews were conducted and took place over two weeks. Participants were given the option of virtual or in-person interviews and given the option of before or after school hours. During the interviews, the researcher posed open-ended
questions to further investigate perceived strengths and weaknesses, and the role of preservice teacher training and professional development workshops on self-efficacy. The sessions were recorded and transcribed using rev.com® and the researcher identified common themes among transcripts. The narrative data were then analyzed using the constant comparative method to allow the emergence of specific themes related to teacher self-efficacy while teaching students with disabilities in a general education classroom (Lincoln & Guba, 1985).

Assumptions

This study has the following assumptions:

1. The quantitative data from the general education teachers will reflect an honest and accurate depiction of their perceived self-efficacy related to educating students with disabilities.

2. The qualitative data will provide an honest depiction of the participants’ experiences or phenomena regarding educating students with disabilities.

3. General education teachers have varying degrees of experience and training in teaching and interacting with students with disabilities.

4. The general education teachers received their certification from a variety of universities over different periods and engaged in a diverse set of teacher preparation programs.

Limitations

Because the participant sample is limited to six school districts in the northwest region of Arkansas, results from this study may not be generalizable to other school districts in the state of Arkansas, or nationally. To generalize results to the larger
population, participants need to include representatives from each school district and be selected by random sampling. This study is also limited by the representation of experiences and opinions of only those who consented to participate. Each participant has a different level of education, opinion, or background that could potentially alter their experiences.

**Delimitations**

The delimitations of this research study include the sample population of only general education teachers who currently teach students with identified disabilities. It is believed perceptions of this population aid in identifying the current gap in teacher education regarding students with disabilities versus teachers with certifications in special education. The sample population is from six school districts within the northwest region of Arkansas with varying degrees of demographics. Although not generalizable to the entire population, results from the study could be applied to other districts in the state of Arkansas with similar demographics. Furthermore, because the study was focused on the self-efficacy of general education teachers, this study sample will not include substitute teachers, teachers on extended leave, or paraprofessionals to ensure results are indicative of current practicing teachers with similar certification areas.

**Definition of Terms**

The following terms have been defined to provide clarity to the reader as several terms may carry unique meanings as it pertains to this research study.

*General Education Teachers:* This term refers to regular education teachers who have met the conditions of certification in the state of Arkansas, and are not licensed in special education.
**Inclusion:** The term inclusion refers to educational settings in which students with disabilities are placed in existing mainstream educational classrooms (Hehir et al., 2016).

**Individualized Education Plan (IEP):** An Individualized Education Plan is a written document required to be developed for each student who receives special education or related services. The plan must contain an assessment of the areas of need, annual goals, services to be provided including any related services, and the settings in which those services will be provided (McLaughlin, 2004).

**Individuals with Disabilities Education Act (IDEA):** The Individuals with Disabilities Education Act is a federal law that requires free and appropriate public education to students with disabilities ages 3-21 (U.S. Department of Education, n.d.).

**Least Restrictive Environment (LRE):** The least restrictive environment is a major entitlement of IDEA that requires students with disabilities to be educated in an environment that is as close as possible to that of a regular education classroom (Underwood, 2018).

**Mainstream Classrooms:** For this study, mainstream classrooms refer to a general education classroom serving a heterogeneous group of learning needs, including students with disabilities and non-disabled students.

**Self-Efficacy:** The term self-efficacy is defined as beliefs people hold about their abilities to produce positive outcomes for others (Bandura, 1994).
Teacher Self-Efficacy (TSE): Teacher self-efficacy refers to a teacher’s judgment of his or her ability to produce intended outcomes of engagement and learning for all students in the classroom (Fronk, 2016; Hoy, 2001).

Summary

Chapter I provided an introduction and background of the problem being studied, as well as the purpose of the study and an introduction to the theoretical framework. The researcher provided definitions of key terms, stated the research questions, and identified any assumptions, limitations, and delimitations of the study. Chapter II contains an in-depth look at the theoretical framework along with a review of literature referring to the history of special education laws, inclusion, and self-efficacy as it relates to general education teachers educating students with disabilities in mainstream classrooms. Chapter III of this study presents a description of the methodology and research design, as well as the population sample. Chapter III will also explore the instrumentation used for data collection, as well as the validity of the instruments used in this study. Researcher reflexivity is also represented in this chapter as it relates to the qualitative portion of the study. Furthermore, Chapter IV provides the statistical analysis and an in-depth look into the results of the seven research questions. Quantitative findings in this chapter are represented in tables and qualitative findings are represented as direct quotes from participants. Finally, Chapter V provides a summary of the results represented in Chapter IV, as well as conclusions drawn from the data based on the literature reviews in Chapter II. Implications and recommendations for school leaders, teacher education programs, and future research are discussed in detail.
Chapter II: Literature Review

This study explored the current level of self-efficacy of secondary, general education teachers on teaching students with disabilities in general education classrooms. Findings from this study include identification of perceived strengths and weaknesses and factors that influence the level of self-efficacy as it relates to general education teachers teaching students with diverse needs, specifically those with identified disabilities. Identification of the current level of self-efficacy and specific factors that contribute to the perceived strengths and weaknesses provides school districts with targeted skills that general education teachers feel they should have to provide high-quality instruction to students with disabilities, as well as inform teacher preparation programs of gaps within the current curriculums to better support inclusive practices.

This literature review provides an in-depth look into the current literature and research on the history of special education law, the rationale and definition of inclusion, teacher perceptions, barriers and benefits to incorporating inclusive practices, as well as self-efficacy and teacher self-efficacy. Numerous search engines were utilized to locate peer-reviewed journal articles related to the history of special education law, inclusion and successful inclusive practices, and teacher self-efficacy in teaching students with disabilities. The research was primarily conducted through Arkansas Tech University’s online library using the keywords, special education, special education law, inclusion, teacher self-efficacy, teacher education, secondary education, professional development, teacher preparation, and self-efficacy. Using these key terms in isolation yields significant results, but few sources related specifically to teacher self-efficacy on teaching students with disabilities, as well as an in-depth look into special education law.
Therefore, more search terms were added. To yield more results for teacher self-efficacy on teaching students with disabilities, the keywords: disabilities, inclusive practices, academic achievement, and teacher perceptions were added and used together to help narrow the search results. Additional keywords such as education policy and special education policy helped narrow results for the history of special education law.

EBSCOhost Education Source, GALE Academic, ProQuest Central, ERIC, and Wiley Online Library served as the primary databases where publications were found. Arkansas Department of Education’s (ADE) Inclusive Practices website also served as a primary database for publications regarding inclusive practices.

**History of Special Education Law**

Public school systems in the United States date as far back as 1830 when Horace Mann first began to advocate for a school system that would be free to all children (Center on Education Policy, 2020). Throughout the 19th and early 20th centuries, public schools became common in several states, providing free education for many children (Center on Education Policy, 2020). However, as school systems in the U.S. continued to advance into the middle of the 20th century, they also became more aware of the varying degrees of student populations and the diverse makeup of the modern classroom (Elison-Chang, 2018; Wright & Wright, 2007).

The major landmark case of *Brown v. Board of Education* (1954) brought about a major change in the way public school systems were racially segregating and excluding children that had the right to equal educational opportunities. This case also prompted parents of children with disabilities to argue that by excluding their children from accessing the same educational opportunities, school systems were also discriminating
against children with disabilities (Wright & Wright, 2007). In 1966, Congress responded to the inequalities in education by amending the Elementary and Secondary Education Act (ESEA) and establishing a grant program to provide school systems with increased resources towards providing children with disabilities access to free education, as well as to expand and improve upon current programs to aid in the educational program (Elison-Chang, 2018; Wright & Wright, 2007).

In 1982, another landmark Supreme Court case provided significant legal implications for special education, arguably one of the most important court rulings in the history of special education law (Mullings, 2011). In *Hudson v. Rowley* (1982), the Court established the legal right for children with disabilities to access equitable educational opportunities in their Least Restrictive Environment (LRE) (Osborne & Dimattia, 1994). After this Supreme Court ruling, Congress enacted the Education for all Handicapped Children Act (EAHCA) of 1975 (Osborne & Dimattia, 1994). The purpose of EAHCA was to provide all handicapped children the right to a “free and appropriate public education” (FAPE) for all states that elected to receive federal assistance (Teal, 2013). This Act was amended in 1986, and again in 2004, as the Individuals with Disabilities Education Act (IDEA) that ensured children with disabilities had access to FAPE in the students’ LRE, due process of law, and procedural safeguards to protect the rights of children and their parents (Mullings, 2011; Osborne & Dimattia, 1994; Wright & Wright, 2007).

In 2002, President George Bush signed into law the No Child Left Behind Act (NCLB). Formerly known as Elementary Secondary Education Act (ESEA), NCLB reshaped the requirements of FAPE (Teal, 2013). The NCLB’s main purpose was to
ensure that each student performed at grade level, minimizing the gap in achievement among student populations, including students with disabilities (Hayes & Gray, 2008). Now with the NCLB and reauthorization of IDEA in 2004, greater emphasis was placed upon students with disabilities receiving equitable access to high-quality instruction and grade level curricula within the general education environment (Hayes & Gray, 2008).

The reauthorizations of IDEA in 1997 and 2004 also placed significant emphasis on requirements for the LRE and to provide services to students with disabilities in regular classrooms with their non-disabled peers, to the maximum extent appropriate (Underwood, 2018). The U.S. Department of Education defines LRE as:

To the maximum extent appropriate, children with disabilities, including children in public or private institutions or other care facilities, are educated with children who are not disabled, and special classes, separate schooling, or other removals of children with disabilities from the regular educational environment occurs only when the nature or severity of the disability of a child is such that education in regular classes with the use of supplementary aids and services cannot be achieved satisfactorily. (Federal Register, 1999, p. 12457)

Although current regulations make a self-contained environment accessible, according to the definition of LRE, placement of students with disabilities should, for the most part, be with their similarly-aged, general education peers unless the student cannot access the grade-level curriculum with supplementary aids and services (Mullings, 2011). Furthermore, to implement IDEA’s LRE requirements, a special education student’s first placement option must always be the general education classroom in the school the student would normally attend (Wright & Wright, 2007).
The history of legislation requiring FAPE and the most recent reauthorizations to IDEA with a focus on educating students in their LRE with their similarly-aged peers prioritizes that general education teachers provide high-quality education to all students, including those with disabilities (Mullings, 2011). This has led to the need for greater inclusive practices (Bui et al., 2010) to ensure that students with disabilities have equitable opportunities to access the general education curriculum (DESE Special Education Unit, n.d.). Because of the need for better inclusive practices to provide equitable educational opportunities, general education teachers now more than ever need a repertoire of skills to meet the needs of diverse learners, specifically those with disabilities (Forlin & Chambers, 2011; Gable et al., 2012; Idol, 2006; Stites et al., 2018).

**Inclusion: Definition and Rationale**

Because of the more recent mandates for students with disabilities to be educated in their LRE and access FAPE, the term “inclusion” has become one of the biggest buzzwords in education (Lorenz, 2013). However, before the late 1980s, the term inclusion was rarely used. Inclusion became more popular in the 1990s as it began to replace the term “mainstreaming”, which Bakken and Obiakor (2016) and Idol (2006) describe as when a child with disabilities spends a portion of their day in a general education class, has to adapt to the general education curriculum and the environment without accommodations or supports, and a portion of their day is spent in a separate, special education program. Recently, numerous educational organizations are becoming ever more inclusive, but the term itself often gets bogged down with interpretations (Lorenz, 2013), mainly because IDEA does not use and has not defined the term “inclusion” for educational purposes (Wright & Wright, 2007). Various definitions of
inclusion can be found within the literature, although dependent on the perspective of the
group or individuals utilizing the term.

Some definitions of inclusion refer to educational philosophy, such as Meyers
(2018), who defines inclusive education as a philosophy that allows for a range of
strategies and methods that is unique in meeting the needs of students with disabilities.
Similarly, Olinger (2013) describes inclusion as a philosophy that is meant to create
settings in which all K-12 students are an integral and full part of the learning
community, regardless of disabilities, strengths, or weaknesses.

More specifically, Lorenz (2013) defines inclusion as “the successful
mainstreaming of pupils with special education needs who would traditionally have been
placed in special schools" (p. 1), and Mullings (2011) defines inclusion in educational
settings as the act of placing students with disabilities in age-appropriate general
education classrooms. Furthermore, Almazan (2009) suggests that for a student with a
disability to be considered fully included in the educational environment, three factors
must occur: 1) physical placement in the general education environment with access to
routines of the school, 2) social interactions with same-aged general education peers, and
3) meaningful participation in the general education curriculum, with supplementary aids
and supports as needed.

Despite varying definitions of inclusion, decades of legislation surrounding
students with disabilities has opened the door for all students to receive equitable access
to high-quality instruction, progress towards their grade-level curriculum, and participate
in social interactions with their same-aged peers (Almazan, 2009; Bakken & Obiakor,
2016; Daniels, 2018; Lorenz, 2013; Mullings, 2011; Underwood, 2018).
**Inclusion in the Public School Setting**

Burnstein et al. (2004) suggest that successful inclusive schools provide educational opportunities to all students through the use of general educators and special educators working collaboratively to provide comprehensive services and programming. Encouraged through IDEA (1997) and NCLB (2004), students with disabilities in the public school setting should be integrated into regular education classrooms for at least part of their day, although service models may differ depending on the type of instructional setting and may represent an array of teaching arrangements and student implementation (Arkansas DESE Special Education Unit, n.d.; Burstein et al., 2004; Idol, 2006).

Arkansas Division of Elementary and Secondary Education (DESE) Special Education Unit (n.d.) describes a variety of ways students with disabilities can access inclusive programs through the collaboration of general and special educators. Full inclusion occurs when students participate in the general education class with their same-aged peers for the entirety of their day, and instruction is delivered from either a general education teacher with support from a special education teacher or through a co-teaching partnership. In addition, students may also receive partial inclusion in which they spend a majority of their day in general education classes but are pulled for small groups or 1:1 work with a special educator for interventions. The intent of these service models is for teachers to work collaboratively to provide all students with appropriate content, supports, and accommodations in the general education classroom (Arkansas DESE Special Education Unit, n.d.; Idol, 2006).
Teacher Perceptions of Inclusion

As inclusion programs in public schools continue to increase, research in the area of current perceptions of general education teachers teaching students with disabilities in their classrooms continues to fill the literature with both positive and negative perceptions towards inclusion but maintains that teacher attitudes toward inclusion are impactful variables concerning the success of an inclusion program (Cambridge-Johnson et al., 2014; Cassady, 2011; Leatherman & Niemeyer, 2005). Idol (2006) concludes that teaching students with disabilities, especially mixed abilities in the same classroom, can feel like a daunting task due to their increased academic and behavioral needs, and can in turn create a negative perception of inclusive practices.

Most educators will tell you that students with disabilities often need more academic support than their peers, requiring extensive instructional strategies to meet their needs, however, teacher perceptions on their capacity to meet those instructional needs remain shallow (Bruggink et al., 2016). For instance, in a qualitative study conducted by Mullings (2011), she found that although teachers were in favor of inclusive practices, they felt they did not have the pedagogical preparation nor knowledge to correctly implement a successful inclusion program. The researcher noted that one participant stated, “in the ideal situation [inclusion] works, but my observations are that sometimes it does not work because the teachers do not understand how to deal with the students and do not want to be bothered with them” (Mullings, 2011, p. 83). Furthermore, Cambridge-Johnson et al. (2014) found that although teachers were in favor of inclusive practices, teachers indicated a lack of ability to plan and execute lessons to a variety of ability levels.
In addition to perceptions about academic strategies and individualized instructional needs, it has been found that perceptions of teachers’ ability to implement specific behavioral strategies are comparably lower as well (Idol, 2006). General and special educators alike encounter behaviors that impede or disrupt learning, but general educators continue to feel the need for better prerequisite skills to manage those challenging behaviors beyond general classroom management strategies (Flower et al., 2017). In a study conducted by Lopes et al. (2004) results indicated that general education teachers felt apprehension towards inclusion classrooms because of the increased behaviors. Furthermore, Burnstein et al. (2014) concluded that challenging behaviors in the classroom have a significant impact on teacher burnout and suggest increased professional development offerings to combat the low levels of self-confidence regarding challenging classroom behaviors.

With instructional and behavioral strategies, basic understanding and implementation of IDEA is an essential part of teaching students with disabilities (O’Connor et al., 2016). Fuchs et al. (2015) suggest that teachers are now expected to participate in the development and implementation of accommodations and modifications in students’ IEPs. However, research suggests that teacher perceptions indicate ill-preparation in implementing student IEPs in their classrooms and understanding special education laws (Alfaro et al., 2015; O’Connor et al., 2016). More specifically, O’Connor et al. (2016) found that only 43% of general education teachers studied showed a general understanding of IDEA, while 52% of teachers stated “I don’t know” when asked to describe the main provisions or benefits. Schimmel and Militello (2007) found that over 75% of the general education teachers studied did not take a single course related to
special education law and that only 40% of teachers chose the correct answer for basic questions regarding student and teacher legal rights under IDEA. Similarly, research conducted by Elison-Chang (2018) reported deficiencies in general education teacher knowledge related to aspects of special education law and implementing accommodations in inclusive classrooms.

**Benefits of Inclusion**

The current literature surrounding effective inclusive models has identified several benefits for general education students, special education students, and general and special educators alike. Benefits include increased opportunities for socialization and social-emotional learning, increased academic achievement scores, improved student outcomes, and increased collaboration among general and special education teachers (Bui et al., 2010; Dessmontet, 2012; Vinodrao, 2016; Wagner & Davis, 2006).

**Socialization.** There is a large volume of empirical evidence that suggests students with disabilities acquire skills in a range of areas when successfully implemented in an inclusive setting (Bui et al., 2010). Reportedly, research studies conducted by McGregor and Vogelsburg (1998) and Kliewer and Biklen (2001) indicate that students in inclusive learning environments demonstrate higher levels of social interaction, increased communication skills, and enhanced social relationships with their similarly-aged peers (Bui et al., 2010). In 2004, researchers conducted a study in which an inclusive model was implemented over three years in two school districts (Burnstein, et al.). After the study, a parent of a student with a disability stated “[with inclusion] children feel like others, their self-esteem has improved” (p. 109-110).
Similarly, Almazan’s (2009) study indicated that a parent whose son was recently integrated into an inclusive model found significant growth in social and emotional learning. The parent was interviewed after successfully implementing her special needs son in a district that utilizes inclusive practices. She concluded that after several years of being in self-contained rooms, he had become successful in making friends, and made incredible social growth.

In the same study, a student was interviewed on his experiences after engaging in a school that utilized inclusion. He felt that by participating in the general education classes, he learned how to do the same things as students without disabilities, such as advocate for himself in the classroom, collaborate with other students, and find other students who have the same interests (Almazan, 2009).

Vinodrao (2016) adds that students with intellectual disabilities have added benefits of inclusion by having the opportunity to develop friendships with other peer groups, increase social initiations and interactions, and are given greater access to adaptive behavior skill acquisition by having peer models in the classroom. Reed et al. (2010) also argue that studies indicate students in inclusive schools develop friendships with peers at a higher rate than those who enroll in schools with a continuum of special education classrooms. However, results from a study of friendships among special education and general education students showed that although students with disabilities had the same number of friends, only 42% of those friendships were still intact at the end of two years (Estell et al., 2009).

Concerns are often raised about the impact that students with disabilities have on typical peers when in an inclusive setting (Bui et al., 2010). However, numerous studies
have indicated inclusion can also have positive effects on socialization for general education students as well. Vinodrao (2016) found that students without disabilities had an increased appreciation and acceptance of individual differences, a deeper understanding of diversity, as well as increased respect for all people. Similarly, Burnstein et al. (2004) found that students without disabilities reported an increase of appreciation for student differences, taking pride in assisting one another, and overall, “students were more caring and compassionate” (p. 110). According to Reed et al. (2011), positive friend relationships play a major role in the well-being of all children and argue that it is critical to social, emotional, and cognitive growth. Therefore, inclusive practices have been shown to have positive and lasting impacts on the social development of students with and without disabilities alike.

**Academic Achievement.** Along with increased social interaction, communication, and enhanced social relationships, research suggests that inclusive education programs have many potential academic benefits for students with and without disabilities (Bakken & Obiakor, 2016; Bui et al., 2010; Idol, 2006; McDonnell, 2014; Vinodrao, 2016). Bakken and Obiakor (2016) indicate inclusive practices provide greater access to the general curriculum and possible academic achievement and progress towards IEP goals when implemented appropriately. They also state there is not “currently any research that indicates negative effects from inclusion” when students are provided the “necessary supports and services for students to actively participate and achieve IEP goals” (p. 7).

Dessmontet et al. (2012) conducted a comparative study of 34 students with an intellectual disability who were fully included in general education classrooms with
support, to a control group of 34 comparable children in a special school program with support. When measuring the students’ academic achievement over two years, researchers found that the children fully included in the general education classroom made slightly more progress in literacy versus those students in a special school program. Although, no differences were found between the two groups in mathematics.

However, as reported by Bui et al. (2010), Waldron et al. (2001) investigated the effects of inclusive programs for students with disabilities and found that over a two-year study, 41.7% of students with learning disabilities made progress in general education math classes, compared to 34% in the special education setting. When compared to their general education peers, 43.3% of students with disabilities made comparable or greater progress in math in inclusive settings versus 35.9% in the traditional resource setting.

Additionally, Graaf et al. (2011) conducted a study on academic achievement among a random sample of 160 Dutch students with Down Syndrome. Half of the sample received instruction in a special education classroom, while the other half received instruction in the general education classroom. Among the students studied, researchers found that the students placed in the general education classroom for their instruction had an average score of 21 on the total academics scale, while the students in the special education classroom had an average score of 14 on the same scale. Researchers go on to identify the differences in academics when applied to each subject area independently. When reading, writing, and mathematics were taken separately, there were still significant differences in the scores for reading and mathematics for children aged 5-13 years old, while a significant difference was shown in all three subject areas in children nine and older (Graaf et al., 2011).
In addition to students with disabilities having academic benefits to inclusive practices, research indicates students without disabilities have no negative effects on their academic achievement when educated alongside students with disabilities. Dessemontet et al. (2012) conducted a study aimed at assessing the academic impact of including children with an intellectual disability in general education classrooms on their low, average, and high achieving peers without disabilities. Researchers studied 202 students without disabilities who were being educated alongside their peers with an intellectual disability, and 202 students without disabilities who were not being educated alongside students with an intellectual disability. After one school year, researchers indicated there was no significant difference found in the progress of low, average, or high achieving students whether they were placed in an inclusion class or a non-inclusion class (Dessemontet et al., 2012). This research indicates that including children with an intellectual disability does not hinder the academic progress of students without a disability.

Similarly, Idol (2006) conducted a program evaluation among eight schools (four elementary and four secondary) to determine the effectiveness of an inclusive program. She stated, “The most striking finding was that three of the four elementary schools made a noticeable improvement in average student scores over four years” (p. 84). Idol (2006) goes on to say that the fourth school had average scores that remained the same and showed no negative effects on achievement. Again, she concluded that all four secondary schools studied also made “noticeable improvements” on test scores over the four years for students with and without disabilities (Idol, 2006, p. 89).
Improved Student Outcomes. Current research suggests that students with disabilities who are integrated into an inclusive educational program have some added benefits beyond academics, including adaptive behaviors, vocational, and independent living skills (Bui et al., 2010; McDonnell, 2014).

In a study conducted by McDonnell (2014) 14 students with disabilities, who were being educated in inclusive classrooms, were given a pre-and post-test on the Scales of Independent Behavior-Revised (SIB-R) to measure the level of functioning in key behavior areas within the categories of adaptive and maladaptive behaviors. Performance of the students indicated that 13 of the 14 increased their broad-scale score by a range of 1-13 points, while one student’s score remained the same. This data indicates students with disabilities made statistically significant gains in adaptive behaviors while actively participating in inclusive classrooms (McDonnell, 2014). Similarly, Fisher and Meyer (2002) conducted a two-year study examining the effects the inclusive classroom had on the social competence of students with severe disabilities. Researchers used the Assessment of Social Competence (ASC) instrument to measure social behaviors and how well students can shift and adapt their behavior according to a variety of social contexts. Fisher and Meyer (2002) found students in the inclusive setting had significantly higher mean scores than those not in inclusive settings.

Vinodrao (2016) argues that by giving students with disabilities the right to fully participate in educational programs alongside their same-aged peers, students will be “better able to participate and contribute as members of their communities and society than segregated children” (p. 187). She also states that inclusive education helps students learn various vocational activities and prepare for “full participation in community life”
The National Longitudinal Transition Study (Wagner & Davis, 2006) examining the outcomes of 11,000 students with disabilities found that students who spend more time in the general education classrooms were positively correlated with fewer disruptive behaviors, fewer absences from school, and increased outcomes in the areas of employment and independent living after high school.

**Collaboration.** Along with improved outcomes for students with and without disabilities, inclusion can be valuable for both special education and general education teachers alike. Vinodrao (2016) adds that inclusive practices help build inclusive communities where professional skills are better developed, school staff members participate in a higher level of collaboration among each other, and parent participation is incorporated at a higher level. She argues that a “team approach” is crucial to the outcome of inclusion and general education teachers, special education teachers, and parents must work together and “display shared responsibility” for meeting the needs of all students (Vinodrao, 2016, p. 188).

Furthermore, Vinodrao (2016) indicates that because special educators and therapists are often called to implement strategies outside of the classroom or school, collaboration with these individuals is necessary for the general education teacher to independently implement diverse strategies and meet the needs of all learners. Likewise, Bui et al. (2010) state “The inclusion of students with disabilities necessitates collaboration between administrators, general educators, special educators, parents, and related service providers to deliver quality services to all students” (p. 8). Researchers have found that general educators who have regular opportunities to collaborate with other professionals have increased instructional skills in the classroom (Bui et al., 2010).
**Barriers to Inclusion**

Although research indicates extensive benefits to inclusive practices, educating students with disabilities in general education classrooms also has barriers to overcome for the program to be successful in meeting the needs of all learners (Cambridge-Johnson et al., 2014; Forlin & Chambers, 2011; Mullings, 2011; Sharma et al., 2012).

**Teacher Preparation.** Even after years of increased efforts to foster inclusive school settings, researchers have consistently found that preservice general education teachers feel underprepared to provide meaningful classroom experiences to students with disabilities (Glazzard, 2011; Stites et al., 2018). Current general education teachers claim that although perceptions of including students in general education classes are somewhat positive (Idol, 2006; Walsh-Yusuf, 2018), teachers continue to feel that their ability to teach these students comes from trial and error over time versus their corresponding teacher preparation programs (Kantor, 2011; Walsh-Yusuf, 2018), stressing the need for teachers to be better prepared in programs that prioritize inclusive models of education (Oyler, 2011). Forlin and Chambers (2011) add that lack of teacher preparation is highly problematic in the inclusive setting due to increased teacher stress levels impacting the success of the program.

Concerning their preservice preparation, general education teachers in Fuch’s (2009) study reported their lack of training and preparation in meeting the needs of students with disabilities, indicating they were unable to differentiate instruction, provide accommodations, and collaborate with special education teachers appropriately. The teachers agreed that there was only one required course in special education for general educators and they felt it was “worthless” and contained “mostly terminology”. One
teacher in particular, when asked if she felt prepared to teach diverse learners said, “College did not prepare me in any way, shape, or form” (Fuchs et al., 2015 p. 34). Pre-service teachers in Forlin and Chambers’ (2011) study found that teachers indicated concern about the lack of knowledge and skill base present in an inclusive classroom and found it difficult to give appropriate attention to all students simultaneously. Similarly, Cipkin and Rizza (2010) conducted a study that found 72% of teachers agreed the level of training they received at the college level was inadequate in preparing them to teach students with disabilities. Stites et al. (2018) also found that pre-service teachers need additional experience and training in differentiating instruction to meet the needs of all learners and overall, teachers do not perceive being well prepared for inclusion classrooms.

In addition to pre-service training, researchers have found that a lack of professional development can also affect the outcome of inclusive practices. Cipkin and Rizza’s (2009) study concluded with a call for specific professional development activities for general educators in the areas of planning and implementing strategies to promote the success of students with disabilities. Elison-Chang’s (2018) study found deficiencies in professional development training among the general education participants studied. She found that participants had less than two professional development training sessions regarding special education within the previous five years, indicating a lack of confidence in their ability to produce positive outcomes for a diverse set of students. Of the teachers studied in Shady et al. (2013) study, 74% indicated they needed more professional development activities to better improve their understanding of inclusive practices, specifically in the areas of assessing student performance, planning
and differentiating instruction for various ability levels, interpreting IEPs, providing accommodations, pacing the curriculum appropriately, motivating students, understanding various inclusion models, and selecting inclusion models to fit the needs of the classroom.

On the other hand, Forlin and Chambers (2011) also pose that improved teacher preparation or knowledge for teaching students with disabilities does not ensure that teachers will not have concerns about teaching in the inclusive setting. In their study, 67 pre-service teachers participated in a 39-hour training meant to improve their knowledge about special education laws, policies, and improve their levels of confidence. However, once the training was complete, teachers still maintained the same levels of stress and concerns for inclusive practices. Furthermore, Bain and Hasio (2011) conducted a study among art teachers that found greater exposure to experiences, versus training, with students with special needs through authentic learning experiences were instrumental in teachers gaining the confidence and skills necessary to teach students with disabilities in their classrooms.

**Theoretical Framework**

This research study is primarily based upon Bandura’s (1997) self-efficacy theory, originally grounded in social cognitive theory (1989). The use of Bandura’s theory of self-efficacy as a theoretical framework for this study will provide a foundation for understanding the conditions associated with teacher self-efficacy towards inclusive practices.

Bandura defines self-efficacy as “beliefs in one’s capabilities to organize and execute the courses of action required to produce given attainments” (Bandura, 1997,
p.3). He goes on to suggest that in general, people seek activities in which they do well and tend to avoid situations in which they believe their performance is lacking. Bandura’s (1989) social cognitive theory suggests our behaviors are not only influenced by personal factors, but by environmental factors as well. Personal factors may include motivational, affective, cognitive, and/or selection processes associated with self-efficacy, while environmental factors are associated with influences of family, friends, colleagues, or individuals present in an immediate environmental setting (Bandura, 2001). Unlike self-esteem, self-efficacy is context-specific and there is no overall measure of self-efficacy beliefs. Therefore, one may have high self-efficacy in one task but not in another, conceptualizing the idea that people influence what they do (Bandura, 1997).

Bandura (1977) theorizes four sources of efficacy: mastery experiences, physiological and emotional states, vicarious experiences, and social persuasion. Among the four sources, he concludes that mastery experiences are the most powerful source of efficacy information. Mastery experience is the perception that a successful performance raises efficacy beliefs, and the perception of failure of performance contributes to the expectation that future performances will be inept (Hoy, 2000). In correlation to self-efficacy regarding teaching, Bandura (1986) indicates that he believes student and teacher performance is at a higher level when the teacher holds a higher level of self-efficacy.

**Teacher Self-Efficacy**

Teacher self-efficacy is a teacher’s judgment of his or her capacity to produce desired outcomes in the learning environment, including judgments about different teaching tasks they need to perform to enhance student learning (Bandura, 1997; Tschannen-Moran & Woolfolk-Hoy, 2000). “Teacher efficacy has proved to be
powerfully related to many meaningful educational outcomes such as teachers’ persistence, enthusiasm, commitment, and instructional behavior, as well as student outcomes such as achievement, motivation, and self-efficacy beliefs” (Tschannen-Moran & Woolfolk-Hoy, 2000, p. 783). Historically, the concept of self-efficacy has derived from two different theoretical bases, Rotter’s (1966) conceptualization of internal and external control, and Bandura’s (1997) conceptualization of self-efficacy (Skaalvik & Skaalvik, 2007). Based on Rotter’s conceptualization, teacher self-efficacy is assumed to increase if teachers perceive students’ achievement and behavior can be influenced by their education. Similarly, teacher self-efficacy would decrease if teachers believe that external factors are more important than the influence of the teacher (Skaalvik & Skaalvik, 2007). However, Bandura’s construct of self-efficacy, in relation to teacher self-efficacy is conceptualized as the teacher’s own belief in their ability to “plan, organize, and carry out activities required to attain given educational goals” (Skaalvik & Skaalvik, 2007, p. 612).

Gibson and Dembo (1984) identify two types of self-efficacy specific to teachers, personal teaching efficacy and general teaching teacher efficacy. Personal teaching efficacy refers to the teachers’ beliefs about their own ability to promote student achievement and take responsibility for student learning (Gibson & Dembo, 1984). General teaching efficacy, described by Gibson and Dembo (1984) focuses on the belief that teaching itself can generate learning. Meaning that a teacher’s ability to bring about change in the classroom is limited by external factors and the belief that those factors can be controlled or manipulated.
Measuring Teacher Self-Efficacy. Based on Bandura’s (1997) definition of self-efficacy, numerous instruments have been created in an attempt to measure personal self-efficacy in teachers (Skaalvik & Skaalvik, 2007). According to Tschannen-Moran and Woolfolk-Hoy (2000), two items were originally examined by Rand researchers, external and internal control. To measure their efficacy, teachers were asked to indicate their level of efficacy based on two items and the sum of those two items indicated the teacher's efficacy.

After the Rand study, researchers began to expand and refine the idea of teacher efficacy in hopes of more accurately measuring the construct (Tschannen-Moran & Woolfolk-Hoy, 2000). Shortly after, Guskey (1981) developed a 30-item instrument in attempts to measure the teachers’ responsibility for student achievement (Tschannen-Moran & Woolfolk-Hoy, 2000). He found that when he compared scores to the two Rand items, there were significant positive correlations for student success and failure, indicating that performance outcomes among students represent separate dimensions among teacher self-efficacy. Following the reasoning that self-efficacy is a multidimensional construct, Bandura (n.d.) created a 30-item scale with the intent to measure seven dimensions of self-efficacy: influence decision making, influence school resources, discipline, instruction, parental involvement, community involvement, and positive school climate. However, Skaalvik and Skaalvik (2007) also claim that even though the scale is multidimensional, the varying dimensions do not equally represent teachers’ daily work.

In another attempt to measure teacher self-efficacy, Gibson and Dembo (1984) created a 30-item scale building on the ideas of the Rand studies, which captured the idea
of personal teaching efficacy and outcome expectancy as described by Bandura (Tschannen & Moran, 2000). In an additional attempt to measure the varying dimensions of teacher self-efficacy, Tschannen-Moran and Woolfolk-Hoy (2001) also developed a 24-item scale consisting of three dimensions: instructional strategies, classroom management, and student engagement.

Researchers agree that “teacher efficacy is a construct that has cross-cultural validity” (Sharma et al., 2012), indicating that a teacher who has high teacher efficacy in teaching mathematics, may not have the same level of efficacy when teaching literacy. This concludes that teacher efficacy should be measured in relation to tasks and specific contexts on the basis that self-efficacy influences classroom environment and student learning, and therefore should be measured in relation to the specific task the teacher is asked to perform.

Sharma et al. (2012) developed an instrument to measure teacher self-efficacy in direct relation to teaching in inclusive classrooms. Researchers intended to develop a measurement that would better encompass the skills required of teachers to be successful in those settings (Sharma et al., 2012). They conducted their study among 607 pre-service teachers selected across four countries, Australia, Canada, Hong Kong, and India. Researchers developed an 18-item scale, The Teacher Efficacy for Inclusive Practices (TEIP) Scale, with the intent to measure teacher efficacy in teaching students with disabilities. Among the results, three major factors were revealed regarding teaching in inclusive classrooms: efficacy in using inclusive instruction, efficacy in collaboration, and efficacy in dealing with disruptive behaviors. After conducting a reliability analysis
and factors for each country, researchers conclude the scale provides a reliable measure of teacher self-efficacy for inclusion (Sharma et al., 2012).

**Teacher Self-Efficacy and its Effects.** Teachers with a strong sense of efficacy tend to try new approaches to meet the needs of learners, are open to new ideas, exhibit increased levels of planning and organization and overall attitudes towards children, and has been related to increased student achievement (Tschannen-Moran & Woolfolk-Hoy, 2000; Hoy, 2000). Furthermore, teachers with a higher sense of self-efficacy tend to exhibit more enthusiasm for teaching, have a greater commitment to teaching, and are more likely to stay in the profession (Tshannen-Moran & Hoy, 2000).

Gibson and Dembo (1984) also found significant differences in teaching practices of those teachers with high levels and low levels of self-efficacy. They indicate teachers with high self-efficacy better persevered with low achieving students and used better strategies to produce increased learning, such as working longer with a student who is struggling, as well as being less inclined to refer a struggling student for special education services (Gibson & Dembo, 1984). In contrast, teachers with low self-efficacy spent more time on non-academic tasks and used less effective teaching strategies that often hindered student learning (Gibson & Dembo, 1984), and has been found to negatively impact job satisfaction, emotional exhaustion, and even job engagement (Skaalvik & Skaalvik, 2014).

Research also indicates that teachers with increased levels of self-efficacy tend to use more hands-on teaching methods and more humanistic approaches (Woolfolk Hoy, et al., 1990). More recently, Zee and Koomen (2016) analyzed 165 articles on teacher self-efficacy to explore the consequences on the quality of classroom processes, academic
achievement, and teachers’ psychological well-being. Researchers found that teacher self-efficacy showed a positive link with students’ academic achievement, patterns of teacher behavior, and practices related to classroom quality, as well as factors that contribute to personal accomplishments, job satisfaction, and commitment to the field of teaching.

Conversely, researchers have also found negative associations between teacher self-efficacy and teacher burnout (Zee & Koomen, 2016), as well as no differences in academic achievement when educated with a high-efficacious teacher. In a study conducted by Beck Wells (2016), 64 English Language Arts teachers were surveyed to identify dimensions of teacher self-efficacy. Results were categorized into levels of self-efficacy, then compared to achievement scores of students. Although there were observable differences in student achievement between the groups, there was no statistically significant difference, indicating higher levels of self-efficacy do not always produce higher student achievement (Beck Wells, 2016). Accordingly, Zee and Koomen (2016) report there are also a small number of studies that have found no direct correlations between teacher self-efficacy and academic achievement and teacher psychological well-being.

**Teacher Self-Efficacy Toward Inclusive Practices.** A common misconception is that inclusion is solely about the placement of students with disabilities in the regular classrooms, however, researchers argue that it is more about “the quality of the school experience and about how far they are helped to learn to achieve and participate fully in the life of the school” (Sharma et al., 2012, p. 12). Furthermore, Sharma et al. (2012) argue that in inclusive practices, if a student is struggling in the general education
classroom, the problem lies with the schooling itself, not the student, and determining the teachers’ perceived efficacy to implement inclusive practices is a major responsibility to ensure positive outcomes. Yakut (2021) also indicates that a teacher’s self-efficacy is a primary factor in their willingness to teach and include students with disabilities in their general education classrooms.

Bandura (1997) indicates that a teacher’s perceived efficacy has great influence over the environment created, as well as the tasks they will perform to enhance student learning and engagement. By applying this theory to an inclusive classroom, we would expect to see that a teacher with a high level of efficacy in implementing inclusive practices would believe that students with disabilities or diverse academic needs could be effectively taught in the general education classroom. However, it would then be assumed that a teacher with a low level of self-efficacy for implementing inclusive practices would believe they have very little control over what the student with a disability can and will learn, and thus may be disciplined to attempt it (Sharma et al., 2012). In addition, they go on to suggest that teacher self-efficacy is also associated with attitudes towards teaching in inclusive classrooms (Sharma et al., 2012). Weasel and Dror (2006) conducted a study on the attitudes of 139 general education teachers towards teaching students with disabilities in their classrooms. Researchers concluded that the teachers’ level of self-efficacy was the single best predictor of their attitudes towards inclusive practices.

Avramidis et al. (2019) studied 225 Greek general education teachers and 69 special education teachers and their self-efficacy for inclusive practices. Researchers found that general education teachers were less positive in their self-efficacy of implementing inclusive instructions and collaboration versus their special education
counterparts. In another study conducted by San Martin et al. (2021), 569 general education teachers were surveyed regarding their attitudes and self-efficacy towards teaching students with disabilities in the general education classroom. Researchers found that teachers had moderately positive attitudes towards inclusion, but that teacher self-efficacy related to managing behavior, laws and policies regarding special education, and dealing with physically aggressive students were among the lowest levels.

Similarly, Alnahdi (2020) found that general education teachers expressed lower levels of self-efficacy in the areas of involving families, raising awareness regarding laws and policies of special education students, and dealing with physically aggressive students. Kormos and Nijakowska (2017) discussed negative self-efficacy among general education teachers toward the inclusion of students with dyslexia when they indicated ill-preparation to provide effective instruction.

On the other hand, it is reported that teachers with higher levels of self-efficacy have more encouraging outcomes regarding teaching students with disabilities in mainstream classrooms. Sharma et al. (2012) found teachers with greater preparation in instruction students with disabilities in the inclusive classroom had higher levels of self-efficacy and had more positive attitudes towards the overall inclusion of students with disabilities in the general education classroom.

Sze (2009) found that as general education teachers’ confidence in their ability to teach students with disabilities increased, so did their actual ability. She concluded that increased confidence among general education teachers increased the instructional capacity to contribute to successful inclusion programs (Sze, 2009). Overall, high levels
of teacher self-efficacy can be viewed as a key component to successful inclusive programs (Sharma et al, 2012).

Summary

The literature review for this mixed-method study begins with a deep examination into the history of special education law that has placed increased emphasis on equitable educational opportunities for students with disabilities (Almazan, 2009; Bakken & Obiakor, 2016), followed by an in-depth look into the development of inclusion and inclusive practices in the public school system. Literature themes surrounding inclusion included perceptions of teaching students with disabilities in mainstream classrooms, and advantages and drawbacks of incorporating students with disabilities into the general education classroom through inclusive practices. A thorough review of the literature indicated that inclusion has positive effects on students with and without disabilities in the areas of student achievement, communication, social-emotional learning, adaptive behaviors, and vocational skills (Bakken & Obiakor, 2016; Bui et al., 2010; Graaf, 2011; McGregor & Vogelsburg, 1998). However, research also indicates that despite the advantages to inclusion, teachers continually report feeling underprepared to meet the needs of all students, including those with disabilities, in their classrooms (Forlin & Chambers, 2011; Glazzard, 2011; Kantor, 2011; Stites et al., 2018).

Following a review of the literature, inclusive practices, self-efficacy (Bandura, 1989, 1997, 2001), and teacher self-efficacy were reviewed to examine the impact a teacher’s self-efficacy has on classroom success (Gibson & Dembo, 1984; Skaalvik & Skaalvik, 2007; Tschannen-Moran & Woolfolk-Hoy, 2000). Further examination into teacher self-efficacy led to varying measurements of teacher self-efficacy, narrowing on
teaching students with disabilities and outlining a form of measurement (Sharma, et al., 2012) that serves as the primary form of measurement for this study. The literature review concluded with a detailed discussion on the current literature surrounding the self-efficacy of general education teachers teaching students with disabilities through inclusive classrooms, which guided the research questions within the study.
Chapter III: Methodology

Chapter III presents a description of the methodology and research design chosen for this study. The description of the research design will assist in understanding the structure of the research. The population and sampling section discusses specific participants and sources of data. Instrumentation and data collection provide an in-depth look into the data collection process and the instrumentation used, including the validity and reliability of the instrument. Finally, steps for analyzing data are represented in a way to facilitate future replication.

Research Methodology

The purpose of this mixed methods, explanatory sequential study was to explore secondary, general education teachers’ current level of self-efficacy regarding teaching students with disabilities in general education classrooms. Further analysis was performed to identify whether the level of teacher education and experience had a significant effect on the level of self-efficacy, whether teachers among the differentiated school districts had varying levels of self-efficacy, and to identify perceived strengths and weaknesses and factors that influence self-efficacy as it relates to providing high-quality instruction to students with mixed abilities.

A mixed methods approach involves the collection of both qualitative and quantitative data, integrated through merging data, explaining data, or building from one method to another in an attempt to better understand a research problem (Creswell & Creswell, 2018). Creswell and Creswell (2018) suggest using a mixed methods approach when “explaining quantitative results with a qualitative follow-up” and “comparing different perspectives drawn from quantitative and qualitative data” (p. 216). The
rationale for using a mixed methods approach for this study was that it attempted to provide open-ended and closed-ended data in response to the research questions, and allowed for the emergence of additional data in the form of follow-up interviews to identify factors that influence the current level of self-efficacy. A mixed methods approach was chosen primarily over qualitative or quantitative methods in isolation because utilizing both qualitative and quantitative data allows for a better understanding of the individual variables that hinder a general education teacher’s ability to provide high-quality instruction to students with disabilities. The examination of the responses using this methodology provided a basis for examination into the seven research questions for this study.

The qualitative research questions are as follows:

1. What is the current level of self-efficacy of secondary, general education teachers on teaching students with disabilities in general education classrooms?
   a. What is the current level of self-efficacy among secondary, general education teachers within the three factors, efficacy to use inclusive instruction, efficacy in collaboration, and efficacy in managing behavior?

2. Is there a difference in self-efficacy among secondary, general education teachers and years of teaching?

3. Is there a difference in the level of education and the self-efficacy of secondary, general education teachers?

4. Is there a difference in the type of certification and the level of self-efficacy of secondary, general education teachers?
5. Is there a difference by school district on the level of teacher self-efficacy among secondary, general education teachers?

For the qualitative portion of this study, the research questions were as follows:

6. What factors contribute to perceived strengths and weaknesses regarding self-efficacy of secondary, general education teachers teaching students with disabilities?

7. What roles do teacher education programs and continuing professional development workshops play in the perceived levels of teacher self-efficacy for general education teachers instructing students with disabilities?

**Research Design**

This study utilized the explanatory sequential design of mixed methods research. An explanatory sequential design involves a two-phased data collection process in which quantitative data are collected first, followed by qualitative data. The explanatory sequential design gives priority to the quantitative data, but integrating the qualitative data into the second phase helps explain or expand upon the quantitative data from phase one (Creswell & Creswell, 2018). The explanatory sequential design was chosen due to the design’s opportunity for exploration of the quantitative results in more detail and to provide a better interpretation of the quantitative data as it relates to factors that influence self-efficacy in teaching students with disabilities in the general education classroom.

The quantitative data in this study was collected using the TEIP survey (See Appendix A). The survey included basic demographics, yes/no, and Likert-scale questions. The survey was used to gather statistical data regarding the level of teacher
self-efficacy and serve as the data to help revise follow-up qualitative questions to be used in the interviews.

The qualitative data in this study was collected using interviews. Interviews were used to further explore specific topics, perceptions, or experiences of the participants. Interviews allowed the researcher to gain insight into their viewpoints and explore perceptions that cannot otherwise be observed or understood (Patton, 2015). Interviews were conducted after analyzing the results of the quantitative data. The qualitative data provided the researcher with a richer, deeper understanding of specific skills general education teachers feel they need to provide high-quality instruction to students with disabilities in the mainstream classroom as they relate to the three domains within the survey; efficacy to use inclusive instruction, efficacy in collaboration, and efficacy in managing behavior, as well as factors that contribute to the level of self-efficacy.

**Population and Sample Selection**

The general population of this research study was all certified, secondary teachers in the Northwest region of the state of Arkansas. Participants included certified, secondary teachers employed by a public school district in northwest Arkansas, work in a general education classroom, and are currently teaching students identified as receiving special education services. Participants with certification in the area of special education were not considered for this study as they have a significant increase in training, knowledge, and experience in working with students with disabilities.

The researcher contacted the superintendents from 12 randomly chosen public school districts in northwest Arkansas with the hope of obtaining written permission from at least six public school districts as possible research sites. It was important to include
general education teachers from varying school districts so the data represented a variety of student populations to allow for increased generalization of results and to determine whether there is a significant difference in the level of efficacy among school districts.

To receive written permission, the researcher emailed all superintendents within the 12 school districts (Appendix E). Each of the superintendents was asked whether they wanted to participate in the study, and how they wanted to disseminate the survey information to their staff members. They chose from the following options: (1) superintendents, or another staff member they deem, could provide the researcher a complete email list of current secondary general education teachers working within their districts, or (2) the superintendent could elect to personally receive the survey information and he/she would disseminate to appropriate staff members. Once study approval was granted, general education teachers were contacted through either the researcher or the superintendent, or another staff member they deemed appropriate such as the principal or human resource assistant superintendent.

The researcher asked that participants be included if they were currently providing instruction to students with an active IEP in at least one class period during the fall semester of 2021. The first page of the survey acted as the participant consent form to ensure teachers were informed their participation was completely voluntary and completion of the survey served as consent for participation. Among all invitations sent, a total of 101 teachers completed the survey.

For the qualitative portion of the study, interviewees were chosen using purposive sampling to include participants from as many of the demographic categories as possible. To gain participants, a section was added to the end of the survey inviting those who
completed the survey to participate in a follow-up interview. If participants wanted to volunteer for the interview, they were asked to send an email to the researcher. The researcher then shared information regarding the interview, the option of meeting in-person or virtually, time and location options, and the consent form. Because the researcher intended to use the qualitative data to provide a more in-depth look into the quantitative data, the participants of the interviews were representatives of the quantitative data. A total of six interviews were conducted and were representative of three of the six districts.

**Instrumentation**

The use of various instruments was used to conduct this mixed methods study. Details are provided for both the quantitative and qualitative methods, with attention to the data collection process for the explanatory sequential design. Quantitative and qualitative databases were analyzed separately, then integrated so that the qualitative results help expand upon the quantitative results (Creswell & Creswell, 2018).

**Quantitative**

The quantitative portion of this study utilized the Teacher Efficacy for Inclusive Practices (TIEP) scale developed by Sharma et al. (2012). Researchers developed the TEIP scale based on an educator’s ability to provide and utilize inclusive practices to all learners, rather than a narrowed focus on specific disabilities (Sharma et al., 2012). Originally, a total of 35 statements were produced by the researchers in the form of “I can…, I am confident…, or I am…” (Sharma et al., 2012, p.14), and responses among 609 participants utilized a six-point anchor system ranging from strongly disagree to strongly agree. A Delphi approach was used for initial validation of the scale and six
university faculty members working in the field of special education and/or educational psychology evaluated the scale for question usefulness and clarity (Sharma et al., 2012). These faculty members recommended that six items be deleted because they had a rating of less than two. Inter-correlations between items were computed, which lead to a deletion of two more items. Additionally, exploratory factor analysis was also conducted to determine the factor structure among the statements. Researchers included items in a factor if their factor coefficient exceeded .40, and if the item did not reach that threshold, it was deleted. Eight more items were deleted during this stage (Sharma et al., 2012).

After analysis of the results, 18 items were left and three factors were identified. Factor one, Efficacy to use Inclusive Instruction consists of items 5, 6, 10, 14, 15, and 18. Factor two, Efficacy in Collaboration consists of items 3, 4, 9, 12, 13, and 16. Factor three, Efficacy in Managing Behavior consists of items 1, 2, 7, 8, 11, and 17. The reliability of the full scale of all three factors was computed using Cronbach alphas. Alpha coefficients for all three factors ranged from 0.85 to 0.93, and the reliability of the full scale was 0.89, revealing the scale provides a reliable measure of teacher self-efficacy for inclusive practices. A demographic section that requests the participants’ district in which they teach, years of teaching experience and level of education will be added to the survey.

The TEIP scale was delivered using a web-based survey tool, QuestionPro®, over two weeks beginning in November of 2021. The researcher used this web-based tool for its efficiency in compiling the responses in a format that could easily be transferred into a statistical software system.
Qualitative

The qualitative portion of this study utilized interviews. Interviews are a type of qualitative inquiry that allows the researcher to enter the other person’s perspective and learn how they make sense of or attach meaning to the things around them (Patton, 2015). For this study, interviews were used to provide a more in-depth look into the level of self-efficacy of teaching students with disabilities and identify specific factors that influence teacher self-efficacy and the role of teacher preparation programs and professional development workshops on their self-efficacy.

A set of 13 open-ended questions guided each interview (See Appendix C). The questions were based on the results of the quantitative survey results with the intent of keeping the discussion open and free-flowing, but on topic. Upon completion, the researcher transcribed the interviews using rev.com® Once the interviews were transcribed, the researcher coded the data into emerging themes using the constant comparative method (Lincoln & Guba, 1985).

Ethical Considerations

Prior to the research study, the researcher received approval from the Arkansas Tech University Institutional Review Board (IRB) to conduct the study (Appendix D) and all participants were provided with a consent form (Appendix F) that included their rights and privileges as a participant. Participants were informed that by entering and completing the survey they were providing their consent to be included in this study. Similarly, before the interview, participants were provided a second consent form that again included their rights as participants and informed them that they would be recorded by the researcher if they chose to participate in the study. Participants provided consent
by signing the interview consent form (Appendix G). Prior to both portions of the study, participants were informed that they could withdraw from the study at any time without penalty, by simply contacting the researcher and asking to be removed from the study. Although demographic information was collected by the survey, no identifiers were used to identify specific school districts or individual teachers. Anonymity for the participants was maintained throughout this study.

**Data Collection**

Prior to the data collection, the researcher established site authorization from six school districts in northwest Arkansas. Recruitment emails (Appendix E) were sent on October 19, 2021. The recruitment email contained information about the researcher, the purpose of the study, and the request to gain site approval from each superintendent. After one week, a total of six superintendents granted permission for the study to be conducted within their district. A second email was then sent on November 9, 2021, to either the superintendent, the person he/she deemed appropriate to disseminate the information, or to the secondary teachers within the school districts. The recruitment script again contained information about the researcher, the purpose of the study, informed consent (Appendix F), and the request for the teachers to participate in the study.

**Quantitative**

The quantitative data utilized a survey approach to explore the current level of teacher self-efficacy for teaching students with disabilities in mainstream classrooms. A survey approach is “utilized to observe trends, attitudes, or opinions of the population of interest” (Edmonds & Kennedy, 2013, p. 107). This type of approach can be used to
gather information and knowledge to make informed decisions (Lavrakas, 2008). The goal of this survey was to gather the most accurate information to provide insight into the level of self-efficacy and patterns of strengths and weaknesses relating to meeting the needs of diverse learners. The TEIP survey consisted of five demographic questions and 18 Likert-scale questions. The survey took approximately 15-20 minutes to complete, and participants had two weeks to complete. Of the participating school districts, the researcher hoped to obtain at least 100 survey responses. By the end of the two weeks, 101 completed surveys had been completed.

**Qualitative**

For the qualitative portion of this study, a total of six participants engaged in follow-up interviews. The survey respondents were asked to email the researcher if they wished to participate in a follow-up interview. The interviews were held over two weeks beginning on December 14, 2021. Participants were given the option of virtual or in-person interviews, and given the option of before or after school hours for a 30-minute time block. Three participants chose a virtual interview and three chose an in-person interview. In-person interviews were conducted at the participant’s current school and were recorded on a mobile device locked by the researcher, and virtual interviews were recorded via WebEx. All interview sessions were then uploaded to rev.com® and transcribed verbatim.

During the interviews, the researcher posed 13 open-ended questions to further investigate perceived strengths and weaknesses, and the role of preservice teacher training and professional development workshops on self-efficacy. The ultimate goal of utilizing interviews was to capture multiple perspectives and experiences to gain a deeper
understanding of the current level of self-efficacy and factors that influence the self-efficacy among participants. The data from the interviews were collected through the use of a protocol consisting of a standardized, open-ended instrument (See Appendix C). A standardized, open-ended instrument uses questions determined in advance of the interview, asked in an open-ended manner to allow participants to respond in any manner they wish. The advantage of this style of interviewing is that it allows for probing questions by the interviewer when a point arises unexpectedly (Patton, 2015). The interviews attempted to provide a more in-depth understanding of the quantitative data and assist in identifying factors related to self-efficacy.

**Reflexivity**

Reflexivity is both a concept and a process that involves examining one’s own judgments and acknowledging one’s own perspective (Patton, 2015). As a concept, reflexivity refers to a certain level of consciousness, while the process entails a form of self-awareness and active engagement in the research process (Palaganas et al., 2017). Reflexivity is a continuous process of reflection and introspection on the role of subjectivity in qualitative research (Palaganas et al., 2017). Patton (2015) says that reflexivity

reminds the qualitative inquirer to be attentive to and conscious of the cultural, political, social, linguistic, and economic origins of one’s perspective and voice, as well as the perspective and voices of those one interviews and those to whom one reports. (p. 70)
The qualitative portion of this study required the researcher to act as the research instrument, therefore it is necessary to make the reader aware of my own experiences and perspectives, and recognize that this research study is personal for me.

I first started my education journey by obtaining a Bachelor’s degree in secondary English education. During the internship portion of the program, I formed a relationship with a young girl at the junior high in which I was interning. I vividly recall her rarely coming to school, and when she did, she called out during class, made jokes, and was usually sent to the principal’s office by the middle of the first period. When she was present, I noticed that she continuously was pulled out of the classroom by another teacher, usually during my instruction. Intrigued, I asked why she was always pulled out of class, which my mentor teacher told me she was a special education student who received extra reading help. I remember thinking, but this is a reading class, why does she have to go to another class to get help with the same skills? Not long after this realization, I asked that she stay in class and I would work with her on those reading skills. I remember not knowing much about her disability, or whether I was altering my instruction well enough to help her, but knew it was my job to ensure she succeeded.

By the end of the semester, the same student was coming to class significantly more than she was at the beginning of the year, and she was not being sent to the principal’s office nearly as much. Once I completed my internship, I immediately went back to college to obtain a Master’s degree in special education. I reflect on this because it was the first time I realized how important it was that all students are provided equitable opportunities to succeed alongside their peers. This experience taught me how important it is to feel included and feel like you belong, especially as a child in school.
As the years have gone by, I continuously think about this young girl, and not only how important it is that we give all students those opportunities, but that teachers feel they have the tools to provide those opportunities to a diverse group of academic and behavioral needs.

Professionally, I have gone on to teach resource classrooms, self-contained classrooms, co-taught in general education classrooms, and serve as a district special education specialist. In each setting or job, I try to put myself in the shoes of that young girl. I reflect on my Bachelor’s degree in English education and wonder why I did not have more training on students with disabilities. I have watched teachers over the years struggle with students with special needs, and I have watched other teachers excel in meeting the needs of students with special needs. These varying observations have led me to further explore the experiences of general education teachers and their efficacy in teaching students with disabilities, as well as factors that contribute to their perceived level of efficacy. As I collected and analyzed my data, I recognized my own experiences and worked to eliminate any biases, whether personal or professional.

**Data Analysis**

The data for this study were analyzed using both quantitative and qualitative methods. Due to the explanatory sequential design, different instruments were utilized to represent the data. Quantitative analysis was conducted using the Statistical Package for the Social Sciences (SPSS) software and utilizing descriptive statistics, one-way analysis of variance (ANOVA), and independent samples t-test. Qualitative data were analyzed by coding and identifying reoccurring themes. Analysis of both the quantitative and qualitative data provided the researcher with the current level of general teacher self-
efficacy in teaching students with disabilities, as well as specific factors and contribute to the current level of efficacy.

**Quantitative**

Results from the TEIP survey were transferred from QuestionPro®, into SPSS®, and coded for anonymity. Among the demographic data, school district names were collected for the sole purpose of research question five, *Is there a difference by school district on the level of teacher self-efficacy and teaching students with disabilities in general education classrooms?*

The researcher coded school district names by assigning each school district a random number: SD1, SD2, SD3, SD4, SD5, and SD6. Years of experience were labeled as the following: 1: 1-5 years, 2: 5-10 years, 3: 10-15 years, 4: 15-20 years, 5: More than 20 years. Type of certification was labeled as 1: Traditional and 2: Non-Traditional. The level of education was labeled as 1: Bachelor, 2: Master’s, 3: Specialist, 4: Doctorate. Finally, the Likert-scale questions were labeled as the following, 1: Strongly Disagree, 2: Disagree, 3: Disagree Somewhat, 4: Agree Somewhat, 5: Agree, 6: Strongly Agree.

Means, frequencies, and standards deviations were used to analyze survey results as they relate to research questions 1 and 1a, *What is the current level of self-efficacy of secondary, general education teachers on teaching students with disabilities in general education classrooms* and within the three factors of the TEIP survey, *Efficacy to use Inclusive Instruction* (scaled items 5, 6, 10, 14, 15, and 18), *Efficacy in Collaboration* (scaled items 3, 4, 9, 12, and 16), and *Efficacy in Managing Behavior* (scaled items 1, 2, 7, 8, 11, and 14).
Utilizing the means and standard deviations provided the researcher with a difference in variance between each group and provided a level of efficacy among each item, factor, and overall scale. Research questions two, three, and five were analyzed using a one-way ANOVA. Utilizing this type of statistical technique allowed the researcher to compare whether the sample means were significantly different among the groups. Research question four was analyzed using an independent samples t-test to compare the means of two independent groups to determine if they are significantly different among the level of efficacy. The results of this survey also supplied the researcher with follow-up questions for clarification and/or identifying specific factors contributing to the patterns of strengths and weaknesses.

**Qualitative**

The qualitative data, research questions six and seven, were analyzed using the constant comparative method. This is the process by which the researcher breaks down the data into units and codes them into categories to find emerging themes (Lincoln & Guba, 1985). This iterative process was chosen to provide both descriptive and explanatory categories that provide insight into the participants’ own experiences as they relate to individual classroom phenomena as well as ensuring the exhaustion of all angles of the topic, contributing to the validity of the research (Lincoln & Guba, 1985). The researcher transcribed the data from the interviews using *rev.com®* and conducted the constant-comparative method by coding the data, categorizing the codes, and locating emerging themes. The analysis of this data attempted to provide the researcher with a more in-depth understanding of the overall quality of professional development sessions.
and teacher education programs, as well as help identify specific factors that contribute to the overall success of meeting the academic and behavioral needs of diverse learners.

Summary

Chapter III presented the methodology, research design and rationale, participant sample, survey instrument, and data collection procedures for this study. Chapter IV will present the findings and provide a statistical analysis of this explanatory sequential study. The findings from the quantitative data analysis will be presented in tables. Tables will include results from the survey as a whole, results from each question, and responses to demographic questions. Findings from the qualitative data will be presented in themes with direct quotes to provide additional insight into the factors that influence teacher self-efficacy, including the role of teacher preparation programs and professional development workshops.
Chapter IV: Data Analysis and Results

The advancement of inclusive practices and educating students with disabilities in mainstream classrooms has continuously added to the role of general education teachers. They now must increase their capacity to meet the needs of diverse learners in their classrooms, specifically students with disabilities (Abbas, 2016; Forlin & Chambers, 2011). Because of the added roles contributing to inclusive practices, general education teachers report feeling inadequately prepared to teach students with disabilities in their classrooms (Byrd & Alexander, 2020; Flower et al., 2017; Kantor 2011; Mullings, 2011; O’Conner et al., 2016; Sammon et al., 2020). Due to these reports, the purpose of this study was to examine the current level of self-efficacy of secondary, general education teachers on teaching students with disabilities in the mainstream classrooms, explore factors that contribute to the level of efficacy, as well as the role that teacher preparation programs and professional development workshops have on the level of the efficacy in select Arkansas schools.

Research Questions

The following section outlines the quantitative and qualitative analysis of data and results and/or findings for each of the seven research questions in this study:

1. What is the current level of self-efficacy of secondary, general education teachers on teaching students with disabilities in general education classrooms?
   a. What is the current level of self-efficacy among secondary, general education teachers within the three factors, efficacy to use inclusive instruction, efficacy in collaboration, and efficacy in managing behavior?
2. Is there a difference in self-efficacy among secondary, general education teachers and years of teaching?

3. Is there a difference in the level of education and the self-efficacy of secondary, general education teachers?

4. Is there a difference in the type of certification and the level of self-efficacy of secondary, general education teachers?

5. Is there a difference by school district on the level of teacher self-efficacy and teaching students with disabilities?

For the qualitative portion of this study, the research questions were as follows:

6. What factors contribute to perceived strengths and weaknesses regarding self-efficacy of secondary, general education teachers teaching students with disabilities?

7. What roles do teacher education programs and continuing professional development workshops play in the perceived levels of teacher self-efficacy for general education teachers instructing students with disabilities?

**Descriptive Findings**

The sample used in the quantitative phase of this research study consisted of 101 general education teachers teaching students with an active IEP in the Northwest region of Arkansas. Table 1 displays the demographic data that shows the breakdown of participants by years of experience, level of education, type of educator certification, and the number of participants from each district studied.

According to survey item one, 29.70% \((n = 30)\) of the participants have taught for 1-5 years, 14.90% \((n = 15)\) of the participants have taught for 5-10 years, 15.80% \((n =
16) of the participants have taught for 10-15 years, 15.80% (n = 16) of the participants have taught for 15-20 years, and 23.80% (n = 24) of the participants have taught for more than 20 years.

Table 1

*Frequency Counts for Demographic Variables (N=101)*

<table>
<thead>
<tr>
<th>Years of teaching experience (years)</th>
<th>Frequency</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>1-5</td>
<td>30</td>
<td>29.70%</td>
</tr>
<tr>
<td>5-10</td>
<td>15</td>
<td>14.90%</td>
</tr>
<tr>
<td>10-15</td>
<td>16</td>
<td>15.80%</td>
</tr>
<tr>
<td>15-20</td>
<td>16</td>
<td>15.80%</td>
</tr>
<tr>
<td>20+</td>
<td>24</td>
<td>23.80%</td>
</tr>
<tr>
<td>Bachelor’s</td>
<td>22</td>
<td>21.80%</td>
</tr>
<tr>
<td>Master’s</td>
<td>67</td>
<td>66.30%</td>
</tr>
<tr>
<td>Highest degree level</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Specialist</td>
<td>8</td>
<td>7.90%</td>
</tr>
<tr>
<td>Doctorate</td>
<td>2</td>
<td>2.00%</td>
</tr>
<tr>
<td>Missing</td>
<td>2</td>
<td>2.00%</td>
</tr>
<tr>
<td>Traditional</td>
<td>77</td>
<td>76.20%</td>
</tr>
<tr>
<td>Non-Traditional</td>
<td>24</td>
<td>23.80%</td>
</tr>
<tr>
<td>SD1</td>
<td>36</td>
<td>35.60%</td>
</tr>
<tr>
<td>SD2</td>
<td>9</td>
<td>8.90%</td>
</tr>
<tr>
<td>SD3</td>
<td>14</td>
<td>13.90%</td>
</tr>
<tr>
<td>SD4</td>
<td>3</td>
<td>3.00%</td>
</tr>
<tr>
<td>SD5</td>
<td>15</td>
<td>14.90%</td>
</tr>
<tr>
<td>SD6</td>
<td>24</td>
<td>23.80%</td>
</tr>
</tbody>
</table>

Most teachers (66.30%; n = 67) hold a master’s degree, with 21.80% (n = 22) of the teachers holding a bachelor’s degree, 7.90% (n = 8) having a specialist’s degree, and 2.0% (n = 2) possessing a doctorate, while another 2.0% (n = 2) did not respond to this item. Among the participants, 76.20% (n = 77) gained their educator licensure through a traditional university program, while 23.80% (n = 24) gained educator licensure through a non-traditional university program.
The final demographic question asked which school district the participant currently works. The largest majority of participants 35.60% \((n = 36)\) work in SD1, while 8.90% \((n = 9)\) of the participants work in SD2, 13.90% \((n = 14)\) work in SD3, 3.0% \((n = 3)\) work in SD4, 14.90% \((n = 15)\) work in SD5, and 23.80% \((n = 24)\) of the participants work in SD6.

**Quantitative**

The following section analyzes the results of the five quantitative research questions in this study. Research questions one through five were examined using the following Likert Scale response ranges: “Strongly Disagree”, “Disagree Somewhat”, “Disagree”, “Agree Somewhat”, “Agree”, and “Strongly Agree”. The results of this portion of the study gave insight into the current level of efficacy among the entire participant population, as well as within each scaled factor, and among the demographics shown in Table 1 (years of teaching experience, highest degree level, type of educator licensure, and current school district).

**Research Question One**

The first research question in this study was; *What is the current level of self-efficacy of secondary, general education teachers on teaching students with disabilities in general education classrooms?* The purpose of this research question was to determine the level at which the participants rated their ability to teach students with disabilities in their general education classroom. Furthermore, a sub-question was generated to examine the level of efficacy among the three factors in the survey, *Efficacy to use Inclusive Instruction* (survey items 5, 6, 10, 14, 15, and 18), *Efficacy in Collaboration* (survey
items 3, 4, 9, 12, 13, and 16), and Efficacy in Managing Behavior (survey items 1, 2, 7, 8, 11, and 14).

Table 2 indicates the descriptive statistics that were used to analyze the means and standard deviations to determine the current level of efficacy among all participants for all factors. Within response to the survey, the higher the response score the higher level of efficacy indicated. Scores from the TEIP survey indicate that a majority of participants either “Agreed Somewhat” or “Agreed” on their ability to teach students with disabilities in their classrooms ($M =4.82$, $SD = 0.42$).

**Table 2**

*General Education Teacher Responses to TEIP Survey*

<table>
<thead>
<tr>
<th>TEIP Question</th>
<th>$M$</th>
<th>$SD$</th>
</tr>
</thead>
<tbody>
<tr>
<td>I can make my expectations clear about student behavior.</td>
<td>5.38</td>
<td>0.94</td>
</tr>
<tr>
<td>I am able to calm a student who is disruptive or noisy.</td>
<td>4.91</td>
<td>0.90</td>
</tr>
<tr>
<td>I can make parents feel comfortable coming to school.</td>
<td>5.07</td>
<td>0.92</td>
</tr>
<tr>
<td>I can assist families in helping their children do well in school.</td>
<td>4.98</td>
<td>0.99</td>
</tr>
<tr>
<td>I can accurately gauge student comprehension of what I have taught.</td>
<td>4.95</td>
<td>0.82</td>
</tr>
<tr>
<td>I can provide appropriate challenges for very capable students.</td>
<td>4.79</td>
<td>0.99</td>
</tr>
<tr>
<td>I am confident in my ability to prevent disruptive behavior in the classroom before it occurs.</td>
<td>4.79</td>
<td>0.95</td>
</tr>
<tr>
<td>I can control disruptive behavior in the classroom.</td>
<td>4.81</td>
<td>0.92</td>
</tr>
<tr>
<td>I am confident in my ability to get parents involved in school activities for their children with disabilities.</td>
<td>3.89</td>
<td>1.25</td>
</tr>
<tr>
<td>I am confident in designing learning tasks so that the individual needs of students with disabilities are accommodated.</td>
<td>4.64</td>
<td>1.03</td>
</tr>
<tr>
<td>I am able to get children to follow classroom rules.</td>
<td>4.92</td>
<td>0.87</td>
</tr>
<tr>
<td>TEIP Question</td>
<td>M</td>
<td>SD</td>
</tr>
<tr>
<td>-------------------------------------------------------------------------------</td>
<td>-------</td>
<td>-----</td>
</tr>
<tr>
<td>I am able to work jointly with other professionals and staff (e.g., aides, other teachers) to teach students with disabilities in the classroom.</td>
<td>5.09</td>
<td>0.97</td>
</tr>
<tr>
<td>I am confident in my ability to get students to work together in pairs or small groups.</td>
<td>5.16</td>
<td>0.96</td>
</tr>
<tr>
<td>I can use a variety of assessment strategies (e.g., portfolio assessment, modified tests, performance-based assessment, etc.).</td>
<td>5.02</td>
<td>0.99</td>
</tr>
<tr>
<td>I am confident in informing others who know little about laws and policies relating to the inclusion of students with disabilities.</td>
<td>4.26</td>
<td>1.33</td>
</tr>
<tr>
<td>I am confident when dealing with students who are physically aggressive.</td>
<td>4.03</td>
<td>1.49</td>
</tr>
<tr>
<td>I am able to provide an alternate explanation or example when students are confused.</td>
<td>5.22</td>
<td>0.93</td>
</tr>
<tr>
<td>Total</td>
<td>4.82</td>
<td>0.42</td>
</tr>
</tbody>
</table>

Research question 1A was; *What is the current level of self-efficacy among secondary, general education teachers within the three factors, Efficacy to use inclusive instruction, Efficacy in collaboration, and Efficacy in managing behavior?*

Table 3 indicates the means and standard deviations for factor one, *Efficacy to use inclusive instruction* (survey items 5, 6, 10, 14, 15, and 18). Descriptive statistics used to determine participant level of efficacy among factor one indicates a majority of participants either “Agreed Somewhat” or “Agreed” on their ability to use inclusive instruction in their classrooms (*M* = 4.96, *SD* = 0.22)
Table 3

*Teacher Responses to Factor 1: Efficacy to use Inclusive Instruction*

<table>
<thead>
<tr>
<th>TEIP Question</th>
<th>M</th>
<th>SD</th>
</tr>
</thead>
<tbody>
<tr>
<td>I can accurately gauge student comprehension of what I have taught.</td>
<td>4.95</td>
<td>0.82</td>
</tr>
<tr>
<td>I can provide appropriate challenges for very capable students.</td>
<td>4.79</td>
<td>0.99</td>
</tr>
<tr>
<td>I am confident in designing learning tasks so that the individual needs of students with disabilities are accommodated.</td>
<td>4.64</td>
<td>1.03</td>
</tr>
<tr>
<td>I am confident in my ability to get students to work together in pairs or small groups.</td>
<td>5.16</td>
<td>0.96</td>
</tr>
<tr>
<td>I can use a variety of assessment strategies (e.g., portfolio assessment, modified tests, performance-based assessment, etc.).</td>
<td>5.02</td>
<td>0.99</td>
</tr>
<tr>
<td>I am able to provide an alternate explanation or example when students are confused.</td>
<td>5.22</td>
<td>0.93</td>
</tr>
<tr>
<td>Total</td>
<td>4.96</td>
<td>0.22</td>
</tr>
</tbody>
</table>

Table 4 provides the descriptive statistics for factor two, *Efficacy in Collaboration* (survey items 3, 4, 9, 12, 13, and 16), indicate teachers “Disagreed Somewhat”, “Somewhat Agreed”, or “Agreed” with statements regarding their ability to effectively collaborate with parents and other professionals ($M = 4.71, SD = 0.51$).

Table 4

*Teacher Responses to Factor 2: Efficacy in Collaboration*

<table>
<thead>
<tr>
<th>TEIP Question</th>
<th>M</th>
<th>SD</th>
</tr>
</thead>
<tbody>
<tr>
<td>I can make parents feel comfortable coming to school.</td>
<td>5.07</td>
<td>0.92</td>
</tr>
<tr>
<td>I can assist families in helping their children do well in school.</td>
<td>4.98</td>
<td>0.99</td>
</tr>
</tbody>
</table>
I am able to work jointly with other professionals and staff (e.g., aides, other teachers) to teach students with disabilities in the classroom.

I am confident in informing others who know little about laws and policies relating to the inclusion of students with disabilities.

| Total          | 4.71 | 0.51 |

Descriptive statistics for factor three, *Efficacy in Managing Behavior* (survey items 1, 2, 7, 8, 11, and 14 indicate teachers mostly “Somewhat Agreed”, or “Agreed” with statements regarding their ability to effectively collaborate with parents and other professionals ($M = 4.81$, $SD = 0.24$).

**Table 5**

*Teacher Responses to Factor 3: Efficacy in Managing Behavior*

<table>
<thead>
<tr>
<th>TEIP Question</th>
<th>M</th>
<th>SD</th>
</tr>
</thead>
<tbody>
<tr>
<td>I can make my expectations clear about student behavior.</td>
<td>5.38</td>
<td>0.94</td>
</tr>
<tr>
<td>I am able to calm a student who is disruptive or noisy.</td>
<td>4.91</td>
<td>0.90</td>
</tr>
<tr>
<td>I am confident in my ability to prevent disruptive behavior in the classroom before it occurs.</td>
<td>4.79</td>
<td>0.95</td>
</tr>
<tr>
<td>I can control disruptive behavior in the classroom.</td>
<td>4.81</td>
<td>0.92</td>
</tr>
<tr>
<td>I am able to get children to follow classroom rules.</td>
<td>4.92</td>
<td>0.87</td>
</tr>
<tr>
<td>I am confident when dealing with students who are physically aggressive.</td>
<td>4.03</td>
<td>1.49</td>
</tr>
<tr>
<td>Total</td>
<td>4.81</td>
<td>0.24</td>
</tr>
</tbody>
</table>
Research Question Two

A one-way ANOVA (Table 6) was conducted to explore the possible effect of years of teaching experience and the level of self-efficacy among teachers. The data indicated no significant difference \( (F(4, 93) = [1.161], p = .333), \) in years of experience and current level of self-efficacy in teaching students with disabilities. Therefore, it can be concluded that years of experience do not have a significant effect on the level of self-efficacy in teaching students with disabilities in this sample.

Table 6

One Way ANOVA for Years of Experience and Level of Self-Efficacy

<table>
<thead>
<tr>
<th></th>
<th>df</th>
<th>MS</th>
<th>F</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td>Between Groups</td>
<td>4</td>
<td>172</td>
<td>1.161</td>
<td>0.333</td>
</tr>
<tr>
<td>Within Groups</td>
<td>93</td>
<td>148.145</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Total</td>
<td>97</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Research Question Three

A one-way ANOVA (Table 7) was conducted to explore the possible effect of the level of education among participants and the level of self-efficacy among teachers. The data indicated no significant difference \( (F(3, 92) = [1.254], p = .295) \) in years of experience and current level of self-efficacy in teaching students with disabilities. Results indicated that the level of education does not have a significant effect on the level of self-efficacy in teaching students with disabilities in this sample.
Research Question Four

Analysis of research question four required an independent samples t-test to determine if the type of educator license had an effect on the level of self-efficacy among participants in this sample. As indicated in Table 8, participants with a traditional licensure ($M = 87.523, SD = 12.97$) reportedly had similar outcomes from the survey as participants with a non-traditional licensure ($M = 88.739, SD = 9.47$). The results from the one-tailed t-test (Table 9) indicated there was no significant effect for type of education license on level of efficacy for teaching students with disabilities in general education classrooms; $t(-.509) = 96, p = .306$.

Table 8

<table>
<thead>
<tr>
<th>Type of Education Licensure</th>
<th>$N$</th>
<th>$M$</th>
<th>$SD$</th>
</tr>
</thead>
<tbody>
<tr>
<td>Traditional</td>
<td>75</td>
<td>87.523</td>
<td>12.97</td>
</tr>
<tr>
<td>Non-Traditional</td>
<td>23</td>
<td>88.739</td>
<td>9.47</td>
</tr>
</tbody>
</table>
Table 9

Independent Samples t-Test on Type of Education Licensure and Level of Self-Efficacy

<table>
<thead>
<tr>
<th></th>
<th>t</th>
<th>df</th>
<th>p</th>
<th>Standard Error</th>
<th>Mean</th>
</tr>
</thead>
<tbody>
<tr>
<td>Equal variances assumed</td>
<td>-.509</td>
<td>96.000</td>
<td>.306</td>
<td>-.1485</td>
<td></td>
</tr>
<tr>
<td>Equal variances not</td>
<td>-.599</td>
<td>49.689</td>
<td>.276</td>
<td>-.1485</td>
<td></td>
</tr>
</tbody>
</table>

Research Question Five

A one-way ANOVA (Table 10) was also conducted for research question five, Is there a difference by school district on the level of teacher self-efficacy among secondary, general education teachers? The analysis of variance data indicated no significant difference ($F(5, 92) = [.883], p = .496$) in the school district and current level of self-efficacy in teaching students with disabilities. It can be concluded that there is no significant difference in the level of efficacy among school districts in this study.

Table 10

Analysis of Variance for School District and Level of Self-Efficacy

<table>
<thead>
<tr>
<th></th>
<th>df</th>
<th>MS</th>
<th>F</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td>Between Groups</td>
<td>5</td>
<td>132.433</td>
<td>.883</td>
<td>.496</td>
</tr>
<tr>
<td>Within Groups</td>
<td>92</td>
<td>150.036</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Total</td>
<td>97</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Qualitative

The following section analyzes the results of the two qualitative research questions. The qualitative data were collected through follow-up interviews among six participants who completed the TEIP survey. Results were analyzed using the constant comparative method (Lincoln & Guba, 1985). The researcher had recorded all interviews and
transcribed them using rev.com®. Once the interviews were transcribed, the research
coded the data into themes and sub-themes as they related to perceived strengths and
weaknesses, and the role of teacher preparation programs and professional development
sessions on the level of self-efficacy for teaching students with disabilities. The results of
the analysis are discussed below in the form of frequencies and direct quotes.

Table 11 indicates the demographic information for respondents. Participants
indicated how many years of teaching experience, how many years of teaching students
with disabilities in general education classrooms, and the types of inclusive settings in
which they have taught. Most \((n = 3)\) had taught for 10-15 years, some \((n = 2)\) for 15-20
years, while one \((n =1)\) had taught for 0-5 years. Participants were also asked, among
those years, how many have you taught students with disabilities. Participants indicated
either 0-5 years \((n = 2)\), 10-15 years \((n = 2)\), and more than 20 years \((n = 2)\). Finally,
participants were asked what types of inclusive settings they have used to teach students
with disabilities. It’s important to note that \(n \neq 6\) for this demographic because
participants could have used more than one type of instruction. Among participants,
push-in or pull-out instruction \((n =4)\) and indirect instruction \((n = 4)\) were the types of
instruction utilized most. Co-taught instruction \((n = 3)\) was indicated by half of the
participants, while intervention services \((n = 1)\) were also utilized by one participant.

**Table 11**

*Demographics of Interviewees*

<table>
<thead>
<tr>
<th>Value Label</th>
<th>(N)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Years of Teaching Experience</td>
<td></td>
</tr>
<tr>
<td>0-5 years</td>
<td>1</td>
</tr>
<tr>
<td>5-10 years</td>
<td>0</td>
</tr>
<tr>
<td>10-15 years</td>
<td>3</td>
</tr>
<tr>
<td>15-20 years</td>
<td>2</td>
</tr>
<tr>
<td>More than 20 years</td>
<td>0</td>
</tr>
</tbody>
</table>
Years of Teaching Students w/ Disabilities
0-5 years 2
5-10 years 0
10-15 years 2
15-20 years 2
More than 20 years 0

Kinds of Inclusive Settings Used
Co-Taught 3
Push-In or Pull Out Instruction 4
Indirect 4
Intervention 1

Note: Data were obtained from interviews with general education teachers

**Research Question 6**

Research question six explored factors that contribute to participants’ perceived strengths and weaknesses regarding the self-efficacy of teaching students with disabilities in their general education classrooms. Below are themes found in support of RQ6, as well as quotes from participant interviews describing perceived strengths and weaknesses.

Qualitative data in the form of interviews revealed the following themes that correspond with participant strengths and weaknesses: classroom management, utilizing various instructional strategies, knowledge of curriculum and content, utilizing small groups, implementing IEPs, and planning time to differentiate instruction.

**Classroom Management.** When asked about their ability to control disruptive behaviors of students with disabilities, a majority of respondents felt it was a strength in their classroom and had successful strategies for managing those behaviors, although some found it as a weakness due to their ability to implement their strategies, especially for students with IEPs.
One interviewee stated:

I don’t see that as an issue more so than any other 12 or 13 year old. I don’t have tons of disruptive behaviors or to the point where I would consider it a problem for the classroom.

Another respondent agreed:

I feel good about it. On my board I have a noise control, so sometimes it’s a visual, sometimes it’s a sticky note on their desk, sometimes it’s just a look, but I feel good about it. You just have to adjust for that kid in that class.

Interviewee five indicated:

I feel like it’s definitely a strength of mine. I’m pretty good at de-escalating situations and talking to students like they’re mature individuals.

In addition to having positive feelings of being able to control disruptive behaviors, a majority of respondents felt they had good tools for managing behavior, but implementing them became more of a challenge:

I would say it’s hit or miss. I think consistently applying those [behavior] tools in a classroom of 28 students, day in and day out can get very challenging.

The participant went on to state:

It’s so hard to follow through with them. You can have the best intentions and set up a great plan, but then trying to follow through with it gets really challenging.

And we know that not following through is one of the worst things we can do with our students who struggle with disruptive behaviors.
Another interviewee added that controlling disruptive behaviors is difficult because teachers oftentimes fear the laws and regulations surrounding those with disabilities. Respondent two stated:

Having learned what I learned in class, knowing what the legal limits are seemed untouchable to me before. I was scared to write a kid up that had an IEP. I didn’t know what I could do, what constituted it being part of their disability and what wasn’t, and what I could do about it.

She went on to recall the specific situation:

He [student] knocked over bookshelves in my room. He knocked over desks and destroyed things. It wasn’t until it escalated to that point that he literally broke things in my classroom that I was finally able to get help. And then when I sat down with the principal he asked, well, why haven’t you been writing this student up? And I was like, I didn’t think I could do anything!

Respondent one recalled a specific example where she felt she had to either change her classroom or make sure that things were consistently the same in order to meet the environmental needs of a student with Autism. She stated:

A couple of years ago, I had a student with Autism in my room so I constantly tried to make sure that we didn’t have distractions on the wall, or that the slides looked similar every day we used them. I knew I couldn’t change the backgrounds or make things look different for him. Those small things help to make it a better learning environment for him and help control his disruptive behaviors, and it’s so important for teachers to know, but people don’t tell us these things.
**Instructional Strategies.** Overall, respondents were able to provide several instructional strategies that have proven useful in their classroom to meet the academic needs of students with disabilities and indicated that it was an overall strength. However, participants consistently agreed that most of the strategies came from their experiences of teaching to varying levels of needs and types of disabilities.

One interviewee indicated:

> I have found in my lab class this year that a lot of repeated practice with immediate feedback is helpful. I would say the basics, like, reading the text aloud, chunking, breaking down assignments into smaller tasks, eliminating distracting pieces from assignments or texts, giving fewer words to think about, different ways of showing what you know, or answering things verbally have proven successful over time.

Similarly, respondent one stated:

> I think giving them [students] options and alternatives is a huge thing, playing to their strengths. Why ask them for a paragraph if they can show it to me visually, or if they can show it to me in a sentence or two, or if they can tell me.

Respondent three added:

> I think going over vocab is a huge one that gets overlooked. I think a lot of people tend to contribute that to only ELL learners when it’s really about breaking down the words and know what the part of it is. Especially when we think about words in math that have different meanings than what they hear in English class.
In addition to having specific instructional strategies, when asked if those strategies came from experience versus training, she said “Absolutely, I have to continuously learn what works and what doesn’t work as I go”.

Similarly, to the other interviewees, participant two stated:

I think the biggest strategy I have learned recently that works really well is trying to make concepts visual for them, a visual connection for everything. I can’t just write things on the board, I have to help them draw it out, do a concept map, something that gives them more context and makes it visible for them so they can make better connections to the real world.

Interviewee number three also feels that making a connection to abstract concepts is extremely important:

Bringing in any kind of actual, real-world concept, because the abstract is very hard, especially for those struggling learners. When you can relate it to going to the grocery store or counting Halloween candy, whatever you can relate it to, they can immediately visualize and understand.

**Knowledge of Curriculum and Content.** Another theme that emerged related to factors that contribute to the level of self-efficacy as it relates to teaching students with disabilities is a teacher’s knowledge of the curriculum and content in which he/she is teaching. For instance, respondent three indicated:

This year is a lot harder because it’s my first year to teach eighth grade. So not only am I planning with new standards and new instruction, whereas before when it was something I had already taught, I knew how to I wanted to break it up and
how I wanted to adjust it to differentiate, right now I’m learning how to teach it, so I’m just figuring it out as we go.

Another interviewee indicated that knowledge of content and curriculum is an important factor in being able to meet the needs of students with disabilities:

I think if it’s a standard that I know the vertical alignment, like when I know what they did last year, I can pull those skills apart. That way I do really well. But when it’s a standard that I don’t know the vertical alignment as well, I’m not as comfortable when trying to teach it to various levels.

**Small Groups.** Overall, participants all felt that pulling students into small groups provides teachers with a greater opportunity to assess student learning and differentiate their instruction to better meet individual student needs, however being able to utilize those small groups in their classroom is a huge variable that impacts student learning and their ability to meet student needs.

Participant six indicated:

I’m comfortable with my ability [to teach students with disabilities], but I’m not comfortable with the time in which I have to spend with them because I know I need to spend more time in a small group so that I can lower my instruction and ask more simple questions that can guide them. It makes them feel more successful and then they’re more likely to persevere. They don’t always get that from the whole group.

Interviewee four had a similar response:

I think I have a lot of tools, but I think consistently being able to apply those tools in a classroom of 28 students, day in and day out, can get very challenging. But
when I’ve got smaller groups and have the time and space to be able to have those intentional conversations and work through their goals, it’s a lot more feasible in a class of 8 or 10 than it is in a 28-person class.

Similarly, interviewee three stated:

I feel like when we do independent work and we do small groups, I thrive there. You can see the processing on their face or through those small group talks, whereas in a whole group I just can’t tell how much they are processing.

**Implementing IEPs.** When asked about their ability to implement IEPs in the classroom, respondents had varying viewpoints. Three of the interviewees felt they had little to no problems implementing IEPs. However, it’s important to recognize that these three respondents have been teaching the longest, 10-20 years, and felt they had more experience with implementation. One respondent indicated:

I think I’ve had quite a bit of experience at this point and I have figured out what different accommodations mean, what they look like, and what they translate to in terms of my content.

Another respondent had a similar response:

I don’t really have any issues with that. It’s usually preferential seating or related to reading assignments, and I’ve learned to a lot of those things anyway because it’s just good teaching.

In addition, respondent one added:

Normally, I feel pretty because I feel that I normally run a classroom that has multiple sets of expectations. We have different variations of everything. So more
often than not, IEPs just blend in with all of that. A lot of times it’s just good teaching and what kids need.

Among the six interviewees and their ability to implement IEPs, one interviewee felt that she does well in some areas, but consistent implementation oftentimes falls short. She said:

I feel like I do really well when it comes to an assessment because I know exactly what modifications they need when I’m assessing them. But on the day-to-day, I have to constantly go back and reread their IEP to be sure I’m doing those things. It just sometimes gets lost in the daily instruction.

Lastly, two respondents felt that the implementation of IEPs was a weakness in meeting the needs of students with disabilities in their classrooms. Interviewee five stated:

That’s my weakness, accommodations. I do it, of course, but it’s something I would like to be better at in real time, like being able to plan ahead for my accommodations and modifications because If I don’t do it ahead of time, it just puts stress on the kid because they see all of this stuff that maybe isn’t all meant for them, and that’s an issue.

Interviewee six responded:

I would say I failed miserably my first couple of years. It’s really difficult. I just didn’t know what I was legally responsible for, it’s so overwhelming. I feel like I’m slowly getting better, but it’s really hard.

**Planning Time.** One of the biggest themes that arose throughout the interviews as a barrier to providing effective instruction was planning time. All six participants felt that the amount of planning time it takes to differentiate instruction impacts their ability to
provide effective instruction to students with disabilities in their classrooms. When asked about the biggest barrier to providing instruction to students with disabilities, interviewee three stated:

Time. Planning time, time to research, time to actually know the background of each and every student and what they need. It’s just not there and one person alone cannot do it.

When the same question was asked to respondent six, the participant stated:

I would say planning for differentiation, I don’t do it. I have tried but it is so overwhelming and I thought, I’m not given the support to do it well, so unfortunately it doesn’t get done and instead of differentiating the content, I have to differentiate on the back end during the grading process which I know isn’t fair.

Respondent four stated:

I think the biggest barrier is time. Having time to work with colleagues, with support people to ask questions, to help do the planning and make the materials, and to build units together, all of those things, but time is huge.

Similarly, another respondent stated:

Time is an issue. If you have several needs with different kids who need different assignments, including the higher-level thinkers, then that’s another level. Just having all the levels and planning for them.

Further, respondent one also felt that time was the biggest barrier in providing effective instruction to students with disabilities:
Prep time. When you’re making multiple versions of anything, it’s going to take a lot more time to do it. Just the ability to put different things in or put different options in for kids, time just really becomes the biggest obstacle to it. The problem is I have to put together everything. So the time, the effort, there’s only one me.

Lastly, another respondent stated:

There’s not enough time. The IEP stands for individualized education plan. So if we’re planning individually for these students to some capacity, then time is just lacking. It’s the number one barrier.

Research Question 7

Research question seven explored the roles that teacher education programs and continuing professional development workshops play in the perceived levels of teacher self-efficacy for general education teachers instructing students with disabilities in general education classrooms. Qualitative data were collected in the form of interviews, and coded and transcribed using the constant comparative method. The data from this analysis is represented in the form of quotes.

Teacher Education Programs

While analyzing the data for the roles of teacher education programs, two major themes emerged. The first theme was the overall lack of education for general education teaching on teaching students with disabilities, and the second major theme was the lack of experience given in classrooms that have students with disabilities.

Lack of Education. Overall, participants felt that their teacher education provided minimal education in teaching students with disabilities, with some participants
stating they only remember taking a one-semester class throughout their entire college preparation program.

One participant stated:

I think I remember taking one class. They just checked it off the list. But there was nothing practical.

Another participant had a similar response when asked about the ability to provide instruction to students with disabilities as compared to students without disabilities:

We didn’t get a lot of education around that, in terms of teacher prep I mean. We had classes on differentiation, but I don’t think it went any farther than to just have stations or give two versions of the test. Very basic scaffolds is all I learned.

When asked specifically about how the teacher preparation program prepared their teachers to teach students with disabilities, one respondent answered:

It didn’t. I think they told us that these students with disabilities would exist and they told us it would be challenging, but that good instruction is good instruction, and if you are engaging and building relationships, cross your Ts and dot your Is as far as the paperwork, it’ll all work out. But that’s not really how it works in the real world.

Another respondent added:

I’ve never had any training for it. It’s all just been figuring it out on my own, figuring out what’s best for my kids. I feel like experience has been the only thing that has really gotten me here.

When asked how the participant felt about his/her teacher preparation programming preparing for teaching students with disabilities, respondent six stated:
I remember going into my first classroom as a teacher. I had two children who were supposed to have a para with them, but me being a first-year teacher, I didn’t even know that was a thing. I didn’t even realize until almost six weeks in that they couldn’t even write simple sentences. So no, I don’t think it prepared me, because I didn’t even know what to look for.

Interviewee five stated:

I think there’s so much preparation needed for teaching in general that teaching us about special education wasn’t a priority. I think that they went over basic classroom management, but that’s about it.

Lastly, interview five added:

There’s the good, the bad, and the ugly. I like it, and I enjoy it. I feel sad for teachers who don’t have the skills because that’s where you see those kids really struggling, and you know that it can be changed with their [classroom] environment. So I just wish everybody had that. A lot of people assume it just comes naturally, but I think training could definitely make a big difference.

**Experience.** Many participants felt that to be better prepared to teach students with disabilities in their classrooms, they needed more opportunities to work with those students during their teacher preparation program. When asked how teacher preparation programs could better prepare general education teachers to meet the needs of students with disabilities, interviewee one stated:

I think getting those who want to be teachers into more classrooms is key, and not putting them into one classroom. Maybe they’re at a school and they move to different classrooms within the school. Because then you’re going to see, not only
different kids, but you’re going to see the same kids in different situations and with different teachers. What works for some doesn’t work for all. I think just seeing it, you learn so much more.

Respondent four indicated:

I think it [teacher preparation program] was more just teaching us, what is an IEP? What is a 504? What does this mean? I don’t think there was anything practical as far as what it would look like to meet those needs in the classroom.

Respondent three stated:

I think that if it would have been a requirement within my [internship] hours to spend more time in those classes, I would’ve been more prepared.

Similarly, respondent five said:

I think knowing specific situations that are going to happen and practicing those would’ve really helped. I know that a lot of people were shocked when they first started teaching because they knew how to write a lesson plan, but they did not know how to handle student behavior.

The respondent added:

It [teacher preparation program] just needs to be more situational. More problem solving of how situations can play out.

Similarly, when asked how teacher preparation programs can better prepare teachers for teaching students with disabilities, respondent six stated:

I don’t know. It seems like every year I feel underprepared. Maybe giving more work examples. Like for math, letting you see what a seventh-grader that’s in special education working several grade levels below does compared to a seventh-
grader that’s at grade level. Just so they can realize the distance and what they
don’t know. I think even now I’m kind of mesmerized like ‘oh wow, you don’t
know that skill’, but then I have to teach it, too. Like, tell me how this [disability]
affects this child and an actual scenario of what that looks like in the classroom.
Respondent five also felt that specific work examples would have been beneficial:
Like if they’re writing an essay, give me specific examples of disabilities and the
modifications you could do when you assign the essay. When you are reading
Shakespeare, and you have kids who can’t read, what modifications can I do?
What’s helpful? Give me things I can walk into my classroom and implement
when I don’t have a clue what to do.

Professional Development

Analysis of the role of continuing professional development for general education
teachers on teaching students with disabilities revealed two themes, lack of professional
development opportunities regarding teaching students with disabilities, and the
relevance of the professional development on classroom practices.

Lack of Professional Development Opportunities. When asked about how often
they participate in professional development opportunities, participants felt that specific
professional development sessions relating specifically to teaching students with
disabilities were sparse.
Respondent six stated:
I think I did one [professional development] session at the beginning of the year.
It was one session that was related specifically to special ed, and then that was it.
So yeah, I’ve been here for three years and I’ve had one.
Respondent one stated:

I would love some [professional development] if some were offered to me. I don’t know that I’ve had anything beyond the training for students with dyslexia, and that was a one-time thing.

Another respondent stated:

It’s [PD activities regarding meeting the needs of students with disabilities] usually my go-to. If it’s a choice of professional development, it’s always one that I gravitate towards. I like to learn more and make those connections and relationships with my students. But I think they are few and far between.

**Relevance of Professional Development.** Analysis of the interviews revealed that the general education teachers studied felt that the professional development sessions they have received on meeting the needs of students with disabilities hasn’t necessarily been relevant to the specific needs in their classroom.

Respondent four said:

A lot of our PD has been one size fits all. Occasionally, our content PD will focus on some differentiation, but not a lot.

Similarly, interviewee three responded:

The PD that we go to as a district is usually always focused on curriculum and standards, and not necessarily how to best meet the needs of our students in our classrooms.

When asked, “How do you feel school districts can better support general education teachers in meeting the needs of students with disabilities”, interviewee three went on to say:
I think definitely providing PD that’s not just based on curriculum, but also on
who are our students and what are their needs? Even just how to read an IEP, and
what it actually means, and some examples of how to implement it.

Interviewee five stated:

I think the PD we go to is now just a lot of things that we already know, which I
get some teachers need, but I think there needs to be differentiation for people that
want to it [teach students with disabilities] better at not just the bare minimum. I
know the surface level of how to differentiate, but when what do you do? How do
you going?

In addition, respondent four said:

All of my professional development around differentiation, it all just feels very
surface level. It seems to revolve around easy ways to manipulate the content,
which I get. I’m a content person, I know how to manipulate and scaffold the
content. What I still don’t get is when that’s not working, what am I doing wrong?
Or what else can I do to serve those kids? So it’s that second level of, once I’ve
made those adjustments and they still don’t work, then what? And I don’t think
that’s ever addressed in PD.

Summary

Chapter IV focused on the analysis of findings based on the seven research
questions in this study. The quantitative research questions, RQ1-5, were analyzed using
descriptive statistics in the form of frequencies, means, and standards deviations, as well
as one-way ANOVAs, and an independent samples t-test. The qualitative research
questions, RQ6-7, were analyzed using the constant comparative method (Lincoln & Guba, 1985), revealing themes and sub-themes related to the research questions.

Chapter V will summarize the results discussed in this chapter and provide the conclusions for each research question. Chapter V will also discuss the implications and recommendations for school leaders and recommendations for future research.
Chapter V: Summary, Conclusions, and Recommendations

In 2019, more than 450,000 students with disabilities were educated alongside their peers in general education classes for more than 80% of their school day (National Center for Education Statistics, 2019). This is due to shifts in educational policies, legislation, and increased efforts for inclusive practices in public schools to ensure that all students, including students with disabilities, receive high-quality instruction alongside their same-aged peers. (Byrd & Alexander, 2020; Forlin & Chambers, 2011; McMaster, 2012; Miskovic & Curcic, 2016). Due to these efforts, the general education teacher now plays an important role in the success of inclusive programs and meeting the academic and non-academic needs of diverse learners (Abbas, 2016; Forlin & Chambers, 2011). However, current educational research indicates that general education teachers do not feel adequately prepared to teach students with disabilities in their classrooms (Byrd & Alexander, 2020; Flower et al., 2017; Kantor 2011; Mullings, 2011; O’Conner et al., 2016; Sammon et al., 2020).

The purpose of the research study was to explore the current levels of self-efficacy among secondary, general education teachers teaching students with disabilities, as well as explore factors that contribute to the level of self-efficacy, and the role of teacher preparation programs and professional development sessions. This study aims to contribute to the current body of knowledge by providing data on the current level of efficacy for teaching students with disabilities and provide data for professional development sessions and teacher preparation programs by identifying specific factors that influence the level of efficacy.
For this study, 101 general education teachers in Northwest Arkansas were surveyed using the TEIP scale, and six of those teachers participated in follow-up interviews. The qualitative data were analyzed using descriptive statistics in the forms of frequencies, means, and standard deviations, one-way ANOVAs, and an independent samples t-test. Table 1 (Chapter IV) displayed frequency counts for the demographics of survey participants. Table 2 (Chapter IV) represented responses to the entire TEIP scale, while Tables 3-5 (Chapter IV) displayed the responses in the forms of means and standard deviations among the three factors of the survey, *Efficacy in Inclusive Instruction, Efficacy in Collaboration*, and *Efficacy in Managing Behavior*. Tables 6 and 7 displayed one-way ANOVAs for years of experience and participants’ highest degree level on the level of efficacy. Table 8 represented an independent samples t-test for the type of educator licensure on the level of efficacy, and Table 9 represented a one-way ANOVA for each school district and the level of efficacy for teaching students with disabilities. Qualitative data was collected in the form of interviews and were analyzed using the constant comparative method. Table 10 (Chapter IV) illustrates the demographics of the respondents. Prevalent themes that emerged from the qualitative portion of the study are represented in Chapter IV as they related to research questions six and seven, as well as the contribution for follow-up data for the quantitative research questions one through five.

In this chapter, the researcher presents conclusions for each research question, implications, recommendations for school leaders and teacher preparation programs, and recommendations for future research. Conclusions for the seven research questions are presented based on the findings from the data analysis in Chapter IV. Implications for
school leaders and teacher preparation programs are then discussed based on the conclusions of each research question. Finally, the researcher gives recommendations for future research that will add to the current body of literature.

**Conclusions**

Findings from this research study are key to determining the efficacy of general education teachers teaching students with disabilities and factors that contribute to the level of efficacy. Major findings will provide insight into pre-service teacher training, as well as shaping professional development sessions that aid in improving teacher efficacy in teaching students with disabilities. Findings are discussed in detail below as they relate to each of the seven research questions.

**Research Question One**

The first research question explored the current levels of self-efficacy among general education teachers for teaching students with disabilities, as well as within the three factors of the survey: *Efficacy in Inclusive Instruction, Efficacy in Collaboration*, and *Efficacy in Managing Behavior*.

Results indicate the level of efficacy among general educators indicates teachers feel they have the overall ability to teach students with disabilities, but qualitative data indicates implementation on a day-to-day basis falls short. This is consistent with the study conducted by Cambridge-Johnson et al. (2014), which found that teachers were in favor of inclusive practices, but indicated a lack of ability to continuously execute for a variety of abilities. Similarly, Forlin and Chambers (2011) revealed that teachers find it difficult to give the appropriate attention to all students simultaneously. In addition, Weasel and Dror (2006) found that a teacher’s level of self-efficacy was the single best
predictor of their attitudes toward inclusive practices. Based on the data, it can be concluded that participants have positive attitudes toward inclusive practices based on the overall level of efficacy, but their ability to consistently implement effective strategies oftentimes inhibits the academic and behavioral success of students with disabilities in the mainstream classroom.

Comparison among the three factors within the scale indicates general education teachers had the highest efficacy scores in inclusive instruction, followed by efficacy in managing behavior, then efficacy in collaboration. This is not consistent with the study conducted by Avramidis et al. (2019) who found teachers were less positive in their self-efficacy of implementing inclusive instruction. It is somewhat inconsistent with the study conducted by San Martin et al. (2021) in which results indicated teacher self-efficacy related to managing behavior and dealing with physically aggressive students were among the lowest levels. In this study, participants did have one of the lowest mean scores for managing physically aggressive students, but questions regarding general classroom management strategies remained average. Results indicating that efficacy in collaboration being the lowest among participants is, however, consistent with the study conducted by Alnahdi (2020) who found that general education teachers expressed low levels of self-efficacy in the areas of involving families. The lowest mean score among all questions in the TEIP survey was, I am confident in my ability to get parents involved in school activities of their children with disabilities.

Results among the overall TEIP scale, within the three factors, and the follow-up qualitative data indicate that teachers have positive attitudes towards inclusive practices and their efficacy in inclusive instruction remains positive, but their ability to consistently
implement various types of instruction is a considerable factor. Also, participants expressed low levels of self-efficacy in collaborating with families of students with disabilities, and other teachers, therapists, and/or paraprofessionals that contribute to the success of students with disabilities in the general education classroom.

**Research Question Two**

Research question two explored the effect of years of teaching experience and the level of self-efficacy among participants. Mean scores among the groups, 1-5 years, 5-10 years, 10-15 years, 15-20 years, and 20+ years did increase as years of experience increased, but the mean scores were not significantly different. This indicates a general education teacher’s years of teaching experience do not have a significant effect on the level of efficacy for teaching students with disabilities.

However, results of the follow-up qualitative data did suggest specific experience in teaching students with disabilities do increase teachers’ ability to implement effective instruction that meets the needs of diverse learners. This is consistent with Kantor (2011) and Walsh-Yusef (2018) who found that general educators continue to feel that their ability to teach students with disabilities comes from trial and error over time.

**Research Question Three**

Research question three explored the effect of the level of education among general education participants and the level of self-efficacy for teaching students with disabilities. Although mean scores did increase as the level of education increased, the data did not indicate a significant difference among teachers with a bachelor’s degree, master’s degree, specialist degree, or doctorate. These results indicate that the amount of
instruction or relevance of instruction in teaching students with disabilities is most likely similar among the varying levels of educator training.

**Research Question Four**

Research question four determined whether there was a significant difference between the type of educator license and the level of self-efficacy. Participants indicated whether they received their educator license through a traditional or non-traditional program. Although mean scores were slightly different, there was no significant effect on the type of licensure and the level of self-efficacy among general education teachers. These results indicate that teacher preparation programs, whether traditional or non-traditional, have similar outcomes on a teacher’s perceived ability to teach students with disabilities in their classrooms.

**Research Question Five**

Analysis was also conducted to determine whether there was a significant difference among the school districts studied and the teachers’ level of efficacy for teaching students with disabilities. Data indicated that there is no significant difference among the six school districts and the teachers’ perceived ability to teach students with disabilities in the general education classrooms. Qualitative data among participants indicate there is a lack of professional development opportunities available for general education teachers on teaching students with disabilities. Since there was no significant difference among mean scores, it can be concluded that each of the six school districts has a similar amount of professional development activities directly related to teaching students with disabilities.
Research Question Six

Research question six explored factors that contribute to the level of efficacy among participants for teaching students with disabilities. Analysis of the data revealed the following factors have an impact on teacher self-efficacy and the success of inclusive practices: planning and executing academic and behavioral strategies for a variety of needs and implementing IEPs in their classrooms. These findings are key to understanding the barriers to successful inclusion and how teacher preparation programs and professional development sessions can target specific factors that could increase levels of teacher self-efficacy.

Planning and Executing for Diverse Needs. The first major factor that was revealed during data analysis was the amount of planning time it takes to prepare for a classroom of diverse needs. All participants in the qualitative portion of the study indicated they needed more time to be able to plan lessons that use a variety of instructional and classroom management strategies to meet the individual academic and behavioral needs of the classroom. In addition, participants feel they have the instructional tools, but their ability to consistently implement those tools falls short because of the amount of time it takes to plan and execute to a variety of needs. This is consistent with the research conducted by Cambridge-Johnson et al. (2014) that found teachers consistently indicated a lack of ability to plan and execute lessons to a variety of ability levels in the inclusion classroom. These findings are also consistent with Bruggink et al. (2016) who found that general educators’ perception of their ability to meet the varying instructional needs was shallow due to the increased level of support and time it takes to plan and execute those strategies. In addition, Forlin and Chambers (2011)
revealed concerns with general educators’ ability to give the appropriate academic attention to all students simultaneously.

Specific factors about classroom and behavioral management strategies had varying viewpoints from participants. Results from the quantitative data indicated that managing behavior was not representative of the lowest overall factor score, although some specific questions regarding managing behavior did score fairly low in comparison. The follow-up qualitative data revealed that some participants felt that classroom and behavioral management was not an issue because they had a variety of tools and strategies available to choose from, while other participants felt this is something they continue to struggle with due to lack of known strategies and the ability to continuously implement them on a day-to-day basis. These findings are both consistent and inconsistent with the findings of Mullings (2011) whose data revealed that oftentimes teachers feel they do not know how to deal with the student’s behavior. However, it’s important to note that the participants who felt they had a good grasp on classroom management had been teaching for over 10 years, while the participants who considered this an area of struggle had been teaching for less than 5 years. This finding is consistent with the study conducted by Walsh-Yusef, 2018, who found that teachers believed their ability to teach students with disabilities in their classrooms came from experiences of trial and error.

**Implementing IEPs.** Similarly, data analysis revealed mixed viewpoints regarding participants’ ability to implement student IEPs in their classrooms. Three participants felt they had enough experience in implementing IEPs that it comes more naturally to them now. On the other hand, the other three participants felt that laws and regulations surrounding IEPs and consistent implementation of accommodations and
modifications are challenging. Again, it’s important to note that the three participants who felt more comfortable with implementation had the most experience teaching. These findings are inconsistent with the research studies conducted by Alfaro et al. (2015) and O’Connor et al. (2016) who found that all teachers studied struggle to implement IEPs in their classroom as well as understand special education laws. In addition, Schimmel and Militello (2007) reported only 40% of general education teachers they studied correctly answered basic questions regarding legal rights for teachers and students under IDEA.

**Research Question Seven**

Research question seven explored the roles that teacher education programs and continuing professional development sessions play in the perceived levels of general education teacher self-efficacy for teaching students with disabilities. Analysis of qualitative data revealed the following major findings of this research question, there is a need for more training and experienced-based opportunities in teacher preparation programs for students with disabilities and there is a need for more professional development activities that are relevant in meeting the needs of students with disabilities in *mainstream classrooms*.

**Teacher Preparation Programs.** The first finding was that teacher preparation programs for general educators have a lack of education surrounding teaching students with disabilities. Participants recalled taking only one class and did not feel that class prepared them for the challenges they have faced in providing instruction for a variety of academic and behavioral needs. This is consistent with the research study conducted by Fuch (2009) indicating that teachers continuously report a lack of training and preparation in meeting the needs of students with disabilities, including their ability to
differentiate, provide accommodations, and collaborate with special education teachers appropriately. In addition, his study revealed that teachers agreed there was only one required course. Similarly, studies have shown that teachers feel their college education did not prepare them and that teachers indicate a concern with a lack of knowledge and skill base they consider necessary in an inclusive classroom. Cipkin and Rizza (2010) also found that 72% of teachers agreed that the level of training they received at the college level was inadequate in preparing them to teach students with disabilities. Therefore, it can be concluded that the lack of classes specifically related to meeting the needs of diverse learners is problematic to the inclusive setting and preparing general education teachers for meeting the needs of students with disabilities in their classrooms.

The second major theme that arose about teacher preparation programs is that teachers believe training within their teacher preparation program should be more experienced-based. All participants in the qualitative portion of this study indicated that more opportunities for situational experiences would have better prepared them to meet the needs of students with disabilities. This is consistent with the study conducted by Bain and Hasio (2011) who found that greater exposure to experiences, versus training, through authentic learning experiences were a primary factor in general education teachers gaining the confidence and skills necessary to teach students with disabilities in their classrooms.

**Professional Development.** A third major finding of research question seven is that professional development sessions provided by school districts have an overall lack of topics aimed at teaching students with disabilities. All interview participants felt that they should have more opportunities to participate in professional development sessions
related to students with disabilities and recall very few sessions on that specific topic. This conforms to the study conducted by Elison-Chang (2018) where she found those general education teachers participated in less than two training sessions regarding special education within the previous five years. Similarly, Shady et al. (2013) found that 74% of the general education teachers studied felt they needed more professional development activities to improve their ability to meet the needs of the diverse needs and produce positive outcomes in their classroom. Therefore, it can be concluded that there is a significant need for school districts to provide more professional development activities for general education teachers that better translate to meeting the needs of students with disabilities.

**Implications and Recommendations**

It is abundantly clear that now more than ever that students with disabilities are receiving their core instruction in general education classes, and from general education teachers. There are many benefits to inclusive practices for all students and teachers, but general education teachers should feel they have the ability to meet the diverse academic and behavioral needs of their classroom. Therefore, school leaders and teacher preparation programs must understand the factors that contribute to meeting the needs of all learners in the general education classrooms and how they can better support their current or pre-service general education teachers.

**School Leaders**

The findings in this study have major implications for current school leaders. Although general education teachers feel they have a strong ability to teach students with disabilities, further analysis indicates implementation continues to fall short in the
classroom due to specific factors. Implications and recommendations for each factor are
discussed below about current school leaders.

**Relevant Planning Time.** According to the findings in this study, general
education teachers feel they do not have enough time to effectively plan for individual
academic and behavioral needs, impacting their ability to consistently implement
strategies in the classroom. The data represented in Chapter IV indicates that teachers had
the highest factor mean score in *Efficacy in Inclusive Instruction*, but follow-up
qualitative data revealed that teachers feel they lack significantly in implementation.
Therefore, it can be concluded they Additionally, data indicates a need for collaboration
time among other professionals in designing educational plans for students with
disabilities. One respondent said, “I think providing specific time for teachers to plan
with co-teachers could be game-changer.”

Based on the data, it is clear that consistent implementation is affecting the quality
of instruction general education teachers feel they are providing in diverse classrooms.
Therefore, if school leaders truly want teachers to use strategies such as differentiation,
scaffolding, small groups, behavior charts, etc. to meet the needs of the diverse
classroom, they must provide more opportunities to collaborate and plan for that type of
instruction. School leaders may consider increasing the amount of support that special
ducation teachers, therapists, or other professionals that have more experience in
teaching students with disabilities offer to their general education counterparts. As one
respondent stated, “Give us time to sit down with a special education teacher or someone
who has done this longer than me, break down where we are and how students are doing,
and what’s working and what’s not working.”
School leaders should also consider allowing for special educators and general educators to have common planning, and considerations could be made to allocating content PLC time that focuses solely on support planning for the diverse academic and behavioral needs consistently. For example, when asked how school districts could better support general education teachers in meeting the needs of students with disabilities, one respondent stated, “The first thing would be the PLC. Where SPED and the other subjects are together so we can have better conversations and ask for help when I feel like I’m drowning.” In addition, one respondent stated, “As often as humanly possible, provide teachers and SPED teachers with a common prep. It’s critical to be able to work together.”

**Opportunities for Collaboration with Parents.** Quantitative data represented in Chapter IV indicates that general education teachers had the lowest level of efficacy in Collaboration. More specifically, collaborating with parents of students with disabilities, which had the lowest overall mean score of the survey questions. As a school leader, families of all students must be actively engaged in the school community as they are a major stakeholder in the education system. School leaders should consider assessing how many parents of students with disabilities are involved in the school community as a whole, and action should be taken to increase their involvement through clubs, extra-curricular activities, or other types of parental involvement committees. Considerations should be made to have general education teachers be more represented at IEP meetings and understand their role in the IEP development to increase collaboration among parents and teachers. School leaders could provide relevant training on what to expect in an IEP.
meeting, as well as the role of each team member to ensure better collaboration among family members and teachers.

**Professional Development Opportunities.** Finally, school leaders should consider improvements to their current professional development opportunities. According to the data from research question seven, all participants felt the number of professional development sessions regarding teaching students with disabilities was sparse, and the sessions they have been given aren’t representative of teachers’ needs. For example, one respondent said, “I’m surprised at how little training I’ve done while I’ve been here. I think I’ve had one session was that specific to special Ed, but that was it. And I’ve been here for three years.” Another respondent stated, “I think providing PD that’s not just based on curriculum, but also based on who our students are and what their needs are.” In addition, one stated, “A lot of our PD is just one size fits all, but that’s not the reality of my classroom.”

Therefore, school leaders may consider assessing the amount of current professional development opportunities being given to their general education teachers that specifically relates to teaching students with disabilities. School leaders can work with their special education departments, such as Coordinators or Special Education directors, to set up more opportunities related to students with disabilities. In addition, school leaders should consider surveying their general education teachers on the current needs in their classroom to ensure the professional development activities are better aligned with the needs in each classroom. Lastly, considerations could be given to providing multiple different sessions based on the need versus whole-group sessions. Collecting this information and providing more targeted learning experiences could
increase teachers’ ability to consistently implement effective academic and behavioral strategies that meet the needs of all learners.

Teacher Education Programs

The findings in this study also have major implications on current teacher education programs. Data from Chapter IV indicate that current general education teachers do not feel as though they had enough education surrounding students with disabilities and that their education should have been more experience-based to feel more prepared for the needs of the diverse classrooms. Conclusions are discussed in detail below with recommendations for teacher education programs.

Preparation. Major findings from this study revealed that general education teachers did not feel their teacher education program adequately prepared them for the needs of the diverse classroom. When asked how the teacher education program prepared you to teach students with disabilities, one respondent simply stated, “It didn’t.” Similarly, another respondent stated, “I think I took one class. And all I remember from that class is we all got a disability that we were in charge of, and mine was rheumatoid arthritis. Come on now, that’s supposed to prepare me?” In addition, providing more education on student behavior and how disabilities can impact behavior in the classroom was also a suggestion by participants. For instance, one respondent said, “I was shocked when I first started teaching because I knew how to write a lesson plan, but I didn’t know how to handle student behavior.” Based on this data, it is imperative teacher preparation programs consider evaluating their current program for the amount of education surrounding planning for diverse academic and behavioral needs in the mainstream classroom and increase the amount of education currently provided.
**Experience.** In addition to the amount of education received during teacher education programs, the quality of that education is arguably even more important. When asked how their teacher education program could have better prepared them to teach students with disabilities, all respondents gave the same suggestion, more situational and experienced-based learning. For example, one participant stated, “It was just more teaching us, what’s an IEP? What’s a 504? I don’t remember there being anything practical as far as what it would look like to meet those needs.” Another respondent added, “I think just knowing specific situations and practicing those would have really help prepare me, just more situational. Respondents also felt their internship could have been an opportunity to have more situational-based learning. For example, “Think getting teachers into those classroom with mixed abilities is key. And even seeing the same kids in different situations and learning what works and what doesn’t work. Actually seeing it and experiencing it, you just learn so much more.”

Teacher education programs must be cognizant of the challenges general education teachers are facing regarding teaching students with disabilities in their classrooms. According to the data, teacher education programs should consider increasing the amount of experience-based learning, specifically for teaching students with disabilities. They should also consider requiring a certain amount of hours in a co-taught or inclusion classroom in order to complete the internship portion of the study. Providing these types of learning, as the data suggests, will increase general education teachers’ level of preparedness to meet the diverse needs of students with disabilities.
Recommendations for Future Research

The purpose of this research study was to determine the current level of self-efficacy of secondary, general education teachers in Northwest Arkansas teaching students with disabilities in their classrooms. This study included survey data from 101 general education teachers in six public school districts from the region. From the results of this study, the following recommendations for future research may help bring further understanding to the challenges general education teachers are facing in teaching to the diverse needs of the modern classroom.

- This study was limited to the geographical area of Northwest Arkansas. Future studies should consider expanding the sample size to include larger demographic areas.

- This study could be replicated in other areas of the state of Arkansas for comparison purposes as a state.

- While the study allowed for an opportunity for follow-up interviews, future research may want to interview a larger population for increased generalization of the qualitative data.

- This study indicated a major factor in the level of self-efficacy of teaching students with disabilities was inconsistent implementation due to lack of planning time and collaboration time with other professionals. Future research should be conducted on the effects of consistent implementation of instructional and behavioral strategies needed to meet the needs of diverse learners.
Data from this study indicated knowledge of curriculum and content to be a factor in the level of efficacy in teaching students with disabilities. More research should be conducted on the effect of specific curriculums on teacher self-efficacy.

This study indicated experience in teaching students with disabilities increases teacher self-efficacy, but teaching experience in general, did not. More research studies could be conducted to determine the relationship of experience in general education teachers teaching students with disabilities and the level of self-efficacy.

Results from this study indicated school districts do not provide an adequate amount of professional development opportunities to general education teachers for teaching students with disabilities. Future research may attempt to identify those schools that are providing increased professional development opportunities to compare the level of efficacy to compare against those districts that are not.

This study indicated general teacher education programs are providing minimal coursework related to teaching students with disabilities and that experienced-based training would better prepare teachers for the needs of the classroom. Future studies could be conducted to attempt to identify those programs that are providing increased, experienced-based learning to compare the level of preparedness among those programs that are not.

**Recommendations for Future Practice**

The continuously increasing numbers of students receiving special education services in the general education classroom have recently led to frustration among general education teachers (Glazard, 2011; Stites et al., 2018) as they attempt to produce
high-quality instruction for all students. Because of the growing number of diverse and inclusive school programs, general education teachers should become better equipped to provide differentiated instruction, modifications, and accommodations in their classrooms while also implementing various academic and behavioral strategies based on the student’s individualized education plan (IEP), and become increasingly collaborative with special education staff members.

The following are recommendations for future practice as they relate to implications among school leaders and teacher education programs.

- The results of the study may provide school leaders with a foundation to create more professional development activities that target specific factors contributing to teacher self-efficacy when teaching students with mixed abilities including consistent implementation.

- Results from this study may provide school leaders with recommendations for increasing collaboration among general education teachers, special education teachers, and parents of students with disabilities.

- Results from this study should encourage teacher education programs to improve the preparation of preservice general education teachers regarding inclusive practices to include more experience-based training.

**Final Summary**

Providing all students, regardless of disability, with high-quality education plays an important role in the public education system today. The research outlined in this study demonstrated the need for more inclusive practices due to the benefits for all students and teachers, including positive achievement and post-secondary outcomes.
While the state of Arkansas is actively attempting to enhance its inclusive practices through the Inclusive Practices Project, research indicates that general education teachers’ level of self-efficacy in teaching students with disabilities in their classrooms continues to be a major factor in the outcomes of inclusive practices (Forlin & Chambers, 2011). The examination of the current level of self-efficacy of secondary, general educators teaching students with disabilities revealed several major findings. The first is that overall perceptions and level of self-efficacy in teaching students with disabilities are fairly high, especially in efficacy in instruction. However, the teachers’ ability to consistently implement instructional strategies, behavioral strategies, and student IEPs in the classroom is low, indicating a disconnect between knowledge of strategies and consistent implementation. This study also revealed that general education teachers feel the least amount of confidence in collaborating with parents of students with disabilities. Furthermore, findings revealed that general education teachers feel their teacher preparation program did not prepare them to meet the needs of students with disabilities and that more experienced-based training would have better prepared them. Lastly, among the teachers studied, participants indicated they would like more relevant professional development sessions regarding teaching students with disabilities and meeting the diverse needs of the classroom.

Using the data provided from this study, I hope that school and district leaders and teacher education programs reflect on their current practices for supporting general education teachers in teaching students with disabilities and implement positive systematic changes that address the needs of their current teachers in Northwest Arkansas.
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Appendix A: TEIP Scale

**Teacher Efficacy for Inclusive Practice (TEIP) Scale**

This survey is designed to help understand the nature of factors influencing the success of routine classroom activities in creating an inclusive classroom environment. In an inclusive classroom, students from a wide range of diverse backgrounds and abilities learn together with necessary supports available to teachers and students.

Please reference the following scale for your answers:

1 = Strongly Disagree  
2 = Disagree  
3 = Disagree Somewhat  
4 = Agree Somewhat  
5 = Agree  
6 = Strongly Agree

Directions: Circle the number that best represents your opinion about each of the statements. Please attempt to answer each question. Your answers are confidential.

<table>
<thead>
<tr>
<th>Statement</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. I can make my expectations clear about student behavior.</td>
<td></td>
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<tr>
<td>2. I am able to calm a student who is disruptive or noisy.</td>
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<tr>
<td>3. I can make parents feel comfortable coming to school.</td>
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</tbody>
</table>
4. I can assist families in helping their children do well in school.

5. I can accurately gauge student comprehension of what I have taught.

6. I can provide appropriate challenges for very capable students.

7. I am confident in my ability to prevent disruptive behavior in the classroom before it occurs.

8. I can control disruptive classroom behaviors.

9. I am confident with my ability to get parents involved in school activities of their children with disabilities.

10. I am confident in designing learning tasks so that the individual needs of students with disabilities are accommodated.

11. I am able to get children to follow classroom rules.
12. I can collaborate with other professionals (e.g., itinerant teachers or speech pathologists) in designing educational plans for students with disabilities.

13. I am able to work jointly with other professionals and staff (e.g., aides, other teachers) to teacher students with disabilities in the classroom.

14. I am confident in my ability to get students to work together in pairs or in small groups.

15. I can use a variety of assessment strategies (e.g., portfolio assessment, modified tests, performance-based assessment, etc.)

16. I am confident in informing others who know little about laws and policies relating to the inclusion of students with disabilities.

17. I am confident when dealing with students who are physically aggressive.

18. I am able to provide an alternate explanation or example when students are confused.
Appendix B: Permission to use TEIP Scale

Marleah Hannaford
Sat 7/17/2021 4:07 PM
To: umesh.sharma@monash.edu
Dr. Sharma,

My name is Marleah Hannaford and I am a doctoral student at Arkansas Tech University. I am currently working on my proposal for my dissertation focusing on general education teacher self-efficacy on teaching students with disabilities in mainstream classrooms. I came across your TEIP scale through my university library. I believe this scale would be an excellent asset to my research. Will you allow me to use the TEIP scale for my study?

Thank you,

Marleah Hannaford
mhannaford@atu.edu

Umesh Sharma <umesh.sharma@monash.edu>
Sun 7/18/2021 6:28 PM
To: Marleah Hannaford

Hi Marleah,

You are most welcome to use and adapt the scale for your research project. I will appreciate it very much if you could send me a brief report at the conclusion of your project.

Warm regards,

Umeshs

Professor Umesh Sharma, Ph.D, MAPS
Associate Dean (Equity and Inclusion)
Faculty of Education
Room 1.67D
Monash University,
19 Ancora Imparo Way,
Victoria 3800, Australia
Telephone: +61 3 9905 4388 Facsimile: +61 3 9905 5127
Website: https://research.monash.edu/en/persons/umesh-sharma
Appendix C: Interview Questions

1. How many years have you been teaching?
2. How many years have you taught students with disabilities in the general education environment?
3. What kind of inclusive settings are used in your school? (co-teaching, push-in instruction, pull-out instruction, etc.)
4. How do you feel about your ability to provide effective instruction to students with disabilities in your classroom as compared to those without disabilities? Why?
5. What are some specific strategies you find effective in meeting the academic needs of diverse learners in your classroom?
6. What are the biggest barriers to providing instruction to students with disabilities in your classroom?
7. How do you feel about your ability to control disruptive behaviors of students with disabilities in your classroom? Why?
8. How do you feel about your ability to implement IEPs in your classroom?
9. How do you feel about your ability to differentiate instruction to meet the needs of diverse learners?
10. How did your teacher preparation program prepare you to teach students with disabilities in the general education classroom?
11. How often do you participate in professional development activities regarding meeting the needs of diverse learners?
12. How do you feel teacher preparation programs can better prepare general education teachers to meet the academic and behavioral needs of students with disabilities in the general education classroom?

13. How do you feel school districts can better support general education teachers in meeting the academic and behavioral needs of students with disabilities in the general education classroom?
November 8, 2021

To Whom It May Concern:

The Arkansas Tech University Institutional Review Board has found the IRB application for Marleah Hannaford’s proposed research, entitled “Examining Teacher Self-Efficacy among Arkansas General Educators in Inclusive Settings” to be exempt from human subject review under 45 CFR 46.104 (d)(2)(iii).

Please note that in the event that any of the parameters of the study change, the researcher may be required to submit an amended application.

Please proceed with your research. We wish you success with this endeavor.

Sincerely,

[Signature]

Rebecca Goldstein, Ph.D.
Institutional Review Board
Arkansas Tech University
Appendix E: Recruitment Script Email Superintendents

Dear Superintendent,

My name is Marleah Hannaford and I am a special education specialist within the Bentonville School District. Prior to this position, I was a special education teacher with Springdale School District and Elkins School District.

I am currently working towards my Doctorate of Educational Leadership at Arkansas Tech University under the supervision of Dr. John Freeman. I am beginning the dissertation portion of the doctoral program and am looking to conduct a mixed methods study on the current level of teacher self-efficacy among secondary, general education teachers in regard to teaching students with disabilities in their general education classrooms. Students with disabilities are being educated in general education classrooms alongside their general education peers more than ever, therefore it’s imperative to study the level of teachers’ perceived ability to provide high-quality instruction to diverse learners.

This will be a mixed methods study and will seek to examine the level of self-efficacy as well as specific factors that influence self-efficacy to aide in topics of professional development and teacher preparation programs. The study will target secondary general education teachers in northwest Arkansas who are teaching students with an active IEP in at least one class period for the fall of 2021. The study will utilize an online survey via QuestionPro as well as follow up focus group sessions for those who volunteer. The study will take place during November and December of 2021 and will have approval of Arkansas Tech University’s IRB.

I am seeking the following information from each school district superintendent and/or special education director:

1. Written permission to complete the study within your school district.
2. If permission is granted, the survey can be released in one of the following two ways:
   a. I can send you, or another individual you designate, an email with information on the study including a link to the online survey, and the email can be forwarded to secondary general education teachers in your district.
   b. You, or another individual you designate, may send an email with your secondary general education teachers’ email addresses. I will then email the teachers with information regarding the survey directly. Participant email addresses will remain anonymous, and no identifying information will be included in the study.
Please let me know if you will be able to provide this information to aide in my study. If you have any questions or concerns, please feel free to contact me via email, mhannaford@bentonvillek12.org or telephone, 479-225-0576.

Thank you,

Marleah Hannaford
Special Education Curriculum and Instruction Specialist
Bentonville Public Schools
Title of Project: EXAMINING TEACHER SELF-EFFICACY AMONG ARKANSAS GENERAL EDUCATORS IN INCLUSIVE SETTINGS: A MIXED METHODS STUDY

Principal Investigator (PI): Marleah Hannaford

PI’s email: mhannaford@atu.edu

We invite you to take part in a research study, Examining Teacher Self-Efficacy Among Arkansas General Educators in Inclusive Settings, which seeks to explore secondary, general education teachers’ current level of self-efficacy in teaching students with disabilities in mainstream classrooms. Taking part in this study is completely voluntary. I urge you to ask any questions and take your time to make your decision. If you decide to participate in this study, please complete the attached survey.

Section 1. Purpose of the Research

This purpose of this study to explore the current level of teacher self-efficacy in teaching students with disabilities in general education classrooms.

Section 2. Procedures

If you choose to participate in this portion of the study, you will complete a 22 question survey.

Section 3. Time Duration of the Procedures and Study

If you choose to participate in the survey, it will take approximately 20 minutes to complete the survey.

Section 4. Discomforts and Risks

There are no known risks associated with this research study.

Section 5. Potential Benefits

You will not personally benefit from taking part in this research study. However, it is possible that by participating in the study, you may gain a deeper understanding of your own self-efficacy and may consider seeking additional training to increase knowledge of teaching students with disabilities.

Possible benefits to others:
The results of this research may guide future professional development activities and/or teacher preparation programs in the areas of teaching students with disabilities in general education classes.

Section 6. Statement of Confidentiality

Research records that are reviewed, stored, and analyzed will be secured in the researcher’s personal computer and password protected. School district names will be collected for research purposes, but will be labeled with pseudonyms (District 1, District 2, etc.) and will be password protected. In the event of any publication or presentation resulting from the research, no personally identifiable information will be shared.

We will keep your participation in this research study confidential to the extent permitted by law. However, it is possible that other people may become aware of your participation in this study. For example, the following people/groups may inspect and copy records pertaining to this research.

- The Office of Human Research Protections in the U. S. Department of Health and Human Services
- The Arkansas Tech University Institutional Review Board (a committee that reviews and approves research studies)
- The Arkansas Tech University IRB Office

Section 7. Costs for Participation

Participants will spend approximately 20 minutes of their time completing the survey.

Section 8. Compensation for Participation

You will not receive any compensation for being in this research study.

Section 9. Research Funding

There is no research funding for this study.

Section 10. Voluntary Participation

Taking part in this research study is voluntary. If you choose to take part in this research, your major responsibility will include completing a 22 question survey. If you choose to take part, you have the right to stop at any time. If you decide not to participate or if you decide to stop taking part in the research at a later date, there will be no penalty or loss of benefits to which you are otherwise entitled.

The investigator may take you out of the research study without your permission. Some possible reasons for this are: licensure in special education.

Section 11. Contact Information for Questions or Concerns
You have the right to ask any questions you may have about this research. If you have questions, complaints or concerns or believe you may have developed an injury related to this research, contact Marleah Hannaford at 479-225-0576.

If you have questions regarding your rights as a research participant or you have concerns or general questions about the research, contact the research participants protection advocate in the Arkansas Tech University’s IRB Office at 844-804-2628. You may also call this number if you cannot reach the research team or wish to talk to someone else.

For more information about participation in a research study and about the Institutional Review Board (IRB), a group of people who review the research to protect your rights, please visit Arkansas Tech University’s IRB web site at https://www.atu.edu/ospui/human_subjects.php Included on this web site, under the heading “Participant Info”, you can access federal regulations and information about the protection of human research participants. If you do not have access to the internet, copies of these federal regulations are available by calling Arkansas Tech University at 844-804-2628.

In order to maintain anonymity of your responses to this survey, a signed consent form will not be required. Please understand that by proceeding to complete this survey you are consenting to be a participant in this study. All the rights described above are in place.

Please note that this consent form for the qualitative phase of the study will be sent to volunteer participants as part of the information and logistics for the interviews. A hard copy of this consent form will be presented before each interview, reviewed by the PI and if understood by all, signed by each participant before they will participate in the interviews.
Appendix G: Informed Consent Form, Interviews

Interviews

Arkansas Tech University

Title of Project: EXAMINING TEACHER SELF-EFFICACY AMONG ARKANSAS GENERAL EDUCATORS IN INCLUSIVE SETTINGS: A MIXED METHODS STUDY

Principal Investigator (PI): Marleah Hannaford

PI’s email: mhannaford@atu.edu

We invite you to take part in a research study, Examining Teacher Self-Efficacy Among Arkansas General Educators in Inclusive Settings, which seeks to explore secondary, general education teachers’ current level of self-efficacy in teaching students with disabilities in mainstream classrooms. Taking part in this study is completely voluntary. I urge you to ask any questions and take your time to make your decision. If you decide to participate in this study, please complete the items below and sign your name to indicate your willingness to participate in this interview.

Section 1. Purpose of the Research

This purpose of this study to explore the current level of teacher self-efficacy in teaching students with disabilities in general education classrooms

Section 2. Procedures

If you choose to participate in this portion of this study, you will participate in a follow-up interview. The interview will last approximately 30 minutes and will be conducted either in-person at the participants school building or via Webex.

Section 3. Time Duration of the Procedures and Study
If you agree to take part in this portion of this study, your involvement will last approximately 30 minutes.

Section 4. Discomforts and Risks

There are no known risks associated with this research study.

Section 5. Potential Benefits

You will not personally benefit from taking part in this research study. However, it is possible that by participating in the study, you may gain a deeper understanding of your own self-efficacy and may consider seeking additional training to increase knowledge of teaching students with disabilities.

Possible benefits to others:

The results of this research may guide future professional development activities and/or teacher preparation programs in the areas of teaching students with disabilities in general education classes.

Section 6. Statement of Confidentiality

Participant names and email addresses will be collected via the consent form for the purpose of ensuring interested participants are present for their interview. Consent forms will be securely stored by the researcher and will be destroyed upon completion of the study. In the event of any publication or presentation resulting from the research, no personally identifiable information will be shared.

In-person interviews will be recorded on a digital audio recorder and kept in a secure location at all times. Webex interviews will be recorded. The session recordings will be transcribed verbatim and identified by a number given at the time of the interview. Information will be secure and confidential. The raw data will be kept until the analysis process is complete (no later than May, 2022). Identifiers will be removed and replaced with pseudonyms following data transcription. The anonymized data and research records will be kept for approximately two years in a secure, password protected file on the PI’s computer, in the event of any need to re-analyze the date. After
that time, the research study files will all be deleted.

Section 7. Costs for Participation

Participants who participate in the interview will spend approximately 30 hours participating in the interview session.

Section 8. Compensation for Participation

You will not receive any compensation for being in this research study.

Section 9. Research Funding

There is no research funding for this study.

Section 10. Voluntary Participation

Taking part in this research study is voluntary. If you choose to participate, your major responsibility will include participating in either an in-person or virtual interview with the researcher consisting of 13 open-ended questions. You do not have to participate in this research. If you choose to take part, you have the right to stop at any time. If you decide not to participate or if you decide to stop taking part in the research at a later date, there will be no penalty or loss of benefits to which you are otherwise entitled.

Your investigator may take you out of the research study without your permission. Some possible reasons for this are: *licensure in special education.*

Section 11. Contact Information for Questions or Concerns

You have the right to ask any questions you may have about this research. If you have questions, complaints or concerns or believe you may have developed an injury related to this research, contact Marleah Hannaford at 479-225-0576.

If you have questions regarding your rights as a research participant or you have concerns or general questions about the research, contact the research participants protection advocate in the Arkansas Tech University’s IRB Office at 844-804-2628. You may also call this number if you cannot reach the research team or wish to talk to someone else.
For more information about participation in a research study and the Institutional Review Board (IRB), a group of people who review the research to protect your rights, please visit Arkansas Tech University’s IRB web site at [https://www.atu.edu/ospui/human_subjects.php](https://www.atu.edu/ospui/human_subjects.php) Included on this web site, under the heading “Participant Info”, you can access federal regulations and information about the protection of human research participants. If you do not have access to the internet, copies of these federal regulations are available by calling Arkansas Tech University at 844-804-2628.

Your signature below means that you have received this information, have asked the questions you currently have about the research and those questions have been answered. You will receive a copy of the signed and dated form to keep for future reference.

**Participant:** By signing this consent form, you indicate that you are voluntarily choosing to take part in this research.

<table>
<thead>
<tr>
<th>Signature of Participant</th>
<th>Date</th>
<th>Time</th>
<th>Printed Name</th>
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