Measuring the Impact of Peer Coaching on Teacher Effectiveness at Friendship County High School

Whittney Michele McPherson

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MEASURING THE IMPACT OF PEER COACHING ON TEACHER EFFECTIVENESS AT FRIENDSHIP COUNTY HIGH SCHOOL

by

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Submitted in Partial Fulfillment of the Requirements
For the Degree of Doctor of Education in
Educational Practice and Innovation

College of Education
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2023

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DEDICATION

I dedicate my dissertation work to my family who supported, encouraged, motivated, and inspired me to persevere. To my husband, Dustin, for understanding my need to read, research and write every evening, weekend and holiday break. Thank you, Dustin, for being my number-one fan and biggest cheerleader. I am looking forward to saying “let’s go!” a lot more in the near future. To my parents, I cannot tell you how much I appreciate your unwavering support and much-needed words of encouragement. Thank you for instilling in me the value and importance of education.
ACKNOWLEDGEMENTS

I thank the teachers who gave generously of their time and opened the doors of their classrooms for this study. Thank you for everything you do for students and thank you for sharing your practice with me. I appreciate you!

I would like to acknowledge Dr. Toni Williams for reading drafts, providing feedback, and encouraging me to stay calm throughout the research and writing process with her positive and groovy vibes.

I cannot thank Dr. Catherine Gibbs enough for her help throughout this process. Thank you for your advice, edits, and friendship. I learned so much about the uses of commas during this process!

Thank you to the Georgia Department of Education for use of the TKES tool in the data collection process.

Thank you to my committee for partnering with me through this process.
ABSTRACT

Student success and achievement can be measured in myriad ways; however, the impact of teacher effectiveness in each classroom is an essential part of the formula for student success. Although most teachers work in isolation in their classrooms, it is important for school leaders to support student success by finding effective methods of supporting teachers. This study investigates the instructional coaching of novice teachers as a professional development tool to support student success and achievement. The specific aim of this study was to investigate if an intervention of instructional coaching was effective in supporting the development of equitable and effective classroom experiences for students in novice teachers’ classrooms at Friendship County High School in rural North Georgia. The investigation involved four inexperienced teachers and four master teachers serving as coaches. The novice teachers and master teacher-coaches participated in peer observations and coaching sessions four times over six weeks. The impact of the intervention was measured from the perspectives of novice teachers, master teacher-coaches, and students. The mixed methods case study utilized surveys, interviews, and observations to collect data for the duration of the coaching intervention. Findings show that coaching by experienced peers is a viable professional development method and yields positive experiences for both the teachers concerned. The duration of six weeks was not enough time for the novice teachers to meet their instructional goals: however, it fostered their growth in the specific goal they focused on throughout the study.
Keywords: coaching, student success, peer observation, professional development, Social Cognitive and Observational Learning Theory, teacher effectiveness
Fourteen-year-old twin sisters Nora and Zeda were both scheduled for an Algebra I class this school year, but they had different teachers. Nora and Zeda have attended Friendship County Schools for nine years. Although their personalities, learning styles, and preferences are different, they have both always succeeded in academic classes. Teachers would describe Nora as inquisitive, astute, and dedicated in the classroom. The same teachers would describe Zeda as creative, intelligent, and impressive in the classroom. This year, Nora’s Algebra I class was engaging and interesting, and the teacher was helpful, supportive, and innovative with instructional design. Zeda’s Algebra I class was boring, frustrating, and disorganized, and the teacher was overwhelmed by poor classroom management and assigned overwhelming worksheets and homework. Nora and Zeda have always scored pretty consistently in their classes and on high-stakes assessments, but by mid-semester, Zeda was failing Algebra while Nora maintained a high “A” average. Zeda was required to attend tutoring in an after-school learning lab while Nora was allowed to go home immediately after school. At the end of the semester, Zeda earned a “C” on her transcript which was her first, a “Level 1: Low Growth and Low Achievement” score on the high-stakes End of Course Assessment, and a negative attitude towards mathematics. Nora ended the course with an “A” on her transcript, a “Level 3: High Growth and High Achievement” score on her EOC Assessment, and a positive experience in mathematics. This is the power of a teacher.
Is this educational experience equitable to both students? The following case study research project was born from observations of differences between student experiences from classroom to classroom and a desire to support teachers to create positive educational experiences for all students.
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LIST OF ABBREVIATIONS

CCRPI......................................................... College and Career Ready Performance Index
DOK............................................................... Depth of Knowledge
FCHS ............................................................. Friendship County High School (pseudonym)
GaDOE........................................................... Georgia Department of Education
TAPS ............................................................. Teacher Assessment on Performance Standards
TKES............................................................ Teacher Keys Effectiveness System
CHAPTER 1
INTRODUCTION

As an educational leader in Friendship County Schools, a rural school system in North Georgia serving 3,900 students in grades PK-12, I am positioned to support teaching and learning and to create initiatives that are sustainable and effective. All 19 years of my experience teaching and leading in schools have been at the high school level. At Friendship County High School (FCHS), students perform well on standardized and high-stakes assessments; they do particularly well on the SAT and ACT each year. The graduation rate of 98% is one of the top three graduation rates in the state of Georgia. As measured by high-stakes assessments and College and Career Ready Performance Index (CCRPI) metrics, the school is performing well. However, an issue exists with regard to classroom expectations and academic rigor in some classrooms staffed with less experienced teachers; there is a noticeable difference from classroom to classroom in terms of the level of instruction, engagement, rigor, inquiry, and classroom management.

Research shows that students in classrooms where experienced teachers hold high expectations and teach with engagement, rigor, and relevance perform better academically (Blackburn, 2013; Gentrup et al., 2020; Trang & Hansen, 2021). In addition, teachers in schools with functional and effective professional development plans are better prepared with the pedological skills required to meet the needs of students (Blackburn, 2013; Marzano & Toth, 2014). Currently, FCHS does not have a
comprehensive professional development program. FCHS teachers meet once annually within academic content areas to review pacing guides and meet quarterly to analyze student data, but there is no strategic plan for professional learning.

**Problem of Practice**

Not all teachers have the same backgrounds, experiences, or levels of preparation and skill. It is the responsibility of educational leaders to promote a collaborative and professional learning environment that encourages growth. The way principals hire, evaluate, and provide opportunities for growth can have a significant impact on teacher effectiveness and student learning (Donaldson, 2013). Principals are not typically supported in providing frank feedback on instruction and face scrutiny when arranging professional development, but feedback and professional learning are both among the most important jobs in educational leadership (Donaldson, 2013; Kraft et al., 2018; Leggett & Smith, 2019; Muijs et al., 2014). Few educators are fired specifically for ineffective teaching; most are reassigned to untested subjects or otherwise moved to less high-stakes areas (Chingos & West, 2011; Donaldson, 2013). Logically, that leaves some students in classes with less effective teachers for all of the subjects and grade levels that do not have high-stakes assessments.

Many factors influence the experience students have in different classrooms throughout their education. One of the most critical factors in student achievement is the effectiveness of the teacher in the classroom (Akram, 2019; Kraft et al., 2018; Muijs et al., 2014; Norton, 2015; Rivkin et al., 2005; Stronge et al., 2011). The teacher's expertise, experience, and skill impact not only students' experiences but also student outcomes and academic achievement. There is also a high correlation between
student perception of teacher effectiveness and student achievement (Akram, 2019; Connor & Cavendish, 2020; Kim & Lee, 2020; Stobaugh et al., 2020). When students perceive the teacher to be effective, engaging, and experienced, they typically perform better on benchmarks of performance (Akram, 2019). Similarly, teachers maintaining high expectations for students improve student outcomes (Gentrup et al., 2020; Trang & Hansen, 2021). When teachers raise expectations for student performance and provide the support and encouragement needed for them to be successful, students improve their performance to meet those expectations (Gentrup et al., 2020; Trang & Hansen, 2021).

Not only is it beneficial for teachers to be equipped with both pedagogical and relational skills, but also it is important for students to have confidence in their teachers (Akram, 2019) and for teachers to hold students to high expectations of behavior and performance (Gentrup et al., 2020; Trang & Hansen, 2021).

Research by Akram (2019) has shown that interactive and engaging classroom environments promote deep learning. Effective teachers should possess strong pedagogical skills, as well as a friendly and approachable demeanor toward their students (Connor & Cavendish, 2020). A study by Korpershoek et al. (2016) revealed that the difference in academic achievement between students taught for one year by highly effective teachers versus highly ineffective teachers is significant. If classroom disparity is an issue in a school, school leaders should create a modality for closing the gap, such as professional development, professional learning, or mentoring (Day et al., 2016). When there is no program in place for teacher growth, development, and support in schools, it can be a barrier to novice teachers learning the most effective methods with students such as: building positive relationships, support and
encouragement, strong pedagogical skills, and engaging classroom environments. There are students in classrooms at FCHS who are missing out on one or more of these components of effective teaching due to being scheduled in classes with less experienced teachers.

**Theoretical Framework**

According to Grant and Osanloo (2014), explaining the theoretical framework behind the research is one of the most critical parts of the dissertation process. The theoretical framework should be the blueprint for the research questions and the methodology and design of a research study. In studying access to high-quality and effective instruction, there are multiple theories that undergird the perpetuation of inequitable classroom experiences. The Adult Learning Theory (Lindeman, 1926), Theory of Andragogy (Knowles, 1984), Theory of Learning Organization (Senge, 1990), and Social Cognitive and Observational Learning Theory (Bandura, 1969) help to conceptualize the complex problem of instructional equity and the complex challenges associated with improving it. This case study includes an examination of the impact of instructional coaching on teacher effectiveness. In order to build a blueprint for this research methodology, each theory was unpacked and related to the core issues (effective, sustainable, realistic, job-embedded support for teachers) to create a framework for the study. In the context of this case, the novice teachers at FCHS were considered adult learners since they were involved in the intervention to measure the impact on their growth and development. Next, each theory will be addressed in detail.
**Adult Learning Theory**

Lindeman developed the Adult Learning Theory which reflects his perspective that adults learn differently than children. According to Lindeman (1926), education is a life-long process and should be directly related to what people want and need to know. Preschool to high school students are expected to adjust to set curriculum and standards in their education, but in adult education, it is essential for the professional development to be designed to meet adult learners’ needs (Lindeman, 1926). Adult education should be situational with great respect for the background and experiences of the adult learners (Lindeman, 1926). Setting up these educational opportunities effectively would mean that the person developing or designing learning experiences for adult learners should take into consideration who the participants are, what they need and want to learn, and how they learn. In addition, the learning experience should be relevant and meaningful for the adult learner. The quote “if education is life, then life is also education” sums up the Adult Learning Theory succinctly (Lindeman, 1926, p. 9). Revolutionary for his time, Lindeman was a proponent of culturally relevant curriculum and methods with an emphasis on validating and celebrating the varied experiences of adult learners (Nixon-Ponder, 1995). While all schools and school systems need to plan for continuing education for teachers (adult learners), not many people in administrative positions have formal training in adult education (Rothwell, 2020). Adults have different motivations for continuing education along with varying needs for and approaches to learning; consequently, those in the position of planning for professional development need to take these differences into consideration. In practice, this could manifest as the educational leader getting to know staff, surveying or interviewing them to determine professional
development needs, encouraging their honest self-reflection and goal-setting, partnering all teachers with a coach, and tailoring the PD to each teacher’s needs and goals (Zepeda, 2013).

**Theory of Andragogy**

Built upon Lindeman’s 1926 Adult Learning Theory, the Theory of Andragogy focuses on adult learners with an emphasis on support rather than evaluation and providing time for critical reflection after a situational learning experience. Knowles’ (1984) Theory of Andragogy, or adult learning, is based on the process of learning instead of emphasizing the content. Andragogy refers to the art, science, methods, and techniques of teaching adults. The Theory of Andragogy is a constructive approach to adult learning through mentorship and facilitation of learning experiences (Cox, 2015). This means “that people actively construct or make their own knowledge and that reality is determined by the experiences of the learner” (Elliott et al., 2000, p. 256). Professional development based on the Theory of Andragogy would demonstrate respect for the adult learner’s background experience and learning needs instead of relying on teacher-centered direct instruction. Through this lens, the novice teacher’s (adult learner) professional experience and learning goals would be valued and used to guide the learning process; the adult learner is a willing participant, and the PD teacher is a facilitator and guide (Cox, 2015). One of the ways to make sure learning experiences are personalized, meaningful, and hands-on is through coaching. In a school environment, the coaching model could entail pairing experienced teachers with novice teachers to work together, plan lessons, provide feedback, and establish goals for improvement.
There are several characteristics that Knowles’ posits are required to create a positive dynamic between a coach (PD teacher) and a novice teacher (adult learner). First, novice teachers need to understand what they are trying to learn and why (Knowles, 1984). This could be managed through self-assessment, personalized goal setting, and individualized professional growth plans. Further, novice teachers need to understand the connections of the learning experience to their own professional setting, and they need to recognize the gaps in their knowledge (Cox, 2015). The learning experience should be centered around a problem in their own professional practice that they can seek to solve through the learning experience (Knowles, 1984). In practice, this would require the professional development opportunity to include learning or experiences that will help novice teachers solve a problem or issue they are experiencing in their own setting. Second, the novice teacher has a choice and is self-directed in the process (Knowles, 1984). This would manifest as opportunities to learn instead of mandates to attend a required in-service or professional development session. Adults learn most effectively when they are open and ready to learn (Cox, 2015). For learning to actually impact practice, it cannot be forced, mandated, or required. In order to encourage this to happen, relevance and clear communication of purpose are essential. This begins and ends with transparency, open communication, and a growth mindset. Third, the background knowledge and experiences of the novice teacher (adult learner) are respected and leveraged for continued improvement (Cox, 2015). The background of novice teachers will provide a lens through which they see and experience life that will impact what they will take from learning experiences (Knowles, 1984). This learning experience is even more impactful if it includes time for adult learners to reflect critically on learning
experiences and how the experiences relate to their own setting. According to Mezirow (1990), “Reflection enables us to correct distortions in our beliefs and errors in problem-solving” (p. 1). In this case, reflection can challenge expectations and assumptions, and it can guide the novice teacher in creating meaning from learning opportunities.

**Theory of Learning Organization**

Senge (1990) created the Theory of Learning Organization and shared his thoughts about systems thinking in the book *The Fifth Discipline*. Systems thinking is about finding collaborative solutions to problems impacting a school or system. Senge (1990) asserts that all adults have the ability and capacity to learn but do not always have the drive or desire to do so, and this can be influenced by the environment in the workplace. The Theory of Learning Organization posits that a functioning system or environment works best when “people continually expand their capacity to create the results they truly desire, where new and expansive patterns of thinking are nurtured, where collective aspiration is set free, and where people are continually learning to see the whole together” (Senge, 1990, p. 3). This means that people in a well-functioning organization are constantly working to improve themselves and work together to grow and develop their team and improve the organization for everyone.

There are five tenets of the Theory of Learning Organization that explain how to increase the effectiveness of an organization or system. The tenets of the Theory of Learning Organization included systems thinking, personal mastery, mental models, building shared vision, and team learning (Senge, 1990). The Theory of Learning Organization supports school improvement through the application of the ability to view the school as a system or whole and recognition of the individual parts of each
problem within the school setting, including who is involved and how they interact with each other. (Hansen et al., 2020). According to the Theory of Learning Organization, there is a focus on the big picture by looking at how short-term problems and solutions will play out in the long term for the school or system (Senge, 1990). The entire organization or system learns together when the individuals in it learn, grow, and share (Senge, 1990). In practice, this would mean that all of the teachers in a school view the school as a whole system and understand their contributions to the system, positive or negative. In addition, in a well-functioning system, teachers would look to collaboration for positive growth and development for the betterment of the school as a whole.

In order for effective learning to occur, the environment in an organization, school, or classroom must be conducive for learners to take risks and make mistakes without threat (Ward, 2020). An awareness of how each tenet influences the others is essential to creating solutions to real-world problems in our schools. The environment school leaders create for teachers is directly related to the authenticity of their desire for innovation and the ability to understand how each of the components of the system work together to create an effective and productive environment.

**Social Cognitive and Observational Learning Theory**

The final theory underpinning the research design is the Social Cognitive and Observational Learning Theory proposed by Albert Bandura. The Social Cognitive and Observational Learning Theory is devised from Bandura’s belief that instruction is not the sole source of learning but that substantial learning can also occur from people observing other people (Bandura & Walters, 1977). The core tenets of his theory are that people can learn through observation, they must be open to and accepting of the learning
experience, and reflection is essential to a person deciding whether to imitate, augment, or reject the new information (Bandura & Walters, 1977). Regarding the role of the instructor, specific attention must be paid to the learning environments leaders create as people learn best in social and collaborative situations where they can see interactions and links between the content, other people, and themselves (Ward, 2020). When provided the opportunity to observe one another in a school setting, teachers open to the experience can gain meaningful insights (Whitaker, 2020).

This observational learning is most effective if the teachers are open to the experience of peer observing, ready to learn, and given time to reflect on the observation. When these criteria are met, observers are likely to be able to take away meaningful insights they can apply to their own setting (Bandura & Walters, 1977). This means that if a novice teacher, or any teacher, were provided time to observe an effective teacher teach and time to reflect on their own teaching, the chances of the learning opportunity actually impacting their classroom practice is improved.

![Figure 1.1 Theoretical Framework](image)
Adults learn differently than students, and in order for any learning experience to be successful, especially in a work setting, they must be designed to meet the needs of the adult participants. Keeping in mind the core tenets of the theoretical framework, it was important to create meaningful and relevant learning experiences and observation opportunities for novice teachers at Friendship County High School (FCHS). This visualization of how the four theories work together for this research study are captured in Figure 1.1 above. Setting up learning experiences for adults should be organized with respect for their wealth of experiences and background knowledge (Lindeman, 1926). To further support the choice of intervention in this case study research, the Theory of Andragogy that posits the use of coaching for adults is an effective method of development as long as there is an emphasis on support and time for reflection on their professional practice (Knowles, 1984). Peer observations and reflections are a situational component of coaching that meet the tenets of the Theory of Andragogy. Peer classroom observations can provide meaningful opportunities for participants to watch, reflect and learn according to the Social Cognitive and Observational Learning Theory (Bandura & Walters, 1977). Creating an environment conducive for instructional coaching to take place is important. The Theory of Learning Organization describes a functional system as one in which teachers embrace growth and change, and they are free to experiment and learn from one another together (Senge, 1990).

**Study Purpose**

The purpose of this action research study was to evaluate the interventions of peer observation and coaching as practical and sustainable methods for addressing the
inconsistencies from classroom to classroom at FCHS. This study analyzed the qualities, characteristics, and skills of highly effective teachers and explored how the use of peer observations and coaching relationships influenced the development of those qualities, characteristics, and skills in novice teachers.

Research Questions

RQ1: What do highly effective high school academic teachers do that make them so successful in their professional practice?

RQ2: What impact will an intervention of coaching by highly effective high school teachers have on the practice of novice high school teachers?

RQ3: What impact will an intervention of highly effective high school teachers coaching novice high school teachers have on the students in novice teachers’ classrooms?

Research Participants

The participants in this research study were all teachers at Friendship County High School selected through purposeful, criterion-based sampling. This sampling technique means that specific inclusion and exclusion criteria should be determined ahead of selecting participants who meet the criteria (Palinkas et al., 2015; Suri, 2011). Purposeful sampling is a useful strategy for studying a small sample size through in-depth case study research because the participants have specific characteristics the researcher is interested in learning more about through the study (Palinkas et al., 2015). The four master teacher-coach participants included one English teacher with 28 years of experience, one Math teacher with 10 years of experience, one Science teacher with 19 years of experience and one Science teacher with 18 years of experience. The four novice
teachers in the study taught academic subjects, and all had between one and three years of experience. The students in the novice teachers’ classrooms were all in grades 9-12 and included a representative sample of the student population of FCHS including students in all four grade levels who had special needs, were learning English as a second language, were gifted, and/or were economically disadvantaged.

**Research Setting**

Friendship County High School is a rural school situated in the Appalachian foothills of North Georgia and, during the 2022-2023 school year, it served 1,104 students in grades 9-12. The student body was composed of 314 freshmen, 312 sophomores, 250 juniors, and 219 seniors and the demographics of the student population were about 96% Caucasian, 3% Black, and 1% Hispanic. There were 111 staff members at FCHS including 69 certified instructional staff members. The staff included a wide variety of backgrounds and experience levels. About 98% of the staff members were Caucasian, 1% were Asian, and 1% were Hispanic. FCHS has a wide variety of instructional programs including Advanced Placement, Gifted, Dual Enrollment, Special Education, Career, Technical and Agricultural Education Classes, Weight Training, Fine Arts, and Modern Languages. During the 2022-2023 school year, students took classes on a 4-by-4 block schedule in which they took four classes in the fall from August to December and then changed to four new classes in January through May. Classes were 90 minutes long. In addition to classes, students had a wide variety of extracurricular academic, service, fine arts, and athletic opportunities available to them before and after the school day.
Positionality

Positionality refers to the researcher’s position in comparison to their setting and participants (Herr & Anderson, 2015). There is a continuum of different ways that researchers can be insiders and outsiders in relation to the demographics, backgrounds, and experiences of the participants in their research setting and all of the similarities and differences can potentially impact the study (Bourke, 2014; Herr & Anderson, 2015). Researcher positionality impacts many things about how the research questions, methodology, and dissertation are designed (Herr & Anderson, 2015). According to Herr and Anderson (2015), positionality is important and can have potentially negative impacts on the findings of the study. Therefore, it has to be carefully considered, and the limitations created by the positionality thoroughly explained to avoid making conclusions from the study that may not be supported by the evidence (Herr & Anderson, 2015).

This research study concerned teacher effectiveness in Friendship County High School. Although I did not have a direct influence on the instructional design and delivery, I was an educational leader in the school system. I believe the skill and effort of the teacher in the classroom is the most important factor in determining student success and outcomes. Because of this belief, it was important to my professional practice as a leader in the school system to support all of our teachers at Friendship County High School. The study was written from the perspective of an insider because the focus was on improving our support for teachers and the infrastructure of our professional learning communities inside of our school system (Herr & Anderson, 2015). This was action research because I was an insider in the organization trying to solve a problem within my own school system (Herr & Anderson, 2015). This presented challenges to my research,
and these challenges were carefully considered to see how my position in the school system, relationship with the teachers, background, and beliefs could have influenced or impacted my research.

As an educational leader, I had to be careful to avoid using my position to influence the direction of the research. I was not in an evaluative role with the participants and, instead, collaborated with them during the interventions. I approached the research with the position of an insider in collaboration with other insiders in hopes that my efforts were democratic and could have a greater impact within the school in a positive way (Herr & Anderson, 2015). I have my own philosophy of education and beliefs about what makes teaching and learning effective; I had to be careful not to let my opinions of teaching and learning impact the coaching dynamic between the participants. I did not want to influence the direction of coaching and did not want my role in the school system to prevent the participants from being honest and transparent in their sessions, so I did not sit in on the coaching-conversation components of the study. I also needed to provide opportunities for the feedback to be anonymous from the teachers and students to ensure my presence did not influence the answers I received like it could in a face-to-face interview. Open communication with teachers was required to aid the transition into the role as a facilitator instead of an administrator in this research study. Friendship County High School was situated in a rural community with a large percentage of parents working in blue-collar jobs. The teacher demographics of FCHS were 99% white, 1% Asian and 1% Hispanic and the majority lived in our small, rural mountain community. As a white, middle-class, female from a rural area, I identified with and related to the experiences of the majority of the teachers.
Methodology Overview

According to Creswell and Creswell (2017), a qualitative research design is best suited for an investigation of a phenomenon. A case study is a type of qualitative research design that is an in-depth look at a case which can be people, events, or processes (Creswell & Creswell, 2017). The dynamic process of a master teacher coaching a novice teacher fit well with the process case study design because it allowed for an extensive investigation of a small sample size. However, the field of education relies heavily on quantitative results in the form of evaluations and assessments to determine the effectiveness of classroom instruction (GaDOE, 2022). In order to further validate the results of the study, quantitative data were collected simultaneously throughout the study. The nature of the data collection means this study classifies as a convergent mixed methods case study (Creswell & Creswell, 2017).

This study is considered action research because it involves studying interactions and “ongoing actions that are taken in a setting” with the researcher in collaboration with the teachers who participate (Herr & Anderson, 2015, p. 2). The mixed methods case study approach is an effective method of researching this issue because the study involves the impact of a coaching relationship between an expert teacher and a novice teacher on the effectiveness of both teachers’ practice (Efron & Ravid, 2019). The case study included eight teachers from FCHS arranged into four different coaching pairs. The four master coaching teachers and their students helped answer RQ1 and the data from the intervention of the partnership of the master teacher-coach and novice teacher and the students in the novice teachers’ classrooms answered RQ2 and RQ3. A case study was a
good fit since the sample size was small and the goal was to understand the impact and
dynamic of the phenomenon (Efron & Ravid, 2019).

According to Efron and Ravid (2019), mixed methods is an effective way to
incorporate both qualitative and quantitative methods to analyze the cases from different
perspectives. Teacher perspectives are essential to the professional development process,
especially for coaching, so the teacher voices were collected in a variety of ways. Student
perspectives are important to consider in the conversation about what it takes to make an
effective teacher because they have the experience of being in the classroom and
experiencing the culture and climate of learning (Connor & Cavendish, 2020; Stobaugh
et al., 2020).

To initiate the study process, inclusion and exclusion criteria for participants
were set. Criterion sampling, meaning the cases fit the predetermined criteria of a
novice teacher and master teacher (see Glossary of Terms) was utilized to select the
purposeful sample (Palinkas et al., 2015; Suri, 2011). Purposeful sampling is useful
when studying small sample sizes who share certain characteristics (Palinkas et al.,
2015). In this case, the participants needed to be either novice or master teachers.
Because of my own insider knowledge of the instructional staff at FCHS, I was able to
serve as an informant as to which teachers would be potential participants. A
purposeful sample of both master teachers and novice teachers who met the inclusion
criteria were asked if they would like to participate in the study. After initial interest
was gathered, the researcher met with each of the potential participants to discuss the
scope of the study and ensure they were interested in, qualified for, and willing to engage
in the coaching intervention and data collection. After finding the participants, they were
arranged into pairs consisting of master teacher-coaches partnered with novice teachers. Students were educated about the research study and were given a permission slip to opt out of the study. Afterwards, students in each of the selected novice teachers’ classes took an anonymous pre-survey of teacher effectiveness. Peer observations were arranged between the master teacher-coach and novice teacher to create a baseline of engagement and rigor in each classroom on an observation tool that allowed space for critical reflection. Master teacher-coaches and novice teachers met after observations to debrief and discuss what they each saw in each other’s pedagogy and classroom interactions. After each debriefing meeting, the master teacher-coach tasked the novice teacher with trying a strategy or skill they observed in the master teacher-coach’s classroom. This cycle continued three more times throughout the six-week period of the research study with each debrief focusing on a different topic related to classroom management, rigor, and student engagement and inquiry. At the end of the research, debrief interviews and surveys were organized for the master teacher-coaches and novice teachers. Students in the master teachers’ classrooms were asked to voluntarily share information to one open-ended survey question. In addition, students participated in an anonymous post-survey of teacher effectiveness with an open-ended question about their experience in the novice teachers’ classrooms.

Ethical considerations for the study included ensuring only teachers who were interested in participating were involved, and they were doing so voluntarily. Because of my role in the school system, I needed to make sure there was no pressure placed on teachers to participate. I also used participation agreements for students, teachers, and administrators to ensure all stakeholders were well-informed of the research aims and
methods. I maintained confidentiality of all participants. I checked my positionality as an insider-outsider and someone in an administrative role in the system. I ensured I was not working with teachers who were direct reports for evaluations linked to the Teacher Keys Effectiveness System Teacher Assessment on Performance Standards (TKES TAPS) for the Georgia Department of Education (GaDOE). It was essential for the participants to understand their participation would have no impact on their annual TKES evaluations.

**Data Collection**

The data collection methods were chosen to provide the student, master teacher-coach, and novice teacher perspective on the impact of coaching on teaching and learning in each novice teacher’s classroom. The teachers partnered together for the coaching had common planning periods during the school day and taught the same academic subject. It was important to use a variety of different data collection tools to triangulate the results and to collect data at regular intervals throughout the study (Efron & Ravid, 2019). Baseline data were collected from students and novice teachers in the form of surveys and self-assessments, respectively. During the six-week study, master teacher-coaches observed the novice teachers, novice teachers observed their master teacher-coach, and then the novice teacher and master teacher-coach met to discuss the implications of the observations with respect to the novice teachers’ self-assessments and goals for professional growth. This process was repeated four times over the course of the investigation. During this coaching process, master teacher-coaches scored instructional practices on a rubric and kept coaching reflection field notes journals. Post-intervention data were collected from students in the form of a survey, from novice teachers in the
form of a self-assessment reflection and interview, and from the master teacher-coach in the form of an interview.

**Data Analysis**

The data analysis process started with breaking all of the data down into individual components and then making meaning from the results and trends (Efron & Ravid, 2019). This was a mixed methods study in which the qualitative and quantitative data collection methods were equally important and the data were analyzed using a triangulation design.

Analyzing qualitative data from the interviews and coaching reflections started with looking at each piece separately, coding it, and looking for cohesive parts that helped to make meaning of the results (Efron & Ravid, 2019). This deductive analysis process began with transcribing the interviews and turning the coaching reflection journals into digital copies and then sorting them by participant. After organizing all of the qualitative data results, data were reviewed multiple times looking for themes and trends in relationship to the areas of teaching and learning included on the surveys and rubrics: positive learning environment, instructional design, instructional planning, assessment methods and uses, differentiated instruction, rigor and relevance. The results were then color-coded to clarify connections and streamline the sorting process. The qualitative data were then coded in a chart using abbreviations to help look for alignment, themes, and outliers. Emerging patterns were then easily backed up with evidence from the color-coded data sets for each participant. Originals of all of the unaltered data sets were kept separately as a backup. These procedures were the recommended and widely accepted method of analyzing data from action research studies (Efron & Ravid, 2019).
The quantitative data analysis process was used to triangulate and verify or challenge the qualitative data collected during the intervention. The quantitative data were transcribed, charts and graphs were created for each data set, organized by each participant, and a backup of the original was created. The results of the surveys, rubrics, and self-assessments were moved into spreadsheets and verified for accuracy by comparing the original survey to the spreadsheet. Charts were created for each participant showing the distribution of data from each of the data collection methods, and then charts were created to visually display the results. The data were tabulated and coded with the categories in the research study. The data were compared to the qualitative data from each of the participants to check for agreement or to challenge the findings. The data were validated using triangulation, research participant analysis, and an audit trail to protect the integrity of the research study according to the procedures recommended for action research (Efron & Ravid, 2019).

**Significance**

This case study is an example of what Efron and Ravid (2019) refer to as action research because it includes an educator seeking to solve a problem in their own setting through strategic investigation. The problem was uncovered through informal classroom observations throughout my time as an educational administrator at Friendship High School. The goal of the research study was to be able to make informed recommendations for improvements FCHS can make to support teachers. The data collected and information gleaned from this study benefited my practice as an educational leader and my school system. I have shared and will continue to share my experiences in
this study with my colleagues and other educational leaders. I do plan to replicate this intervention in other schools in our school system in the future.

I considered myself an insider-outsider for this study. While the interventions and data collection did not occur in my own classroom, I have knowledge and relationships that influenced my decisions and shaped the research design and interventions. The emphasis of this study was on teacher support systems for the end goal of improving student outcomes through identifying themes that could enable this process to be repeated successfully with other teachers. The goals, design, and interventions included in this study required a mixed methods approach to the case study.

**Summary**

In this chapter, the concern about teacher effectiveness at Friendship County High School was discussed. After establishing the problem at FCHS, the theoretical framework was explained as well as the purpose of the study and research questions. A brief overview of the research design and methodology was explained and the significance of the study was stated. Chapter Two contains an investigation of the existing research and literature related to the problem at FCHS. Chapter Three includes the research design and methodology used for the research study. Chapters Four and Five contain the research findings and discussion of the present study, respectively.
Glossary of Terms

Andragogy

Teaching adults (Merriam-Webster, n.d.).

CCRPI

College and Career Ready Performance Index. The state accountability measure for schools in Georgia. The CCRPI is based on metrics like high-stakes assessments, student growth and achievement, discipline, graduation rate, and school culture (GaDOE, 2023a).

Classroom management

The skill of maintaining a productive, organized, and efficient classroom focused on learning (Korpershoek et al., 2016).

DOK Depth of Knowledge

A model of understanding and planning for student learning experiences on the continuum of rigor. The model includes a framework for growth from Level 1 Recall to Level 2 Skills and Concepts to Level 3 Strategic Thinking and ending with Level 4 Extended Thinking (Weay et al., 2016).

Inquiry

An instructional strategy or student-centered approach to teaching that is focused on asking questions instead of providing the answers (Lazonder & Harmsen, 2016).

Master Teacher Coach

The coach participants for this research project are referred to throughout this paper as master teacher-coaches. For the purpose of this study, they are veteran teachers with ten years or more of successful teaching experience. They have also demonstrated a
mastery of engagement, pedagogy, and relationship-building with students through informal observations by the researcher.

**Novice Teacher**

The teacher participants for this research projects are referred to throughout this paper as novice teachers. For the purpose of this study, they are academic teachers with three years or less of successful teaching experience.

**Pedagogical skills**

The ability to deliver curriculum to students and manage the educational classroom (Ikromova, 2020).

**Peer observations**

Teachers watching other teachers work with students to learn from their professional practice (Darling-Hammond et al., 2017).

**Rigor**

Intellectually, academically, emotionally, and personally challenging educational experiences (Blackburn, 2013).

**Student engagement**

Active student interest and attention in the educational experience leading to curiosity and the desire to know more (Groccia, 2018).

**Teacher Keys Effectiveness System**

The required evaluation system for the state of Georgia. It is based on classroom observations, professional learning, and student assessment data (GaDOE, 2023b).
Teacher Assessment on Performance Standards

The rubric used in the TKES system for teacher evaluation on classroom instruction and practices (GaDOE, 2023b).
INTRODUCTION

Teachers are one of the most important factors in student achievement (Akram, 2019; Darling-Hammond, 2000; Ingersoll, 2004; Kraft et al., 2018; Muijs et al., 2014; Rivkin et al., 2005; Slater et al., 2012; Stronge et al., 2011). All great teachers are unique and share some common characteristics that enable them to positively impact students. The most effective teachers provide engaging environments where students not only can learn but are also equipped with critical thinking skills and are pushed to find success (Ward, 2020). Due to the way schools are designed, teachers frequently conduct their work while isolated from their colleagues (Ben-Peretz et al., 2018). This means great teachers may never have an opportunity to share their talent or skill with other teachers and new teachers may never have an opportunity to watch master teachers at work. This creates a barrier to teacher innovation and collaboration that can be difficult to break through with traditional professional development. Just as teachers have a complex and important job in educating their students, educational leaders have the responsibility to effectively support teachers in an effort to create real and lasting school improvement. Change is needed to refine what constitutes effective teacher professional development in schools today.

It is one of the most important jobs of an educational leader to support teachers, but it can be a difficult task if the leader does not have the skill set to create and
implement effective professional development (Darling-Hammond et al., 2017; Kaiser & Rasminske, 2021). Without specific training in leading and developing adults, educational leaders can rely on their own prior experience with learning in traditional professional development. This type of professional development, in which teachers attend and listen to a presenter, is the most common way educational leaders try to support teacher effectiveness (Sancar et al., 2021; Zepeda, 2019). Teachers are commonly asked or required to attend these in-service or training sessions that are delivered in a classroom-style setting with a presenter sharing information about a program, strategy, or initiative. However, this traditional professional development has not proven to impact actual classroom instructional practice or improve student performance (Sancar et al., 2021; Zepeda, 2019). The most common professional development used in schools is not highly effective in supporting teachers’ learning, growth, or development and most teachers work in isolation, never watching others teach. The combination of these factors can stymie innovation and progress in schools leading to a drastic difference in instructional effectiveness from classroom to classroom. It is then the educational leader’s most important role to support teachers in a way that is sustainable, personalized, and effective as a means to improve educational experiences, outcomes, and achievement for students (Darling-Hammond et al., 2017; Donaldson, 2013; Kraft et al., 2018; Leggett & Smith, 2019; Muijs et al., 2014).

**Purpose of the Study**

The purpose of this action research study was to evaluate the interventions of peer observation and coaching as practical and sustainable methods for addressing the inconsistencies from classroom to classroom at FCHS. This study analyzed the qualities,
characteristics, and skills of highly effective teachers and explored how the use of peer observations and coaching relationships influenced the development of those qualities, characteristics, and skills in novice teachers.

**Research Questions**

RQ1: What do highly effective teachers do that make them so successful in their professional practice?

RQ2: What impact will an intervention of coaching by highly effective teachers have on the practice of novice teachers?

RQ3: What impact will an intervention of highly effective teachers coaching novice teachers have on the students in novice teachers’ classrooms?

**Organization of Literature Review**

The purpose of the review of literature is to investigate the existing body of research on teacher effectiveness, support, and coaching to help inform the research design and methodology. The theoretical framework upon which the study is built is restated to provide a reference point for the methodology and intervention. The literature review begins by looking at the factors that influence the effectiveness of a teacher. Next, the role of teachers is investigated as well as the effective and ineffective methods of teacher support and development. Next, the leadership style and role of the educational leader are discussed as their role in creating an environment conducive to teacher effectiveness. Lastly, research supporting coaching as effective means of developing teacher effectiveness is described.
Literature Review Methodology

The studies and books to be reviewed were obtained by way of Google Scholar and the University of South Carolina Library Online Database including access to EBSCOhost and JSTOR. The references included in the literature review are a combination of scholarly books, peer-reviewed journal articles, government reports, case law, and websites managed by nonprofit organizations.

Theoretical Framework

An overarching sequence of four theoretical frameworks guides the organization and approach to this action research. There is no one theory that explains the nuance of adult education (Cercone, 2008; Merriam, 2001). The theories that reinforce the approach used in this study are the Adult Learning Theory (Lindeman, 1926), Theory of Andragogy (Knowles, 1984), Theory of Learning Organization (Senge, 1990), and the Social Cognitive and Observational Learning Theory (Bandura & Walters, 1977). These theories form the blueprint that was utilized to develop the intervention of supporting the adult learners included in this study through job-embedded, relevant, and hands-on coaching.

Adult learners need unique and specific training and professional development to continue to improve in their roles (Cercone, 2008). The Adult Learning Theory posits that any professional learning for teachers should be directly related to their learning goals and interests, and it should respect what background information and relevant skills they already have (Cercone, 2008; Lindeman, 1926). Building on that premise, the use of instructional coaching and providing time for teachers to reflect on their own practice is rooted in the Theory of Andragogy because it is personalized and differentiated for each
adult learner (Knowles, 1984). Knowles’ theory has evolved over time to include a spectrum of self-direction in learning for adults (Merriam, 2001). Adults who have more background knowledge in a subject are more likely to be self-directed in learning whereas adults who are new to a topic may be more reliant on the teacher for direction (Merriam, 2001). Adults have specific needs in their learning and development. Designing effective professional development for schools must include an awareness of the differentiated needs of the staff.

In addition to the specific needs of adult learners in professional development, the culture and climate of the learning environment must be conducive for growth. The Theory of Learning Organization explains the importance of the organization or system’s culture to improvement (Senge, 1990). The school or organization has to be a place where learning, trying, failing, and trying again are encouraged and supported; it also has to be a safe place for teachers to learn from each other (Senge, 1990; Ward, 2020). If teachers are working in a school where leaders actively work to support them, create meaningful opportunities for them to innovate, encourage collaboration, and involve them in decision-making, teachers may be likely to be open to new learning experiences through professional development. Senge’s theory asserts that in order to build a school where this professional learning is effective for teachers, the school culture has to support a learning community where continuous improvement and a problem-solving mentality are expected and encouraged (Hansen et al., 2020; Ward, 2020).

In most schools, teachers work in their classrooms alone and without the benefit of continued learning through observation (Ben-Peretz et al., 2018). However, learning from others is a powerful and effective way to support professional learning according to
Bandura’s Social Cognitive and Observational Learning Theory (Bandura & Walters, 1977; Rumjaun & Narod, 2020; Ward, 2020). It is effective and impactful to learn from watching others practice their craft. Facilitating opportunities for novice teachers to watch master teachers at work is a great way to support their learning and development.

Compiling the four theories into a theoretical framework that supports this action research case study, a clear path forward emerges. The collaborative environment will need to be conducive to adult learning through coaching and peer observations. The master teacher-coach needs to have great respect for the background knowledge, strengths, weaknesses, and goals of the novice teacher in order to build a productive and positive collaborative environment.

**The Changing Role of a Teacher**

Education has changed significantly from the development of first schools in response to the needs of students and society (Collins & Halverson, 2018). The original one-room schoolhouses have transitioned to complex, multiple-campus school systems with thousands of students and hundreds of teachers separated by grade level and/or subject (Collins & Halverson, 2018). Not only have the facilities changed significantly but also the expectations of instructional staff and the needs of students have changed as well.

Historically, teachers were the sole or main source of information and knowledge and shared this information in lecture-based, teacher-centered lessons designed to impart knowledge to students (Collins & Halverson, 2018; Holt-Reynolds, 2000). What worked in education a century ago is simply untenable in today’s schools (Ward, 2020). There are five main changes from the historical design of the traditional classroom to that of a 21st
The development of and increased access to the internet and technology changed the teacher-student dynamic significantly (Collins & Halverson, 2018). The improved accessibility of information necessitated a change to instructional approach of the 21st-century classroom from one of lecture and practice to one providing more critical thinking opportunities for students to be able to analyze and synthesize information (Kennedy & Sundberg, 2020; NEA, 2012). These higher-order thinking skills, like problem-solving, justifying, and supporting, are skills that can be transferred to any concept. In addition, there has been a shift from a need for lecture-based lessons to more student-centered and student-responsive active learning strategies to meet the needs of students (Kennedy & Sundberg, 2020; NEA, 2012). Lessons in today’s classroom have to be relevant, engaging, and meaningful to hold students’ attention effectively (Kennedy & Sundberg, 2020; NEA, 2012).

In the past, assessments were viewed as a snapshot of student achievement at a particular moment in time (White, 2017). Now, there is a need for many different types of assessments with many of them being used for formative checks of understanding or as diagnostic tools for the teacher to utilize in lesson planning in real-time (White, 2017). Teachers are now expected to adjust and change instruction to support student learning differences through a process called differentiation or personalized learning (Norton, 2015; Rickabaugh, 2016). Personalized learning is created through teachers customizing...
educational experiences to meet the individual needs of students based on data-informed decision-making. There are several shifts teachers need to make in order to be effective at personalizing and customizing learning experiences for students. These shifts include moving from teacher-centered lessons to student-centered experiences, students having clarity about the purpose and relevance of the learning experiences, and a focus on building the learning capacity of all students (Rickabaugh, 2016). This means education is not about teaching content but about teaching students how to learn (Ward, 2020). This dramatic shift from teaching the content standards to teaching the students is an increased demand on the teacher in the classroom. In today’s classroom, not only does the teacher have to be a content expert and trained with pedagogical skills, they now need to know each of their students-abilities, interests, readiness, and needs (Rickabaugh, 2016).

The dramatic, nationwide shift to online learning in response to the COVID-19 pandemic of 2020 introduced parents to the K-12 classroom in an unexpected way (Grooms & Childs, 2021). As teachers led their lessons through virtual platforms, parents became involved and engaged in the quality and content of education in America (Grooms & Childs, 2021; Sonnenschein et al., 2021). This situation forced open the doors of classrooms and increased the accountability that educators have to their communities (Grooms & Childs, 2021). For schools to move forward effectively, they must improve and strengthen the connection between teaching and actual learning by engaging students and creating productive educational partnerships with parents (Ward, 2020).

The substantial shifts in the cultural landscape indicate that schools must reinvent standard practice in response to the ever-changing demands of education. In fact,
Sophisticated forms of teaching are needed to develop student competencies such as deep mastery of challenging content, critical thinking, complex problem-solving, effective communication and collaboration, and self-direction. In turn, effective professional development (PD) is needed to help teachers learn and refine the pedagogies required to teach these skills. (Darling-Hammond et al., 2017, p. v).

Because of the drastic changes in the field of education, teachers are now expected to perform at increasing levels of pedagogical skill and professionalism (Bubb, 2004; Roy, 2019), and students are expected to reach more complex and rigorous standards of achievement (Stronge et al., 2011).

The effectiveness of the teacher in the classroom is one of the most important indicators of student success and outcomes (Darling-Hammond, 2000; Muijs et al., 2014; Slater et al., 2012; Stronge et al., 2011). Indeed, “although various educational policy initiatives may offer the promise of improving education, nothing is more fundamentally important to improving our schools than improving the teaching that occurs every day in every classroom” (Stronge et al., 2011, p. 351). The effective high school teacher has many roles in the classroom in addition to being a content expert, including maintaining a positive classroom environment, building positive relationships with students and parents, and collaborating with peers (Akram, 2019; Connor & Cavendish, 2020; Norton, 2015; Roy, 2019).

**What Master Teachers Do Differently**

Great teachers make great schools; “Teachers are a school’s keystone of greatness” (Whitaker, 2020, p. 7). All master teachers are unique and have different
approaches to teaching and learning. However, there are some characteristics that these effective teachers have in common. One of the things great teachers have in common is the ability to connect with students authentically. When teachers connect with students, it enables them to find small ways to make learning engaging, relevant, and meaningful for their students. When there is a positive classroom climate, students are engaged and show greater academic achievement (Allen et al., 2013; Norton, 2015). Great teachers are student focused and responsive to student needs which enables them to personalize the classroom experience. These master teachers make instructional design about teaching the students not just the teaching standards and content.

Great teachers are also trustworthy and consistent; they are transparent and communicate openly with students about expectations, rules, and procedures – and they follow through (Whitaker, 2020). Master teachers know it is important to do what they say they will do. Effective teachers provide meaningful and personalized feedback to students to help them grow and provide affirmation to encourage students to stretch, take productive risks, and push themselves (Whitaker, 2020). The most effective teachers see the best in students and treat them as if they are good, they can learn, and it is okay to make mistakes (Whitaker, 2020).

In a 2012 study, Slater et al. investigated the impact of teacher effectiveness on student achievement. The study included the math, science, and English assessment results in 33 schools and 740 with a total of over 7,300 students. Researchers evaluated the assessment data and observed teachers multiple times over three years and controlled for school impact. Slater et al. (2012) found that the most effective teachers improve student performance by 27% of the standard deviation. The results of the study showed
improving teacher effectiveness was the most effective way to support student achievement (Slater et al., 2012).

**Teacher Expectations for Students**

The greatest teachers believe all students can learn and achieve at a high level and as a result they set high expectations for students and encourage students to exceed those expectations (Whitaker, 2020). Holding students to a high standard of achievement and behavior is linked to increased student performance on assessments and better student academic outcomes (Gentrup et al., 2020; Johnston et al., 2022; Rubie-Davies et al., 2020). The power of setting high and consistent expectations for students and providing appropriate support is the positive impact these practices have on student achievement (Gentrup et al., 2020; Johnston et al., 2022; Whitaker, 2020). When a teacher’s academic expectations are lower, students often spend time working on less rigorous activities, which can create an academic disadvantage for the students in their class (Rubie-Davies et al., 2020). Students know their teachers’ expectations for them academically and behaviorally, and the expectations can become a self-fulfilling prophecy, positive or negative (Rubie-Davies et al., 2020). In addition, high expectations for student achievement can result in student’s own self-efficacy improving in regard to their academic ability and skill (Johnston et al., 2022; Rubie-Davies et al., 2020). The academic achievement of students in classes taught by teachers with high expectations can be related to the teacher’s belief that all students can achieve at high levels and, accordingly, great teachers support and scaffold to enable students to reach these standards (Rubie-Davies et al., 2020).
Stronge et al. (2011) investigated the impact of teacher effectiveness on student outcomes in a two-phase study. In Phase 1 of the study, researchers evaluated two years of math and reading assessment data from three school districts and more than 300 teachers (Stronge et al., 2011). In this phase, researchers used linear modeling in a regression-based methodology to create a baseline for students in order to develop an expected growth prediction (Stronge et al., 2011). The second phase of the research study investigated teacher effectiveness through a case study approach using observations and a common rubric as well as teacher self-reflection (Stronge et al., 2011). The goal of the research study was to identify the major differences between the most effective and least effective teachers based on student assessment data, classroom observations, and teacher self-assessments (Stronge et al., 2011). The findings of the study underscore the importance of classroom management, routines, and keeping students on-task and engaged (Stronge et al., 2011). No matter how effective the instructional practices of the teacher, if the students are not engaged in the lesson, they are not learning (Korpershoek et al., 2016).

**Relationships Matter**

Effective teachers focus on high expectations, mediocre teachers focus on rules and procedures, and the least effective teachers focus on consequences (Whitaker, 2020). Master teachers are intentional about how they approach concepts and how they design activities for students. They are also intentional about their interactions with students. Great teachers tend to be flexible with and adapt to change and ignore small problems without creating power struggles in their classrooms (Whitaker, 2020). For example, a novice teacher may call out misbehavior immediately in their classroom, embarrassing
the offending student and creating a disagreement in front of the classroom audience. However, a master teacher knows not to give a misbehaving student attention that will encourage their misbehavior and not to embarrass them by disciplining them publicly. The outcome of dealing with students personally and privately is typically a change in behavior that benefits both the student and teacher in the long run. However, a novice teacher may not see or experience this minor difference in classroom management if they don’t have the opportunity to watch great teachers teach.

The most effective teachers are able to control and manage the classroom in order to decrease classroom interruptions (Muijs et al., 2014; Stronge et al., 2011). Keeping students actively engaged in classroom lessons and on-task with assignments is key to improving academic achievement (Muijs et al., 2014). In addition to creating an engaging learning environment, effective teachers must have strong pedagogical skills and a positive and approachable demeanor with students (Connor & Cavendish, 2020; Norton, 2015). They also have to address the emotional needs of students to create an environment conducive for learning (Trang & Hansen, 2021). Teachers building positive, professional relationships with students can only improve classroom management (Sharma & Pandher, 2018; Trang & Hansen, 2021). An effective teacher’s “relationship with students can be referred to as ‘friendly with a purpose’” (Sharma & Pandher, 2018, p. 620). Trang and Hansen (2021) found the impact of high expectations for students in all levels P-12 led to more positive teacher-student interactions and better student achievement. When teachers build relationships with their students the dynamic of interaction can encourage and stimulate students to give more effort in the classroom and lead to more positive student outcomes (Trang & Hansen, 2021; Whitaker, 2020).
Teachers are influential in the lives of students and positive relationships matter (Norton, 2015; Trang & Hansen, 2021). One of the most telling signs of an effective teacher is their ability to authentically connect with their students (Norton, 2015; Whitaker, 2020). Students who are in classes with warm, welcoming, and supportive teachers are much more likely to engage in class, behave appropriately, and achieve more academically (Allen et al., 2013; Trang & Hansen, 2021).

**Collaboration**

Teachers, especially at the high school level, can benefit from opportunities for collaboration with teachers both inside and outside of their own content area. Teachers who work together and learn together in a positive and collaborative culture are more effective in the classroom (Berg, 2019). While this can be time-consuming, it is an essential component of effective teaching and should be a priority for the administration in planning (Acton, 2022). There are myriad ways to design and implement collaboration including cross-curricular partnerships, vertical alignment, and co-curricular professional learning communities. Cross-curricular interaction can lead to discussions about different types of instructional strategies that can improve teachers’ practices, work environments, and student performance (Louis & Lee, 2016; Sharma & Pandher, 2018). Vertical alignment can allow teachers to collaborate with the content teachers in the grade band below and above to ensure continuity of expectations and progressive development of skills (Carter, 2009). Co-curricular interaction can allow teachers opportunities to discuss curriculum, content, and assessments and share experiences (Lai & Cheung, 2015). In any effective form, collaboration can breed innovation and insight that can be more difficult for teachers to foster in isolation (Sharma & Pandher, 2018).
One example of such collaboration is called a professional learning community. A professional learning community in a school environment is a group of professional teachers investigating their practice collaboratively in an ongoing process meant to produce growth and development (Kaiser & Rasminsky, 2021). In these PLC groups, teachers meet regularly to look at student assessments, critically reflect on their practice, and collaborate on ways to improve instructional design and student learning (Kaiser & Rasminsky, 2021). These PLC meetings can take the place of professional development in-service training or conference style training but can be much more beneficial if they are sustained. These types of collaboration are intentional and can take years to develop if done effectively (Kaiser & Rasminsky, 2021).

**Self-Assessment and Reflection**

Teaching is a complex endeavor (Tay et al., 2023). An effective component of continuous improvement is honest self-assessment and self-reflection (Darling-Hammond et al., 2017; Sharma & Pandher, 2018; Tay et al., 2023; Whitaker, 2020). Teachers need to know where they stand and what they need and want to do to improve their professional practice (Roy, 2019; Whitaker, 2020). However, reflection without a purpose will not lead to the desired change (Tay et al., 2023). If a school or system is seeking real improvement, the focus has to be on supporting the professional growth and development of the teachers working with students. This begins with honest reflection and vulnerability that empowers teachers to have more agency in their development (Roy, 2019). Reflection should be purposeful and should carefully examine assumptions, beliefs, mindset, and performance (Tay et al., 2023). Although honest and accurate self-
evaluation and reflection is challenging, it is the most important component of lifelong learning (Sharma & Pandher, 2018; Whitaker, 2020).

**Leadership in the School**

Historically, principals were disciplinarians maintaining order or managers directing the operation of the physical school building (Crow et al., 2002; Ediger, 2014). Now, principals are expected to be educational leaders who have a vision for school improvement, instructional leadership, the design and implementation of professional development, and the innovation to meet the increasing needs of the students and teachers and the expectations of the community and school board (Sebastian et al., 2017). School leaders impact the purpose and vision of a school, the organization and functioning, and the social networks developed among the students and staff (Murakami et al., 2019). Currently, it is the most important job of principals to hire, support, and lead the instructional staff at their schools (Donaldson, 2013). The increasing expectations of instructional staff create a need for educational leaders to effectively support both teachers and students.

More than any other factor, the leadership style of principals and the support they provide for the teachers and teacher leaders is the most influential towards building a positive and constructive school culture and climate and influencing the process of developing school reform and school improvement (Acton, 2022; Dong et al., 2017; Lai & Cheung, 2015; Tonich, 2021). One leadership style "often cited as having a positive impact on school culture is distributed leadership, due to its culture of collaborative responsibility and mutual support” (Acton, 2022, p.14). The distributed leadership style empowers teachers to have a voice in the direction of the school, including developing
the professional learning and development programming (Lai & Cheung, 2015). A transformational and impactful school leader should employ this leadership style to set up intentional opportunities for teachers to share what they know and foster creativity among staff (Dong et al., 2017).

Teachers need and want agency in decision-making in the school and especially in their professional development (Zepeda, 2019). Despite teachers' desire for decision-making and professional learning agency, most principals and educational leaders do not espouse the distributed leadership style and do not seek out input on decisions or planning (Acton, 2022; Ingersoll, 2004; Lai & Cheung, 2015). Leading without input from teachers and students can lead to a principal working towards school improvement without the shared vision necessary for transformational and lasting change (Bush, 2018; Sebastian et al., 2017). Without collaboration and shared decision-making in school improvement, any type of professional development (PD) can seem to be happening to teachers instead of with them.

It is the role of the leaders in the school to build and support the teachers through continuing education. Because an effective school leader is not the person designing instruction or supporting student achievement, their greatest impact is in supporting and developing their staff (Murakami et al., 2019). This happens most effectively in a safe, positive, and conducive environment (Sebastian et al., 2017). After staffing the school, principals have to build and maintain a positive school culture (Murakami et al., 2019; Tonich, 2021). That begins with principals getting to know their staff and displaying transparency and open communication (Bush, 2018).
Culture & Climate

The culture of the school or school system as a whole can impact the classroom environment significantly. School culture can be positive or negative. In positive school cultures where trust and respect are evident, it is more likely for teachers to seek school improvement which leads to improved student academic outcomes (Louis & Lee, 2016; Robbins, 2015). A positive school atmosphere makes teachers feel safe to try new things, practice what they pick up through coaching or PD, make mistakes, and learn from them through reflection (Kaiser & Rasminsky, 2021). In a negative school culture, progress can be stymied, and improvement efforts can be hampered (Louis & Lee, 2016).

Shared leadership and responsibility, collaboration, and critical reflection are essential components in improving both classroom instruction and student outcomes (Louis & Lee, 2016). Teacher collaboration and shared ownership of school improvement are critical to building lasting positive school change (Lai & Cheung, 2015; Louis & Lee, 2016). For schools to become places focused on innovation, the teachers should be inspired and encouraged to develop their own skills (Dong et al., 2017). It is essential for leaders to take into account the needs of the school, teachers, and students. The leader is the one responsible for creating a climate where the highest priorities are growth, learning, and improvement (Kaiser & Rasminsky, 2021).

In their 2016 research study, Louis and Lee surveyed 3,579 teachers about organizational learning and school culture on teacher-level and organizational-level variables. Results of the survey showed teachers believed trust, respect, transparency, and support lead to more positive school culture and improved their workplace environment.
and student outcomes (Louis & Lee, 2016). Even more important, however, were the opportunities for collaboration, shared roles in decision-making, and opportunities to reflect on their teaching practice (Louis & Lee, 2016). Notes for further research include the difficulty of maintaining this collaboration at the high school level because of the separation of subjects and compartmentalization of the school (Louis & Lee, 2016). Louis and Lee (2016) emphasized the importance of networking between teachers and building a community of collaboration and reflective practice.

Feedback is an essential component of professional growth, but trust, transparency, and a culture of continuous improvement must be in place first (Donaldson, 2013; Kraft et al., 2018; Leggett & Smith, 2019; Muijs et al., 2014; Robbins, 2015). “If you are successful at creating a vibrant learning environment for the adults at your center, then they will be better equipped to offer stimulating and engaging learning experiences for the children in their care” (Bloom et al., 2010, p. 58). Administrators at the secondary level have to work diligently and intentionally to build a school culture of shared leadership and collaboration (Acton, 2022; Louis & Lee, 2016). If the school culture supports innovation and continuous improvement, it is much more likely for teachers to be invested in participating in PD and growing their professional practice. This innovation cannot happen if teachers are not supported to try new things and are not encouraged to collaborate and take risks.

**Professional Development Opportunities**

Student academic outcomes are tied to the effectiveness of the teacher in the classroom. One of the most important strategies for making sure that all teachers are equipped to meet the increasing needs of students and to support deep, rigorous, and
complex student learning is through professional development (PD) (Darling-Hammond et al., 2017). Because of this connection, it is essential that the educational leaders planning for PD understand the components of an effective program and the implications of its success or failure (Sancar et al., 2021). Not all professional development is created equal (Darling-Hammond et al., 2017).

For PD to be beneficial and meaningful for staff, it has to consider the context, experience, needs, and desires of the staff (GaDOE, 2022; Kaiser & Rasminsky, 2021; Lai & Cheung, 2015; Sancar et al., 2021). If the leader doesn’t consider the needs of the staff it can cause teachers to “feel that they don’t need the training, or that their time isn’t being well spent, or that you’re interfering with their personal lives, [if that is the case] teachers probably won’t benefit from any kind of professional development” (Kaiser & Rasminsky, 2021, p. 95). In addition to looking at the needs of the staff in the building, there are many other factors that impact the delivery of PD: teacher education, curriculum & content, student outcomes, school context, collaboration, and reforms or policies (Sancar et al., 2021).

In traditional preschool through high school education, the capacity for and teacher interest in professional learning decreases from elementary to high school (Louis & Lee, 2016). It is even more essential for high school leaders to be intensely focused on building a culture of continuous learning because the departmentalization of the school can lead to teachers working in isolation (Ben-Peretz et al., 2018). For a PD program to be effective, it must be responsive to the staff involved, and most are not (Ingersoll, 2004; Kaiser & Rasminsky, 2021; Roy, 2019; Sancar et al., 2021; Zepeda, 2019).
Continuing education, professional learning, or professional development for teachers is essential for improving student experience and outcomes (Sancar et al., 2021). Less effective teachers can have a lasting effect on the students who are put in their classes (Chingos & West, 2011; Donaldson, 2013). This can lead to an educational disparity between classrooms. Closing this gap by effectively coaching and supporting teachers must then become the leader’s most important job (Donaldson, 2013). Teachers of all experience levels are more likely to seek out or actively participate in professional development that is relevant and meaningful to their own context (Kaiser & Rasminsky, 2021; Lai & Cheung, 2015; Richter et al., 2014; Sancar et al., 2021). Schools and school systems are not always set up to provide these types of differentiated professional learning and fall back on standard, lecture-style professional development opportunities for teachers. These types of PD are more cost-effective and less time-consuming for schools to plan and host but are typically less well-received by staff, especially master staff (Ingersoll, 2004; Sancar et al., 2021). In short, the main issue is not the lack of PD available to teachers but its lack of effectiveness in impacting actual classroom instruction (Hinnant-Crawford, 2020; Ingersoll, 2004; Roy, 2019; Sancar et al., 2021). This is especially true if the purpose of the PD is to work toward school improvement in which teachers have not been involved in the planning or decision-making process (GaDOE, 2022; Kaiser & Rasminsky, 2021).

Having little say in the terms, processes, and outcomes of their work may deny teachers the opportunity to feel that they are doing worthwhile work—the very reason many of them came into the occupation in the first place—and may end up contributing to the high rates of turnover among teachers (GaDOE, 2022). As a result, such reforms
may not only fail to solve the problems they seek to address by offering the wrong prescription, but they may also end up making things worse. If top-down policies create an imbalance between power and responsibility, that is, if such policies hold teachers accountable for activities they do not control, they may decrease the very thing they seek to foster—improvements in teacher performance (Ingersoll, 2004, p.26)

**Teacher Burnout**

In the most recent research report on Teacher Burnout in Georgia, commissioned by the Georgia Department of Education in conjunction with the University of Georgia, teachers shared their unfiltered views on the difficulty of the teaching profession and the major issues leading them to leave education altogether. The results of the research study narrow the issue down into these major complaints: too many high-stakes assessments, not protecting teacher planning and instructional time, unrealistic expectations, a lack of teacher involvement in decision-making, and an avoidance of mental health issues (GaDOE, 2022). Educational leaders cannot control or fix all of the factors that influence teacher burnout. However, two of the factors can be addressed through involving and supporting teachers effectively: respecting teacher time and shared decision-making.

One way that leaders may further the issue of teacher burnout is by taking teachers’ planning time or requiring them to stay after school for meetings. Schools may require traditional PD during teacher planning periods during the day. This required PD may be designed in an effort to improve the school, if it is not the type of professional development the teacher wants or needs, it can lead staff to disengage or can contribute to a negative school culture (Darling-Hammond et al., 2017). The guidance for addressing this issue is to “personalize professional development programs to successfully advance
“teacher efficacy and expertise” (GaDOE, 2022, p.17). This is a key component missing from PD in most school settings (Darling-Hammond et al., 2017). Thoughtful planning and pre-scheduling of any times teachers may miss planning time is essential.

The second area of teacher burnout that can be addressed by educational leaders is shared decision-making. By employing a distributed leadership style, principals can bring teachers into the planning process for school improvement. Agency and involvement in school matters can help teachers feel included in the forward progress of their school community and help to prevent discouragement (Zepeda, 2019).

Educational leaders can and should address these concerns (Sebastian et al., 2017). Involving teachers in the decision-making process can be a beginning place for all of the other issues and concerns. Most importantly, it brings the right voices to the conversation to solve these complex problems together.

**Effective Support for Teachers**

Educational leaders are responsible for creating methods of supporting teaching and learning in their schools. However, the leaders need to know what quality professional development looks like in schools and how to recreate it in their setting. While every school looks different and has different needs for growing and developing instructional staff, there are some steps that leaders can take to build a professional that is effective in supporting teaching and learning.

First, the leader should create a standard for effective PD implementation and evaluation in their school with input from teachers (Darling-Hammond et al., 2017). This should include drafting a plan of expectations and performance objectives for what should, and should not, happen in professional development in their school.
Next, time needs to be built into the schedule to allow for PD, collaboration, peer observations, and coaching to occur during the regularly scheduled work day (Darling-Hammond et al., 2017). This could look like a flex schedule in which contents rotate an extra planning period, common planning times with other content teachers, or built-in professional development days in which students do not attend school. Building in prescheduled time for effective professional development is a great way to support teachers without taking away planning and collaboration time.

Annually, the leader should conduct a needs assessment with input from teachers about professional development. This is essential to keep PD rooted in the practical goals and needs of the staff (Darling-Hammond et al., 2017). This could include surveys or interviews with staff to collect feedback. Applying the feedback to the PD plan for the following year is an important step to make sure teachers feel heard and know their contributions are valued.

Additionally, the leader should find and develop master teachers in every subject area or grade level to work as coaches for other teachers. An effective and sustainable way to support teachers is through partnering them with coaches. It is important to build up great teachers and encourage them to invest in their team mates through collaboration and coaching.

Next, the leader should earmark funds for the continuing education needs of the faculty and staff (Darling-Hammond et al., 2017). These funds might be needed for stipends, travel, speakers, or substitute teachers.

In order to stave off teacher burnout and create effective support systems in schools, school leaders should create a comprehensive professional development plan
that supports teachers in equipping students with the knowledge, competencies, and skills they need to thrive in the global society of the 21st century (Darling-Hammond et al., 2017; GaDOE, 2022). This PD plan should connect to teachers’ needs, experiences, and content and should allow for the development of teacher-leaders (Darling-Hammond et al., 2017).

Watching great teachers teach is an effective way to learn about what works in the classroom (Norton, 2015). While every master teacher is different, there are traits they have in common that can inform the practice of other teachers (Whitaker, 2020). Peer observations can yield benefits for both teachers involved as well as the students in the classes being observed (Burgess et al., 2021). Less experienced or novice teachers can benefit greatly from peer observations, improving their teaching pedagogy and relevant skills through this type of hands-on professional development (Burgess et al., 2021; Dos Santos, 2020; Norton, 2015)

**Coaching**

Coaching is a powerful tool for teacher professional growth and development (Roy, 2019). Coaching is a significantly impactful method of sustainable professional development that can bring about positive and practical changes to pedagogy and student engagement (Norton, 2015; Roy, 2019). Coaching is more specific and targeted than mentoring. In schools, mentors are fairly common. Mentors guide new or novice teachers in navigating the school environment, help them with technology, answer general questions, and serve as a sounding board for issues or problems (Roy, 2019). The role of a coach, however, is to improve the novice teacher’s skillset, provide meaningful feedback, introduce them to effective techniques, and monitor their progress (Norton,
Other methods of professional development may produce lackluster change in practice, but coaching is productive and supports novice teachers by transforming their learning into practical application (Roy, 2019). If there is trust and transparency between the teacher and the master teacher-coach, they can be vulnerable and stretch themselves to grow (Jablon et al., 2016; Robbins, 2015).

Coaches can help novice teachers target a specific skill they can improve that will yield positive results with their students, can demonstrate the skill in action for the novice teacher, and can provide feedback through the novice teacher’s implementation of the skill (Norton, 2015; Roy, 2019). This type of personalized support, focused on the actual needs and goals of a teacher, is highly effective in supporting teachers (Norton, 2015; Roy, 2019). However, many leaders wait until a teacher is performing poorly, and they have tried everything else they know to implement before they begin to provide coaching (Roy, 2019). Instead of waiting for a problem to arise, leaders could partner teachers with a peer coach and build a culture of growth and development.

Younger and less experienced teachers typically are receptive to learning from more experienced teachers through peer coaching and prefer this on-the-job mentorship over classroom learning for professional development (Richter et al., 2014). Coaching can be effective for more than just novice teachers (Norton, 2015; Roy, 2019). As long as the teachers are mutually willing to participate, coaching can improve professional practice for any educator by providing an opportunity for feedback on their performance in a non-threatening way (Ben-Peretz et al., 2018). Coaching for all teachers can be used to build relationships and effectiveness, not address problems and deficiencies (Roy,
All teachers can grow and get better and can do so more efficiently and effectively with strategic peer coaching (Norton, 2015; Roy, 2019).

Because teaching typically happens in isolation, it can be difficult to support teachers through traditional professional development. Peer coaching with peer observations is an effective way to support novice teachers (Ben-Peretz et al., 2018). These observations and coaching can create “conversations about pedagogical approaches and “joint-deliberation” on the issues teachers face [that will be] both beneficial to improve job satisfaction and effectiveness” (Ben-Peretz et al., 2018, p. 311). One teacher working in isolation is not likely to make significant changes. A pair of teachers who decide and commit to make changes almost always follow through and the changes become part of both of their repertoires. This is the foundation of a highly effective tool: peer coaching (Roy, 2019). Even though research supports coaching as an effective method for supporting teachers, these instructional coaching partnerships for teachers are uncommon in U.S. schools (Roy, 2019).

Conclusion

Teaching has changed significantly in the last century, and teachers are required to fill more roles now more than ever before (Rickabaugh, 2016). While most teachers are required to have earned a college degree in their field of expertise, in education, or in both, most new teachers do not come to schools with practice in the real-world skills required to effectively manage a classroom, build relationships with students and parents, teach content, collaborate with peers, use assessment data to drive instruction and keep students engaged without distractions. When teachers enter the field without the requisite skill set in one or more of these areas, it becomes the role of the school or school system
to fill in the gaps. However, professional development programs typically lack the effectiveness required for actual classroom, school, or system change (Bates & Morgan, 2018; Darling-Hammond et al., 2017). This may be due to the leadership style of the principal or administrators in the school or due to the lack of knowledge about effective professional development. If the teacher is the most significant influence on student achievement, it should be the first priority of educational leaders to support teachers (Darling-Hammond, 2000). The goal of this research study is to explore the role of professional development in teacher effectiveness and provide findings that address the concepts of effective and realistic methods.

Strong school leadership, positive culture and climate, effective professional development, peer coaching, and peer observations can all influence the effectiveness of teachers and yet, many schools may not implement systems to create an environment conducive to teacher growth, development, and success. This leaves the question lingering: why not? If we, educational leaders, know what needs to be done, why is it not happening in every school?
CHAPTER 3

METHODOLOGY

Effective professional development should be job-embedded, content specific, relevant, and collaborative, and it should allow for feedback, reflection, and hands-on practice (Darling-Hammond et al., 2017). However, this is not the case for most professional development offered in schools (Bates & Morgan, 2018; Darling-Hammond et al., 2017). The purpose of this study was to support the growth and development of novice classroom teachers at Friendship County High School (FCHS) through coaching by experienced, master teachers to address inconsistencies in classroom rigor, engagement, and student outcomes. Novice teachers and experienced teachers observed each other and met to discuss effective instructional strategies and classroom management practices in order to engage students in rigorous, standards-based academic content. The growth and development of the novice teacher were supported through effective, individualized professional development. This was accomplished by pairing a novice teacher with an expert teacher over a six-week time period and providing for personalized goal setting, feedback and reflection cycles, and hands-on practice.

Most educational leaders at the school level are able to experience the classroom environments, and learning experiences in the classrooms of different teachers through
short, informal observations. It was initially during these informal walkthroughs in classrooms that administrators at FCHS recognized a discrepancy in the levels of engagement, learning, and rigor from classroom to classroom. In some classrooms at FCHS, students were highly engaged in learning, asking questions and participating, and were self-directed in the learning process, and in others, students were bored or distracted and unable to communicate what they were learning or why. Educational leaders discovered that students in the same academic courses in the same hall in the same school can have vastly different educational experiences based on the teacher with whom they are scheduled to take the course. While content collaboration is encouraged, and all academic core content teachers have common planning periods and common lunch tracks to bolster this collaboration, it is rare for teachers at FCHS to actually sit in each other’s classrooms during instruction for observation and reflection.

The quality and skill of the teacher in the classroom is one of the most important factors to student success and positive educational outcomes (Akram, 2019; Ingersoll, 2004; Kraft et al., 2018; Muijs et al., 2014; Rivkin et al., 2005; Slater et al., 2012; Stronge et al., 2011). The nature of education, however, does not lend itself to teachers learning from each other in on-the-job training since most classrooms operate in isolation (Ben-Peretz et al., 2018). The combination of teaching in isolation, not observing others in practice, and professional development that does not improve classroom instruction results in a dramatic variance in instructional effectiveness from classroom to classroom. This means many of the students in schools are left with less effective teachers and are not receiving the same experience with engaging, relevant, and rigorous instruction.
School administrators’ most critical job is supporting teachers, but this commonly leads to one-size-fits-all professional development that does little to improve classroom instruction (Darling-Hammond et al., 2017; Sancar et al., 2021). Effective PD should be relevant, job-embedded, and personalized to meet the needs of staff (Darling-Hammond et al., 2017). This responsibility is one of the educational leader’s most important roles in school improvement: creating sustainable, personalized, and effective support for teachers. This cannot be accomplished without first attending to the culture and climate of the school. Improving school culture and climate first requires the leaders of the school to understand the values of the students and staff. Only after understanding the stakeholders can the leader bring the school expectations and operational procedures of the school in line with the shared values (MacNeil et al., 2009).

After addressing the culture and climate of the school and developing trust and transparency with staff, the real work of school improvement can begin. One component of addressing the inconsistency with classroom instruction may be connected to adjusting the behavioral expectations of leaders, teachers, and students and operational procedures of the school to allow teachers to learn from each other in a structured way. Coaching and peer observations, if both thoughtfully organized, meet the criteria of effective professional development. While coaching and peer observations are both considered effective tools to use in developing teachers, they are not used consistently in professional development in schools (Bates & Morgan, 2018).

**Study Purpose and Research Questions**

The purpose of this action research study was to evaluate the interventions of peer observation and coaching as practical and sustainable methods for addressing the
inconsistencies from classroom to classroom at FCHS. This study analyzed the qualities, characteristics, and skills of highly effective teachers and explored how the use of peer observations and coaching relationships influenced the development of those qualities, characteristics, and skills in novice teachers.

RQ1: What do highly effective high school academic teachers do that make them so successful in their professional practice?

RQ2: What impact will an intervention of coaching by highly effective teachers have on the practice of novice teachers?

RQ3: What impact will an intervention of highly effective teachers coaching novice teachers have on the students in novice teachers’ classrooms?

**Action Research**

Action research can be defined as the process of a professional engaging in inquiry, reflection, and action in an effort to improve something about their own practice (Costello, 2003; Merriam & Tisdell, 2015). Action research diverges from traditional research in that the researcher is an active participant in researching, taking action, and trying to improve their own practice whereas, in traditional research, the researcher is an impartial observer seeking to add to his own understanding of a topic (Costello, 2003; Merriam & Tisdell, 2015). Instead of research on participants, action research is conducted with participants (Merriam & Tisdell, 2015). In addition, action research is a cyclical process made up of the steps: plan, act, observe, and reflect and the focus is on improving a problem within the researchers’ setting (Costello, 2003; Herr & Anderson, 2015). Because I am investigating, researching, and acting in an effort to solve a problem
observed in my professional setting within the realm of my responsibilities as an educational leader this is considered action research (Merriam & Tisdell, 2015).

**Research Design**

Quantitative research provides data and statistics that can be used to attempt to support or refute a hypothesis (Creswell & Creswell, 2017). Researchers used this research design to collect hard data from instruments and analyze the data using different forms of statistical tests based on what the instruments measured. It is important to identify variables and control for variables not included in the study. I originally thought I would like to use quantitative research experimental design for this study, but the readings in Creswell and Creswell (2017) about controlling for variables and creating a clear hypothesis for the research study pushed me to look more closely at the strengths of qualitative research as a part of this study.

Qualitative research provides insight into the experiences of the participants in the study by exploring a culture, individual, process, or activity (Creswell & Creswell, 2017; Merriam & Tisdell, 2015). Qualitative research designs, such as case studies, provide a different way to look at human nature (Merriam & Tisdell, 2015). Whether the researcher wants to learn about a culture by observing while immersed in the community or wants to learn about a phenomenon by interviewing people and observing behaviors, qualitative research methods provide means to collect snapshots of the lived experiences of people (Creswell & Creswell, 2017). Teacher, coach, and student voice was important to include in the study and qualitative research methods provided that ability.

Quantitative and qualitative research designs both have strengths and weaknesses, and many types of research studies are best suited for one or the other design. I chose
mixed methods research design because I believed the combination of quantitative and qualitative data collected simultaneously would show a more complete picture of the complexities of teaching and learning. In addition, mixed methods research allows researchers to validate findings by analyzing qualitative data by coding with themes and triangulating it with quantitative data collection methods (Creswell & Creswell, 2017).

According to Merriam and Tisdell (2015), a mixed methods case study research design is best suited for an investigation in which the researcher wants to look at a particular case in-depth and cross-check the qualitative and quantitative data against one another. The case study was a good fit for a quantitative and qualitative investigation of the effectiveness of peer observations and coaching on the classroom practices of a novice teacher. The case study method can provide a method of investigating complex human and social systems (Gagnon, 2010). While it is a very reliable methodology for allowing researchers to understand and describe both individuals and systems, it is time consuming for the researcher and the participants (Gagnon, 2010). It is also difficult to generalize the results from the study because each case is unique and different (Gagnon, 2010). However, this weakness of the case study can be overcome by including quantitative data collection methods (Gagnon, 2010). Since both the lived experience of the teacher and the data and statistics to back up the experience with evidence are desired to demonstrate the growth and development of the teacher’s classroom practices, both quantitative and qualitative research methods are needed (Creswell & Creswell, 2017). Both types of data were collected simultaneously throughout the six weeks and were therefore considered a convergent mixed methods case study (Creswell & Creswell, 2017).
The study included an in-depth look at four novice teachers who participated in coaching and peer observations from master teachers using the results of the pre-intervention and post-intervention student surveys, pre-intervention and post-intervention novice teacher self-assessments, peer observations using the Teacher Keys Effectiveness System Teacher Assessment on Performance Standards (TKES TAPS) rubrics, and teacher interviews over a six-week time period (Creswell & Creswell, 2017). The intervention consisted of structured coaching and peer observations with a master teacher in their department. The purpose of utilizing a mixed methods design is to triangulate the qualitative data and quantitative data to validate results and share the student and teacher experience as well as the statistics showing the level of improvement (Creswell & Creswell, 2017).

**Research Site**

FCHS is a small school in a rural setting in the Northeast Georgia mountains. At the time of the study conducted during the 2022-2023 school year, the school was composed of 1,139 students and a staff of 112, including 72 teachers. The FCHS student population was 52% male and 48% female. The teacher-to-student ratio was 1:17, but most academic class sizes were between 24-28 students. The school included a minority enrollment of 14%, and the economically disadvantaged students enrolled comprised 45% of the school population during that academic year. The average SAT score was 1092, and the average ACT score was 22. The most recent graduation rate was 98.7%, and the school ranked in the top 10 graduation rates in the state of Georgia.
Participants

The participants were selected for this study through criterion-based purposeful sampling. The inclusion criteria for a master teacher-coach included the requirement that they were academic teachers at FCHS with ten years or more of successful teaching experience. These master teacher-coach participants must also have demonstrated a mastery of student engagement, instructional design, and relationship-building with students. The inclusion criteria for the novice teacher participants included that they were academic teachers at FCHS with three years or less of successful teaching experience. The researcher was able to serve in the role as an informant to determine which FCHS would meet the inclusion criteria for this study. After potential participants were selected, the study was explained to them and they were asked if they would like to participate in the study. Eight core academic teachers employed at FCHS agreed to participate. Four of the eight teachers were considered novice academic teachers, having three years or less of experience teaching. The other four teachers were considered master teachers having between 10 and 28 years of effective teaching experience. The students in all four of the novice teachers’ classrooms were also included in the study through a survey they participated in at the beginning and end of the study. The students in the master teacher-coaches’ classrooms participated in the study by volunteering to answer an open-ended question at the conclusion of the study. All participants included in the case study are identified with pseudonyms to protect their privacy.

Role of a Novice Teacher

The role of the novice teacher participants in this study was to work closely with their master teacher-coach individually over the duration of the study to reflect on their
pedagogy and practice. The novice teacher and master teacher-coach observed each other in their classrooms with the purpose of the personalized professional growth of the novice teacher according to the goals they set for themselves. The novice teachers were involved in order to improve their teaching practice through coaching and observations.

**Rebecca.** Rebecca is a high school English teacher with three years teaching experience at FCHS. She started at FCHS as a substitute teacher and then was hired as a teacher the subsequent year. Rebecca holds a Bachelor of Science Degree in Education. Rebecca’s goal for was growth-related classroom management and depth of teaching and learning. Rebecca struggles with confidence, but her greatest strengths are her energy, enthusiasm, and willingness to try new things.

**Caleb.** Caleb is a high school science teacher with three years teaching experience at FCHS. He came to teaching through a non-traditional route and completed the Georgia TAPP program to earn his teaching certificate which he completed in 2022. Caleb’s goal was to improve classroom management, student engagement, and depth of teaching and learning. Caleb wanted to improve transitions between activities when students finish at different times. His greatest strengths are his sense of humor, attention to hands-on learning, and desire to learn and grow as a teacher.

**Jessie.** Jessie is a high school science teacher in his first year of teaching at FCHS. He came to FCHS through a non-traditional route and is not a certified teacher yet. He has a doctorate in his medical field and was a practitioner for over thirteen years in his field before joining FCHS as a high school teacher. He became a teacher during the middle of the year when a teacher left FCHS to pursue another career opportunity. Jessie
did not have a formal educational training program and lacked confidence in designing
dynamic and rigorous classroom lesson plans. Jessie set a goal to gain skills in classroom
management, student engagement, and developing rigorous classroom activities. Jessie’s
strengths are his infectious energy and enthusiasm, positive attitude, willingness to try
new things, and ability to build relationships with students.

**Julie.** Julie is a high school math teacher with two years teaching experience at
FCHS. Julie holds a Master of Education degree. Julie’s concern was classroom
management and keeping students busy and actively working until the end of the class
period. Julie’s easy-going and positive attitude is disarming for students in a math
classroom. Because of this, she is able to build encouraging relationships with students
who typically struggle in math classes.

**Role of a Coach**

The role of the master teacher-coach participants in this study was to work closely
with their novice teacher individually over the duration of the study. The master coach
teacher and novice teacher observed each other in their classrooms with the purpose of
the personalized professional growth of the novice teacher according to the goals they set
for themselves. The coaches for this study were not in an evaluative role in the
department and were only concerned with supporting the new teacher. The master
teacher-coaches’ students were offered an opportunity to share what they think about
their teachers class at the end of the six week study through an informal interview. The
quotes are included here to frame why they were included as master teacher participants.

**Savannah.** Savannah is a master English teacher with 28 years in public
education. She holds a Master of Education degree. Her greatest strengths in the
classroom are classroom management, student engagement, and teaching with rigor and relevance as noted by her administration. One of her students shared “her class is so great. She is an excellent teacher. What sets her apart is her high standards for academic achievement but it is partnered with kindness, compassion, and support. She leaves no student behind.” Her Georgia Milestones test scores are consistently among the highest in her academic department. One of her students shared: “I have never felt so confident going into an EOC test. When we started the test for her class, I knew I would ace it and I did.” According to her students,

[Savannah] is literally the toughest teacher I have ever had and she is by far the best teacher I have ever had. She sets incredibly high expectations for us [her students] but she provides feedback, support, and encouragement to help us reach them.”

In general, her students describe her as a great teacher who is tough but cares about every student. Savannah is also an experienced mentor and coach; she is often partnered with new teachers as an induction mentor. Her goal in this study was to coach Rebecca by giving honest and helpful feedback and providing suggestions for actionable steps to help Rebecca meet her goals in her classroom.

**Matt.** Matt is a master science teacher with 18 years of experience teaching and coaching in public schools. He holds an Educational Specialist Degree in Teaching and Learning. Matt is an enthusiastic and dynamic teacher with excellent classroom management skills as noted by his administration. His student shared: “his class is so engaging! He provides many hands-on opportunities. He is tough but he makes class so interesting. He motivates every student to get involved.” He builds positive and
productive relationships with his students and his classroom rules and routines make his classroom an effective environment in which to learn. “[Matt] is so friendly and welcoming, it makes him easy to approach when I need help. His class is academically challenging but it is fun at the same time.” In general, his strengths according to his students are his ability to build relationships with students, his fun and engaging class, and his organized approach to teaching.

In the science department in which Caleb and Matt work, there is a lack of collaboration as each teacher specializes in a particular discipline and the whole department does not work together to plan or share ideas. Matt’s goal in this research study was first to build a relationship with Caleb to be able to collaborate and work together. After developing trust with each other, Matt’s work became about getting to know what Caleb wanted and needed to work on for his professional growth and development.

**Jammie.** Jammie is a master science teacher with 19 years of experience as a teacher and instructional coach. She holds an Educational Specialist Degree in Teaching and Learning. She is a fun and engaging teacher with a wealth of knowledge in supporting teachers. Her students describe her as “an incredible teacher.” One student shared: “I wish I could take her class every semester. She will be the teacher I will remember for the rest of my life. She is tough but fair and kind” While she no longer teaches in tested subject areas, her Advanced Placement and Georgia Milestone test scores were commendable throughout her time teaching tested subjects. Her unassuming and approachable demeanor makes her easy to work with and learn from according to her administration. Her students see her similarly. One student shared: “[Jammie] is my
favorite teacher. She teaches in a way that is relevant. She makes learning fun.” In her partnership with Jessie, Jammie hoped to help support his need for foundational pedagogical skills and classroom management strategies that work.

**David.** David is a master math teacher with 10 years of experience teaching and coaching. He holds a Bachelor of Science degree in Education. David’s strengths are his classroom management skills and dynamic instructional strategies, according to his administration. “[David] is literally the best. He is my favorite teacher of all time. He is fun, interesting, funny, and nice. He teaches in a way every student can understand.” David’s high-stakes test scores are always among the highest at FCHS when he teaches tested subjects. Students in his classroom describe him as engaging, helpful, fun, and interesting. One student shared: “Math is not my strongest subject. It usually gives me anxiety. In his class, though, I just get it. His class is not easy but he is helpful and supportive.” Since many FCHS students struggle in academic subjects, it is desirable for students to find their academic teacher engaging and supportive. David’s goal in working with Julie was to help build her confidence in classroom management, time management, and instructional design to aid her in meeting her professional goals during this research study.

**Role of the Students**

Students from the novice teachers’ classrooms were included in the study to provide insiders’ perspectives on the daily interactions and environment in the classroom. The student participants were asked a series of questions about their interactions with their teacher and their experiences in the classroom through an online survey for the purpose of triangulating the novice teachers’ self-assessment and the master teacher-
coaches’ classroom observations. The student survey information served as a checkpoint for the other two quantitative data points. At the conclusion of the study, students were offered the opportunity to volunteer to answer an open-ended question about their experiences in the novice teacher’s classroom. The open-ended question was used to frame the experience of the students compared to the teacher and coach experiences in this study. Students in the master-teacher coaches’ classrooms were also offered the opportunity to answer an open-ended question at the conclusion of the study.

**Coaching as Professional Development**

The implementation of the intervention of the study was aided by the fact the current academic core schedule is set up on a 4x4 block system where core academic teachers share planning and collaboration time of 2 hours each day, 90 minutes for planning, and 30 minutes for lunch. The core academic teachers are also clustered together in the same hallways by subject area. This schedule allowed for the intervention of structured coaching and peer observations to take place without much interruption to the regular schedule.

**Intervention**

The intervention in this research study consisted of peer observations and coaching of the novice teacher by an experienced teacher in the same content area. At the beginning of the study, the novice teacher conducted a self-assessment and set goals for their professional growth and improvement. Soon after setting goals, the novice teacher met with their new master teacher-coach and set up times to observe and reflect throughout the six-week study. Since each content area shared the same planning period and lunchtime, the teachers observed each other and then met during one of their shared
collaboration times to discuss the observations. This cycle of observations, reflection, and coaching was repeated four times over the six-week study. Both the novice teacher and master-teacher coach were interviewed separately at the conclusion of the study.

**Data Collection Instruments**

The data collection instruments used in this convergent mixed methods case study were varied in order to collect both quantitative and qualitative data simultaneously. The qualitative instruments included observation field notes, interviews with the master teacher-coaches and novice teachers, and an open-ended survey question for students. The quantitative instruments included student pre- and post-intervention surveys, novice teacher self-assessments, and classroom observation rubrics.

**Surveys**

Students participated in pre- and post-surveys which included close-ended questions about classroom environment, communication, instruction and assessment strategies, feedback, and classroom management. The survey was created by the researcher to align with the 10 TKES TAPS standards. The alignment is detailed below in Table 3.1. The post-survey included an open-ended question about the student experience during the study. The survey was in an electronic format for privacy and accessibility. Students were asked to respond to the questions listed below on a Likert Scale with a score of 1 meaning “Never” and a score of 5 meaning “Always.” The questions were aligned to the self-assessment and classroom observation rubric for consistency and triangulation purposes. The following includes a list of the questions asked in the student survey in Appendix C.
<table>
<thead>
<tr>
<th>Question</th>
<th>Answer Prompts</th>
<th>TKES TAPS Standard</th>
</tr>
</thead>
<tbody>
<tr>
<td>I feel welcome in this class</td>
<td>1 Never … 5 Always</td>
<td>Performance Standard 7 Positive Learning Environment</td>
</tr>
<tr>
<td>I am engaged in the learning activities in this class</td>
<td>1 Never … 5 Always</td>
<td>Performance Standard 3 Instructional Strategies</td>
</tr>
<tr>
<td>I am academically challenged in this class</td>
<td>1 Never … 5 Always</td>
<td>Performance Standard 8 Academically Challenging Environment:</td>
</tr>
<tr>
<td>I am supported in this class</td>
<td>1 Never … 5 Always</td>
<td>Performance Standard 4 Differentiated Instruction</td>
</tr>
<tr>
<td>I understand why I am doing the tasks I am doing</td>
<td>1 Never … 5 Always</td>
<td>Performance Standard 1 Professional Knowledge</td>
</tr>
<tr>
<td>I feel like my teacher respects and values me</td>
<td>1 Never … 5 Always</td>
<td>Performance Standard 7 Positive Learning Environment</td>
</tr>
<tr>
<td>I receive feedback in this class</td>
<td>1 Never … 5 Always</td>
<td>Performance Standard 6 Assessment Uses</td>
</tr>
<tr>
<td>The classroom environment is conducive for learning</td>
<td>1 Never … 5 Always</td>
<td>Performance Standard 7 Positive Learning Environment</td>
</tr>
<tr>
<td>I know the rules and procedures in this class</td>
<td>1 Never … 5 Always</td>
<td>Performance Standard 7 Positive Learning Environment</td>
</tr>
<tr>
<td>I feel comfortable asking for help in this class</td>
<td>1 Never … 5 Always</td>
<td>Performance Standard 7 Positive Learning Environment</td>
</tr>
<tr>
<td>My teacher communicates with me and my parents through SchoolStatus</td>
<td>1 Never … 5 Always</td>
<td>Performance Standard 10 Communication</td>
</tr>
<tr>
<td>I have a choice in how I show what I know on some projects or assessments in this class</td>
<td>1 Never … 5 Always</td>
<td>Performance Standard 5 Assessment Strategies</td>
</tr>
<tr>
<td>I have the opportunity to learn from my mistakes in this class</td>
<td>1 Never … 5 Always</td>
<td>Performance Standard 4 Differentiated Instruction</td>
</tr>
<tr>
<td>When I miss a question or lose points on an assignment, I have an opportunity to learn why and how to fix it</td>
<td>1 Never … 5 Always</td>
<td>Performance Standard 6 Assessment Uses</td>
</tr>
<tr>
<td>I have many opportunities to work with others in this class</td>
<td>1 Never … 5 Always</td>
<td>Performance Standard 2 Instructional Planning</td>
</tr>
<tr>
<td>Open-Ended Question: Would you like to share anything about your experience in this class during the last six weeks?</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
Self-Assessment

The four participating novice teachers were asked to take a self-assessment before the research study started for the purpose of collecting baseline data and informing their goal-setting process with their individual coach. The self-assessment questions were aligned to the observation rubrics and student surveys for consistency and triangulation purposes. The self-assessment alignment is detailed in Table 3.2. This self-assessment is from the Georgia Department of Education as a part of the TKES process. I was given permission by the Georgia Department of Education to utilize the teacher evaluation system’s rubric and effectiveness indicators for this research study (Appendix H). The self-assessment was prepared in an electronic format for privacy and accessibility.

Teachers were asked to rate each area on a Likert scale with a score of 1 meaning “I would like to focus on this area” to a score of 3 meaning “I feel confident in this area.” Below are the Teacher Keys Effectiveness System Indicators novice teachers were asked to rate on the Likert scale on the self-assessment in Appendix B:

Table 3.2 Novice Teacher Self-Assessment Prompts

<table>
<thead>
<tr>
<th>Performance Standard</th>
<th>Topic</th>
<th>Description</th>
<th>Answer Prompts</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Professional Knowledge</td>
<td>Deep understanding of the curriculum, subject content, pedological knowledge and needs of students by providing relevant learning experiences.</td>
<td>1 “I would like to work on this area” … 3 “I feel confident in this area”</td>
</tr>
<tr>
<td>2</td>
<td>Instructional Planning</td>
<td>Plans using state and local school district curricula and standards, effective strategies, resources and data to address the differentiated needs of all students.</td>
<td>1 “I would like to work on this area” … 3 “I feel confident in this area”</td>
</tr>
<tr>
<td></td>
<td>Instructional Strategies</td>
<td>Promotes student learning by using research-based instructional strategies relevant to the content to engage students in active learning and to facilitate the students' acquisition of key knowledge.</td>
<td>1 “I would like to work on this area” … 3 “I feel confident in this area”</td>
</tr>
<tr>
<td>---</td>
<td>------------------------</td>
<td>------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------</td>
<td>---------------------------------------------------------------------------</td>
</tr>
<tr>
<td>4</td>
<td>Differentiated Instruction</td>
<td>Challenges and supports each student's learning by providing appropriate content and developing skills which address individual learning differences.</td>
<td>1 “I would like to work on this area” … 3 “I feel confident in this area”</td>
</tr>
<tr>
<td>5</td>
<td>Assessment Strategies</td>
<td>Uses a variety of diagnostic, formative, summative assessment strategies and instruments that are valid and appropriate for the content and student population.</td>
<td>1 “I would like to work on this area” … 3 “I feel confident in this area”</td>
</tr>
<tr>
<td>6</td>
<td>Assessment Uses</td>
<td>Gathers, analyzes and uses relevant data to measure student progress, to inform instructional content and delivery methods, and to provide timely and constructive feedback to both students and parents.</td>
<td>1 “I would like to work on this area” … 3 “I feel confident in this area”</td>
</tr>
<tr>
<td>7</td>
<td>Positive Learning Environment</td>
<td>Creates a well-managed, safe, orderly environment that is conducive to learning and encourages respect for all.</td>
<td>1 “I would like to work on this area” … 3 “I feel confident in this area”</td>
</tr>
<tr>
<td>8</td>
<td>Academically Challenging Environment</td>
<td>Creates a student-centered, academic environment in which teaching and learning occur at high levels and students are self-directed learners.</td>
<td>1 “I would like to work on this area” … 3 “I feel confident in this area”</td>
</tr>
<tr>
<td>9</td>
<td>Professionalism</td>
<td>Commitment to professional ethics and the school's mission, participates in professional growth opportunities to support student learning, and contributes to the profession.</td>
<td>1 “I would like to work on this area” … 3 “I feel confident in this area”</td>
</tr>
</tbody>
</table>
Communication

Communicates effectively with students, parents, guardians, district and school personnel, and other stakeholders in ways that enhance student learning.

1 “I would like to work on this area”

3 “I feel confident in this area”

Observation Rubric

Classroom observations were conducted in the participants’ classrooms by a master teacher-coach utilizing TKES rubric as the quantitative data collection tool. The TKES rubric, used for peer observations and coaching, included the following fields: professional knowledge, instructional planning, instructional design, assessment strategies, assessment uses, differentiated instruction, positive learning environment, academic rigor, communication and professionalism. The details of rubric are included in Table 3.3 below. Each of the fields could be scored one (needs improvement), two (developing), three (proficient), or four (exemplary). This is the same teacher evaluation tool all educational leaders in Georgia are required to utilize when observing and evaluating Georgia’s public-school teachers. Permission was granted by the Georgia Department of Education to utilize the TKES TAPS rubric for the peer observation process for this research study (Appendix H). The student survey and teacher self-assessment were aligned to the fields on this rubric for consistency and triangulation purposes. A score of 1 means the teacher is not meeting the standard, a score of 2 means the teacher meets the standard inconsistently, a score of 3 is the expected minimum for all Georgia teachers meaning that the teacher meets the standard consistently and a score of 4 means the teacher is not only meeting the standard but is training and developing other teachers to meet the standard. The following indicators are the expected level of
performance for teachers in Georgia, and they represent a score of 3 (proficient) on the TKES TAPS Rubric as included in Appendix D.

Table 3.3 TKES TAPS Rubric Standards

<table>
<thead>
<tr>
<th>Professional Knowledge</th>
<th>Points</th>
<th>Consistent</th>
<th>Inconsistent</th>
<th>Inadequate</th>
</tr>
</thead>
<tbody>
<tr>
<td>Deep understanding of the curriculum, subject content, pedological knowledge and needs of students by providing relevant learning experiences.</td>
<td>4</td>
<td>Consistent &amp; Guides Others</td>
<td>3 Consistent</td>
<td>2 Points</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Instructional Planning</th>
<th>Points</th>
<th>Consistent</th>
<th>Inconsistent</th>
<th>Inadequate</th>
</tr>
</thead>
<tbody>
<tr>
<td>Plans using state and local school district curricula and standards, effective strategies, resources and data to address the differentiated needs of all students.</td>
<td>4</td>
<td>Consistent &amp; Guides Others</td>
<td>3 Consistent</td>
<td>2 Points</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Instructional Strategies</th>
<th>Points</th>
<th>Consistent</th>
<th>Inconsistent</th>
<th>Inadequate</th>
</tr>
</thead>
<tbody>
<tr>
<td>Promotes student learning by using research-based instructional strategies relevant to the content to engage students in active learning and to facilitate the students' acquisition of key knowledge.</td>
<td>4</td>
<td>Consistent &amp; Guides Others</td>
<td>3 Consistent</td>
<td>2 Points</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Differentiated Instruction</th>
<th>Points</th>
<th>Consistent</th>
<th>Inconsistent</th>
<th>Inadequate</th>
</tr>
</thead>
<tbody>
<tr>
<td>Challenges and supports each student's learning by providing appropriate content and developing skills which address individual learning differences.</td>
<td>4</td>
<td>Consistent &amp; Guides Others</td>
<td>3 Consistent</td>
<td>2 Points</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Assessment Strategies</th>
<th>Points</th>
<th>Consistent</th>
<th>Inconsistent</th>
<th>Inadequate</th>
</tr>
</thead>
<tbody>
<tr>
<td>Uses a variety of diagnostic, formative, summative assessment strategies and instruments that are valid and appropriate for the content and student population.</td>
<td>4</td>
<td>Consistent &amp; Guides Others</td>
<td>3 Consistent</td>
<td>2 Points</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Assessment Uses</th>
<th>Points</th>
<th>Consistent</th>
<th>Inconsistent</th>
<th>Inadequate</th>
</tr>
</thead>
<tbody>
<tr>
<td>Gathers, analyzes and uses relevant data to measure student progress, to inform instructional content and delivery methods, and to provide timely and constructive feedback to both students and parents.</td>
<td>4</td>
<td>Consistent &amp; Guides Others</td>
<td>3 Consistent</td>
<td>2 Points</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Positive Learning Environment</th>
<th>Points</th>
<th>Consistent</th>
<th>Inconsistent</th>
<th>Inadequate</th>
</tr>
</thead>
<tbody>
<tr>
<td>Creates a well-managed, safe, orderly environment that is conducive to learning and encourages respect for all.</td>
<td>4</td>
<td>Consistent &amp; Guides Others</td>
<td>3 Consistent</td>
<td>2 Points</td>
</tr>
<tr>
<td><strong>Academically Challenging Environment</strong></td>
<td>Creates a student-centered, academic environment in which teaching and learning occur at high levels and students are self-directed learners.</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>----------------------------------------</td>
<td>----------------------------------------------------------------------------------------------------------------------------------</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>4 Points</strong></td>
<td><strong>3 Points</strong></td>
<td><strong>2 Points</strong></td>
<td><strong>1 Point</strong></td>
<td></td>
</tr>
<tr>
<td>Consistent &amp; Guides Others</td>
<td>Consistent</td>
<td>Inconsistent</td>
<td>Inadequate</td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th><strong>Professionalism</strong></th>
<th>Commitment to professional ethics and the school’s mission, participates in professional growth opportunities to support student learning, and contributes to the profession.</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>4 Points</strong></td>
<td><strong>3 Points</strong></td>
</tr>
<tr>
<td>Consistent &amp; Guides Others</td>
<td>Consistent</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th><strong>Communication</strong></th>
<th>Communicates effectively with students, parents, guardians, district and school personnel, and other stakeholders in ways that enhance student learning.</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>4 Points</strong></td>
<td><strong>3 Points</strong></td>
</tr>
<tr>
<td>Consistent &amp; Guides Others</td>
<td>Consistent</td>
</tr>
</tbody>
</table>

**Observation Field Notes**

While in the novice teacher’s classroom, the master teacher-coach jotted down field notes in response to each area of the observation rubric. This qualitative data collection tool was kept in an electronic format that the coach could access on a laptop while in the novice teacher’s classroom and during the coaching sessions. Coaches were asked to keep these field notes in reference to the standard level of expected performance on each indicator while considering the novice teacher’s goals and objectives through this research study. The notes provided a descriptive analysis of the standards and provided insight to the coaching and feedback session direction.

**Interview**

I met with the novice teacher and master teacher-coach individually and privately to conduct interviews at the conclusion of the six-week study. The purpose of the interviews was to collect qualitative data about the process and impact of the peer observations and coaching on both the novice teacher and the experienced master
teacher-coach. The questions were designed to collect more detailed information about the process of observing, reflecting, and coaching. The questions are included in Table 3.4 below. The questions used to guide the interview with the novice teacher from Appendix E are listed below:

Table 3.4 Novice Teacher Interview Questions

<table>
<thead>
<tr>
<th>Question #</th>
<th>Novice Teacher Interview Questions</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Did you have any preconceived notions about how this research project would go? If so, what were they? Were they right or wrong?</td>
</tr>
<tr>
<td>2</td>
<td>Did you learn anything about yourself as a teacher during this project? If so, explain.</td>
</tr>
<tr>
<td>3</td>
<td>Did you find the observation, coaching, reflection cycle a positive or negative experience? Why?</td>
</tr>
<tr>
<td>4</td>
<td>What impact, if any, did this project have on your teaching practice?</td>
</tr>
<tr>
<td>5</td>
<td>What, if anything, did you take away from observing your coach teach?</td>
</tr>
<tr>
<td>6</td>
<td>What, if anything, did you take away from the coaching sessions?</td>
</tr>
<tr>
<td>7</td>
<td>If this project were to continue for the remainder of the semester, do you feel like it would benefit your instructional practice? Why or why not?</td>
</tr>
<tr>
<td>8</td>
<td>Did you notice any differences in student response, behavior or engagement in your class during the project?</td>
</tr>
<tr>
<td>9</td>
<td>Did you notice any changes in academic performance of your students during the project?</td>
</tr>
<tr>
<td>10</td>
<td>What was the most challenging part of this project?</td>
</tr>
<tr>
<td>11</td>
<td>What was the best part of this project?</td>
</tr>
<tr>
<td>12</td>
<td>Do you think coaching is a viable way to support new teachers? Why or why not?</td>
</tr>
<tr>
<td>13</td>
<td>Reflect on the goal you set with your coach during the first session, do you feel like you made progress towards meeting the goal? Why or why not?</td>
</tr>
</tbody>
</table>

In addition to interviewing the novice teacher, the master teacher-coach was also interviewed at the conclusion of the study. The questions were designed to find out more
information about the experience of coaching. The questions included in Appendix F, listed below in Table 3.5, were used to guide the interview:

Table 3.5 Master Teacher-Coach Interview Questions

<table>
<thead>
<tr>
<th>Question #</th>
<th>Novice Teacher Interview Questions</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Did you have any preconceived notions about how this research project would go? If so, what were they? Were they right or wrong?</td>
</tr>
<tr>
<td>2</td>
<td>Did you learn anything about yourself as a coach during this project? If so, explain.</td>
</tr>
<tr>
<td>3</td>
<td>Did you find the observation, coaching, reflection cycle a positive or negative experience? Why?</td>
</tr>
<tr>
<td>4</td>
<td>What impact, if any, did you observe this project have on the teaching practice of your mentee?</td>
</tr>
<tr>
<td>5</td>
<td>What, if anything, did you take away from observing your mentee teach?</td>
</tr>
<tr>
<td>6</td>
<td>What, if anything, did you expect your mentee to take away from the coaching sessions?</td>
</tr>
<tr>
<td>7</td>
<td>If this project were to continue for the remainder of the semester, do you feel like it would benefit your mentee’s instructional practice? Why or why not?</td>
</tr>
<tr>
<td>8</td>
<td>Did you notice any differences in student response, behavior or engagement in your mentee’s class during the project?</td>
</tr>
<tr>
<td>9</td>
<td>Did you notice any changes in academic performance of your mentee’s students during the project?</td>
</tr>
<tr>
<td>10</td>
<td>What was the most challenging part of this project?</td>
</tr>
<tr>
<td>11</td>
<td>What was the best part of this project?</td>
</tr>
<tr>
<td>12</td>
<td>Do you think coaching is a viable way to support new teachers? Why or why not?</td>
</tr>
<tr>
<td>13</td>
<td>Reflect on the goal you set with your mentee during the first session, do you feel like your mentee made progress towards meeting the goal? Why or why not?</td>
</tr>
</tbody>
</table>

Data Collection Procedures

There are a multitude of ways to collect data for mixed methods research including, but not limited to, surveys, interviews, and observations (Efron & Ravid,
2019). For this research study, I utilized both quantitative and qualitative observations for novice teachers and master teacher-coaches to watch classroom instruction with specific purposes (Efron & Ravid, 2019). Teachers collected field notes to describe classroom environments and activities and rating scales to score certain teacher actions and behaviors and shared them with me throughout the study. In addition to the classroom observations, surveys were utilized in the form of student pre- and post-assessments and novice teacher pre- and post-self-assessments. The purpose of these surveys was to collect a variety of information about 10 different standards in a way that was quick to administer and simple to analyze (Efron & Ravid, 2019). Semi-structured interviews were used at the end of the study. The interviews were semi-structured because questions were prepared ahead of time but only guided the conversations, I asked clarifying and follow-up questions to get more details about items that were unclear (Efron & Ravid, 2019).

**Surveys**

At the beginning of the study, I went into each novice teacher’s classroom at a time prescheduled to meet with their students. During this meeting, the novice teacher left the classroom. I explained the research study and what information was needed from the students during the study. After explaining the study, I gave each student a letter to take home to explain the research study to the parents and allow an opportunity for students or parents to opt out of the data collection surveys at the beginning and end of the study. An example of this letter is provided in Appendix A. Parents were provided a week to opt students out of the data collection process. I met with each class and administered the survey without the teacher present in the classroom. Students were
instructed to open their Chromebooks and go to the private URL provided to them on the whiteboard or interactive panel in the classroom. I answered questions and helped students who had difficulty navigating to the survey. Students were given ample time to complete the survey, and they were asked not to discuss any information from the survey with any other students in the classroom or with the teacher. The survey results were automatically transmitted to my secure, encrypted drive. I repeated this process again at the end of the study with each novice teacher’s classes at a time that was convenient for the teacher. Again, the teacher left the classroom, and the students were directed to a private URL to take the post-intervention survey. The survey results were automatically transmitted to my secure, encrypted drive. I thanked the students for their participation and closed the survey links upon leaving the classroom. Students in the master-teacher coaches’ classrooms were offered the opportunity to answer the open-ended question at the conclusion of the study.

**Self-Assessment**

Novice teachers were emailed a link to an electronic self-assessment survey to fill out before their first meeting with their coach. Teachers filled out the survey from the comfort and privacy of their computers. The results were transmitted automatically to my encrypted drive. The novice teachers agreed to have the results of the self-assessment to be shared with their master teacher-coach for the purpose of informing their first coaching conversation and goal-setting meeting. Master teacher-coaches and novice teachers all signed a confidentiality statement (Appendix G) agreeing they would not share any information learned in the observations or coaching sessions with anyone outside of their partner. The novice teachers filled out the self-assessment again at the
end of the study in order to measure their perceived growth and development on the TKES TAPS standards throughout the six-week study. At the conclusion of the study, the self-assessment was emailed to the novice teachers. The teachers took the self-assessment from their computers, and the results were automatically transmitted to my encrypted drive. I thanked the teachers for their honest reflection and participation in the study.

**Observation Rubric**

During the first meeting with the novice teacher, the master teacher-coach reviewed the student survey data and the self-assessment data with the novice teacher to set a measurable and achievable goal for the research study. At the conclusion of that meeting, the master teacher-coach scheduled peer observations. Four peer observations were set up for each of the novice teachers to observe their coaches, and 4 observations were arranged for the master teacher-coaches to observe their novice mentee teachers over the six weeks. Classroom coverage was provided for each of the observations. During the observations, the master teacher-coach rated the novice teacher on the TKES TAPS Rubric in Appendix D. A numerical score was given to each of the 10 standards if they were observed during the time the master teacher-coach was in the classroom. If the evidence of the standard was not present during the observation; the master teacher-coach left the score in that indicator blank. The TKES TAPS rubric was used with permission from the Georgia Department of Education. The rubric was turned into a live document that the master teacher-coach could type directly onto during the observation via their laptop. A separate rubric was used for each of the four times the master teacher-coach observed the novice teacher. When novice teachers observed the coaches, they were not asked to utilize the rubric to score the master teacher. After the
last observation and coaching session, access to the digital rubrics was removed so I was the only person with access to the rubrics and scores.

Observation Field Notes

During the peer observations, the master teacher-coach kept descriptive field notes in an electronic field notes journal. Each of the four observations created a separate entry into the field note journal. The field notes were specific to the TKES Standards and the goals set by the novice teacher for their own growth and development. The observation field notes were used as the basis of the coaching conversations that were held after each peer observation cycle. During the coaching session, the master teacher added to the field notes with an entry containing reflections and notes from the coaching session. After the conclusion of the last observation and coaching cycle, access to the digital field notes was removed so I was the only person with access to the field notes.

Interview

At the conclusion of the research study, I set up private meetings with each of the novice teachers and master teacher-coaches. During these meetings, I asked permission to record the conversations. I turned on a recording device and asked the novice teacher or master teacher-coach the questions included in the post-intervention interviews. Some of the answers prompted follow-up questions to clarify information. I took notes during the interview. At the conclusion of the interview, I uploaded the notes from the interview and the recordings of the conversation to an encrypted folder.

Research Procedure

Purposeful sampling was utilized to choose participants. I am familiar with the instructional staff at FCHS, having observed in their classrooms numerous times, and
relied on my knowledge of the teachers to choose participants who met the predetermined criteria of a novice teacher and master teacher-coach. After participants were selected, the study was thoroughly explained, and they were offered an opportunity to ask clarifying questions. After the study was explained, potential participants were asked if they would like to participate in the study. All eight teachers asked to participate agreed to do so.

After participation was confirmed from all eight teacher participants, a notice was sent out to students for the purpose of allowing parents to opt their students out of the study. After the participants were chosen and notice was made, students and novice teachers participated in a pre-intervention survey and pre-intervention self-assessment, respectively, to establish a baseline. After the survey, a master teacher-coach was partnered with a novice teacher in their same academic content area. The master teacher-coach was trained in the use of the TKES observation tool, field note collection, and coaching sessions and was offered an opportunity to ask clarifying questions. All eight teacher participants signed the confidentiality agreement in Appendix G. Afterwards, the master teacher was given access, with permission, to the aggregate student survey data and the novice teacher’s self-assessment results for the purpose of informing the coaching session.

The master teacher-coach and their novice teacher mentee partner share a common planning period and a common lunch track. The master teacher-coach set up the initial meeting with the novice teacher to review the self-assessment data and student survey goal and work with the novice teacher to set a goal for growth and development throughout the six-week study. After setting a goal, the master teacher-coach set up four peer observations in which the novice teacher observed the master teacher and the master
teacher observed the novice teacher. While the master teacher observed the novice teacher, he or she took field notes and rated the novice teacher on the TKES TAPS Rubric in Appendix D. After observations, the master teacher-coach set up a meeting with the novice teacher to discuss the observations, provide feedback and make recommendations for strategies to help the novice teacher meet their goal. The master teacher-coach took notes during the structured coaching session. The observation and coaching cycle was repeated three additional times for a total of four peer observations and four coaching sessions over the six-week period. At the end of the study, the students participated in the post-intervention survey, the novice teachers retook the self-assessment and participated in an exit interview, and the master teacher-coach participated in an exit-interview and submitted field notes and rubrics from the four observations. The schedule for the research procedure, detailed in this section, is listed in Table 3.6 below.

Table 3.6 Schedule of the Research Study

<table>
<thead>
<tr>
<th>Week</th>
<th>Participant</th>
<th>Tasks</th>
</tr>
</thead>
<tbody>
<tr>
<td>Prior to Study</td>
<td>Master teacher-coach</td>
<td>Introduction to study</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Confidentiality confirmation</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Training in requirements</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Training on TKES observation tool</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Introduction to field notes</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Schedule observations</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Schedule coaching sessions</td>
</tr>
<tr>
<td>Week One</td>
<td>Novice Teacher</td>
<td>Introduction to study</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Confidentiality confirmation</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Participate in self-assessment</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Schedule student surveys</td>
</tr>
<tr>
<td>Week One</td>
<td>Students</td>
<td>Introduction to study</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Letter to parents, permission to participate</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Take pre-intervention survey</td>
</tr>
<tr>
<td>Week</td>
<td>Master teacher-coach</td>
<td>Novice Teacher</td>
</tr>
<tr>
<td>------</td>
<td>----------------------</td>
<td>----------------</td>
</tr>
</tbody>
</table>
| Two  | Review student pre-intervention survey  
Review novice teacher self-assessment  
Meet with novice teacher to review goals | Meet with master teacher to set goals |
|      | Observe novice teacher  
Fill out TKES rubric  
Collect field notes  
Meet with novice teacher to coach for growth | Observe master coach teacher  
Meet with master coach teacher to discuss opportunities for growth |
| Three| Observe novice teacher  
Fill out TKES rubric  
Collect field notes  
Meet with novice teacher to coach for growth | Observe master coach teacher  
Meet with master coach teacher to discuss opportunities for growth |
| Four | Observe novice teacher  
Fill out TKES rubric  
Collect field notes  
Meet with novice teacher to coach for growth | Observe master coach teacher  
Meet with master coach teacher to discuss opportunities for growth |
| Five | Observe novice teacher  
Fill out TKES rubric  
Collect field notes  
Meet with novice teacher to coach for growth | Observe master coach teacher  
Meet with master coach teacher to discuss opportunities for growth |
| Six  | Take post-intervention survey  
Volunteer for Interview | Participate in Exit Interview  
Participate in post-interview self-assessment  
Participate in Exit Interview |
Data Analysis

Data should be organized logically to allow for accurate analysis and interpretation (Efron & Ravid, 2019). In order to analyze the quantitative and qualitative data for this research study, the first step was to organize the information. Audio recordings were transcribed, and all digital copies of rubrics, surveys, field notes, and coaching journals were organized into files by novice teacher. The recordings were also uploaded to the electronic file after being transcribed. Original files were copied so there would be a backup copy to refer to if needed after the data were separated and decontextualized (Efron & Ravid, 2019).

After all files were uploaded to the electronic drive, the files were separated by case into four separate folders; one folder for each novice teacher. This was important so that the research could be individually analyzed case by case before looking at the results comprehensively. Table 3.7 includes information about how the files are organized, cataloged by the name of teacher in an encrypted drive to protect the information and ensure it was backed up.

Table 3.7 Data Collected from each Participant & Coach Pair

<table>
<thead>
<tr>
<th>Novice Teacher</th>
<th>Demographic Info</th>
<th>Source of Data</th>
<th>Master teacher-coach</th>
</tr>
</thead>
<tbody>
<tr>
<td>Rebecca</td>
<td>Novice Academic Teacher</td>
<td>Interview Audio Recording Interview Transcript Student Pre-Survey Student Post-Survey Pre Self-Assessment Post Self-Assessment Coach Interview Audio Recording Coach Interview Transcript Coach Observation Rubric Coach Observation Field Notes Student Interview Question Transcript</td>
<td>Savannah</td>
</tr>
<tr>
<td>Caleb</td>
<td>Novice Academic Teacher</td>
<td>Interview Audio Recording</td>
<td>Interview Transcript</td>
</tr>
<tr>
<td>-----------</td>
<td>--------------------------</td>
<td>---------------------------</td>
<td>----------------------</td>
</tr>
<tr>
<td>Jessie</td>
<td>Novice Academic Teacher</td>
<td>Interview Audio Recording</td>
<td>Interview Transcript</td>
</tr>
<tr>
<td>Julie</td>
<td>Novice Academic Teacher</td>
<td>Interview Audio Recording</td>
<td>Interview Transcript</td>
</tr>
</tbody>
</table>

After organizing all of the original and back-up files, each piece of data were read and reviewed multiple times, case by case, and general notes were taken with questions to follow up on during the analysis. According to Efron and Ravid (2019), this is a good
way to become familiar with the data before breaking it down into individual parts for coding and statistical analysis.

In order to progress from general, holistic data to finding trends and patterns in the qualitative data, each qualitative data set was first reviewed to identify themes that emerged from the interviews and field observations (Efron & Ravid, 2019). Next, as the transcribed interviews were read, they were color-coded by subject to aid in finding themes and recurring ideas or concepts by looking for the issues that were important, critical, recurring, and key (Efron & Ravid, 2019). Themes from the interviews were organized into a table, and the process was repeated for the field notes. After color-coding the field notes, themes were pulled from them and added to the table. After dividing the information from the interviews and field notes for each novice teacher by concept, quotes were pulled from both to support the evidence and add rich descriptions to the data (Efron & Ravid, 2019).

To begin the analysis on the survey data, rubric scores, and self-assessment data, information from each was separately entered into a spreadsheet and verified for accuracy. Next, a frequency distribution was calculated, and then the data from each data collection method was graphed to create a visual representation in a bar graph and show comparisons between the pre- and post-assessment and survey data in a cross-tab table (Efron & Ravid, 2019). Since the qualitative and quantitative results were given equal weights, the results were analyzed using a triangulation design meaning all statistical tests were completed, the information was combined with the qualitative data before interpretation was completed (Efron & Ravid, 2019).
Rigor and Trustworthiness

In an effort to ensure the research process was rigorous and the research findings could be reliable, I used a variety of data collection methods (Costello, 2003). All communication was open, honest, and transparent. I communicated with teachers, students, parents, and administrators openly about the research design, purpose, and methods. Confidentiality was maintained throughout the study through the use of an encrypted filing system, private meetings, a confidentiality agreement, and frequent check-ins.

The survey, rubric, interview questions, and self-assessments were all tied to the same 10 standards from the Georgia Department of Education’s Teacher Keys Effectiveness System (TKES) Teacher Assessment on Performance Standards (TAPS). Since these are the 10 standards all Georgia Teachers are expected to demonstrate consistently, it was a fair and valid way to provide feedback to the developing teachers and create an easy-to-use triangulation system. It is important to check each of the data points against another reference point or perspective to find commonalities or inconsistencies (Efron & Ravid, 2019). Since each of the data collection tools utilized the 10 standards as the basis, it was straightforward and clear to align the student, novice teacher, and master teacher-coach answers from the pre-intervention, during the intervention and post-intervention data collection methods. This triangulation proved to be an excellent way to further explain inconsistencies and curious findings.

At the conclusion of the study, the data from the qualitative and quantitative data collection methods were combined case by case for each novice teacher separately. The data were then checked by the novice teacher and master teacher-coach to ensure the
conclusions drawn from the evidence were factual and reliable and that no implications or results were misrepresented or misconstrued. This member checking was an important part of confirming the findings of each case was based in reality, and the participants involved concurred with the results (Efron & Ravid, 2019). This process further added to transparency, validity and reliability in this study.

All surveys, observation field notes, rubrics, peer observations, and recorded interviews were kept in a secure, encrypted file. The coaches had access to the aggregate survey results and self-assessment data throughout the duration of the study. Keeping the records of all of the data collection methods throughout the study is an important part of making sure I can go back to the original source to cross-check the findings and discussion.

Validity and reliability are essential parts of any research design to protect the participants and improve the dependability of the findings (Efron & Ravid, 2019). This study used triangulation of data sources from surveys, observations, and interviews to find common themes and discrepancies (Efron & Ravid, 2019). Detailed records will be kept, and interviews will be recorded to improve coding.

**Ethical Considerations**

Ethical considerations for the study include ensuring only teachers who were interested in participating were involved, and they did so voluntarily (Efron & Ravid, 2019). Because of the researcher’s role in the school system, care was taken to ensure there was no pressure placed on teachers to participate. Participation agreements were used to ensure all stakeholders were well-informed of the research aims and methods (Efron & Ravid, 2019). Confidentiality was maintained for all participants. The
researcher’s position as an insider-outsider and someone in an administrative role inside of the school system where the study was conducted was openly discussed. The researcher did not work with teachers who were direct reports for evaluations to ensure there was no pressure to participate or influence on the findings. It was important for the participants to understand their participation would have no impact on their annual teacher evaluations (Efron & Ravid, 2019).

Conclusion

In order for professional development to be effective for teachers, it needs to be relevant, job-embedded, and related to the content area of the teacher (Darling-Hammond et al., 2017). Professional development also should be hands-on and allow teachers to be active participants (Darling-Hammond et al., 2017). This type of professional development was not a part of the regular PD plan at FCHS. The purpose of this study was to investigate an intervention of coaching of novice teachers as a method of supporting teacher growth and development.

In this chapter, I discussed the methodology used to address the research questions. During the coaching process, four novice teachers were paired with experienced master teacher-coaches. They participated in peer observations and then met to discuss the novice teachers’ goals and growth opportunities to improve instruction specific to their content area and FHCS student population. The observation and coaching cycles repeated four times over the six-week study. Data were collected from students, novice teachers, and coaches at the beginning and end of the study to measure the change in instructional design and classroom environment. In Chapter Four, findings from the
data collection process will be described by case before the discussion of the implications of this research project is shared in Chapter Five.
CHAPTER 4

FINDINGS

Introduction

Educators bring to their classrooms a wide variety of backgrounds, educational experiences, career experiences, and natural aptitudes. Teaching is a complex and difficult profession that is usually practiced alone. Teachers new to the field or to a school often need support to develop skills in pedagogy, classroom management, or student engagement (St. Clair, 2019). The case is no different at Friendship County High School (FCHS). There is a gap in job-embedded professional support for novice teachers at FCHS. The problem of practice for this study concerns the difference in student engagement and instructional design from classroom to classroom at FCHS. Student achievement has the potential to improve dramatically under the tutelage of a highly effective teacher (Korpershoek et al., 2016; Norton, 2015). Therefore, it is in the best interests of students for school leaders to support teachers in the most effective, sustainable, and realistic way possible. The intervention in this study involved content-specific and job-embedded professional development for novice teachers in the form of peer observations of and instructional coaching by experienced master teachers who work alongside them.

This study was built to embody the backgrounds and experiences of the participants, their own goals, needs, and interests, as well as their need for an environment conducive for growth and their desire to learn from watching others.
The purpose of this convergent mixed methods case study was to investigate the
effectiveness of peer observations, reflection, and coaching on the practice of novice
teachers at FCHS. The study included four novice teachers from FCHS paired with four
master teachers from respective departments. The four cases at FCHS were investigated
in-depth by collecting quantitative and qualitative data simultaneously to answer the
following three research questions:

RQ1: What do highly effective high school academic teachers do that make them
so successful in their professional practice?

RQ2: What impact will an intervention of coaching by highly effective teachers
have on the practice of novice teachers?

RQ3: What impact will an intervention of highly effective teachers coaching
novice teachers have on the students in novice teachers’ classrooms?

Data Collection

Educational leaders have an important responsibility in appropriately and
effectively supporting teachers. Professional development is most effective when it is
content-specific, job-embedded, sustained, and hands-on (Darling-Hammond et al.,
2017). The intervention in this study was intended to meet the criteria for effective
professional development of novice teachers. In this research study, the novice teachers
took a pre-intervention self-assessment, and their students took a pre-intervention
survey; both data collection tools were aligned to the same 10 standards of teacher
performance present on the observation tool that would be used by their master
teacher-coaches during the peer observations. Next, the master teacher-coaches met
with the novice teachers individually to discuss the novice teachers’ goals and discover
how they could support the novice teachers’ work. With the baseline data from the pre-
intervention survey and self-assessment and having met to discuss personal professional
goals, the master teacher-coaches set up peer observations where they documented both
quantitative and qualitative data about classroom engagement, learning environment,
instructional design and delivery and assessment methods on the GaDOE Teacher Keys
Effectiveness System Teacher Assessment on Performance Standards (TKES TAPS)
Rubric. The novice teacher then observed in the master teacher’s classroom. After each
peer observation, the teachers met with their coaches and discussed the reflections and
goals for growth and development. This process of observing and coaching was repeated
four times over a six-week period. In the last week of the study, the students took the
post-intervention survey and the novice teacher retook the self-assessment. Students in
the master teacher-coaches’ classrooms were offered the opportunity to answer the open-
ended question. To finalize the data collection, the master teacher-coach and novice
teacher were both interviewed individually.

Participants

Participants included eight teachers from three academic departments at
Friendship County High School. Four of the participants were considered novice teachers
because they had three years or less of teaching experience and were the most
inexperienced teachers in their departments. The four master teachers had between 10
and 28 years of teaching experience and also had experience mentoring and coaching
other teachers. Coach participants were selected from teachers who were interested in
joining the research study and had ten years or more of successful teaching experience.
The details of each participant are included in Table 4.1 below.
Table 4.1 Roles of the Participants

<table>
<thead>
<tr>
<th>Pseudonym</th>
<th>Role</th>
<th>Years of Experience</th>
<th>Partner</th>
</tr>
</thead>
<tbody>
<tr>
<td>Rebecca</td>
<td>Novice English Teacher</td>
<td>3</td>
<td>Savannah</td>
</tr>
<tr>
<td>Caleb</td>
<td>Novice Science Teacher</td>
<td>3</td>
<td>Matt</td>
</tr>
<tr>
<td>Jessie</td>
<td>Novice Science Teacher</td>
<td>1</td>
<td>Jammie</td>
</tr>
<tr>
<td>Julie</td>
<td>Novice Math Teacher</td>
<td>2</td>
<td>David</td>
</tr>
<tr>
<td>Savannah</td>
<td>Master English Teacher</td>
<td>28</td>
<td>Rebecca</td>
</tr>
<tr>
<td>Matt</td>
<td>Master Science Teacher</td>
<td>18</td>
<td>Caleb</td>
</tr>
<tr>
<td>Jammie</td>
<td>Master Science Teacher</td>
<td>19</td>
<td>Jessie</td>
</tr>
<tr>
<td>David</td>
<td>Master Math Teacher</td>
<td>10</td>
<td>Julie</td>
</tr>
</tbody>
</table>

Findings

Each case was examined separately since each set of teachers worked independently of the others. The quantitative and qualitative data from each case were described in detail, and all of the data sets were evaluated to triangulate and find themes. The data from each case was reviewed and coded separately. After that process was complete, all of the information was reviewed together to examine the results of the study as a whole. The findings will be shared in the following section by case. The quantitative and qualitative data will be described by data collection method and then summarized.

Rebecca’s Case

Quantitative Data Analysis. Rebecca’s self-assessment, Savannah’s observation TKES TAPS rubric, and the student surveys were the tools used to gather the quantitative data for Rebecca’s case. Each of the methods of data collection resulted in numerical
data that was then analyzed and summarized. The data from each of the quantitative data collection tools is described in the following section.

**Novice Teacher Self-Assessment.** Rebecca took the self-assessment consisting of 10 statements directly tied to the Teacher Performance Standards expected of all Georgia Teachers through the Teacher Keys Evaluation System for the Georgia Department of Education. The self-assessment was taken in an electronic format where Rebecca rated herself on a Likert scale from n=1 meaning “I would like to focus on this area” to n=3 meaning “I feel confident in this area.”

Table 4.2 Rebecca’s Self-Assessment

<table>
<thead>
<tr>
<th>Standard</th>
<th>Pre-Intervention</th>
<th>Post-Intervention</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 Professional Knowledge</td>
<td>2</td>
<td>2</td>
</tr>
<tr>
<td>2 Instructional Planning</td>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>3 Instructional Strategies</td>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>4 Differentiated Instruction</td>
<td>2</td>
<td>2</td>
</tr>
<tr>
<td>5 Assessment Strategies</td>
<td>3</td>
<td>3</td>
</tr>
<tr>
<td>6 Assessment Uses</td>
<td>1</td>
<td>1</td>
</tr>
<tr>
<td>7 Positive Learning Environment</td>
<td>3</td>
<td>3</td>
</tr>
<tr>
<td>8 Academically Challenging Environment</td>
<td>3</td>
<td>3</td>
</tr>
<tr>
<td>9 Professionalism</td>
<td>3</td>
<td>3</td>
</tr>
<tr>
<td>10 Communication</td>
<td>2</td>
<td>3</td>
</tr>
</tbody>
</table>

When Rebecca took the pre-intervention self-assessment, she scored her skills on the Likert scale from n=1 to n=3 as shown in Table 4.2. She scored her skills as the highest, n=3 “I feel confident in this area,” in “Assessment Strategies,” “Positive Learning Environment,” “Academically Challenging Environment,” “Professionalism.” Rebecca noted her areas of need in “Instructional Planning,” “Instructional Strategies,” and “Assessment Uses.” She scored her skills as n=2 “I do not feel confident in this area” in “Professional Knowledge,” “Differentiated Instruction,” and “Communication.”
rated her greatest areas of need as n=1 “I would like to work on this area” in “Instructional Planning,” “Instructional Strategies” and “Assessment Uses.”

During the initial meeting between Rebecca and Savannah, Savannah anticipated that Rebecca would talk about the three areas of need that she noted on her self-assessment: “Instructional Planning,” “Instructional Strategies” and “Assessment Uses.” However, during the initial meeting, Rebecca talked about the need for learning more about classroom management or “Positive Learning Environment” and rigor or “Academically Challenging Environment,” both of which she had rated as a score of n=3 “I feel confident in this area,” indicating she did not believe she needed coaching in that area. This was an incongruity between the self-assessment and perceived areas of need for Rebecca. Although the pair did work on instructional strategies, classroom management, and use of assessments during the study, they specifically focused on rigor and wait time for the coaching sessions.

![Figure 4.1 Rebecca’s Self-Assessment Comparison](image-url)

Figure 4.1 Rebecca’s Self-Assessment Comparison
Rebecca took the post-intervention self-assessment at the conclusion of the study. She scored her skills on the Likert scale from n=1 to n= 3 as shown in Table 4.2. She scored her skills as the highest, n=3 “I feel confident in this area,” in “Assessment Strategies,” “Positive Learning Environment,” “Academically Challenging Environment,” “Professionalism,” “Communication.” She rated her skills at n=2 “I do not feel confident in this area” in “Professional Knowledge,” “Instructional Planning,” “Instructional Strategies,” and “Differentiated Instruction.” Rebecca scored her skills at n=1 “I would like to work on this area” in “Assessment Uses.”

The changes for her self-assessments were in “Instructional Planning,” and “Instructional Strategies” “Communication” as shown in Figure 4.1 above.

Table 4.3 Rebecca’s Self-Assessment Descriptive Statistics

<table>
<thead>
<tr>
<th>Pre-Intervention Self-Assessment</th>
<th>Post-Intervention Self-Assessment</th>
</tr>
</thead>
<tbody>
<tr>
<td>Mean</td>
<td>Median</td>
</tr>
<tr>
<td>2.1</td>
<td>2</td>
</tr>
</tbody>
</table>

In comparing the pre-intervention self-assessment to the post-intervention self-assessment, Rebecca scored herself the same in “Professional Knowledge,” “Differentiated Instruction,” “Assessment Strategies,” “Assessment Uses,” “Positive Learning Environment,” and “Academically Challenging Environment.” She did rate herself as growing one point in “Instructional Planning,” “Instructional Strategies” and “Communication.” Overall, her mean self-assessment increased from m=2.1 to m=2.4 on the self-assessment, as seen in Table 4.3, from the beginning of the study to the end indicating that she felt her skills had improved during the study.
Student Survey Results. The student survey pre-intervention survey was given electronically in the first week of the spring semester to 45 students. Since FCHS is on a 4 x 4 block schedule, students change classes mid-year. When students took the pre-intervention survey, they had been in the class for four days. The student survey used a Likert Scale format in which students could rate the statements from n=1 meaning “Never” to a score of n=5 meaning “Always.” Students were asked to answer honestly and anonymously in reference to their experiences in the class. The mean scores for the items on the were between the lowest ranked item, “I feel academically challenged in this class,” at m=3.27 to the highest ranked item, “I know the rules and procedures in the class,” at m=4.47 as shown in Table 4.4.

Table 4.4 Rebecca’s Student Pre- and Post-Survey Results

<table>
<thead>
<tr>
<th>Standard</th>
<th>Pre</th>
<th>Post</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Mean</td>
<td>Median</td>
</tr>
<tr>
<td>I feel welcome in this class.</td>
<td>4.18</td>
<td>4.00</td>
</tr>
<tr>
<td>I am engaged in the learning activities in this class.</td>
<td>4.02</td>
<td>4.00</td>
</tr>
<tr>
<td>I feel academically challenged in this class.</td>
<td>3.27</td>
<td>3.00</td>
</tr>
<tr>
<td>I feel supported in this class.</td>
<td>3.98</td>
<td>4.00</td>
</tr>
<tr>
<td>I understand why I am doing the tasks I am doing.</td>
<td>4.07</td>
<td>4.00</td>
</tr>
<tr>
<td>I feel like my teacher respects and values me.</td>
<td>4.40</td>
<td>5.00</td>
</tr>
<tr>
<td>I receive feedback in this class.</td>
<td>4.09</td>
<td>4.00</td>
</tr>
<tr>
<td>The classroom environment is conducive for learning.</td>
<td>4.13</td>
<td>4.00</td>
</tr>
<tr>
<td>I know the rules and procedures in this class.</td>
<td>4.47</td>
<td>5.00</td>
</tr>
<tr>
<td>I feel comfortable asking for help in this class.</td>
<td>4.13</td>
<td>4.00</td>
</tr>
</tbody>
</table>
In comparing the pre-intervention student survey to the post-intervention student survey, there were not many areas of growth from the beginning of the study to end of the study from the student perspective. However, two items of note were that students had been in the class for four days when they took the beginning survey, before classroom culture and instructional practices were established, so they may not have had adequate familiarity with classroom operations and expectations. The second item of note was the only area of significant improvement from the student perspective was “I feel academically challenged in this class.” This standard was the lowest ranked on the pre-survey and students rated this area as improved throughout the study (n=+0.18) as shown in Table 4.5. This is one of the areas that Savannah and Rebecca worked on consistently and specifically throughout the six weeks.
### Table 4.5 Rebecca’s Students’ Pre- and Post-Survey

<table>
<thead>
<tr>
<th>Statement</th>
<th>Standard</th>
<th>Before</th>
<th>After</th>
</tr>
</thead>
<tbody>
<tr>
<td>I feel welcome in this class.</td>
<td>7</td>
<td>4.18</td>
<td>4.10</td>
</tr>
<tr>
<td>I am engaged in the learning activities in this class.</td>
<td>7</td>
<td>4.02</td>
<td>3.95</td>
</tr>
<tr>
<td>I feel academically challenged in this class.</td>
<td>8</td>
<td>3.27</td>
<td>3.45</td>
</tr>
<tr>
<td>I feel supported in this class.</td>
<td>4</td>
<td>3.98</td>
<td>3.95</td>
</tr>
<tr>
<td>I understand why I am doing the tasks I am doing.</td>
<td>2</td>
<td>4.07</td>
<td>3.72</td>
</tr>
<tr>
<td>I feel like my teacher respects and values me.</td>
<td>7</td>
<td>4.40</td>
<td>4.00</td>
</tr>
<tr>
<td>I receive feedback in this class.</td>
<td>5</td>
<td>4.09</td>
<td>3.85</td>
</tr>
<tr>
<td>The classroom environment is conducive for learning.</td>
<td>7</td>
<td>4.13</td>
<td>4.00</td>
</tr>
<tr>
<td>I know the rules and procedures in this class.</td>
<td>9</td>
<td>4.47</td>
<td>4.35</td>
</tr>
<tr>
<td>I feel comfortable asking for help in this class.</td>
<td>4</td>
<td>4.13</td>
<td>3.90</td>
</tr>
<tr>
<td>My teacher communicates with me and my parents through SchoolStatus.</td>
<td>10</td>
<td>3.93</td>
<td>4.00</td>
</tr>
<tr>
<td>I have a choice in how I show what I know on some projects or assessments in this class.</td>
<td>2</td>
<td>3.82</td>
<td>3.82</td>
</tr>
<tr>
<td>I have the opportunity to learn from my mistakes in this class.</td>
<td>6</td>
<td>4.09</td>
<td>3.93</td>
</tr>
<tr>
<td>When I miss a question or lose points on an assignment, I have an opportunity to learn why and how to fix it.</td>
<td>6</td>
<td>3.82</td>
<td>3.70</td>
</tr>
<tr>
<td>I have many opportunities to work with others in this class.</td>
<td>3</td>
<td>4.08</td>
<td>3.23</td>
</tr>
</tbody>
</table>

The initial student survey confirms the difference between the coaching conversation and subsequent work in rigor from the novice and master teacher-coach perspectives. According to the student survey, the standard “Academically Challenging Environment” is one of the areas students see a need for improvement as it is the area that was scored the lowest on the pre-intervention survey, and it is the only area of significant growth throughout the duration of this study as rated by the student survey.
**Peer-Observation TKES TAPS Rubric.** The peer observations for Rebecca were conducted by Savannah on the TKES TAPS rubric. On the initial peer observation, the areas noted by Savannah as areas in need of growth and improvement were “Instructional Planning,” “Instructional Strategies,” “Differentiated Instruction,” “Assessment Uses,” and “Academically Challenging Environment” as shown in Table 4.6. Savannah rated each of those growth areas as an n=2 “Developing,” meaning the standard was not observed consistently.

Savannah repeated the observation again during the next week and saw improvement in the way Rebecca was utilizing assessments during the lesson. In the second observation, the only change was an improvement in “Assessment Uses” from a n=3 to n=3 on the TKES TAPS rubric. This is detailed in Table 4.6 under Obs 2.

During the third observation, Savannah noted improvement in several areas from the previous observation: “Instructional Planning,” “Instructional Strategies,” “Differentiated Instruction,” and “Academically Challenging Environment” all improved from n=2 to n=3 as shown in Table 4.6 under Obs 3. There was an area of decline from observation two to observation three in “Assessment Uses.” There were no additional changes from the third observation to the fourth observation. The scores for all areas on the fourth observation were rated as n=3, the expected level of performance for Georgia teachers, with the exception of “Assessment Uses” which was scored n=2.
Table 4.6 Savannah’s Rating of Rebecca on the TKES TAPS Rubric

<table>
<thead>
<tr>
<th>Standard</th>
<th>Obs 1</th>
<th>Obs 2</th>
<th>Obs 3</th>
<th>Obs 4</th>
<th>Δ</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 Professional Knowledge</td>
<td>3</td>
<td>3</td>
<td>3</td>
<td>3</td>
<td>-</td>
</tr>
<tr>
<td>2 Instructional Planning</td>
<td>2</td>
<td>2</td>
<td>3</td>
<td>3</td>
<td>+1</td>
</tr>
<tr>
<td>3 Instructional Strategies</td>
<td>2</td>
<td>2</td>
<td>3</td>
<td>3</td>
<td>+1</td>
</tr>
<tr>
<td>4 Differentiated Instruction</td>
<td>2</td>
<td>2</td>
<td>3</td>
<td>3</td>
<td>+1</td>
</tr>
<tr>
<td>5 Assessment Strategies</td>
<td>3</td>
<td>3</td>
<td>3</td>
<td>3</td>
<td>-</td>
</tr>
<tr>
<td>6 Assessment Uses</td>
<td>2</td>
<td>3</td>
<td>2</td>
<td>2</td>
<td>-</td>
</tr>
<tr>
<td>7 Positive Learning Environment</td>
<td>3</td>
<td>3</td>
<td>3</td>
<td>3</td>
<td>-</td>
</tr>
<tr>
<td>8 Academically Challenging</td>
<td>2</td>
<td>2</td>
<td>3</td>
<td>3</td>
<td>+1</td>
</tr>
<tr>
<td>Environmental</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>9 Professionalism</td>
<td>3</td>
<td>3</td>
<td>3</td>
<td>3</td>
<td>-</td>
</tr>
<tr>
<td>10 Communication</td>
<td>3</td>
<td>3</td>
<td>3</td>
<td>3</td>
<td>-</td>
</tr>
<tr>
<td><strong>AVERAGE</strong></td>
<td><strong>2.5</strong></td>
<td><strong>2.6</strong></td>
<td><strong>2.9</strong></td>
<td><strong>2.9</strong></td>
<td></td>
</tr>
</tbody>
</table>

According to the rubric scored during the peer observations, Rebecca showed growth in “Instructional Planning,” “Instructional Strategies,” “Differentiated Instruction,” and “Academically Challenging Environment” as shown in Table 4.6. In all four areas, her score on the observation improved from a rating of n=2 “Developing” to n=3 “Proficient” which is the expected level of performance for Georgia Teachers. The mean scores for all four observations were between m=2.25 and m=3 for all 10 standards. The mean score on the total observation rubric increased from m=2.5 to m=2.6 to m=2.9 for an improvement of Δ =+0.4 during the six-week study as shown in Figure 4.2 below.
Rebecca’s pre-intervention self-assessment was compared to the initial TKES observation to find commonalities and differences. Rebecca’s and Savannah’s perceptions of the following areas as weaknesses were aligned: “Instructional Planning,” “Instructional Strategies,” “Differentiated Instruction,” and “Assessment Uses.” Rebecca rated herself as weak in “Professional Knowledge” and “Communication” and Savannah did not concur. Savannah rated Rebecca as developing in “Academically Challenging Environment” while Rebecca found this area as a strength on both her pre-intervention and post-intervention self-assessments.

Qualitative Data Analysis. Rebecca’s post-intervention interview, Savannah’s field notes and post-intervention interview, and the student open-ended question were the tools used to gather the qualitative data for Rebecca’s case. Each of the methods of data collection resulted in rich, descriptive data that was then analyzed, coded and
summarized. The data from each of the qualitative data collection tools is described in the following section.

**Master Teacher-Coach Field Notes.** Savannah observed Rebecca four times during the research study and during the observations, she collected detailed field notes. During the first observation, Savannah noted in the field notes that Rebecca did not ask students for textual evidence to support their claims and did not seem to be aware of which students were engaged and which were not. Savannah also noted that Rebecca was not utilizing wait time and was giving students the answer if they did not answer quickly. During the coaching conversation notes, Savannah recommended Rebecca get students in the practice of citing textual evidence for the assignments as it assists with critical thinking and prepares them for building an argument. Savannah also encouraged Rebecca to employ wait time and not provide students with the answers to her questions. According to the field notes, Savannah shared with Rebecca:

> Perhaps have the students point out evidence or explain why the answers are what they are rather than you doing so. This is so they do not rely so much on us providing the answers - employ wait time. In order to ensure that the planning is standards-based, it may be good to include the standards somewhere-either on the board or assignment. This helps also to see if we are providing rigor and close-reading. Many of the EOC questions require close-reading.

Savannah shared with Rebecca some classroom management strategies that have proven effective in her own classroom to keep students engaged and actively participating in class. For example, Savannah shared the technique of calling specific names of students during the lesson when she wanted to make sure they were ready to answer a question. In
addition, she recommended students get the habit of closing Chromebooks during direct or explicit instruction so they were not multi-tasking during parts of the lesson they should be engaged with her. She also recommended to Rebecca that she should set the rules and procedures clearly at the beginning of the semester and enforce them consistently.

During the second observation, Savannah noticed that Rebecca was not using rigorous questions during the lesson and was not employing wait time after asking questions. She explained that students in Rebecca’s classroom would not actively answer the discussion questions and instead of employing wait time and pushing students to think and try to answer the discussion question, she would answer the question for the students and move on to the next topic. She also noticed that Rebecca was not reinforcing vocabulary when students were participating in discussions. Savannah did notice that Rebecca had started implementing classroom management strategies to prevent students from being distracted on Chromebooks during instruction. “Great job of having students put their screens down to focus on the film!” During the coaching session, Savannah encouraged Rebecca to enforce wait time. She explained that it can be uncomfortable to wait quietly while students think but it is necessary to not get students used to the teacher providing the answer. According to the field notes, Savannah shared with Rebecca: “Try not to give the answers away. Allow the students to ponder and think themselves and make the observations themselves.” Savannah described it as “letting the students off the hook.” Savannah also encouraged Rebecca to ask and expect students to use the vocabulary they are learning during the unit in context while discussing the topics.

Savannah and Rebecca discussed Webb’s Depth of Knowledge in detail and how to build
a lesson and a unit to start at DOK of 1 and build to a DOK of 4. Savannah also encouraged Rebecca to plan the questions ahead of time to build from DOK 1 to DOK 3 and to embed some extended critical thinking activities to her units that would allow students to reference multiple sources to build to a DOK of 4. According to the field notes, Savannah shared with Rebecca:

When discussing with [Rebecca] about last week’s characterization activity, she stated that she adjusted the formative assessment to include writing where the students had to provide text evidence to support their identification of the types of character and explain how the text evidence supported their identification. So, she adjusted her assessment as a result of our conversations.

Savannah acknowledged and applauded Rebecca for requiring textual evidence in the classroom assignment as the result of their previous coaching conversation.

During the third classroom observation, Rebecca was beginning a project with her class. Savannah noted some ideas to improve the effectiveness of project-based learning engagement for Rebecca’s class. Savannah encouraged Rebecca to provide exemplars for the project for the students to be able to easily see different ways to demonstrate their understanding on the concepts covered through the assignment. Savannah also suggested Rebecca provide a detailed rubric for the assignment before students start the working on the project so they know the expectations and how to show proficiency in the assignment. Savannah also recommended Rebecca use data to inform the grouping for the project by intentionally partnering students together instead of allowing them to choose their partners. According to the field notes, Savannah shared with Rebecca:
One way to use data in instruction with this assignment: look at previous writing assignment and the scores of the students. Partner up students who struggle with basic writing with students who have done well in writing, etc. It might be good to have partners look over each other’s summaries and provide peer editing feedback.

Savannah noted several areas of positive changes in Rebecca’s classroom and noted them in the field notes: “Great job having the Essential Questions and standards on the board! This keeps the lesson focused and standards-based!” And, she added “great job walking around the room and asking individual students questions to guide them in this process!”

In the fourth and final observation, Savannah noted that Rebecca had students working on two assignments simultaneously which seemed to cause confusion for some of the students. According to the field notes, Savannah shared with Rebecca: “Are the students confused with what goes inside the annotated bibliography and what goes inside the paper? Just wondering if working on both simultaneously is confusing and it would be better to work on one product at a time?” While Rebecca was consistently utilizing wait time and had rigorous questions embedded in her lesson during the observation, students seemed confused about how to approach both assignments at the same time. The coaching conversation focused on the improvements Rebecca made in employing wait time and including higher DOK questioning strategies in the class. Savannah also encouraged Rebecca to think through the assignments to streamline what she is asking students to work on to provide clarity on expectations for students.

Novice Teacher Interview. At the conclusion of the study, I interviewed Rebecca about her experience during the research study. During this interview, I asked Rebecca
the 13 questions included in Appendix E. She answered each of the questions and some of her answered required follow-up questions for clarification. Rebecca shared that she had a positive experience with this research study and found the coaching process helpful because she received both positive affirmation and specific constructive criticism. Rebecca contrasted this experience with regular administrator-performed classroom observations because in this project she immediately received specific details about elements she could improve and practices that she should keep and it was not intimidating.

Rebecca said she thought it was essential for her master teacher-coach to be in the same content area because the feedback was relevant to her context and content. Rebecca shared that she initially struggled with vulnerability but found that observations and coaching from a peer created much less pressure and were more helpful than observations from administration. “I was scared to be vulnerable at the beginning and I did not want to show her my true weaknesses. I started with things I was less concerned about because I was not ready to be open and honest.” However, the peer-observations uncovered the real issues and allowed for authentic conversations without pretense. Rebecca left the observations and coaching sessions with specific strategies to embed to improve teaching and learning. Rebecca did state that the peer observations left her with the impression that she had much to learn and many ways to grow to do in her own classroom.

According to Rebecca, “the hallmark of this study was the ability to watch a master teacher at work. That experience forever changed my career and I will be forever grateful for that opportunity. I cannot explain the impact watching Savannah teach had on my practice as a teacher.” Observing in her coach’s class was incredibly impactful for
expanding Rebecca knowledge and pedagogy. Rebecca shared that it was much more impactful to her to observe in her master teacher-coach’s classroom than it was for her master teacher-coach to observe her. Rebecca also found that her initial goal was not actually what she ended up working on with her coach. Initially, she thought she wanted to work on classroom management but she ended up focusing a lot more on questioning strategies, wait time, and rigor in the coaching sessions. “This was a great experience for me because the observations and coaching were helpful instead of corrective. I think it would, however, be more beneficial if it were to continue for the rest of the school year.” Rebecca shared her thought that this program would be an effective way to support new teachers coming into the profession.

Master Teacher-Coach Interview. Savannah was interviewed at the conclusion of the research study. I asked her the 13 of the questions included in Appendix H as well as follow-up questions for clarity. Savannah shared in the interview that her main concern was not having enough time to support Rebecca in meeting her goals effectively during the short time allotted for the study; she wanted more time to work with Rebecca. Savannah also shared her perception of a disconnect between how Rebecca rated herself on the self-assessment and what Savannah actually saw in the classroom. As a result, the coaching conversations after Rebecca observed Savannah was one of the most impactful parts of the project. Savannah shared the importance of conversation after the observations and her method of sharing positive feedback as well as targeted and specific constructive criticism in the coaching sessions. Savannah found joy and meaning in the collaboration that she shared with Rebecca during this study, and that she took away personal self-reflection about her own practices as a teacher as a result of the study.
Savannah shared that the peer observations were influential because Rebecca “caught more than she was taught” and gleaned more from coming into her room than from the coaching conversations. Savannah used modeling as a powerful teaching method with students and extrapolated what that looked like for adult learners. She observed changes in Rebecca’s classroom management and instructional design throughout this program. Savannah shared, “this project was so impactful. I thought, initially, I was just there to support Rebecca. However, I ended up learning along with her. The peer observations were so interesting and enlightening. I wish we could do this all the time!” Although she did see growth, Savannah noted that Rebecca was still working on consistency to reach her goals. Savannah also mentioned how powerful this study would be as an induction program for new teachers as long as the master teacher-coach shared the same content area and could build an open and transparent relationship with the new teacher. “Relationship and trust are essential. This study would be a powerful induction program for new teachers. I think it is important that the coach and teacher share the same content area. The shared content provided a starting place and enabled the conversations to be relevant and specific.”

**Student Open-Ended Responses.** On the post-intervention survey, students were provided a space to write open ended comments about their experience in the teacher’s classroom. The open-ended question on the post-intervention survey was meant to provide students an opportunity to share their voice in the research study. One student shared:

I have had a great experience so far this semester. She is such a great teacher! She is compassionate with students and you can tell she really cares about us. She
wants us to be successful. Each day in the class seems to be getting better and better.

Another student shared “I have had a great experience. The class is more engaging and interesting than I thought it would be. [Rebecca] seems more comfortable with us and she is so welcoming. The classroom feels like home.” One last student shared: “I wish she taught the next level class next year so I could take it again.” In general students shared that Rebecca built a positive classroom environment through her warm and caring demeanor, handling problems privately and respectfully with students, and challenging her students appropriately.

**Summary of Rebecca’s Case.** Rebecca and Savannah built a positive, collegial, and collaborative relationship throughout the study. Although Rebecca explained that she initially was avoiding facing what she perceived as her weaknesses, the work turned out to be authentic and meaningful to help build her capacity in the classroom. While the duration of the study was too short for her to see any major changes, Rebecca noticed growth in her confidence in creating academically challenging lessons, asking critical thinking questions, and applying wait time to hold students accountable for showing what they know. The student surveys, classroom observations, and interviews support this conclusion. Rebecca and Savannah want to continue working together to build upon this small success to address Rebecca’s other desired areas of growth and development. Rebecca appreciated this process because it allowed for immediate and helpful feedback that was intended to support her as a teacher. Because the work was relevant, job-embedded, and content specific, it allowed for authentic collaboration and
allowed Rebecca to be vulnerable with Savannah because the goal was only to support Rebecca and was not threatening or intimidating.

**Caleb’s Case**

**Quantitative Data Analysis.** Caleb’s self-assessment, Matt’s observation TKES TAPS rubric, and the student surveys were the tools used to gather the quantitative data for Caleb’s case. Each of the methods of data collection resulted in numerical data that was then analyzed and summarized. The data from each of the quantitative data collection tools is described in the following section.

**Novice Teacher Self-Assessment.** Caleb took the self-assessment consisting of 10 statements directly tied to the Teacher Performance Standards expected of all Georgia Teachers through the Teacher Keys Evaluation System for the Georgia Department of Education. These standards describe the level of expected performance in the classroom for all Georgia Teachers. Caleb took the self-assessment in an electronic format with a Likert scale from n=1 meaning “I would like to focus on this area” to n=3 meaning “I feel confident in this area.”

Table 4.7 Caleb’s Self-Assessment

<table>
<thead>
<tr>
<th>Standard</th>
<th>Pre-Intervention</th>
<th>Post-Intervention</th>
</tr>
</thead>
<tbody>
<tr>
<td>Professional Knowledge</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>Instructional Planning</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>Instructional Strategies</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>Differentiated Instruction</td>
<td>3</td>
<td>3</td>
</tr>
<tr>
<td>Assessment Strategies</td>
<td>3</td>
<td>2</td>
</tr>
<tr>
<td>Assessment Uses</td>
<td>3</td>
<td>3</td>
</tr>
<tr>
<td>Positive Learning Environment</td>
<td>3</td>
<td>3</td>
</tr>
<tr>
<td>Academically Challenging Environment</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>Professionalism</td>
<td>3</td>
<td>3</td>
</tr>
<tr>
<td>Communication</td>
<td>2</td>
<td>3</td>
</tr>
</tbody>
</table>
When Caleb took the pre-intervention self-assessment, he scored his skills on the Likert scale from 1 to 3 as shown in Table 4.7. He scored his skills as the highest, n=3 “I feel confident in this area,” in “Differentiated Instruction,” “Assessment Strategies,” “Assessment Uses,” “Positive Learning Environment,” and “Professionalism.” Caleb noted his perceived areas of need in “Professional Knowledge,” “Instructional Planning,” “Academically Challenging Environment,” and “Communication” by marking those areas as n=2 “I do not feel confident in this area.”

During the initial meeting between Caleb and Matt, Matt anticipated that Caleb would talk about the four areas of need that he noted on his self-assessment: “Professional Knowledge,” “Instructional Planning,” “Academically Challenging Environment,” and “Communication.” However, when they began to discuss what Caleb hoped to change about his instructional practice, the result was his desire to improve classroom management or “Positive Learning Environment” by working on the transitions between activities. He also shared with Matt that he wanted feedback and help to make sure the activities he created were academically appropriate. Caleb wanted to improve his practice by providing a consistently “Academically Challenging Environment.” He described his difficulty with students finishing at different times and subsequently having down or inactive time while waiting for others to finish which then leads to off-task behaviors. Matt and Caleb discussed Caleb’s desire to increase the depth of activities and instructional design throughout the six-week study but the area he needed the most help was in planning for transitions, working through the challenges related to off-task behavior, and keeping students seamlessly engaged in rigorous activities.
Figure 4.3 Caleb’s Self-Assessment Comparison

Caleb took the post-intervention self-assessment at the conclusion of the study. He scored his skills on the Likert scale from n=1 to n=3 as shown in Table 4.7. He scored his skills as the highest, n=3 “I feel confident in this area,” in every area with the exception of “Assessment Strategies” which he rated as n=2 meaning that he did not feel as confident in that area as he did at the beginning of the study.

The changes for his self-assessments were in “Professional Knowledge,” “Instructional Planning,” “Instructional Strategies,” “Academically Challenging Environment,” and “Communication” as shown in Figure 4.3 above.

Table 4.8 Caleb’s Self-Assessment Descriptive Statistics

<table>
<thead>
<tr>
<th></th>
<th>Pre-Intervention Self-Assessment</th>
<th>Post-Intervention Self-Assessment</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Mean</td>
<td>Median</td>
</tr>
<tr>
<td></td>
<td>2.5</td>
<td>2.5</td>
</tr>
</tbody>
</table>
The pre-intervention self-assessment was compared to the post-intervention self-assessment at the conclusion of the study. Caleb scored himself the same in “Differentiated Instruction,” “Assessment Uses,” “Positive Learning Environment,” and “Professionalism.” Caleb scored himself as showing growth in “Professional Knowledge,” “Instructional Planning,” “Instructional Strategies,” “Academically Challenging Environment” and “Communication” from an initial score of n=2 “I do not feel confident in this area” on the pre-assessment for each to a score of n=3 “I feel confident in this area” for each standard on the post-assessment, respectively. Overall, Caleb’s mean self-assessment increased from m=2.5 to m=2.9 from the beginning of the study to the end, as shown in Table 4.8, showing his confidence in his skills improved throughout the study.

**Student Survey Results.** The student survey pre-intervention survey was given electronically in the first week of the spring semester to 64 students. Students had just changed classes and had been in Caleb’s class for three days before taking the survey. The students took the survey online, rating their experiences in Caleb’s classroom by reading the statements aligned to the Georgia TAPS standards and rating the statements on a Likert scale from a score of n=1 meaning “Never” to a score of n=5 meaning “Always.” Students were asked to answer honestly and anonymously in reference to their experience in the class. The results of the pre-survey were averaged by question and the mean scores for the survey questions fell between the lowest ranked item, “I feel academically challenged,” scored at m=3.15 to the highest ranked item, “I know the rules and procedures in the class,” scored at m=4.66 as shown in Table 4.9.
Table 4.9 Caleb’s Students Pre- and Post-Survey Results

<table>
<thead>
<tr>
<th></th>
<th>Pre</th>
<th></th>
<th>Post</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Mean</td>
<td>Median</td>
<td>Standard Deviation</td>
<td>Mean</td>
</tr>
<tr>
<td>I feel welcome in this class.</td>
<td>4.08</td>
<td>4.00</td>
<td>1.02</td>
<td>3.95</td>
</tr>
<tr>
<td>I am engaged in the learning activities in this class.</td>
<td>3.93</td>
<td>4.00</td>
<td>1.05</td>
<td>3.94</td>
</tr>
<tr>
<td>I feel academically challenged in this class.</td>
<td>3.15</td>
<td>3.00</td>
<td>1.23</td>
<td>3.32</td>
</tr>
<tr>
<td>I feel supported in this class.</td>
<td>3.95</td>
<td>4.00</td>
<td>1.11</td>
<td>3.73</td>
</tr>
<tr>
<td>I understand why I am doing the tasks I am doing.</td>
<td>4.14</td>
<td>4.00</td>
<td>1.01</td>
<td>3.81</td>
</tr>
<tr>
<td>I feel like my teacher respects and values me.</td>
<td>4.15</td>
<td>4.00</td>
<td>1.08</td>
<td>4.05</td>
</tr>
<tr>
<td>I receive feedback in this class.</td>
<td>4.07</td>
<td>4.00</td>
<td>0.98</td>
<td>3.90</td>
</tr>
<tr>
<td>The classroom environment is conducive for learning.</td>
<td>3.93</td>
<td>4.00</td>
<td>1.05</td>
<td>3.83</td>
</tr>
<tr>
<td>I know the rules and procedures in this class.</td>
<td>4.66</td>
<td>5.00</td>
<td>0.63</td>
<td>4.52</td>
</tr>
<tr>
<td>I feel comfortable asking for help in this class.</td>
<td>3.98</td>
<td>4.00</td>
<td>1.20</td>
<td>4.00</td>
</tr>
<tr>
<td>My teacher communicates with me and my parents through SchoolStatus.</td>
<td>4.12</td>
<td>5.00</td>
<td>1.04</td>
<td>4.06</td>
</tr>
<tr>
<td>I have a choice in how I show what I know on some projects or assessments in this class.</td>
<td>3.86</td>
<td>4.00</td>
<td>0.97</td>
<td>3.90</td>
</tr>
<tr>
<td>I have the opportunity to learn from my mistakes in this class.</td>
<td>4.31</td>
<td>5.00</td>
<td>0.90</td>
<td>4.13</td>
</tr>
<tr>
<td>When I miss a question or lose points on an assignment, I have an opportunity to learn why and how to fix it.</td>
<td>4.07</td>
<td>4.00</td>
<td>0.96</td>
<td>4.00</td>
</tr>
<tr>
<td>I have many opportunities to work with others in this class.</td>
<td>3.90</td>
<td>4.00</td>
<td>1.16</td>
<td>3.90</td>
</tr>
</tbody>
</table>

In comparing the pre-intervention student surveys from the beginning of the study to the post-intervention surveys at the end of the study, there were a few areas of
minor improvement and one area of significant improvement. It was noted that students did not really have time to get to know the classroom or the teacher since they took the survey so early in the semester. Among the notable areas of improvement were the students’ perceptions of an “ Academically Challenging Environment.” The descriptor "I feel academically challenged in this class" was rated the lowest on the pre-intervention survey and was the only area of marked improvement (n=+0.17) on the post-intervention survey as shown in Table 4.10 below. The standard “ Academically Challenging Environment” and smoother activity transitions were the two areas that Caleb and Matt specifically and consistently targeted during the six weeks.

Table 4.10 Caleb’s Students’ Pre- and Post-Survey

<table>
<thead>
<tr>
<th>Statement</th>
<th>Standard</th>
<th>Before</th>
<th>After</th>
</tr>
</thead>
<tbody>
<tr>
<td>I feel welcome in this class.</td>
<td>7</td>
<td>4.08</td>
<td>3.95</td>
</tr>
<tr>
<td>I am engaged in the learning activities in this class.</td>
<td>7</td>
<td>3.93</td>
<td>3.94</td>
</tr>
<tr>
<td>I feel academically challenged in this class.</td>
<td>8</td>
<td>3.15</td>
<td>3.32</td>
</tr>
<tr>
<td>I feel supported in this class.</td>
<td>4</td>
<td>3.95</td>
<td>3.73</td>
</tr>
<tr>
<td>I understand why I am doing the tasks I am doing.</td>
<td>2</td>
<td>4.14</td>
<td>3.81</td>
</tr>
<tr>
<td>I feel like my teacher respects and values me.</td>
<td>7</td>
<td>4.15</td>
<td>4.05</td>
</tr>
<tr>
<td>I receive feedback in this class.</td>
<td>5</td>
<td>4.07</td>
<td>3.90</td>
</tr>
<tr>
<td>The classroom environment is conducive for learning.</td>
<td>7</td>
<td>3.93</td>
<td>3.83</td>
</tr>
<tr>
<td>I know the rules and procedures in this class.</td>
<td>9</td>
<td>4.66</td>
<td>4.52</td>
</tr>
<tr>
<td>I feel comfortable asking for help in this class.</td>
<td>4</td>
<td>3.98</td>
<td>4.00</td>
</tr>
<tr>
<td>My teacher communicates with me and my parents through SchoolStatus.</td>
<td>10</td>
<td>4.12</td>
<td>4.06</td>
</tr>
<tr>
<td>I have a choice in how I show what I know on some projects or assessments in this class.</td>
<td>2</td>
<td>3.86</td>
<td>3.90</td>
</tr>
<tr>
<td>I have the opportunity to learn from my mistakes in this class.</td>
<td>6</td>
<td>4.31</td>
<td>4.13</td>
</tr>
<tr>
<td>When I miss a question or lose points on an assignment, I have an opportunity to learn why and how to fix it.</td>
<td>6</td>
<td>4.07</td>
<td>4.00</td>
</tr>
<tr>
<td>I have many opportunities to work with others in this class.</td>
<td>3</td>
<td>3.90</td>
<td>3.90</td>
</tr>
</tbody>
</table>
The initial student survey supports the difference between the self-assessment and coaching conversation. According to the student survey, “Academically Challenging Environment” was one of the areas students saw a need for improvement as it was the area that scored the lowest on the pre-intervention survey, and it was the only area of significant growth throughout the duration of this study as rated by the student survey.

**Peer-Observation TKES TAPS Rubric.** Matt conducted peer observations four times in Caleb’s classroom throughout the duration of the study. Matt utilized the TKES TAPS Rubric to score classroom behaviors and instructional design on a four-point scale. Observation #1, Matt noted Caleb’s strengths by rating him as n=3 “Proficient” in “Instructional Planning,” “Instructional Strategies,” “Positive Learning Environment,” and “Professionalism.” He scored Caleb as n=2 “Developing” in “Professional Knowledge,” “Differentiated Instruction,” “Assessment Strategies,” “Assessment Uses,” and “Academically Challenging Environment” as shown in Table 4.11 below. Matt did not feel confident rating communication, standard 10 on the TKES TAPS rubric, as he was not able to see or review Caleb’s interactions with parents through phone calls, emails, or emails.

During the second observation, Matt documented improvement in the standard “Professional Knowledge” as shown in Table 4.11 below. During this second observation he rated Caleb as improving from n=3 to n=3 on the standard. However, Matt noted “Instructional Strategies,” “Differentiated Instruction,” “Assessment Strategies,” “Assessment Uses,” and “Academically Challenging Environment” as areas of growth potential for Caleb as they were scored as n=2 “Developing.”
During the third observation, Matt noted improvement in “Instructional Strategies” and “Assessment Strategies.” He also continued to see growth potential in “Differentiated Instruction,” “Assessment Uses,” and “Academically Challenging Environment” by rating them as n=2 “Developing” Table 4.11 below.

In the fourth and final observation, Matt noted improvement in the standards “Differentiated Instruction,” “Assessment Uses,” and “Academically Challenging Environment” as shown in Table 4.11 below. It is worth noting that Matt saw a decline in “Assessment Strategies” during the observations and made recommendations during coaching for alternate ideas for ways to assess student learning. This is an area that Caleb also noted as a weakness from his pre- to post-intervention self-assessment.

Table 4.11 Matt’s Rating of Caleb on the TKES TAPS Rubric

<table>
<thead>
<tr>
<th>Standard</th>
<th>Obs 1</th>
<th>Obs 2</th>
<th>Obs 3</th>
<th>Obs 4</th>
<th>Δ</th>
</tr>
</thead>
<tbody>
<tr>
<td>Professional Knowledge</td>
<td>2</td>
<td>3</td>
<td>3</td>
<td>2</td>
<td>0</td>
</tr>
<tr>
<td>Instructional Planning</td>
<td>3</td>
<td>3</td>
<td>3</td>
<td>3</td>
<td>0</td>
</tr>
<tr>
<td>Instructional Strategies</td>
<td>3</td>
<td>2</td>
<td>3</td>
<td>3</td>
<td>0</td>
</tr>
<tr>
<td>Differentiated Instruction</td>
<td>2</td>
<td>2</td>
<td>2</td>
<td>3</td>
<td>1</td>
</tr>
<tr>
<td>Assessment Strategies</td>
<td>2</td>
<td>2</td>
<td>3</td>
<td>2</td>
<td>0</td>
</tr>
<tr>
<td>Assessment Uses</td>
<td>2</td>
<td>2</td>
<td>2</td>
<td>3</td>
<td>1</td>
</tr>
<tr>
<td>Positive Learning Environment</td>
<td>3</td>
<td>3</td>
<td>3</td>
<td>3</td>
<td>0</td>
</tr>
<tr>
<td>Academically Challenging</td>
<td>2</td>
<td>2</td>
<td>2</td>
<td>3</td>
<td>1</td>
</tr>
<tr>
<td>Environment</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Professionalism</td>
<td>3</td>
<td>3</td>
<td>3</td>
<td>3</td>
<td>0</td>
</tr>
<tr>
<td>Communication</td>
<td>-</td>
<td>-</td>
<td>-</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td><strong>AVERAGE</strong></td>
<td><strong>2.44</strong></td>
<td><strong>2.44</strong></td>
<td><strong>2.67</strong></td>
<td><strong>2.78</strong></td>
<td></td>
</tr>
</tbody>
</table>

According to the rubric scored during the peer observations, Caleb showed growth in “Academically Challenging Environment,” “Differentiated Instruction” and “Assessment Uses.” In these areas, his score on the observation improved from a rating
of n=2 “Developing” to n=3 “Proficient” which is the expected level of performance for Georgia Teachers. His overall TKES TAPS score from the observations increased throughout the study from m=2.44 to m=2.67 to m=2.78 for an improvement of \( \Delta=+0.34 \) as shown in Figure 4.4.

Caleb’s pre-intervention self-assessment was compared to the initial TKES observation to find commonalities and differences. Caleb’s and Matt’s perceptions of the following areas as weaknesses were aligned: “Professional Knowledge” and “Academically Challenging Environment.” Caleb rated himself as weak in “Instructional Planning,” “Instructional Strategies,” and “Communication” and Matt did not concur. Matt rated Caleb as developing in “Differentiated Instruction,” “Assessment Strategies,” and “Assessment Uses,” while Caleb found these areas as strengths on his pre-intervention self-assessment.

Figure 4.4 Caleb’s TKES TAPS Average Scores
**Qualitative Data Analysis.** Caleb’s post-intervention interview, Matt’s field notes and post-intervention interview, and the student open-ended question were the tools used to gather the qualitative data for Caleb’s case. Each of the methods of data collection resulted in rich, descriptive data that was then analyzed, coded and summarized. The data from each of the qualitative data collection tools is described in the following section.

**Master Teacher-Coach Field Notes.** Matt observed in Caleb’s classroom four times and took detailed field notes during all four observations. During the first observation, Matt noted that Caleb was allowing too much time for activities. This led to some students finishing the assignment and subsequently and becoming off task while others were not applying themselves to the task because they knew they had plenty of time to finish later. Matt also noted an issue with transitions between activities where students would have side conversations and become disruptive between different assignments. According to the field notes, Matt shared with Caleb:

> Was the time allowed for bellringer too long? For those that finish bell work early, what are the next steps? Some students began get to be off topic. Could they have already started logging into Booklet? As students were logging in they began to get loud and off task. How can the transition be smoother?

According to the field notes, during the first coaching session, Matt recommended several strategies to improve transitions and keep students engaged and on-task. One of the suggestions Matt discussed with Caleb was informing students at the beginning of the lesson what to do when they finish the activity. For example, when students are beginning an activity, Caleb should tell them how long they have to work on it and
exactly what they should do when they finish the assignment and then monitor the
students by walking around and checking in with them instead of sitting at his desk while
they work. He also suggested to make sure there is a visual reminder of the expectation
on the board or TV to remind students their next steps. Matt also discussed how Caleb
could implement some background music during transition times to notify students it is
time to wrap up and move onto the next activity without having to repeat instructions
over and over again.

During the second observation, Matt noted some issues with student engagement
and technology distracting students during direct instruction in the field notes. For
example, Matt noted that while Caleb was teaching several students were on their
Chromebooks doing other activities instead of listening and engaging in the lesson.
According to the field notes, Matt shared with Caleb:

Why are students’ computers out when taking notes? Are they looking at notes on
GC? Help to transition to the next activity? Do you have any issues with kids not
paying attention or googling other stuff when taking notes? Computers were open
to transition into the next activity. I suggested to have them cracked and not fully
open so kids could not be doing something on them as they were talking notes.

During the coaching session, Matt gave Caleb a couple of pointers about how to ensure
students are not multitasking during the direct instruction periods. He suggested Caleb
enforce the school procedure of putting cellphones in the calculator holders hanging on
the wall. He also suggested that students not get Chromebooks out of the charging shelf
until Caleb was ready for them to use them. Matt also coached Caleb on differentiated
instruction for students as they finish at different times to reduce boredom and off-task
behaviors. He gave Caleb an example of a tiered lesson to use when students are self-paced in activities and an example of a choice board to use for students to choose different ways to show their understanding. The main focus of their coaching session was about making sure that Caleb’s lessons, questions, activities, and assessments included critical thinking skills and scaffolded students from a DOK level 1 to levels 3 and 4 throughout the unit. He provided Caleb with examples and resources to ensure he was going deeper than rote-memorization in the lessons and activities.

During the third observation, Matt noted that some students who finished their assignment earlier than others were no longer being a distraction in class but did not have an activity or assignment to move on to when they finished their work. “As the activity progressed several students began to lay head down and disengage. How can we reach those students?” Matt also noticed a student who was becoming disengaged and started putting his head down but Caleb intervened and got the student engaged back in the lesson. According to the field notes, he affirmed Caleb by saying: “You did a good job of having a student go get water that was having difficulty keeping his head up.” Matt noted in his field observation notes that students were much more engaged overall and their behavior had improved significantly since his first visit. During the coaching session, Matt shared some instructional strategies Caleb could use to improve student engagement as an alternative to direct instruction or notes. According to the field notes, Matt shared with Caleb:

Great job of connecting real life concepts/stories and word association to link to terms they know to new vocabulary! Add in some questions that require deeper thinking. For example, you could ask students to predict what they think will
happen based on the evidence or to draw conclusions from two different sources of information and provide examples to explain their reasoning.

They also talked about transition activities and tips successfully managing student-centered instruction. According to the field notes, Matt shared: “Students need guidance, consistency, and cues to learn how transitions should work in your class. Remind them what to do when they finish and walk around interacting with students while they are working.” Matt provided Caleb some examples of deeper and more rigorous questions Caleb could use during the lesson to encourage critical thinking. Matt shared question stems as an easy starting place to build his questioning strategies and encouraged him to write his questions down for each lesson ahead of time to make sure he builds in higher order thinking.

During the last observation, Matt noticed transitions were much smoother. However, he did note some issues with pacing during instruction. The example in the field notes explained that at the beginning of the class period, Caleb began teaching before all students had the graphic-organizer they needed to use to take notes on during direct instruction. According to the field notes, Matt explained this could cause students to get frustrated by sharing: “After students finish the quiz, maybe have them pick up notes from a specific point in the room so they know what to do. Also be careful not to begin giving notes before all kids have the graphic organizer.” Otherwise, behavior and transitions were much improved. Matt commented on the improved questioning strategies Caleb used during the class period. He notice that Caleb was asking questions open ended questions that required students to think deeper. During the coaching session Matt
recommended some strategies for ensuring all students are engaged and ready to learn before beginning the lesson to prevent student frustration.

**Novice Teacher Interview.** Caleb was interviewed at the conclusion of the study. He answered all 13 questions included in Appendix E and additional follow-up, clarifying questions. Caleb shared that his goals of engaging students in rigorous activities and keeping them on task during transitions are still in progress. According to Caleb: “although I wouldn’t say I met my goal in the six weeks, I am much better equipped to build dynamic lessons and engage students throughout the class period. I am still working to improve down time for students.” Caleb also stated that this research study was a positive experience. Previously, he did not have a relationship with Matt and they had not collaborated together. Now, they share they will continue to collaborate and work together because they enjoyed it so much. Caleb stated that the coaching process was a fantastic way to get another point of view and new ideas about things to try with his students to prevent classroom management issues. In addition, Caleb said he gained considerable insights about how to implement seamless transitions and how to sequence lessons for students so they knew what to do during transitions. “I learned several strategies from watching Matt in his classroom and even more from being able to talk about what was happening in my classroom with Matt.” Overall, Caleb said this project provided a catalyst for him to engage in self-reflection about his classroom practices and provided a resource for building his capacity as a teacher.

**Master Teacher-Coach Interview.** Matt was interviewed at the end of the study. He shared the project was a positive experience, but he needed more time to work with Caleb. Matt found the observation and coaching cycle an excellent way to build a
relationship and foster collaboration. He found that the process made him more self-reflective about his own practices, and he found joy in seeing Caleb try out some of the strategies they discussed in the coaching sessions.

It was so neat to see in practice some of the things we talked about in our meetings. The process made me so reflective about my own practice. As I was writing notes about his classroom, I was asking myself if I do a good job with the same techniques in my own class.

Matt stated that the peer observations were essential to be able to have informed coaching sessions and that he saw improvement in off-task behavior and overall management in Caleb’s classroom throughout the duration of the study. Matt did say that he thought it was essential for the master teacher-coach to be in the same content area as the novice teacher so they could discuss relevant and content-specific ideas and strategies. “I think if this program is organized for next year to support new teachers, it would be essential to plan the coach to be in the same content area as it provides a level starting place with the shared content.” Although they worked in the same academic department, they did not previously collaborate or work together. “This study created an opening for us to work together more often and collaborate frequently to share ideas and best practices.”

**Student Open-Ended Responses.** On the post-intervention survey, students were provided a space to write open ended comments about their experience in the teacher’s classroom. The open-ended question on the post-intervention survey was meant to provide students an opportunity to share their voice in the research study. One student shared “We got into a routine a few weeks into the class. So far it has been an engaging and interesting class. [Matt] is so funny and personable. I really like the class.” Another
student shared “I really like the hands-on activities we get to do in this class. It makes it easier to learn when the teacher doesn’t just explain in notes.” In general students shared the class was fun and interesting and they thought Matt did a great job making the content relevant and meaningful.

**Summary of Caleb’s Case.** Caleb worked with Matt over the six-week study to improve in transitions from assignment to assignment and ensure the quality of the assignments given in his classroom were academically challenging. The student survey showed the student perception of the course being an “Academically Challenging Environment” improved in the six-week study. Matt also noted improvement in the academic rigor of the classroom lessons during his visits in Caleb’s classroom over the four observations. The field notes and interviews showed that although this was a positive experience for both Caleb and Matt, the work was not finished. Neither Caleb nor Matt thought the initial goals they set were completely accomplished during the six weeks and said they needed additional time to continue working together.

**Jessie’s Case**

**Quantitative Data Analysis.** Jessie’s self-assessment, Jammie’s observation TKES TAPS rubric, and the student surveys were the tools used to gather the quantitative data for Jessie’s case. Each of the methods of data collection resulted in numerical data that was then analyzed and summarized. The data from each of the quantitative data collection tools is described in the following section.

**Novice Teacher Self-Assessment.** Jessie participated in the self-assessment at the beginning and end of the research study. Jessie rated himself on each of the ten standards tied to the Teacher Performance Standards expected of all Georgia Teachers through the
Teacher Keys Evaluation System for the Georgia Department of Education self-assessment. The self-assessment was taken in an electronic format where Rebecca rated herself on a Likert scale from n=1 meaning “I would like to focus on this area” to n=3 meaning “I feel confident in this area.”

Table 4.12 Jessie’s Self-Assessment

<table>
<thead>
<tr>
<th>Standard</th>
<th>Pre-Intervention</th>
<th>Post-Intervention</th>
</tr>
</thead>
<tbody>
<tr>
<td>Professional Knowledge</td>
<td>3</td>
<td>3</td>
</tr>
<tr>
<td>Instructional Planning</td>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>Instructional Strategies</td>
<td>1</td>
<td>1</td>
</tr>
<tr>
<td>Differentiated Instruction</td>
<td>2</td>
<td>1</td>
</tr>
<tr>
<td>Assessment Strategies</td>
<td>2</td>
<td>1</td>
</tr>
<tr>
<td>Assessment Uses</td>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>Positive Learning Environment</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>Academically Challenging Environment</td>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>Professionalism</td>
<td>2</td>
<td>2</td>
</tr>
<tr>
<td>Communication</td>
<td>2</td>
<td>2</td>
</tr>
</tbody>
</table>

When Jessie took the pre-intervention self-assessment, the only prompt he scored as n=3 meaning “I feel confident in this area” was “Professional Knowledge” meaning that was the only area he did not feel that he needed to spend his effort during this study. All of the nine remaining standards were rated as areas he wanted to improve. He scored “Differentiated Instruction,” “Assessment Strategies,” “Positive Learning Environment,” “Professionalism,” and “Communication” as n=2 meaning he did not feel confident in those areas. Jessie noted on the self-assessment that he needed the most growth and development in “Instructional Planning,” “Instructional Strategies,” “Assessment Uses” and “Academically Challenging Environment” by rating himself a n=1 “I would like to focus in this area” in all four of these categories meaning that they were all areas of focus for him in this study.
When Jammie and Jessie set up their first meeting, Jammie was prepared to focus on Jessie’s areas of growth as identified on the self-assessment. She did not initially realize how many gaps Jessie had about pedagogy, lesson planning, instructional design and rigor potentially because he entered the profession from a non-traditional route without going to college for education. Jessie asked for help with all standards but especially classroom management or developing a “Positive Learning Environment.” He was completely open to her help and looked forward to learning. Although Jessie and Jammie did work on many things during the study, they specifically focused on rigor, planning for lessons, and classroom management for the coaching sessions.

![Pre-Intervention and Post-Intervention](image)

**Figure 4.5 Jessie’s Self-Assessment Comparison**

Jessie took the post-intervention self-assessment at the conclusion of the study. He scored his skills on the same Likert scale from n=1 to n=3 as shown in Table 4.12 above. He scored his skills in as the highest, n=3, in “Professional Knowledge” and
“Positive Learning Environment.” The changes were in these two standards as well as “Instructional Planning,” “Assessment Uses,” and “Academically Challenging Environment” as shown in Figure 4.5 above.

Table 4.13 Jessie’s Self-Assessment Descriptive Statistics

<table>
<thead>
<tr>
<th></th>
<th>Pre-Intervention Self-Assessment</th>
<th>Post-Intervention Self-Assessment</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Mean</td>
<td>Median</td>
</tr>
<tr>
<td></td>
<td>1.7</td>
<td>2</td>
</tr>
</tbody>
</table>

At the end of the six weeks, the pre-intervention self-assessment was compared to the post-intervention self-assessment. Jessie did not see his confidence grow in “Instructional Strategies,” “Professionalism” or “Communication” as he rated himself the same on both the pre- and post-assessments. He also noted that he needed the most growth and development in “Instructional Planning,” “Instructional Strategies,” “Assessment Uses” and “Academically Challenging Environment” by rating himself a n=1 “I would like to focus on this area” in all four of these areas meaning that they were areas of emphasis for him in this study. Jessie did note an increase in his confidence with three of these areas from the pre- to the post-intervention self-assessment. He improved by one point in each area, “Instructional Planning,” “Academically Challenging Environment” and “Positive Learning Environment,” during the six weeks. Jessie did note that he did not realize at the beginning how much he needed to learn about assessments and differentiated instruction until he went in to do the peer observations. As a result, his confidence was not as high in his skills in these areas on the post-assessment. His overall mean score did increase modestly from m=1.7 to m=1.9 from the pre- to the post-assessment as shown in Table 4.13.
**Student Survey Results.** Eighty-one students in Jessie’s classes took the electronic student survey at the beginning and end of the study. The pre-intervention survey data was collected during the first week of the course. The students took the survey online and rated their experiences in Jessie’s classroom between n=1 and n=5 where n=1 meant “Never” and n=5 meant “Always.” The mean scores for the items on the were between the lowest ranked item “I feel academically challenged” scored at m=3.37 to the highest ranked item “I feel like my teacher respects and values me” scored at m=4.77 as shown in Table 4.14 below.

Table 4.14 Jessie’s Students Pre- and Post-Survey Results

<table>
<thead>
<tr>
<th></th>
<th>Pre</th>
<th></th>
<th>Post</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Mean</td>
<td>Median</td>
<td>Standard Deviation</td>
<td>Mean</td>
</tr>
<tr>
<td>I feel welcome in this class.</td>
<td>4.62</td>
<td>5.00</td>
<td>0.72</td>
<td>4.65</td>
</tr>
<tr>
<td>I am engaged in the learning activities in this class.</td>
<td>4.14</td>
<td>4.00</td>
<td>0.93</td>
<td>4.21</td>
</tr>
<tr>
<td>I feel academically challenged in this class.</td>
<td>3.37</td>
<td>3.00</td>
<td>1.28</td>
<td>3.58</td>
</tr>
<tr>
<td>I feel supported in this class.</td>
<td>4.33</td>
<td>5.00</td>
<td>0.87</td>
<td>4.40</td>
</tr>
<tr>
<td>I understand why I am doing the tasks I am doing.</td>
<td>4.51</td>
<td>5.00</td>
<td>0.73</td>
<td>4.37</td>
</tr>
<tr>
<td>I feel like my teacher respects and values me.</td>
<td>4.77</td>
<td>5.00</td>
<td>0.69</td>
<td>4.65</td>
</tr>
<tr>
<td>I receive feedback in this class.</td>
<td>4.23</td>
<td>5.00</td>
<td>0.98</td>
<td>4.26</td>
</tr>
<tr>
<td>The classroom environment is conducive for learning.</td>
<td>4.25</td>
<td>5.00</td>
<td>0.92</td>
<td>4.22</td>
</tr>
<tr>
<td>I know the rules and procedures in this class.</td>
<td>4.81</td>
<td>5.00</td>
<td>0.45</td>
<td>4.63</td>
</tr>
<tr>
<td>I feel comfortable asking for help in this class.</td>
<td>4.59</td>
<td>5.00</td>
<td>0.77</td>
<td>4.63</td>
</tr>
<tr>
<td>My teacher communicates with me and my parents through SchoolStatus.</td>
<td>3.73</td>
<td>4.00</td>
<td>1.38</td>
<td>3.98</td>
</tr>
</tbody>
</table>
I have a choice in how I show what I know on some projects or assessments in this class.

<table>
<thead>
<tr>
<th></th>
<th>4.23</th>
<th>5.00</th>
<th>0.99</th>
<th>4.23</th>
<th>5.00</th>
<th>1.01</th>
</tr>
</thead>
</table>

I have the opportunity to learn from my mistakes in this class.

<table>
<thead>
<tr>
<th></th>
<th>4.46</th>
<th>5.00</th>
<th>0.87</th>
<th>4.44</th>
<th>5.00</th>
<th>0.82</th>
</tr>
</thead>
</table>

When I miss a question or lose points on an assignment, I have an opportunity to learn why and how to fix it.

<table>
<thead>
<tr>
<th></th>
<th>4.41</th>
<th>5.00</th>
<th>0.88</th>
<th>4.34</th>
<th>5.00</th>
<th>0.85</th>
</tr>
</thead>
</table>

I have many opportunities to work with others in this class.

<table>
<thead>
<tr>
<th></th>
<th>4.53</th>
<th>5.00</th>
<th>0.76</th>
<th>4.53</th>
<th>5.00</th>
<th>0.73</th>
</tr>
</thead>
</table>

When the study was complete, the pre-intervention student survey was compared to the post-intervention student survey. There are several areas of growth from the beginning to the end of the study as measured by students. The following areas were rated as showing significant improvement throughout the study: “I feel academically challenged in this class” n=+0.21, “I receive feedback in this class” n=+0.42 and “My teacher communicates with me and my parents through SchoolStatus” n=+0.25 as shown in Table 4.15 below. There were other areas of modest growth. There was also a marked decline in students stating “I understanding the rules and procedures in the class,” n= -0.59. Though, this may be explained by Jessie changing up his classroom rules, seating charts, and general procedures to address the classroom management issues Jammie coached Jessie about throughout the study. Creating an academically focused and appropriately challenging environment was one of the areas that Jammie and Jessie worked extensively throughout the study.
Table 4.15 Jessie’s Students’ Pre- and Post-Survey

<table>
<thead>
<tr>
<th>Statement</th>
<th>Standard</th>
<th>Before</th>
<th>After</th>
</tr>
</thead>
<tbody>
<tr>
<td>I feel welcome in this class.</td>
<td>7</td>
<td>4.62</td>
<td>4.65</td>
</tr>
<tr>
<td>I am engaged in the learning activities in this class.</td>
<td>7</td>
<td>4.14</td>
<td>4.21</td>
</tr>
<tr>
<td>I feel academically challenged in this class.</td>
<td>8</td>
<td>3.37</td>
<td>3.58</td>
</tr>
<tr>
<td>I feel supported in this class.</td>
<td>4</td>
<td>4.33</td>
<td>4.40</td>
</tr>
<tr>
<td>I understand why I am doing the tasks I am doing.</td>
<td>2</td>
<td>4.51</td>
<td>4.40</td>
</tr>
<tr>
<td>I feel like my teacher respects and values me.</td>
<td>7</td>
<td>4.77</td>
<td>4.37</td>
</tr>
<tr>
<td>I receive feedback in this class.</td>
<td>5</td>
<td>4.23</td>
<td>4.65</td>
</tr>
<tr>
<td>The classroom environment is conducive for learning.</td>
<td>7</td>
<td>4.25</td>
<td>4.26</td>
</tr>
<tr>
<td>I know the rules and procedures in this class.</td>
<td>9</td>
<td>4.81</td>
<td>4.22</td>
</tr>
<tr>
<td>I feel comfortable asking for help in this class.</td>
<td>4</td>
<td>4.59</td>
<td>4.63</td>
</tr>
<tr>
<td>My teacher communicates with me and my parents through SchoolStatus.</td>
<td>10</td>
<td>3.73</td>
<td>3.98</td>
</tr>
<tr>
<td>I have a choice in how I show what I know on some projects or assessments in this class.</td>
<td>2</td>
<td>4.23</td>
<td>4.23</td>
</tr>
<tr>
<td>I have the opportunity to learn from my mistakes in this class.</td>
<td>6</td>
<td>4.46</td>
<td>4.44</td>
</tr>
<tr>
<td>When I miss a question or lose points on an assignment, I have an opportunity to learn why and how to fix it.</td>
<td>6</td>
<td>4.41</td>
<td>4.34</td>
</tr>
<tr>
<td>I have many opportunities to work with others in this class.</td>
<td>3</td>
<td>4.53</td>
<td>4.53</td>
</tr>
</tbody>
</table>

**Peer-Observation TKES TAPS Rubric.** Jammie conducted peer observations four times during the six-week study in Jessie’s classroom. Jammie found gaps in Jessie’s classroom practices, and the scores were inconsistent from week to week. In the first observation, the areas of growth were “Assessment Strategies” and “Assessment Uses” and both areas were scored n=2 “Developing” as shown in Table 4.16 meaning the standard was not observed consistently. His overall TKES TAPS score was 2.80 for the 10 standards.
During the second observation, Jammie found several additional areas of growth needed in “Instructional Strategies,” “Differentiated Instruction,” “Academically Challenging Environment” and “Communication.” Each of the four areas were scored n=2 “Developing” as shown under Obs 2 in Table 4.16 below. His overall TKES TAPS score was 2.40 for the 10 standards.

During the third observation, Jammie found “Instructional Strategies” and “Academically Challenging Environment” had decreased in effectiveness since the prior observation and both areas were scored n=1 “Needs Improvement.” His overall TKES TAPS score was 2.10 for the 10 standards.

For the last observation, Jammie found “Assessment Strategies” and “Assessment Uses” were the two areas needing the most attention for development. Jessie’s classroom practices, as measured on the TKES TAPS rubric by his master teacher-coach during the study, decreased from m=2.8 to m=2.2 over the six weeks.

Table 4.16 Jammie’s Rating of Jessie on the TKES TAPS Rubric

<table>
<thead>
<tr>
<th>Standard</th>
<th>Obs 1</th>
<th>Obs 2</th>
<th>Obs 3</th>
<th>Obs 4</th>
<th>Δ</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 Professional Knowledge</td>
<td>3.00</td>
<td>3.00</td>
<td>3.00</td>
<td>3.00</td>
<td>0.00</td>
</tr>
<tr>
<td>2 Instructional Planning</td>
<td>3.00</td>
<td>3.00</td>
<td>2.00</td>
<td>2.00</td>
<td>-1.00</td>
</tr>
<tr>
<td>3 Instructional Strategies</td>
<td>3.00</td>
<td>2.00</td>
<td>1.00</td>
<td>2.00</td>
<td>-1.00</td>
</tr>
<tr>
<td>4 Differentiated Instruction</td>
<td>3.00</td>
<td>2.00</td>
<td>2.00</td>
<td>2.00</td>
<td>-1.00</td>
</tr>
<tr>
<td>5 Assessment Strategies</td>
<td>2.00</td>
<td>2.00</td>
<td>2.00</td>
<td>1.00</td>
<td>-1.00</td>
</tr>
<tr>
<td>6 Assessment Uses</td>
<td>2.00</td>
<td>2.00</td>
<td>2.00</td>
<td>1.00</td>
<td>-1.00</td>
</tr>
<tr>
<td>7 Positive Learning Environment</td>
<td>3.00</td>
<td>3.00</td>
<td>3.00</td>
<td>3.00</td>
<td>0.00</td>
</tr>
<tr>
<td>8 Academically Challenging Environment</td>
<td>3.00</td>
<td>2.00</td>
<td>1.00</td>
<td>2.00</td>
<td>-1.00</td>
</tr>
<tr>
<td>9 Professionalism</td>
<td>3.00</td>
<td>3.00</td>
<td>3.00</td>
<td>3.00</td>
<td>0.00</td>
</tr>
<tr>
<td>10 Communication</td>
<td>3.00</td>
<td>2.00</td>
<td>2.00</td>
<td>3.00</td>
<td>0.00</td>
</tr>
<tr>
<td><strong>AVERAGE</strong></td>
<td><strong>2.80</strong></td>
<td><strong>2.40</strong></td>
<td><strong>2.10</strong></td>
<td><strong>2.20</strong></td>
<td><strong>-0.60</strong></td>
</tr>
</tbody>
</table>
According to the TKES TAPS rubric scored during the peer observations, Jessie did not show growth in any area throughout the study. Jammie scored the following areas as decreasing by n=-1.0: “Instructional Planning,” “Instructional Strategies,” “Differentiated Instruction,” “Assessment Strategies,” “Assessment Uses,” “Academically Challenging Environment.” The mean score on the total observation rubric decreased from m=2.8 to m=2.2 for a change of Δ =-0.4 during the six-week study as shown in Figure 4.6 below.

Jessie’s pre-intervention self-assessment was compared to the initial TKES observation to find commonalities and differences. Jessie’s and Jammie’s perceptions of the following areas as weaknesses were aligned: “Assessment Strategies,” and “Assessment Uses.” Jessie rated himself as weak in all nine areas outside of his strength in “Professional Knowledge.” During the first observation, Jammie did not initially concur. However, additional weaknesses were revealed throughout the study. Jammie did also rate Jessie’s “Professional Knowledge” as a strength.
Figure 4.6 Jessie’s TKES TAPS Average Scores

**Qualitative Data Analysis.** Jessie’s post-intervention interview, Jammie’s field notes and post-intervention interview, and the student open-ended question were the tools used to gather the qualitative data for Jessie’s case. Each of the methods of data collection resulted in rich, descriptive data that was then analyzed, coded and summarized. The data from each of the qualitative data collection tools is described in the following section.

**Master Teacher-Coach Field Notes.** Jammie observed Jessie four times during the study and collected detailed field notes during the peer observations. During the first observation, Jammie noted some issues with student engagement and distracting technology during the direct instruction portion of the lesson. Specifically, she described students playing on phones and Chromebooks while Jessie was teaching. According to the field notes, Jammie noted:
The biggest issue I noticed for student engagement regarding seating. The large tables prevented some students from facing forward during the group discussion. As a result, some of these students were disengaged. In addition, all students had their Chromebooks open during group discussion, some students used their Chromebooks as a tool to avoid engagement.

While Jessie’s lecture was interesting and dynamic, students were not engaged in the lesson. She also noted that Jessie was missing an essential part of the lesson: checking for student understanding. Jessie talked for the majority of the lesson without asking students questions or stopping to check they were understanding the content. During the coaching session, they discussed the classroom organization and design, strategies to avoid students being on technology while he was talking, how to implement questions strategies and the ticket-out-the-door strategy to check for student understanding, and methods of using the student formative assessment data to inform the lesson for the next day.

During the second observation, Jammie noticed that Jessie told students to put away technology immediately when coming into the class and utilized effective grouping strategies to capitalize on the seating arrangement. During the coaching, Jammie recommended changing the seating arrangement to move students away from their friends to discourage chatting during direct instruction and subsequent transition times. Jammie also noticed an issue with classroom management when Jessie was working with groups; she noted that Jessie left the classroom to work with a group out in the hallway and the groups in the classroom were completely off-task while he was talking to the
students outside. Jammie took notes discussing this issue with Jessie during the coaching session. According to the field notes, Jammie noted:

Though taking each group to the hall to review their answers and check for true understanding (using a full size skeleton) allowed for a small group type setting and real time feedback…it is always risky to leave the other students behind. Students without supervision are almost always off task and acting like children…To ensure all students stay on task, have an activity for those sitting at their desks, and pull the small group to the side, so you still have eyes on the room.

She recommended he move the tables around in the classroom to facilitate group work and not to allow students to work outside of the room in the future because of the supervision issues it can create. Jammie noted the decline in his TKES TAPS observation was a result of her paying much more attention to his lesson plans, assessments, and classroom practices than she did at the beginning. This was due to her initial pre-conceived notion that he would not need much coaching because of his level of education and experience as a practitioner. Jammie did not realize how much support Jessie needed in pedagogy and teaching and assessing techniques. Jammie started the study looking at classroom management practices instead of looking deeply at what he was asking students to do and how he was assessing their learning.

In the third classroom observation, Jammie noticed a difference in the instructional strategies being used and noted they were effective at engaging students. However, Jammie also noted while the assignments were engaging, they were not
rigorous and that may be contributing to the issues with student behavior. According to the field notes, Jammie noted:

My first instinct, is that possibly student misbehavior is directly correlated to lack of rigor in the classroom. Students are bored and as a result look for opportunities to talk and be off task. My initial observation noted that students were at tables in group settings which promoted this kind of behavior. However, given the level of rigor noted on daily activities, I now believe students are just trying to entertain themselves and enjoy the class by whatever means possible.

Jammie’s field notes included references to Jessie assigning students to color and label diagrams for a large portion of the class period which Jammie noted was not academically appropriate for the age group nor for the requirements of the content standards. Jammie utilized these notes for the coaching conversations in which she introduced him to Webb’s Depth of Knowledge (DOK) and how to build on a lesson from beginning to end to increase the rigor and cognitive engagement. She explained that the course content standards should guide the level students are asked to think deeply and critically about the content. Since Jessie does not have a background in education, this was his first introduction to DOK. He was completely at a loss for how to build from DOK 1 to DOK, 2, 3, and 4 during an instructional unit. According to the field notes, Jammie noted: “Jessie was not sure how to get students to critically think about concepts are how to assess if they could apply DOK 1 knowledge in the real-world setting.” Jammie provided Jessie with instructional design web resources he could use to build onto his lessons and taught him how to dissect his course standards to decide how deeply students should work with the content.
During the final observation, Jammie noted the effective use of instructional technology in Jessie’s lesson. However, Jessie was reviewing information at a DOK of 1 and only about half of students were engaged in the review. The changes to the classroom rules and procedures were observed by Jammie to have a positive impact on the classroom as students were not on technology, cell phones were put away, and they were not distracting other students by talking during the lesson. According to the field notes, Jammie made suggestions of “methods to engage students during notes and other assessment opportunities that might give students a chance to truly show knowledge gained.” The coaching conversation focused on increasing the rigor of questions, effective, academically challenging engagement strategies, and appropriate assessment methods to check for student understanding and comprehension. According to the field notes, Jammie noted:

You could use a quick ticket out with a few open-ended questions. Keeping it open-ended will help you make sure students can explain their answers and limiting the questions will make it quick and easy for you to grade the same day. Use the formative assessment results to inform your planning the next day.

Jammie and Jessie discussed different methods for how to collect and use student assessment data to drive instruction and how to apply the results of the assessment to his plans.

**Novice Teacher Interview.** Jessie was interviewed at the conclusion of the study. He shared his main concern that he had so much to learn and needed more time. Jessie shared:
I never realized how much growing I had to do in order to learn how to teach. I know the content backwards and forwards but I did not know how to design a lesson or manage a classroom of teenagers. The peer observations were eye-opening.

He found the observation and coaching cycle a positive experience and felt that this would be an excellent way to support new teachers, like him, given that it was continued throughout the first one or two years of teaching. “Six weeks was definitely not enough time” Jessie said, “we need to continue this coaching and feedback process for at least the rest of this semester. I think it would be great to be spread over a whole school year.” The peer observations that Jessie conducted during the study were his first time ever seeing another teacher teach from the perspective of a colleague. “I came to the teaching profession from a career in medicine. I was not trained as a teacher. I don’t have the same background knowledge as my first-year-teacher colleagues.” Watching in experienced teachers’ classrooms overwhelmed him with ideas and strategies that he wanted to implement immediately and he subsequently got discouraged. He did say going into another teacher’s classroom to observe was the best part of this project because it was a great way to see a successful classroom in action. Coaching was also positive for him because it was great to get authentic feedback right after a lesson. He found participation in the study gave him positive pressure to prepare, plan, and execute lessons effectively in his classroom. Jessie stated that he knows that he made progress in improving his classroom management and creating deeper, more meaningful activities for students. “I would not say I have met my goal but I am still working on them. I need more time with Jammie to implement more of the great ideas I saw.” Jessie did share how beneficial it
was that his master teacher-coach had a similar background and could provide insight and strategies specific to his context and content. “I think the shared content knowledge provided a great foundation for the collaboration and coaching.” His master teacher-coach partnered him with a teacher at another school for additional curriculum resources and instructional ideas. The proximity Jessie had to his master teacher-coach was beneficial for quick hallway conversations and lunch chats outside of the requisite observations and coaching sessions.

**Master teacher-coach Interview.** Jammie was interviewed at the end of the study. She shared her preconceived notions at the start of the study were a hindrance to her getting started in the coaching cycle with Jessie. Those preconceived notions included her assumptions that his level of education and wealth of experience in the field would translate to effective classroom management and instructional design and as a result, she did not think Jessie would need much support through this study. Jammie shared: “Jessie is an educated professional with an incredible amount of content knowledge and experience in the field. I assumed that would mean his experiences would translate to the classroom.” However, after the first peer observations and coaching session, she quickly realized the gaps Jessie had in pedagogy, assessment and rigor and realized he needed a lot more support than she originally planned. According to Jammie, “this was the first time I realized the power of the education courses in college. The experience with lesson planning, classroom management, and assessment design are valuable to developing strong teachers.” Jammie shared her concern when Jessie got overwhelmed and discouraged after the peer observations and realized he needed encouragement and small, manageable steps that he could accomplish in the short study. Jammie realized the
amount of support Jessie needed and that he was trying to confront all of the inadequacies he felt at the same time. “Jessie quickly realized how much he didn’t yet know and it was difficult to watch him struggle with which goal to address first.” As a result, Jammie refocused their efforts and helped him set a goal that he could work on throughout the study and committed to continue working with him for the remainder of the school year and over the summer to help him close the gaps in instructional design and classroom management. The initial goal they set did not end up being the focus of the coaching and interventions. Jammie talked about the authenticity the peer observations allowed them to have in the coaching sessions. Without going into each other’s classrooms, they may have only focused on the initial goal and not the actual help Jessie needed. She did share the power of the program to help teachers self-reflect and embrace a growth mindset but suggested more time would be needed for the study to show real gains. “Coaching is absolutely a viable way to support new teachers, and it is needed at FCHS. We have been missing a key component of supporting our staff.” She described the study as a positive and collaborative experience and appreciated the shared content and context as a powerful part of the process. “The end of the study is not the end of the work for us. This support and coaching process is so important for Jessie’s continued growth and development. I am committed to continuing to work with him.”

**Student Open-Ended Responses.** On the post-intervention survey, students were provided a space to write open-ended comments about their experience in the teacher’s classroom. This open-ended question on the post-intervention survey was meant to provide students an opportunity to share their voice in the research study. There were several comments about Jessie’s classes. One student shared “I cannot wait to take
another class with [Jessie]. He is so fun and interesting. His enthusiasm is over-the-top!” Another student shared that it seemed like the class got more organized throughout the semester. One student commented on the increased challenge in the class saying: “I thought at the beginning of the semester that this would be an easy ‘A’ course. The class got more challenging as we went along.” An additional student added comments about Jessie’s approachability and passion for the content. Overall, the comments in general noted the class was a fun, dynamic, and enjoyable place to learn and it seemed to become more efficient and organized during the semester.

**Summary of Jessie’s Case.** Jessie had less than one year of teaching experience and came to teaching through a non-traditional route. Jammie did not initially realize how much help Jessie needed and commented on the rubric scores not being a true reflection of his growth because the scores were inflated at the beginning of the study. Looking back, both teachers realized they should have slowed down and worked on just one area at a time. “The most difficult part of the project was watching Jessie struggle with self-efficacy. The best part was being able to put additional supports in place to help him through the project and afterwards.” Realizing that Jessie got overwhelmed with how much he needed to learn, Jammie slowed the coaching conversations down and focused on encouragement.

The student survey results show their perception of Jessie’s classroom as an effective place to learn and most of the student survey scores improved throughout the six weeks. Jessie’s self-assessment scores show that he lost confidence in “Differentiated Instruction” and “Assessment Strategies” and improved in “Instructional Planning,” “Assessment Uses,” “Positive Learning Environment.” Jammie’s observations show
negative growth or no growth on the TKES TAPS rubric in all areas while student surveys show growth in almost every area. This case was the most complex but because both Jammie and Jessie found this to be a positive experience they want to continue to work together in this capacity over the next year. Jammie even put in place some additional supports for Jessie after the conclusion of the research study including setting him up with a colleague at another school for curriculum resources, arranging stipend paid professional development and agreeing to continue coaching him for the next school year.

**Julie’s Case**

**Quantitative Data Analysis.** Julie’s self-assessment, David’s observation TKES TAPS rubric, and the student surveys were the tools used to gather the quantitative data for Julie’s case. Each of the methods of data collection resulted in numerical data that was then analyzed and summarized. The data from each of the quantitative data collection tools is described in the following section.

**Novice Teacher Self-Assessment.** Julie participated in the electronic self-assessment at the beginning and again at the end of the research study. The self-assessment was directly related to the 10 TKES TAPS standards that are also covered on the student survey and the peer observation rubric. Julie was asked to rate herself on a scale from n=1 to n=3 with a score of n=1 meaning “I would like to focus on this area” and a score of n=3 meaning “I feel confident in this area.”
Table 4.1 Julie’s Self-Assessment

<table>
<thead>
<tr>
<th>Standard</th>
<th>Pre-Intervention</th>
<th>Post-Intervention</th>
</tr>
</thead>
<tbody>
<tr>
<td>Professional Knowledge</td>
<td>3</td>
<td>3</td>
</tr>
<tr>
<td>Instructional Planning</td>
<td>3</td>
<td>3</td>
</tr>
<tr>
<td>Instructional Strategies</td>
<td>1</td>
<td>3</td>
</tr>
<tr>
<td>Differentiated Instruction</td>
<td>1</td>
<td>3</td>
</tr>
<tr>
<td>Assessment Strategies</td>
<td>3</td>
<td>3</td>
</tr>
<tr>
<td>Assessment Uses</td>
<td>3</td>
<td>3</td>
</tr>
<tr>
<td>Positive Learning Environment</td>
<td>3</td>
<td>3</td>
</tr>
<tr>
<td>Academically Challenging Environment</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>Professionalism</td>
<td>3</td>
<td>3</td>
</tr>
<tr>
<td>Communication</td>
<td>2</td>
<td>3</td>
</tr>
</tbody>
</table>

When Julie took the pre-intervention self-assessment, she scored her skills on the Likert scale from n=1 to n=3 as shown in Table 4.17 above. She scored her skills as the highest rating, n=3 “I feel confident in this area,” in “Professional Knowledge,” “Instructional Planning,” “Assessment Strategies,” “Assessment Uses,” “Positive Learning Environment,” and “Professionalism.” She scored the following standards as n=2 “I do not feel confident in this area:” “Academically Challenging Environment” and “Communication.” The two areas she rated as needing the most growth and development were “Instructional Strategies” and “Differentiated Instruction” by rating them both n=1 meaning “I would like to work on this area.”

During the initial conference with David, the pair discussed her goals and she told him she wanted to focus on classroom management (consistency with addressing student behavior) or “Positive Learning Environment,” “Academically Challenging Environment” by making her lessons more cognitively engaging and rigorous, “Differentiated Instruction” related to providing scaffolded help and support to students,
and “Instructional Strategies” relating to opening and closing class and keeping students engaged in the lesson.

Figure 4.7 Julie’s Self-Assessment Comparison

Julie took the post-intervention self-assessment at the conclusion of the study. She scored her skills on the Likert scale from n=1 to n=3 as shown in Table 4.17. She scored her skills as the highest, n=3 “I feel confident in this area,” in all ten standards showing her confidence improved in her skills throughout the study. The changes for her self-assessments were in “Instructional Strategies,” “Differentiated Instruction,” “Academically Challenging Environment” “Communication” as shown in Figure 4.7 above.
Table 4.18 Julie’s Self-Assessment Descriptive Statistics

<table>
<thead>
<tr>
<th></th>
<th>Pre-Intervention Self-Assessment</th>
<th>Post-Intervention Self-Assessment</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Mean</td>
<td>Median</td>
</tr>
<tr>
<td></td>
<td>2.4</td>
<td>3</td>
</tr>
</tbody>
</table>

At the end of the research, study the pre-intervention self-assessment was compared to the post-intervention self-assessment to see how Julie believed she improved throughout the study. Her scores for “Instructional Strategies” and “Differentiated Instruction” both improved from n=1 “I would like to focus on this area” to n=3 “I feel confident in this area” for both standards. “Academically Challenging Environment” and “Communication” scores both increased from n=2 “I do not feel confident in this area” to n=3 “I feel confident in this area.” Overall, Julie’s self-assessment improved from m=2.4 to m=3 from the beginning to the end of the study as shown in Table 4.18 above.

**Student Survey Results.** Fifty-five students in Julie’s classes took the electronic student survey at the beginning and end of the study. At the beginning the students took the survey within the first week of the class and again six weeks later at the end of the study. The students were asked to be honest and provide anonymous feedback on the survey. The students took the survey online and rated their experiences in Julie’s classroom between n=1, meaning “Never” and n=5, meaning “Always.” The mean scores for the items on the were between the lowest m=3.64 “I feel academically challenged in this class” to the highest m=4.77 “I feel like my teacher respects and values me.”
Table 4.19 Julie’s Students Pre- and Post-Survey Results

<table>
<thead>
<tr>
<th></th>
<th>Pre</th>
<th>Post</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Mean</td>
<td>Median</td>
</tr>
<tr>
<td>I feel welcome in this class.</td>
<td>4.55</td>
<td>5.00</td>
</tr>
<tr>
<td>I am engaged in the learning activities in this class.</td>
<td>4.22</td>
<td>4.00</td>
</tr>
<tr>
<td>I feel academically challenged in this class.</td>
<td>3.64</td>
<td>4.00</td>
</tr>
<tr>
<td>I feel supported in this class.</td>
<td>4.31</td>
<td>5.00</td>
</tr>
<tr>
<td>I understand why I am doing the tasks I am doing.</td>
<td>4.15</td>
<td>5.00</td>
</tr>
<tr>
<td>I feel like my teacher respects and values me.</td>
<td>4.71</td>
<td>5.00</td>
</tr>
<tr>
<td>I receive feedback in this class.</td>
<td>4.22</td>
<td>5.00</td>
</tr>
<tr>
<td>The classroom environment is conducive for learning.</td>
<td>4.25</td>
<td>5.00</td>
</tr>
<tr>
<td>I know the rules and procedures in this class.</td>
<td>4.53</td>
<td>5.00</td>
</tr>
<tr>
<td>I feel comfortable asking for help in this class.</td>
<td>4.45</td>
<td>5.00</td>
</tr>
<tr>
<td>My teacher communicates with me and my parents through SchoolStatus.</td>
<td>4.31</td>
<td>5.00</td>
</tr>
<tr>
<td>I have a choice in how I show what I know on some projects or assessments in this class.</td>
<td>4.20</td>
<td>4.00</td>
</tr>
<tr>
<td>I have the opportunity to learn from my mistakes in this class.</td>
<td>4.40</td>
<td>5.00</td>
</tr>
<tr>
<td>When I miss a question or lose points on an assignment, I have an opportunity to learn why and how to fix it.</td>
<td>4.31</td>
<td>5.00</td>
</tr>
<tr>
<td>I have many opportunities to work with others in this class.</td>
<td>3.91</td>
<td>4.00</td>
</tr>
</tbody>
</table>

At the conclusion of the study, the pre- and post-intervention student surveys were compared. In Julie’s classroom there were three areas of significant growth
throughout the study: “I feel academically challenged in this class” (n= +0.27), “I receive feedback in this class” (n= +0.25) and “My teacher communicates with me and my parents through SchoolStatus” (n= +0.24). There were other areas of modest growth. It is notable that one of the areas Julie noticed through the peer observation was the effective, immediate feedback he provides to students and she attributed David’s class running so well to him consistently walking around his classroom and talking with students while they worked.

Table 4.20 Julie’s Students’ Pre- and Post-Survey

<table>
<thead>
<tr>
<th>Statement</th>
<th>Standard</th>
<th>Pre-Intervention</th>
<th>Post-Intervention</th>
</tr>
</thead>
<tbody>
<tr>
<td>I feel welcome in this class.</td>
<td>7</td>
<td>4.55</td>
<td>4.61</td>
</tr>
<tr>
<td>I am engaged in the learning activities in this class.</td>
<td>7</td>
<td>4.22</td>
<td>4.13</td>
</tr>
<tr>
<td>I feel academically challenged in this class.</td>
<td>8</td>
<td>3.64</td>
<td>3.91</td>
</tr>
<tr>
<td>I feel supported in this class.</td>
<td>4</td>
<td>4.31</td>
<td>4.34</td>
</tr>
<tr>
<td>I understand why I am doing the tasks I am doing.</td>
<td>2</td>
<td>4.15</td>
<td>4.23</td>
</tr>
<tr>
<td>I feel like my teacher respects and values me.</td>
<td>7</td>
<td>4.71</td>
<td>4.71</td>
</tr>
<tr>
<td>I receive feedback in this class.</td>
<td>5</td>
<td>4.22</td>
<td>4.46</td>
</tr>
<tr>
<td>The classroom environment is conducive for learning.</td>
<td>7</td>
<td>4.25</td>
<td>4.18</td>
</tr>
<tr>
<td>I know the rules and procedures in this class.</td>
<td>9</td>
<td>4.53</td>
<td>4.61</td>
</tr>
<tr>
<td>I feel comfortable asking for help in this class.</td>
<td>4</td>
<td>4.45</td>
<td>4.39</td>
</tr>
<tr>
<td>My teacher communicates with me and my parents through SchoolStatus.</td>
<td>10</td>
<td>4.31</td>
<td>4.55</td>
</tr>
<tr>
<td>I have a choice in how I show what I know on some projects or assessments in this class.</td>
<td>2</td>
<td>4.20</td>
<td>4.27</td>
</tr>
</tbody>
</table>
I have the opportunity to learn from my mistakes in this class. | 6 | 4.40 | 4.55
---|---|---|---
When I miss a question or lose points on an assignment, I have an opportunity to learn why and how to fix it. | 6 | 4.31 | 4.46
I have many opportunities to work with others in this class. | 3 | 3.91 | 4.09

**Peer-Observation TKES TAPS Rubric.** The peer observations for Julie were conducted by David on a rubric designed to mimic the TKES TAPS system. On the initial peer observation, David did not notice any areas where Julie was experiencing difficulty outside of classroom management or “Positive Learning Environment” and “Instructional Planning,” where she was rated as n=2 “Developing” on the rubric, meaning the standard was not observed consistently, as shown in Table 4.21 below.

During the second observation, David noted that classroom management was still a concern but was working on coaching her in classroom management strategies and engaging students in academically challenging lessons that would help to prevent off-task behavior. The standards “Instructional Planning” and “Positive Learning Environment” were both rated as n=2 “Developing” as shown under Obs 2 on Table 4.21.

During the third observation, David noted improvement in the classroom environment by rating “Positive Learning Environment” as improving from n=2 to n=3 on the TKES TAPS rubric. The overall observation score increased from m=2.8 to m=2.9 for the third observation.

In the fourth and final observation, David noted several areas of improvement in Julie’s classroom. The following standards increase from n=3 to n=4 meaning that the skills changed from “Proficient” to “Exemplary:” “Professional Knowledge,”
“Assessment Uses,” and “Academically Challenging Environment” as shown in Table 4.21 below. The standard “Instructional Planning” remained unchanged from the first to the last observation.

Table 4.21 David’s Rating of Julie on the TKES TAPS Rubric

<table>
<thead>
<tr>
<th>Standard</th>
<th>Obs 1</th>
<th>Obs 2</th>
<th>Obs 3</th>
<th>Obs 4</th>
<th>Δ</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 Professional Knowledge</td>
<td>3.00</td>
<td>3.00</td>
<td>3.00</td>
<td>4.00</td>
<td>1.00</td>
</tr>
<tr>
<td>2 Instructional Planning</td>
<td>2.00</td>
<td>2.00</td>
<td>2.00</td>
<td>2.00</td>
<td>0.00</td>
</tr>
<tr>
<td>3 Instructional Strategies</td>
<td>3.00</td>
<td>3.00</td>
<td>3.00</td>
<td>3.00</td>
<td>0.00</td>
</tr>
<tr>
<td>4 Differentiated Instruction</td>
<td>3.00</td>
<td>3.00</td>
<td>3.00</td>
<td>3.00</td>
<td>0.00</td>
</tr>
<tr>
<td>5 Assessment Strategies</td>
<td>3.00</td>
<td>3.00</td>
<td>3.00</td>
<td>3.00</td>
<td>0.00</td>
</tr>
<tr>
<td>6 Assessment Uses</td>
<td>3.00</td>
<td>3.00</td>
<td>3.00</td>
<td>4.00</td>
<td>1.00</td>
</tr>
<tr>
<td>7 Positive Learning Environment</td>
<td>2.00</td>
<td>2.00</td>
<td>3.00</td>
<td>3.00</td>
<td>1.00</td>
</tr>
<tr>
<td>8 Academically Challenging Environment</td>
<td>3.00</td>
<td>3.00</td>
<td>3.00</td>
<td>4.00</td>
<td>1.00</td>
</tr>
<tr>
<td>9 Professionalism</td>
<td>3.00</td>
<td>3.00</td>
<td>3.00</td>
<td>3.00</td>
<td>0.00</td>
</tr>
<tr>
<td>10 Communication</td>
<td>3.00</td>
<td>3.00</td>
<td>3.00</td>
<td>3.00</td>
<td>0.00</td>
</tr>
<tr>
<td>AVERAGE</td>
<td>2.80</td>
<td>2.80</td>
<td>2.90</td>
<td>3.20</td>
<td></td>
</tr>
</tbody>
</table>

The standards “Academically Challenging Environment,” “Professional Knowledge” and “Assessment Uses” all increased throughout the study from n=3 Proficient to n=4 Exemplary and “Positive Learning Environment” improved from n=2 Developing to n=3 Proficient as shown in Table 4.21. The remaining standards did not change throughout the observation period. The mean observation score increased from m=2.8 to m=2.9 to m=3.2 during the six-week study as shown in Figure 4.8.

Julie’s pre-intervention self-assessment was compared to the initial TKES observation to find commonalities and differences. Julie’s and David’s perceptions of the weaknesses were not aligned in the self-assessment and observation. Julie noted “Instructional Strategies,” “Differentiated Instruction,” “Academically Challenging
Environment,” and “Communication” as her weaknesses. David noted her weaknesses as “Instructional Planning” and “Positive Learning Environment.” They did both note several areas of strength in common.

Figure 4.8 Julie’s TKES TAPS Average Scores

Qualitative Data Analysis. Julie’s post-intervention interview, David’s field notes and post-intervention interview, and the student open-ended question were the tools used to gather the qualitative data for David’s case. Each of the methods of data collection resulted in rich, descriptive data that was then analyzed, coded and summarized. The data from each of the qualitative data collection tools is described in the following section.

Master Teacher-Coach Field Notes. David observed Julie four times during the study and took detailed field notes during the observations. During the first observation, David noticed some issues with eye contact during the lesson where Julie was facing the
board and talking with her back to students. He also noticed some issues with student disruptions and the difficulty Julie had with the seating arrangement in the classroom. Her classroom was set up with the student desks facing each other. During the coaching session, they discussed changing around the seating arrangements to facilitate Julie moving around with students and keeping students engaged in the lesson. According to the field notes, David also made several suggestions including: “I would recommend that you move the student desks to face the whiteboard and interactive panel instead of facing the other students. I believe it might be helpful to keep students focused and engaged while you are teaching.” They talked about the importance of Julie facing students while teaching. His field notes included references to her “looking at the board instead of making eye contact with students.” The pair also discussed strategic seating for students with behavior issues and academic difficulties and making seating charts to reorganize the classroom. According to the field notes, David noted: “It is a good idea to use data to inform how you arrange students. You could use assessment data or informal data about their behavior to decide who should sit where.” Julie also asked for help with ideas to open and close the class each day to make sure students were actively engaged throughout the entire block. David provided several resources in bell-ringers and class opening tasks as well as formative checks of student understanding at the end of class like tickets-out-the-door, review games, and formative quizzes.

During the second observation, David noticed that Julie had implemented a new classroom management strategy for correcting student disruption and misbehavior in which students silently received a warning, notice their parents would be contacted, and notice they would receive a detention all without interrupting the lesson. She did this
through writing their name on the board while she was teaching. David observed the new seating arrangement had made a positive impact on student engagement and behavior. Students were able to work together in collaborative groups easily and Julie could move around and help students effectively during the lesson. David gave Julie some notes about utilizing the co-teacher in the room effectively to support student engagement and behavior. According to the field notes, David shared that “during the observation, the co-teacher was sitting at a desk in the back of the room and was not engaging with students or sharing the instruction duties.” David suggested in the field notes that Julie “collaborate with her co-teacher and include him in the lesson plan.” David also encouraged Julie how to inform students she was enforcing a new classroom management system and ensure they understand the change in rules and procedures. He reinforced the importance of contacting parents, communicating early and often with students, and families and following through with stated protocols. David noted the lack of discussion questions Julie asked during the lesson and suggested that she built some critical thinking questions into the lesson each day to pause direct instruction and engage students to ensure they are understanding the content.

During the third observation, David noticed that Julie was not enforcing the cell phone policy and procedure she had in place. During the 2022-2023 school year at FCHS, all teachers had cell phone holders and were asked to have students put all cell phones into the holders during class. Although Julie was observed warning students not to be on cell phones during class, she was not following through with consequences and was not taking advantage of the benefit of following the school-wide cell phone holder procedure. During the coaching session, David provided some constructive criticism to Julie not
following through. According to the field notes, David suggested to Julie that “students will push the boundaries as long as you allow it. They will usually behave much better when you set clear expectations and hold them accountable to meet them.” David explained that trying to be nice and not consistent will cause difficulty in the long-run. He coached her on consistency and following through with the rules, procedures, and consequences. David also noticed some unaddressed, off-task behavior and provided Julie with some guidance on how to address it swiftly and effectively to prevent the problem from perpetuating. He suggested Julie begin by getting students started on a student-centered activity and then quietly talking to the misbehaving student to let them know their behavior would not be tolerated.

During the fourth observation, David noted classroom management was much improved. Student behavior was not an issue and Julie was asking deep, engaging questions throughout the lesson. Julie was walking around the room helping individual students. David noted students seemed to be working diligently on a student-centered activity. She provided helpful feedback to individual students as they worked. She stopped and provided a visual example of one of the problems and asked questions to engage students and check for understanding. “The lesson was going smoothly, the kids were engaged, and they asked great, relevant questions. It is how a class is expected to go.” He commended Julie on the work she accomplished throughout the study and agreed to continue working with her as often as she would like to help her meet her professional goals.

Novice Teacher Interview. Julie was interviewed at the conclusion of the study. She provided detailed answers to all 13 questions included in Appendix E and some
answers to follow-up questions for clarification. Julie shared that her experience in this study was positive and she appreciated the feedback and collaboration. She stated that the combination of the observations and coaching sessions was beneficial to her professional practice. Julie shared “I was thankful for the opportunity to run ideas by David and get specific feedback after he observed in my classroom.” The coaching sessions provided her with much needed constructive criticism. “The collaboration this study, built between the two of us, was amazing because we share [the same content] and could talk specifically about how to engage students in a way that was relevant and meaningful.” She appreciated being able to go to his classroom to watch classroom management strategies and then implement them in her own classroom. One of the main things she noticed that worked well in David’s classroom was the immediate and effective feedback he provided to students throughout the lesson. She said the study provided the needed inspiration for her to challenge herself to do some of the things she has been wanting to do to improve student engagement, academic rigor, and classroom behavior. Julie said “I was looking for a catalyst to really change things up after a rough first semester of the year.” She altered her method of opening class and the seating arrangements as a result of the study. For example, Julie changed the design of the desks and the seating chart in her classroom to move students to more strategic seats. She placed all desks facing the front of the classroom instead of students facing each other. She also began using an opening assignment daily to engage students immediately upon entering the classroom. She shared that this started the class off much more efficient each day because students were engaged from the beginning of class while she was taking attendance. She used this as an opportunity to reset some of the classroom expectations and procedures to improve the
overall functioning of her classroom. “The collaboration and coaching helped grow me as a teacher” Julie stated “it was so beneficial my professional practice.” She did hope that it could continue for the remainder of the year and thought it would continue to improve her skill as a teacher.

**Master teacher-coach Interview.** David participated in an interview at the conclusion of the study. He answered the 13 questions included in Appendix F and some follow up questions. He shared that this was a positive experience and he saw growth in Julie’s classroom throughout the study. His classroom is right beside hers and he noted that he could hear her students pretty easily through the walls. Although not a part of the official study, he noted much improvement in the noise coming from her room signaling an improvement in the classroom management procedures. He did share his thought that continuing this study for a longer period of time would probably be more beneficial than just the six weeks. David said the observations help to uncover some root causes to the issues Julie was experiencing and enabled him to give her advice and strategies to adjust her classroom management practices, engage students in rigorous activities, and hold students accountable for their behavior. “I didn’t notice a change in her teaching style, per se, but rather the way she started and ended class and how she managed students during the class time. She changed her classroom routines to improve classroom management like taking up cell phones, implementing a new behavior management plan, and being consistent with feedback.” David mentioned that he had not been in another teacher’s classroom for over seven years and it was an awesome opportunity to watch another teacher teach. He shared that he believed that this would be a great way to support new teachers and we should normalize peer observations for all teachers because
every teacher can learn and grow from watching others model teaching methods. “I enjoyed the collaboration so much. It was excellent to watch Julie teach and I loved sharing feedback and insights with her. I learned from Julie, too!”

**Student Open-Ended Responses.** On the post-intervention survey, students were provided a space to write open ended comments about their experience in the teacher’s classroom. The open-ended question on the post-intervention survey was meant to provide students an opportunity to share their voice in the research study. A few students left comments about their experience in Julie’s classroom during the six weeks. One student shared: “I like how she kept it simple. She teaches well and doesn’t try to overcomplicate things.” Another student stated: “I like how she helps us when we are struggling.” Overall, the comments left on the survey were positive noting Julie’s strengths of helping students, being easy to understand, and creating fun classroom environment.

**Summary of Julie’s Case.** Julie and David worked specifically on engaging students in rigorous, academically appropriate activities and addressing classroom management concerns. Her students saw the improvement in all three areas she was working on as the increase in parent communication was a direct result of changing up the classroom expectations and classroom management procedures. David and Julie shared they saw improvement in the classroom observation rubric, in the interviews and on the self-assessment. “The main take-away for me” Julie said “was that this was the challenge I needed to push myself to change things up and hold students accountable for their classwork and behavior.” Both David and Julie shared that this experience was a
positive one and looked forward to continued collaboration and working together in the future.

**Themes**

Although every case was unique and presented individual challenges and moments of realization, there were a couple of common themes across all of the cases that were uncovered in the coding process of data analysis. The themes that were consistent among all four cases included the following: a focus on academically challenging tasks or rigor, an appreciation for content-specific coaching, the benefits of the peer observations, and the authentic collaboration this study created. The last theme, the ability to build positive relationships with students, was common among all four of the master teachers.

**Academically Challenging Tasks**

A theme that was uncovered through the data analysis process was the need for academically challenging environments at FCHS. Across all four novice teacher’s classrooms, students and master teacher coaches noted that rigor was an area for growth. Students were not consistently being pushed to think critically and were not being challenged to apply their learning. This was a consistent area of feedback for the novice teachers from the master teacher-coaches and a part of all of the post-intervention interviews. At the conclusion of the study, rigor turned out to be an area that all four pairs worked on through coaching even though it was not what they originally planned to work on. It is also the only area of growth in common for all four novice teachers from the student perspective according to the student surveys. Jessie shared:

I didn’t even know what a DOK was! I had never heard the word rigor and certainly didn’t know it was important. Now, I understand the importance of
building from content knowledge to application of knowledge to using the knowledge in new contexts.

While increasing appropriately academically challenging tasks in novice teachers’ classrooms seemed to be a main concern, it was an area that was able to be influenced positively in all four classrooms in a short period of time. Rebecca shared her learning experience in wait time: “creating an appropriate academic challenge is simpler than I thought it was. It is about asking the right questions and providing multiple opportunities for students to think and ponder over the questions during the lesson.” This was also an area perceived as a strength for all four of the master teacher-coaches from both the administrative and student perspectives.

**Content-Specific Support**

The four novice teachers also found the importance of the coach teaching in the same content area. Although it was not a question in the interview, teachers shared their thoughts that it was incredibly beneficial for the master teacher-coach to be a teacher, not an administrator, and to be working in the same content area. They found their coach was able to provide them with relevant strategies and ideas that they could use immediately in their own classroom. For example, the math teacher-coach was partnered with the novice math teacher and was able to provide content-specific strategies for applying critical thinking questions to math lessons and standards-based instructional practices. According to Jessie “Jammie sharing my same background in the content created immediate respect and provided a common ground to start from. I would say that would be an important consideration moving forward.” It was also helpful to see their master teacher demonstrating instructional strategies in their own area of expertise. Caleb shared that he
was able to see how Matt set up transitions to keep all students on-task and engaged in self-directed activities so there was little to no down time. Julie stated “It was so helpful that my coach taught the same subject as me. He knew when I was missing something in instructional design and was able to provide meaningful and specific feedback that I could actually use in my classroom.” David said “I don’t think this would work very effectively if we taught different subjects. Yes, I could still talk about classroom management or instructional strategies but it certainly wouldn’t be as meaningful.”

Savannah shared her experience as a teacher mentor in the past:

Over the last 28 years, I have been asked to serve as mentor for new teachers a lot. Mentoring is different because it isn’t really based in improving instruction but more about helping new teachers navigate the school and adjust to a new career. However, I am usually partnered with teachers in other subjects to mentor. I am definitely not able to be as helpful and the advice is not as meaningful as this project was.

*Sustainable Peer Support*

The novice teachers also shared their thoughts about the sustainability of this type of professional development and how to maintain this coaching support. All eight of the participants found this research study to be a positive experience noting the benefits of the collaboration and camaraderie found by working together. According to Savannah: “we [teachers] are in the trenches together and that makes all of the difference when you are providing feedback, coaching, and learning together.” The novice teachers shared their thoughts about the dynamic between them and their coach being so beneficial because it was supportive instead of evaluative. “It wasn’t intimidating because it wasn’t
about grading me or scoring me, it was about helping me to improve” Jessie shared. He added “of course, there was some added pressure because another teacher is watching you teach but it was good pressure.” Classroom observations can be intimidating for novice teachers but the set-up of this research study allowed for authentic conversations because both parties had seen the other at work and the conversation afterward was only about growth and development, not scoring or rating. Rebecca stated: “there was a little positive pressure because I knew that Savannah was coming into my room but it wasn’t intimidating because I knew that she was there to help me grow, not to evaluate me to impact my job.” According to the master teachers, it was beneficial for them to watch the novice teachers, too. All four of the master teacher-coaches shared the self-reflection the peer observations provided and the benefits of having the opportunity to watch another teacher teach. Savannah shared her thought that this type of professional development was sustainable because it didn’t cost the school anything and left all participants better than when they started. She said: “This was a positive experience. Much more so than any classroom style professional development I have ever attended. It was an excellent use of my time and I would definitely participate again.”

*Authentic Collaboration*

The next theme to arise from coding the data was the idea of authentic collaboration. Although FCHS has Professional Learning Communities, teachers do not observe in each other’s classroom or participate in any type of coaching or instructional mentoring. All eight participants shared collaboration as a positive take-away from this study. Novice teachers thought it added a layer of support they needed for lesson planning and instructional design and the master teachers shared the reflection this study
caused them to have about their own instructional practice. More than that, though, it became an opportunity to build a relationship with their co-workers. According to Rebecca: “Teaching is a really tough job! Especially when we consider everything we should be doing and what impact we can have on students. This opportunity took away the pretense and allowed us to work together authentically.” She added:

When asked to work with others in the past, there has always been a little bit of a wall when it comes to being vulnerable with my weaknesses. Because Savannah was in my classroom, there was no sense in hiding my inadequacies. I just put it out there and it ended up being great.

Matt shared:

I really enjoyed getting to know Caleb. Although our classrooms are directly across from one another, we did not really work together or collaborate prior to this study. The study is over, but we are still in each other’s classrooms several times every day.

**Master Teachers’ Positive Student Relationships and High Expectations**

An area of note for all four master teachers was their ability to build positive relationships with students. In looking for commonalities among the master teacher-coaches, the novice teachers all shared separately the impact of relationship building on the classroom environment and classroom management. Building structured and positive relationships with students is a skill that can take time to develop. The master teachers were described by their partner novice teachers as having high expectations for all students to create a supportive and welcoming environment for students to ask for clarification, feedback, and support as needed. Julie shared, “I always thought positive
relationships with students looked a little more permissive, but after going into David’s classroom, I now know that it is not permissive at all. In fact, he holds students to incredibly high standards for classroom behavior and performance, but he interacts with them in a positive and encouraging manner.” It seemed to be a lesson learned through observation instead of coaching for all four of the novice teachers. Rebecca shared that she “caught more than she was taught” in the process. “I cannot thank you enough for arranging for me to observe her. She taught me so much! It was great to watch her in her element. The peer observations ended up being even more beneficial than the coaching process.” She got to see what it looks like to build relationships with students while still holding them accountable for learning. Students shared their experience in the master teachers’ classrooms as tough but great, and novice teachers observed the same. The common theme was the high academic expectations the master teachers held but also the kindness and appropriate support for students to meet the expectations they provided.

This case study was organized for the purpose of investigating the effectiveness of peer observations, reflection, and coaching on the practice of novice teachers at FCHS. The study included four novice teachers from FCHS paired with four master teachers from respective departments. Data were collected from student surveys, self-assessments, field notes, observation rubrics, and interviews. There were several themes that arose from the data analysis: the need for academically challenging environments at LCHS, the importance of the coach and teacher sharing the same content area, the sustainability of this peer support, authentic collaboration and the importance of building positive student relationships. In the final chapter, the implications of the findings and recommendations for future research will be discussed.
CHAPTER 5

DISCUSSION

The problem of practice for this research study was rooted in the differences observed in various classrooms at Friendship County High School (FCHS). The purpose of this convergent mixed methods case study was to investigate the effectiveness of peer observations, reflection, and coaching on the practice of novice teachers at FCHS. Every teacher has unique background experiences and education that influence their approach to professional practice. Therefore, they require specific types of professional development and support that are relevant to their individual circumstances. School leaders are tasked with finding or designing professional development to support the staff in their school in order to benefit student outcomes and teacher morale. This research study included an intervention that involved content-specific and job-embedded coaching and peer observations of novice teachers by master teacher-coaches. The theoretical framework for this study was based in Adult Learning Theory, Theory of Andragogy, Theory of Learning Organization, and Social Cognitive and Observational Learning Theory in order to build a professional development model that was job-embedded, personalized, and in an environment conducive for this growth and development.

The convergent mixed methods case study research design involved eight teachers at FCHS: four master teachers and four novice teachers. The cases were investigated in-
depth by collecting quantitative and qualitative data at the same time in order to answer the following research questions:

RQ1: What do highly effective high school academic teachers do that make them so successful in their professional practice?
RQ2: What impact will an intervention of coaching by highly effective teachers have on the practice of novice teachers?
RQ3: What impact will an intervention of highly effective teachers coaching novice teachers have on the students in novice teachers’ classrooms?

Discussion of Findings

The findings of the study will be shared in the following section by case and by research question since each of the cases were unique and provided insights to reach the conclusions of the study.

Rebecca’s Case

According to the quantitative data collection methods, Rebecca’s major growth areas, according to her self-assessment, were “Instructional Planning,” “Instructional Strategies,” and “Communication.” Her overall mean growth from the pre-self-assessment to post self-assessment was positive. From the student perspective, the major area of growth for Rebecca was in “Academically Challenging Environment” and in “Communication.” From the master teacher-coach perspective, the major areas of growth for Rebecca were in “Instructional Planning,” “Instructional Strategies,” “Differentiated Instruction,” and “Academically-Challenging Environment.” Her overall growth for the TKES TAPS rubric observation was positive over the six-week study. According to the qualitative data, Rebecca found the experience positive and believed that the peer
observations and coaching had a positive influence on her classroom. Rebecca found the partnership to be a productive way to support her growth and development.

*Caleb’s Case*

Caleb was a novice academic teacher at FCHS. He noted his perceived areas of need in “Professional Knowledge,” “Instructional Planning,” “Academically Challenging Environment,” and “Communication,” and he wanted to work on transitions between activities and developing academically appropriate tasks in his classroom with his coach, Matt. According to his self-assessment, Caleb showed growth in “Professional Knowledge,” “Instructional Planning,” “Academically Challenging Environment,” and “Communication.” Overall, he showed positive growth from pre- to post-self-assessment. According to the student surveys, Caleb showed growth in developing an “Academically Challenging Environment.” According to his coach, Caleb improved in “Academically Challenging Environment,” “Differentiated Instruction,” and “Assessment Uses.” His overall TKES TAPS rubric scores improved from the first observation to the final observation. Finally, according to the qualitative data, this project was a positive experience for Caleb, and both his coach and his students perceived a positive difference in the classroom environment.

*Jessie’s Case*

Jessie was a novice academic teacher. He wanted to learn about classroom management, student engagement, and developing rigorous classroom activities with his coach, Jammie. According to Jessie’s self-assessment, the only constant was his confidence in his “Professional Knowledge.” Jessie rated himself as needing the most growth in: “Instructional Planning,” “Instructional Strategies,” “Assessment Uses,” and
“Academically Challenging Environment.” Jessie rated himself as showing growth in “Instructional Planning,” “Academically Challenging Environment,” and “Positive Learning Environment.” Jessie lost confidence in his skills in both “Differentiated Instruction” and “Assessment Strategies” from the beginning of the study to the end. Overall, his pre-intervention to post-intervention self-assessment did improve slightly. According to the student survey, Jessie showed improved skills in: “I feel academically challenged in this class,” “I receive feedback in this class,” and “My teacher communicates with me and my parents through SchoolStatus.” Students saw a major difference in the classroom procedures and demonstrated this by rating “I understand the rules and procedures in the class” lower at the conclusion of the study. Jessie’s coach did not see improvement according to scores on the TKES TAPS rubric and, in fact, rated his classroom practices as getting worse throughout the study. The qualitative data helped to explain the complexity of this case. Jessie shared that this was overall a very good experience, but seeing great teaching overwhelmed him with everything he needed to work on in his own classroom. His coach shared that she could see Jessie was making efforts to improve his classroom management and instructional design but needed much more time to practice these skills. According to his students, Jessie’s class improved throughout the study, and they found it an engaging, fun, and interesting place to learn.

Julie’s Case

Julie was a novice academic teacher. She wanted to work on classroom management, addressing students’ individual needs, keeping students busy, and actively working on academically rigorous and appropriately challenging activities until the end of the class period with her coach, David. Julie rated her growth areas on the pre-
intervention self-assessment as “Instructional Strategies” and “Differentiated Instruction.” Julie’s self-assessment showed her own perception of her growth throughout this study in “Instructional Strategies,” “Differentiated Instruction,” “Academically Challenging Environment,” and “Communication.” Overall, Julie’s self-assessment improved from the beginning to the end of the study. Surveys showed her students’ perceptions that Julie improved in the following areas: “I feel academically challenged in this class,” “I receive feedback in this class,” and “My teacher communicates with me and my parents through SchoolStatus.” According to her coach, Julie showed growth in “Academically Challenging Environment,” “Professional Knowledge,” and “Assessment Uses.” Her overall score on the TKES TAPS rubric increased from the beginning of the study to the end. According to Julie, this experience was positive, and she enjoyed the collaboration and coaching activities. The intervention provided the support Julie needed to make positive changes to her classroom management and instructional design. Additionally, students and Julie’s coach perceived positive changes in her classroom throughout the semester.

**Research Questions**

The primary purpose of this mixed methods case study was to investigate the qualities, attributes, and actions of highly effective teachers in order to determine what, if any, characteristics these teachers have in common and if those attributes can be developed in other teachers through peer coaching. The study was designed to include an intervention of coaching that would utilize the expertise and experience of the master teachers; therefore, the study paired them as coaches of novice teachers in order
to encourage growth in student engagement and schoolwide achievement and outcomes.

**Research Question One**

RQ1: What do highly effective high school academic teachers do that make them so successful in their professional practice?

A key finding from this study is an insight into what great teachers do differently that make them so successful with students. Conversations with students and comments from novice teachers all point to two elements all four master teachers in this study have in common, the ability to connect with students and the commitment to creating engaging, academically challenging learning experiences.

The most straightforward answer from this study is that, in part, teachers are great because they build positive relationships with students. This is evident from talking with their students. Great teachers care about students, take an interest in them, provide appropriate support and development for their learning, and make them feel welcome. This is also evident from the novice teacher's comments at the conclusion of the study. The novice teachers observed the interactions the master teachers had with their students and were able to take away implications for their own practice. Building a positive learning environment is not about being permissive or sacrificing academic challenge, it is about getting to know the students in the classroom, their goals and needs, and checking in with them frequently.

The master teacher participants in this study consistently teach with engagement, rigor, and relevance. From the student perspective, the master teachers are some of the toughest teachers they have had the opportunity to learn from. Master teachers who
practice these skills daily are the best qualified to support novice teachers in developing the ability to teach with high expectations of academic performance (Pianta et al., 2021). Highly effective teachers hold themselves and their students accountable to stretch, grow, and push to meet higher standards of achievement (Whitaker, 2020).

The commonalities between the master teachers in this study were their relationships with students, engaging lessons, and consistency in academically centered classrooms with high expectations. To these master teachers, building relationships with students was not about being friendly but being more about holding students accountable, being interested in their educational needs, and providing appropriate challenge and support. This information was also confirmed from master teachers’ students’ perspectives in which the master teachers were described as tough and kind. The general comments were about the master teacher caring about students, pushing them to be successful, and providing appropriate support and encouragement.

The highly effective teachers involved in this study were willing to open their classrooms, share their expertise, and coach novice teachers. Novice teachers shared that their major takeaways from this study were the power of learning by watching the master teachers in action and subsequently having a partner in the learning process with them to guide their growth and development. If educational leaders want to support the staff in their school, the starting point would be to create an environment that encourages teachers to collaborate, work together, and seek ways to improve the school.
Research Question Two

RQ2: What impact will an intervention of coaching by highly effective teachers have on the practice of novice teachers?

The impact on the professional practice of the novice teacher depends on several factors: their professional goals and growth mindset, their openness to develop a plan, their own self-reflection, the relationship they build with their coach, and their willingness to be vulnerable and desire to make changes. In the present research study, novice teachers were open to working with their master teacher-coach and the findings show that their practice was impacted by the coaching in several ways including: personalized learning goals, relevant and job-embedded support, and improved collaboration.

One of the hallmarks of effective professional development is that the learning experience is personalized for each teacher (Darling-Hammond et al., 2017). This could be managed through self-assessment, personalized goal setting, and individualized professional growth plans. One of the ways to make sure learning experiences are personalized, meaningful, and hands-on is through coaching (St. Clair, 2019). In the present study, teachers were asked via a self-assessment and coaching session for their professional goals and growth areas. They were able to build a personalized development plan with their master teacher-coach to work on any area of need. One of the first takeaways from investigating what areas novice teachers wanted to work on and develop was consistent: building engaging, academically challenging classrooms. All four novice teachers were coached over six weeks by master teacher-coaches in developing academically challenging classroom environments. The results were measured by the
novice teachers through their post-intervention self-assessment. Three of the four teacher participants rated themselves as showing growth in developing an “Academically Challenging Environment.” The third teacher rated herself as confident in “Academically Challenging Environment” on the pre-assessment, and although she and her coach worked on rigor, she could not rate the area any higher to show growth. In addition, all four novice teachers’ students rated “I feel academically challenged in this class” as improved from the pre-intervention to the post-intervention survey. This was the only area that all four teachers worked on, and all four teachers showed growth from the student perspective.

It is notable that all four novice teachers showed growth on their self-assessments throughout the study. They all rated their practice as improved from the pre-assessment to the post-assessment. Based on these findings, the study preliminarily shows that peer coaching led by a master teacher can positively impact the teaching practice of a novice teacher. Although the novice teachers did not report their goal was completed, they all reported they were in-progress and that coaching was beneficial in supporting their growth and development throughout the study. This takeaway is supported through the novice teachers’ own self-assessment data. More importantly, though, the novice teachers described the personalized support provided through the peer coaching as a positive experience that they wanted to continue. Professional development that includes job-embedded coaching is effective in changing the practice of teachers when it is based on those teachers' identified needs and wants. Educational leaders should ensure they allow for professional development to be personalized and deeply rooted in the goals of the staff.
Given that the novice teacher is open to collaborate and grow, the recommendation from the participants in this study was for the master teacher-coach to be from the same academic content area as the novice teacher. All four novice teachers and all four coaches shared separately their thoughts that the shared content area was a key piece of being able to build meaningful collaboration and work constructively to improve teaching and learning in a relevant and authentic way. The participants in the present study noted the benefit of the shared content-area expertise in supporting their growth and development. During this study, the content-specific support provided a starting place for authentic collaboration between the novice teacher and their master teacher-coach. The unique part of this intervention was the self-reflection the peer observations provided for both the novice teacher and the coach. All participants were able to take away instructional practices they could implement in their own classrooms. All eight teachers shared their thoughts about this being an essential part of the success of coaching because the shared content area allowed the coaching conversations to be rooted in specific, relevant, and meaningful support. A key takeaway for educational leaders is to establish coaching partnerships within content areas so the partners can use the shared content expertise as a starting place.

The peer observations created authentic conversations – it removed the pretense that may otherwise be present in coaching conversations. Because both teachers witnessed the other in practice, they were able to talk frankly and honestly about strengths and weaknesses. The collaboration provided through this intervention had a positive impact on the practice of novice teachers. Even when they might have otherwise avoided focusing on their perceived weaknesses, this study produced an authenticity that
may not otherwise have occurred. All eight teachers agreed they were able to build relationships with their partners, collaborate from a place of honesty and openness, and learn together. A finding from this study that can inform the practice of educational leaders is that peer observations are worthwhile. This practice not only provides an opportunity to learn through watching a master teacher at work but also provides a level of authenticity in coaching not typically offered through traditional professional development. All four of the novice teachers shared that peer support in this study offered reassurance. They were asked to open the doors of their classroom for the intervention, and that can be intimidating can be for any teacher. However, their coach was also a teacher and that provided a level of comfort and allowed them to take risks and try new things. The peer support provided a safety net for novice teachers to be vulnerable and open to growth and development. They were more receptive to admitting areas they needed to work on and felt confident that the support was about growth and not evaluation. In addition, they were able to learn through observation which had a positive impact on their perception of their growth throughout the study. Although it may be intimidating for educational leaders to relinquish control of professional development, the fact that no administrator was involved in the observations or coaching sessions positively impacted the receptiveness of the novice teachers to the process and, consequently, their practice.

Although all of the teachers agreed that professional collaboration and working together was a positive experience for this study, they also all shared that six weeks was not enough time for teachers to make significant changes in their instructional practices and see the benefits from the changes.
**Research Question Three**

RQ3: What impact will an intervention of highly effective teachers coaching novice teachers have on the students in novice teachers’ classrooms?

Academic Rigor was ranked by students as one of the most pressing concerns in novice teachers’ classrooms. One the pre-intervention student survey, “I feel academically challenged in this class” was the lowest scored area in all four novice teachers’ classrooms. When students are not challenged academically, it can result in classroom management issues, problematic student behavior, and student disengagement. All four of the new teachers worked on rigor and increasing the DOK level of the assignments and projects in their classes during the six-week study, and it was the only area all four teachers showed improvement from the student perspective. Students in novice teachers’ classrooms noticed the change in their teachers’ attention to developing engaging, academically challenging lessons during the study. The impact of teacher expectations was explored through this study and cannot be understated. When teachers increase the depth of knowledge and rigor they build into lessons, students are provided with learning experiences that do not end after the test. (Boyles, 2018). Teachers raising the rigor of their daily lessons and increasing their academic expectations of students has a positive impact on student outcomes and perception of the educational experience (Acton, 2022; Dong et al., 2017; Lai & Cheung, 2015; Tonich, 2021). Supporting the novice teachers in the development of rigorous and engaging lessons through coaching by a master teacher was an effective method of teacher professional development.
Theoretical Framework

Adult Learning Theory and the Theory of Andragogy were explored and used as a framework for developing an intervention for this study that would meet the needs of the novice teachers at FCHS. Professional development for adults should involve relevant learning experiences with great respect for their background and experiences because adults have different motivations for learning and varying needs and approaches to learning (Lindeman, 1926). The Theory of Andragogy is an approach to adult learning involving mentorship and facilitation of relevant learning experiences and reflection (Cox, 2015). Coaching is an example of this type of mentorship and reflection as long as it is centered in the needs of the participants and the participant has choice in the learning process (Knowles, 1984). What adults need and want to learn should be explored through self-assessment and goal-setting. After building a positive culture and climate in the school, educational leaders can get to know their staff and find out their needs. A great next step for a leader looking to build and support an effective instructional staff is to intentionally and regularly talk to teachers, foster self-assessment and goal setting, and use the information to develop individualized support plans for their teachers (Blackburn, 2013; Gentrup et al., 2020; Trang & Hansen, 2021).

The Social Cognitive and Observational Learning Theory was investigated and used as a framework for this study, and it was the source intervention of the peer observations. Direct instruction is not the sole source of learning; substantial learning can occur from people observing other people (Bandura & Walters, 1977). Novice teachers and master teacher-coaches each observed in their partner’s classroom throughout the study. A key takeaway from the study was the impactful learning experience provided to
the novice teachers through peer observations. A step for a leader looking to build and support an effective instructional staff is to intentionally and regularly talk to teachers, foster self-assessment and goal setting, and use the information to develop individualized support plans for their teachers (Blackburn, 2013; Gentrup et al., 2020; Trang & Hansen, 2021).

As explained throughout this discussion, this study was rooted in Senge’s Theory of Learning Organization which states that all adults have the ability and capacity to learn but do not always have the drive or desire to do so, and their drive and desire to learn can be influenced by the environment in the workplace (1990). In a well-functioning organization, team members are willing and motivated to improve themselves and work together to grow and develop their team and improve the organization for everyone. The entire organization or system learns together when the individuals in it learn, grow, and share (Senge, 1990).

The school culture, climate, and environment can be positively or negatively impacted by the leadership in the school (Acton, 2022; Dong et al., 2017; Lai & Cheung, 2015; Tonich, 2021). While the school leader is not the one who directly impacts the student experience in the classroom, the leader is the one who creates the environment for the teachers in the school. The teacher and coach participants in this research study were willing and motivated to work together for the growth and development of their team members and the school as a whole.

Implications of the Findings

Effective professional development belongs in every school (Darling-Hammond, 2008). Peer coaching and classroom observations are two effective and sustainable means
of supporting teachers (St. Clair, 2019). The present study also shows that peer coaching and observations are feasible to organize and implement as a part of the regular school day. An understanding of how to design, implement, and evaluate a framework of teacher support is essential for educational leaders (Darling-Hammond et al., 2017; St. Clair, 2019). School principals cannot simply assign novice teachers a coach and consider the job done. First, the culture and climate of the school has to be conducive to authenticity, trust, and collaboration (Acton, 2022; Dong et al., 2017; Lai & Cheung, 2015; Robbins, 2015; Tonich, 2021). All participants in the present study said the environment at FCHS was essential to the success of their coaching partnership. In addition, master teachers and instructional leaders need training in effective coaching (St. Clair, 2019). Since shared content was found to be an essential component of successful coaching, leaders should strategically develop teachers in all content areas to build their capacity and ready them to work with other teachers. Observing in a teacher’s classroom before discussing growth opportunities breaks down walls and creates genuine conversations (Robbins, 2015). Time must be made in the school schedule to facilitate the peer observations in order to build a firm foundation for the coaching process (Robbins, 2015). Including the voices, needs, and ideas of the instructional staff should be involved throughout the process to ensure teachers have agency in their growth and development (GaDOE, 2022). Monitoring this process through feedback and frequent check-ins with staff is part of ensuring this professional development is meeting the needs of the staff (Darling-Hammond et al., 2017).


Significance

Teachers who have a combination of strong pedagogical skills and positive dispositions in their interactions with students are considered master teachers; this consists of an engaging and rigorous classroom environment, support and encouragement, and great communication skills (Akram, 2019; Connor & Cavendish, 2020). There are students in classrooms at FCHS who are missing out on one or more of these components of effective teaching. This research study is significant not only to the personal, professional practice of the researcher as an educational leader and administrator but also to the teachers and students of FCHS. The results show the intervention of coaching and peer-observation of novice teachers by highly effective teachers is effective in improving classroom instruction which may bolster support for the school system to agree to a longer trial with additional participants to engage in this critical feedback and practice cycle. Research shows the classroom disparities observed at FCHS are similar to those at other schools throughout the nation. (Chingos & West, 2011; Donaldson, 2013; Kraft et al., 2018; Leggett & Smith, 2019;Muijs et al., 2014). If that is the case, this research may provide insights that are useful to replicate in other school settings.

The findings from this study need to be embedded in the current body of research on effective teacher support and professional development. The results of this study are echoed in the findings of Hsieh et al. (2021), Johnson et al. (2017), Arnau et al. (2004), and Parker et al. (2014). Research by Hsieh et al. (2021) states the impact of peer coaching on teachers’ practice. Results showed that student perceptions of teachers improved during the study, and students in those classes outperformed their peers (Hsieh
et al., 2021). Overall, peer coaching improved the teachers’ practice and caused reflection for both the coached novice teachers and their coaches (Hsieh et al., 2021). The present study affirmed the reflection the peer observations caused for the participants and coaches. According to Johnson et al. (2017), peer coaching is a cost-effective and sustainable way to support classroom teachers. The findings suggest that a peer coaching program is an acceptable method of teacher professional development and that it may strengthen student–teacher interactions (Johnson et al., 2017). The present study supports the findings of Johnson et al. (2017) that peer coaching is potentially a well-received and sustainable method of developing novice teachers (Johnson et al., 2017). Arnau et al. (2004) investigated a voluntary peer-coaching program at a high school, researchers concluded that participants found the work worth the effort (Arnau et al., 2004). After first building a relationship with their partner, they appreciated the meaningful feedback, grew positively from the peer observations, built trust and transparency, and developed their skills in pedagogy (Arnau et al., 2004). These results are echoed in Parker et al. (2014), where researchers found that relationship building is an often overlooked but essential prerequisite to create a climate conducive to shared growth and learning. Once the effective environment was established, participants were able to use peer coaching as a catalyst to grow and develop their instructional skills (Parker et al., 2014). In the present study, teacher participants shared the need to building relationships, and all shared that peer coaching was a positive experience that provided authentic collaboration and collegial relationships. Further supporting the conclusions in Arnau et al. (2004).

In the present study, the novice teachers improved in their self-assessments of their skills and shared improved professional relationships with their coaches at the
conclusion of the study. The master teacher-coaches took away professional self-reflection and authenticity in working with their partners. This study indicates that peer coaching with peer observations is a positive way to engage teachers in professional development and can support them in working on their professional goals. The Adult Learning Theory, the Theory of Andragogy, the Social Cognitive and Observational Learning Theory, and the Theory of Learning Organization are the four cornerstones for developing the framework for an effective peer coaching paradigm. Although limited by a small sample size and a short timeframe, the present research study supports the literature that effective peer coaching can be a sustainable and productive way to develop teachers.

**Limitations**

There were some limitations to this research study that could be addressed in future studies to improve the reliability of the findings. The first limitation of the study was the role of the researcher as an administrator in the school system, which could have increased the pressure on the participants. Because the researcher was an insider in the school, it was more difficult to separate the prior knowledge of the staff and students involved in each case (Herr & Anderson, 2015). In order to mitigate this pressure, I did not participate or observe during classroom instruction or during the coaching sessions. The purpose of this separation was to allow authentic conversations to take place between the master teacher-coach and the novice teacher.

The small-scale nature of the study was a limitation. The nature of the case study required a small number of participants so the results could be shared in detail. However, this limitation could be reduced by increasing the number of participants. An additional
limitation of this study that could keep the results from being interpreted more broadly was the largely homogenous faculty and student population in the school. The faculty and students at FCHS are not representative of the general population of public schools in the United States and generalizations from the conclusions of this study may not be applicable to other school settings.

The short duration of the study was not ideal for professional development. To be the most effective professional development should be consistent over a longer duration, such as a school year (Zepeda, 2019). The participants in the study all shared their need and desire for additional time for collaboration, coaching, observations, practice, and reflections. All eight participants shared in the interview that six weeks was not enough time to make a significant impact, and they would recommend continuing to work together for the remainder of the school year, at a minimum. Jammie said “six weeks was not enough time. We just started getting to the root of the issue and the study was over. We need more time.” Rebecca shared “we need to do this for every new teacher but for the whole year instead of just six weeks. The time was too short to see the real impact of the coaching.” All eight teachers desired the work to continue. The nature of the action research required a controlled time frame for the study to take place. In practice, it would be ideal for the coaching pairs to be established at the beginning of a school year and for the observations, coaching, and support to last the entirety of the year. This limitation could be addressed by starting the coaching process at the beginning of the school year and maintaining the program throughout the year.

The final limitation of the study was the timing of the student survey. The initial student survey was administered in the first week of the spring semester at FCHS, and
students had been in their new classes for between one and four days prior to filling out the survey. Since this is not much time to get to know the regular operation of the classroom or become familiar with the teacher, it could influence the pre-intervention student survey. This could be addressed by timing the survey later into a semester to give time for teachers and students to learn the routines and dynamics of the class.

**Action Plan**

This research study was interesting and invigorating for my professional practice. If I were to replicate this study, there are parts of the research design I would change. I would identify master teachers in every content area who would be willing to coach a novice or emerging teacher. I would arrange coaching training for the master teachers to develop their skills. Other than a brief orientation to the study and the data collection methods, and coaches for this study were not formally trained. Next, I would build a structured yearlong program in which novice and master teachers were partnered together with common planning periods for coaching and collaboration. This study was designed to last six weeks, and the major finding from all eight participants was that this was not enough time to see the impact of coaching. I would also include methods of assessing throughout the study and an evaluation at the conclusion of the study. I would remove the rubric (Appendix D) from the classroom peer observations and focus more on the qualitative perspective of the study. According to the master teacher-coaches, the focus they had to place on scoring the teacher observations on the rubric scores took away their focus from the field notes. The conversations with teachers and students could provide a much richer description of the dynamics of the coaching process. I would include
quarterly checkpoints for teachers, coaches, and students involved in the study. Lastly, I would evaluate the program’s effectiveness after yearlong implementation.

**Future Research**

This study was conducted at a small, rural high school in North Georgia. It would be informative to repeat this study at the elementary and middle schools. In addition, it would be helpful to replicate the study in different high schools in Georgia over a longer timeframe to determine if the results of the coaching process support teachers and students with different populations of students and teachers. In the present study, several themes emerged: the benefits of personalized goal setting and support, the importance of content-specific coaching, the improvement of rigor and depth of teaching and learning, and the authenticity that peer observations created. Replicating the study should investigate if the same themes emerge. The present study did not include a mechanism to investigate the culture and climate of the school environment. Culture and climate impact the ability of coaching to impact teacher effectiveness and it would need to be addressed separately before beginning the study (MacNeil et al., 2009).

**Conclusions**

The quality and skill of the teacher in the classroom are among of the most important factors to student success and positive educational outcomes (Akram, 2019; Ingersoll, 2004; Kraft et al., 2018; Muijs et al., 2014; Rivkin et al., 2005; Slater et al., 2012; Stronge et al., 2011). In order to meet the demands of the role of educating, teachers need effective support (St. Clair, 2019). Creating this support mechanism is one of the educational leader’s most important roles in school improvement. This cannot be accomplished without first attending to the culture and climate of the school (MacNeil et
Research indicates that for professional development to be effective, it must be job-embedded, content-specific, relevant, and collaborative (Darling-Hammond et al., 2017). It should also have a mechanism for feedback, reflection, and hands-on practice (Darling-Hammond et al., 2017).

Most administrators at the school level are able to observe different classrooms. Through these informal observations, a discrepancy in the levels of engagement, learning, and rigor from classroom to classroom was discovered at FCHS. The purpose of this action research study was to evaluate the interventions of peer observation and coaching as practical and sustainable methods for addressing the inconsistencies from classroom to classroom at FCHS. This study analyzed the qualities, characteristics, and skills of highly effective teachers and explored how the use of peer observations and coaching relationships influenced the development of those qualities, characteristics, and skills in novice teachers. The findings illustrated the importance of content-specific peer support for novice teachers and the authenticity that peer observations created in the coaching conversations. Although this was a small case study with limited participants, all eight teachers involved found this to be a positive and impactful experience for reflection and growth.
REFERENCES


Blackburn, B. R. (2013). *Rigor is not a four-letter word*. Eye on Education.


districts: How do schools respond to differences in teacher effectiveness?

digital revolution and schooling in America*. Teachers College Press.

learning disabilities about teacher effectiveness in high school inclusive


and mixed methods approaches*. Sage publications.


policy analysis archives, 8*, 1-1.

for intelligence, 2*(1), 91-100.

professional development*. Learning Policy Institute.


Hansen, J. Ø., Jensen, A., & Nguyen, N. (2020). The responsible learning organization:
Can Senge (1990) teach organizations how to become responsible
innovators?. The Learning Organization.

students and faculty. Los Angeles, CA: Sage.

Education Press.

Holt-Reynolds, D. (2000). What does the teacher do?: Constructivist pedagogies and
prospective teachers’ beliefs about the role of a teacher. Teaching and teacher
education, 16(1), 21-32.

teachers’ practice and their students’ scientific competencies. Research in
Science Education, 51, 1569-1592.

Ikromova, A. A. (2020). The concept of pedagogical skills, its role and importance in

Ingersoll, R. M. (2004). Four myths about America's teacher quality problem. Teachers
College Record, 106(13), 1-33.

guide for partnering with early childhood teachers. National Association for the
Education of Young Children.

student–teacher interactions: Exploring a peer coaching model for teachers in a


Dear Parent/Guardian,

My name is Whittney McPherson and I currently work as the Director of Finance for Friendship County Schools. For the last 5 ½ years, I worked at Friendship County High School as the Assistant Principal for Curriculum and Instruction. I am a Doctoral student at the University of South Carolina and I am in my last year of the program. To meet the requirements of the Ed. D program at the University of South Carolina, I am conducting a research study at Friendship County High School this spring.

The goal of this research is to support teachers through coaching to work towards “Peak Performance” in classroom instruction and student support. In order to reach this goal, I need to collect observation notes and survey data on classroom engagement, academic rigor and academic performance.

Your child’s teacher has volunteered to participate in the research project and I would like your student to participate in the data collection on teacher effectiveness. This would require your student to take two google form surveys, one at the beginning of the quarter and one at the end of the quarter. The survey is focused on student perception of the classroom environment and instructional practices of the teacher. Your student may also be present in the classroom during regular instruction while the coach is observing your child’s teacher. The focus of the observation is teacher behaviors, not student behaviors.

The study will not change anything about your student’s schedule or ability to learn the course content. If you give permission for your child to participate, their personal information will remain confidential and no identifying information will be used in the publication of the dissertation.

Your student’s participation in the study is optional and they can be opted out of filling out the survey. Your student may also leave the study at any point during the data collection period without consequences. I would be happy to discuss this research project with you further if you have any questions. I can be reached at whittney.mcpherson@friendshipschools.com. Dr. Toni Williams is my USC faculty advisor and she can be reached at TMWILLI2@sc.edu.

This research project will occur during your child’s regularly scheduled class and your child’s personal information will remain confidential. You only need to return this letter if you do not want your child to participate in the research project. If you are opting your student out, please return this letter to Whittney McPherson via email by January 15, 2023.

Sincerely,

Whittney McPherson
whittney.mcpherson@friendshipschools.com

_____ I do not consent to my child participating in this study.

Parent Signature __________________________________________ Date ____________
### APPENDIX B

**NOVICE TEACHER SELF-ASSESSMENT**

<table>
<thead>
<tr>
<th>Self Assessment for</th>
<th>Level</th>
<th>Level</th>
<th>Level</th>
<th>Level</th>
</tr>
</thead>
<tbody>
<tr>
<td>Planning</td>
<td>IV</td>
<td>III</td>
<td>II</td>
<td>I</td>
</tr>
<tr>
<td>1. Professional Knowledge - The teacher demonstrates an understanding of the curriculum, subject content, pedagogical knowledge, and the needs of students by providing relevant learning experiences.</td>
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<td></td>
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<td></td>
</tr>
<tr>
<td>Strengths:</td>
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<td>Level</td>
<td>Level</td>
<td>Level</td>
</tr>
<tr>
<td>Area for Growth:</td>
<td>IV</td>
<td>III</td>
<td>II</td>
<td>I</td>
</tr>
<tr>
<td>2. Instructional Planning - The teacher plans using state and local school district curriculum and standards, effective strategies, resources, and data to address the differentiated needs of all students.</td>
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<tr>
<td>Strengths:</td>
<td>Level</td>
<td>Level</td>
<td>Level</td>
<td>Level</td>
</tr>
<tr>
<td>Area for Growth:</td>
<td>IV</td>
<td>III</td>
<td>II</td>
<td>I</td>
</tr>
<tr>
<td>Instructional Delivery</td>
<td>Level</td>
<td>Level</td>
<td>Level</td>
<td>Level</td>
</tr>
<tr>
<td>3. Instructional Strategies - The teacher promotes student learning by using research-based instructional strategies relevant to the content to engage students in active learning &amp; to facilitate the students' acquisition of key knowledge &amp; skills.</td>
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<tr>
<td>Strengths:</td>
<td>Level</td>
<td>Level</td>
<td>Level</td>
<td>Level</td>
</tr>
<tr>
<td>Area for Growth:</td>
<td>IV</td>
<td>III</td>
<td>II</td>
<td>I</td>
</tr>
<tr>
<td>4. Differentiated Instruction - The teacher challenges and supports each student's learning by providing appropriate content and developing skills which address individual learning differences.</td>
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<tr>
<td>Strengths:</td>
<td>Level</td>
<td>Level</td>
<td>Level</td>
<td>Level</td>
</tr>
<tr>
<td>Area for Growth:</td>
<td>IV</td>
<td>III</td>
<td>II</td>
<td>I</td>
</tr>
<tr>
<td>Assessment of and for Learning</td>
<td>Level</td>
<td>Level</td>
<td>Level</td>
<td>Level</td>
</tr>
<tr>
<td>5. Assessment Strategies - The teacher systematically chooses a variety of diagnostic, formative, and summative assessment strategies and instruments that are valid and appropriate for the content and student population.</td>
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<tr>
<td>Strengths:</td>
<td>Level</td>
<td>Level</td>
<td>Level</td>
<td>Level</td>
</tr>
<tr>
<td>Area for Growth:</td>
<td>IV</td>
<td>III</td>
<td>II</td>
<td>I</td>
</tr>
</tbody>
</table>
6. Assessment Uses - The teacher systematically gathers, analyzes, and uses relevant data to measure student progress, to inform instructional content and delivery methods, and to provide timely and constructive feedback to both students & parents.

Strengths:

Area for Growth:

Learning Environment

7. Positive Learning Environment - The teacher provides a well-managed, safe, and orderly environment that is conducive to learning and encourages respect for all.

Strengths:

Area for Growth:

8. Academically Challenging Environment - The teacher creates a student-centered, academic environment in which teaching and learning occur at high levels and students are self-directed learners.

Strengths:

Area for Growth:

Professionalism and Communication

9. Professionalism - The teacher exhibits a commitment to professional ethics and the school’s mission, participates in professional growth opportunities to support student learning, and contributes to the profession.

Strengths:

Area for Growth:

10. Communication - The teacher communicates effectively with students, parents or guardians, district and school personnel, and other stakeholders in ways that enhance student learning.

Strengths:

Area for Growth:
APPENDIX C

STUDENT PRE AND POST SURVEY
Survey Questions

In this section, please rate your agreement with each statement on a 1 to 5 scale. For this survey a "1" represents Never and a "5" represents Always.

I feel welcome in this class. *

1  2  3  4  5
Never
Always

I am engaged in the learning activities in this class. *

1  2  3  4  5
Never
Always

I feel academically challenged in this class. *

1  2  3  4  5
Never
Always
I feel supported in this class. *

1 2 3 4 5
Never □ □ □ □ □ Always □

I understand why I am doing to tasks I am doing. *

1 2 3 4 5
Never □ □ □ □ □ Always □

I feel like my teacher respects and values me. *

1 2 3 4 5
Never □ □ □ □ □ Always □

I receive feedback in this class. *

1 2 3 4 5
Never □ □ □ □ □ Always □
The classroom environment is conducive for learning.

1  2  3  4  5
Never

I know what the rules and procedures in this class.

1  2  3  4  5
Never

I feel comfortable asking for help in this class.

1  2  3  4  5
Never

My teacher communicates with me and my parents through SchoolStatus.

1  2  3  4  5
Never
I have a choice in how I show what I know on some projects or assessments in this class. *

1 2 3 4 5

Never ○ ○ ○ ○ ○ ○ Always

I have the opportunity to learn from my mistakes in this class. *

1 2 3 4 5

Never ○ ○ ○ ○ ○ ○ Always

When I miss a question or lose points on an assignment, I have an opportunity to learn why and how to fix it.

1 2 3 4 5

Never ○ ○ ○ ○ ○ ○ Always

I have many opportunities to work with others in this class. *

1 2 3 4 5

Never ○ ○ ○ ○ ○ ○ Always
Would you like to share anything about your experience in this class during the last six weeks?

Your answer
**APPENDIX D**

**TKES TAPS RUBRIC OBSERVATION TOOL**

**Georgia Department of Education • TAPS Performance Standards and Rubrics**

<table>
<thead>
<tr>
<th>Performance Standard 1: Professional Knowledge</th>
<th>Level IV</th>
<th>Level III</th>
<th>Level II</th>
<th>Level I</th>
</tr>
</thead>
<tbody>
<tr>
<td>The teacher demonstrates an understanding of the curriculum, subject content, pedagogical knowledge, and the needs of students by providing relevant learning experiences.</td>
<td>In addition to meeting the requirements for Level III</td>
<td>Level III is the expected level of performance</td>
<td>Level II</td>
<td>Level I</td>
</tr>
<tr>
<td>The teacher continually demonstrates extensive content and pedagogical knowledge, enriches the curriculum, and guides others in enriching the curriculum.</td>
<td>The teacher consistently demonstrates understanding of the curriculum, subject content, pedagogical knowledge, and the needs of students by providing relevant learning experiences.</td>
<td>The teacher inconsistently demonstrates understanding of the curriculum, subject content, pedagogical knowledge, and student needs, or lacks fluidity in using the knowledge in practice.</td>
<td>The teacher inadequately demonstrates understanding of curriculum, subject content, pedagogical knowledge and student needs, or does not use the knowledge in practice.</td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Performance Standard 2: Instructional Planning</th>
<th>Level IV</th>
<th>Level III</th>
<th>Level II</th>
<th>Level I</th>
</tr>
</thead>
<tbody>
<tr>
<td>The teacher plans using state and local school district curricula and standards, effective strategies, resources, and data to address the differentiated needs of all students.</td>
<td>In addition to meeting the requirements for Level III</td>
<td>Level III is the expected level of performance</td>
<td>Level II</td>
<td>Level I</td>
</tr>
<tr>
<td>The teacher continually seeks and uses multiple data and real world resources to plan differentiated instruction to meet the individual student needs and interests in order to promote student accountability and engagement.</td>
<td>The teacher consistently plans using state and local school district curricula and standards, effective strategies, resources, and data to address the differentiated needs of all students.</td>
<td>The teacher inconsistently uses state and local school district curricula and standards, or inconsistently uses effective strategies, resources, or data in planning to meet the needs of all students.</td>
<td>The teacher does not plan, or plans without adequate using state and local school district curricula and standards, or without using effective strategies, resources, or data to meet the needs of all students.</td>
<td></td>
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</tbody>
</table>

<table>
<thead>
<tr>
<th>Performance Standard 3: Instructional Strategies</th>
<th>Level IV</th>
<th>Level III</th>
<th>Level II</th>
<th>Level I</th>
</tr>
</thead>
<tbody>
<tr>
<td>The teacher promotes student learning by using research-based instructional strategies relevant to the content to engage students in active learning and to facilitate the students’ acquisition of key knowledge and skills.</td>
<td>In addition to meeting the requirements for Level III</td>
<td>Level III is the expected level of performance</td>
<td>Level II</td>
<td>Level I</td>
</tr>
<tr>
<td>The teacher continually facilitates students’ engagement in metacognitive learning, higher-order thinking skills, and application of learning in current and relevant ways.</td>
<td>The teacher consistently promotes student learning by using research-based instructional strategies relevant to the content to engage students in active learning, and to facilitate the students’ acquisition of key skills.</td>
<td>The teacher inconsistently uses research-based instructional strategies. The strategies used are sometimes not appropriate for the content area or for engaging students in active learning or for the acquisition of key skills.</td>
<td>The teacher does not use research-based instructional strategies, nor are the instructional strategies relevant to the content area. The strategies do not engage students in active learning or acquisition of key skills.</td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Performance Standard 4: Differentiated Instruction</th>
<th>Level IV</th>
<th>Level III</th>
<th>Level II</th>
<th>Level I</th>
</tr>
</thead>
<tbody>
<tr>
<td>The teacher challenges and supports each student’s learning by providing appropriate content and developing skills which address individual learning differences.</td>
<td>In addition to meeting the requirements for Level III</td>
<td>Level III is the expected level of performance</td>
<td>Level II</td>
<td>Level I</td>
</tr>
<tr>
<td>The teacher continually facilitates each student’s opportunities in learning by engaging him/her in critical and creative thinking and challenging activities tailored to address individual learning needs and interests.</td>
<td>The teacher consistently challenges and supports each student’s learning by providing appropriate content and developing skills which address individual learning differences.</td>
<td>The teacher inconsistently challenges students by providing inappropriate content or by developing skills which address individual learning differences.</td>
<td>The teacher does not challenge students by providing appropriate content or by developing skills which address individual learning differences.</td>
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</tbody>
</table>

<table>
<thead>
<tr>
<th>Performance Standard 5: Assessment Strategies</th>
<th>Level IV</th>
<th>Level III</th>
<th>Level II</th>
<th>Level I</th>
</tr>
</thead>
<tbody>
<tr>
<td>The teacher systematically chooses a variety of diagnostic, formative, and summative assessment strategies and instruments that are valid and appropriate for the content and student population.</td>
<td>In addition to meeting the requirements for Level III</td>
<td>Level III is the expected level of performance</td>
<td>Level II</td>
<td>Level I</td>
</tr>
<tr>
<td>The teacher continually demonstrates expertise and leads others to determine and develop a variety of strategies and instruments that are valid and appropriate for the content and student population and guides students to monitor and reflect on their own academic progress.</td>
<td>The teacher systematically and consistently chooses a variety of diagnostic, formative, and summative assessment strategies and instruments that are valid and appropriate for the content and student population.</td>
<td>The teacher inconsistently chooses a variety of diagnostic, formative, and summative assessment strategies or the instruments are sometimes not appropriate for the content or student population.</td>
<td>The teacher chooses an inadequate variety of diagnostic, formative, and summative assessment strategies or the instruments are not appropriate for the content or student population.</td>
<td></td>
</tr>
</tbody>
</table>
### Performance Standard 6: Assessment Uses

The teacher systematically gathers, analyzes, and uses relevant data to measure student progress, to inform instructional content and delivery methods, and to provide timely and constructive feedback to both students and parents.

<table>
<thead>
<tr>
<th>Level IV</th>
<th>Level III</th>
<th>Level II</th>
<th>Level I</th>
</tr>
</thead>
<tbody>
<tr>
<td>In addition to meeting the requirements for Level III, the teacher continually demonstrates expertise in using data to measure student progress and trends in the effective use of data to inform instructional decisions. (Teachers rated as Level IV continually seek ways to serve as role models or teacher leaders.)</td>
<td>The teacher systematically and consistently gathers, analyzes, and uses relevant data to measure student progress, to inform instructional content and delivery methods, and to provide timely and constructive feedback to both students and parents.</td>
<td>The teacher inconsistently gathers, analyzes, or uses relevant data to measure student progress, inconsistently uses data to inform instructional content and delivery methods, or inconsistently provides timely or constructive feedback.</td>
<td>The teacher does not gather, analyze, or use relevant data to measure student progress, to inform instructional content and delivery methods, or to provide feedback in a constructive or timely manner.</td>
</tr>
</tbody>
</table>

### Performance Standard 7: Positive Learning Environment

The teacher provides a well-managed, safe, and orderly environment that is conducive to learning and encourages respect for all.

<table>
<thead>
<tr>
<th>Level IV</th>
<th>Level III</th>
<th>Level II</th>
<th>Level I</th>
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</thead>
<tbody>
<tr>
<td>In addition to meeting the requirements for Level III, the teacher continually engages students in a collaborative and well-managed learning environment where students are encouraged to take risks and ownership of their own learning behavior. (Teachers rated as Level IV continually seek ways to serve as role models or teacher leaders.)</td>
<td>The teacher consistently provides a well-managed, safe, and orderly environment that is conducive to learning and encourages respect for all.</td>
<td>The teacher inconsistently provides a well-managed, safe, and orderly environment that is conducive to learning and encourages respect for all.</td>
<td>The teacher inadequately addresses student behavior, displays a negative attitude toward students, ignores safety standards, or does not otherwise provide an orderly environment that is conducive to learning or encourages respect for all.</td>
</tr>
</tbody>
</table>

### Performance Standard 8: Academically Challenging Environment

The teacher creates a student-centered, academic environment in which teaching and learning occur at high levels and students are self-directed learners.

<table>
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<th>Level IV</th>
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<th>Level II</th>
<th>Level I</th>
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</thead>
<tbody>
<tr>
<td>In addition to meeting the requirements for Level III, the teacher continually creates an academic learning environment where students are encouraged to set challenging learning goals and tackle challenging materials. (Teachers rated as Level IV continually seek ways to serve as role models or teacher leaders.)</td>
<td>The teacher consistently creates a student-centered, academic environment in which teaching and learning occur at high levels and students are self-directed learners.</td>
<td>The teacher inconsistently provides a student-centered, academic environment in which teaching and learning occur at high levels or where students are self-directed learners.</td>
<td>The teacher does not provide a student-centered, academic environment in which teaching and learning occur at high levels, or where students are self-directed learners.</td>
</tr>
</tbody>
</table>

### Performance Standard 9: Professionalism

The teacher exhibits a commitment to professional ethics and the school’s mission, participates in professional growth opportunities to support student learning, and contributes to the profession.

<table>
<thead>
<tr>
<th>Level IV</th>
<th>Level III</th>
<th>Level II</th>
<th>Level I</th>
</tr>
</thead>
<tbody>
<tr>
<td>In addition to meeting the requirements for Level III, the teacher continually engages in a high level of professional growth and application of skills and contributes to the development of others and the well-being of the school and community. (Teachers rated as Level IV continually seek ways to serve as role models or teacher leaders.)</td>
<td>The teacher consistently exhibits a commitment to professional ethics and the school’s mission, participates in professional growth opportunities to support student learning, and contributes to the profession.</td>
<td>The teacher inconsistently supports the school’s mission or seldom participates in professional growth opportunities.</td>
<td>The teacher shows a disregard toward professional ethics or the school’s mission or rarely takes advantage of professional growth opportunities.</td>
</tr>
</tbody>
</table>

### Performance Standard 10: Communication

The teacher communicates effectively with students, parents or guardians, district and school personnel, and other stakeholders in ways that enhance student learning.

<table>
<thead>
<tr>
<th>Level IV</th>
<th>Level III</th>
<th>Level II</th>
<th>Level I</th>
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</thead>
<tbody>
<tr>
<td>In addition to meeting the requirements for Level III, the teacher continually uses communication techniques in a variety of situations to proactively inform, network, and collaborate with stakeholders to enhance student learning. (Teachers rated as Level IV continually seek ways to serve as role models or teacher leaders.)</td>
<td>The teacher communicates effectively and consistently with students, parents or guardians, district and school personnel, and other stakeholders in ways that enhance student learning.</td>
<td>The teacher inconsistently communicates with students, parents or guardians, district and school personnel, or other stakeholders in ways that only partially enhance student learning.</td>
<td>The teacher inadequately communicates with students, parents or guardians, district and school personnel, or other stakeholders by poorly acknowledging concerns, responding to inquiries, or encouraging involvement.</td>
</tr>
</tbody>
</table>
APPENDIX E

NOVICE TEACHER INTERVIEW QUESTIONS

Did you have any preconceived notions about how this research project would go? If so, what were they? Were they right or wrong?

Did you learn anything about yourself as a teacher during this project? If so, explain.

Did you find the observation, coaching, reflection cycle a positive or negative experience? Why?

What impact, if any, did this project have on your teaching practice?

What, if anything, did you take away from observing your coach teach?

What, if anything, did you take away from the coaching sessions?

If this project were to continue for the remainder of the semester, do you feel like it would benefit your instructional practice? Why or why not?

Did you notice any differences in student response, behavior or engagement in your class during the project?

Did you notice any changes in academic performance of your students during the project?

What was the most challenging part of this project?

What was the best part of this project?

Do you think coaching is a viable way to support new teachers? Why or why not?

Reflect on the goal you set with your coach during the first session, do you feel like you made progress towards meeting the goal? Why or why not?
APPENDIX F

COACH INTERVIEW QUESTIONS

Did you have any preconceived notions about how this research project would go? If so, what were they? Were they right or wrong?

Did you learn anything about yourself as a coach during this project? If so, explain.

Did you find the observation, coaching, reflection cycle a positive or negative experience? Why?

What impact, if any, did you observe this project have on the teaching practice of your mentee?

What, if anything, did you take away from observing your mentee teach?

What, if anything, did you expect your mentee to take away from the coaching sessions?

If this project were to continue for the remainder of the semester, do you feel like it would benefit your mentee’s instructional practice? Why or why not?

Did you notice any differences in student response, behavior or engagement in your mentee’s class during the project?

Did you notice any changes in academic performance of your mentee’s students during the project?

What was the most challenging part of this project?

What was the best part of this project?

Do you think coaching is a viable way to support new teachers? Why or why not?

Reflect on the goal you set with your mentee during the first session, do you feel like your mentee made progress towards meeting the goal? Why or why not?
APPENDIX G

COACH AND NOVICE TEACHER CONFIDENTIALITY AGREEMENT

Confidentiality Agreement

Trust and Confidentiality are essential parts of a teacher-coach relationship. Please affirm below that you will keep these observations and related coaching activities private.

Name

Your answer

I understand that all observations, coaching sessions, student perception data and data collection should remain confidential between the researcher, the teacher and the coach. No information from this study should be shared with any other staff member or administrator.

☐ I agree

Disclaimer: We are all mandated reporters. If something is observed or overheard in classrooms that needs to be reported, that is outside of the affirmation above and should be reported within 24 hours of incident.

☐ I understand

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Google Forms
APPENDIX H

TKES TAPS RUBRIC PERMISSION FROM GADOE

Gmail

Whitney McPherson <whitneymcpherson@gmail.com>

TKES TAPS Rubric

Stacey Suber-Drake <SDrake@doe.k12.ga.us> Fri. Mar 17, 2023 at 1:05 PM
To: "whitneymcpherson@gmail.com" <whitneymcpherson@gmail.com>

Dear Ms. McPherson:

This correspondence serves as notification that the Georgia Department of Education (GaDOE) grants limited permission to you to utilize GaDOE’s TKES/TAPS Rubric as the observation tool during the data collection process for your dissertation.

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Kindest regards,

Stacey

Stacey Suber-Drake
General Counsel
Georgia Department of Education