INVESTIGATING THE DEVELOPMENT OF POSSIBLE SELVES IN TEACHER EDUCATION: CANDIDATE PERCEPTIONS OF HOPES, FEARS, AND STRATEGIES

by

JILL ELAINE GONZALEZ-BRAVO

B.S., Kansas State University, 1995
M.A., Wichita State University, 1999

AN ABSTRACT OF A DISSERTATION

submitted in fulfillment of the requirements for the degree

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College of Education

KANSAS STATE UNIVERSITY
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Abstract

Today’s teachers must not only be content experts, they must be reflective practitioners competent in both theory and complex learning processes. They must prove capable of constructing classrooms to meet the diverse needs of each child within a culture of global competition and high stakes testing. Beginning teachers are more effective when they enter classrooms with a strong identity and sense of self as teacher. Unfortunately, there is limited understanding of teacher candidate identity development and limited research on effective preparation strategies to strengthen the complex process.

A two-staged instrumental-intrinsic case study was developed to collect and analyze candidate possible self-strategies. The investigation gave voice to an often-neglected source of insight, teacher candidates. The theory of possible selves, as proposed by Marcus and Nurius (1986), served as a framework for interviews conducted with thirteen candidates from a private institution in the Midwest. The researcher utilized results from previous applications of the theory to teacher education and extended findings by employing the strategy development process (Ibarra, 1999), an aspect previously unapplied to teacher preparation.

Research findings provided insight into participants’ past memories and present motivations. While passive observation appeared to play a minor role in participant strategies, there was a heavy reliance upon future collegial support. Participants also valued intentional effective clinical mentors and suggested structured opportunities to promote dialogue and feedback. Results aligned with previous research that identified modeling of effective instructional strategies as essential to teacher educator quality. However, an additional attribute emerged, affective modeling. Participants attributed affective traits and actions of teacher educators to personal perceptions of collegiality and student-centered instruction.

Findings support the utilitarian, investigative, and evaluative qualities of the theory of possible selves. The applied theoretical framework allowed for the assessment of participants’ knowledge, skills, and dispositions, aided in the identification of perceived preparation needs, and served as an appraisal of preparation program effectiveness. The collection and analysis of candidates’ hopes, fears, and process strategies served to inform teacher educator practice and increased understanding in regards to external and internal influences that shape professional identity development.
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Major Professor
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Acknowledgements

As a child I trusted the closing of each day to my mother. She would scratch my back and sing “Qué Será, Será”. The same song, sung every night, shaped my thoughts and crept into my dreams of what was to come. If one were to ask my own children their preferred bedtime ritual, the request would be the same.

I believe this song planted deep the gift of hope. Perhaps this spurred my affinity for the theory of possible selves, it too posits that hope motivates and shapes the pursuit of the ‘whatever will be’ future. I am thankful for my mother’s voice that encouraged hope exploration into the unknown, for my father’s example of perseverance through the unknown, Dr. Teresa Miller and Dr. Trudy Salberry’s time investment into my unknown, and my husband and children’s patience with me during the unknown.
Dedication

From surviving ‘fend for yourself food night’, wading through piles of unfolded laundry, and not holding against me missed moments to sing you to sleep with our favorite song. Jose’ Miguel, Antonio Richard, Elena Pauline, and Eva Marie the future may not be ours to see but I will love and support you through it, just as you have done for me.
Preface

A third world country, an urban alternative school, a Midwest rural setting, and two parochial schools provided multifaceted perspectives into the practice of pedagogy for this researcher. Insights gained from over twenty years in education in diverse settings shaped a vision as a teacher educator to ensure an effective teacher in each classroom from day one. Though this goal was in place, personal stress invaded professional practice during the transition from classroom teacher, to teacher educator. This transition was influenced by concerns of inadequacy in professional and academic knowledge and difficulty adjusting personal pedagogical style to the andragogical practice required for the professional growth of candidates. Application of the theory of possible selves was posited to assist the researcher during the complex shift. The following was a personal application of the overarching components of the theory of possible selves to assist in the accomplishment of the above stated personal professional goal.

Hopes:

- I hope that this research will inform the field of education by providing rich insight into pre-service teacher’s professional aspirations, concerns, and self-developed strategies.
- I hope that findings will guide teacher educators in the development of effective instructional strategies that equip future teachers for the schools they will someday serve.

Fears:

- I fear university courses will fail to equip future educators to serve each student effectively.
- I fear the least effective candidates will serve students with the greatest needs.

Strategies:

- I will apply the theory of possible selves to better understand the complex process of pre-service teacher identity development.
• I will apply findings to the development of an effective teacher educator pedagogy that will prepare effective educators for every classroom from their first day of their first year teaching.
Chapter 1: Introduction to the Study

There is a general lack of foundational and theoretical knowledge regarding identity development and effective teacher education pedagogy. This lack of knowledge weakens teacher educators’ ability to equip candidates to meet the numerous expectations placed upon them. The following proposal is an exploration of this issue; sections in Chapter 1 include (a) context of the study, (b) statement of the problem, (c) overview of the theoretical framework, (d) purpose of the study, (e) research questions, (f) brief description of methodology, (g) definition of terms, and (h) summary.

Context of the Study

Nye, Konstantopoulus, and Hedges (2004) and Stronge, Ward, and Grant (2011) found that effective teacher dispositions impacted student success in the classroom more than policies, reform initiatives, and even technology. Effective educators showed student academic gains despite issues of poverty, race or ethnicity, and language and learning differences according to the research of Aaronson, Barrow, and Sander (2007) and McMurrer (2007). Teacher education programs played a vital role in the preparation of effective educators capable of meeting these challenges and ensuring student success (Boyd, Grossman, Lankford, Loeb, & Wyckoff, 2009; Darling-Hammond & Bransford, 2005; Fullan & Stiegelbauer, 2007; Hamilton & Pinnegar, 2000; Korthagen, 2004; Sprinthall, Reiman, & Theis-Sprinthall, 1996). Despite this consensus, teacher education is often an “afterthought” in education reform efforts and has received a myriad of criticism (Fullan & Stiegelbauer, 2007, p. 278; Hollingsworth 1989; Holt-Reynolds 1992; Levine, 2006; World-class, 2012).

Hamilton and Pinnegar (2001) suggested teacher educators pay “careful attention to who our students are, what they know and believe, and what experiences and talents they bring with them is an important but often overlooked component of teacher education” (p. 237). Feistritzer (2011) found that females dominate the field of teaching with a male educator rate that has declined to only 16 percent of the public school teaching population. However, there was a slight increase for persons of color within the teaching force. Feistritzer (2011) reported that the 91% of white educators in 1986 dropped to 84% in 2011. Candidates have historically held altruistic beliefs towards their
role as teachers (Lortie, 1975), and reported more precollege experiences with children (Book & Freeman, 1986). Weinstein (1990) found that entering candidates communicated a high level of optimism and confidence in their ability to teach. While Brookhart and Freeman (1992) and Richardson and Placier (2001) asserted that candidates regarded the personality of a teacher as more significant than an understanding of subject matter and pedagogical theory.

The emphasis on nurturing combined with high levels of confidence and optimism increased researcher speculation as to the effectiveness of teacher education course work on impacting professional attitudes and identity development (Book & Freeman, 1986; Weinstein, 1990). Whitbeck (2000) suggested that pre-service teachers “may neglect their preparation and place higher trust in what they termed, ‘the personality of the teacher’” (p. 135). Whitbeck (2000), Hoy, Spero and Woolfolk, (2005) agreed that such traits combined with a reliance on individual intuitive practice left pre-service teachers unengaged in teacher education coursework and unprepared for classroom challenges.

Today’s teachers must not only be content experts, but reflective practitioners versed in theory and the complex learning process. They must prove capable of applying knowledge to the construction of classrooms that meet the diverse needs of each child within a culture of global competition and high stakes testing (Darling-Hammond & Bransford, 2005; Zhao, 2011). Several obstacles impinge upon teacher education’s ability to meet these numerous demands—teacher education is often a neglected “afterthought” in research and reform efforts (Fullan & Stiegelbauer, 2007, p. 278), teacher education must equip candidates with varied interests and teaching styles for increasingly diverse classrooms (Lampert, 2001; McDonald, 1992), and expectations placed on teacher education shifts in response to technology and globalization (Cochran-Smith & Zeichner, 2005; Zhao, 2011). However, Dyer (2012), Korthagen (2004), Olsen (2008), Cochran-Smith and Zeichner (2005), Zeichner and Conklin (2004), and Zhao (2011) indicated that the greatest obstacle may be the limited understanding of teacher identity development. A lack of clarity in regards to teacher professional identity development inhibits the progress of teacher education pedagogy and the ability to
transform teacher candidates’ beliefs and misconceptions acquired through the “apprenticeship of observation” (Lortie, 1975, p. 61).

The concept of ‘apprenticeship of observation’ was based on research conducted by Lortie (1975). Lortie (1975) utilized this phrase to describe the perceptions acquired from the thirteen years or more of student seat-time in classrooms and the ensuing influence upon teacher identity development. Passive observation promoted the belief that teaching required little effort (Lortie, 1975; Munby, Russell & Martin, 2001). The ignorance of teacher intentions or the theory and framework (Lortie, 1975) upon which lessons were built, left pre-service students with a shallow understanding of the teaching profession. Additionally, prior classroom experiences were often steeped in a traditional view of education, one that regarded teachers as dispensers of knowledge. This traditional perspective fueled the misconception that the learning process was rote and simple (Lortie, 1975; Feiman-Nemser & Buchmann, 1989; Richardson, 1996). Kalaian and Freeman (1989) discovered that these misconceptions were often maintained from teacher education entry to exit. Such historical propositions led researchers to criticize teacher education for the inability to shape professional identity development (Kalaian & Freeman, 1989; McDiarmid, 1990; Zeichner & Tabachnick, 1981).

Despite more recent scholarly research refuting such claims (Boyd, Grossman, Loyd, & Wyckoff, 2009; Darling-Hammond &Bransford, 2005; Gitomer, Latham & Ziemek, 1999; Grossman & Ronfeldt, 2008; Hamilton & Pinnegar, 2001; Reiman, Sprinthall, & Theis-Sprinthall, 1996: Wilson, 2009), these perspectives permeate perceptions today. Fullan and Stiegelbauer (2007) identified teacher education as “the worst problem” in regards to educational reform in America, while simultaneously believing teacher education to be the “best solution in education” (p. 278). However, two limitations impede teacher education reform—a general lack of foundational and theoretical knowledge in regards to identity development (Beijaard, Meijer, & Verloop, 2004; Dyer, 2012; Grossman & Ronfeldt, 2008; Korthagen, 2004; Olsen, 2008; Zeichner & Conklin, 2004; Zeichner, 2005), and empirical research on effective teacher education pedagogy (Hoban, 2007; Korthagen, 2004; Zeichner & Conklin, 2004; Zeichner, 2005). These limitations weaken teacher educators’ ability to equip candidates to meet the numerous expectations placed upon them.
The dissertation research described in this chapter attempted to ameliorate identified gaps by applying a theory that emerged from the psychology of personal growth (Wurf & Markus, 1991). The theory of possible selves was used as a tool to glean the voice of teacher candidates, a recognized void within teacher education reform (Korthagen et al., 2006), and gather insight into teacher candidate identity development and strategies to improve teacher education pedagogy.

Statement of the Problem

Kagan (1992) found that beginning teachers were more effective in their first year when they entered classrooms with a strong identity and sense of self as teacher. “Developing an identity as a teacher is an important part of securing teachers’ commitment to their work” (Hammerness, Darling-Hammond & Bransford et al., 2005, p. 383). Many researchers have agreed that strengthening professional identities influenced teacher effectiveness, motivation, and may have decreased attrition (Avalos, 2011; Day, Kington, Stobart, & Sammons, 2006; Lasky, 2005; Van Den Berg, 2002). Identity development was central to teacher professionalism (Beauchamp & Thomas, 2009; Freese, 2006; Hoban, 2007; Olsen, 2008; Sachs, 2005) and quality (Beijaard, Meijer & Verloop, 2004; Dyer, 2012; Korthagen, 2004; Sutherland, Howard, & Markauskaite, 2010; Timoštšuk & Ugaste, 2010). Feinman-Nemser (2001) recognized that without a strong and flexible identity, new teachers would not succeed in the profession. Identity development should therefore be central to teacher education pedagogy.

Overview of Theoretical Framework

For this proposal, the researcher pursued theories and frameworks that would promote both an understanding of professional identity development and strategies to improve teacher education pedagogy. To meet this dual purpose, the theory of possible selves, previous research on candidate professional identity development, and strategies to improve teacher education provided a framework to guide research question development and subsequent analysis and interpretation.

Exposure to the theory of possible selves occurred when the researcher read Marzano and Heflebower’s (2012) book, *Teaching and Assessing 21st century skills*. Marzano and Heflebower suggested incorporating this theory into classrooms to ‘cultivate’ self-efficacy (p. 26) and promote conative skill acquisition. Conative skills focus on the knowledge of oneself, or the world within. Historically, education has focused on cognitive skills, gaining understanding of the surrounding world. Marzano and Heflebower (2012) argued that conative skills were vital to the preparation of 21st century students and proposed the use of the theory of possible selves to promote conative skill development and self-efficacy. This possible selves theory, which emerged from self-concept psychology (Wurf & Markus, 1991), has only recently been applied to the field of education (Packard & Conway, 2006).

The theory of possible selves, according to Markus and Nurius (1986) encompassed:

How individuals think about their potential and about their future. Possible selves are the ideal selves that we would very much like to become. They are also the selves we could become, and the selves we are afraid of becoming. (Markus & Nurius, 1986, p. 954)

Berci (2007) recognized that “identity is individually constructed, through negotiations with self and others, and is never stable or fixed” (Berci, 2007, p. 65). While the theory of possible selves as proposed by Marcus and Nurius (1986) closely aligned with this definition, it expanded beyond the current and past components of identity, to include future orientations. Markus and Nurius (1986) argued that a future oriented perspective should not be neglected. Though future selves have not been “verified or confirmed…it is entirely possible that this variety of self-knowledge also
exert a significant influence on individual functioning” (p. 955). Possible selves may provide both incentives for the future and an “evaluative and interpretive context for the current view of self” (Markus & Nurius, p. 955).

This dissertation research investigated process strategy development, a component of the possible selves theory previously unapplied to teacher education. The theory of possible selves holds that “having an end vision without process strategies does little to assist with motivation and achievement” (Oyserman & Fryberg, 2006, p. 20). Fryberg and Oyserman (2006) applied this idea while studying racially diverse males and females and found evidence that the existence of strategies may be a predictive factor for academic achievement and involvement in delinquent activities.

Ibarra (1999) identified a three-step process for the construction and achievement of future possible selves. The first step of Ibarra’s iterative process (1999) recognized that possible selves were shaped by the “observation of role models to identify potential identities” (p. 764). Exposure to a myriad of possible selves influenced identity development. The second step required the personalization and authentication of self through “experimenting with provisional selves” (p. 764). Ibarra’s (1999) third step recognized the need for reflection, evaluation, and adjustment of personal possible selves.

Marcus and Nurius (1986) recognized that knowledge gained from analysis of possible selves was helpful for the following reasons:

[Research] provides an interpretive framework for making sense of past behavior, it also provides the means-ends patterns for new behavior. Individuals’ self-knowledge of what is possible for them to achieve is motivation as it is particularized and individualized; it serves to frame behavior, and to guide its course. (p. 955)

After the tool for gathering identity insight was selected, the researcher pursued a framework to understand strategies and influences upon candidate professional development. Though several hypothetical frameworks are in development, a comprehensive understanding of the pre-service professional development process has been lacking (Beijaard, Meijer, & Verloop, 2004). Korthagen (2004) utilized the ‘onion model’, to dissect the ‘layers’ of professional development. The layers of the ‘onion model’ from outer to inner are as follows: environment, behavior, competencies, beliefs,
identity, and mission or core. Korthagen recognized interaction and interdependence between the layers. The environment may alter behavior, which in turn influences the internal layers of identity and mission. Or conversely, the internal layers of identity and mission may influence teacher behavior response to the external environment. Palmer (1998) recognized the layered nature of the educator, “the teacher within is not the voice of conscience but of identity and integrity. It speaks not of what ought to be but of what is real for us, of what is true” (p. 32).

Feiman-Nemser (2001), Hammerness, Darling-Hammond and Bransford (2005), and Kagan (1992) connected a strong and flexible identity to teacher effectiveness and career longevity. However, the researcher continued to leave unanswered the question ‘What is identity development?’ This led to a further review of self-concept psychology literature. A synthesis resulted in a framework (see Figure 2.5) that identified five influential factors that contribute to identity development: social, emotional, motivational, experiential, and rational.

In conclusion, the theory of possible selves was used as a tool to inform Korthagen’s (2004) layers of professional development and the framework of influential factors that contribute to identity development (see Figure 2.5). Analysis of candidates’ stated hopes, fears, and process strategies provided a holistic understanding of pre-service teacher identity development and revealed the conative skills (Marzano & Heflebower, 2012) and layers of identity within (Palmer, 1998). This authentic glimpse into teacher identity development will inform the development of effective teacher educator pedagogy.

**Purpose of the Study**

The purpose of this case study (Stake, 1995) is to add to the limited research on teacher professional identity-development (Grossman & Ronfeldt, 2008; Korthagen, 2004; Conklin & Zeichner, 2004; Zeichner, 2005). Berci (2007) described identity as “individually constructed, through negotiations with self and others, and is never stable or fixed” (Berci, 2007, p. 65). This study will draw from the works of Markus and Nurius (1986) and others who have sought to understand the concept of identity development using the theory of possible selves.
Possible selves are "the ideal selves that we would very much like to become. They are also the selves we could become, and the selves we are afraid of becoming" (Markus & Nurius, 1986, p. 954). Previously published studies have applied the possible selves theory to the field of teacher education. Fletcher (2000) explored teacher identity emergence through the use of visualization strategies structured by the theory of possible selves. Conway and Clark (2003) combined Fuller and Bown’s (1975) concerns-based model of change with the theory of possible selves to understand changes within the early years of teaching. Grossman and Ronfeldt (2008) applied the theory of possible selves to a comparison of professional preparation courses for clergy, teachers, and clinical psychologists. Interviews with these professionals sought to understand program opportunities that allowed for the practice of possible selves. Hamman, Gosselin, Romano, and Bunuan (2010) investigated pre-service teachers’ hopes and fears and identified four broad categories: “interpersonal relationships,” “classroom management,” “instructional strategies,” and “professional qualities” (p. 1359). Hong’s (2011) research expanded category descriptions and explored the balance between selves at two stages in a pre-service science teacher preparation program. A more thorough analysis of these studies is presented in chapter two.

While these studies have contributed greatly to an understanding of pre-service teacher identity, this research will build upon previous findings and incorporate an unaddressed component of the possible selves theory. While the teacher candidate’s hopes and fears will again be addressed, the researcher additionally incorporated process strategy development. Candidate descriptions of hopes, fears and process strategies, may provide a more holistic perspective of the complex and dynamic nature of teacher professional identity development.

Research Questions

The following research questions expand upon previous research in teacher education that applied the theory of possible selves as proposed by Markus and Nurius (1986). Previous possible self research by Hamman et al. (2010) explored candidate hopes and fears and uncovered four salient categories (2010): “interpersonal relationships,” “classroom management,” “instructional strategies,” and “professional qualities” (p. 1359). These categories were explored further using an unapplied
component of the theory of possible selves to teacher education, process strategy
development. Strategy development was recognized by Oyserman and Fryberg (2006) as
necessary for the achievement of hoped for selves and the avoidance of feared selves.

The second guiding research question explored candidate suggested teacher
education strategies for each salient category (Hamman et al., 2010). Sub-questions were
framed using Korthagen’s (2006) teacher education program model. This triangular
model recognized three overarching components that encompassed seven principles
quality teacher education programs: “views of knowledge and learning”, “program
structures and practices”, and “quality of staff and organization” (Korthagen, 2006, p.
1037).

Overarching Questions:
1. How do candidates describe and develop hope achievement and fear avoidance
strategies in regards to previously identified salient possible selves (Hamman et al.,
2010)?

Sub-questions:
   a. What are candidate’s hope achievement and fear avoidance process strategies in
      response to future professional interpersonal relationships?
   b. What are candidate’s hope achievement and fear avoidance process strategies in
      response to future classroom management styles?
   c. What are candidate’s hope achievement and fear avoidance process strategies in
      response to future instructional strategies?
   d. What are candidate’s hope achievement and fear avoidance process strategies in
      response to future professional qualities?

2. How do candidate identified strategies inform teacher education?

Sub-questions:
   a. What are candidate strategy suggestions for teacher education in regards to views
      of knowledge and learning?
   b. What are candidate strategy suggestions for teacher education in regards to
      program structures and practices?
   c. What are candidate strategy suggestions for teacher education in regards to the
      quality of the staff and organization?
Brief Description of Methodology

The American Education Research Association (AERA) Panel on Research and Teacher Education (Cochran-Smith & Zeichner, 2005) concluded a four-year study on research in teacher education with suggestions for improving the body of knowledge. After reading this report and blending it with her own experiences and observations, the researcher attempted to design a study that intentionally addressed two identified shortcomings within teacher education.

First, Cochran-Smith and Zeichner (2005) emphasized the need to frame “research in relation to relevant theoretical frameworks” which will allow for authentic explanations of findings (p. 741). Second, research must extend upon previous findings. AERA panel suggestions and the gaps in knowledge in regards to candidate professional identity development and effective teacher educator pedagogy (Grossman & Ronfeldt, 2008; Korthagen, 2004; Conklin & Zeichner, 2004; Zeichner, 2005), established the foundation upon which this qualitative instrumental-intrinsic case study was built. This dissertation research was instrumentally designed to extend upon previous application of the theory of possible selves to teacher education and to gather perspectives to meet the researcher’s intrinsic need to refine a personal second-order professional practice as a teacher educator. Therefore the researcher would classify the study as an intrinsic-instrumental case study.

Stake (1995) recognized that a case study can be both intrinsic and instrumental. “The key in both the intrinsic and instrumental case study is the opportunity to learn” (Mills, Durepos, & Wiebe, 2010, p. 499). Stake (1995) defined an instrumental case study as, “research on a case to gain understanding of something else” (p. 171). Mills, Durepos, and Wiebe (2010) noted that an instrumental case study is the study of a case [teacher candidates] to provide insight into a particular issue [teacher educator pedagogy], redraw generalizations [Hamman et al. (2010) salient categories], or build theory (Mills, Durepos, & Wiebe, 2010, p. 473-474).

Stake (1995) further recognized that researchers are often compelled to investigate a problem set before them. “The case is given. We are interested in it, not because by studying it we learn…but because we need to learn” (p. 3). Stake (1995) proposed that researchers are drawn to a specific methodological design because of an
intrinsic interest in the case. Stake referred to this exploratory form of case study as an “intrinsic case study” (p. 3).

While the researcher framed the research and extended upon previous applications of the theory, the study emerged from the researcher’s compelling commitments. The researcher was first a teacher committed to the success of each child within her professional path. However, the context of her professional path changed to teacher education. As a teacher educator, her initial commitment remained but extended to an intrinsic need to ensure student success in each of her teacher candidates’ future classrooms. This compelled a pursuit to understand the professional identity development of candidates in order to establish a personal second-order teacher educator pedagogy that was grounded in effective theory and practice.

In order to meet this compelling need, the researcher pursued what Korthagen, Loughran, and Russell (2006) identified as often neglected within teacher education, the voice of candidates. Stake (1995) recognized that “the interview is the main road to multiple realities” (p. 64). Therefore semi-structured interviews drove data acquisition and the theory of possible selves framed the interview structure (Oyserman, 2004). Questions were developed to build upon the Hamman et al. (2010) study findings and suggestions for further investigation. Interview questions promoted deep thought toward the issues. The question framework and additional probing prompts were intended to promote the organic nature of conversation. Application of researcher constructivist listening assisted in gaining episode insight.

Stake (1995) recognized that external experiences and context were important elements of qualitative case studies. To better understand context candidates were interviewed twice in the span of six months. Contextual insight was further achieved through the application of two purposeful selection strategies. First, stratified purposeful (Creswell, 2013) selection was utilized to select participants based on placement in the teacher education program. Creswell (2013) recognized that this strategy “illustrates subgroups and facilitates comparisons” (p. 127). Second, participants were also selected based on established criterion (Creswell, 2013) such as program choice (elementary, middle or secondary), academic involvement, and gender. Bloomberg and Volpe (2008)
recognized that “the logic of purposeful sampling lies in selecting information-rich cases, with the objective of yielding insight and understanding” (p. 104).

In conclusion, the research methodology was intentionally designed to address suggestions made by the AERA (2005) panel and to add to the limited understanding of teacher professional identity development and effective teacher education pedagogy. Research instrumentally applied the theory of possible selves to gain insight into professional identity development and build upon previous research that identified salient categories of hoped for feared selves (Hamman et al., 2010) and explored strategy development, a previously unapplied element of theory of possible selves to the field of teacher education. Utilization of the instrumental-intrinsic case study (Stake, 1995) format contributed to a holistic understanding (Creswell, 2013) and meaning making (Bloomberg & Volpe, 2008) of candidate’s hopes, fears, and strategy development to inform the development of effective teacher educator pedagogy.

Definitions of Terms

The following are definitions for terms used throughout this study. The definitions are provided to promote clarity in situations of multiple meanings and to ensure study cohesiveness. Included also are words that have the same meanings and may be used interchangeably throughout the review of literature and study.

*Conative:* Conative skills focus on an ability to synthesize knowledge and feelings to assess an appropriate response to situations. This skill is dependent on the ability to “understand and control oneself” and “understand and interact with others” (Marzano & Heflebower, 2012, p. 9).

*Cognitive:* Cognitive skills, first made famous in 1956 by Benjamin Bloom, are likely familiar to those in the education world. Cognitive skills encompass the ability to “analyze and utilize information,” “address complex problems and issues,” and “create patterns and mental models” (Marzano & Heflebower, 2012, p. 9).
Effective: “There's no such thing as a universally effective teaching strategy; the effectiveness of any given strategy can only be determined by evidence of its effect on student learning” (Dufour & Mattos, 2013, p. 36).

Fear avoidance and hope achievement process strategies: Ibarra (1999) identified a three-step process for the achievement of future possible selves. The first step of Ibarra’s iterative process (1999) recognized that possible selves were shaped by the observation of role models. The second step required the personalization and authentication of self through experimentation with provisional selves. Ibarra’s (1999) third step recognized the need for reflection, evaluation, and adjustment of personal possible selves.

Identity: “Identity is individually constructed, through negotiations with self and others, and is never stable or fixed” (Berci, 2007, p. 65). “How teachers define themselves to themselves and to others” (Lasky, 2005, p. 901).

Instrumental Case Study: “Research on a case to gain understanding of something else” (Stake, 1995, p. 171). ”An instrumental case study is the study of a case (e.g., preservice teachers, teacher education) to provide insight into a particular issue, redraw generalizations, or build theory. In instrumental case research the case facilitates understanding of something else… In an instrumental case study the case itself is secondary to understanding a particular phenomenon. In instrumental case study research the focus of the study is more likely to be known in advance and designed around established theory or methods” (Mills, Durepos, & Wiebe, 2010, p. 473-474). ”In an instrumental case study the case becomes a tool to better understand something else” (Mills, Durepos, & Wiebe, 2010, p. 499).

Intrinsic Case Study: “When the case itself is of primary, not secondary, interest” (Stake, 1995, p. 171). ”An intrinsic case study is the study of a case (e.g., preservice teacher education) where the case itself is of primary interest in the exploration. The exploration is driven by a desire to know more about the uniqueness of the case rather than to build theory or how the case represents other cases... The intrinsic case study is often
exploratory in nature, and the researcher is guided by his or her interest in the case itself rather than in extending theory or generalizing across cases...the intrinsic case study offers an opportunity to understand particularities. The researcher is interested in context and is seeking both depth and breadth in his or her exploration” (Mills, Durepos, & Wiebe, 2010, p. 499).

*Intrinsic Instrumental Case Study:* “Stake does note that a case study can be both intrinsic and instrumental in nature and that it is sometimes difficult to categorize a case into one or the other type. The key in both the intrinsic and instrumental case study is the opportunity to learn” (Mills, Durepos, & Wiebe, 2010, p. 499).

*Novice teacher:* They are often teachers who have less than 2 years of teaching experience (Gatbonton, 2008).

*Preservice teachers, Teacher Candidate, Candidate:* Terms may be used interchangeably throughout text and quotes to represent “Individuals preparing for professional education positions” (CAEP, 2013, p. 3).

*Self:* Korthagen (2004) used a common definition of the term as “an organized summary of information, rooted in observable facts concerning oneself, which includes such aspects as traits of character, values, social roles, interests, physical characteristics and personal history’’ (p. 83). Though there may be subtle nuances between the definition of identity and self, the author may refer to both interchangeably in recognition of the close relation to one another.

*Teacher educators:* “Those that teach the teachers” (Cochran-Smith, 2003, p.5).

*Possible selves theory:* “The ideal selves that we would very much like to become. They are also the selves we could become, and the selves we are afraid of becoming” (Markus & Nurius, 1986, p. 954).
Summary

Beginning teachers are more effective in their first year when they enter classrooms with a strong identity and sense of self as teacher (Kagan, 1992). Unfortunately, there is limited understanding of pre-service teacher identity development and limited research on effective instructional strategies to promote professional identity development of pre-service teachers (Grossman & Ronfeldt, 2008; Korthagen, 2004; Conklin & Zeichner, 2004; Zeichner, 2005). This study attempted to rectify these areas of noted neglect and give voice to teacher candidates, a recognized void within teacher education reform (Korthagen et al., 2006). The collection and analysis of pre-service teachers’ hopes, fears, and process strategies helped increase understanding of teacher professional identity development and strengthened teacher education pedagogy.
Chapter 2: Review of the Literature

Effective teacher dispositions impact student success in the classroom more than policies, reform initiatives, and even technology (Stronge, 2011; Nye, Konstantopoulus & Hedges, 2004). Effective educators showed student gains despite issues of poverty, race or ethnicity, language, and learning differences (Aaronson, Barrow, & Sander, 2007; Darling-Hammond, 2003; McMurrer, 2007; Sanders & Rivers, 1996; Wright, Horn, & Sanders, 1997). Hanushek, Kain, William and Sanders (2000) recognized that one year spent with an effective teacher had a cumulative and residual effect still measurable four years later. Hanushek, Kain, O’Brien, and Rivkin’s (2005) research revealed that students placed in classrooms with effective educators for three consecutive years showed over 50 percentage point gains. The tragedy for American children is that odds are often against them. There is only a one in 17,000 chance that they will experience effective instruction for five years in a row (Walsh, 2007).

The positive correlation noted throughout research between teacher effectiveness and student success motivated this study (Aaronson, Barrow, & Sander, 2007; Darling-Hammond, 2003; Hanushek, Kain, O’Brien, & Rivkin, 2005; Hanushek, Kain, William & Sanders, 2000; McMurrer, 2007; Nye, Konstantopoulus & Hedges, 2004; Sanders & Rivers, 1996; Stronge, 2011; Wright, Horn, & Sanders, 1997;), while inverse findings established urgency. Sanders and Rivers (1996) discovered that one-year spent with an ineffective educator resulted in a negative residual affect still measurable after two years. This startling statistic established the researcher’s hope of preparing effective educators to meet the needs of each student in every classroom on the first day of his or her first year of teaching. In order to achieve this, teacher education programs must be central to school improvement efforts (Boyd, Grossman, Loyd, & Wyckoff, 2009; Darling-Hammond & Bransford, 2005; Fullan & Stiegelbauer, 2007; Hamilton & Pinnegar, 2001; Korthagen, 2004; RESPECT, 2012; Sprinthall, Reiman, & Theis-Sprinthall, 1996; Wilson, 2009).

The word ‘effective’ is used throughout literature to describe educators. Dufour and Mattos (2013) noted educator effectiveness by the measureable impact had on student learning. The following review of the literature emerged from the researcher’s
commitment to improving teacher effectiveness through improved teacher preparation. The review sought to reveal complexities within teacher education and teacher candidate identity development. It investigated solutions for improving the teacher preparation, and concluded with a theoretical overview that may address noticeable research gaps and give voice to a neglected resource in educational research, teacher candidates. The chapter is divided into the following subheadings: (a) increased expectations existing obstacles, (b) a framework for improvement, (c) candidate professional identity development, (d) theoretical framework, (e) synthesis of the research, and (f) summary.

**Increased Expectations and Existing Obstacles**

Today’s teachers must not only be content experts, but reflective practitioners, versed in theory and the complex learning process. They must prove capable of applying knowledge to the construction of classrooms that meet the diverse needs of each child within a culture of global competition and high stakes testing (Darling-Hammond & Bransford, 2005; Zhao, 2011). Cochran-Smith (2003) recognized that more recently “teacher educators-those who teach the teachers- are now the linchpins in educational reforms of all kinds” (p. 5). The responsibilities and obligations placed on teacher educators are high, while challenges to teacher education’s efforts are even greater (Boyd, Grossman, Loyd & Wykoff, 2009). Figure 2.1 is a framework of the external global and national issues discussed throughout this section.

**Figure 2.1 External and internal influences upon teacher education programs.**

![Diagram of external and internal influences on teacher education programs.]
Global Issues Impacting Teacher Education

Innovation and technology have prompted an overall shift in educational norms throughout the education world. Marzano and Heflebower (2012) in *Teaching and Assessing 21st Century Skills*, recognized that educators must prepare children for this changing world. Marzano and Heflebower (2012) provided a historical glimpse of the impact of technology on America’s jobs. There has been a shift from “manufacturing and industrial jobs to service-sector occupations” (p. 4). This shift has altered the needed skill sets for America’s future workforce. Marzano and Heflebower (2012) identified two categories of skills required for the 21st century skills, cognitive and conative skills. Cognitive skills, first made famous in 1956 by Benjamin Bloom, are likely familiar to those in the education world. Cognitive skills encompass the ability to “analyze and utilize information,” “address complex problems and issues,” and “create patterns and mental models” (Marzano & Heflebower, 2012, p. 9). Conative skills focus on an ability to synthesize knowledge and feelings to assess an appropriate response to situations. This skill is dependent on the ability to “understand and control oneself” and “understand and interact with others” (Marzano & Heflebower, 2012, p. 9).

Zhao (2011) recognized that technology had both altered the necessary technical and analytical skills taught in the nation’s schools, but had subsequently caused the “death of distance” (p. 422). Technology decreased borders and increased issues surrounding globalization. Zhao (2011) highlighted five challenges to teacher education that were influenced by technology-induced globalization.

First, Zhao (2010) recognized that educators must equip students for competition in a job market that extends beyond national borders. President Obama (2009) discussed this increased competition in a speech given to the Hispanic Chamber of Commerce.

This has never been truer than it is today. In a 21st-century world where jobs can be shipped wherever there’s an Internet connection, where a child born in Dallas is now competing with a child in New Delhi, where your best job qualification is not what you do, but what you know … education is no longer just a pathway to opportunity and success, it's a prerequisite for success. (para. 7)

Zhao’s (2010) second premise recognized that globalization shifted what was once local and national accreditation to “increased pressure to be judged on a global
stage” (Zhao, 2010, p. 425). Zhao’s (2010) third premise addressed the dramatic increase of migration and the resulting diversity within the U.S. and its classrooms and reported that in America (2010), 20% of children ages five to 17 had a foreign-born parent. Gollnick and Chinn (2006) estimated that by the year 2026, an estimated enrollment of 15 million English Language Learners in public schools would be present. It is the obligation of educators to ensure the right of each child to continue to learn grade level content while learning English (Gollnick & Chinn, 2006). Klecka, Lin, Odell, Spalding, Wang (2010) recognized the subsequent responsibility placed on teacher education programs to train educators to meet the diverse learning needs of each student.

Zhao’s (2010) fourth premise focused on an educator’s ability to improve student’s cultural and linguistic knowledge. The age of globalization has left little room for ethnocentrism. Within American schools, there is limited emphasis on multiculturalism and second language acquisition (Zhao, 2010). The majority of educators were themselves monolingual (Brookhart & Freeman, 1992). Lastly, Zhao stated that future teachers must be prepared to instill within their future students their role as “global citizens” (Zhao, 2010, p. 426). Issues surrounding globalization increased program content expectations and the complexity of teacher education (Zhao, 2011).

National Issues Impacting Teaching

America has responded to technology-induced globalization, and increased competition with reform mandates (No Child Left Behind Act (2001), national standards (Common Core Standards (2010), and program proposals (RESPECT, 2012). President George W. Bush’s administration (2001-2009) emphasized educational reform by drafting the No Child Left Behind Act (NCLB, 2001). This standards-based movement increased school accountability by mandating annual assessments of student academic progress and increased teacher qualification requirements. While the NCLB appears to have lost momentum due to pending Congressional re-authorization, national standards that incorporate higher-level thinking and problem-solving skills have emerged, such as the Common Core Standards (2010) and Next Generation Science Standards (2013). To ensure student success, the Obama Administration (2009-now) proposed the Recognizing Educational Success, Professional Excellence and Collaborative Teaching (RESPECT)
program (2012). Several components of this program directly addressed reform within teacher education programs. Opening statements made by Secretary of Education, Arne Duncan, at the Second International Summit on the Teaching Profession (2012) identified teacher education programs as doing “at best a mediocre job of preparing teachers and school leaders” (para. 37).

In response to criticisms, two national accrediting bodies for teacher education, merged to form the Council for the Accreditation of Educator Preparation (CAEP). The CAEP (2013) standards arose from this union. These more far-reaching standards increased requirements for entrance into teacher education programs and required multiple measures to document teacher education program effectiveness. Accredited teacher education programs will be held accountable in three areas: teacher candidate graduates’ future effective work in schools as measured by student achievement, data driven decision making in regards to candidates and teacher education program development and reform, and the effective development of resources and pedagogical practices in higher education to support teacher candidate learning (CAEP, 2013).

**Local Teacher Education Programs**

Teacher education programs have played a vital role in the professional development of competent educators capable of meeting and exceeding increased accountability, expectations, and standardization measures (Boyd, Grossman, Loyd, & Wyckoff, 2009; Darling-Hammond & Bransford, 2005; Fullan & Stiegelbauer, 2007; Grossman & Ronfeldt, 2008; Hamilton & Pinnegar, 2001; Korthagen, 2004; Reiman, Sprinthall & Theis-Sprinthall, 1996; Wilson, 2009). While Fullan (2007) described teacher education as “the worst problem” in educational reform efforts, he emphasized that it was moreover the “best solution in education” (p. 278). Boyd, Grossman, Loyd and Wykoff, (2009) expressed that while the responsibilities and obligations placed on teacher education were high, the challenges programs faced were even greater.

Fullan and Stiegelbauer (2007) recognized that teacher preparation programs were often an “afterthought” in education reform efforts (p. 278). With the exception of mathematics and science instruction, funding to support teacher education was “extremely limited” (Zeichner, 2005, p. 751). Second, there was limited empirical
Evidence for the selection and development of effective pedagogical practices to promote teacher candidate professional development (Cochran-Smith & Zeichner, 2005; Korthagen, 2004; Zeichner, 2004).

Although we have learned some things about the impact of particular instructional approaches on teachers’ knowledge and beliefs, there have been few systematic comparisons of the impact of different instructional methods and the effects of instructional methods on future teachers’ practices. (Zeichner, 2005, p. 740)

Korthagen (2004) recognized that pedagogy of effective instruction for children was built upon theoretical understandings gained from psychology, and there had been several developments in this field of science. However, these developments had little influence upon research into teacher education (Korthagen, 2004). Limited application of theory has led to a fourth barrier, a general lack of understanding of pre-service teacher professional identity development. Lastly, Cochran-Smith and Zeichner (2004) and Boyd, Grossman, Lankford, Loeb, and Wyckoff (2009) recognized that there is a general lack of a common set of language, tools, and frameworks to understand facets of teacher learning. Development and utilization of such would enhance collegial collaboration and refinement of each other’s work.

**Issues Impacting Teacher Educators**

Expanded expectations, standardization, and accountability, combined with limited funding and foundational frameworks contributed to teacher educator angst (Murray & Male, 2005). Murray and Male interviewed 28 new teacher educators during their transition from “first-order practitioner,” schoolteacher serving in a school, to “second-order practitioner,” teacher educator (TE) serving in higher education (HE) (p. 126). They concluded that stress experienced during this transition stemmed from increased expectations, role ambiguity, and the required reframing of pedagogical practice. Murray and Male’s (2005) analysis recognized that new TE identity shifted from “expert become novice” in terms of the development of a professional pedagogy (p. 139).

Novice teacher educators reported a heavy emphasis on previous first-order professional practice to anchor credibility within HE. Though first-order skills may
have prompted the transition to second-order teaching, Murray and Male (2005) argued that continued reliance on experiential knowledge negatively impacted TE effectiveness and overall professionalism in three ways.

First, the transmission of advice and personal knowledge “is unlikely to lead to long-term learning about what teaching is and can be, for either the student or educator” (Murray & Male, 2005, p. 137). Secondly, reliance upon advice and storytelling as an instructional strategy may result in candidates acquiring “context specific, procedural knowledge” resulting in a simplistic “technical rational view of teaching” (p. 92).

Utilization of first-order professional practice, advice-giving for professional development, ran counter to change research conducted by Fullan and Stiegelbauer’s (2007). ”People do not learn or accomplish complex changes by being told or shown what to do. Deeper meaning and solid change must be born over time” (p. 80).

Lastly, Murray and Male (2005) found that teacher educators who maintained strong first-order professional identities were hindered in their second-order professional development. Murray and Male (2005) concluded that teacher educators who staked professional credibility on previous classroom experience and maintained a strong “ex-school teacher” identity, often held “ambivalent or negative” attitudes towards research (p. 127). This ‘deficit model’ approach towards teacher education inhibited professional growth and reinforced a commonly held view of teacher educators as ‘semi-academics’ by others in academia (p. 127). Murray and Male (2005) recommended the development of induction programs to assist: “new teacher educators need to develop further pedagogical knowledge and understanding, appropriate for the second-order setting” (p. 137). Induction programs should emphasize both an understanding of teacher education and research practices.

**Teacher Candidate and Teacher Education**

Finally, teacher candidates impact teacher education program effectiveness. Hamilton and Pinnegar (2001) recognized that “careful attention to who our students are, what they know and believe, and what experiences and talents they bring with them is an important but often overlooked component of teacher education” (p. 237). These attributes contribute to the criticisms heaped on teacher education programs.
Brookhart and Freeman (1992) reviewed 44 studies on teacher candidate characteristics. Four broad categories encompassed their findings: demographics, motivations to teach, teaching concerns and perceptions of educator responsibility. While some samples demonstrated variation in statistics regarding ethnicity, Brookhart and Freeman (1992) determined that the overall majority of education majors were Caucasian (80-96%) and female (75-80%). More recently the National Center for Education Information (Feistritzer, 2011) conducted a profile of teachers in the U.S. They found that the numbers of male educators declined to only sixteen percent of public school teaching population. However, there was a slight increase for persons of color within the teaching force. Feistritzer (2011) reported that the 91% of white educators in 1986 dropped to 84% in 2011. Feistritzer (2011) attributed the increase in minority educators to alternative routes and programs for teacher certification.

Lack of diversity was also apparent in pre-service teachers’ motivations to teach. Brookhart and Freeman (1992) found that intrinsic service-oriented goals were especially dominant among elementary education majors and may stem from the majority of candidates reporting more precollege experiences with children. Although the general disposition towards teaching and coursework was positive, the nurturing emphasis of candidates combined with high levels of confidence, increased speculation as to the impact of education course work on candidate professional attitudes (Brookhart & Freeman, 1992).

Hoy, Spero and Woolfolk, (2005) and Whitbeck (2000) asserted that high levels of optimism and confidence may also encourage a disregard of course content knowledge and a greater emphasis in teacher’s intuitive practices. Whitbeck (2000) inferred that pre-service teachers “may neglect their preparation and place higher trust in what the article termed, ‘the personality of the teacher’” (p. 135). Whitbeck claimed that this left pre-service teachers unprepared for the challenges faced in the classroom.

Disregard for teacher education coursework may also stem from what Lortie (1975) coined, the ‘apprenticeship of observation’ (p. 61). Learning about teaching solely through observation often led to misconceptions and a belief that the education profession required little effort (Lortie, 1975; Munby, Russell & Martin, 2001). Observation alone does not give insight into teacher intention or the “pedagogically
oriented framework” upon which lessons were built leading to a shallow understanding of the teaching profession (Lortie, 1975, p. 62). Furthermore, the perceptions acquired during the expanse of time spent learning in traditional style classrooms have a strong influence upon teacher identity acquisition (Hammond & Bransford, 2005). As students, pre-service teachers often experienced a view of teachers as dispensers of knowledge. This traditional perspective of teaching may have led future teachers to misconceive that the learning process was rote and simple (Lortie, 1975; Feiman-Nemser & Buchmann, 1989; Richardson, 1996.) These misconceptions were often carried into teacher education programs and influenced candidates’ responses to content and practicum experiences (Holt-Reynolds, 2000; Lortie, 1975; Skipper & Quantz, 1987; Stipek, 2002).

While many teacher education programs promoted student centered constructivist practices, Darling-Hammond and Bransford (2005) and Zeichner and Tabachnick (1981) recognized that many candidates reverted back to a traditional style of teaching in subsequent classrooms. It was as though the concepts, theory, and practice of teacher education were ‘washed out’ with each year of teaching (Zeichner & Tabachnick, 1981). This phenomenon led several researchers to question the value and effectiveness of teacher education (Boaler & Greeno, 2000; Book & Freeman, 1986; Cochran-Smith & Zeichner, 2004; Cole & Knowles, 1993; Frykholm, 1999; Grossman, Valencia, Evans, Thompson, Martin, & Place, 2000; Hollingsworth, 1989; Holt-Reynolds, 1992; Lampert, 2001; Reynolds, Ross, & Rakow, 2002; Zeichner & Tabachnick, 1981; Weinstein, 1990). While the act of altering beliefs and misconceptions acquired during thirteen or more years of apprenticeship observation was challenging (Fullan & Stiegelbauer, 2007; Kennedy, 1999; Richardson & Placier, 2001), effective teacher education courses and programs have shown that strengthening teacher candidate professional development was practicable (Pintrich, Marx, & Boyle, 1993; Schram, Wilcox, Lanier, & Lappan, 1988; Stuart & Thurlow, 2000).

A Framework for Improving Teacher Education

The field of teacher education has a long history of supposed and proposed limitations. Teacher education programs have garnered limited respect (Fullan & Steigelbauer, 2007; Lanier & Little, 1986; World-class, 2012), has had limited research funding (Fullan, 2007; Zeichner, 2005), and has been accused of having limited impact
on teacher effectiveness (Book & Freeman, 1986; Cochran-Smith & Zeichner, 2004; Cole & Knowles, 1993; Hollingsworth, 1989; Holt-Reynolds, 1992; Reynolds, Ross, & Rakow, 2002; Weinstein, 1990; Zeichner & Tabachnick, 1981). In response to these criticisms, Korthagen, Loughran, and Russell (2006) argued that, “In this new century, teacher education is beginning to be recognized and valued as an object of academic research” (p. 1020). However, teacher education research continued to be hindered by the absence of a common language and framework (Cochran-Smith & Zeichner, 2005; Zeichner & Conkin, 2004).

In an effort to meet the call for a common language and framework (Cochran-Smith & Zeichner, 2005; Zeichner & Conkin, 2004), Korthagen et al. (2006) conducted a cross-cultural meta-analysis gathered from three exemplary teacher education programs on differing continents. The three programs shared a similar “stereotypical structure of a traditional teacher education program that has attracted so much scrutiny and criticism in recent years” (Korthagen et al., 2006, p. 1022). Seven principles of student teacher learning and fundamental program change in teacher education emerged. Korthagen’s research has had a strong influence upon teacher education reform in Europe and throughout the world. This review of the research was structured around Korthagen’s principles as they provided generalized perspectives on teacher education with applicability to programs worldwide.

Korthagen et al. (2006) clustered seven principles into three components of programs and change. (see Figure 2.2) These clusters guided the synthesis of research on improving teacher education. The components include (a) ‘views of knowledge and learning’, (b) ‘program structures and practices’, (c) ‘quality of staff and organization’ (p.1037).

Figure 2.2 Framework for Improving Teacher Education. Adapted from Korthagen et al., 2006, p. 1037.
Principle one stated, “Learning about teaching involves continuously conflicting and competing demands” (Korthagen, et al., 2006, p. 1025). A two-year teacher education is inadequate for a lifetime of effective professional practice. Therefore, teacher education “needs to focus on how to learn from experience and on how to build professional knowledge” (Korthagen et al., 2006, p. 1025). In Preparing Teachers for a Changing World (Hammerness, Darling-Hammond, Bransford, Berliner, Cochran-Smith, and McDonald, et al., 2005) recognized the complexity of developing effective teacher dispositions in pre-service teacher candidates. Hammond and Bransford (2005) suggested that the task could not be fully accomplished during the limited time spent in teacher education programs.

Teacher education programs must instead create courses that transform candidates into “adaptive experts” devoted and equipped for lifelong learning (Hammond & Bransford (2005) p. 358). Hammond and Bransford (2005) introduced the concept of adaptive expertise and hypothesized that there were two dimensions to adaptive expertise: efficiency and innovation. To develop efficiency and innovation teacher candidates must often “change their core competencies and continually expand the breadth and depth of their expertise” (p. 49). While this process of identity restructuring may require more time initially, it will serve to sustain professional flexibility and adaptability throughout educators’ careers.

Flexibility and adaptability were noted as important candidate attributes during the acquisition of teacher preparation’s dual set of knowledge. Candidates must learn about learning and learn about teaching (Korthagen, 2006). Unfortunately pre-service teachers often enter teacher education programs with thirteen or more years of student seat-time or what Lortie (1975) referred to as the “apprenticeship of observation” (Lortie, 1975). This passive observation promoted the belief that teaching required little effort (Lortie, 1975; Munby, Russell & Martin, 2001). Additionally, pre-service teachers’ prior classroom experiences were often steeped in a traditional view of education, a view that regarded teachers as dispensers of knowledge. This traditional perspective fueled the misconception that the learning process was rote and simple (Lortie, 1975; Feiman-
Nemser & Buchmann, 1989; Richardson, 1996). Kalaian and Freeman (1989) discovered that these misconceptions were often maintained from teacher education entry to exit.

Cochran-Smith (2003), Ashton (1996) Ashton and Gregoire-Gill (2003) recognized that pre-service teachers were often unaware of their misconceptions. Therefore, teacher educators were encouraged to embed opportunities for making implicit beliefs explicit throughout coursework. Traditional theory-into-practice teacher education programs sadly neglect this practice and reinforce the simplicity of learning and teaching misconception (Ashton & Gregoire, 2003; Cochran-Smith, 2003; Korthagen et al., 2006). If pre-service teachers “start to believe that teaching is about translating theory into practice in a direct manner, the confrontation with the complexities of practice is shocking” (Korthagen et al., 2006, p. 1027).

Maintenance of misconceptions may leave future educators ill equipped to acquire insight into the complexities of the classroom. Perhaps this could account for the “reality shock” faced by new teachers (Veenman, 1984, p. 144), the 30% rate of attrition for teachers within their first three years (Darling-Hammond, 2003), or the 60-70% of pre-service teachers who select other careers due to concerns of unpreparedness and never enter the classroom (Darling-Hammond & Sclan, 1996).

The second principle outlined by Korthagen et al. (2006) stated, “Learning about teaching requires a view of knowledge as a subject to be created rather than as a created subject” (p. 1027). This principle emphasized a process-oriented view of knowledge. Korthagen et al. (2006) supported the use of cyclic reflection model to foster self-reflection and assist teacher candidates in the construction of theory and knowledge. Korthagen’s et al (2006) ALACT model acquired its name for each step in the process, (see Figure 2.3). Students recorded eight one-to-one tutoring sessions and analyzed experiences. Four recordings were analyzed in peer pairs and four were analyzed with the course instructor. This structured reflection provided opportunity for creation of personal professional knowledge.
Kagan (1992) supported the use of reflection to facilitate identity construction and a strong self-image as teacher. Zautra (2009) claimed that the process of reflection builds resilience. Zautra recognized that resilience allowed for quicker recovery from challenges and the ability to sustain and continue forward in the face of adversity. Gu and Day (2007) found that these qualities of resilience were necessary for educator effectiveness.

Lee (2005, 2008) recognized the role reflection could play in the acquisition of new ideas, skills and as a strategy to promote professional growth. Lee characterized four levels of reflection based on contrasting depths of thought. The first level “non-reflection or pure description level” involved recall with no attempted explanation. The second level was identified as the “recall level” in which the observer reflected based on experience, with minimal explanation and without regard for other perspectives. The third “rationalization level” extended beyond personal experience to an understanding of why the event occurred. The highest or fourth “reflectivity level” incorporated multiple perspectives with intent to change or improve the future (Lee, 2008, p. 124).

Reflection was not solely beneficial to pre-service teachers but could serve to inform teacher education practice. Analysis of candidate reflections could assist teacher educators in understanding professional identity development, an area of neglect as noted by Dyer (2012), Korthagen (2004), Olsen (2008), Zeichner and Conklin (2004), and Zeichner (2005). Wilson, Folden, and Ferrini-Mundy (2002) recognized that pre-service teacher reflections could assist in the construction of teacher education content and provide valuable insights into teacher learning. Student reflections could then shape methodology and influence policy in regard to teacher education.
The third principal recognized that candidate professional development required a shift in focus from curriculum to the learner. Korthagen et al. (2006) stated that teacher education must help candidates “learn how to help children learn” (Korthagen et al., 2006, p. 1030). Korthagen et al. recognized that teacher education must provide candidates with “opportunities to access the thoughts and actions of teachers in ways that help to illuminate not only the teaching actions themselves, but also the feelings and the reasons for particular teaching actions” (Korthagen et al., 2006, p. 1029). Redirecting candidate’s focus from content or an emphasis on teaching to the student learning.

Historically researchers have attempted to establish developmental stage theories to frame classroom influences upon identity development. Earliest among these was Fuller's (1969) developmental model of candidate concerns. Fuller's theory held that teacher concerns developed in stages that progressed from a concern with self, to the task of teaching, and then a focus on impact or student learning. Brookhart and Freeman (1992) provided an overview of the Fuller’s stages,

During student teaching and their initial year or two in the profession, teachers tend to be concerned about their adequacy as teachers, their ability to maintain discipline, and being liked by students. It is not until the final stage that teachers’ primary concern is student achievement. (p. 49)

However, Brookhart and Freeman (1992) found in their literature review gave that “student achievement is an overarching concern among teachers at all levels of professional development (p. 49). Watzke’s (2007) more recently argued that developmental theories such as Fuller’s (1969) concerns based model offer “parsimony in their comprehensiveness to the multiple contexts in which teaching and teacher development take place, but risk oversimplifying the complex nature of learning to teach” (p. 106).

Watzke (2007) longitudinal study analyzed concerns inventories of 79 participants over six application points spanning two years. Results indicated teachers’ concerns for impact on student learning ranked highest throughout the span of time. Watzke suggests that unlike Fuller’s (1969) concerns based model, a chronological progression from internal to an external concern model is non-existent. Impacting
student learning is an on-going component of the professional development of beginning teachers and supports the view that “beginning teachers are capable of complex and student-oriented thinking” (Watzke, 2007, p. 118).

**Program Structures and Practices**

Principle 4: Learning about teaching is enhanced through (student) teacher research.

Principle 5: Learning about teaching requires an emphasis on those learning to teach working closely with peers (Korthagen et al., 2006, p. 1032).

Principles four and five focused on program structures and practices. The underlying assumption was that “student teachers can and should research their own practice” (Korthagen et al., 2006, p. 2030) individually and through collaborative discourse with peers. These two principles appear strongly connected to Fullan and Stiegelbauer’s (2007) research on change. First, “people do not learn or accomplish complex changes by being told or shown what to do. Deeper meaning and solid change must be born over time” (Fullan & Stiegelbauer, 2007, p. 92) and “all successful strategies are socially based, and action oriented” (p. 44).

Korthagen et al. (2006) encouraged teacher education programs to adopt a view of student teacher as learner. Programs should allow time for the acquisition and analysis of data, or individual teacher experiences.

Learning by researching their own practice is therefore a crucial component in learning about teaching and in teaching about teaching, and another means of counterbalancing the tendency in traditional teacher education to create a gap between research-based knowledge and practice. (Korthagen et al., 2006, p. 1031)

Korthagen’s et al. (2006) principle five emphasized the importance of “working closely with peers” to further facilitate connections between research and practice. The Utrecht teacher education program incorporated “peer-supported learning” (p. 1032). Small group reflection sessions were incorporated into the teacher education program to allow students to share data (personal experiences), record minutes, and suggest areas for future research and teacher educator assistance. The process served as an effective
formative assessment for the teacher educator, but also promoted shared responsibility for learning. Pre-service teachers developed competencies not only for themselves but to also serve those within their professional community. Korthagen et al. (2006) argued that such a program counterbalanced a teaching culture which Feiman-Nemser and Floden (1986) recognized as largely isolated, individualistic, and non-collaborative.

Zeichner (2009), Price, and Valli (2005), and Fullan and Stiegelbauer (2007) encouraged teacher education programs to provide opportunities for pre-service teachers to become agents of change. They encouraged the use of service learning projects, action research, and inquiry based experiences to assist in this process. These program suggestions align closely with principle four and provide opportunities for the collaboration, the primary emphasis in principle five (Korthagen et al., 2006).

**Quality of Staff and Organization**

Principle 6: Learning about teaching requires meaningful relationships between schools, universities, and student teachers (Korthagen et al., 2006, p. 1034).

The final two principles dealt with program organization and the quality of teacher educators. Principle six emphasized the consideration of additional voices within the context of teacher education organization. Korthagen et al (2006) promoted the use of focus groups consisting of teachers and principles to provide valuable insight into teacher education program improvement. Korthagen et al. further argued for the inclusion of the intimate, invested, and rarely utilized perspectives of preservice teachers (Korthagen et al., 2006).

Cochran-Smith (2003) prior research suggested:

What we need in teacher education are not better generic strategies for teaching but generative ways for prospective teachers, experienced teachers, and teacher educators alike to work together in communities of learners-to explore and reconsider their own assumptions, understand the values and practices of families and cultures that are different from their own, and construct pedagogy that takes these into account in locally appropriate and culturally sensitive ways. (Cochran-Smith, 2003, p. 24)
Eliciting the external community to promote candidate cultural sensitivity and prepare candidates to the needs of diverse learners was emphasized throughout literature on teacher education improvement (Darling-Hammond & Bransford, 2005; Ladson-Billings, 2005, 2006; Price & Valli, 2005; Sleeter, 2001; Zeichner, 2009). A number of researchers were concerned as to the limitations of traditional program organization and structures, such as student teaching and practicum experiences for American preservice teachers (Hong & Greene, 2011; Darling-Hammond & Bransford, 2005; Guyton and McIntyre 1990; Schulz & Mandzuk 2005; Zeichner and Gore 1990).

Practicum and student teaching experiences often take place in white, middle class communities similar to prior experiences of pre-service teachers and provide limited exposure to schools that reflect cultural and linguistic diversity (Ladson-Billings, 2005; 2006; Sleeter, 2001). The contrast in perceptions gained from previous experience and the challenges faced by urban school teachers may account for the 30% attrition rate of educators within their first three years (Darling Hammond, 2003) and the revolving five year turnover rate for urban school teachers (Peske, H. G. & Haycock, 2006).

Pohan, Ward, Kouzekanani, and Boatright (2009) conducted a comparative study of candidates serving White middle-class students and those serving low-income students of color. They found that candidates placed in high-need schools became more culturally responsive. Coldron and Smith (1999) recognized that the provision of a range of diverse preservice teaching opportunities might increase identity awareness. While Freese (2006) suggested that placement diversity may effectively shape “teacher selves” (p. 100), Garrett (2002) argued that exposure alone to diversity and high need students and schools, is an insufficient preparation strategy. “Only through carefully directed activities, with ample opportunity for reflection, can preservice teachers grow to become the kind of educators who are capable of working with a diverse population (Garrett, 2002, p. 68). Banks, Cochran-Smith and Moll et al. (2005) recognized the need for candidates to use diverse practicum experiences as opportunities to “examine how classroom and school-level practices work to enhance or undermine achievement for different groups of students” (p. 274).

While diverse opportunities may influence candidate professional development, researchers also recognized limitations of field experiences when facilitated by
inexperienced and ineffective mentors (Athanases & Achinstein, 2003; Lesley, Hamman Olivarez, Button & Griffith, 2009). Lesley, Hamman Olivarez, Button and Griffith (2009) researched interactions and influences of cooperating teachers on student teachers’ acquired skills in reading instruction. Results revealed that the majority of participating cooperating teachers failed to provide perspectives on their own “operating philosophy” (p.48), de-valued candidate prior knowledge, and promoted candidate observation which in turn resulted in mainly imitative interactions. Lesley et al. (2009) recognized that this passive form of mentor-mentee interaction impeded candidate development of decision-making skills and reflective practices and was especially detrimental to candidate knowledge of assessment for learning. This “abandoned” (p. 52) style of mentoring appeared to correlate with mentor’s who held limited literacy content and pedagogical knowledge. Conversely, cooperating teachers were more likely to guide, scaffold, and coach candidates if they had participated in more literacy course work, received mentoring from literacy coordinators, and had contributed to the profession through conference presentations. While Lesley et al. (2009) emphasized the essential role of active mentoring on a candidates’ professional development, they encouraged teacher preparation programs to limit classroom observation. Increased levels of passive observation resulted in candidates who were more likely to “blindly reproduce” (p. 53) observed practices without self-evaluation. Lesley et al. (2009) suggested, “strict notions of expert-novice relationships between student teachers and cooperating teachers need to be revised to an inquiry-oriented reciprocal teaching model” (p. 53) and emphasized the need for continued research on mentoring relationships.

Principle 7: Learning about teaching is enhanced when the teaching and learning approaches advocated in the program are modeled by the teacher educators in their own practice. (Korthagen et al., 2006, p. 1036)

Korthagen’s et al. (2006) final principle addressed teacher education pedagogy. Teacher educators must model effective instructional strategies. “Student teachers report their disappointment when they experience a class in which a lecture is used to present alternatives to lecture methods” (Korthagen et al., 2006, p. 1036). Korthagen et al. promoted the allowance of student teacher critiques of university professors and the use of professor dialogue and explanation of instructional choices to make “pedagogical
reasoning for practice clear, explicit and understandable” (p. 1036). Such practice allows pre-service teachers to understand insight into how experienced teachers “take risks and develop new teaching approaches” (Korthagen et al., 2006, p. 1036). Korthagen et al. (2006) quoted Northfield and Gunstone (1997): “Teacher educators should maintain close connections with schools and the teaching profession” (Northfield & Gunstone, 1997, p. 49).

Effectiveness as a teacher educator hinges on knowledge of three differing perspectives: pre-service teachers, teachers in the classroom, and practice of a teacher educator. While teacher educator expectations are broad and knowledge requirements deep, teacher educators are often provided little support (Murray & Male, 2005).

Murray and Male (2005) researched stress associated with the transition from classroom teacher, first-order practitioner, to teacher educator, second-order practitioner. Teacher educators were often impacted by concerns of inadequacy in professional and academic knowledge, difficulty adjusting personal pedagogical practice to meet the needs of adult learners, and stress associated with research expectations. While a clear grasp of higher education based professional education and understanding of practices is still in the developmental stages, Murray and Male (2005) made several suggestions to assist teacher educators in establishing a personal pedagogy and becoming research active.

Murray and Male (2005) endorsed the incorporation of higher education induction programs that met the specific needs of teacher educators. Second, they encouraged teacher educators to reflect on what Korthagen and Kessels (1999) identified as epistemic knowledge, or their personal perceptions of education. Murray and Male (2005) suggested that such self-study cemented emerging second-order pedagogical practice. Self-study could also transition teacher-educators into the role of researcher and enable them to fulfill the daunting research expectations of universities.

The American Educational Research Association (AERA) Panel on Research and Teacher Education (Cochran-Smith & Zeichner, 2005) concluded a four-year study on research in teacher education with suggestions for improving the body of knowledge. Cochran-Smith and Zeichner (2005) emphasized the need to frame “research in relation to relevant theoretical frameworks” which will allow for authentic explanations of findings (p. 741). They also recognized the need to extend upon previous research findings. “There is very little evidence in the studies reviewed of researchers’ building
on others’ work in establishing chains of inquiry around particular questions and consistently defined outcomes” (Zeichner, 2005, p. 742).

The AERA panel (2005) recognized the value of qualitative research design in the field of teacher education and established criteria for effective design. They suggested a clear and consistent definition of terms, full description of data collection, and analysis coding categories and context. Conklin and Zeichner (2005) recognized that data gathered from a well-designed qualitative case study might provide insight into effective teacher education pedagogy.

Though teacher education is challenged by a myriad of complex influences, increased expectations, and criticisms, Darling-Hammond et al. (2005), Fullan (2007), Sprinthall, Reiman, and Theis-Sprinthall (1996), Hamilton and Pinnegar (2000), and Korthagen, (2004) still recognized the positive impact traditional teacher education programs had on teacher effectiveness. Korthagen et al. (2006) suggested that the seven generalizable principles provided a framework to meet the need for a common language for teacher education reform, a hindrance to improving teacher education previously identified by Cochran-Smith and Zeichner (2004). Korthagen’s et al. (2006) framework also provided insight into areas of noted neglect; teacher candidate input and limited research on preservice professional identity development.

**Candidate Professional Identity Development**

Beijaard et al. (2004) defined teacher’s professional identity development as an ongoing “process of practical knowledge building characterized by an ongoing integration of what is individually and collectively seen as relevant to teaching” (p. 123). Avalos (2011), Beauchamp and Thomas (2009), Freese (2006), Hoban (2007), Kagan (1992), Olsen (2008), and Sachs (2005) recognized professional identity development as central to teacher professionalism. Many researchers have agreed that strengthening professional identities influenced teacher effectiveness, increased motivation, and may decreased attrition (Avalos, 2011; Day, Kington, Stobart, & Sammons, 2006; Lasky, 2005; Van Den Berg, 2002). An understanding of identity development should therefore be a central component of teacher education pedagogy.

Dyer (2012), Korthagen (2004), and Olsen (2008) recognized that little was understood about the process of professional identity development in pre-service
teachers. Avalos (2011) reviewed ten years of literature on preservice and inservice teacher professional development and recognized the complexity of “teachers learning, how to learn and transforming their knowledge into practice for the benefit of their students’ growth” (p. 10). While several effective strategies were discussed and analyzed, Avalos recognized the limited understanding and evidence supporting effective instructional strategies to support sustainable professional development. Zeichner and Conklin (2004) and Zeichner (2005) attributed that the greatest obstacle faced by teacher education to an inadequate understanding of teacher professional identity development. A general lack of clarity in regards to teacher professional identity development inhibited the progress of teacher education pedagogy. This in turn may encumber the transformation of teacher candidate’s beliefs and misconceptions acquired through the “apprenticeship of observation” (Lortie, 1975).

Though several hypothetical frameworks have been developed, a comprehensive understanding of pre-service professional identity development is lacking (Beijaard, Meijer, & Verloop, 2004). Several researchers have attempted to unpack the complex components and influences upon professional identity development (Kelchertman, 2005; Lasky, 2005). The ensuing chapter will utilize Korthagen’s (2004) adapted “onion model” to dissect the layered complexities of this process. The layers of the ‘onion model’ (see Figure 2.4) from outer to inner are as follows: environment, behavior, competencies, beliefs, identity, and mission or core.

Korthagen (2004) recognized interaction and interdependence between the layers of his professional development model. The environment may alter behavior, which in turn influence the internal layers of identity and mission. Or conversely, the internal layers of identity and mission may influence teacher behavior response to the external environment.

**Figure 2.4 The Onion Model of professional identity development.** Used with permission Korthagen, Kim, & Greene (2013).
Palmer (1988) recognized the layered nature of the educator, “the teacher within is not the voice of conscience but of identity and integrity. It speaks not of what ought to be but of what is real for us, of what is true” (p. 32). While research on identity development is exhaustive, Korthagen’s (2004) framework was used to structure the following investigation of teacher candidates’ professional identity development.

**Environment**

External factors such as preparation programs, inservice training, classroom resources, students, administrative support, and the school environment and facilities all impact teacher professional development. Korthagen (2004) recognized that the easily observed classroom environment was an area of intense focus and often viewed by candidates as a problem. Beltman, Mansfield, and Price (2011) identified additional environmental factors that impeded candidate professional development. Candidates reported that course structures were “unsuitable”; they struggled with the “academic workload”, time management, lack of familial support for the profession, and difficulties balancing commitments between home and work (p. 189). Beltman, Mansfield, and Price (2011) determined that the most frequent external environmental concern revolved around issues of behavior management.

Ingersoll (2001) explored environmental factors that impacted inservice or classroom teacher professional dissatisfaction. Ingersoll found that “inadequate support from the administration, low salaries, student discipline problems and limited faculty input into school decision-making all contribute to higher rates of attrition and teacher turnover” (p. 501). Avalos (2011) recognized that while both preservice and inservice
classroom teachers were able to see problems in their practice, they struggled to determine solutions (Avalos, 2011).

Behaviors

Korthagen (2004) classified pre-service teachers’ responses to environmental factors as behaviors. Yost (2006) interviewed ten successful educators and identified several effective teacher behaviors. Educators shared a focused effort to understand student needs, develop authentic student relationships, and design learning opportunities to meet varied student needs. The educators’ emphasis on creating a supportive classroom climate manifested itself in the exhibition of patience, enthusiasm and a positive attitude. In regards to classroom structure, educators reported being organized, incorporating a variety of instructional strategies, and being creative. These educators also reported an emphasis on developing a reflective and problem solving practice in order to meet classroom challenges (Yost, 2006).

Stronge, Ward, and Grant (2011) attempted to unpack the elusive, complex, and widely debated concept of effective teacher behaviors. Their two-phase study attempted to provide consensus on the ‘what’ and ‘how’ of teacher quality. They first utilized disaggregated student achievement scores to identify teachers in the bottom and top cortile categories. The second phase of research was framed by a review of the literature that identified sixteen effective and affective teacher traits. These traits were grouped in the following four categories: instructional delivery, student assessment, learning environment and personal qualities. These categories shaped the conceptual framework for observations, interviews, and the characteristic comparison. The study found that top performing educators excelled in affective traits such as, “fewer classroom disruptions, better classroom management skills, and better relationships with their students” (p. 349). There were no “significant differences between effective and ineffective teachers on the dimensions of instructional delivery and assessment“ (p. 350). This study did not attempt to disregard research on effective instructional strategies, but instead recognized the significance of the affective interpersonal attributes and behaviors of effective teachers.
Competencies

Shulman and Shulman (2004) identified four competencies candidates needed for understanding the complexities of teaching and learning. These included the ability to connect pedagogy to student learning, technical organizational and instructional management skills, commitment to professional development and life long learning, and the ability to engage in self-reflection. Korthagen (2004) recognized that competencies blend both content knowledge and pedagogical practices. “They represent a potential for behavior, but not the behavior itself” (Korthagen, 2004, p. 80).

Korthagen (2004) provided a historical perspective of competency standards that impacted teacher education standards since the 20th century. During this era, there was a focus on performance or competency-based models. Studies attempted to identify teaching behaviors that had the highest correlation to student achievement. From this research fragmented lists of skills were established. Korthagen (2004) argued that these lists failed to recognize the complexity of teacher professional identity development. In the 1970’s, Korthagen (2004) noted an emerging view counter to competency lists. This Humanistic Based Teacher Education movement recognized the complexity of the person as a teacher. These two movements contrasted sharply and Korthagen believed the conflict has continued.

More recently, emphasis has been placed on teacher education admission selectivity via increased entrance standards to increase teacher competency and improve student achievement (see: CAEP, 2013; RESPECT, 2012). Secretary Duncan supported this strategy in the following statement, “While high-performing nations almost universally have a high bar to entry-rejecting as many as nine in ten applicants who want to teach in their countries-here in the U.S. we basically allow anyone to teach” (Duncan, 2012).

This belief in the non-exclusivity of teacher education and the implied incompetency of teachers may be fueled by outdated misinformation. Zumwalt and Craig (2005) cited A Nation at Risk: The Imperative for Educational Reform as the foundation for such claims. Within this document teacher education was accused of drawing from the “bottom quarter of graduating high school and college students” (National Commission on Excellence in Education, 1983, p. 22, in Zumwalt & Craig,
More recent studies discount this claim. This misleading statistic looked solely at SAT and ACTS of high school seniors who reported an intention to teach. Scores did not reflect those who actually entered or completed teacher education programs (Olsen, 2008).

More recently, Zumwalt & Craig (2005) looked exclusively at GPAs of general courses, excluding those within the colleges of education: “These studies indicated that teacher education students had comparable or sometimes better ability and achievement than did other college students at the same institutions” (p. 159). Another predictor of university success is high school class rank. While teacher graduates may have scored lower on High school ACT tests than did their non-education major peers, there was no difference in high school class rank. In fact, comparison of university GPA was higher for education majors in general content courses, subject major courses, and overall GPA (Zumwalt & Craig, 2005).

The quality of our teaching pool continues to increase. Gitomer (2007) analyzed Educational Testing Service reports and found that SAT-Math scores of pre-service teachers had risen 17 points, and SAT-Verbal scores showed an increase of 13 points. Additionally, there has been a 59% increase in female and 29% increase for male educators graduating with degrees from top colleges and universities (Ingersoll & Merrill, 2010).

While increased entrance standards in regards to ACT and SAT may appear to be an effective strategy for increased educator competency and effectiveness, researchers have identified several negative consequences associated with this strategy. Zumwalt and Craig (2005) feared that increased standards might cause a decline in the already disproportionate numbers of educators from diverse backgrounds. Currently, the teacher population is made up of 84% self-reported white, non-Hispanic teachers (Feistritzer, 2011). There are significant differences by race and diversity for success on traditional teacher education exams. Zumwalt & Craig (2005) “found that 82% of Whites passed, whereas only 46% of African Americans passed, with Asian (76%) and Hispanic (69%) pass rates falling in between” (p. 167). State studies identified a decline in minority teachers where teacher-testing mandates were imposed (Zumwalt & Craig, 2005; cited: Smith, 1987). Diversity within the “teaching pool is seen as a critical element of a
quality teaching pool, mandated teacher tests can be seen as having contradictory influences on quality” (Zumwalt & Craig, 2005, p. 184). Zumwalt and Craig (2005) concluded that reliance on SAT, ACT, GPA’s and other certification tests are inadequate in predicting future teacher competency.

Zumwalt and Craig (2005) expressed a distrust of quality profiles that relied solely on quantitative measures. “Teaching requires a mix of intellectual and personal qualities” (p. 183). However, there are currently no measures “based on more broadly defined conceptions of intellectual competence than SAT and ACT scores”, and Zumwalt and Craig (2005) lamented that developing assessments able to measure “personal qualities will be a daunting challenge” (p. 186). Beijaard, Meijer, and Verloop (2004), Korthagen (2004), Sutherland, Howard, and Markauskaite (2010), and Timoštšuk and Ugaste (2010) suggested that the idea of teacher quality should delve deeper, beyond lists of competencies and be more dependent on fostering strong core beliefs and identity qualities.

**Beliefs**

Beijaard, Meijer, and Verloop (2004), Korthagen (2004), Sutherland, Howard, and Markauskaite (2010), and Timoštšuk and Ugaste (2010) further agreed that teacher competencies are strongly influenced by effective teacher education programs. To accomplish this, teacher educators must have an understanding that delves beyond teacher competencies.

“Teacher identity—what beginning teachers believe about teaching and learning and self-as-a-teacher, is of vital concern to teacher education; it is the basis for meaning making and decision making…Teacher education must begin, then, by exploring the teaching self.” (Bullough, 1997, p. 21; cited in Korthagen, 2004, p. 83)

Pinnegar et al. (2011) identified, “Teachers’ beliefs (or visions) function as skeletal understandings which impact planning for teaching as well as teacher interaction and action in the classroom” (p. 640). While Richardson and Placier (2001) argued that research has provided limited clarity connecting beliefs to teacher behavior, Avalos (2011), Korthagen (2004), and Munby, Russell, and Martin (2001) recognized that
experienced teachers generated reflection and practice based on these beliefs. Pre-service teachers often entered the field of education with beliefs strongly influenced by myths obtained during their ‘apprenticeship of observation’ (Lortie, 1975). There was often a limited awareness of these acquired implicit beliefs (Ashton, & Gregoire, 2003; Cochransmith, 2003). The beliefs left unexamined may interfere with the effectiveness of teacher education and decelerate professional identity development (Beijard, Meijer, & Verloop, 2004; Korthagen, Loughran, & Russell, 2006; Pinnegar et al., 2011; Sutherland, Howard, & Markauskaite, 2010). While many recognized the process of belief change as challenging, it has been shown that it is not impossible (Pintrich, Marx, & Boyle, 1993; Schram, Wilcox, Lanier, & Lappan, 1988; Stuart & Thurlow, 2000).

Woolfolk, Rosoff, and Hoy (1990) studied 55 private school teacher’s beliefs about control, management, and motivation and the resulting impact on self-efficacy. Educators that held a mistrusting belief in student capabilities placed emphasis on controlling student behavior, viewed their students as unsatisfied, and were more likely to utilize extrinsic rewards to maintain classroom control. Alternately educators that held an optimistic and humanistic belief, “that all students can be taught” had a “greater tendency to support student autonomy in problem solving” (Woolfolk, Rosoff, & Hoy, 1990, p. 146).

To ensure teacher professional effectiveness in the 21st century, Marzano and Heflebower (2012) placed heavy emphasis on the vital skill of problem solving. He recognized how beliefs impact this ability. His research connected self-efficacy, or the belief that one has control over his or her life, to improved work-related performance, increased thinking skills, and increased persistence. Dweck (2000) examined the influence of beliefs in the nature of intelligence on learner success. Individuals that believed intelligence was fixed or unchangeable were focused solely on results and disregarded the constructive process of learning. Students with this mindset exhibited passive classroom behavior and limited effort and enthusiasm for learning. While those that maintained a belief in an ability to grow or change intelligence embraced challenges, seeing failure as an opportunity to learn. These mastery-oriented students were persistent and ambitious in learning pursuits. Marzano (2012) emphasized educator modeling of this growth mindset or belief system to ensure student success in the 21st century.
Identity

Student academic success is largely dependent upon teacher effectiveness (Stronge, Ward & Grant, 2011; Nye, Konstantopoulus & Hedges, 2004; Wilson, 2009, 2011; Wright, Horn, & Sanders, 1997; Haskins & Loeb, 2007; Sunderman, Tracey, Kim, & Orfield, 2004, Sanders & Rivers, 1996, McMurrer, 2007). Kagan (1992) found that beginning teachers were more effective in their first year when they entered classrooms with a strong identity and sense of self as teacher. “Developing an identity as a teacher is an important part of securing teachers’ commitment to their work” (Hammerness, Darling-Hammond & Bransford, 2005, p. 383). Without a strong and flexible identity new teachers will not succeed in the profession (Feiman-Nemser, 2001). Teacher identities influence beliefs, competencies and behaviors and therefore warrant continued research (Korthagen, 2004).

Olsen (2008) and Sfard and Prusak (2005) recognized that identity was a combination of product and process. The product or results came from differing influences and the process or interactions within differing contexts of teacher education. Influences and effects contributed to the dynamic and fluid nature of identity development (Beijaard et al. 2004, Gee, 2000-2001; Olsen, 2008), which was often plagued by multiplicity and a myriad of sub-identities (Beijaard et al. 2004). Overtime a host of internal personal and external contextual factors serve to filter, refine, and legitimate professional identities resulting in a “harmonious whole” (Sutherland et al., 2010, p. 456).

Several authors categorized the characteristics, influences, and the effects of professional identity development. Lauriala and Kukkonen (2005) saw identity as both stable and dynamic. Their model recognized three dimensions of self, the actual or current self, the ought-self based on external societal goals, and the ideal self established by the individual. Gee (2001) recognized that identity is impacted by differing contexts. The four contexts were “nature-identity” (one’s natural state), “institution-identity” (impact of authority on position), “discourse-identity” (impact of others comments upon oneself), and “affinity-identity” (one’s interactions and practices in relationship with others) (Gee, 2001, p. 99). Olsen (2008) viewed identity as a “collection of influences and effects from immediate contexts, prior constructs of self, social positioning, and
meaning systems each itself as fluid influence and all together an ever-changing construct that becomes intertwined inside the flow of activity as a teacher simultaneously reacts to and negotiates given contexts and human relationships at given moments” (Olsen, 2008, p. 139). Kelchtermen’s (2005) research explored interrelated parts of professional identity: self-image, self-esteem, job-motivation, task perception, and future perspective. While Lasky (2005) identified factors such as commitment, knowledge, beliefs, values, emotional wellbeing, and vulnerability in his understanding of identity development during times of transition and change.

Figure 2.5 depicts the mosaic of influences developed from a synthesis of professional identity development research on pre-service and in-service teachers. A list of researchers (see Table 2.1) and a brief summary of findings that address each attribute follows.

**Figure 2.5 Mosaic of influences upon professional identity development (Gonzalez-Bravo, 2014)**
Table 2.1 Synthesis of Research on Influences upon Professional Identity Development.

<table>
<thead>
<tr>
<th>Social: Social interactions and societal influences</th>
<th>Emotional: Affect and feeling</th>
<th>Motivational: Efficacy and agency</th>
<th>Experiential: Prior knowledge and</th>
<th>Rational: Reflection and contemplation</th>
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Experiential: Prior knowledge and experiences

Beijaard et al. (2004) defined the concept of self or identity as “an organized representation of our theories, attitudes, and beliefs about ourselves” (p. 108). Self or identity, or the idea of who we are, is impacted by gender, race, and national origin (Oyserman & Fryberg, 2006). Identity emerges from both these personal attributes and experiences and from professional knowledge gleaned, filtered, and refined through personal negotiated experiences (Beijaard et al., 2004, Gee, 2000-2001; Kelchtermans, 2005; Olsen, 2008; Sutherland, 2010). Identity is constructed by a teachers “ideas of ‘how to be’, ‘how to act’, and ‘how to understand’ their work and their place in society” (Sachs, 2005, p. 15).

Social: Social interactions and societal influences

Identity formation is influenced beyond self-perception to the perceptions of others. Beijaard et al. (2004) described how identity is “developed through transactions with the environment…in a social setting where there is social communication” (p. 107). Coldron and Smith (1999) found that external feedback provided opportunity for self-perceptions of personal identity development to be “socially legitimated” (p. 712). Societal conceptions, expectations, and accepted images about what teachers should know and be able to do influence identity development (Beijaard et al, 2004).

Emotional: Affect and feeling

Zembylas (2003) recognized the centrality of emotions and their role in informing and defining the process of identity development. “Emotions are understood as experiences that result from teachers’ embeddedness in and interactions with their professional environment” (Kelchtermans, 2005, p. 996). Kelchermans (2005) summarized Nias’ research, which, “argued that affectivity is of fundamental importance in teaching and to teachers” (p. 995). There were three premises for this claim. First, teachers feel passionate in their efforts to serve students, their personal professionalism, and that of colleagues. Teachers harbor emotions in interactions with parents and those in authority and often respond emotionally to school structures and policies that impact pupils and themselves. Second, emotions are influenced by and influence teacher
knowledge, perceptions, and judgments. Lastly, Kelchterman (2005) noted that emotional responses are linked to self-perceptions, which are influenced socially and culturally.

O’Connor (2008) explored emotional management within school contexts by investigating the act of caring, “emotions, actions and reflections that result from a teacher’s desire to motivate, help or inspire their students” (p. 2008). Participants viewed care for and about students as both an additional demand and as philosophical fuel to promote sustainability in the profession. While teacher emotions experienced or forbidden have the potential to expand or limit possibilities in teaching (Zembylas, 2003), such core components of identity development are often unaccounted for in professional frameworks defining effective teaching (O’Connor, 2008).

**Motivational: Efficacy and agency**

Motivation, efficacy and agency differ in definition but are intricately involved in identity development. Deci and Ryan (2000) identified motivation as the driving force of action, “to be motivated means to be moved to do something” (p. 54). Motivation is influenced intrinsically or internally valued, and extrinsically for an external purpose or reward (Deci & Ryan, 2000). Balduf (2009) linked lack of motivation to university student underachievement.

Bandura (1982) asserted that efficacy, or an individual’s self-perceptions about competency, was the bridge between knowledge and action. Bandura researched how self-competency judgments influenced motivation and behavior. Self-judgments either impede or prompt participation, effort, and persistence (Bandura, 1982). High and low self-efficacious precepts can both inadvertently enhance or weaken preparatory performance. For example, self-doubt may spur the pursuit of understanding but also hinder performance while conversely those with high levels of self-efficacy may fail to invest effort and time in the acquisition of knowledge and skill.

Thus some uncertainty has preparatory benefits. An aid to good performance is a strong sense of self-efficacy to withstand failures coupled with some uncertainty (construed in terms of challenge of the task, rather than fundamental doubts about one’s capabilities) to spur preparatory acquisition of knowledge and skills. (Bandura, 1982, p. 123)
Agency is recognized as a person’s capacity or ability to perform. Coldron and Smith (1999) recognized agency as the ability to dissect emotions, experiences, and interactions and provide self-explanations and justifications. Kelchtermans (2005) identified agency as the observable reactions to situations. Bandura (1982) recognized that agency was motivated by need, personal interest, an explicit and unifying purpose, perceptions of attainability, and “proximal sub-goals are needed to provide incentives and evidence of progress along the way” (p. 145). An educator’s agency, ones analysis, action, and reactions, are grounded in professional convictions and future aspirations (Paris & Lung, 2008).

Rational: Reflection and contemplation

Identity development is an active process dependent experiential reflection and the refining of interpretations (Sutherland et al., 2010). The reflective process is spurred further by individual aspirations (Paris & Lung, 2009; Smeby, 2007). This element of rational identity will be explored in the introduction to the theoretical framework.

Dyer (2012), Korthagen (2004), Olsen (2008), Cochran-Smith and Zeichner (2004; 2005), and Zeichner and Conklin (2004) recognized the limited understanding that exists in regards to the complex process of professional identity development. “Their (educators) self-image is more important to them as practitioners than is the case in occupations where the person can easily be separated from the craft” (Nias, 1989, p. 203 in Kelchterman, 2005). Understanding this blend between person and practice is vital due to the influence of the occupation upon students and society (Kelchterman, 2005). In order to facilitate this understanding Beijaard (2004) argued for the need for further investigation into the influence of context on professional identity formation.

Mission

Korthagen (2004) defined mission as “what is deep inside us that moves us to do what we do” (p.85). Korthagen’s research connected the idea of mission to a variety of terms such as “positive character strengths, virtues, creativity, courage, kindness, fairness, spirituality, and transcendence” (p. 96). While mission may be positioned at the core of the framework, the essence of mission mindedness is a shift from an internal focus of identity development to an external emphasis on others. Lipka and Brinhaupt
(1999) recognized that a sole emphasis on self-identity at the neglect of others is counterproductive to individual growth and development.

**Summary of Professional Identity Development**

While candidates may display excellent competencies, pedagogically sound beliefs, and a strong mission, external classroom challenges may result in ineffective teaching behaviors. Korthagen (2004) recognized that discrepancies between the six layers of professional identity development lead not only to external problems within the school but also to internal problems related to professional identity development. Beauchamp and Thomas (2009) recognized teacher education as an optimal time to begin developing identity awareness to assist candidates in the recognition of disequilibrium within professional identity development. “We must then try to incorporate what we know about the contexts and communities and their influence on shaping of teacher identities into our teacher education programs to prepare new teachers for the challenges of developing strong professional identities in positive ways” (p. 186).

Unfortunately, Korthagen (2004) recognized a lack of research on effective instructional strategies to promote core professional development at the levels of identity and mission. This may be due to the limited understanding of the professional identity development process of teacher candidates (Cochran-Smith & Zeichner, 2005; Dyer, 2012; Korthagen, 2004; Olsen, 2008; Zeichner, 2004, 2005; Zhao, 2011) and the influence of context on this complex process (Beijaard et al., 2004). The theory of possible selves may help us better understand contextual factors that impact the various components of professional identity development.

**Theoretical Framework: Possible Selves Introduction**

Exposure to the theory of possible selves occurred while reading Marzano and Heflebower’s (2012) book, *Teaching and Assessing 21st century skills*. Marzano and Heflebower suggested incorporating this theory into classrooms to “cultivate self efficacy”(p. 26) and promote conative skill acquisition. Conative skills focus on the knowledge of oneself, or the world within. Historically, education has focused on cognitive skills, gaining understanding of the surrounding world. Marzano and Heflebower (2012) promoted the inclusion of conative skill development to better
prepare are students for the 21st century. Marzano and Heflebower (2012) proposed several strategies including the theory of possible selves to promote conative skill development and self-efficacy. The possible selves theory, which emerged from self-concept theories in psychology, had only more recently been applied to the field of education (Packard & Conway, 2006).

**Overview**

The possible selves theory attempted to “integrate recent cognitive structural and cognitive dynamic approaches to self and personality with the challenging ideas of psychology’s growth and development theorists like Maslow, Allport, Horney, Rank, and Adler” (Wurf & Markus, 1991, p. 20). The theory posits that what an individual is striving towards is a significant component of one’s current self. According to Markus and Nurius (1986) the theory encompassed:

How individuals think about their potential and about their future. Possible selves are the ideal selves that we would very much like to become. They are also the selves we could become, and the selves we are afraid of becoming. (Markus & Nurius, 1986, p. 954)

Berci (2007) recognized that “identity is individually constructed, through negotiations with self and others, and is never stable or fixed” (Berci, 2007, p. 65). While the theory of possible selves as proposed by Marcus and Nurius (1986) closely aligned with this definition, it expanded beyond past and current components of identity, to include future orientation perspectives. Markus and Nurius (1986) argued that this emphasis should not be neglected. Though future selves have not been “verified or confirmed…it is entirely possible that this variety of self-knowledge also exerts a significant influence on individual functioning” (p. 955). Possible selves may provide both incentives for the future and an “evaluative and interpretive context for the current view of self” (p. 955).

**Relationship Between Possible Selves Theory and Influences and Effects of Identity**

Marcus and Nurius (1986) recognized that knowledge gained from analysis of possible selves was helpful for the following reasons:
(Research) provides an interpretive framework for making sense of past behavior, it also provides the means-ends patterns for new behavior. Individuals’ self-knowledge of what is possible for them to achieve is motivation as it is particularized and individualized; it serves to frame behavior, and to guide its course. (p. 955)

Previous research on teacher candidate identity development often relied upon analysis of concerns “as the driving force of learning” (Korthagen, 2004, p. 88), or an opposite emphasis on positive goal or vision setting (Hammerness, 2003; 2006). While such studies provided insight into individual elements of identity development, the limited perspectives acquired reinforced the “unidimensionality and permanence of identity and role construction” (Pinnegar, Mangelson, Reed, Groves, 2011). The theory of possible selves may generate a more holistic perspective on pre-service teacher identity development and add to an understanding of the complex and dynamic influences and effects of professional identity development (see Figure 2.5). The following synthesis applied findings from the theory of possible selves to each of the five identity components: experiential reflection and future projection, affective emotions, prior knowledge and experiences, context and social interactions, and motivation, efficacy and agency.

**Rational possible selves: Experiential reflection and future contemplation**

Experiential reflection is an influential strategy to promote professional identity development (Cochran-Smith, 2003; Gu & Day, 2007; Hammond et al., 2005; Kagan, 1992; Korthagen, 2004; Korthagen et al., 2006; Lee, 2005; 2008; Zautra, 2009). While past reflections influence one’s current identity they also shape future projections. Conversely, future projections influence one’s current identity and may prompt the reframing of past experiential reflections. Markus and Nurius (1986) recognized that possible selves are influenced by past experiences and provide a link between the present and the future. Future projections or individual self-theories serve as a mechanism for exploration into identity (Dunkel, 2000). Hopes and fears motivate, guide, and sustain the achievement of goals. For example, a candidate may persevere through course work and practicum experiences driven by the hope of making a positive difference in the lives of children. This pursuit may be further motivated and sustained through vivid fears gleaned from past experiences in ineffective classrooms. Embedded throughout the
current research is the assumption that future projections influence and inform the process of identity development.

**Emotional possible selves: Affect and feeling**

Bundled within an individual’s identity development are possible selves. These selves encompass one’s “enduring goals, aspirations, motives, fears, and threats” (Markus & Nurius, 1986, p. 954). Revelations from possible self-exploration fuse emotion, meaning making, and motivation with self-concepts. Markus and Nurius (1986) posited that individuals hold vivid possible selves that “illustrate some of the important ways in which they mediate personal functioning”, cope, and develop personally and professionally (p. 954).

Oyserman, Bybee, and Terry (2006) recognized that possible selves played an important role in distinguishing emotionally well-adjusted and delinquent youths. A wide variety of future possible selves were presented by the well-adjusted youths while delinquent youths selected more negative possible self-terminology to describe their own future. While Oyserman, Bybee and Terry (2006) contended that achievement and sustainability of hopes and avoidance of fears were dependent upon concrete elaborate selves and a balance between hopes and fears. Fewer delinquent behaviors and higher academic success, and more achievement strategies were evident in adolescents with balanced compared to unbalanced hoped and feared selves. However, recent research has suggested the need for disequilibrium between hopes and fears within certain contexts. Dyer (2012) reviewed Oyserman and Destin (2010) publication which asserted that in success-prone contexts benefited from more positive possible selves and in failure-prone contexts the existence of more negative possible selves were more likely to lead desired results compared to an abundance of positive possible selves in failure-prone contexts.

The emotional products of self-knowledge: hope, aspirations, fears, threats, and the balance between them are closely tied to a cognitive study of self-identity. Exploration of possible selves is linked to what Markus and Nurius (1986) call ‘affective cognitive structures or ‘self-schemas’ (p. 955). However, data gleaned from individual’s possible-self disclosures extends beyond insight into immediate affective emotions, possible selves serve as antecedents or glimpses into one’s personal history (Markus & Nurius, 1986).
Social Possible Selves: Social interactions and societal influences

Markus and Nurius (1986) recognized that possible selves may not always be anchored in personal experience but may display or “comprise the self-knowledge that is the most vulnerable and responsive to changes in the environment. They are the first elements of the self-concept to absorb and reveal such change” (p. 956). Therefore investigating possible selves may provide insight into current contextual factors and social interactions that challenge candidate self-perceptions.

Gohier, Chevrier, and Anadon (2007), and Flores and Day (2006) recognized the influence of current context upon an educator’s professional practice. Investigation of context within qualitative research was central to understanding the case (Cochran-Smith & Zeicher, 2005; Stake, 1995). Markus and Nurius (1986) recognized that an individual’s “attributes, abilities, and actions of the self are not evaluated in isolation. Their interpretation depended on the surrounding context of possibility” (p. 955).

Context was further influenced by social interactions with “models, images, and symbols provided by the media and by the individual’s immediate social experiences” (Markus & Nurius, 1986, p. 954). Self was subject to a variety of what Markus and Nurius (1986) regarded as “social reality constraints that are often difficult to ignore” (p. 963). Oyserman and Fryberg (2006) applied possible selves to the outcomes of racially and ethnically diverse male and female teens. The study concluded that significant “specific others and social contexts play an important role in creation and maintenance of possible selves” (Oyserman and Fryberg, 2006, p. 21). Even when participants’ possible selves were based on past success or failure, they were “relative to the attainments of comparable others” (p. 21) and influenced by changes within the perceived norms of society. Oyserman and Fryberg (2006) also found that aspirations were influenced and limited by “consensual stereotypes about what people like (me) can become” (p. 21). Possible selves were strongly influenced by the internal and individualized strands of race, ethnicity, gender, and culture.

Though the individual forms and maintained hopes and fears of his/her possible selves, actions emerging from selves were often subject to the scrutiny of others. While hopes can be ‘liberating’ and fear ‘imprisoning’, social influences may apply external labels of ‘distortion and irrationality’ to actions perceived as misaligned with the
individ (p. 963). Markus and Nurius (1986) argued that inaccurate social judgments emerged from limited perspective. This occurred when “others’ perceptions of an individual do not take into account possible selves” (p. 964). Markus and Nurius (1986) suggested that application of the theory of possible selves may generate a more authentic representation of the individual, which in turn may generate an accurate understanding and explanation for the behavior of others.

**Motivational Possible Selves: Motivation, efficacy, and agency**

Markus and Nurius (1986) reviewed motivation theories and defined motivation and motives as dispositions that allow individuals to strive toward positive or avoid negative incentives.

Possible selves represent these motives by giving specific cognitive form to the end states (goals and threats), to the associated plans or pathways for achieving them, and to the values and affect associated with them. (Markus & Nurius, 1986, p. 961).

Possible selves also allow for “more direct connection between motives and specific actions” (Markus & Nurius, 1986, p. 961). However, motivation alone is insufficient in the achievement of hopes and fears. Goals must be accompanied by specific strategies for the achievement of selves, the efficacy or the “belief that he or she is competent to perform a required behavior” (p. 961), and agency or the “individual’s ability to develop and maintain distinct possible selves” (p. 962).

The theory of possible selves holds that “having an end vision without process strategies does little to assist with motivation and achievement” (Fryberg & Oyserman, 2006, p. 20). Fryberg and Oyserman (2006) applied this idea while studying racially diverse males and females. Evidence suggested that the existence of concrete strategies were a predictive factor for academic achievement and the avoidance of delinquent activities.

Ibarra (1999) investigated business professionals in periods of transition to more leadership roles. Her research identified a three-step process that supported the construction of elaborate and concrete steps that in-turn increased achievement of future possible selves. Ibarra’s iterative process (1999) recognized first that exposure to a myriad of possible selves influenced identity development therefore the first step
involved “observing role models to identify potential identities” (p. 764). The second step required the personalization and authentication of self through experimentation with provisional selves. Ibarra’s (1999) third step recognized the need for reflection and adjustment of personal possible selves by “evaluating internal standards and external feedback” (p. 764).

Markus and Nurius (1986) investigated the debate between the malleability or stability of self-concepts. Several studies demonstrated the stability of the self-concept and empirical work suggested that individuals avoid changing self-concepts. Others however portray self as ‘infinitely malleable’ (Markus & Nurius, 1986, p. 964). Markus and Nurius (1986) argued that expanding the scope of the self-concept to include possible selves allows us to account for both its situational and temporal malleability and for its overall stability” (p. 964). Identity was constructed through a myriad of complex interactions between experiential reflection and future projection, affective emotions, prior knowledge and experiences, context and social interactions, and motivation, efficacy and agency. These diverse components of and influences upon identity contributed to inconsistencies between one’s personal and professional identities. This may inevitably give rise to friction within teacher professional development. “It is precisely because such friction must be prevented that the professional identity of the teacher merits the attention of educators” (Korthagen, 2004, p. 83). Teacher educators experience alongside and influence candidate professional identity development. “Learning through researching these experiences will help them to better understand how to approach teaching about teaching in order to enhance students’ learning about teaching” (Loughran, 2004, p. 154 in Korthagen et al, 2006).

**Previous Possible Selves Research**

Zeichner (2005) recognized the importance of pursuing and consciously building upon the research of others to “pursue a line of inquiry“ (p. 742). This AERA panel suggestion prompted close attention to five previous published studies that applied the theory of possible selves to interactions with teacher candidates. Though a relatively recent, researchers have applied the theory of possible selves to an understanding of teacher professional identity development.
Fletcher (2000) explored teacher identity emergence within the context of the classroom through the use of a visualization strategy. Candidates were encouraged to explore future selves during verbal prompts based upon the theory of possible selves. Exploration of possible selves provided perspectives on the emergence of teacher identity in response to social interactions with university supervisors. Fletcher (2000) recognized how knowledge of candidate selves can direct teacher education program development and assist with student evaluation.

Conway and Clark (2003) combined Fuller and Bown’s (1975) concerns-based model with the theory of possible selves to understand changes within the early years of teaching. Conway and Clark (2003) questioned teacher educator practices that focused solely on the resolution of concerns and disagreed with developmental frameworks that failed to integrate self-as-teacher reflection into “all phases of a teachers’ professional life-cycle” (p. 478). Conway and Clark (2003) concluded that teacher education programs should be focused on “building on student teachers’ hopes and aspirations with the same energy we devote to challenging their fears and concerns may accelerate and deepen their developmental journey toward expertise in teaching” (p. 479).

Grossman and Ronfeldt (2008) applied the theory of possible selves to a comparison of professional preparation courses for clergy, teachers, and clinical psychologists. Interviews with these professionals sought to understand program opportunities that allowed for the practice of possible selves. Field experiences and role-play opportunities allowed for the practice of professional provisional selves. However, participants often reported contradictions between the construction of selves, understanding of content, the observation of others, and the practice of self. Discrepancy and tensions within teacher education appeared to be greatest leaving researchers to suggest that these forms of “experimentation may not be enough for a possible self to become a part of professional identity” (Grossman & Ronfeldt, 2008, p. 40). Grossman and Ronfeldt (2008) argued teacher educators must establish more intentionally structured observation and experimentation opportunities that allow for authentic self-evaluation through the use of video, reflective documentation, ongoing feedback from teacher educators, and encouragement from peers.
Hamman Gosselin, Romano, and Bunuan, (2010) utilized the theory of possible selves to “frame examinations of the mechanisms and outcomes of teacher identity…moving the field of teacher identity closer to building up a more systematic, empirical body of evidence” (p. 1350). Hamman et al. (2010) argued that application of the theory of possible selves provided insight into the context of new teacher identity development, motivation and the “self-regulative contribution self-concepts may have on thoughts and behaviors intended to achieve identity-relevant teacher goals” (Hamman et al., 2010, p. 1351). The researchers investigated 221 pre-service and inservice novice teacher’s hopes and fears and identified four broad categories: ‘interpersonal relationships’, ‘classroom management’, ‘instructional strategies’, and ‘professional qualities’ (p. 1359). Result from this study reflected a shift in perspective, which Hamman et al. (2010) recognized was aligned with previous research findings. “Teachers concerns for self and task begin to diminish over time, but concerns about impact on students remain a priority from the outset of new teachers’ practice” (p. 1358).

Lastly, Hong and Greene’s (2011) application of the theory possible selves to teacher education confirmed and expanded descriptions of the salient categories previously identified by Hamman et al. (2010). Additionally, the research explored the balance between selves at two stages in a pre-service science teacher preparation program. Teachers hoped to have a ‘good grasp of content’, have effective ‘management’, exhibit ‘effective teaching’, be ‘caring and helpful’, have a ‘positive attitude’, and display ‘leadership’ (Hong & Greene, 2011, p. 499). Balance between participant’s hopes and fears was lacking most greatly within the population of candidates positioned at the end of the teacher education program and participating in the student teaching experience. Hong and Greene (2011) identified this as disequilibrium and argued the necessity of such disturbance to promote conceptual and belief change.

While these studies contributed greatly to an understanding of pre-service teacher identity development, the current research built upon the four salient categories of hopes and fears as identified in the Hamman et al. (2010) study and incorporated a previously unaddressed component of the possible selves theory to teacher education, strategy development. Insight into hopes, fears and self-developed process strategies, may
provide a holistic perspective that will lead to an increased understanding of the complex and dynamic nature of teacher professional identity development.

**Synthesis of the Research**

At the core of this researcher’s journey was a desire to ensure an effective education for each child, each year, in each classroom within each school. The word *each* was intentionally selected as it extricated the unique and complex attributes of individuals and settings versus the homogenous group connotation of *every*. This researcher’s basic assumption was that effective teacher educators in effective teacher education programs can shape effective teachers to develop effective environments for effective student learning. *Effective* is an elusive term that draws out varying opinions, standards and strategies. The researcher’s efforts to define *effective* in regards to teacher education programs, teacher educator practices, and candidate professional development led to the identification of limitations that impede teacher preparation. Dufour and Mattos (2013) stated, “effectiveness…can only be determined by evidence of its effect on student learning” (p. 36). The following personal synthesis of the research provided an overview of the researcher’s line of inquiry that emerged from a commitment to student learning. The following overview provided the foundation upon which the study design presented in chapter 3 was built.

Figure 2.6 identified one component of a student’s educational needs. Effective teachers impact student success in the classroom more than policies, reform initiatives, and even technology (Stronge et al., 2011; Nye, Konstantopoulos & Hedges, 2004). Students of effective educators show gains despite issues of poverty, race, ethnicity, and language and learning differences (Aaronson, Barrow, & Sander, 2007; McMurrey, 2007; Sanders & Rivers, 2000). The need for a student’s learning career to be directed by effective educators is evident in the positive residual effects of effective instruction (Hanushek, Kain, William & Sanders, 2000) and the opposing negative effects in classrooms of ineffective educators (Sanders & Rivers, 1997). This need is compounded further by a technology driven shift in skills including enhanced conative abilities (Marzano & Heflebower, 2012) and increased global competition (Zhao, 2010).
To meet the demands of 21st century teaching, educators must have a strong professional identity. Avalos (2011), Beauchamp and Thomas (2009), Freese (2006), Hoban (2007), Kagan (1992), Olsen (2008), and Sachs (2005) recognized professional identity development as central to teacher professionalism. Many researchers have agreed that strengthening professional identities influenced teacher effectiveness, increased motivation, and may have decreased attrition (Avalos, 2011; Day, Elliot, & Kington, 2005; Day, Kington, Stobart, & Sammons, 2006; Johnson, Berg, & Donaldson, 2005; Lasky, 2005; Van den Berg, 2002). However, altering teacher candidate identity was challenged by the “apprenticeship of observation” (Lortie, 1975, p. 61), a regard for the personality of a teacher above an understanding of subject matter or pedagogical theory (Richardson & Placier, 2001), and a high level of optimism and confidence in his/her ability to teach (Book, Freeman, & Brousseau, 1985; Weinstein, 1990). This led many researchers to speculate as to the effectiveness of teacher education course work on professional attitudes and identity development (Book & Freeman, 1986; Weinstein, 1990). Whitbeck (2000) and Hoy, Woolfolk, and Spero (2005) argued that a reliance on individual intuitive practice, left pre-service teachers unengaged in teacher education coursework and unprepared for the challenges faced in the classroom.

While teacher education programs have undergone sharp criticisms in regards to their effectiveness (Book & Freeman, 1986; Cochran-Smith & Zeichner, 2004; Cole & Knowles, 1993; Hollingsworth, 1989; Holt-Reynolds, 1992; Reynolds, Ross, & Rakow, 2002; Weinstein, 1990; Zeichner & Tabachnick, 1981), many researchers recognized the central role teacher education programs played in equipping and meeting the demand for an effective educator in each classroom (Darling-Hammond et al. 2005, Fullan &
Stiegelbauer, 2007, Boyd, Grossman, Loyd, & Wyckoff, 2009; Hamilton & Pinnegar, 2000; Korthagen, 2004; RESPECT, 2012; Sprinthall, Reiman, & Theis-Sprinthall, 1996; Wilson, 2009). However, in order for this to be accomplished, teacher candidates need effective preparation programs (see Figure 2.7) capable of strengthening professional identity development and promoting an effective reflective practice (Dyer, 2012; Gu & Day, 2007; Kagan, 1992; Korthagen, 2004; Korthagen et al. 2006; Lee, 2005; 2009; Olsen, 2008; Zautra, 2009; Zeichner & Conklin, 2004; Zeichner, 2005).

**Figure 2.7 Educator needs for success in the 21st century.**

Korthagen et al. (2006) established a framework to strengthen teacher education programs. These seven principles were clustered into three overarching components for effective program development and change. One cluster emphasized the importance of staffing programs with ‘quality’ teacher educators (Korthagen et al., 2006, p. 1037).

Teacher educator quality hinges on the ability to model effective instructional strategies (Korthagen et al., 2006) and knowledge of three differing perspectives: teacher candidate learning, classroom teacher needs, and effective teacher educator pedagogical practices (Cochran-Smith, 2003; Darling-Hammond & Bransford, 2005). Kremer-Hayon and Zuzovsky (1995) found that teacher educators were often impacted by concerns of inadequacy in professional and academic knowledge, had difficulty adjusting personal pedagogical practice to meet the needs of adult learners, and were overwhelmed with amplified research expectations. Murray and Male (2005) interviewed 28 new teacher educators during their transition from “‘first-order practitioner’, schoolteacher serving in a school, to ‘second-order practitioner’, teacher educator (TE) serving in higher education (HE)” (p. 126). They concluded that stress experienced during this transition stemmed
from increased expectations, role ambiguity, and the required reframing of pedagogical practice.

Two gaps within the current body of research may further fuel these areas of stress particularly in regards to the development of an effective pedagogical practice (see Figure 2.8). First, Korthagen (2004), Zeichner and Conklin (2004), and Zeichner (2005) recognized a current lack of empirical evidence to aid in the selection and development of effective teacher educator instructional strategies. Second, this deficiency may be attributed to a general lack of applied theory and understanding of teacher candidate identity development (Korthagen, 2004; Zeichner & Conklin, 2004; Zeichner, 2005).

**Figure 2.8 Teacher educator needs for success in the 21st century.**

Expanded expectations (Boyd et al., 2009; Cochran-Smith, 2003; Darling-Hammond et al. 2005; Marzano, 2012; Zhao, 2011), changing standardization (CAEP, 2013; Common Core Standards, 2010; RESPECT, 2012), and increased accountability (CAEP, 2013), combined with limited funding (Fullan & Stiegelbauer, 2007; Zeichner, 2005) and theoretical foundations and frameworks (Boyd, et al., 2009; Cochran-Smith & Zeichner, 2004) impede teacher educator effectiveness and the development of effective teacher education programs. Nonetheless, there is a largely neglected voice that may contribute greatly to teacher education, the voice of candidates (Korthagen et al., 2006). (see Figure 2.9).
The theory of possible selves as proposed by Markus and Nurius (1986) is an effective tool to understand the five components of identity (see Figure 2.5). This theory has previously been applied to teaching and teacher education as a strategy to promote visualization (Fletcher, 2000), to understand changes within the early years of teaching (Conway and Clark, 2003), and to understand differing professional program opportunities for practice of provisional selves (Grossman & Ronfeldt, 2008). Hamman et al. (2010) investigated pre-service teachers’ possible hopes and fears and identified four broad categories: “interpersonal relationships”, “classroom management”, “instructional strategies” and “professional qualities” (p. 1359). Hong and Greene’s (2011) research expanded category descriptions and explored the balance between selves at two stages in a pre-service science teacher preparation program.

The component of possible selves previously unapplied to teacher education was strategy development as proposed by Ibarra (1999) and the structured investigative questions suggested by Hamman et al. (2010). Candidate hopes, fears and process strategies, may provide a more holistic perspective of the complex and dynamic nature of teacher professional identity development (see Figure 2.10), deliver strategies to improve teacher educator pedagogy, and inform teacher education program development.
Markus and Nurius (1986) have linked possible selves to increased motivation and to the promotion of change, “both the momentary changes associated with variation in the content of the working self-concept, and more enduring changes” (p. 966). While this research attempts only to understand identity and process strategy development, application and the analysis of findings may significantly motivate change within teacher education. Results may guide selection of course content or perhaps prompt more enduring changes within the art of teacher educator pedagogy and teacher education program development.

**Summary**

Korthagen et al. (2006) recognized the value of the often-neglected voice of teacher candidates in regards to teacher education program development and
improvement. This dissertation research was related to the application of the theory of possible selves in order to promote insightful perspectives into pre-service teachers hopes, fears, and self-strategies, entering teacher candidate perspectives into the arena of teacher educator practice. The resulting insights may lead to a better understanding of teacher professional identity development and possibly advance empirical research on effective teacher education pedagogy. Findings can influence course design, inform the selection materials, and shape practicum and service learning opportunities. The purposeful selection of male and female teacher candidates at various points within the teacher education program, as well as attention to program placement may lead to a better understanding of the personal adjustments in identity development of pre-service teachers, an area of noted neglect within teacher education (Dyer, 2012; Korthagen, 2004; Olsen, 2008; Zeichner, 2004, 2005),
Chapter 3: Methodology

Introduction

This case study applied the theory of possible selves in order to better understand the professional identity development of a cross-section of teacher candidates enrolled in a private Midwestern university. In particular, the study focused on an analysis of teacher candidates’ hopes, fears, and strategy development in order to inform teacher education and the practices of teacher educators. The instrumental-intrinsic case study approach was selected due to the relatively recent application of the theory of possible selves to teacher education and the subsequent exploratory attempt to gather a “thick, rich description, as well as detailed information” (Bloomberg & Volpe, 2012, p. 127) to contribute to areas of noted neglect within teacher education research.

Sections in chapter three include (a) overview and significance of the study, (b) research design, (c) setting, (d) participant selection, (e) data collection, (f) data analysis, (g) validation, (h) role of the researcher, and (i) summary.

Overview of the Importance

Beginning teachers are more effective in their first year when they enter classrooms with a strong identity and sense of self as teacher (Kagan, 1992). While teacher educators play an integral role in pre-service professional identity development, there are limitations that impede the establishment of effective teacher educator pedagogy. These limitations include the lack of theoretical understanding of pre-service teacher professional identity development (Beijaard, Meijer, & Verloop, 2004; Cochran-Smith & Zeichner; Dyer, 2012; Grossman & Ronfeldt, 2008; Korthagen, 2004; Olsen, 2008; Zeichner & Conklin, 2004; Zeichner, 2004, 2005), and insufficient empirical evidence on effective teacher education instructional strategies (Boyd et al., 2009; Hoban, 2007; Korthagen, 2004; Zeichner & Conklin, 2004; Zeichner, 2005; Zhao, 2011). The collection and analysis of pre-service teacher’s hopes, fears, and self-strategies helped increase understanding of teacher professional identity development, which in turn strengthened teacher educator pedagogy.
The following research questions expand upon previous research in teacher education that applied the theory of possible selves as proposed by Markus and Nurius (1986). Previous possible self research by Hamman et al. (2010) explored candidate hopes and fears and uncovered four salient categories (2010): “interpersonal relationships,” “classroom management,” “instructional strategies,” and “professional qualities” (p. 1359). These categories were explored further using an unapplied component of the theory of possible selves to teacher education, process strategy development. Strategy development was recognized by Oyserman and Fryberg’s (2006) as necessary for the achievement of hoped for selves and the avoidance of feared selves.

The second guiding research question explored candidate suggested teacher education strategies for each salient category (Hamman et al., 2010). Sub-questions were framed using Korthagen’s (2006) teacher education program model. This triangular model recognized seven principals organized into three overarching components of quality teacher education programs: “views of knowledge and learning”, “program structures and practices”, and “quality of staff and organization” (Korthagen et al., 2006, p. 1037).

Overarching Questions:
1. How do candidates describe and develop hope achievement and fear avoidance strategies in regards to previously identified salient possible selves (Hamman et al., 2010)?
   Sub-questions:
   a. What are candidate’s hope achievement and fear avoidance process strategies in response to future professional interpersonal relationships?
   b. What are candidate’s hope achievement and fear avoidance process strategies in response to future classroom management styles?
   c. What are candidate’s hope achievement and fear avoidance process strategies in response to future instructional strategies?
   d. What are candidate’s hope achievement and fear avoidance process strategies in response to future professional qualities?
2. How do candidate identified strategies inform teacher education?
   Sub-questions:
a. What are candidate strategy suggestions for teacher education in regards to views of knowledge and learning?
b. What are candidate strategy suggestions for teacher education in regards to program structures and practices?
c. What are candidate strategy suggestions for teacher education in regards to the quality of the staff and organization?

**Qualitative Instrumental-Intrinsic Case Study Research Design**

The AERA Panel on Research and Teacher Education (Cochran-Smith & Zeichner, 2005) concluded a four-year study on research in teacher education with suggestions to improve the body of knowledge. Cochran-Smith and Zeichner (2005) emphasized the need to frame “research in relation to relevant theoretical frameworks” (p. 741), which will allow for authentic explanations of findings. These researchers also recognized the need to extend upon previous research findings. “There is very little evidence in the studies reviewed of researchers’ building on others’ work in establishing chains of inquiry around particular questions and consistently defined outcomes” (Cochran-Smith & Zeichner, 2005, p. 742).

Conklin and Zeichner (2005) recognized that data gathered from a well-designed qualitative case study may provide insight into effective teacher education pedagogy. The AERA panel (2005) established criteria for effective design in teacher education research: There should be clear and consistent definition of terms, full description of data collection, and analysis coding categories and context. The design of this dissertation research addressed identified gaps in teacher education research and incorporated several of the AERA (2005) panel suggestions.

First, the researcher pursued a theory capable of providing insight into preservice teacher identity development. Second, careful consideration was given to other studies that applied the theory of possible selves to teacher education. Third, the researcher established design methods that aligned both with the holistic perspectives gleaned from the theory of possible selves and in response to the researcher’s critical need to improve personal second-order professional practice as a teacher educator.

Research was based on the blend of two types of case studies as identified by Stake (1995); instrumental and intrinsic case study. Mills, Durepos & Wiebe (2010)
recognized that case studies can be both intrinsic and instrumental in nature and that it is sometimes difficult to categorize a case into one or the other type. Stake (1995) recognized that the nature of case studies could hold both intrinsic and instrumental attributes. “The key in both the intrinsic and instrumental case study is the opportunity to learn” (Mills, Durepos, & Wiebe, 2010, p. 499). Stake (1995) defined an instrumental case study as, “research on a case to gain understanding of something else” (p. 171).

Mills, Durepos, and Wiebe (2010) provided the following summary:

An instrumental case study is the study of a case [teacher candidates] to provide insight into a particular issue [teacher educator pedagogy], redraw generalizations [Hamman et al. (2010) salient categories], or build theory [theory of possible selves]. In instrumental case research, the case facilitates understanding of something else [teacher education]…In an instrumental case study, the case itself is secondary to understanding a particular phenomenon [candidate identity development]. In instrumental case study research, the focus of the study is more likely to be known in advance and designed around established theory or methods. (Mills, Durepos, & Wiebe, 2010, p. 473-474)

Stake (1995) further recognized that researchers are often compelled to investigate a problem set before them. “The case is given. We are interested in it, not because by studying it we learn…but because we need to learn” (p. 3). Stake (1995) proposed that researchers are drawn to a specific methodological design because of an intrinsic interest in the case. Stake referred to this exploratory form of case study as an “intrinsic case study” (p. 3). Mills, Durepos, and Wiebe (2010) provided this description:

An intrinsic case study is the study of a case [e.g., teacher candidate education] where the case itself is of primary interest in the exploration. The exploration is driven by a desire to know more about the uniqueness of the case rather than to build theory or how the case represents other cases… The intrinsic case study is often exploratory in nature, and the researcher is guided by his or her interest in the case itself. (p. 499)

External experiences and context are important elements of intrinsic qualitative case studies. Stake (1995) recognized the significance of context.

Within intrinsic case studies, our primary task is to come to understand the case. It
Intrinsic case studies attempt to promote an understanding of the case and explore “the uniqueness and complexity...its embeddedness and interaction with its contexts” (Stake, 1995, p. 16). Stake (1995) recognized that external experiences and context were important elements of qualitative case studies. To better understand context candidates were interviewed twice in the span of six months. Contextual insight was further achieved through the application of two purposeful selection strategies. First, stratified purposeful (Creswell, 2013) selection was utilized to select participants based on placement in the teacher education program. Creswell (2013) recognized that this strategy “illustrates subgroups and facilitates comparisons” (p. 127). Second, participants were also selected based on established criterion (Creswell, 2013) such as program choice (elementary, middle or secondary), academic involvement, and gender. Bloomberg and Volpe (2008) recognized that “the logic of purposeful sampling lies in selecting information-rich cases, with the objective of yielding insight and understanding” (p. 104).

Stake (1995) recognized that “the interview is the main road to multiple realities” (p. 64). Therefore, semi-structured interviews drove data acquisition for this dissertation. Interview questions promoted deep thought toward the issues. The depth, question framework, and additional probing prompts promoted the organic nature of conversation.

Since listening was the primary responsibility of the interviewer, responses were recorded and minimal fields notes were taken during this time to allow the interviewer to maintain a repository position focused on constructivist listening. Application of researcher constructivist listening (Weissglass, 1990) assisted in gaining episode insight. This method encouraged the listener or researcher to think about the talker and help the talker “explore extensively his or her thoughts and feelings by asking appropriate questions that focus the talker’s attention” (p. 357)

The recording was listened to again, and key ideas, episodes, and researcher perceptions of the meaning and context of comments were added to notes. While recordings were transcribed, the entire transcribed documents were not sent to participants for member checking. Stake (1995) argued that interviewees are often
“dismayed with transcripts not only because of the inelegance of their own sentences but because they did not convey what they intended” (p. 66). Stake (1995) promoted instead giving participants a copy of an interview summary. “A good interviewer can reconstruct the account and submit it to the respondent for accuracy and stylistic improvements” (p. 66). An interview summary template was developed (Appendix G) and allowed the researcher to categorize participant’s hopes, fears, and strategies. This document was then utilized during the later interview to clarify, ensure accuracy of initial interview and prompt idea expansion.

This research was intentionally designed to address suggestions made by the AERA (2005) panel and to add to the limited understanding of teacher professional identity development and effective teacher education pedagogy. Application of the theory of possible selves provided insight into the rational self through the acquisition of future contemplation (see Figure 2.5; Table 2.1). This process increased understanding in regards to influences upon candidate’s professional identity development by building upon previous applications of the theory of possible selves to teacher education. Salient categories of hopes and fears first proposed by Hamman et al. (2010) and confirmed by Hong and Greene (2011), were explored further by incorporating a questioning format suggested by Hamman et al. (2010). Furthermore a component of the theory of possible selves previously unapplied to teacher education was incorporated, Ibarra’s (1999) framework for strategy development.

Setting

The research for this case study was conducted at a private faith-based liberal arts college founded nearly fifty years ago. The campus was located in a suburb of a large metropolitan area. University enrollment comprised approximately 1,300 undergraduate and 200 graduate students. A little over 10% of the university student population was enrolled in the School of Education. Approximately 70% of the students enrolled in the undergraduate elementary or secondary education program are female and 80% categorize themselves as white, non-Hispanic. While these statistics align closely to the national race average of 84% of educators reporting white, non-Hispanic, this university had an above average number of male teacher candidates compared to the 16% national average (Feistritzer, 2011).
The university culture and climate is grounded in the doctrine of the sponsoring denomination. Prior to acceptance into the undergraduate programs students were asked to agree to abide by twenty-five specific “community living guidelines” (Handbook, 2011-2012, p. 10). These guidelines fell under three broad categories: “Regulations which reflect God’s moral law”, “Regulations which reflect civil law”, and “Regulations which involve judgments about the effects of certain behavior” (Handbook, 2011-2012, p. 5). In the case of a regulation violation the university established eleven consequences that corresponded to the nature of the offense.

All participants met required criteria for acceptance into the school of education. Once accepted into the school of education, candidates completed content courses and a sequence of three methods courses that included seven practicum classroom experiences for elementary majors and five practicum classroom experiences for secondary majors. Diversity of placement was a priority within program field experiences or practicums. Students spent a minimum of twenty hours for each practicum experience in Title I, private, rural, urban and suburban schools. Prior to graduation all students participated in a semester long student teaching experience. This traditional teacher education program was nationally accredited through the National Council for Accreditation of Teacher Education (NCATE) and was currently undergoing program revision to align with the recently adopted Council for the Accreditation of Educator Preparation (CAEP, 2013) standards.

Due to the faith based nature of the school there were chapel requirements for all undergraduates. University wide all courses begin with a brief devotion and an opportunity to pray for student-spoken requests. The university culture is influenced by the following mission statement, “Our mission is to educate and inspire servant leaders; our vision is to be a premier Christian university with global impact” (University Handbook, 2013, p. 1).

The emphasis on servant leadership was embedded throughout graduation requirements, course work, and program projects. Prior to admittance into the school of education students must provide evidence of 20 hours of community service. Prior to admission for student teaching students 80 hours are required and upon graduation graduates must show 100 hours of community service. Each year there was a university-
wide service learning initiative and within the college of education there were additional international, national, and local service-learning projects. Study participants would have had the opportunity to travel on mission trips internationally to Costa Rica, Uganda, Bulgaria, and nationally to New York, Sun Valley Indian Reservation and Kansas City, Missouri or other local initiatives such as: organizing clothing and Christmas gift drives, facilitating Junior Achievement clubs in high need schools, and volunteering at family nights, science fairs, carnivals, and tutoring for surrounding public and private schools.

Program and course design was based on the ‘five ‘pillars’ of education. These pillars include effective and professional communication, research based strategies, leadership and service, diversity, and standards based content expertise. For admission into student teaching all candidates gave a twenty-minute presentation that addressed their knowledge, skills, and dispositions regarding the school of education’s five-pillar framework. The six-person evaluation panel was made up of teacher education and content faculty and members of the educational community.

While this was a convenience sample (Creswell, 2013), the AERA (2005) panel recognized the importance of self-study conducted within the researcher’s personal professional community. Though participant demographics are similar to candidate national averages, the faith-based nature of the university limits generalizability and the transfer of knowledge. However, the researcher hoped that the university’s commitment to a liberal arts education and the welcoming of all perspectives would facilitate authentic discussions and provide genuine perspectives on candidate professional identity development. While all participants were expected to abide by established campus policies and regulations regarding student behavior, the university did not require students to share a commitment to the founding denominational beliefs and tenets. Furthermore, all but one participant attended a public elementary and secondary school and all participants had a minimum of 60 hours of practicum experience in public schools at the time of the initial interview. Furthermore, chapter four findings shared similarities with pre-service teacher’s perspectives found throughout current teacher education research.
Participant Selection

The inquiry process began January 2014 with the purposeful selection of participants (Creswell, 2013). Thirteen students from a private university located in the Midwest were purposefully selected to provide insight into context, an important element of intrinsic-instrumental qualitative case studies (Stake, 1995). Stratified purposeful (Creswell, 2013) selection was utilized to select participants based on their placement in program. Participants were in their final sequence practicum course prior to student teaching, student teaching, completed student teaching, job seeking, or in their first year of teaching. Creswell (2013) recognized that this strategy “illustrates subgroups and facilitates comparisons” (p. 158). Participants were also selected based on established criterion (Creswell, 2013) such as certification (elementary or secondary), academic involvement, and gender.

Participants were either currently enrolled or alumni of the researcher’s employing institution. Creswell (2013) recognized both the benefits and limitations of such a “convenience sample” (p. 158). The methodology “saves time, money, and effort, but at the expense of information and credibility” (p. 158). However, Male and Murray (2005) recognized the benefit of convenience sampling to promote teacher educator professionalism and self-study research. In order to increase credibility of data and eliminate ethical issues related to an unbalanced sense of power current students of the researcher were removed from quota sampling (Creswell, 2013). The following table (see Table 3.1) provided an overview of participant information. A teacher candidate number identifier was used to ensure confidentiality.

<table>
<thead>
<tr>
<th>TC Candidate Identifier</th>
<th>Program Placement at time of Initial Interview</th>
<th>Certification</th>
<th>Sex</th>
<th>Age</th>
<th>Ethnicity</th>
</tr>
</thead>
<tbody>
<tr>
<td>TC1</td>
<td>Currently Student Teaching</td>
<td>Elementary Education</td>
<td>F</td>
<td>22</td>
<td>Caucasian</td>
</tr>
<tr>
<td>TC2</td>
<td>Completed student teaching job seeking</td>
<td>Elementary Education</td>
<td>F</td>
<td>22</td>
<td>Caucasian</td>
</tr>
<tr>
<td>TC3</td>
<td>Completed student teaching job seeking</td>
<td>Secondary Speech and Drama</td>
<td>F</td>
<td>40</td>
<td>Caucasian</td>
</tr>
</tbody>
</table>
Cohen (1988) defined the reliability of a sample size as “the closeness with which it can be expected to approximate the relevant population value” (p. 6). Participants were intentionally selected to reflect the national averages of graduates from traditional teacher educational programs located within the United States. The following (see Table 3.2) provided a comparison of participant demographics to national averages of graduates from traditional teacher education programs.
Table 3.2 Comparison of research participant to national statistics of traditional teacher education program graduates.

<table>
<thead>
<tr>
<th></th>
<th>Research Participants</th>
<th>2011 National Statistics of Traditional Teacher Education Program Graduates (Feistritzer, 2011)</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Gender</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Male</td>
<td>23%</td>
<td>13%</td>
</tr>
<tr>
<td>Female</td>
<td>77%</td>
<td>87%</td>
</tr>
<tr>
<td><strong>Ethnicity</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Caucasian</td>
<td>92%</td>
<td>87%</td>
</tr>
<tr>
<td>Non-white</td>
<td>8%</td>
<td>13%</td>
</tr>
<tr>
<td><strong>Certification Level</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Elementary</td>
<td>39%</td>
<td>47%</td>
</tr>
<tr>
<td>Secondary</td>
<td>46%</td>
<td>47%</td>
</tr>
<tr>
<td>K-12</td>
<td>15%</td>
<td>6%</td>
</tr>
</tbody>
</table>

Bloomberg and Volpe (2012) recognized that “the logic of purposeful sampling lies in selecting information-rich cases, with the objective of yielding insight and understanding” (p. 104). In order to gain information-rich insights, the education department chair and the director of the university’s teacher professional organization were asked to submit names of candidates who were actively involved in the teacher education program either currently or in the past. From this list, teacher candidates enrolled in the final senior level sequence course, student teaching, successful completers of student teaching, and alumni novice teachers were intentionally selected to both reflect national teacher demographics and provide perspectives of candidates at varied professional development levels. The following graph (see Figure 3.1) provided an overview of the program and professional placement of candidates involved in the study.

**Figure 3.1 Cross section of participants from final practicum course candidate to novice teacher.**
Data Collection

Data was collected from two interviews of thirteen participants. Prior to conducting the interview, an application for human-subject approval from the IRB of the Office of Research Compliance of Kansas State University was submitted and approved (see Appendix F). The interviews followed a semi-structure format (Creswell, 2014) using interview protocols in Appendix C, and Appendix D.

Prior to the interview data collection process, the researcher provided each participant with a brief description via email, followed by a scheduled phone call. During this phone call, the researcher utilized the phone recruitment script (see Appendix A). All participants but one selected a face-to-face meeting for their initial interviews and a distance meeting utilizing technology for the five-month follow-up interview. The one participant that selected a phone interview held a long-term substitute position at a location greater the 100 miles from the university. Face-to-face meetings occurred in a neutral location, either an empty classroom or conference room. The interviewer reviewed Informed Consent forms required for their voluntary participation (see Appendix B) at the beginning of the meeting. The Informed Consent form provided an overview of the research intent, the purposed methodology, a brief description of the theory of possible selves, and assurance of confidentiality, and conformed to the Kansas State University’s IRB requirements.

Creswell (2013) recognized that one-to-one interviews were an effective strategy to promote the sharing of ideas in educational research. However, it was important to establish both rapport and trust (Creswell, 2013). This was accomplished by the provision of a clear description of the purpose of the research, thanking participants for their service to the profession, ensuring participants’ right of question refusal and voluntary withdrawal at any time in the process, and an explanation of the established strategies to protect participant confidentiality. The researcher reviewed the interview guide (Appendix C), thoroughly explained the Informed Consent form (Appendix B), and acquired written consent from each participant.

While a pre-determined list of interview questions was used, additional questions were interjected to promote clarification or expansion. Questions promoted deep thought toward the four salient categories of hopes and fears established by Hamman et al. (2010)
The depth, limited number of questions, and additional probing prompts promoted the organic nature of conversation, and application of researcher constructivist listening assisted in gaining episode insight (Weissglass, 1990).

**Figure 3.2** Graphic representation of research question design applying the theory of possible selves to previously identified categories of salient possible selves (Hamman et al.; 2010).

Weissglass (1990) established a method of constructivist listening. This method encouraged the listener or researcher to think about the talker and help the talker “explore extensively his or her thoughts and feelings by asking appropriate questions that focus the talker’s attention” (357). Weissglass’ (1990) methodology limited interjections such as “advice or constructive criticism” (p. 360). It further discouraged researchers from making clarification statements that interpret meanings or feelings. This may “cut off the expression of feelings or manipulate the talker into avoiding emotions” (p. 357). Or, it may “lead to the talker becoming dependent on the listener for meaning or approval” (p. 357). Application of this methodology to the interview process allowed for deep insight into participant experiences.

Interviews were conducted individually using the research questions (see Appendix 3.D) with the duration lasting approximately sixty-minutes each. The interview notes
template (see Appendix 3.E) guided the interview process and provided a location for the interviewer to document perceptions and intuitive thoughts during the interview.

The theory of possible selves provided the framework for semi-structured interviews (Oyserman, 2004). However, questions were altered to reflect suggestions made at the conclusion of the Hamman et al. (2010) study (see Appendix D for complete interview protocol). Instead of asking about general hopes and fears, the researcher used previously identified salient categories: interpersonal relationships, classroom management, instructional strategies, and professional qualities, to elicit rich descriptions of future selves. For instance, the researcher asked participants to “describe your future teaching fears in regards to classroom management” (Hamman et al., 2010, p. 1359).

The researcher prompted interviewees to “develop clear and detailed possible selves” (Oyserman, Bybee & Terry, 2006, p. 203). The theory holds that “having an end vision without process strategies does little to assist with motivation and achievement” (Fryberg & Oyserman, 2006, p. 20; Oyserman, Bybee, Terry, & Hart-Johnson, 2004; Strahan & Wilson, 2006). While the researcher hoped that participant professional identity development benefitted as a result of the interview process, the strategy development process was employed to gain insight into a previously unexplored component of possible selves theory; strategy development. Insight into student-identified strategies added to the limited understanding of pre-service teacher identity development and may inform the development of effective teacher educator pedagogy (see Appendix D for complete interview question prompts).

Lastly, two interviews were conducted with approximately 5 months between the initial and follow-up interview. The elapsed time allowed participants more time in the field to reflect upon, confirm, expand upon initial responses and confirm areas of least or most concern. Participants were sent his or her individual transcript summary (see Appendix G) and asked to review the document for accuracy prior to the interview. The researcher reviewed individual transcripts, constructed clarifying questions to prompt expanded participant responses, and explored any changes to areas of least and most concern. Furthermore, participants were prompted to verify initial interview conclusions and reflect on additional areas of hope and fear that may not have been contained in the four salient categories identified by Hamman et al. (2010).
Data Analysis Procedures

Data analysis for this study included transcribing, organizing and analyzing interviews. The following provides an overview of the process of coding the data, looking for patterns, and determining themes. The following sections and tables will explain the steps taken to code the organized data into meaningful categories that would be utilized during the data analysis process.

- Data organization and member checking
- Coder consensus
- Emergent codes
- Analyzing data for patterns
- Disaggregating the patterns
- Analyzing data for themes

Data Organization and Member Checking

Interviews of a cross-section of thirteen purposively selected participant volunteers were digitally recorded utilizing the application ‘Quick Voice’. Interviews were assigned a teacher candidate number and downloaded to a password protected online server. Interviews were transcribed verbatim but because a linguistic analysis was not the focus of the research, false starts and extraneous language were removed (see Appendix 5 for transcription format). Grammar was corrected in direct quotes however the integrity of the quote was maintained. All interview notes were compiled and each recording was saved in a file identified by the assigned teacher candidate number to ensure confidentiality.

To ensure an accurate understanding and promote clarity the researcher initiated a member checking process. Transcript excerpts were entered into a summary framework (see Appendix G). The summary framework was developed to disaggregate transcripts under the four categories as described by Hamman et al. (2010); “interpersonal relationships,” “classroom management,” “instructional strategies,” and “professional qualities”, and the essential components of the possible selves theory; hopes, fears, and strategy development.
Participants were provided with the framework overview and asked to review the framework for accurate interpretation of the content; hopes, fears, and strategy development, and alignment with the stated categories; “interpersonal relationships,” “classroom management,” “instructional strategies,” and “professional qualities” (Hamman et al., 2010). Participants were asked to review the document prior to follow-up interview. No participants requested changes to the summarizing framework and all agreed that the document accurately reflected their possible self-perspectives at the time of the interview. Once interview notes and member checking feedback were reviewed and catalogued, the coding process began.

Coding and Coder consensus

Transcripts were coded utilizing the coding directives and a color-coding system was established (see Table 3.3). Initial coding focused on organizing ideas (Creswell, 2014).

<table>
<thead>
<tr>
<th>Table 3.3 Coding Directions for Hopes, Fears, and Strategy Development.</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Defined</strong></td>
</tr>
<tr>
<td><strong>Hopes</strong></td>
</tr>
<tr>
<td><strong>Fears</strong></td>
</tr>
<tr>
<td><strong>Strategy Development</strong></td>
</tr>
</tbody>
</table>

Wolcott (1990) suggested that the purpose of qualitative research was not to gather excessive amounts of data but to “winnow” the data to uncover the “essences with sufficient context” (p. 35). Becoming overwhelmed by data occurs easily when the researcher tries to include everything. To avoid this, the researcher established frameworks to guide the two-stage analysis process. Frameworks were grounded in research and intentionally addressed identified research gaps. The following is a visual representation of the two-stage process developed to address dissertation research questions and the conceptual frameworks that drove the coding process (see Figure 3.5).
Having previously coded transcripts to identify hope, fear and process strategies and achieving 100% coder consensus. The strategies were again evaluated in the context of the transcript to determine if the participant was identifying a self strategy or a proposed strategy to improve teacher education. Self–strategies were utilized for stage one and coded again using Ibarra’s (1999) three-step process for the attainment of possible selves was utilized to identify the general category of suggested self-strategies. Coding directives (see Table 3.4) were developed to promote coder consensus and ensure trustworthiness of analysis.
Table 3.4 Coding Directives for Ibarra (1999) Possible Selves Attainment Steps.

<table>
<thead>
<tr>
<th>Label</th>
<th>Ibarra (1999)</th>
<th>Defined</th>
<th>Example</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Social Observation and</td>
<td>Noticing of role-models and significant others that have influenced</td>
<td>They really influenced... I learned so much from... We discussed... The</td>
</tr>
<tr>
<td></td>
<td>Interactions</td>
<td>professional thought or practice</td>
<td>teacher modeled...</td>
</tr>
<tr>
<td>2</td>
<td>Experimentation</td>
<td>Personalization and authentication activities or experiences. (Doing)</td>
<td>I tried... We participated in a simulation... I would use or do... We</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>did a lot of group activities...</td>
</tr>
<tr>
<td>3</td>
<td>Reflection</td>
<td>Personal evaluation, and adjustment of self (Thinking)</td>
<td>I would/ I will think about... I reflected... I questioned myself... I</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>would journal/I journal</td>
</tr>
</tbody>
</table>

The second stage of analysis addressed the second research question; 'How could candidate generated strategies influence teacher education?' The researcher reviewed transcripts and identified participant suggested strategies for improving teacher education. The data was coded utilizing a framework that emerged from a meta-analysis of three successful teacher education programs around the world (Korthagen et al., 2006). Coding directives (see Table 3.5) were established to ensure accuracy of initial codes. Major codes, sub-codes, and emerging patterns were interpreted (see Appendix L, Appendix M, Appendix N, and Appendix O).
Table 3.5 Coding Directives for Korthagen et al. (2006) Framework for the Improvement of Teacher Education.

<table>
<thead>
<tr>
<th>Korthagen, Loughran, Russell (2006)</th>
<th>Statements could address the following questions:</th>
<th>Statements might refer to:</th>
</tr>
</thead>
<tbody>
<tr>
<td>I Views of knowledge and learning</td>
<td>What can teacher educators and mentors do to:</td>
<td>Specific authentic experiences</td>
</tr>
<tr>
<td></td>
<td>• increase candidate’s personal efficiency,</td>
<td>• for deep reflection and self-evaluation.</td>
</tr>
<tr>
<td></td>
<td>innovation, professional flexibility, and/or</td>
<td>• to work with mentors to build professional knowledge.</td>
</tr>
<tr>
<td></td>
<td>adaptability?</td>
<td>• to think about learning and create student centered practices.</td>
</tr>
<tr>
<td></td>
<td>• alter misconceptions (teaching and learning are</td>
<td></td>
</tr>
<tr>
<td></td>
<td>simple and/or rote) and help candidates</td>
<td></td>
</tr>
<tr>
<td></td>
<td>understand the complex teaching and learning</td>
<td></td>
</tr>
<tr>
<td></td>
<td>process?</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• promote a student-centered view of learning/</td>
<td></td>
</tr>
<tr>
<td></td>
<td>an understanding that telling is not teaching</td>
<td></td>
</tr>
<tr>
<td></td>
<td>and listening is not learning/ teach children</td>
<td></td>
</tr>
<tr>
<td></td>
<td>(how to learn) and not just the content?</td>
<td></td>
</tr>
<tr>
<td>II Program Structures &amp; Practices</td>
<td>How can teacher education help candidates do:</td>
<td>Opportunities to research different strategies or theories.</td>
</tr>
<tr>
<td></td>
<td>• to conduct professional practice research?</td>
<td>• work collaboratively with peers.</td>
</tr>
<tr>
<td></td>
<td>• provide opportunities for peer collaboration?</td>
<td></td>
</tr>
<tr>
<td>III Quality of staff and Organization</td>
<td>How did/could teacher educators and faculty</td>
<td>Teacher educator knowledge of candidate, school, and teacher needs.</td>
</tr>
<tr>
<td></td>
<td>model and display understanding of pre-service</td>
<td>• modeling effective instructional strategies.</td>
</tr>
<tr>
<td></td>
<td>teachers, classroom teachers, and teacher</td>
<td>Teacher education program projects or opportunities that build connections within the educational community.</td>
</tr>
<tr>
<td></td>
<td>educator practice?</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• effective instructional strategies?</td>
<td></td>
</tr>
<tr>
<td></td>
<td>What are the opportunities for collaboration</td>
<td></td>
</tr>
<tr>
<td></td>
<td>between</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• the teacher candidate and local schools</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• the teacher candidate and university,</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• the university and educational community.</td>
<td></td>
</tr>
</tbody>
</table>

**Emergent Codes**

While interviews resulted in the articulations of hopes, fears and strategies, analysis focused on self-strategies and strategies for teacher education. While analysis was viewed in context and a brief analysis of participant hopes and fears was conducted (see Appendix H, Appendix I, Appendix J, Appendix K) these statements were only used to clarify the strategy development process. The majority of participant strategies were coded however some data did not closely align with the Ibarra (1999) and Korthagen et al. (2006) coding frameworks. These statements were reviewed independently and then
within the transcript context in an effort to identify emerging codes. The areas that emerged were: hopes and fears related to limited time and affective traits of teacher educators. At the conclusion of the analytical process all identified strategies were coded.

Analyzing Data for Patterns

Research frameworks (Ibarra, 1999; Korthagen et al.; 2006) were intentionally selected to deepen understanding, investigate multiple perspectives, and derive patterns in regards to teacher candidate’s professional identity development and to inform effective teacher educator pedagogy. The use of frameworks as coding structures allowed the author to analyze candidate identified strategies for self and teacher education in regards to the achievement of hopes and avoidance of fears in regards to “interpersonal relationships,” “classroom management,” “instructional strategies,” and “professional qualities” (Hamman et al., 2010).

The taking apart of data was accomplished through what Stake (1995) identified as the “direct interpretation of the individual instance and through aggregation (coding) of instances until something can be said” (p. 74). Once coder consensus was achieved for the identification of hopes, fears, and process strategies. The researcher developed an excel document that allowed for data organization, sorting, and the documentation of patterns to address the two research questions. This allowed the researcher to focus on the instance, dissecting and synthesizing into a more meaningful interpretation (1995). The researcher used “categorical aggregation” to establish patterns (Creswell, 2013, p. 199). The “data analysis spiral” (see Creswell, 2013, p. 183) and constant comparative process (Stake, 1995) was used for further comparing, condensing, synthesizing and interpreting of data.

Constant comparison, coding, aggregation of frequencies, and living with the data allowed for the identification of patterns, while consistent correspondence to aspects of context, and insights gleaned from a preceding literature review provoked the emergence of meaning. Decision-making during the analysis process was indicated in a notes column within the database and documented in an analysis journal. The analysis journal served to verify, provide clarification about patterns, and support the emergence of
themes. This strategy made transparent researcher reasoning for coding, category labels, revisions, and impressions of the data (Renner & Taylor-Powell, 2003). The data was organized into major codes and sub-codes, and emerging patterns were interpreted (see Appendix L, Appendix M, Appendix N, and Appendix O). Chapter 4 provides results from the analytical process.

**Disaggregating the Patterns**

After the patterns were developed, they were disaggregated by certification level (elementary and secondary). The disaggregated patterns were organized by the first two research questions and emergent patterns not derived from the theoretical frameworks. A percentile was calculated for each pattern by dividing the number of elementary and secondary participants who articulated the pattern by the total number of participants represented in that certification category, elementary or secondary. The researcher identified a pattern as significant if there was a discrepancy of 50% or higher between the elementary and secondary percentile averages for each pattern.

**Analyzing data for themes**

The process of data collection, summarizing, establishing patterns, forming relationships, and condensing information to the most significant meanings assisted in the development of meaning (Huberman & Miles, 1994). After patterns were established, disaggregated, and connections explored the researcher noted the development of themes. After reviewing transcripts, Appendix L and Appendix M multiple times, the researcher reflected on the following question: *What influenced candidate’s professional identity development?* The researcher synthesized and grouped patterns under logical categories to interpret common meanings and establish themes (Creswell, 2014).

**Validation**

This study attempted to establish clearly defined parameters, time frame, and a focus grounded in a strong theoretical framework. However, with all studies there are limitations that impact results. The researcher used accepted strategies, as specified by Creswell (2013) to minimize challenges.
Creswell (2013) recognized both the benefits and limitations of a “convenience sample” (p. 158). Such a methodology “saves time, money, and effort, but at the expense of information and credibility” (p. 158). While Male and Murray (2005) recognized the benefit of convenience sampling to promote teacher educator professionalism and self-study research, it is necessary to eliminate any ethical issues related to an unbalanced sense of power and ensure authenticity of the data. Though current students of the researcher were removed from quota sampling to eliminate ethical issues related to an unbalanced sense of power (Creswell, 2013), due to the nature of the small private university, the author may have had prior contact with participants. While previous rapport may increase authenticity of interview data, Maxwell (2005) identified that participant responses were often affected by prior interactions. Bloomberg and Volpe (2012) suggested that interviewees might be influenced by either a desire to cooperate or inhibition of frank answers. To increase validation Creswell (2013) suggested the establishment of informed consent and protection from harmful procedures.

First, it was made clear to participants that involvement in the study was voluntary. Participants were invited to participate and provided with a written description of the function and purpose of the study. Participants were asked to sign an Informed Consent form (see Appendix 3.B). The form provided a detailed summary as to the purpose of the study, a guarantee of anonymity and a statement ensuring the refusal rights of participants in regards to questions, and voluntary withdrawal at any point in the process. Participants were also asked to grant permission for both the recording and transcribing of the interview. At the beginning of the transcription process, participants were assigned a teacher candidate number to ensure anonymity. All data collected during the study was stored on a password protected computer and additional artifacts filed and held in a secure location for five years after the conclusion of the study.

Immediately after the interview, the researcher wrote an interpretive commentary. The recordings were listened to again and key ideas, episodes, and researcher perceptions of the meaning and context of comments were added to the commentary. Interviews were transcribed verbatim and main ideas were entered into a transcript summary framework (see Appendix G) to aid in to aid the comparative analysis process. This summary framework was emailed to the participant as a form of member checking.
Stake (1995) stated “a good interviewer can reconstruct the account and submit it to the respondent for accuracy and stylistic improvements” (p. 66). Stake (1995) argued that interviewees are often “dismayed with transcripts not only because of the inelegance of their own sentences but because they did not convey what they intended” (p. 66).

Prior to the follow-up interview, participants were asked to review his or her transcript summary again for accuracy and were asked to express views, suggest omissions, and share additional comments. Yin (2003) suggested that this “process will enhance the accuracy of the case study, hence increasing the construct validity of the study” (p. 159). Individualized clarifying and extension questions were developed based on the initial interview and an abbreviated form of the initial interview process prompted participants to identify additional and current hopes, fears, and strategies for self-attainment.

Qualitative study allows for the personalization of research. Researcher attributes such as his or her identity, experience, training, and perspective are often embedded throughout qualitative studies (Stake, 1995). Ensuing data analysis and interpretation could be plagued by biased findings. To reduce prejudice potential, the researcher selected research based frameworks to direct the analytical process. The researcher also committed to letting the findings emerge and personal interpretations were only interjected when affirmed by participants and current research.

Another strategy to ensure research validation and limit bias was to initiate a peer review. This provided both a peripheral perspective, imposed another layer of accountability, and refined or reinforced the analysis process. A current doctoral candidate and a recent doctoral graduate assisted in the

The diverse peer review panel (see Table 3.5) was selected to participate in achieving coder consensus and participate in “peer review or debriefing” sessions (Creswell, 2013, p. 251). Stake (1995) supported use of this strategy as a “way of corroborating the essential facts and evidence presented” (p. 159). The researcher developed three coding tables for the peer reviewers. The coding table was revised numerous times in response to inaccuracies in coding.

Two peer reviewers received a copy of the coding tables and a transcript excerpts with approximately 600-1000 words. The researcher calculated the percentage of
agreement by counting the number of codes in agreement versus codes that differed. The initial coding table for the identification of hopes, fears, and strategies received 100% coder consensus. The other two coding charts revealed discrepancies between coders. Both had 80% accuracy for the strategy development coding table (Ibarra; 1999) used for research question one and 82% for the coding table for research question two (Korthagen et al.; 2006).

Peer feedback and an additional review of the articles written by Ibarra (1999) and Korthagen et al. (2006) led to the extension of code definitions and the inclusion of examples, and potential sentence stems. A discussion was initiated with each peer reviewer and they were then sent an additional transcript to code based on the revised coding tables and 100% consensus was achieved. Table 3.6 provided an overview of peer reviewer years in education, current position, and level of education. Peer debriefing sessions allowed reviewers to ask questions about the methods, meanings, and data interpretations this process reinforced the researcher’s analysis of data.

<table>
<thead>
<tr>
<th>Reviewer</th>
<th>Years in the Field of Education</th>
<th>Current Position</th>
<th>Level of Education</th>
</tr>
</thead>
<tbody>
<tr>
<td>A</td>
<td>18</td>
<td>Graduate Teaching Assistant</td>
<td>Master’s in Educational Leadership Doctoral Candidate in Educational Leadership</td>
</tr>
<tr>
<td>B</td>
<td>9</td>
<td>Reading specialist</td>
<td>Doctorate in Educational Leadership</td>
</tr>
</tbody>
</table>

Table 3.6 Peer Reviewer Levels of Experience and Expertise

Another recognized limitation of qualitative research is the narrow participant sample size (Creswell, 2013). Generalizability, however, was not the intended goal of this research. The purpose of this study was to explore current research limitations that impeded candidate professional identity development and extend upon previous applications of the theory of possible selves to teacher education. Interview analysis garnered a “thick, rich description, as well as detailed information” (Bloomberg & Volpe, 2012, p. 127) that gave voice to teacher candidates and informed teacher educator pedagogy.

Bloomberg and Volpe (2008) recognized that methodological validity was dependent on the symbiotic relationship between the researcher’s pursuits, the research questions, and the methods used. Careful attention was paid to the design of this
qualitative instrumental-intrinsic case study to address these three components. First, the research purpose emerged from intrinsic or self-perceived professional limitations, confirmed, and generalized through a review of the literature. Second, research questions were instrumentally grounded in the theory of possible selves and extended upon previous application of the theory to the field of teacher education. Third, the research method was intentionally designed to address AERA (2005) panel suggestions for the improvement of teacher educator research, Stake’s (1995) criteria for intrinsic qualitative case studies, and Creswell’s (2013) strategies to promote study validation.

**Summary**

This qualitative intrinsic-instrumental case study applied the theory of possible selves to examine the identity development of pre-service teachers at a private Midwestern university. Purposeful sampling was used to select study participants and initial and later semi-structured interviews were conducted with each of the thirteen participants over a five-month span. The data was analyzed using constant comparison and Creswell’s (2013) analysis spiraling technique. Codes and sub-codes were analyzed for emerging patterns and themes. Credibility of the data was established through voluntary participation, clearly articulated interview protocol, member checking, and peer debriefing. The strength of this study’s design emerged from the intentional application of AERA (2005) panel suggestions for the improvement of teacher educator research, Stake’s (1995) criteria for intrinsic and instrumental qualitative case studies, and Creswell’s (2013) strategies to promote study validation.
Chapter 4-Results

Introduction

A cross-section of thirteen teacher candidates and recent graduates from a private Midwest university participated in two interviews. In order to provide insight into professional identity development a duration of approximately four to five months elapsed between initial and later interviews. The following chapter details an analysis of information and insights gleaned from interviews. This chapter reports the results of the analysis (as discussed in chapter three) based on the following research questions:

Overarching Questions:
1. How do candidates describe and develop hope achievement and fear avoidance strategies in regards to previously identified salient possible selves (Hamman et al., 2010)?
2. How do candidate identified strategies inform teacher education?

Findings from analysis are organized in the following way to show the results in the form of credible patterns related to the research questions, and the themes that resulted from data analysis across all patterns.

- General overview of salient possible selves types (Hamman et al., 2010): interpersonal relationships, classroom management, instructional strategies, and professional qualities.
- Research question one: patterns across all participants organized by salient possible selves types (Hamman et al., 2010) and analyzed using Ibarra (1999) processes: observation, experimentation, and reflection.
- Emergent patterns not derived from applied theoretical frameworks for research questions one and two.
- Disaggregated strategy patterns for research question one and two and emergent patterns.
• Themes across all patterns.

**General overview of salient possible selves**

Each interview began with a general overview and the definition of possible selves reported by Hamman et al. (2010). Participants were asked to identify areas of least and most concern (see Table 4.1). There were two identified areas of self-reported concern, instructional strategies (54% of participants) and classroom management (46% of candidates). Interpersonal relationships within the school community were an area of least concern for 61% of candidates, 31% were least concerned about their future professionalism.

**Figure 4.1 Participant self-reported areas of most and least concern regarding Hamman’s et al. (2010) four identified categories of salient possible selves.**

Furthermore, the interview process required participants to provide initial descriptions of hopes and fears. Hamman et al. (2010) encouraged the attainment of descriptors to increase understanding with respect to the four identified categories (‘interpersonal relationships’, ‘classroom management’, ‘instructional strategies’, and ‘professional qualities’). This research however, sought to understand participant perspectives pertaining to the strategy development process related to the achievement of hopes and avoidance of fears for each identified category. While a thorough analysis of candidate hopes and fears was not conducted, summative tables of candidate responses were provided in the appendices (see Appendix H, Appendix I, Appendix J and Appendix
K). These tables provide background knowledge as to interview protocol used to frame the strategy development process.

**Patterns Related to Research Question One**

1. *How do candidates describe and develop hope achievement and fear avoidance strategies in regards interpersonal relationships within the school community (Hamman et al., 2010)?*

Self-strategies for salient possible selves across participants are discussed under each of Hamman’s identified types of selves (interpersonal relationships, classroom management, instructional strategies, and professional qualities) with respect to Ibarra’s (1999) three processes (observation, experimentation, and reflection). The following conclusions are drawn from an analysis of two interviews conducted with a cross-section of thirteen teacher candidates. For further analysis of individual participant responses see Appendix N.

**Patterns for Strategies for Interpersonal Relationships Across all Participants**

The category for future interpersonal relationships was defined during the interview process as the “interactions with individuals within the school community” (see Appendix D interview guide). Table 4.1 provided a general overview of the number of participants who identified strategies coded using Ibarra (1999). The following is an explanation of table 4.1 and was organized under the headings: observation, experimentation, and reflection.

**Table 4.1 Summary of Participants who Identified Strategies for Interpersonal Relationships Coded using Ibarra (1999)**

<table>
<thead>
<tr>
<th>Definition (Ibarra, 1999)</th>
<th>Observation</th>
<th>Experimentation</th>
<th>Reflection</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Noticing of role models and significant others that have influenced professional thought or practice.</td>
<td>Personalization and authentication activities or experiences.</td>
<td>Personal evaluation and adjustment of self</td>
</tr>
<tr>
<td>Number of participants who identified strategies</td>
<td>2/13, 15%</td>
<td>13/13, 100%</td>
<td>9/13, 69%</td>
</tr>
</tbody>
</table>
Table 4.1-4.3 revealed three patterns:

- Few participants planned to utilize observation (see Table 4.1).
- All participants planned to experiment with self-initiated and district-directed strategies (see Table 4.2).
- Over half of the participants reflected on dispositions perceived to help and hinder future interpersonal relationships (see Table 4.3).

**Observation**

Comments regarding observation were brief and precipitated experimentation and reflection strategies. A more thorough discussion in regards to the role of observation in the participant’s strategy development is presented in the section on research themes.

**Experimentation**

**Table 4.2 Experimentation Strategies for Future Interpersonal Relationships**

<table>
<thead>
<tr>
<th>Self-Initiated Strategies (13)</th>
<th>District-Directed Strategies (6)</th>
</tr>
</thead>
<tbody>
<tr>
<td>• Commitment to frequent and open communication (13)</td>
<td>• Anticipated district provision of a mentor (TC7, 12)</td>
</tr>
<tr>
<td>o Internally focused, to meet personal and professional needs (TC1, 4, 6, 7, 8, 9, 12, 13)</td>
<td>• Anticipated district time allowance for collegial collaboration (TC1, 2, 3, 12)</td>
</tr>
<tr>
<td>o Externally focused to support:</td>
<td></td>
</tr>
<tr>
<td>▪ Colleagues in their professional pursuits (TC7, 9, 13)</td>
<td></td>
</tr>
<tr>
<td>▪ Connections with colleagues to meet the needs of students (TC6, 8, 12, 13)</td>
<td></td>
</tr>
<tr>
<td>• Planned to personalize professional relationships. (TC1, 2, 3, 4, 9, 13)</td>
<td></td>
</tr>
</tbody>
</table>

While observation appeared to be neglected as an influential strategy, all participants articulated strategies that emphasized experimentation. Participant experimentation strategies emphasized self-initiated and district-directed experimentation (See Table 4.3). Participants emphasized the need for self-initiated frequent and open communication, however the purpose for these intentional interactions varied from an internal focus on personal needs to an external effort to support of others.

While these strategies were proposed to achieve personal professional needs, other participants devised strategies to promote interpersonal relationships in order to meet the needs of the surrounding educational community. Three candidates (TC7, 9, 13)
emphasized the need to establish open lines of communication to support other educators. A female music major recognized the volatility of arts and emphasized a need to establish connections in order to gather a “community of people to fight alongside” when cuts to music programs were proposed (TC7). Four other participants (TC6, 8, 12, 13) suggested strategies focused on effective communication to promote student achievement. A secondary English student teacher shared,

> We are all dealing with the same students and I need to be able to have relationships with all departments because if student B is having trouble in multiple classes we all need to work together to figure out what the issue is. (TC13)

The perceived need for “facilitating connections however I can” (TC9), “make a conscious effort” (TC1), “invest time in reaching out” (TC4) spanned across all interviews. The majority of participants’ strategies focused on strengthening communication within the school setting to construct a network to support personal professional pursuits, collegial collaboration, and to ensure students success. While self-initiated interactions dominated candidate strategies almost half of participants expressed an expectation for some form of district directed support. Participants expected either the administrative assignment of a mentor or an opportunity to participate in a district directed mentoring program. Four candidates expressed an expectation for district release time for collegial interaction, collaboration and opportunities “to pick peoples brains because if there is a level of respect there for everyone’s professional opinion then it is easier to fit in” (TC 2).

**Reflection**

**Table 4.3 Reflection on Dispositions Related to Interpersonal Relationships (n=10)**

<table>
<thead>
<tr>
<th>Helps</th>
<th>Hindrances</th>
</tr>
</thead>
<tbody>
<tr>
<td>• Respect for others (TC2, 3, 5, 9, 12)</td>
<td>• Perceived inflexibility of others (TC8, 9)</td>
</tr>
<tr>
<td>• Coachable, Teachable (TC4, 8, 12)</td>
<td>• Limited knowledge of conflict management and protocol. (TC5, 9, 11, 10, 12)</td>
</tr>
<tr>
<td></td>
<td>• Isolation (TC3, 9, 13)</td>
</tr>
</tbody>
</table>

Reflection strategies focused on attributes that helped and hindered future interpersonal relationships within the school community (See Table 4.3). Five participants made general statements regarding respect for others. For example, one male
secondary major who feared future pedagogical conflicts shared, “I guess just continue to be respectful and, you know, treat them with that respect even though they might not be treating me with respect” (TC5). Three candidates discussed the need for educators to be teachable or coachable. A female elementary education major shared, “I think it is important that the other teachers see and know that I have a willingness to learn, take advice, give and take. I think that will help me overcome my fear” (TC12).

While interpersonal school relationships were an area of least concern for 61% of participants, seven participants identified three attributes they perceived would hinder hope achievement. Two participants perceived that they would encounter a level of inflexibility among their colleagues. One secondary math major completing the semester prior to student teaching shared,

Many people are pretty set in how they want to do things. I think most teachers in their classroom, they have kind of set mode that they go into and run their classroom. (TC9)

When asked to describe strategies to counter conflicts within the school community, five candidates expressed a level of uncertainty while two candidates expressed a limited knowledge of district conflict protocol. A secondary male math major shared, “I don’t think I would take it to the administration. I feel like that is almost tattling. I don’t want to do that so as of right now I have no idea on how to go about it (managing collegial conflicts)” (TC11).

**Conclusions for Patterns Across Future Interpersonal Relationships**

In summary, the majority of participants identified interpersonal relationships as an area of least concern. Participants described hopes and fears and identified over sixty strategies for the avoidance or attainment of selves. All participants shared experimentation strategies to assist them in achieving selves. Attributes that helped and hindered future selves were discussed by 69% of participants and only two participants identified observation as a strategy for the achievement of selves in regards to interpersonal relationships within the school community.
Patterns for Strategies related to Future Instructional Strategies across all Participants

The category for future instructional strategies was defined during the interview process as the “academic teaching strategies that you will use as a classroom teacher” (See Appendix D interview guide). Table 4.4 provided a general overview of the number of participants who identified strategies coded using Ibarra (1999). The following is an explanation of table 4.4 and was organized under the headings: observation, experimentation, and reflection.

Table 4.4 Summary of Participants who Identified Strategies for Instructional Strategies Coded using Ibarra (1999)

<table>
<thead>
<tr>
<th>Definition (Ibarra, 1999)</th>
<th>Observation</th>
<th>Experimentation</th>
<th>Reflection</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Noticing of role models and significant others that have influenced professional thought or practice.</td>
<td>Personalization and authentication activities or experiences.</td>
<td>Personal evaluation, and adjustment of self</td>
</tr>
<tr>
<td>Number of participants who identified strategies</td>
<td>2/13, 15%</td>
<td>13/13, 100%</td>
<td>5/13, 38%</td>
</tr>
</tbody>
</table>

Table 4.4-4.6 revealed three patterns:

- Few participants reported using observation (see Table 4.4).
- All participants articulated experimentation strategies that relied upon trial and error, independent research, and information gathering from students and colleagues (see Table 4.5).
- Five participants reflected on attributes perceived to promote effective use of instructional strategies (see Table 4.6).

**Observation**

A limited number of candidates, 15%, identified observation as a strategy for the achievement of hopes and avoidance of fears related to future instructional strategies. A more thorough discussion in regards to the role of observation in participant’s strategy development is presented in the section on research themes.
Experimentation

Table 4.5 Participant Experimentation Strategies to Achieve Selves Related to Future Instructional Strategies (n=13)

<table>
<thead>
<tr>
<th>Action orientated strategies</th>
<th>Research oriented strategies</th>
</tr>
</thead>
<tbody>
<tr>
<td>Recognized the need to use trial and error (TC1, 2, 3, 6, 10, 12) Intended to develop thorough lesson plans (TC1, 3, 7)</td>
<td>Planned to conduct independent research (TC1, 3, 4, 5, 6, 7, 9, 10, 11, 12, 13) Planned to attend conferences (TC1, 6, 9) Planned to work closely with and garner collegial support (TC4, 7, 8, 9) Planned to survey student to determine needs and interests and develop lessons accordingly (TC2, 3, 7, 8, 9, 11)</td>
</tr>
</tbody>
</table>

All participants discussed experimentation strategies that emphasized both the need for action and research (see Table 4.5). Participants discussed the value of trial and error in the development of instructional strategies. A female elementary student teacher shared, “I think you just need to try it sometimes even if you fail, it’s good to try things and experience different instructional strategies” (TC6). While many participants shared general strategies others provided more specific action plans. A female elementary student teacher shared, I want to create a bulleted list that I can tape to my desk, like think-pair-share, match mine, and other things that I know how to use. So that when I am sitting there or noticing something is not working then I can go, this is what we are going to do. (TC1)

Three candidates emphasized lesson planning to ensure the use of effective instructional strategies. A secondary female major who had recently completed her student teaching recognized the need for both planning and revision, Reevaluate, rewrite and adjust even if it is three or five lesson plans over a semester period or units that I have adjusted to incorporate instructional strategies. This will keep things fresh for myself as a teacher and my students as a class...so definitely trying new approaches even when I feel comfortable with what I am doing or especially when I feel really comfortable with what I am doing. (TC3)

This strategy was in response to the participant’s expressed fear of becoming stagnant in her teaching, “because I am so focused on getting what I have to get done, my agenda” (TC3). The idea of becoming stagnant or “falling in a rut” (TC1, 5) was the
most common fear expressed by participants (TC1, 2, 5, 12, 13). During a later interview a secondary candidate was asked to reflect on the reason for such a commonly held concern, “I have seen this in some of my teachers. They have gotten comfortable and were just going through the motions” (TC5). In order to combat this and other common hopes and fears associated with instructional strategies (see Appendix I), all participants articulated experiential strategies that emphasized research and action for the development of selves related to instructional strategies.

Research experimentation strategies relied upon independent study, conference attendance, collegial support, and student needs. Collaboration with colleagues was proposed in order to engage in research related to instructional strategies. This strategy was prevalent among participants that expressed specific fears related to personal limitations for example TC4 recognized personal theoretical knowledge gaps, TC7 aspired to teach band and held concerns related to a possible choir position, TC8 struggled with strategies to assist with guided reading, and TC9 recognized his limited knowledge in regards to teaching in an ethnically diverse settings with possible language barriers. Participants planned to seek collegial support in each of these situations,

Hopefully, you have some special ‘ed’ teachers that might specialize in English language learners and just really understanding how I could use those effectively in a math classroom. So, I might have, you know, a Special Ed teacher come in so many times a week and work with that student and with any other ESL students who are having issues. (TC9)

Six participants emphasized the need to research students’ needs and interests for the development of selves related to instructional strategies. Participants suggested the use of one-on-one conversations, weekly meetings, and surveys to understand student interests and learning styles. Participants planned to use this knowledge to shape lessons to ensure success and increase student motivation, “Getting to know my students and seeing what works for them and what makes them engaged and what makes them want to learn more” (TC8).

A female elementary student teacher recognized the value of acquiring student knowledge in order to alleviate the feeling of being overwhelmed with the myriad of resources available.
There are so many ideas and there are so many different things you can do. I feel sometimes overwhelmed with all this stuff and being able to decide what’s the best thing to do is hard. Knowing my students will help me be better at narrowing instructional strategies down. (TC6)

Only one participant, a secondary English student teacher suggested the use of assessment to shape instructional strategies, “I think continually assessing them in some form whether it is more formal or informal and using that data that I gather to alter the next time or the next days lessons” (TC13).

**Reflection**

Table 4.6 Reflection Strategies for Future Instructional Strategies  (n=5)

<table>
<thead>
<tr>
<th>Required dispositions impacting future instructional strategies.</th>
</tr>
</thead>
<tbody>
<tr>
<td>● Effective time management (TC4, 12)</td>
</tr>
<tr>
<td>● Reflective practitioner (TC6, 8),</td>
</tr>
<tr>
<td>● Content knowledge (TC5)</td>
</tr>
<tr>
<td>● Perfectionism (TC12)</td>
</tr>
</tbody>
</table>

Participant reflection strategies focused on attributes perceived to impact future instructional strategies however there were not enough data to yield any patterns. Table 4.6 provided a summary of those six instances where participants reflected on dispositions and skills that influenced future instructional strategies.

**Conclusions for Patterns Across Future Instructional Strategies**

In conclusion, thirteen participants articulated over fifty strategies in regards to the development of selves related to instructional strategies. All participants expressed experimentation strategies, while less emphasis was placed on observation of influential others, 15%, and reflection, 52%. Experimentation strategies focused on the need for action in regards to lesson planning and learning through trial and error, and research. Participants planned to conduct research independently, by attending professional conferences, and garnering collegial support. Participants also planned to research student interests and needs to develop engaging lessons. Only one participant suggested the use of assessment to achieve selves related to instructional strategies.
Patterns for Strategies related to Future Classroom Management Strategies

Across all Participants

The category for future classroom management strategies was defined for candidates as the “management of the classroom, discipline issues and interactions with students” (see Appendix D interview guide). Table 4.7 provided a general overview of the number of participants who identified strategies coded using Ibarra (1999). The following is an explanation of table 4.7 and was organized under the headings: observation, experimentation, and reflection.

Table 4.7 Summary of Participants who Identified Strategies for Classroom Management Coded using Ibarra (1999) (n=13)

<table>
<thead>
<tr>
<th>Definition (Ibarra, 1999)</th>
<th>Observation</th>
<th>Experimentation</th>
<th>Reflection</th>
</tr>
</thead>
<tbody>
<tr>
<td>Noticing of role models and significant others that have influenced professional thought or practice.</td>
<td>1/13, 7%</td>
<td>13/13, 100%</td>
<td>12/13, 92%</td>
</tr>
</tbody>
</table>

Table 4.7-4.9 revealed three patterns:

- Observation strategies were rarely reported (see Table 4.7)
- All participants articulated experimentation strategies to strengthen classroom management (see Table 4.8).
- The majority of participants reflected on dispositions perceived to impact classroom management (see Table 4.9).

Observation

One participant discussed observation strategies. A more thorough discussion regarding the role of observation in participant’s strategy development is presented in the section on research themes.

Experimentation

While observation was largely neglected (see Table 4.7), all participants emphasized experimentation strategies. Strategies addressed the following four
perceived components of professional practice: classroom policies, personal pedagogy, rapport building, and garnering external support (see Table 4.8).

**Table 4.8 Experimentation Strategies for Selves Related to Classroom Management (n=13)**

<table>
<thead>
<tr>
<th>Set classroom policies and rules</th>
<th>Establish personal effective pedagogy</th>
<th>Rapport building with students</th>
<th>Garnering support from others</th>
</tr>
</thead>
<tbody>
<tr>
<td>(TC2, 3, 6, 8, 9, 10, 12, 13)</td>
<td>(TC1, 3, 5, 6, 7, 8, 9, 12)</td>
<td>(TC4, 5, 6, 7, 9, 10, 11, 12)</td>
<td>(TC2, 6, 7, 8, 11, 12)</td>
</tr>
</tbody>
</table>

Candidates provided several experimentation strategies in regards to the establishment of classroom policies and procedures. Nine candidates made generalized statements regarding the need to establish clear expectations early in the school year.

I think a big part is just setting those clear expectations from the beginning. These are the things you do in my classroom, and these are the things you absolutely do not do. (TC9).

Five candidates discussed ideas upon which policies and procedures should be based. Such sources identified were the school or district discipline policy (TC5), character traits such as integrity (TC8, 11), individual accountability (TC2) and student input (TC3, 11). A social studies pre-student teacher emphasized the need to alter procedures based on student developmental levels.

If I hold up my hand and start counting down, I don’t feel comfortable doing that. I feel like they won’t respect. I know how important it is for me to communicate my expectations to the class so maybe even asking them what type of call to halt I should use. (TC11)

Participants suggested personal pedagogical practices that they perceived would lead to the development of selves related to classroom management. Three participants (TC3, 5, 6) connected effective classroom management to lesson planning.

Yeah, through engaging lessons and organization, I hope that I won't really have to deal with too many behavior problems. I found through talking with teachers that that's the case. If you have good lessons and you have well-organized classrooms, then it's not an issue. Right, preventative classroom management I guess you might call it. (TC5)
A secondary drama teacher concerned that her emphasis on coverage of content may cause her to neglect classroom management issues shared, “I will slow down what I pack into a lesson and try to make more manageable objectives and goals for a class” (TC3). One future music teacher shared how pedagogical choices based on the knowledge of student interests would alleviate classroom management conflict in her future classroom, “Know my students and then incorporate that into my classroom as far as what songs I pick or what music I use, meet them kind of half way” (TC7).

A secondary math major feared the eruption of conflict between students within his future classroom. He articulated the need to utilize instructional strategies to build community and rapport between students within his classroom, “When it comes to conflict-resolution skills it involves not only making positive relationships between me and the students but making sure they have positive relationships among themselves” (TC9). He planned to incorporate cooperative learning activities to strengthen the classroom community.

While only one candidate recognized the need to strengthen student-to-student relationships, eight participants focused on strategies to strengthen teacher-to-student rapport. Strategies ranged from ensuring the knowledge of student names (TC9) to ensuring involvement in extra curricular clubs and sports (TC2).

A social studies pre-student teacher suggested specific strategies related to student rapport building such as weekly or monthly meetings and exit slips. The exit slips will provide an opportunity to not anonymously but privately voice their opinions and telling the students to be open with me and that I am trying to make this classroom the best I can. The slips would have two parts to them content so I know if I need to re-teach something but also questions about how’s the feel for the room right now, is there issues that need to be addressed, is it a healthy classroom or environment, or what’s going on, content and management. (TC11)

Participant (TC11) extended his answer by recalling past experiences in which he felt disconnected to his high school teachers. This disconnect extended to the schools failure to engage his family, “I feel like my parents, my mom was never really involved. I don’t think it was because she didn’t want to, I think teachers did not reach out and
make the effort”. This past experience may have precipitated his strategic emphasis on generating external support.

Six participants recognized the need to generate support from colleagues (TC2, 6, 7, 8, 12), parents (TC6, 11), and administrative support (TC11).

It is important to have administration on your side is huge. I guess keeping administration informed as to what is going on in my class about the situation. Hopefully they will then bounce ideas back to me. I feel like having those two resources on your side will really help. (TC11)

**Reflection**

Participant (TC8) emphasized the need to continually ask questions and seek advice. She reflected on her ‘teachable’ attitude and how it contributed to her classroom success. “Continuing to be teachable. I can tell you everything that I've told you today is because somebody taught me that”. While participant (TC8) was the only one to reflect on the benefits of a teachable attitude, twelve participants identified additional dispositions that both helped and hindered classroom management selves (see Table 4.9).

**Table 4.9 Participant Reflections Regarding Helps and Hindrances to the Achievement of Selves Related to Future Instructional Strategies. (n=12)**

<table>
<thead>
<tr>
<th>Helps</th>
<th>Hindrances</th>
</tr>
</thead>
<tbody>
<tr>
<td>- Student centered reflection (TC1, 2, 4, 5, 6, 7, 9, 10, 11, 12)</td>
<td>- Exhaustion (TC1)</td>
</tr>
<tr>
<td>- Caring (TC2, 5, 7, 9, 11)</td>
<td>- Timidity (TC4)</td>
</tr>
<tr>
<td>- High student expectations (TC2, 12)</td>
<td>- Inexperience (TC3)</td>
</tr>
<tr>
<td>- Teachable (TC8)</td>
<td>- Personalization of student behavior (TC3)</td>
</tr>
<tr>
<td></td>
<td>- Balance between consistency and leniency, (TC4, 8)</td>
</tr>
</tbody>
</table>

Nine candidates emphasized the use of ‘student centered’ reflection. An elementary student teacher stated, “I’d probably try to sit down and think of the underlying factors of why they’re behaving the way they are behaving? Whether that’s a disability or problems at home or social problems, I think I would try to really evaluate what’s going on” (TC6). A music pre-student teacher focused her reflective process on “what it was like to be them and, now that I'm on the other side, how can I make sure that I am kind of creating the classroom environment that I would have wanted” (TC7).

Participants recognized the need to maintain a caring attitude towards students and hold high student expectations. Participants also reflected on hindrances to the
development of selves related to classroom management. An elementary student teacher reflected her personal limitations and the impact on managing the classroom, “I know I am one that needs lots of sleep” (TC1). A middle level math student teacher’s strategy revealed a timidity in regards to classroom discipline, “The first one; not being afraid to discipline kids” (TC4). A secondary speech theatre graduate attributed challenges related to classroom management to the fact she was a “young teachers new to the field” and the constant challenges associated with the personalization of student behavior. Two participants discussed the challenge of establishing a balanced practice between consistency and leniency and rapport and respect, “knowing how much I can push my expectations and when I should give a little bit” (TC8).

Just finding that balance, and then that balance, and then finding the balance for the other one, too; just being able to be their friend and be there for them and support them and whatever they're going through, but also having them respect me as an adult. (TC4)

**Conclusion for Patterns Across Future Classroom Management Strategies**

In conclusion, classroom management was the second highest area of most concern. Thirteen participants articulated over seventy-five strategies in regards to the development of selves related to classroom management. All candidates articulated experimentation strategies while only one candidate identified observation of influential others, and 92% of candidates reflected on dispositions that helped and hindered classroom management. Participant experimentation strategies focused on the establishment of classroom policies and procedures, improvement of personal pedagogy, garnering support, and rapport building. Rapport building emphasized teacher-to-student relationships while only one participant suggested classroom community building by strengthening student-to-student relationships.

**Patterns for Strategies related to Future Professional Qualities across all Participants**

The category for future professional qualities was defined during the interview process as the “professionalism, organization, creativity, and professional development” (see Appendix D interview guide). Table 4.10 provided a general overview of the
number of participants who identified strategies coded using Ibarra (1999). The following is an explanation of table 4.10 and was organized under the headings: observation, experimentation, and reflection.

**Table 4.10 Summary of Participants who Identified Strategies for Future Professional Qualities Coded using Ibarra (1999) (n=13)**

<table>
<thead>
<tr>
<th>Definition (Ibarra, 1999)</th>
<th>Observation</th>
<th>Experimentation</th>
<th>Reflection</th>
</tr>
</thead>
<tbody>
<tr>
<td>Noticing of role models and significant others that have influenced professional thought or practice.</td>
<td>Personalization and authentication activities or experiences.</td>
<td>Personal evaluation and adjustment of self</td>
<td></td>
</tr>
<tr>
<td>Number of participants who identified strategies</td>
<td>2/13</td>
<td>13/13</td>
<td>13/13</td>
</tr>
</tbody>
</table>

Table 4.10-4.12 revealed three patterns:

- Few participants reported using observation (see Table 4.10)
- All participants articulated experimentation strategies for professional growth (through either job-embedded or traditional professional development (see Table 4.11).
- All participants reflected on dispositions that influenced future professional qualities (see Table 4.12).

**Observation**

Observation of influential others was referenced by two of the thirteen participants (see Table 4.11) and appeared to play a limited role in the achievement of selves related to future professional growth. A more thorough discussion in regards to the role of observation in participant’s strategy development is presented in the section on research themes.
**Experimentation**

Table 4.11 Experimentation Strategies for Future Professional Qualities (n=13)

<table>
<thead>
<tr>
<th>Job embedded professional development</th>
<th>External professional development</th>
</tr>
</thead>
<tbody>
<tr>
<td>Discussions</td>
<td>Attend Conferences</td>
</tr>
<tr>
<td>Colleagues (TC 3, 5, 6, 11, 13)</td>
<td>(TC2, 4, 9, 11, 13)</td>
</tr>
<tr>
<td>Feedback Solicitation</td>
<td>Enroll in Graduate School</td>
</tr>
<tr>
<td>Collegial feedback through peer-observation (TC4)</td>
<td>(TC8, 9, 10, 13)</td>
</tr>
<tr>
<td>Students (TC11)</td>
<td>Join Professional Organizations</td>
</tr>
<tr>
<td>Content (TC5, 11)</td>
<td>(TC7)</td>
</tr>
<tr>
<td>Instructional strategies (TC3, 12)</td>
<td></td>
</tr>
</tbody>
</table>

All candidates discussed experimentation strategies for future professional growth (see Table 4.11). Participant’s emphasized job embedded and external professional growth strategies. Job-embedded strategies focused mainly on discussion generation with colleagues and independent research. Two male secondary candidates suggested independent research to assist with the construction of content knowledge. Both credited this strategy to advice from a previous mentor. “Lots of reading in the content area, he (mentor) told us that it's important to become conversational in your topic, your content area” (TC5). Two female participants’ (TC3, 12) planned to conduct independent research on effective instructional strategies.

Eight participants’ strategies relied upon external professional growth opportunities. Participants cited opportunities such as conference attendance and graduate school. Eight participants expressed a level of uncertainty in regards to graduate degree selection. All attributed the degree continuance hope to a desire to maintain momentum. A novice Spanish teacher recently admitted to graduate school shared, “I didn’t want to stop studying, because if I keep going I will learn more and more, not just my English but also my writing and other skills” (TC10).

While the majority of participants for this category emphasized the benefits of surrounding themselves with other educators, one pre-student teacher (TC7) certified in music suggested the maintenance of affiliations with musicians outside the field of education.
Just finding avenues to make music myself. Be part of groups that perform. I would say that just surrounding myself. I've heard from a lot of people the best way to not get burned out is by doing it yourself. You know, sometimes we put our instruments away as a teacher, so continuing to play, continuing to do the things that remind us of why we're passionate about it. (TC7)

**Reflection**

Table 4.12 Reflection: Dispositions that Influence Future Professional Qualities (n=13)

<table>
<thead>
<tr>
<th>Disposition</th>
<th>Participants</th>
</tr>
</thead>
<tbody>
<tr>
<td>Student centered</td>
<td>TC1, 3, 4, 5, 8, 10, 13</td>
</tr>
<tr>
<td>Love learning/Life-long learner</td>
<td>TC 7, 8, 9, 11, 12</td>
</tr>
<tr>
<td>‘Well-read’ (Content Knowledge)</td>
<td>TC5, 11, 13</td>
</tr>
<tr>
<td>Driven</td>
<td>TC5, 11</td>
</tr>
<tr>
<td>Authentic/Sincere</td>
<td>TC3</td>
</tr>
<tr>
<td>Responsible</td>
<td>TC3, 5</td>
</tr>
<tr>
<td>Reflective</td>
<td>TC4</td>
</tr>
<tr>
<td>Respectful</td>
<td>TC5, 8</td>
</tr>
<tr>
<td>Fearless</td>
<td>TC4</td>
</tr>
<tr>
<td>Positive</td>
<td>TC12</td>
</tr>
<tr>
<td>Be on time, dress professionally</td>
<td>TC5</td>
</tr>
</tbody>
</table>

All but one participant, an elementary student teacher, reflected on dispositions that impact professional qualities (see Table 4.12). Seven candidates emphasized the need for professionals to be student-centered. Future students were identified as both a motivating force, “That is what drove me to teaching in the first place. The care and concern for young people, they have so much to give” (TC3), and as a filter for professional dialogue, “Just keep the focus on doing what is best for students” (TC8).

Five participants reflected on the attribute of ‘life-long learning’ and the impact upon the attainment of future professional selves. Strategies emphasized the need for educators to hold, model, and pursue a love for learning in order to attain future professional selves. A novice elementary educator held a commitment to lifelong learning and identified herself as, “a professional copycat. Staying with whatever is happening” (TC8). A music major planned to continue participation in music ensembles in order to “model it, you know a passion for music” (TC7). A secondary pre-student teacher planned to pursue content knowledge in order to become conversational in his
area of certification, “because when you can do that, you can be so much more engaging” (TC5). Another male secondary social studies pre-student teacher shared,

   I guess maintaining everything, staying organized, keep developing, and keep on top of my content. If I try to stay stationary and be fine where I am at, it will catch up to me. So if I keep pushing forward I don’t think I will have a problem. (TC11)

Participants reflected on several additional positive attributes that they perceived would impact future professional qualities however, only three candidates identified hindrances to professional self-attainment: negative personal attitudes and school cultures. “I don’t want to go to PD (professional development) activities and think that it does not apply to me, act like it is boring, or not thinking that it is necessary” (TC12). To ameliorate this hindrance the participant planned to, “Keep a positive attitude, constantly telling yourself that you are looking forward to how you could grow” (TC12).

Participants also identified a negative school culture as a hindrance upon future professional qualities. When encouraged to share a strategy to alter a negative school culture an elementary education graduate stated, “I would want to try to see if there was anything we could do to change it but I know it is probably not possible unless you have a lot of people on board” (TC2). While they hoped to “get along with everyone” (TC8) and “be positive” (TC2) both participants shared that they would ultimately leave if the negative school culture impacted their future professional qualities. “I would leave. I would stick it out for the year with my class but then I would be like this just isn’t the best fit for me and I would go where it is” (TC2).

**Conclusion for Patterns Across Future Professional Qualities**

In conclusion, participants identified several hopes and fears in regards to the attainment of future professional qualities. The majority of participants hoped for continual growth and feared becoming stagnant. Over fifty strategies were identified to assist with professional self-attainment. One participant discussed an observation strategy however, all participants articulated experimentation strategies. Experimentation strategies relied upon job-embedded and more traditional forms of professional development. All but one candidate reflected on dispositions believed to influence future professional qualities. Of these, the majority of participants attributed student-centered
dispositions and a desire to remain a life-long learner to the achievement of selves related to future professional qualities.

**Patterns Related to Research Question Two**

2. *How do candidates’ identified strategies inform teacher education?*

**Teacher Preparation Strategies for Developing Salient Possible Selves (Across all Participants)**

As described in Chapter three, patterns for research question two continued investigating salient possible selves (Hamman et al. (2010). However interview questions for the second stage of research focused on the acquisition of participant identified strategies for the improvement of teacher education. Data were analyzed using the sub-codes derived from Korthagen’s et al. (2006) Framework for the improvement of teacher education. The following conclusions are drawn from an analysis of initial and later interviews conducted with a cross-section of thirteen teacher candidates. For additional insight into individual participant responses across all patterns see Appendix M. Strategies for teacher education across all participants are discussed under each of the three sub-codes based on Korthagen’s et al. (2006) framework: views of knowledge and learning, program structure and practices, and quality of organization and staff.

**Views of knowledge and learning**

The category ‘views of knowledge and learning’ represented authentic experiences that allowed for the professional development of candidate self-views, philosophies, and skills and shifted candidates from a focus on the subject to the student (Korthagen et al., 2006). The following (see Table 4.13) patterns resulted from an analysis of participant identified teacher preparation strategies that influenced personal views of knowledge and learning.
Table 4.13 Summary of Participant Identified Teacher Education Strategies for Sub-code ‘Views of Knowledge and Learning’ (Korthagen et al., 2006) (n=13)

<table>
<thead>
<tr>
<th>Views of Knowledge and Learning: Authentic experiences that allow for the professional development of candidate self-views, philosophies and skills and shift candidates from a focus on the subject to the student (Korthagen et al., 2006)</th>
<th>Number and percent of participants</th>
</tr>
</thead>
<tbody>
<tr>
<td>Participants suggested protocol for observation within the school community</td>
<td>3/13, 23%</td>
</tr>
<tr>
<td>Participants identified intentional mentoring as essential to developing a reflective practice</td>
<td>9/13, 69%</td>
</tr>
<tr>
<td>Clinical Field Experiences encouraged candidate flexibility and adaptability</td>
<td>13/13, 100%</td>
</tr>
</tbody>
</table>

The following is a discussion of Table 4.13 and an analysis of participants suggested teacher education strategies (Table 4.14-4.16). The tables present data supporting three patterns:

- Three participants suggested protocol for the use of observation within the school community (see Table 4.14).
- The majority of participants identified intentional mentoring as essential to developing a reflective practice (see Table 4.15).
- All participants identified clinical field experiences as promoting candidate flexibility and adaptability (see Table 4.16).

**Observation Protocol**

Table 4.14 Analysis of Teacher Education Observation Strategy Patterns that Impacted Participant Views of Knowledge and Learning (n=3)

<table>
<thead>
<tr>
<th>Observation</th>
</tr>
</thead>
<tbody>
<tr>
<td>• Use of observation protocol to observe mentor (TC1)</td>
</tr>
<tr>
<td>• Observation of exceptional educators (TC11)</td>
</tr>
<tr>
<td>• Observation of the school community professional learning communities (TC3)</td>
</tr>
</tbody>
</table>

Few participants suggested observation as a strategy that influenced their views of knowledge and learning. Strategies focused on the observation of mentors and the school community. One candidate (TC1) suggested the use of protocol to enhance observations of cooperating mentor teachers.

I had fantastic teachers but I did not know what made them fantastic… We should be given ‘TCOT’s’ to observe from our first practicum throughout the program. When you observe for the first time you are like, ‘what am I doing?'
What am I watching for?’ I now think how many teachers did I not get the best out of them because I did not observe them correctly. (TC1)

The TCOT (teacher candidate observation tools) was a faculty-developed tool that directed student teacher observations of the classroom structure, organization, and teachers’ pedagogical practice. Candidates were trained in the use of this tool during their final semester as a student teacher.

Another male participant (TC11) suggested increasing opportunities to observe exceptional educators. He recalled the opportunity he was given to observe a previous teacher of the year. “Any opportunity for us to see someone like that Kansas teacher of the year, the guy is a genius. I took away so many things from just one class observation” (TC11). One participant (TC3) suggested incorporating observation of district professional learning communities. She believed this opportunity had increased her professionalism during student teaching and would have benefited her earlier in the program.

**Intentional Mentoring**

Table 4.15 Analysis of Teacher Education Mentoring Strategy Patterns that Impacted Participant Views of Knowledge and Learning (n=9)

<table>
<thead>
<tr>
<th>Intentional Mentoring</th>
</tr>
</thead>
<tbody>
<tr>
<td>• Intentional mentoring aided in developing candidate reflective practice (TC1, 2, 3, 5, 8, 9, 10, 11, 12)</td>
</tr>
<tr>
<td>• Conversations with the cooperating teacher (TC2, 3, 5, 8, 9, 11, 12)</td>
</tr>
<tr>
<td>• Teacher education developed evaluations spurred feedback (TC1, 5, 8, 9, 10, 11, 12)</td>
</tr>
</tbody>
</table>

Nine participants discussed general and specific mentoring practices that influenced or would influence views of knowledge and learning. Six candidates discussed how structured mentor conversations refined professional reflection. “Maybe teacher educator professors could say, ‘here are the strategies, now go and have a discussion and a meeting with your mentor to see how they use those in their classroom’” (TC3). Seven participants recalled the impact of university practicum evaluations. While many emphasized positive and specific feedback as shaping their views of knowledge and learning, one participant (TC11) recalled a specific event where he received constructive criticism.
On my evaluation rubric she wrote she didn’t know if I knew my content. That left me like, oh no, am I not cut out for this. Then after talking to my cooperating teacher and my professor I realized that I was not giving feedback at all and it gave the impression that I wasn’t knowledgeable in my content area. So the next lesson I created follow up questions for student replies to encourage students to dig deeper and into that higher level of Blooms. It was not that I didn’t know the content I just didn’t understand the importance of student feedback and continued questioning. (TC11)

Chapter two discussed Lortie (1975) idea the ‘apprenticeship of observation’ and the resultant misconception that learning is rote and teaching is simple. The participant’s encounter with constructive criticism prompted him to recognize the complexity of preparing for student learning. The participant valued the constructive criticism in retrospect and identified the event as pivotal to his professional growth as a teacher.

**Clinical field experiences**

**Table 4.16 Analysis of Teacher Education Clinical Field Experiences Patterns that Impacted Participant Views of Knowledge and Learning (n=13)**

<table>
<thead>
<tr>
<th>Clinical Field Experiences</th>
</tr>
</thead>
<tbody>
<tr>
<td>• Field experiences encouraged candidate flexibility and adaptability (All)</td>
</tr>
<tr>
<td>• Field experiences provided an opportunity for application of knowledge (All)</td>
</tr>
<tr>
<td>• Diversity of placements increased candidate flexibility and adaptability (TC2, 4, 8, 11)</td>
</tr>
</tbody>
</table>

All participants identified clinical field experiences as having a tremendous impact on professional views of knowledge and learning. “Once I was in a practicum I realized it is one thing to sit in a classroom and talk about it but it is another thing to go into a classroom and do it” (TC11). Participants viewed practicum placements as opportunities to move from theory into practice. The request for more clinical experiences spanned across all interviews and each salient self-category (Hamman et al., 2010).

The need for more practicum experiences was believed to increase confidence in specific content areas (TC5, 11, 13), enhance professionalism (TC3, 4, 5, 6, 7, 9, 11, 12) and improve classroom management skills (TC1, 2, 3, 5, 9, 10, 11). “I think that if you just give more practicums to work with real teachers, that's how you practice classroom management skills. You just have to go and do it” (TC5).
Four candidates (TC2, 4, 8, 11) discussed the teacher education program’s emphasis on practicum placement diversity.

I think a lot of it (personal professional development) came from being thrown into lots of different situations. Teacher education told us how to act professionally and represent ourselves in the best possible way but we never really got to test out how strong of a character we had until we were out there in the mix and teacher education put us in lots of different situation. (TC2)

**Conclusion Views of Knowledge and Learning**

Korthagen et al. (2006) identified three principles believed to enhance candidate’s view of teaching and learning: educators must be flexible and adaptable, hold a reflective process-oriented perspective on the construction of knowledge, and shift their pedagogical practice from a focus on the content to the learner. Participant’s strategies revealed three practices within teacher education that enhanced these principles. First a relatively limited number of participants suggested observation. The majority of participants attributed mentoring to the development of an effective reflective practice and lastly, all participants identified clinical field experiences as having had the most impact on acquired views of knowledge and learning.

**Program Structure and Practices**

The category ‘program structures and practices’ included participant articulated strategies that recognize that learning about teaching is enhanced through candidate research and opportunities to work closely with peers (Korthagen et al., 2006). The following (see Table 4.17) patterns emerged from an analysis of participant identified teacher preparation strategies that identified program structures and practices that provided opportunities for research and peer collaboration.
Table 4.17 Summary of Participant Identified Teacher Education Strategies that Influenced the Sub-code ‘Program Structures and Practices’ (Korthagen et al., 2006) (n=12)

| Program structures and practices: learning about teaching is enhanced through candidate research and opportunities to work closely with peers (Korthagen et al., 2006). | 
|-----------------|-------------------------------------------------|
| Participants suggested strategies for content application and collaboration | 12/13, 92% |
| Participant identified program expectations that promoted research | 6/13, 46% |

The following is a discussion of Table 4.17 and an analysis of participant suggested teacher education strategies (Table 4.18-4.19) for sub code ‘program structures and practices’ (Korthagen et al., 2006). The tables present data supporting two patterns:

- Twelve participants suggested course strategies for application and collaboration (see Table 4.18).
- Six participants identified program expectations the promoted research (see Table 4.19).

**Course Strategies for Application and Collaboration**

Table 4.18 Analysis of Teacher Education Course Strategies that Promoted Application and Collaboration (n=12)

<table>
<thead>
<tr>
<th>Strategy</th>
<th>Participants</th>
</tr>
</thead>
<tbody>
<tr>
<td>Use of case studies (TC1, 3, 4, 6, 7, 9, 11, 12, 13)</td>
<td></td>
</tr>
<tr>
<td>Computer simulations (TC1, 2, 3, 5, 7, 8, 9, 11, 12, 13)</td>
<td></td>
</tr>
<tr>
<td>Practicum debriefing discussions (TC2, 3, 5, 8)</td>
<td></td>
</tr>
</tbody>
</table>

Twelve of the participants suggested content application strategies to promote collaboration: case studies, simulations, and debriefing discussions. All participants emphasized the need to apply learned content, “I think just hearing it well it didn't always soak in” (TC4). Nine candidates suggested case studies as a strategy to promote content application and research. Three secondary participants emphasized the need to develop cases or examples that were relevant to their area and grade level certification a secondary English major recalled, “a conversation among a few of the secondary students that we sometimes felt that courses were geared toward elementary situations” (TC13). When asked to share an example of a case study that would be relevant to those seeking secondary certification, the participant shared the following past experience.

I was teaching a piece of literature that had religious undertones to it and a student acted out saying this is a religious piece. It was a classroom management issue because I had to take care of that issue before the classroom exploded. We should
address things that are a bit more serious and mature, I wasn’t quite ready for.

TC13

Ten participants suggested the use of simulations. A participant planning to teach secondary music recognized funding cuts often applied to supplemental programs and suggested providing music majors with an “opportunity to practice advocating or some kind of exercise where you explore how you would go about advocating (for arts in education)” (TC7). A secondary math major (TC9) suggested a curriculum development simulation that would allow him to work with other math majors to develop units of study.

Eight participants discussed technology-enhanced simulations. “I think it would have been beneficial to have some video scenarios. Doing some brainstorming in groups, watching a scenario and having a discussion about how we would handle it” (TC3). The eight participants also discussed a recently adopted classroom management simulation. The simulation provided a virtual classroom environment where candidates had the opportunity to interact with avatars that exhibit common classroom behaviors.

I feel like the program was a huge boost. If I had not had this opportunity I would have said I needed more classroom management experience but they (program avatars) do a really good job with making it difficult, you see almost every type of student behavior. (TC11)

Four participants suggested the use of peer debriefing discussions to reflect on practicum experiences. “When observing in practicums have a discussion about what you see working for them, do you think it will work for you? Having a big old debriefing conversation and hear other peoples thoughts” (TC2).

Program expectations that promoted research

Table 4.19 Analysis of Teacher Education Program Expectations that Promoted Research (n=6)

<table>
<thead>
<tr>
<th>Requirement</th>
<th>Participants</th>
</tr>
</thead>
<tbody>
<tr>
<td>Required development of an online professional portfolio (TC2, 4, 11, 13)</td>
<td></td>
</tr>
<tr>
<td>Required capstone presentation prior to student teaching (TC4, 8, 11, 12)</td>
<td></td>
</tr>
</tbody>
</table>

Participants articulated two strategies that supported professional research. Four candidates discussed the teacher education program’s required development of a professional online portfolio. Participants reported that the portfolio not only encouraged research but it also prompted them to continually reflect on new knowledge, assisted with
organizing content, and would be a useful tool in the future. Participants also discussed professional presentations. While general course presentations were briefly noted, the majority of participants referred to the pre-student teaching presentation. Teacher candidates were required to develop a twenty-minute presentation that addressed the education department’s five-pillar framework. Presentations were given before a panel of six faculty and educational community members. Candidates were required to score 80% on this capstone assessment for admittance into student teaching.

Presentations were noted to increase participant accountability for acquired knowledge and professionalism. For example participant (TC5) articulated that he was confident in his theoretical knowledge when asked what aided his confidence he stated, “I had to really make sure I knew that for our student teaching presentation”. Another participant shared that the presentation increased her accountability to the educational community it “taught us that we are being watched, we represent not only ourselves, it is also the university, and the school we are going into” (TC4).

Conclusion for Program Structures and Practices

In summary, Korthagen et al. (2006) recognized that learning to teach was enhanced through teacher research and collaboration. Participants suggested five strategies that were perceived to promote research and peer collaboration. Participants identified current practices within the teacher education program: technological simulations, portfolio development, and panel presentations. However, participants also identified current areas of neglect namely practicum debriefing discussions and case studies. Three secondary candidates emphasized the use of case studies and simulations that are relevant to areas of certification.

Quality of organization and staff

The category ‘quality of organization and staff” included two principles that spoke to characteristics of effective professors, faculty, staff, and teacher education programs (Korthagen et al., 2006). The following (see Table 4.21) is an overview of patterns that emerged from an analysis of participant articulated suggestions that addressed the quality of teacher education programs and staff.
Table 4.20 Summary of Participant Identified Teacher Education Strategies that Organized under the Sub-code ‘Quality Organization and Staff’ (Korthagen et al., 2006) (n=13)

| Quality of organization and staff: Characteristics of effective teacher educators, faculty, professors, staff and teacher education programs (Korthagen et al., 2006). | Participants discussed overall program quality and identified issues for resolution in teacher education course structure | 13/13, 100% |
| | Participant identified teacher education strategies regarding interactions with the educational community | 13/13, 100% |
| | Participants identified criteria for faculty quality based on knowledge and practice | 12/13, 92% |

The following is an analysis of sub code ‘quality of organization and staff’ (Korthagen et al., 2006) and a discussion of Table 4.20-4.23. The analysis revealed three patterns:

- All participants discussed overall program quality and identified issues for resolution within teacher education courses structure (see Table 4.21)
- All participants identified teacher education strategies regarding interactions with the educational community (see Table 4.22).
- Twelve of the thirteen participants identified criteria for faculty quality based on knowledge and practice (see Table 4.23).

Overall program quality and resolution suggestions

Table 4.21 Summary of Participant Discussion Regarding Overall Program Quality and Resolution Suggestions (Korthagen et al., 2006) (n=12)

- Positive evaluation of overall program quality (TC2, 3, 5, 6, 8, 10, 11, 12)
- Areas for program improvement:
  - Suggested additional methods courses related to effective instructional strategies at the content level (TC9, 13)
  - Suggested additional courses and information regarding classroom management (TC1, 2, 3, 4, 5, 6, 8, 10).
    - Questioned the structure and placement of the classroom management course (TC1, 2, 3, 4, 5, 6, 8, 10)
    - Suggested embedded classroom management discussions and theory throughout the educational program (TC4, 11, 12, 13)
    - Discussed limitations in regards to classroom management course work on professional practice as compared to experiential learning in the classroom (TC1, 4, 5, 10, 11, 12, 13)

Eight candidates made unprompted positive statements regarding the overall quality of the teacher education program. Two recent program completers shared the following: “I feel like I have come away from the program so much better prepared.
Intelligent, capable of finding the resources” (TC3), “I just feel like I was really, really prepared for instruction with the entire program” (TC8). While over half of the candidates, 62%, shared their satisfaction with the overall program structure, ten candidates identified program issues for resolution.

Identified areas of program improvement emerged most often in discussions regarding future selves related to instructional strategies and classroom management. Participants suggested additional methods courses related to effective instructional strategies at the content level and classroom management. The following statement was made regarding additional methods courses that focused on instructional strategies in specific content areas.

So I had teaching English methods for one semester. I loved it but I felt like it was a crash course in all these different strategies that you can use and for English there are several components teaching writing and analysis of literature so I felt like I got a glimpse of different instructional strategies but I feel like it would be more helpful for content people to have maybe a full year. (TC13)

Eight discussed the structure and placement of the classroom management course. All eight recognized the value of the classroom management content and several debated on whether the course was too early in the program, too brief, or too disconnected from the real world setting.

I'm always torn with the management classroom class. I think it's important to have before you go into your practicum, but I know there's so many students right now in our student-teaching seminar who are really struggling with classroom management, and it would have been nice to have had it recently, and it's more applicable now than like when we're only in classes for 20 hours total, and there's always another teacher in there, they're almost handling classroom management; we are to a certain extent, but now that we're in classrooms alone; it changes everything, and we're there all day. Perhaps we could be focusing on strategies in the other courses other than just the classroom management class. (TC4)

Three other participants made similar suggestions for embedded classroom management discussions and theory throughout the educational program. Three participants (TC2, 5, 8) questioned the effectiveness of the online and condensed summer
classroom management courses. A participant that had completed the condensed summer course shared, “If I had taken a more extensive classroom management class I would have gotten an opportunity to discuss and have a theoretical understanding. I didn't feel like we got enough time” (TC5). During discussions on classroom management, participants recognized the general limitations in regards to classroom management course work on professional practice as compared to experiential learning in the classroom.

Even though the class gave us lots of examples of how to deal with things, sometimes when you are in the situation you forget how to handle it. Once you are in the field you have to sink or swim. I don’t think for classroom management you can be taught, like taught. (TC10)

**Interactions within the educational community**

**Table 4.22 Participant Identified Teacher Education Strategies Regarding Interactions with the Educational Community (n=13)**

<table>
<thead>
<tr>
<th>Clinical field experiences (n=12)</th>
<th>Professional Development (n=8)</th>
</tr>
</thead>
<tbody>
<tr>
<td>• The importance of effective mentors (TC4, 5, 6, 7, 10, 11, 12, 13)</td>
<td>• Opportunities to attend professional events (TC3, 4, 5, 6, 7, 8, 9, 11, 12)</td>
</tr>
<tr>
<td>• The need for additional clinical experiences (TC1, 2, 3, 5, 9, 10, 11)</td>
<td></td>
</tr>
</tbody>
</table>

Opportunities for application of content through interactions within the educational community were discussed by all participants, “Beyond just discussing (classroom management), the best thing is experience; and, that is through practicums” (TC5). Seven participants’ strategies emphasized the importance of effective mentors. Some teachers participate so there is another helper in the class but I did have some cooperating teachers that really talked to me about the reflection process. I would tell them what I planned to teach, I taught, then they would tell me what they saw, what I did well, what I could improve on. Some would take time each section of my lesson plan or record the number of student centered or teacher centered activities I did. I think having good cooperating teachers is important. (TC12)

Eight participants suggested an increase in the number of practicum experiences and hours. This answer emerged the majority of time during discussions regarding the acquisition of hopes and fears related to classroom management and only once in a
reference to future professionalism and instructional strategies. There was a level of uncertainty expressed by all seven participants who made the suggestions. The certification program already required eight practicum experiences for elementary certified candidates and six for secondary certified candidates. Participants were hesitant to suggest an addition, “I almost think that we should, I know everyone would kill me but, we should do a practicum with classroom management” (TC1).

In regards to opportunities for professional development only one participant (TC6) suggested an additional professional development opportunity. “Maybe job shadow or do something where I could learn a little bit more about that (administration and counseling)” (TC6). Eight participants recognized and appreciated the programs many professional opportunities. The program provided “opportunities through the courses, clubs such as PTCO and Gamma Chi” (TC12) and “we always get emails of this scientist in town or $5.00 to a attend this conference” (TC4). However six participants (TC3, 4, 6, 7, 11, 12) recognized limited personal and or peer motivation to engage in additional professional opportunities, “I think students are aware right now, but for them it seems like another thing they have to do, another requirement” (TC7).

To counter apathy participants (TC3, 7, 12) suggested required event attendance or a faculty emphasis on the importance of professional development (TC4, 6, 7, 11). A participant in his final sequence course prior to student teaching said, “I know they let us know about those things but I guess stressing the importance to students. I never took those seriously until like now” (TC11).

Table 4.23 Participant Identified Criteria for Faculty Quality Based on Knowledge and Practice.

<table>
<thead>
<tr>
<th>Faculty Practice (n=11)</th>
<th>Faculty Knowledge (n=10)</th>
</tr>
</thead>
<tbody>
<tr>
<td>- Faculty Modeling of effective instructional strategies (TC1, 3, 4, 5, 7, 8, 9, 10, 11, 12, 13)</td>
<td>- Teacher educator personal knowledge of the school culture (TC3, 4, 6, 7, 8, 9, 10, 11)</td>
</tr>
<tr>
<td>- Faculty modeling pedagogical metacognitive processes/decision making (TC1, 3, 4, 5, 9, 11)</td>
<td>- Teacher education faculty knowledge of strategy application across all subject areas. (TC3, 7, 13)</td>
</tr>
<tr>
<td></td>
<td>- Limited knowledge of content faculty outside the education program in regards to effective instructional strategies in content areas (TC3, 5, 7, 9, 13)</td>
</tr>
</tbody>
</table>
Faculty practice

All but one participant (TC2) identified strategies related to university faculty quality. Patterns addressed either quality of faculty practice or knowledge. Eleven participants discussed faculty modeling of effective instructional strategies.

In all of my education courses here I have seen great instructional practices. Our professors are always trying to implement something different and you notice those things as a student of education and I always think that would be good for my classroom. (TC13)

Participants however, indicated a limited understanding as to the purpose of faculty members’ practices. “I don't remember them (professors) ever really talking about here's my philosophy and this is why I teach, this is why I am teaching or approaching this class the way I am” (TC5). Six participants recognized that faculty often did not share insight into personal philosophies that shaped pedagogical choices and suggested teacher educator revelation of the metacognitive processes that drove instructional decision-making.

Maybe just explaining … explaining it more, instead of just always being a good example to us tell us the reasoning. “Okay, I started this way, and then we did this activity, and then I moved you to this, and do you see how that was a good example of this, and I implemented this strategy”, just more explaining it. I feel like our teachers were always good examples, but unless you were really focusing and researching or asking them one-on-one about it, you wouldn’t know why they made the choices. (TC4)

Faculty knowledge

Participant strategies identified three areas of knowledge that were indicative of quality university faculty. First, eight participants suggested teacher educators include advice and real-world examples gleaned from prior classroom teaching, “Maybe have some examples that the professors could say, ‘this is what I have done’” (TC3). A novice teacher reflected on the complexity of her role as a classroom teacher and suggested professors “give more specific examples” (TC8).

Right now, I have two ED, one major resource who should be in ED, emotionally disturbed, and the Rigby 1 with a QRI 7. I have a little girl whose mother just
passed away a week before I started teaching. What did you do when you had a little girl standing at your desk because she wants her mom and then you had another kid calling names to the Para, you know? Then you have kids who are sitting there playing in their desk because they’re bored because you’re not providing high enough instruction to them. (TC8)

Second, three participants suggested teacher educators understand application of effective instructional strategies across a variety of content areas. All three participants expressed difficulty with independent application of modeled strategies or educational course content to their specific areas of certification. A recent graduate certified in speech and theatre stated,

I think that the education program did a great job of demonstrating a variety of instructional strategies. Some of them I struggled with how would this work in my classroom with my content area and how can I specialize it. That is where I stumbled. (TC3)

A secondary English student teacher disclosed that secondary candidates often discussed how course work “felt geared toward elementary” (TC13). While all three participants wanted examples of how strategies could be used across all areas of certification, two participants recognized that some of the responsibility fell also to their content level professors.

Maybe, we need more interaction on the content level with the professors saying, and not only with the teacher ed professors but perhaps with fine arts, this is how I would use this strategy. I am always looking for the take-away, the strategies. How do I apply it immediately with my content? (TC3)

The final suggestion related again to faculty outside the teacher education program. Five participants perceived that content faculty held a limited knowledge of effective instructional strategies for their specific content areas. A secondary history major shared, “We have a lot of lecture-based and some discussion. That works for us as college students because we will sit through a lecture. I don’t think this would work in younger settings” (TC5). A secondary English student teacher shared,

In my English courses we did the same exact thing… It was the same everyday, a couple papers here and there but I never received any insight into how to teach…
know not everyone in the English classroom is majoring in education so maybe it would be difficult but perhaps every week study a different way that you can analyze literature. That is not only for ed. majors but also for the kids in there because the strategies that we teach in high school could also apply. (TC13)

To ameliorate this apparent disconnect between content and professional practice, participants suggested increased communication between teacher education and content departments. Participants believed open communication would allow content areas the opportunity to understand the goals of teacher education and promote collaboration between the two departments.

**Conclusion for Quality of Organization and Staff**

Participants suggested twice as many teacher education strategies for quality of organization and staff as compared to Korthagen’s (2006) other two categories (see Appendix N & Appendix O). While participants reported an overall satisfaction with the preparation program, areas for improvement were identified. Suggestions arose predominately in discussions surrounding classroom management and instructional strategies. Participants proposed embedded instruction in classroom management strategies throughout the program, increased opportunities for clinical practice, and teacher educator modeling of instructional decision-making. Secondary and K-12 content certified participants emphasized the need for additional methodology courses, suggested differentiated activities to increase relevancy throughout the program, and noted a disconnect between content courses and effective instructional strategies. All participants cited criteria that gave credibility to teacher educator professional practice. Criteria included modeling of effective instructional strategies and a personal knowledge of the school culture.

**Emergent Patterns not Derived from Applied Theoretical Frameworks**

Two AERA (2005) panel suggestions for research in teacher education were employed in this study to enhance the quality and credibility of the study. First, this dissertation framed “research in relation to relevant theoretical frameworks” and second, research extended upon previous findings (Cochran-Smith & Zeichner, 2005, p. 741). Though three theoretical frameworks tightly grounded the instrumental design of this
dissertation, each research question yielded one emergent code with subsequent patterns (to account for data that could not be coded or categorized by the theory or the existing research). Those emergent codes are related to ‘limited time’ (relating to research question one) and ‘affective traits’ (relating to research question two).

**Research Question One Emergent Code: Limited Time**

All but two candidates (TC4, 10) discussed hopes and fears related to time limitations. While hopes and fears related to time limitations seemed to be an underlying factor for each of Hamman’s (2010) salient categories, this self was especially prevalent during all of the eleven later interviews conducted. Initial interviews were conducted within five to seven weeks of the semester’s start, when candidates were immersed in practicums, student teaching or their first semester of as a novice teacher. Final interviews were conducted during the summer months, a time of transition for each of the participants. Table 4.24 provides an overview of participant hopes and fears related to ‘limited time’.

**Table 4.24 Candidate Fears and Hopes Regarding Limited Time (n=12)**

| Limited time for personal professional development (TC7, 11, 13) |
| Limited time for resource and curriculum evaluation. (TC6, 8, 12) |
| Limited time to plan lessons (TC4, 5) |
| Limited time to meet the needs of each student (TC3, 8, 9) |
| Limited time in teacher preparation (TC2, 6) |
| Limited time to cover required standards. (TC1, 3) |

While few participants articulated strategies to overcome and achieve selves related to limited time, occurrences found in Table 4.24 were analyzed in context using Ibarra’s (1999) sub-codes (observation, experimentation and reflection). The following analysis provided insight into factors that contributed to the acquisition of this additional possible self-category (see Table 4.25).
Table 4.25 Overview of Participant Comments Regarding the Emergent Category, Limited Time, Coded using Ibarra (1999) (n=12)

<table>
<thead>
<tr>
<th>Definition (Ibarra, 1999)</th>
<th>Observation</th>
<th>Experimentation</th>
<th>Reflection</th>
</tr>
</thead>
<tbody>
<tr>
<td>Noticing of role models and significant others that have influenced professional thought or practice.</td>
<td>Personalization and authentication activities or experiences.</td>
<td>Personal evaluation, and adjustment of self</td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Number of participants who identified strategies</th>
<th>Observation</th>
<th>Experimentation</th>
<th>Reflection</th>
</tr>
</thead>
<tbody>
<tr>
<td>4/13, 31% (TC7, 9, 11, 13)</td>
<td>7/13, 54% (TC1, 2, 3, 5, 6, 8, 12)</td>
<td>2/13, 15% (TC3, 11)</td>
<td></td>
</tr>
</tbody>
</table>

**Observation**

Four participants discussed influential observations that prompted fears related to time limitations within the classroom. A male participant shared, “I watch my sister who is a teacher. I see how bombarded she can get with everything” (TC11). Another participant observed a lack of teacher professionalism in one of her practicum placements. She attributed this to “stress due to lack of time during the school year, sometimes your professionalism begins to slip” (TC13). A male secondary math participant (TC9) had observed language barriers in math instruction and recognized the increased time commitment of teachers in meeting the needs of linguistically diverse students. While a participant certified in music education (TC7) had observed music educators placed in areas outside their specialization and feared the additional time required to prepare for the year.

**Experimentation**

Seven participants had experienced fears and anxiety related to having “too much on my plate and that would add to my fear of lack of time” (TC8). Participants shared experiences related to time constraints in regards to lesson planning (TC5, 6, 8, 12), challenges related to covering all of the standards (TC3), setting up the classroom structure (TC1, 2, 6) and meeting the needs of all students (TC2, 8). A novice teacher shared, “sometimes I feel almost guilty at the end of the day, because I'm like well I read with this kid and I was really proud of them, but the rest of the kids…” (TC8).

**Reflection**
Two participants (TC3, 11) reflected on attributes that assisted with hopes and fears related to time limitations. In response to a inquiry regarding fears the participant responded, “time or limited time...perhaps learn how to best manage my time to work on each of the categories, time to make relationships, time for professional development…” (TC3). One participant discussed the need for balance and reflected on the idea of sacrifice, “I hope I can balance my time well and discover the time and sacrifice of a future educator” (TC11).

**Research Question Two Emergent Code: Affective Traits of Teacher Educators**

While Korthagen et al. (2006) recognized the role teacher educators played in the professional identity development of teacher candidates the study only addressed effective qualities such as modeling instructional strategies and providing opportunities for research and collaboration within courses. Participants’ responses yielded an additional teacher educator quality, affective traits (see Table 4.26). All but one participant, (TC1) discussed affective qualities of teacher educators and the impact upon his/her student centered views towards knowledge and learning, perceptions on collegiality within the programs structure and practices, and affective traits as an indicator of quality staff.

**Table 4.26 Participant Identified Teacher Educator Affective Traits Emerging (n=12)**

<table>
<thead>
<tr>
<th>Korthagen et al. (2006)</th>
<th>Emerging Traits</th>
<th>Number of participants who identified strategies</th>
</tr>
</thead>
<tbody>
<tr>
<td>Views of knowledge and learning</td>
<td>Teacher educators modeled the affective trait of student centered instruction which impacted participant views of knowledge and learning (TC2, 3, 5, 6, 7, 9, 10, 11, 13)</td>
<td>9/13, 69%</td>
</tr>
<tr>
<td>Program structures and practices</td>
<td>Teacher educators modeled the affective trait of collegiality and collaboration an important component of program structures and practices. (TC2, 3, 4, 5, 6, 7, 8, 9, 10, 11, 12, 13)</td>
<td>12/13, 92%</td>
</tr>
<tr>
<td>Quality of program and staff</td>
<td>Participants identified affective traits as essential characteristics of quality staff. (TC2, 3, 4, 5, 6, 7, 8, 9, 10, 11, 12, 13)</td>
<td>12/13, 92%</td>
</tr>
</tbody>
</table>
Views of Knowledge and Learning

Nine participants discussed how teacher educators influenced personal views of knowledge and learning. Teacher educators were said to promote student-centered beliefs, “In the program we are encouraged to really look at each student as somebody that has value” (TC13), student-centered rapport building strategies “We learned about what it really means to connect with your students from day one” (TC9), and establish student-centered expectations, “I was prepared not to just teach the whole group…but they expected us to know how to differentiate to teach all students” (TC8). Teacher educator relationships with participants, was also viewed as a model for student-centered teaching and established the need for collegial collaboration in order to support future students.

I know I could go to any of them (teacher educators) even if it wasn’t their content and say hey I am really struggling with this and they would jump at the opportunity and do anything they could to help. I think translating that to the elementary building is important because there might be a student in an upper grade that had a good relationship with a teacher in another grade. (TC2)

Program Structures and Practices

Korthagen et al. (2006) identified peer collaboration as an important component of teacher education program structures and practices (Korthagen et al., 2006). Relationships between teacher educator and teacher candidate not only promoted student centered views of knowledge and learning but also influenced participant perceptions of collegial collaboration, “I think the strong relationships built with us, was a good model for how we should approach creating professional relationships with other professionals” (TC2). Twelve participants discussed how interactions with teacher educators and observed interactions between teacher educators influenced the perception that collegial collaboration was both important and vital to professional development.

Quality Organization and Staff

Twelve participants identified affective traits as essential characteristics of quality teacher educators. Teacher educators were noted as caring (TC2, 3, 4, 6), mentors (2, 5, 8, 9, 11), approachable (TC5), life-long learners (10, 12, 13), “All the professors were
doing research and telling us about it and modeling for us the need to keep up on current research” (TC12), and passionate.

I think a lot of our professors are very passionate about what they do, and so that's what spilled over for me. So, taking advantage of talking with them about how they stay so passionate all the time and how they get through; and looking at them more as mentors and as fellow teachers as well. (TC7)

**Disaggregated Strategy Patterns**

Using the transcripts, as well as the database created by the researcher, data in the tables in Appendices L and M were disaggregated by participant level of certification. While the appendices indicated program placement, subject and grade level certification, no attempt was made to disaggregate based on criteria other than certification level due to the limited representation in categories. The following discussion is focused solely on a comparison of those participants seeking elementary and secondary state certification. All secondary candidates within the teacher education program participate in the three core sequence courses alongside their peers seeking elementary certification. This factor may differ within larger teacher preparation programs and could have influenced the identified discrepant patterns.

Patterns were disaggregated under research question one, research question two, and the emergent patterns. Each pattern was examined individually, and a percentage was calculated based on the number of participants that discussed the pattern divided by the total number of participants within each category of certification, elementary and secondary. A simple majority (a difference of 50% or greater between elementary and secondary participant responses) was believed to signify a credible and relevant pattern.

**Disaggregation of Research Question One**

The researcher then conducted an analysis of all patterns and disaggregated data by certification level (see Appendix L). Table 4.27 revealed four differences in the strategy development process for elementary and secondary participants.
Table 4.27 Patterns of Participant Articulated Strategies for Achievement of Hopes and Avoidance of Fears Disaggregated by Certification Level (n=11)

<table>
<thead>
<tr>
<th>Elementary participants’ experimentation strategies for selves related to future instructional strategy relied on trial and error:</th>
<th>Elementary N=5</th>
<th>Secondary N=6</th>
</tr>
</thead>
<tbody>
<tr>
<td>Experimentation strategies for selves related to future instructional strategy relied on trial and error</td>
<td>80%</td>
<td>17%</td>
</tr>
<tr>
<td>Experimentation strategies for future classroom management selves relied upon garnering support from colleagues</td>
<td>80%</td>
<td>17%</td>
</tr>
<tr>
<td>Reflected on the importance of content knowledge in area of certification for selves related to future professionalism.</td>
<td>0%</td>
<td>50%</td>
</tr>
<tr>
<td>Reflected on how isolation within the school setting hindered selves related to interpersonal relationships.</td>
<td>0%</td>
<td>50%</td>
</tr>
</tbody>
</table>

**Elementary participants’ experimentation strategies for selves related to future instructional strategy relied on trial and error:** The majority of elementary participant’s strategies (TC 1, 2, 6, 12) for the achievement of selves related to instructional strategies relied upon trial and error. “I think you just need to try, sometimes even if you fail, it’s good to try things and experience it” (TC6). “Just sometimes you have to do trial and error but once you get routines and everything in place I feel it will go smoothly” (TC6). Only one secondary candidate discussed trying new strategies in response to the attainment of instructional selves but did not identify error as necessary for professional growth, “So definitely trying new approaches even when I feel comfortable with what I am doing or especially when I feel really comfortable with what I am doing” (TC3)

**Elementary participants’ experimentation strategies for future classroom management selves relied upon garnering support from others:** Four elementary participants (TC2, 6, 8, 12) and only one secondary participant (TC11) discussed the need to garner support from others for the achievement of selves related to future classroom management. Elementary participants relied heavily upon collegial support in the form of advice (TC2, 6, 8, 12). One secondary certified participant (TC11) planned to garner external support however he identified parents within the community and the school’s administration not colleagues.

**Secondary participants reflected on the importance of content knowledge in areas of certification for selves related to future professionalism:** Half of the secondary participants (TC 5, 11, 13) reflected on the importance of content knowledge
in regards to the achievement of selves related to future professionalism. A secondary social studies pre-student teacher emphasized the importance of content research, “If I try to stay stationary and be fine where I am at it will catch up to me. So if I keep pushing forward I don’t think I will have a problem” (TC11). An emphasis on content knowledge was also made during discussions related to instructional strategies (TC5, 11) and classroom management, “I am hoping to be so well-organized, have really good content and engaging lessons, that students are interested, that I hope behavioral issues aren't going to be a problem” (TC5). No elementary participant strategies emphasized the need to increase content knowledge.

Secondary participants reflected on how isolation within the school setting hindered selves related to interpersonal relationships: Half of the secondary participants (TC3, 9, 13) reported either observed or experienced isolation while working within the secondary setting, while no elementary participants shared such experiences. Secondary participants recognized how such a school culture hindered self-strategies related to establishing interpersonal relationships. An English education major student teaching in a high school shared,

I think getting out and interacting is important, for instance right now in my student teaching experience, I am in this cement room all day long without any interaction. My teacher is ‘kind a’ the same way. I eat lunch in there by myself too and he is the same way. He has been doing this for a while. So I will make an effort to go out and communicate with other teachers and not just in the English department but also in all departments. (TC13)

A secondary math major in his final semester prior to student teaching recognized that, “It might be hard throughout the day to find time to do that” (TC9) and a secondary drama teacher shared, “So many times that bell rings and you are behind a closed door with your students and you don’t have an opportunity to interact” (TC3).

Disaggregation of Research Question Two

When looking at participant strategies regarding Korthagen’s et al. (2006) framework for teacher education disaggregated by elementary and secondary certification only two patterns had a discrepancy of 50% or greater when disaggregated by certification level. Table 4.28 depicted discrepant patterns.
Table 4.28 Patterns of Participant Articulated Strategies for Teacher Education Disaggregated by Certification Level (n=8)

<table>
<thead>
<tr>
<th></th>
<th>Elementary N=5</th>
<th>Secondary N=6</th>
</tr>
</thead>
<tbody>
<tr>
<td>Faculty modeling pedagogical metacognitive processes/decision making (TC1, 3, 4, 5, 9, 11)</td>
<td>1, 20%</td>
<td>5, 83%</td>
</tr>
<tr>
<td>Limited knowledge of content faculty outside the education program in regards to effective instructional strategies in content areas (TC3, 5, 7, 9, 13) E1</td>
<td>0%</td>
<td>4, 67%</td>
</tr>
</tbody>
</table>

**Faculty modeling pedagogical metacognitive processes/decision making:** Five out of six secondary participants (TC3, 4, 5, 9, 11) and only one elementary candidate (TC1) suggested faculty modeling of pedagogical metacognitive decision-making. The elementary participant shared

> So if each teacher in teacher education would include more information about the strategy they follow, because I think each teacher had a different thing that they modeled, like cooperative learning. I think that each professor picked a guru to follow so I feel like if each one could make available the resources they used.

(TC1)

While the elementary participant discussed the need to understand, ‘who’ or the theory that drove teacher educator practice, the secondary participants sought to understand the ‘why’ behind instructional decision-making. “I don't remember them (professors) ever really talking about here's my philosophy and this is why I teach, this is why I am teaching” (TC5).

> I feel like our teachers were always good examples, but unless you were really focusing and researching or asking them one-on-one about it, you wouldn’t know why they made the choices. (TC4)

**Limited knowledge of content faculty outside the education program in regards to effective instructional strategies in content areas:** Four out of the six secondary participants (TC3, 5, 9, 13) perceived a limitation in content faculty knowledge of effective instructional strategies while no elementary participants identified this as an area for preparation program improvement. A secondary history major shared, “We have a lot of lecture-based and some discussion. That works for us as college students because we will sit through a lecture. I don’t think this would work in younger settings” (TC5).
Emergent Codes Disaggregated

Emergent codes were for research question one and two were disaggregated by participant level of certification (see Table 4.29).

Emergent Codes Disaggregated: Research Question 1

Table 4.29 Emergent Codes for Research Question One Disaggregated by Certification Level (n=11)

<table>
<thead>
<tr>
<th>Observed: The impact of limited time on educators (TC9, 11, 13)</th>
<th>Elementary N=5</th>
<th>Secondary N=6</th>
</tr>
</thead>
<tbody>
<tr>
<td>0%</td>
<td>3, 50%</td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Experimentation: Had experienced the impact of limited time within the educational setting (TC1, 2, 3, 5, 6, 8, 12)</th>
<th>Elementary N=5</th>
<th>Secondary N=6</th>
</tr>
</thead>
<tbody>
<tr>
<td>5, 100%</td>
<td>2, 33%</td>
<td></td>
</tr>
</tbody>
</table>

Secondary participants observed the impact of limited time on educators:

Half of the secondary certified participants (TC 9, 11, 13) had observed the impact of limited time on the professional practice of in-service teachers. Observations emerged from observations of family members in the teaching profession (TC11), from negative practicum experiences (TC13), and the observed challenge of meeting the needs of linguistically diverse students (TC9).

Elementary participants experienced the impact of limited time within the educational setting: Five elementary participants (TC1, 2, 6, 8, 12) and two secondary participants (TC3, 5) reported experiencing fears and anxiety related time limitations. Time commitments and constraints related to lesson planning and classroom organization were noted by the majority of elementary participants (TC1, 2, 6, 8, 12) and by one secondary participant (TC5). The other secondary participant experience was related to the challenge of covering all standards (TC3) and two elementary participants (TC2, 8) experienced time constraints related to meeting the needs of all students.

Emergent Codes Disaggregated: Research Question 2

Emergent codes from research question two were analyzed for significant difference between secondary and elementary certified candidates. After calculating the percentage of participants responses, there were no significant differences that met the established simple majority criteria of 50% or greater (see Appendix M).
Themes Across Patterns

Within qualitative research, data are analyzed to uncover the larger meaning and this process seeks to establish themes (Creswell, 2014). After reviewing transcripts and recordings gathered from twenty-four interviews of thirteen teacher candidates, fifty-five strategy patterns were identified for research question one and over 30 patterns for research question two. Tables in Appendix L and M were developed to identify dominant patterns held by the majority of participants. Data synthesis yielded six themes that provided insight into the utility of the theory of possible selves and influences that shape professional identity development of possible selves (see Table 4.30).

Table 4.30 Themes: Influences Shaping Professional Identity Development of Teacher Selves

<table>
<thead>
<tr>
<th>The Theory of Possible Selves Method to promote self or me-reflection and strategy or means-development.</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Me-Reflection</strong></td>
</tr>
<tr>
<td>Future thinking prompted emergence of past memories and revealed insight into motivation.</td>
</tr>
<tr>
<td>1. <strong>Memories</strong>: Future thinking provided opportunity for past reflection.</td>
</tr>
<tr>
<td>2. <strong>Motivation</strong>: Participant hopes, fears and strategies were motivated by a desire to ensure achievement of future students.</td>
</tr>
<tr>
<td><strong>Means-Development</strong></td>
</tr>
<tr>
<td>Future thinking prompted the generation of a means by which to achieve or avoid selves.</td>
</tr>
<tr>
<td>3. <strong>Membership</strong>: Future self-strategies are dependent on membership within educational communities.</td>
</tr>
<tr>
<td>4. <strong>Modeling</strong>: Teacher educator modeling influenced the development of possible selves.</td>
</tr>
<tr>
<td>5. <strong>Mirroring</strong>: Observation played a minor role in future self-development.</td>
</tr>
<tr>
<td>6. <strong>Mentoring</strong>: Intentional clinical mentoring experiences impacted self-strategies.</td>
</tr>
</tbody>
</table>

The theory of possible selves as proposed by Marcus and Nurius (1986) posited that knowledge gained from the analysis of possible selves provided “an interpretive framework for making sense of past behavior, it also provides a means-ends pattern for new behavior” (p. 955). Findings from this dissertation support these two claims. Though prompted to address future selves, self-reflections on the past and the present were laced throughout participant statements. Exclamations such as “that’s just me”
(TC1) were common across all participant interviews. Participants also identified a variety of ‘means’ or strategies by which future selves would be achieved or avoided. While over eighty patterns were generated throughout the entire study there were six overarching themes that provided insight into the ‘me’-reflection (two themes) and ‘means’-development (four themes) all participants engaged in throughout the interview process.

This interview helped me identify what has been weighing on my mind. I know what my fears are now, my ‘Achilles heel’ and now I can now prepare for what would have been unforeseen. (TC3)

The following is a discussion of table 4.30 and is organized under the six themes.

- **Memories**: Future thinking provided opportunity for past reflection.
- **Motivation**: Participant hopes, fears and strategies were motivated by a desire to ensure achievement of future students.
- **Membership**: Future self-strategies are dependent on membership within educational communities.
- **Modeling**: Teacher educator modeling influenced the development of possible selves.
- **Mirroring**: Observation played a minor role in future self-development.
- **Mentoring**: Intentional clinical mentoring experiences impacted self-strategies.

**Theme One Memories: Future Thinking Provided Opportunity for Past Reflection**

Markus and Nurius (1986) recognized that possible selves are influenced by past experiences and provided a link between the present and the future. Participant past experiences emerged throughout the interview process and across both research questions. Interviews revealed influential interactions with past mentors (TC1, 2, 5, 6, 7, 11, 13), peers (TC2, 5, 7, 8, 12, 13), students (TC1, 3, 4, 8, 9, 10), teachers (TC3, 4, 6, 11, 12), teacher educators (TC1, 2, 4, 5, 6, 7, 10, 11, 12, 13), and family members (TC2, 11).
Theme Two Motivation: Participant Hopes, Fears and Strategies were Motivated by a Desire to Ensure Achievement of Future Students

Markus and Nurius (1986) argued that possible selves represent possible “motives by giving specific cognitive form to the end states, to the associated plans or pathways for achieving them, and to the values and affect associated with them” (p. 961). All participants shared one common motive across all patterns for research question one, 69% of participants emphasized the same motive in response to research question two, and every participant articulated more than one strategy that was motivated by future student achievement. Student-centered dispositions spanned across all participants despite grade-level, subject certification, or placement within the teacher education program. Participants reported that student achievement was motivated strategies that emphasized collegial interactions (TC6, 8, 12, 13), differentiated lessons (TC2, 3, 7, 8, 9, 11), reflection (TC1, 2, 3, 4, 5, 6, 7, 9, 10, 11), and future professional development (TC1, 3, 4, 5, 8, 10, 13). The majority of participants (TC4, 5, 6, 7, 9, 10, 11, 12) also identified building rapport with students as central to the achievement of future selves related to classroom management.

All participants shared recent accounts of personal student interactions though unprompted to do so. Markus and Nurius (1986) recognized that possible selves are influenced by past experiences and provide a link between the present and the future. For example, one participant while sharing the need to shape her future professional development to meet the needs of her students discussed the following student teaching experience.

One of the girls said that from that first day when you cared enough about our stories she said, “You had me. I was completely convinced that you were not just someone sitting in this classroom trying to get a grade.” I am not just a teacher sitting in the classroom trying to get a paycheck. I care about these students and I show that I care. (TC3)
**Theme Three Membership: Future Self-strategies are Dependent on Membership within Educational Communities**

Participant strategies often relied upon future collegial interactions or the idea of membership within educational settings. The majority of participant strategic plans, 92% relied on the idea of membership for the achievement of selves across all categories (Hamman et al., 2010). Participant strategies revealed four perceptions related to membership within a school community.

Eleven participants (TC1, 3, 4, 5, 6, 7, 8, 9, 11, 12, 13) planned to utilize collegial support to meet personal professional goals and nine participants (TC2, 4, 6, 7, 8, 9, 11, 12, 13), planned to garner collegial support to ensure student success both behaviorally and academically. Participants not only expected to receive collegial support, but they also planned to reciprocate by supporting colleagues in their professional pursuits (TC6, 7, 8, 9, 12, 13). As one participant discussed her hopes related to future professionalism she reflected upon the following student teaching experience.

We broke off into our PLC groups and I taught the other teachers how to build a Google form to create a student self-evaluation plan that they could implement within their classrooms. At the end of the day I just went, what was that that just happened. I was like I can do this. I can make a contribution. Even as a student teacher, I felt like I could make a contribution in any professional environment and I hope to continue to. (TC3)

Participants recognized the value of collegial connections in the attainment of future selves and articulated strategies meant to facilitate membership within future educational communities. Membership strategies were developed across all categories, interpersonal relationships, instructional strategies, classroom management and professionalism. Proposed future collegial collaboration was intended to support hopes and fears both personally and to support others in the educational community, namely students and teachers.
**Theme Four Modeling: Teacher Educator Modeling Influenced the Development of Possible Selves**

Twelve of the thirteen participants identified specific interactions with teacher educators as having a positive impact upon their attainment of selves. Participants identified several criteria for teacher educator quality, however the majority emphasized the practice of modeling. Effective modeling of instructional strategies was a commonly recognized indicator of teacher educator quality (Korthagen et al., 2006), however participants also emphasized teacher educator modeling of affective traits.

Twelve participants focused on effective traits related to teacher educator’s knowledge and skills. Eight participants valued teacher educator personal knowledge of the school culture and climate and suggested further incorporation of teacher educator’s advice and examples derived from his or her first-order practice (Murray & Male, 2005). Eleven participants noted the current use of effective instructional strategies and six candidates suggested faculty model pedagogical metacognitive processes. This suggestion, though not held by the majority of participants, was promoted by 83% of the secondary candidates. This is of particular interest as 67% of secondary candidates reported an often-obfuscated connection between content and methods courses. Teacher educators incorporating dialogue as to instructional decision-making could ameliorate this participant identified preparation problem.

An additional component of modeling that emerged during research was teacher educator modeling of affective traits. Teacher educator affective traits influenced participant’s professionalism in three ways. First, 62% of the participants identified the student-centered orientation of teacher educators and recognized the contribution of such modeling upon their views of knowledge and learning. The most commonly cited teacher educator action that participant’s attributed to the acquisition of their own student-centered philosophy, was the personal support received from program faculty.

The second influence modeling of affective traits had on participants regarded perceptions of collegiality. Almost all participants, 92% reported observing faculty collaborative efforts. Cited collaborative efforts included cross-faculty projects, faculty participation in professional organizations, and the overall perception of collegial support within the university culture. Lastly, modeled affective traits such as caring, adaptable,
and passionate were identified as essential characteristics of quality teacher educators by 92% of participants.

**Theme Five Mirroring: Observation Played a Minor Role in Future Self-Development**

Ibarra’s iterative process (1999) recognized that an initial step to self-achievement involved observation of influential others. However, across all analysis for each research question the idea of mirroring observed behavior was limited. Only 13% of participants suggested this strategy across all patterns for research question one and 15% for research question two. Moreover, while observation was mentioned it was seldom suggested in isolation or solely for personal self-achievement.

Observation strategies were often articulated as precursors to experimentation and reflection strategies. For example, a female novice teacher while discussing her hopes related to instructional strategies combined observation with action, “Getting in and watching other teachers teach, teachers that have taught for 15-20 years or even other new teachers. I learn by watching and doing”. A male secondary social studies teacher in his final semester initially stated, “I am finding that just seeing what actual teachers are doing, that's been the most helpful”. However, later the participant extended his answer to include direct interaction and reflection with influential others.

I guess talking to other teachers is really helpful to see what they're doing. Cause you'll see some teachers, oh they are doing this, great. They have this great project that they are going to do, and I think that kind of inspires you. (TC2)

A recent elementary education graduate reflected on a past observation experience that relieved her fears and refined her skills in regards to classroom management,

I had the best mentor ever in student teaching. This was just something that she was good at. By watching her do those things. She really taught me how to have conversations with the kids instead of always just talking at the kids. (TC2)

When discussing selves related to future professionalism, a recent elementary education graduate hoped to “continue to grow…because education is always about growing…you never truly have it all” (TC2). She proposed observation as an initial strategy to achieve this hope, “let me see what you are doing, let’s go to other grade
levels lets go see where my kids are going next, so I can really prepare them” (TC2).

However, her observation strategy was not solely personal but instead was suggested as a strategy to gain vertical insight into her school’s curriculum and standards to better serve future students.

While observation strategies for research question two were again minimal, all participant strategies emphasized an established intentionality when incorporating clinical observations. For example participants suggested choosing intentional settings like professional learning communities (TC3), intentional purposes like the investigation of district technology (TC6), and intentional selection of master-teacher models (TC11). One participant also suggested the incorporation of intentional observation protocol (TC1).

In student teaching participants were required to complete a teacher candidate observation tool (TCOT). The tool listed attributes of effective instruction and prompted participants to record specific teacher actions and student reactions.

We should be given TCOTs to observe from that first practicum throughout the program. Because when you go in to observe the first time you are like, “What am I doing? What am I watching for?” I now think how many teachers did I not get the best out of them because I did not observe them correctly… I had fantastic teachers but I did not know what made them fantastic. Teach us how to use them at the prep meeting. It should be a grade in every practicum to fill out a TCOT. (TC1)

**Theme Six Mentoring: Intentional Clinical Mentoring Experiences Impacted Self-Strategies.**

All participants cited clinical field experiences as opportunities for application of preparation course concepts. However, it should again be noted that participant strategies did not identify passive observation within clinical settings as valuable to self-attainment. Instead participant’s strategies denoted the need for intentional interactions with effective clinical mentors.

Over half of the participants indicated the need for professional conversations with classroom teachers during teacher preparation. Participants, 69%, attributed the
development of an effective reflective practice to prior mentoring relationships with classroom teachers. Participants identified program practices that facilitated effective clinical mentoring. Practices included mentor completed participant evaluations. Participants connected evaluations to the assurance of critical conversations and feedback from clinical mentors. Participants also identified a program practicum policy that emphasized diversity of placements. Participants connected interactions with a variety of mentors and to the alleviation of fears related to future interpersonal relationships and professionalism.

I think just the seven practicums in general, all the people that you meet and all the professionals that you meet. And having to go and be prepared and meet with seven cooperating teachers and then your student teaching cooperating teacher and junior achievement… (TC8)

Throughout the interview process over half of the participants (TC1, 4, 5, 7, 8, 9, 12), attributed their ability to develop strategies to the influence of “more experienced others” (TC9), namely clinical mentors. For example a secondary candidate attributed his classroom management strategy, which emphasized ensuring effective lesson plans, to previous interactions with clinical mentors. “I found through talking with teachers that that's the case, when you have well-prepared lessons students are more well behaved” (TC5). So while observation of clinical mentors was not emphasized, all participants’ valued intentional interactions with mentors in clinical settings.

**Summary**

Chapter four described the patterns related to two research questions. The first research question required the analysis of the strategy development process for self-achievement, while the second analyzed participant strategy suggestions for teacher education. The chapter included a discussion of theoretically driven patterns across all participants, emergent patterns across all participants that were not apparent in the theoretically driven analysis, as well as patterns (from both theoretically driven and emergent categories) when data were disaggregated by elementary or secondary certification. It concluded with six themes that emerged from the data analysis. Chapter five will summarize the study, explain the findings, discuss the significance of the study,
review the implications for professional practice and provide recommendations for future research.
Chapter 5-Discussion

A cross-section of thirteen teacher candidates and recent graduates from a private Midwest university participated in two interviews. A duration of approximately five months elapsed between initial and later interviews to allow candidates to clarify and confirm responses after more experience in the field. Participant perspectives provided insight into strategies for the achievement and avoidance of possible selves related to four previously identified salient categories (Hamman et al. 2006). Two AERA (2005) panel suggestions for research in teacher education were employed in order to authenticate insights gathered during the two-staged investigation. First, the instrumental-intrinsic case study was framed “in relation to relevant theoretical frameworks” and second, research extended upon previous findings (Cochran-Smith & Zeichner, 2005, p. 741).

Candidate identified self-strategies were analyzed using Ibarra’s (1999) iterative process for the attainment of possible selves while candidate suggested strategies for teacher education were coded using a framework for the improvement of teacher preparation (Korthagen et al., 2006). The following final chapter includes a summary of the study, the findings from the study based on the two overarching research questions, significance of this study, implications for practice, recommendations for future studies, and concluding thoughts.

Summary of the Study

Beginning teachers are more effective in their first year when they enter classrooms with a strong identity and sense of self as teacher (Kagan, 1992). While preparation programs play an integral role in pre-service professional identity development (Boyd, Grossman, Lankford, Loeb, & Wyckoff, 2009; Darling-Hammond & Bransford, 2005; Fullan & Stiegelbauer, 2007; Hamilton & Pinnegar, 2000; Korthagen, 2004; Sprinthall, Reiman, & Theis-Sprinthall, 1996), there are limitations that impede the establishment of effective teacher educator pedagogy. These limitations include the lack of theoretical understanding of pre-service teacher professional identity development (Beijaard, Meijer, & Verloop, 2004; Cochran-Smith & Zeichner; Dyer, 2012; Grossman & Ronfeld, 2008; Korthagen, 2004; Olsen, 2008; Zeichner & Conklin, 2004; Zeichner, 2004, 2005), and insufficient empirical evidence regarding effective teacher preparation.

The purpose of this two-staged instrumental-intrinsic case study (Stake, 1995) was to collect and analyze pre-service possible self-strategies to increase understanding in regards to teacher professional identity development and effective teacher educator pedagogy. The investigation gave voice to an often-neglected source of insight, teacher candidates (Korthagen et al., 2006). The theory of possible selves, as proposed by Marcus and Nurius (1986), served as a framework for all interviews conducted with thirteen candidates from a private institution in the Midwest. The researcher utilized results from previous applications of the theory to teacher education and extended findings by employing the strategy development process (Ibarra, 1999). This component was previously unapplied within the context of teacher preparation.

Strategy development was recognized by Oyserman and Fryberg’s (2006) as necessary for the achievement of hoped for selves and the avoidance of feared selves. The study first explored participant self-strategies and then investigated participant suggested strategies for the improvement of teacher education. Participants proposed strategies related to previously identified salient teacher selves: future interpersonal relationships, instructional strategies, classroom management, and professionalism (Hamman et al., 2010). Participant perspectives provided insight into influences that shaped professional identity development and served to inform teacher educator pedagogy.

Discussion of Research Question One

How do candidates describe and develop hope achievement and fear avoidance strategies in regards to previously identified salient possible selves (Hamman et al., 2010)?

Participants articulated self-strategies to assist with the achievement and avoidance of selves related to four previously identified salient categories of teacher possible selves: interpersonal relationships, instructional strategies, classroom management, and professionalism (Hamman et al., 2010). Identified self-strategies were analyzed using Ibarra’s (1999) iterative process for the attainment of possible selves:
observation, experimentation, and reflection. The following overview describes patterns related to research question one.

The main code ‘observation’, was discussed the least by participants. Ibarra’s iterative process (1999) recognized that an initial step to self-achievement involved observation of influential others. Across all patterns a limited number of participants, 13%, identified strategies that involved observation of significant others. All participants revealed experimentation strategies for the achievement of hopes and the avoidance of fears. Coding directives described experimentation as personalization and authentication activities or experiences. Participants articulated a variety of experimentation strategies. However, two patterns were dominant across all interviews. First, participant experimentation strategies relied upon collegial support and second, participants planned to conduct independent research. Participants also reflected upon attributes that helped and hindered the achievement of selves. Coding directives described reflection as personal evaluation, and adjustment of self. While a variety of dispositions were identified, participant responses emphasized the importance of a student-centered professional disposition.

While the study focused on the articulated strategies for the attainment of selves related to Hamman’s (2010) four identified salient categories and though candidates were directed to focus solely on the four categories, an additional category emerged throughout participant interviews. All but two candidates (TC4, 10) discussed hopes and fears related to time limitations. While hopes and fears related to time limitations seemed to be an underlying factor related to each of Hamman’s (2010) salient categories, this self was especially prevalent during all of the eleven later interviews conducted. This may have been the result of contextual influences related to the interview schedule. Initial interviews were conducted within five to seven weeks of the semester’s start, when candidates were immersed in practicums, student teaching or their first semester of the novice teachers. Final interviews were conducted during the summer months, a time of transition for each of the participants.
**Pattern Disaggregation for Research Question One**

After the researcher conducted an analysis of each specified strategy pattern and disaggregated data by certification level (see Appendix L) four differences in the strategy development process for elementary and secondary participants emerged. First, the majority of elementary participants strategies for the achievement of instructional selves relied upon trial and error while only one secondary candidate discussed trying new strategies in response to the attainment of instructional selves but did not identify error as necessary for professional growth. Second, elementary participants relied more heavily upon garnering support from colleagues for the achievement of selves related to classroom management while only one secondary certified participant planned to garner support. However, the secondary candidate did not discuss collegial support but referred to administrators and parents. Third, half of the secondary participants reflected on the importance of content knowledge in regards to the achievement of selves related to future professionalism while no elementary participant strategies emphasized the need to increase content knowledge. Lastly, half of the secondary participants had experienced and reflected on how isolation within the school setting would hinder achievement of selves, while no elementary participants shared such concerns.

**Discussion of Research Question Two**

*How do candidate identified strategies inform teacher education?*

To inform the practice of teacher educators, participants were asked to articulate teacher preparation strategies for the achievement and avoidance of salient possible selves (Hamman et al., 2010). Strategies were analyzed using a framework for the improvement of teacher education programs (Korthagen, Loughran, & Russell, 2006). The following overview described patterns related to research question two that addressed the three components of Korthagen’s (2006) framework: views of knowledge and learning, program structure and practices, and quality of organization and staff.

All participants identified strategies that addressed views of knowledge and learning. Korthagen et al. (2006) described views of knowledge and learning as authentic experiences that allowed for the professional development of candidate self-views, philosophies, skills, and a shift candidates from a focus on the subject to the student.
Participant responses relied on two dominant patterns. First intentional mentoring interactions with cooperating teachers aided in the development of participant’s reflective practice and second, clinical field experiences in a diverse range of educational settings promoted professional flexibility and adaptability.

Korthagen et al. (2006) recognized that learning about teaching is enhanced through candidate research and opportunities to work closely with peers. Patterns that addressed this concept were organized under the sub-code ‘program structures and practices’. All participants suggested collaborative opportunities that emphasized course content application. Only six participants discussed opportunities for research in teacher education. Each cited a recently implemented capstone assessment. Five of the participants had entered student teaching prior to implementation. The assessment required candidates to develop an online portfolio and add artifacts and resources to it throughout the semester. Upon application to student teaching, participants gave a twenty-minute presentation before a six-member panel made up of teacher education and content faculty and leaders from the educational community.

Finally, all participants proposed strategies that addressed the quality of teacher education program and staff (Korthagen et al., 2006). All participants discussed overall program quality and identified issues for resolution. Identified areas for program improvement emerged most often in discussions regarding future instructional strategies and classroom management, two self-categories identified during both initial and later inquiries into participant’s areas of greatest concern.

While participants recognized the value of the classroom management course, there were several comments made regarding content and program placement. The majority of participants believed the course too brief and too disconnected from the real world setting. Participants suggested embedded classroom management discussions throughout all preparation course work and pairing the course with a practicum. Others identified limitations related to the online condensed summer course and the general limitation of course work compared to experiential learning in the classroom. Overall participants called for more clinical field experiences with effective clinical mentors.

The sub-code that received the majority of participant suggestions addressed criteria for faculty quality. Participants identified effective teacher educator qualities
such as a personal knowledge of the school culture, the ability to model effective instructional strategies, and the capacity to describe instructional decision-making. While Korthagen et al. (2006) previously recognized effective qualities such as those previously noted, this study yielded an emergent attribute that appeared to influence all components of Korthagen’s (2006) framework. All but one participant, (TC1) discussed affective qualities of teacher educators. Teacher educators were reported to model qualities such as caring, approachability, collegiality, and a commitment to life-long learning. Participants attributed teacher educator affective qualities to influencing their personal perceptions on professionalism and reorienting views of knowledge and learning to a student-centered focus.

In conclusion, participants suggested over two hundred strategies in regards to teacher preparation programs. Participants shared experiences that impacted their views of knowledge and learning. While strategies placed little emphasis on observation, participants attributed mentoring to the development of an effective reflective practice and valued practicum placement diversity for the positive impact on professional adaptability and flexibility. In regards to teacher education program structures and practices, all participants emphasized course practices that incorporated peer collaboration and almost half of the participants discussed strategies that promoted independent research. Participants articulated strategies that addressed characteristics of quality teacher education programs and evaluated the teacher education program as effective however a few areas for refinement were identified. These areas related to the format and placement of the classroom management course, a desire for additional clinical experiences, and the modeling of professional practices. While the majority of participants reported the effective use of instructional strategies by teacher educators, five participants noted a lack of effective instructional modeling in general content courses. Participants also expressed an interest in gleaning metacognitive insight into teacher educator’s philosophical and or pedagogical decision-making.
**Pattern Disaggregation for Research Question Two**

When patterns were disaggregated by program placement for research question two there were two noted discrepancies. All but one secondary participant suggested that faculty model metacognitive processes related to instructional decision-making, while only one elementary participant made a similar suggestion. The majority of secondary participants also shared the perception that content faculty, outside the education program, failed to model effective instructional strategies. No elementary participants identified this as an area for teacher preparation program improvement.

**Discussion of Themes Across Patterns**

The theory of possible selves as proposed by Marcus and Nurius (1986) posited that knowledge gained from the analysis of possible selves provided “an interpretive framework for making sense of past behavior, it also provides a means-ends pattern for new behavior” (p. 955). Over eighty patterns were generated across all categories. Synthesized patterns resulted in six overarching themes. The subsequent themes addressed Marcus and Nurius’ two claims. While the theory of possible selves framework relied upon future projections, resultant dialogue prompted self-reflection and past-self insights and prompted a means-end process, strategy development.

**Theme One, Memories: Future Thinking Provided Opportunity for Past Reflection**

Participant past experiences emerged throughout the interview process and across all research questions. Interviews revealed influential interactions with past mentors, peers, students, teachers, teacher educators, and family members. Identified interactions were noted as having influenced participants’ hopes, fears, and the strategy development process.

**Theme Two, Motivation: Participant Hopes, Fears and Strategies were Motivated by a Desire to Ensure Achievement of Future Students**

All participants shared one common motive across all patterns for research question one and the majority of participants emphasized the same motive in response to research question two. Every participant articulated more then one strategy that was motivated by ensuring future student achievement. Such student-centered dispositions
spanned across all participants despite grade or subject certification and placement within the teacher education program. Participants reported that student achievement was the motivation for collegial interactions, differentiated lessons, reflection, and future professional development. The majority of participants also identified building rapport with students as central to the achievement of future selves related to classroom management.

**Theme Three, Membership: Future Self-strategies are Dependent on Membership within Educational Communities**

Participant strategies often relied upon future collegial interactions or the idea of membership within future educational settings. Membership strategies were developed across all categories, interpersonal relationships, instructional strategies, classroom management and professionalism (Hamman et al., 2010). Participants planned to establish membership within an educational community by participating in collegial collaboration and supporting colleagues in their professional pursuits. Participants believed collegial support would contribute to personal professional goals and promote student success both behaviorally and academically.

**Theme Four, Modeling: Teacher Educator Modeling Influenced the Development of Possible Selves**

While Participants identified several criteria for teacher educator quality, the majority of participants valued modeling of both effective and affective traits. Participants suggested effective traits such as effective instructional strategies, instructional decision-making, and a personal knowledge of the school culture and climate. An additional component also emerged, modeling of affective traits. Teacher educator affective traits were identified by all participants and were noted as influencing professionalism in three ways. First, participants connected support received from teacher educators to a student-centered orientation and recognized the contribution of such to their own student-centered views of knowledge and learning. Second, teacher educator collaborative modeling through cross-faculty projects and participation in professional organization influenced participant perspectives on future collegiality.
Lastly, participants identified affective attributes such as caring, adaptable, and passionate as an essential component of teacher educator quality.

**Theme Five, Mirroring: Observation Played a Minor Role in Future Self-Development**

Ibarra’s iterative process (1999) recognized that an initial step to self-achievement involved observation of influential others. However, across all analysis for each research question the idea of mirroring observed behavior was limited. Only 13% of participants suggested this strategy across all patterns for research question one and 15% for research question two. Moreover, while observation was mentioned it was seldom suggested in isolation or solely for personal self-achievement.

**Theme Six, Mentoring: Intentional Clinical Mentoring Experiences Impacted Self-Strategies.**

Two teacher education program policies were noted to facilitate intentional clinical mentoring experiences. First, participants identified program policies that emphasized intentional placements within a variety of clinical settings. Diversity of placements were recognized as beneficial in that it exposed participants to a myriad of mentors, teaching styles, and students and was reported to ease fears related to future interpersonal relationships and professionalism. Second, intentional interactions with clinical mentors were supported by university established practicum evaluations. Participants connected evaluations to the assurance of critical conversations with and feedback from clinical mentors. Such opportunities were cited as aiding participants in the development of an effective reflective practice, influenced perceptions of selves, and enhanced participants’ ability to develop strategies for the achievement and avoidance of selves.

**Significance of the Study**

The theory of possible selves, as proposed by Markus and Nurius (1986), linked possible selves to increased motivation and to the promotion of change, “both the momentary changes associated with variation in the content of the working self-concept, and more enduring changes” (p. 966). While findings could potentially prompt enduring change within teacher education, the purpose of the study was to enter the often-
neglected voice of teacher candidates into the arena of teacher education course
development (Korthagen et al., 2006). While past researchers have attempted to frame
characteristics of identity development within a chronological context (e.g. Fuller &
Bown, 1975; Kagan, 1990), such stage theories oversimplified the complex and dynamic
nature of identity (Beijaard et al. 2004, Feiman-Nemser, 2001; Gee, 2000-2001; Olsen,
2008; Watzke, 2007). Furthermore such studies neglected the myriad of influences that
shape professional identity development.

The review of the literature for this study synthesized research on identity and a
framework which identified influences that shape professional identity was developed:
social, emotional, motivational, experiential, and rational. The theory of possible selves
was applied to the interviewing framework to prompt participant perspectives on internal
and external influences that shaped their personal professional development. Insights
gleaned increased understanding of teacher professional identity development and
advanced research of effective teacher education pedagogy. Perceptions have the
potential to shape teacher educator practice and the development of courses that
transform candidates into “adaptive experts” (Hammond & Bransford (2005) p. 358).

**Affirmations of the Current Research**

This study affirmed areas of research related to candidates’ professional identity
development and the application of the theory of possible selves to teacher education.
The following is a description of the four identified affirmations of current research.

- Teacher preparation and teacher educators influenced professional identity
development.
- Clinical mentors shaped candidates’ reflective practice.
- Observation played a limited role in candidates’ professional identity
development.
- The theory of possible selves prompted participants to make explicit
  implicit beliefs and motives.

**Teacher Preparation and Educators Influenced Professional Identity Development**
The field of teacher education has a long history of supposed and proposed limitations. Teacher education programs have garnered limited respect (Fullan & Steigelbauer, 2007; Lanier & Little, 1986; World-class, 2012), have limited research funding (Fullan, 2007; Zeichner, 2005), have been accused of having a limited impact on teacher effectiveness (Book & Freeman, 1986; Cochran-Smith & Zeichner, 2004; Cole & Knowles, 1993; Hollingsworth, 1989; Holt-Reynolds, 1992; Reynolds, Ross, & Rakow, 2002; Weinstein, 1990; Zeichner & Tabachnick, 1981) and have failed to influence professional identity development (Kalaian & Freeman, 1989; McDiarmid, 1990; Zeichner & Tabachnick, 1981). However, findings from the current study support more recent scholarly research refuting the ineffectiveness claim assigned to teacher preparation (Boyd, Grossman, Loyd, & Wyckoff, 2009; Darling-Hammond & Bransford, 2005; Gitomer, Latham & Ziomek, 1999; Grossman & Ronfeldt, 2008; Hamilton & Pinnegar, 2001; Reiman, Sprinthall, & Theis-Sprinthall, 1996: Wilson, 2009).

Participants attributed several acquired professional traits and dispositions to teacher preparation and interactions with teacher educators. Teacher educator modeling of affective and effective traits was noted as having influenced participant’s professional practice and the acquisition of student-centered dispositions and perceptions of collegiality. Korthagen’s et al. (2006) suggested teacher educators model effective instructional strategies. “Student teachers report their disappointment when they experience a class in which a lecture is used to present alternatives to lecture methods” (Korthagen et al., 2006, p. 1036). Participant perspectives affirmed Korthagen’s suggestion, participants valued professor modeling of effective instructional strategies and secondary certified participants suggested teacher educator explanation of instructional decision-making to make “pedagogical reasoning for practice clear, explicit and understandable” (p. 1036). Such practices afforded candidates the opportunity to understand insight into how experienced teachers “take risks and develop new teaching approaches” (Korthagen et al., 2006, p. 1036).

Clinical Mentors Shaped Candidates’ Reflective Practice

Findings from this study revealed that all candidates valued clinical experiences and intentional interactions with clinical mentors. Participants attributed the programs emphasis on providing multiple placements within a variety of settings to decreased fears
related to future interpersonal relationships within the school setting. The majority of participants also emphasized program evaluative practices that prompted dialogue between mentors and mentees. Refinement of their own personal reflective practice was attributed to such interactions. Participants also made general statements regarding the need to ensure quality mentors.

Past research recognized clinical field experiences as “an apprenticeship in which the student teacher is galvanized into a profession” (Lesley et al., 2009, p. 42) and performance in field experiences was noted as indicative of future teacher behavior (Hollingsworth, 1989; Lesley et al., 2009). While Freese (2006) suggested that placement diversity effectively shaped “teacher selves” (p. 100), Garrett (2002) recognized that exposure to diversity and high need students and schools alone, is an insufficient preparation strategy. “Only through carefully directed activities, with ample opportunity for reflection, can preservice teachers grow to become the kind of educators who are capable of working with a diverse population” (Garrett, 2002, p. 68).

While diverse opportunities reportedly influenced participant professional perspectives, researchers recognized the limitations of field experiences when facilitated by inexperienced and ineffective mentors (Athanases & Achinstein, 2003; Lesley, Hamman Olivarez, Button & Griffith, 2009). Grannott (1993) developed a model for collaboration that explored the asymmetrical novice-expert relationships and established a theoretical perspective on professional collaboration that utilized three terms to define interactions: imitation, guidance and scaffolding. The framework has been applied to a myriad of studies investigating mentor interactions in teacher preparation (Hamman, Lechtenberger, Griffin-Shirley, Zhao, 2013; Hamman, Olivarez, Lesley, Button, Chan, Griffith & Elliot, 2006; Lesley, Hamman, Olivarez, Button & Griffith, 2009). Application of Grannott’s framework yielded insights similar to those gleaned from the current study’s findings.

Lesley, Hamman Olivarez, Button and Griffith (2009) investigated interactions and influences of cooperating teachers on student teachers’ acquired skills in reading instruction. Results revealed that the majority of participating cooperating teachers failed to provide perspectives on their own “operating philosophy” (p.48), de-valued candidate prior knowledge, and promoted candidate observation which in turn resulted in mainly
imitative interactions. Lesley et al. (2009) recognized that this passive form of mentor-mentee interaction impeded candidate development of decision-making skills and reflective practices and was especially detrimental to candidate knowledge of assessment for learning. This “abandoned” (p. 52) style of mentoring appeared to correlate with mentor’s who held limited literacy content and pedagogical knowledge. Conversely, cooperating teachers were more likely to guide, scaffold, and coach candidates if they had participated in more literacy course work, received mentoring from literacy coordinators, and had contributed to the profession through conference presentations.

Hamman’s et al. (2006) study of mentor interactions with teacher candidates when disaggregated revealed a similar discrepancy. Differences were found in the frequency of interaction based on the certification level of candidates. Elementary candidates perceived more frequent interactions with cooperating teachers while secondary certified candidates received less guidance interactions. While the analysis detected no differences based on certification level and perceived efficacy, other studies have noted the impact of such limited interactions. Valencia, Martin, Place, and Grossman (2009) explored frustrations of student teachers that received limited content instruction feedback and assistance and found that mentor neglect impacted candidate opportunities to develop professionally. Similarly, disaggregated research findings from the current study indicated that secondary certified participants alone experienced challenges related to isolation within practicum settings. This in turn spurred fears related to receiving limited collegial support in the future.

Candidates’ strategies emphasized the need for intentional interactions with mentors and teacher educators throughout preparation, however participant strategies failed to identify observation as necessary for the achievement of selves. While Ibarra’s iterative process (1999) recognized observation of influential others as an initial step to self-achievement, an analysis across all research patterns revealed that observation played a limited role in participants’ strategies. Only 13% of participants suggested this strategy across all patterns for research question one and 15% for research question two. Moreover, while observation was mentioned it was not suggested in isolation but in combination with experimental strategies.
Observation Played a Limited Role in Participants’ Professional Identity Development.

Lesley et al., (2009) found that clinical mentors that utilized “largely passive learning experiences characterized by unstructured observations” (p. 44) impacted candidates development in four ways. Candidates were more likely to mimic the cooperating teacher, less likely to apply innovative practices introduced in teacher education courses, were less likely to develop an effective reflective practice, and scored in the low to moderate range on knowledge tests measuring guided reading skills. Lesley et al. (2009) stated, “We feel that an important implication of the findings for this study is that student teachers would do better with less experiences of passive observation” (p. 53).

Passive observation has long been noted as negatively influencing candidates’ professional identity development. The concept of ‘apprenticeship of observation’ was based on research conducted by Lortie (1975). Lortie (1975) utilized this phrase to describe the perceptions acquired from the thirteen or more years of student seat-time and the ensuing influence upon teacher identity development. Passive observation was found to promote the misconception that teaching required little effort (Lortie, 1975; Munby, Russell & Martin, 2001). The ignorance of teacher intentions or the theory and framework upon which lessons were built, left pre-service students with a shallow understanding of the teaching profession. Additionally, prior classroom experiences were often steeped in a traditional view of education, one that regarded teachers as dispensers of knowledge. This traditional perspective fueled the misconception that the learning process was rote and simple (Lortie, 1975; Feiman-Nemser & Buchmann, 1989; Richardson, 1996). Kalaian and Freeman (1989) discovered that these misconceptions were often maintained from teacher education entry to exit and more recently it was recognized that candidates had a limited awareness of these acquired implicit beliefs (Ashton, & Gregoire, 2003; Cochran-Smith, 2003). Misconceptions and beliefs gleaned from passive observation when left unexamined may have interfered with the effectiveness of teacher education and decelerated professional identity development (Beijard, Meijer, & Verloop, 2004; Korthagen, Loughran, & Russell, 2006; Pinnegar et al., 2011; Sutherland, Howard, & Markauskaite, 2010).
Theory of Possible Selves Prompted Participants to make Explicit Implicit Beliefs and Motives.

Cochran-Smith (2003), Ashton (1996), and Ashton and Gregoire-Gill (2003) offered suggestions to alter misconceptions and promote professional identity development. They urged teacher educators to embed opportunities for making implicit beliefs explicit throughout coursework. Research findings support the use of the theory of possible selves to aid candidates in this process. Markus and Nurius (1986) recognized that possible selves are influenced by past experiences and provided a link between the present and the future. Participant past experiences emerged throughout the interview process and across all research questions. Interviews revealed interactions with past mentors, peers, students, teachers, teacher educators, and family members that were perceived to shape teacher selves.

Markus and Nurius (1986) also argued that possible selves represent possible “motives by giving specific cognitive form to the end states, to the associated plans or pathways for achieving them, and to the values and affect associated with them” (p. 961). Throughout all interviews one common motive emerged, every participant articulated more then one strategy that was motivated by ensuring student achievement. Student-centered dispositions spanned across all participants despite grade or subject certification and placement within the teacher education program. Participants reported that student achievement was the motivation for collegial interactions, differentiated lessons, reflection, and future professional goals. Candidates have historically held such altruistic beliefs towards their role as teachers (Brookhart & Freeman, 1992; Lortie, 1975; Watzke, 2007).
New Understandings from the Study

New data emerged from this study that added to research on both candidate professional identity development and teacher educator pedagogy. The following new findings emerged:

- Secondary participants’ strategies emphasized attributes of and limitations to professionalism.
- Participants held a limited understanding of strategies to establish a strong sense of membership within a future school.
- Teacher educator affective traits shaped participants’ professional identity development.

Secondary Participants’ Strategies Emphasized Attributes of and Limitations to Professionalism

Discrepancies in perceptions, preparation, and professional identity development of secondary versus elementary certified candidates are noted in research (Brookhart & Freeman, 1992; Hamman, Wang & Burley, 2013; Watzke, 2007). A quantitative study conducted by Hamman, Wang, and Burley (2013) noted a difference in level of professionalism among those seeking elementary and secondary-level certification. “Participants who were soon to become elementary-level teachers appeared to be professional and to be learning to teach to a greater extent than did their peers seeking secondary-level certification” (p. 229). Such results were shared with other research that noted divergent perspectives between elementary and secondary level candidates in regards to professionalism. Brookhart and Freeman’s (1992) review of the literature and Watzke’s (2007) longitudinal study of 79 participants revealed that student achievement was the overarching concern of educators, however there were noted differences in perceptions of care, professionalism and student interactions between elementary and secondary-level educators (Book & Freeman, 1986; Weinstein, 1990; Wilson & Cameron, 1996).

Similar to Brookhart and Freeman (1992) and Watzke (2007) all participants emphasized professional dispositions motivated by student achievement. However, unlike findings that noted a neglect of professionalism among secondary participants
(Hamman, Wang & Burley, 2013), secondary participants in this study articulated almost three times more strategies than elementary participants in Hamman’s (2006) category ‘future professionalism’. Oyserman, Bybee and Terry (2006) recognized that analysis of selves played an important role in distinguishing between emotionally well-adjusted and delinquent youths and contended that achievement and sustainability of hopes and avoidance of fears were dependent upon concrete elaborate selves supported by strategies.

In addition to a numerical comparison of identified strategies, other discrepancies between elementary and secondary participants were noted. Secondary participants’ strategies emphasized independent research and the acquisition of content knowledge, while elementary participants reported that they were more likely to utilize trial and error to achieve selves related to future instructional strategies. Furthermore, while elementary participant strategies relied on future collegial support and collaboration for the achievement of selves, secondary participants reported past experiences with isolation and expected this to hinder future selves. Secondary participants also noted regular observation of ineffective instruction in their area of content certification at both the high school and college level. While past studies noted limited levels of professionalism among secondary participants, current findings suggest that secondary participants regard highly future professional selves, however external influences such as limited observation of modeled effective instruction and disconnected membership within school communities may hinder secondary participants achievement of professional selves.

Participants held a Limited Understanding of Strategies to Establish a Strong Sense of Membership

The 30% attrition rate of educators within their first three years (Darling Hammond, 2003) and the revolving five-year turnover rate for urban schoolteachers specifically (Peske, H. G. & Haycock, 2006) spurred researchers to explore contributing factors (Avalos, 2011; Day, Ingersoll, 2001; Kington, Stobart, & Sammons, 2006; Lasky, 2005; Van Den Berg, 2002). While low salaries and student discipline were noted, administrative and collegial support was essential to attrition prevention (Ingersoll, 2001; Feiman-Nesmer, 2003). Though strategic patterns across several categories relied upon collegial support or membership within professional settings, findings from the current
study identified a gap in program preparation. Participants neglected to identify strategies to facilitate effective professional membership, resolve conflict, and ensure administrative support. This is of particular concern as conflict within future educational settings was one of the most noted fears when discussing future ‘interpersonal relationships’. While Korthagen et al. (2006) noted nine principals to improve teacher preparation, there was no inclusion mention of the incorporation of skills to successfully navigate interpersonal relationships within future educational communities.

Strategies to promote membership and combat conflict may not have been addressed during participants’ preparation, however all identified a factor that shaped perceptions of collegiality and professionalism, teacher educators. Korthagen et al. (2006) noted that “Learning about teaching is enhanced when the teaching and learning approaches advocated in the program are modeled by the teacher educators in their own practice” (p. 1036). While strategies valued teacher educator modeling of instructional strategies, all participants’ also emphasized affective modeling of professional dispositions.

Teacher Educator Affective Traits Shaped Participants’ Professional Identity Development

Teacher educator modeling of affective traits emerged as a theme across all categories and participant interviews. Traits such as rapport building, collegiality, care, adaptability, and a passion for knowledge were noted to influence each component of Korthagen’s et al. (2006) framework for the improvement of teacher preparation. While Stronge, Ward, and Grant (2011) investigated the impact on effective and affective in-service teacher traits on P-12 student achievement, a recent search for research related to teacher educator affective traits yielded no results.

Implications for Professional Practice

The current research built upon previous application of the theory of possible selves to teacher identity development and gleaned insights from the Ibarra’s (1999) strategy development process, a perspective not previously considered within teacher preparation and identity development research. While the study attempted to use a strong theoretical framework, have clearly defined parameters, and apply accepted strategies to
promote credibility, as specified by Creswell (2013); with all studies there are limitations that impact results. When looking at the findings of this study, it is important to acknowledge the following limitations.

Creswell (2014) defined case study as “an in-depth exploration of a bounded system” (p. 482). For instance, the study included thirteen participants at one private university in the Midwest and was conducted over a relatively short span of time, twelve weeks. While this bounded design allowed for in-depth investigation of participant perceptions, it precipitated several limitations.

First, the unique context of the study, a relatively small teacher preparation program within a private faith-based university may be very unlike a large, public university. Second, the narrow participant sample size, a common constraint within qualitative research, limited generalizability. However, generalizability was not the intended goal of the case study design. Instead the purpose of this study was to add to the limited body of knowledge on candidate professional identity development, address identified research gaps in teacher educator pedagogy, and build upon previous applications of the theory of possible selves to teacher education.

Third, the study solicited voluntary participation, which means that the insights of research participants cannot be assumed to be those of candidates that did not participate. Furthermore, participants may represent candidates with a strong commitment toward professional development. Such dispositions may only represent a specific population and restrict the current studies ability to apply acquired knowledge to other populations.

Fourth, participant perspectives allowed for the investigation of possible selves, however, responses were prompted and may not have emerged voluntarily. It is uncertain if strategies were effective, authentic, or evidence of future initiation. Lastly, this study was based on previous application of the theory of possible selves to teacher education and data were coded using established frameworks (Ibarra 1999, Korthagen et al., 2006). Another framework for coding might have revealed different information.

Despite the limitations related to the bounded system, voluntary participation, solicited responses, and a closed coding system, the study provided “thick, rich descriptions, as well as detailed information” (Bloomberg & Volpe, 2012, p. 127). Implications emerged from the voice of teacher preparation participants, a recognized
void within teacher education reform (Korthagen et al., 2006) and increased understanding in regards to internal and external influences that shaped self-development.

The following implications are examined at the theoretical and practical levels of significance. At the theoretical level of significance, findings were reviewed in connection with literature on identity development and the theory of possible selves, the framework for the study’s design. At the practical level of significance, the major findings are discussed in terms of implications for teacher educator professional practice. Implications were based upon the data collected and analyzed concomitantly with research gathered throughout the course of the study.

**Theoretical Level of Significance**

The findings of this study corroborate the emergent body of research investigating possible selves theory and the impact on professional identity development of pre-service teachers (e.g. Beauchamp & Thomas, 2009; Beijaard, Meijer, & Verloop, 2004; Fletcher, 2000; Hong, 2011; Hamman et al., 2012). Products yielded from application of the theory of possible selves: hope, fears, and self-strategies are closely tied to the cognitive study of self-identity. Exploration of possible selves linked to what Markus and Nurius (1986) called ‘affective cognitive structures’ or ‘self-schemas’ (p. 955). Research findings support the utilitarian, investigative, and evaluative qualities of the theory of possible selves for teacher identity development explorations.

First, the theory of possible selves provided a useful framework for the facilitation of future oriented thought. Markus and Nurius (1986) argued that a future oriented perspective should not be neglected. Though future selves have not been “verified or confirmed…it is entirely possible that this variety of self-knowledge also exert a significant influence on individual functioning” (p. 955). Interviews prompted all participants to identify hopes and fears across all salient categories (Hamman et al., 2010). Furthermore selves framed participants’ strategic visions for his or her future professional practice. Such vision statements, also referred to by some as ‘anticipatory reflections’ (Conway, 2001; Freese 2006), are noted as essential to professional identity development (Hammerness, 2003; 2006) and are the foundation upon which leadership skills are built (Katzenmeyer & Moller, 2009). The research design prompted candidates
to not only articulate vision statements but to established action plans for the achievement of aspirations.

Second, data gleaned from individual’s future possible-self disclosures also provided perspectives of past and present contextual influences. Markus and Nurius (1986) posited that possible selves served as antecedents or glimpses into one’s personal history. Findings support this claim. Though prompted to focus on future selves all participants discussed past experiences that shaped self-perceptions and influenced the strategy development process. Participant’s future oriented thoughts appeared rooted in the past contextual exposure and experiences.

Also deeply rooted were participants areas of least and most concern. Unlike previous teacher preparation research, which identified self-changes within a relatively short amount of time (Conway & Clark, 2003; Hamman et al., 2013), findings recognized that areas of least and most concern were left unaltered by the passing of time. However, a previously unidentified fear emerged during later interviews, limited time. Markus and Wurf (1987) claimed that changes within the environment spurred shifts of possible selves. Final interviews took place in the summer months, a time of change and transition for all participants. Beijaard et al. (2004) noted research limitations in regards to understanding the influence of context on professional identity development however the theory of possible selves served as an effective framework for investigating past and present contextual identity influences.

Lastly, possible selves provided an “evaluative and interpretive context for the current view of self” (Markus & Nurius, p. 955). Participant perceptions of future selves allowed for the evaluation of motivational and self-regulative influences upon goal attainment. Markus and Nurius (1986) argued that future selves represent possible “motives by giving specific cognitive form to the end states, to the associated plans or pathways for achieving them, and to the values and affect associated with them” (p. 961). The primary motive of participants within the current study was to ensure student success. While such affective dispositional issues were noted during an analysis of strategies, perspectives on candidate knowledge and skills were also gleaned from either stated strategies or noted gaps within participant responses. For example participant
articulation of collegial conflict resolution strategies and knowledge of appropriate professional protocol was neglected in the majority of interviews.

In conclusion, past identity development research within teacher education has either relied upon concerns (e.g. Fuller & Bown, 1975), goals (e.g. Hammerness, 2003; 2006; Pinnegar et al., 2011), or attempts to establish a developmental or stage theory (e.g. Fuller & Bown, 1975; Kagan, 1990). The identity development process however was neither simple nor chronological, but rather a complex and dynamic process impacted by internal dialogue and external influences. The theory of possible selves prompted holistic perspectives and provided insight into the dynamic mosaic of internal and external influences that shape the professional identity development of future teachers thus supporting the utilitarian, investigative, and evaluative qualities of the theory of possible selves in the exploration of teacher identity development.

Practical Level of Significance

Research identified several impediments to teacher educator effectiveness. Teacher educators must equip candidates with varied interests and teaching styles for increasingly diverse classrooms (Lampert, 2001; McDonald, 1992). Preparation expectations shift in response to technology, globalization (Cochran-Smith & Zeichner, 2005; Zhao, 2011), and national initiatives (CAEP, 2013). However researchers agree that the greatest obstacle may be the continued gap in knowledge as it pertains to teacher candidate identity development (Beijaard, Meijer, & Verloop, 2004; Cochran-Smith & Zeichner, 2005; Dyer, 2012; Grossman & Ronfeld, 2008; Korthagen, 2004; Olsen, 2008; Zeichner & Conklin, 2004; Zeichner, 2005; Zhao, 2011). This combined with limited empirical research on effective teacher education pedagogy (Hoban, 2007; Korthagen, 2004; Zeichner & Conklin, 2004; Zeichner, 2005) weakens teacher educators’ ability to equip candidates to meet the demands of teaching in the 21st Century.

Findings from this study addressed these two obstacles to teacher educator effectiveness. Analysis of participant strategies revealed influences that shaped professional identity development and suggestions to enhance teacher educator pedagogy. Perspectives gleaned provided significant practical implications for teacher educator practice. Application of the theory served as an effective formative assessment that
allowed for the evaluation of candidate knowledge, skills, and dispositions, identification of participant perceived needs, and an appraisal of preparation program effectiveness.

First, the evaluative nature of the theory of possible selves generated insight into participants’ knowledge, skills, and dispositions. Participant articulated and neglected strategies revealed gaps in knowledge and skills. Identified gaps included the use of assessment to shape instruction, building classroom community through student-to-student connections, the role and importance of administrative support, collegial conflict resolution strategies, and appropriate professional protocol. Stated strategies revealed participant generalizations regarding the inflexibility, disengagement, and stagnant professionalism of in-service teachers. These derogatory perceptions combined with the previously identified knowledge gaps regarding appropriate interactions within professional communities could impede future professional relationships. With research noting the vital role of administrative and collegial support in preventing attrition (Ingersoll, 2001; Feiman-Nesmer, 2003), teacher educators should address misconceptions and introduce strategies to aid candidates in strengthening future professional support networks.

Such efforts would also support findings related to participant perceived needs. Participant strategies across all categories were heavily reliant on support from and membership in future professional settings. This insight addressed the second practical level of significance for this research. Findings afforded the opportunity to assess participant needs. In addition to membership, identified needs included the incorporation of practicum debriefing discussions, embedded classroom management content, and intentional interactions with effective mentors. Participants valued practicum evaluative tools for the facilitation of mentor conversations.

Disaggregation of data revealed differences in needs between elementary and secondary candidates. Secondary participants desired differentiated case studies, activities, and examples that were relevant to their area and grade level certification. Additionally, secondary participants desired insight into teacher educators’ personal philosophies and suggested the articulation of metacognitive processes that drove instructional decision-making. This is of particular interest as the majority of secondary candidates reported an often-obfuscated connection between content and methods courses.
and reported limited observation of effective instruction within content courses and practicum experiences.

Lastly, findings raised awareness in regards to teacher educator practice and program initiatives. Lesley et al. (2009) recognized that teacher education is influenced by a “hidden curriculum” (p. 43). The ‘hidden curriculum’ referred to the contextual, ideological, interactive, and quality factors that influenced candidate professionalism. While findings supported an overall positive assessment of preparation quality, a commonly held perception noted in research (Brookhart & Freeman, 1992), analysis of self-strategies allowed for the investigation of teacher education’s ‘hidden curriculum’. Participant contributed the personal attainment of several professional qualities to the attributes exhibited by teacher educators such as the use of effective instructional strategies, personal knowledge of the school culture and climate, and modeling of affective traits.

While participant responses revealed the overall quality of teacher education faculty, one area of program neglect was identified. Participant strategies that addressed ‘program structures and practices’ emphasized the provision of collaborative opportunities, however, research strategies were often neglected. The only mention of research skills arose in participants who were exposed to a newly implemented program initiative, the student teaching presentation. Strategies in this instance served as a ‘bellweather’ that provided insight contextual shifts and changes with in the teacher education program (Hamman et al., 2014, p. 224).

Application of the theory of possible selves to teacher education served as an effective tool to understand candidates’ knowledge, skills, and dispositions, identify participant needs, and appraise preparation program effectiveness. Findings served to inform teacher educator practice and provide insight into preparation influences on professional identity development. Embedded use of this reflective framework may serve to motivate and regulate participant actions and create adaptive learners who take ownership of professional development beyond the limited scope of the two-year preparation program.
Recommendations for Future Research

Identified limitations of this research provide opportunities for future study. For example, future research could also expand the cross section to include new admits to the school of education through novice teachers educators to master teachers. Or researchers could establish a longitudinal study that investigates a cohort of candidates from preparation through their first five years of teaching. Such perspectives may lead to greater understanding of professional identity development, teacher preparation, and support structures or factors that influence attrition.

Within the application of possible self-theory to teacher education there are limited comparative studies (Cochran-Smith & Zeichner, 2005). The current research incorporated two interviews within an elapsed time span of approximately five months, findings indicated the maintenance of participant identified areas of least and most concern. The only noted change was an increase in fears related to time management and limited time. Such findings run counter to previous studies that noted the dynamic nature of selves and subsequent shifts related to external influences (Conway & Clark, 2003; Hamman et al., 2013; Markus & Wurf, 1987, Watzke). However, the relatively short expanse between initial and follow up interviews may have hindered the opportunity to compare change over time. The interview framework could therefore be utilized upon program entrance, exit, or throughout teacher preparation programs. Such a longitudinal design may add to the limited body of research and understanding of the teacher professional identity development process. (Beijaard, Meijer, & Verloop, 2004; Cochran-Smith & Zeichner, 2005; Dyer, 2012; Grossman & Ronfeld, 2008; Hoban, 2007; Korthagen, 2004; Olsen, 2008; Zeichner, 2004, 2005; Zhao, 2011). Furthermore, the framework could be utilized to facilitate multi-university comparative studies and the application of findings across various teacher preparation settings. The interview framework applied to private, public, small and large teacher preparation programs would allow for a comparison of program attributes and increased understanding in regards to teacher preparation influences upon professional identity development.

Participant interviews yielded a myriad of self-prescribed preparation strategies that warrant further testing. A comparative study investigating the impact on efficacy, or another measurable attribute, could be administered before and after the implementation of participant suggested strategies. A similar design could be used to investigate the
influence of the theory of possible selves on measureable attributes as well. Korthagen et al. (2006) noted that teacher education has continued to disconnect theory with practice and no one strategy has resulted in the assurance of professional identity growth and development. Such studies could add to the recognized limitation of empirical research regarding effective teacher educator pedagogy (Hoban, 2007; Korthagen, 2004; Zeichner & Conklin, 2004; Zeichner, 2005).

The possible selves theoretical framework could also be applied to the role of teacher educators. Expanded expectations, standardization, and accountability, combined with limited funding have contributed to teacher educator angst (Murray & Male, 2005). Investigating the possible selves of teacher educators as they shift from “first-order practitioner,” schoolteacher serving in a school, to “second-order practitioner,” teacher educator (TE) serving in higher education (HE) (p. 126) may provide insight into transitional stress. Furthermore, perspectives may aid in the development of induction programs to support novice teacher educators as they navigate increased expectations, role ambiguity, and the required reframing of pedagogical practice.

The majority of research applying the theory of possible selves to this point has been qualitative in nature due to the cumbersome process of interviewing and transcription, the number of participants has limited generalization of findings. Recently however, Hamman, Wang, and Burley (2013) conducted a quantitative study using a Likert-type scale in order to measure possible selves. Further research in the development of a survey may provide opportunities for larger scale studies.

While suggestions thus far emphasized expanding the breadth of application, there was space for further investigative depth. Application of the theory of possible selves within the context of this study provided insight into past and present contextual influences that impacted selves. It should be noted however, that the founding religious tenets of the institution rarely emerged during the study. Only one candidate associated the affective traits of faculty to a shared belief system with the university’s servant-leadership mission. Such limited emphasis on faith may be associated with the established interview questions. Questions did not direct participants to consider the preparation program within the context of the university’s founding religion or faith-based expectations. Furthermore the framework applied to the current study focused on
the strategy development process and did not seek to uncover underlying factors that influenced the decision-making. Korthagen’s (2004) onion model identified several layers that shape professional development: environment, behavior, competencies, beliefs, and mission or core. While the study provided insight into these multiple influences interview questions did not specifically prompt participants to analyze why they chose specific strategies or what influenced the selection. Interview questions could be revised to increase understanding as to how the identified layers within the onion model influenced the development of candidate’s hopes, fears, and the strategy. For example: Why did you choose that strategy? Who or what influenced that decision?

Concluding Thoughts

Today’s teacher candidates must not only be content experts, they must be reflective practitioners competent in both theory and complex learning processes. They must prove capable of constructing classrooms to meet the diverse needs of each child within a culture of global competition and high stakes testing. While identity development was noted as central to teacher professionalism and quality there has remained research gaps regarding the professional identity development process and effective teacher preparation strategies. Such limitations weaken teacher educator practice and the ability to prepare candidates to meet the numerous expectations placed upon them. The theory of possible selves as proposed by Markus and Nurius (1986) was used as a tool to glean the voice of teacher candidates, a recognized void within teacher education reform (Korthagen et al., 2006).

The theoretical framework prompted ‘me’-reflection and ‘means’-development, and revealed six themes across patterns: memories, motivation, membership, mirroring, mentoring, and modeling. First, future thinking provided insight into participants’ past ‘memories’. Second, participant strategies were ‘motivated’ by future student achievement. Third, participant future strategies relied heavily upon collegial support or ‘membership’ within the educational community. Fourth, passive observation, or ‘mirroring’ of observed behavior, played a minor role in the strategy development process. Fifth, all participants valued effective clinical ‘mentoring’ when combined with opportunities for dialogue and feedback. Lastly, participant responses aligned with previous research that identified modeling of effective instructional strategies as essential.
to teacher educator quality. However, an additional attribute emerged, affective modeling. Participants attributed affective traits and actions of teacher educators to personal perceptions of collegiality and student-centered instruction.

The current study attempted to ameliorate identified research gaps by applying a theoretical framework that emerged from the psychology of personal growth (Wurf & Markus, 1991) and has only recently been applied to teacher preparation. The theory of possible selves prompted holistic perspectives and provided insight into the dynamic mosaic of influences that shaped future teacher’s identity. Findings verified the utilitarian, investigative, and evaluative nature of the applied theoretical framework. Resultant perspectives served to inform teacher educator practice and increased understanding in regards to teacher professional identity development. The reflective framework promoted participant self-diagnosis and self-prescription and embedded use within teacher preparation may serve to motivate and regulate teacher candidate actions and foster adaptive learners who take ownership of professional development beyond the limited scope of the two-year preparation program.
References


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www.sitemaker.umich.edu/culture.self/files/possible_selves_measure.doc


Watzke, J. (2007). Longitudinal research on beginning teacher development: Complexity


Appendix A - Phone Recruitment Script

1. Hi, my name is Jill Gonzalez, and I’m calling about a study that I’m conducting for my dissertation research. Dr. Ramona Stowe and/or Dr. Jo Lamar recommended you for this study due to your active participation in Phi Delta Kappa and/or PTICO. The study is helping us understand strategies to improve teacher education programs and courses. You will be asked questions about your hopes and fears in regards to teaching and I would also like to review some of your coursework including your teacher work sample at the end of the semester. The Institutional Review Board at Kansas State University has cleared this study. I would like to interview you twice this semester once at the beginning of the semester and once at the end. Each interview will last between 30-45 minutes, and would be a tremendous service to the teaching profession.

I was wondering if you would have any time [this week, Wednesday or Thursday] to help us out by participating in the study.  
(If yes, go on.  If no:) Thank you for your time. Good-bye.

2. I will confirm program placement and certification.

[What will be your certification? (Elementary, secondary, subject)  What are the courses that you are enrolled in this semester? What year do you plan to graduate? (Questions to assist in determining program placement)]

3. I have openings on [day] at [time]. Could you make it then, [name]?  (Continue until you have an agreed-upon time and day).  Thank you, I will send you a confirmation email with my contact information.  If you have any questions, concerns or need to reschedule please let me know.  I’ll call you the night before with a reminder.

4. This step is highly important. Here you secure a commitment from participants to show up, making it much more likely that they will show up.

Thank you very much, [name]. We’ll count on seeing you at ______ on ______ then, ok?  [Wait for response.]

Follow Up Phone Call

Hi, my name is ___________________, and I’m calling to remind you that you agreed to participate in a study the possible selves study tomorrow at [time]. The experiment is located [specific room location]. Can you still make it tomorrow?

(After positive response) Great.  See you tomorrow.
(Or after negative response) Okay, that’s too bad. What day could we reschedule?  
(If yes, go back to #3 above.)

(If no:) Thank you for your time. Good-bye.
Appendix B - Informed Consent Form


APPROVAL DATE OF PROJECT:

EXPIRATION DATE OF PROJECT:

PRINCIPAL INVESTIGATOR: Dr. Trudy Salsberry

CO-INVESTIGATOR (S): Jill Gonzalez-Bravo

CONTACT NAME AND PHONE FOR ANY PROBLEMS/QUESTIONS: Dr. Trudy Salsberry, tas@ksu.edu

IRB CHAIR CONTACT/PHONE INFORMATION: • Dr. Rick Scheidt, Chair, Committee on Research Involving Human Subjects, 203 Fairchild Hall, Kansas State University, Manhattan, KS 66506, (785) 532-3224.

SPONSOR OF PROJECT: None

PURPOSE OF THE RESEARCH: The purpose of this study is to understand preservice teacher professional identity development to inform teacher education practices and pedagogy.

PROCEDURES OR METHODS TO BE USED: This intrinsic case study will involve a pre and post interview of preservice teachers from a Mid-western private university and the analysis of student created course artifacts. This process will result in gaining an understanding of preservice teacher professional identity development and strategies to improve the professional development process and teacher educator pedagogy. This information builds upon previous research applying the theory of possible selves. Data collection will include one-on-one interviews and a collection of student created course artifacts.
LENGTH OF STUDY: Two (pre and post) interviews, 30-60 minutes in length, and the analysis of student created course artifacts during the course of one semester.

RISKS OR DISCOMFORTS ANTICIPATED: No known risks

BENEFITS ANTICIPATED: This study will seek an understanding of preservice teacher professional identity development and strategies to improve teacher educator pedagogy. This study seeks to build upon previous research findings and contribute to the ongoing discourse surrounding preservice teacher professional identity development and the application of the Theory of Possible Selves to teacher education.

EXTENT OF CONFIDENTIALITY: Names of participants will be changed to protect anonymity. Individual results will not be shared.

TERMS OF PARTICIPATION: I understand this project is research, and that my participation is completely voluntary. I also understand that if I decide to participate in this study, I may withdraw my consent at any time, and stop participating at any time without explanation, penalty, or loss of benefits, or academic standing to which I may otherwise be entitled.

I verify that my signature below indicates that I have read and understand this consent form, and willingly agree to participate in this study under the terms described, and that my signature acknowledges that I have received a signed and dated copy of this consent form.

Participant Name:

Participant Signature:

Witness to Signature: (project staff)

<table>
<thead>
<tr>
<th>Participant Name:</th>
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<tbody>
<tr>
<td>Participant Signature:</td>
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<td>Witness Signature:</td>
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Appendix C - Interview Guide

Purpose of Study: The purpose of this study is to explore candidate teacher professional identity development and gain perspectives and strategies to inform and improve teacher educator pedagogical practices. The study builds on previous published research that applied the theory of possible selves to the field of teacher education.

Overarching Research Question:

How do pre-service teachers describe and develop strategies for professional development in regards to salient possible selves?

Protocol for Interview Interviewer: Jill Gonzalez-Bravo

Nature of relationship with interviewees: The interviewees are undergraduate students enrolled in the school of education. None of the interviewees are in courses instructed by the interviewer. The interviewer has had limited interaction with selected students and no influence upon student course achievement or grades.

Process: Consent will be collected in advance, in person, and in writing. Interviews will be scheduled at times convenient for the participants. Interviews will be conducted on campus in either the education department’s conference room or at the education resource room in the library. All interviews will be recorded on a digital audio voice recorder and transcribed for the purpose of data analysis. Names of participants will be changed for anonymity. The pre-determined interview questions below will serve as a guide for the interview; however, the interviewer may ask clarifying questions or make requests for elaboration on specific topics.

Interview Questions: The interview questions correspond to the theory of possible selves as defined by Markus and Nurius (1986), build the previous findings of salient categories established by Hamman et al. (2006), and extend on these findings by incorporating a previously unapplied component of the theory of possible selves, strategy.
Appendix D - Interview Questions

Introduction: I am working to understand how to better prepare teacher candidates. Researchers have identified four categories for the hopes and fears that teacher candidates have (Show students the salient categories chart). They are as follows the relationships teachers have within the school community, classroom management, instructional strategies, and his or her professionalism or professional growth. I would like to understand your hopes and fears in regards to these four areas, experiences you have had so far, and your ideas on how teacher education might better prepare you for success. I will briefly describe each of the four categories and ask you a series of questions.

<table>
<thead>
<tr>
<th>Interpersonal relationships</th>
<th>Interactions with individuals within the school community where you will work</th>
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<tbody>
<tr>
<td>Classroom management</td>
<td>Management of the classroom, discipline issues and interactions with students</td>
</tr>
<tr>
<td>Instructional strategies</td>
<td>Academic teaching strategies that you will use as a classroom teacher</td>
</tr>
<tr>
<td>Professionalism</td>
<td>Professionalism, organization, creativity, and professional development</td>
</tr>
</tbody>
</table>

1. First of all which of these categories is of the most concern for you? Why?
2. Which of these categories is of the least concern? Why?

Relationships: Interactions with individuals within the school community where you will work.

Scenario Description: As a teacher you will be a member of a community. You will have interactions and build relationships with other teachers, administrators, parents and community members

- Tell me about an experience you have had dealing with interpersonal relationships within the school community. How did you react? Why did you react that way? How do you hope to react in the future?
- Describe your hopes in regard to the relationships you will build as a classroom teacher.
Classroom Management: Management of the classroom, discipline issues and interactions with students.

Scenario Description: There are a variety of challenges associated with managing a classroom from rules and discipline to your daily interactions with students.

- Tell me about an experience you have had dealing with a classroom management issues. How did you react? Why did you react that way? How do you hope to react in the future?
- Describe your hopes in regard to your classroom management skills as a teacher.
  - How will you achieve this?
  - Describe how teacher education could better prepare you for success in regards to achieving your classroom management hopes or goals.
- Describe your fears in regards to classroom management.
  - How will you avoid experiencing this fear?
  - Please describe how teacher education can assist you in avoiding this fear?

Instructional Strategies: Academic teaching strategies that you will use as a classroom teacher.

Scenario Description: As a classroom teacher you will be responsible for ensuring the academic success of your students, the next series of questions covers your hopes and fears in regards to academic instructional strategies

- Tell me about an experience you have had planning instructional strategies. How did you react? Why did you react that way? How do you hope to react in the future?
- Describe your hopes in regard to the instructional strategies you will use as a classroom teacher.
  - How will you achieve this?
Describe how teacher education could better prepare you for success in regards equip you achieve your hopes or goals in regards to instructional strategies.

- Describe your fears in regards to instructional strategies.
  - How will you avoid experiencing this fear?
  - Please describe how teacher education can help you avoid this fear in the future.

**Professional Qualities: professionalism, organization, creativity, and professional development.**

Scenario Description: As an educator you will establish a professional practice. These next questions deal with your qualities in regards to professionalism, classroom organization, creativity, and professional development.

- Tell me about an experience you have had with developing professionally as a teacher. What was your reaction to this experience? Why did you react that way? How do you hope to react in the future?
- Describe your hopes in regard to your professional qualities as a teacher.
  - How will you achieve this?
  - Describe how teacher education could prepare you to achieve your professional hopes or goals.
- Describe your fears in regards to your professionalism as a teacher.
  - How will you avoid experiencing this fear?
  - Please describe how teacher education can assist you in avoiding this fear.
Appendix E - Interview Notes

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Certification: 

Program

Placement:

Setting:

Interpersonal relationships within the school community: Interactions with individuals within the school community where you will work

Classroom management: Management of the classroom, discipline issues and interactions with students

Instructional strategies: Academic teaching strategies that you will use as a classroom teacher

Professionalism: Professionalism, organization, creativity, and professional development

Questions: 

1. First of all which of these categories is of the most concern for you? Why?
2. Which of these categories is of the least concern? Why?

Notes:

Relationships: Interactions with individuals within the school community where you will work.

Scenario Description: As a teacher you will be a member of a community. You will have interactions and build relationships with other teachers, administrators, parents and community members

- Tell me about an experience you have had dealing with interpersonal relationships within the school community. How did you react? Why did you react that way? How do you hope to react in the future?
- Describe your hopes in regard to the relationships you will build as a classroom teacher.
  - How will you achieve this?
  - Describe how teacher education prepared you for success in regards to achieving your hopes in regards to the relationships you will have?
- Describe your fears in regards to relationships.
  - How will you avoid this?
  - How can teacher education help prepare you to avoid?
### Instructional Strategies: Academic teaching strategies that you will use as a classroom teacher.

**Scenario Description:** As a classroom teacher you will be responsible for ensuring the academic success of your students, the next series of questions covers your hopes and fears in regards to academic instructional strategies

- Tell me about an experience you have had planning instructional strategies. How did you react? Why did you react that way? How do you hope to react in the future?
- Describe your hopes in regard to the instructional strategies you will use as a classroom teacher.
  - How will you achieve this?
  - Describe how teacher education could better prepare you for success in regards to achieving your hopes or goals in regards to instructional strategies.
- Describe your fears in regards to instructional strategies.
  - How will you avoid experiencing this fear?
  - Please describe how teacher education can help you avoid this fear in the future.

### Classroom Management: Management of the classroom, discipline issues and interactions with students.

**Scenario Description:** There are a variety of challenges associated with managing a classroom from rules and discipline to your daily interactions with students.

- Tell me about an experience you have had dealing with a classroom management issues. How did you react? Why did you react that way? How do you hope to react in the future?
- Describe your hopes in regard to your classroom management skills as a teacher.
  - How will you achieve this?
  - Describe how teacher education could better prepare you for success in regards to achieving your classroom management hopes or goals.
- Describe your fears in regards to classroom management.
  - How will you avoid experiencing this fear?
  - Please describe how teacher education can assist you in avoiding this fear?

### Professional Qualities: professionalism, organization, creativity, and professional development.

**Scenario Description:** As an educator you will establish a professional practice. These next questions deal with your
qualities in regards to professionalism, classroom organization, creativity, and professional development.

- Tell me about an experience you have had with developing professionally as a teacher. What was your reaction to this experience? Why did you react that way? How do you hope to react in the future?
- Describe your hopes in regard to your professional qualities as a teacher.
  - How will you achieve this?
  - Describe how teacher education could prepare you to achieve your professional hopes or goals.
- Describe your fears in regards to your professionalism as a teacher.
  - How will you avoid experiencing this fear?
  - Please describe how teacher education can assist you in avoiding this fear.

<table>
<thead>
<tr>
<th>Researcher Reflection:</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
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</tbody>
</table>
Appendix F - IRB Approval Letter

KANSAS STATE UNIVERSITY
University Research Compliance Office

TO: Trudy Salsberry
   Educational Leadership
   363 Bluemont

FROM: Rick Scheidt, Chair
       Committee on Research Involving Human Subjects

DATE: 02/5/2014

RE: Approval of Proposal Entitled, "HOPES, FEARS, AND STRATEGY DEVELOPMENT: INVESTIGATING THE POSSIBLE SELVES' PERCEPTIONS OF PRESERVICE TEACHERS RELATED TO UNDERSTANDING PROFESSIONAL IDENTITY DEVELOPMENT."

The Committee on Research Involving Human Subjects has reviewed your proposal and has granted full approval. This proposal is approved for one year from the date of this correspondence, pending continuing review.

APPROVAL DATE: 02/05/2014

EXPIRATION DATE: 02/05/2015

Several months prior to the expiration date listed, the IRB will solicit information from you for federally mandated "continuing review" of the research. Based on the review, the IRB may approve the activity for another year. If continuing IRB approval is not granted, or the IRB fails to perform the continuing review before the expiration date noted above, the project will expire and the activity involving human subjects must be terminated on that date. Consequently, it is critical that you are responsive to the IRB request for information for continuing review if you want your project to continue.

In giving its approval, the Committee has determined that:

☒ There is no more than minimal risk to the subjects.
☐ There is greater than minimal risk to the subjects.

This approval applies only to the proposal currently on file as written. Any change or modification affecting human subjects must be approved by the IRB prior to implementation. All approved proposals are subject to continuing review at least annually, which may include the examination of records connected with the project. Announced post-approval monitoring may be performed during the course of this approval period by URCO staff. Injuries, unanticipated problems or adverse events involving risk to subjects or to others must be reported immediately to the Chair of the IRB and/or the URCO.
## Appendix G - Transcript Summary for Approval

<table>
<thead>
<tr>
<th>School Community Relationships</th>
<th>Which are of the most concern to you?</th>
<th>Which of these are you least concerned about?</th>
</tr>
</thead>
<tbody>
<tr>
<td>Hopes</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Fears</td>
<td></td>
<td></td>
</tr>
<tr>
<td>How has TE assisted you in this area? How could it better?</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Instructional Strategies</th>
<th>Hopes</th>
<th>Strategies</th>
</tr>
</thead>
<tbody>
<tr>
<td>Fears</td>
<td></td>
<td></td>
</tr>
<tr>
<td>How has TE assisted you in this area? How could it better?</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Classroom Management</th>
<th>Hopes</th>
<th>Strategies</th>
</tr>
</thead>
<tbody>
<tr>
<td>Fears</td>
<td></td>
<td></td>
</tr>
<tr>
<td>How could teacher education assist you in the area of classroom management?</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Professionalism</th>
<th>Hopes</th>
<th>Strategies</th>
</tr>
</thead>
<tbody>
<tr>
<td>Fears</td>
<td></td>
<td></td>
</tr>
<tr>
<td>In general how has/could teacher education assist you in this area of professionalism.</td>
<td></td>
<td></td>
</tr>
<tr>
<td>General ways that teacher education can assist candidates.</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
Appendix H - Hopes and Fears: Interpersonal Relationships

<table>
<thead>
<tr>
<th>Hopes</th>
<th>Fears</th>
</tr>
</thead>
<tbody>
<tr>
<td>• To work collaboratively with teams of teachers. (TC2, 3, 6, 8, 11, 12, 13)</td>
<td>• To not ‘fitting in’ or being accepted (TC1, 4, 8)</td>
</tr>
<tr>
<td>• To have open communication and promote school involvement among school community members. (TC4, 6, 10, 11, 12)</td>
<td>• Philosophical differences and confrontations with colleagues (TC6, 9, 11)</td>
</tr>
<tr>
<td>• To contribute to the positive morale of the school. (TC9, 10, 12, 13)</td>
<td>• Lack of a positive collaborative relationship with colleagues (TC10, 11, 12)</td>
</tr>
<tr>
<td>• To establish relationships between all subject and grade levels. (TC1, 9 12)</td>
<td>• To &quot;cross the line&quot; between personal and professional among staff. (TC2, 13)</td>
</tr>
<tr>
<td>• To have a good relationship with administration. (TC11, 12)</td>
<td>• To be “off-putting” to those that are “burnt out” or “dry” due to the candidate’s enthusiasm towards teaching. (TC3)</td>
</tr>
<tr>
<td>• To have a mentoring relationship with a more experienced colleague. (TC5, 7)</td>
<td>• Critical colleagues (TC5)</td>
</tr>
<tr>
<td>• To achieve both personal and professional relationships with colleagues. (TC1)</td>
<td>• Lack of administrative support (TC7)</td>
</tr>
<tr>
<td>• To be a part of a diverse group. (TC13)</td>
<td>• Being compared to more experienced teachers and feelings of inadequacy (TC12)</td>
</tr>
<tr>
<td></td>
<td>• Being in a teacher “clique” (TC13)</td>
</tr>
</tbody>
</table>
## Appendix I - Hopes and Fears: Instructional Strategies

**Future instructional strategies:** Academic teaching strategies that you will use as a classroom teacher (Hamman et al., 2010).

<table>
<thead>
<tr>
<th>Hopes</th>
<th>Fears</th>
</tr>
</thead>
<tbody>
<tr>
<td>• Create student or learner centered classrooms (TC5, 6, 7, 8, 11, 12)</td>
<td>• Falling into a “rut” or “pattern” or having a stagnant” classroom (5) (TC1, 2, 5, 13)</td>
</tr>
<tr>
<td>• Continual improvement (TC1, 2, 10, 11, 12)</td>
<td>• Ineffective instruction inhibiting student success. (TC1, 3, 11, 12)</td>
</tr>
<tr>
<td>• Incorporate a variety of instructional strategies (TC2, 5, 9, 11, 13)</td>
<td>• Exhaustive amounts of time spent lesson planning may hinder personal attitude. (TC5, 12)</td>
</tr>
<tr>
<td>• First year survival (TC3)</td>
<td>• Neglect effective instructional strategies in exchange for content coverage (TC3)</td>
</tr>
<tr>
<td>• To have time to plan effective lessons (TC4)</td>
<td>• Limited knowledge of foundational theory may hinder professional dialogue (TC4)</td>
</tr>
<tr>
<td>• Instill a love a learning within students (TC7)</td>
<td>• Overwhelmed by vast resources and a possible inability to select the best one. (TC6)</td>
</tr>
<tr>
<td></td>
<td>• A hired position outside area of expertise (TC7)</td>
</tr>
<tr>
<td></td>
<td>• Neglecting some students due to emphasis on others with greater needs (TC8)</td>
</tr>
<tr>
<td></td>
<td>• Not knowing how to teach ethnically and linguistically diverse students (TC9)</td>
</tr>
<tr>
<td></td>
<td>• Student behavior interfering with instruction (TC10)</td>
</tr>
<tr>
<td></td>
<td>• Students “will not extract what they need” when using instructional strategies other then lecture. (TC13)</td>
</tr>
</tbody>
</table>
## Appendix J - Hopes and Fears: Classroom Management

**Future classroom management:** Management of the classroom, discipline issues and interactions with students (Hamman et al., 2010).

<table>
<thead>
<tr>
<th>Hopes</th>
<th>Fears</th>
</tr>
</thead>
<tbody>
<tr>
<td>• I feel very comfortable with classroom management (TC1)</td>
<td>• Running out of energy (TC1)</td>
</tr>
<tr>
<td>• Positive learning environment where students feel successful (TC 2, 9)</td>
<td>• Loss of control (TC2, 7, 10, 13)</td>
</tr>
<tr>
<td>• Not to take negative behavior personally (TC3)</td>
<td>• Becoming too focused on content and not establishing boundaries (TC3)</td>
</tr>
<tr>
<td>• Garner student buy in and foster student self-regulation (TC3, 11)</td>
<td>• Being too strict and no one liking you or being too friendly and students walking all over you (TC4)</td>
</tr>
<tr>
<td>• Become a teacher students respect and building relationships with students (TC4)</td>
<td>• Not knowing how to handle defiant behaviors (TC5, 6, 9, 11, 12)</td>
</tr>
<tr>
<td>• Not to have to deal with behavior problems because the will have effective lessons and an organized classroom. (TC5, 6, 7)</td>
<td>• Loosing patience (TC8)</td>
</tr>
<tr>
<td>• Confidence in classroom management</td>
<td></td>
</tr>
<tr>
<td>• Hope to build character in students (TC8)</td>
<td></td>
</tr>
<tr>
<td>• To set and stick to class expectations (TC10)</td>
<td></td>
</tr>
<tr>
<td>• Develop a democratic system focused on identified character traits (TC11)</td>
<td></td>
</tr>
<tr>
<td>• To be proactive and have effective reactions when situations arise (TC12)</td>
<td></td>
</tr>
<tr>
<td>• To establish expectations from day one (TC13)</td>
<td></td>
</tr>
</tbody>
</table>
Appendix K - Hopes and Fears: Professional Development

Future professional development: professionalism, organization, creativity, and professional development (Hamman et al., 2010).

<table>
<thead>
<tr>
<th>Hopes</th>
<th>Fears</th>
</tr>
</thead>
<tbody>
<tr>
<td>▪ Continual growth and life-long learning (TC2, 5, 6, 9, 10, 11, 12)</td>
<td>▪ Stagnant, afraid of change. (TC4, 9, 12, 13)</td>
</tr>
<tr>
<td>▪ Grow in confidence and “never feel that I have it all” (TC2).</td>
<td>▪ Classroom set up and organization (TC1, 11)</td>
</tr>
<tr>
<td>▪ “Professional but energetic and interesting with the students or with other teachers. Being professional does not have to be a stuffed shirt.” (TC3)</td>
<td>▪ Working in a school culture that is not supportive. (TC2, 8)</td>
</tr>
<tr>
<td>▪ Lead professional development. (TC3)</td>
<td>▪ Too emotional. (TC3)</td>
</tr>
<tr>
<td>▪ Be involved in professional organizations. (TC4)</td>
<td>▪ Teaching requires constant change. (TC5)</td>
</tr>
<tr>
<td>▪ Get a masters degree. (TC6, 11)</td>
<td>▪ Burn out, teaching as “a job instead of something that I love” (TC7).</td>
</tr>
<tr>
<td>▪ Effective educators and students are successful. (TC7)</td>
<td>▪ Failing, not helping students. (TC10)</td>
</tr>
<tr>
<td>▪ Model a passion for learning. (TC7)</td>
<td>▪ Stress and loss of professionalism. (TC11)</td>
</tr>
<tr>
<td>▪ Mentor other teachers, “backwards professional development...pour into someone else what everyone has poured into me” (TC8)</td>
<td>▪ Viewed as unprofessional. (TC12)</td>
</tr>
<tr>
<td>▪ District support of professional goals. (TC12)</td>
<td></td>
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<tr>
<td>▪ Maintain professionalism. (TC13)</td>
<td></td>
</tr>
</tbody>
</table>
Appendix L - Research Question One: Data Across All Participants
### Research Question One

How do candidates describe and develop hope achievement and fear avoidance strategies in regards to previously identified salient possible selves (Hamman et al., 2010)?

<table>
<thead>
<tr>
<th>Observation: Noticing of role models and significant others that have influenced professional thought or practice.</th>
<th>Semester Prior to Student Teaching</th>
<th>Student Teaching</th>
<th>Complete Student Teaching</th>
<th>Novice 1st Year</th>
<th>% El. Ed.</th>
<th>% Sec.</th>
<th>% K-12</th>
</tr>
</thead>
<tbody>
<tr>
<td>• Future Interpersonal Relationships</td>
<td>TC5 SS</td>
<td>TC9- Math</td>
<td>TC1 1-SS</td>
<td>TC7 Music</td>
<td>TC1</td>
<td>TC6</td>
<td>TC4 Music</td>
</tr>
<tr>
<td></td>
<td>2</td>
<td>X</td>
<td>X</td>
<td></td>
<td></td>
<td></td>
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<tr>
<td>• Future Instructional Strategies</td>
<td></td>
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<tr>
<td>• Future Classroom Management</td>
<td></td>
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<td></td>
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</tr>
<tr>
<td>• Future Professionalism</td>
<td>2</td>
<td>X</td>
<td>X</td>
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</tr>
</tbody>
</table>

### Experimentation:

Personalization and authentication activities or experiences.

<table>
<thead>
<tr>
<th>• Future Interpersonal Relationships</th>
<th>TC5 SS</th>
<th>TC9- Math</th>
<th>TC1 1-SS</th>
<th>TC7 Music</th>
<th>TC1</th>
<th>TC6</th>
<th>TC4 Music</th>
<th>TC13 English</th>
<th>TC2</th>
<th>TC12</th>
<th>TC3 Drama</th>
<th>TC8</th>
<th>TC10 Spanish</th>
<th>% El. Ed.</th>
<th>% Sec.</th>
<th>% K-12</th>
</tr>
</thead>
<tbody>
<tr>
<td>Interactions to meet personal needs (TC1, 4, 6, 7, 8, 9, 12, 13)</td>
<td>6</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>X</td>
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<td></td>
<td></td>
<td></td>
<td>4, 80%</td>
</tr>
<tr>
<td>Interactions to support of colleagues (TC6, 7, 8, 9, 12, 13)</td>
<td>6</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td></td>
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<td></td>
<td></td>
<td>3, 60%</td>
</tr>
<tr>
<td>Interactions to better serve students (TC6, 8, 12, 13)</td>
<td>4</td>
<td></td>
<td>X</td>
<td>X</td>
<td></td>
<td></td>
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<td></td>
<td></td>
<td>X</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>3, 60%</td>
<td>1, 17%</td>
</tr>
<tr>
<td>Planned to personalize professional relationships. (TC1, 2, 3, 4, 9, 13)</td>
<td>6</td>
<td>X</td>
<td></td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>X</td>
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<td></td>
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<td>2, 40%</td>
<td>4, 67%</td>
</tr>
<tr>
<td>Anticipated district time allowance for collegial collaboration (TC1, 2, 3, 12)</td>
<td>4</td>
<td></td>
<td></td>
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<td>X</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td></td>
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<td></td>
<td></td>
<td></td>
<td></td>
<td>3, 60%</td>
<td>1, 17%</td>
</tr>
<tr>
<td><strong>Future Instructional Strategies</strong></td>
<td>TC5 SS</td>
<td>TC9- Math</td>
<td>TC1 1-SS</td>
<td>TC7 Music</td>
<td>TC1</td>
<td>TC6</td>
<td>TC4 Math</td>
<td>TC13 English</td>
<td>TC2</td>
<td>TC12</td>
<td>TC3 Drama</td>
<td>TC8</td>
<td>TC10 Spanish</td>
<td>% El. Ed.</td>
<td>% Sec. Ed.</td>
<td>% K-12</td>
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<tr>
<td>Recognized the need to use trial and error (TC1, 2, 3, 6, 10, 12)</td>
<td>6</td>
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<tr>
<td>Intended to develop thorough lesson plans (TC1, 3, 7)</td>
<td>3</td>
<td></td>
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<tr>
<td>Planned to conduct independent research (TC1, 3, 4, 5, 6, 7, 9, 10, 11, 12, 13)</td>
<td>11 *</td>
<td>X</td>
<td>X</td>
<td>x</td>
<td>X</td>
<td>X</td>
<td>X</td>
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<tr>
<td>Planned to attend conferences (TC1, 6, 9)</td>
<td>3</td>
<td></td>
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<tr>
<td>Planned to work closely with and garner collegial support (TC4, 7, 8, 9)</td>
<td>4</td>
<td></td>
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<tr>
<td>Planned to survey student to determine needs and interests and develop lessons accordingly (TC2, 3, 7, 8, 9, 11)</td>
<td>6</td>
<td></td>
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</tbody>
</table>

<table>
<thead>
<tr>
<th><strong>Future Classroom Management</strong></th>
<th>TC5 SS</th>
<th>TC9- Math</th>
<th>TC1 1-SS</th>
<th>TC7 Music</th>
<th>TC1</th>
<th>TC6</th>
<th>TC4 Math</th>
<th>TC13 English</th>
<th>TC2</th>
<th>TC12</th>
<th>TC3 Drama</th>
<th>TC8</th>
<th>TC10 Spanish</th>
<th>% El. Ed.</th>
<th>% Sec. Ed.</th>
<th>% K-12</th>
</tr>
</thead>
<tbody>
<tr>
<td>Set classroom policies and rules (TC2, 3, 6, 8, 9, 10, 12, 13)</td>
<td>8*</td>
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</tr>
<tr>
<td>Establish personal effective pedagogy (TC1, 3, 5, 6, 7, 8, 9, 12)</td>
<td>8*</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>X</td>
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</tr>
<tr>
<td>Rapport building with students (TC4, 5, 6, 7, 9, 10, 11, 12)</td>
<td>8*</td>
<td>X</td>
<td>X</td>
<td>x</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>X</td>
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<tr>
<td>Garnering support from others (TC2, 6, 7, 8, 11, 12)</td>
<td>6</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
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</tbody>
</table>

<table>
<thead>
<tr>
<th><strong>Future Professionalism</strong></th>
<th>TC5 SS</th>
<th>TC9- Math</th>
<th>TC1 1-SS</th>
<th>TC7 Music</th>
<th>TC1</th>
<th>TC6</th>
<th>TC4 Math</th>
<th>TC13 English</th>
<th>TC2</th>
<th>TC12</th>
<th>TC3 Drama</th>
<th>TC8</th>
<th>TC10 Spanish</th>
<th>% El. Ed.</th>
<th>% Sec. Ed.</th>
<th>% K-12</th>
</tr>
</thead>
<tbody>
<tr>
<td>Discussions with colleagues (TC 3, 5, 6, 11, 13)</td>
<td>5</td>
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<td>Collegial feedback through peer observation (TC4)</td>
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<td>Feedback from students (TC11)</td>
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<td>Independent research of content (TC5, 11) and instructional strategy (TC3, 12)</td>
<td>4</td>
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<td></td>
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<td>X</td>
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<td>Attend professional conferences (TC2, 4, 9, 11, 13)</td>
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<tr>
<td>Go to graduate school (TC8, 9, 10, 13)</td>
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<td>Join professional organization (TC7)</td>
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</table>

**Reflection:** Personal evaluation and adjustment of self.

- **Future Interpersonal Relationships**

| Respect for others (TC2, 3, 5, 9, 12) | 5 | X | X |   | X | X | X |   |   |   | 2, 40% |
| Coachable, Teachable (TC4, 8, 12) | 3 |   |   |   | X | X | X |   |   |   | 2, 40% |
| Perceived inflexibility of others (TC8, 9) | 2 | X |   |   |   | X | X |   |   |   | 1, 20% |
| Limited knowledge of conflict management and protocol (TC5, 9, 11, 12) | 4 | X | X | X |   | X |   | X |   |   | 1, 20% |
| Isolation (TC3, 9, 13) | 3 | X |   |   | X |   | X |   |   |   | 3, 50% |

- **Future Instructional Strategies**

| Effective time management (TC4, 12) | 2 |   |   | X | X |   |   |   |   |   | 1, 20% |
| Reflective practitioner (TC2, 6, 8) | 2 |   |   |   | X |   | X |   |   |   | 2, 40% |
| Content knowledge (TC5) | 1 | X |   |   |   |   |   |   |   |   | 2, 40% |
| Perfectionism (TC12) | 1 |   |   |   |   |   |   |   |   |   | 1, 20% |

- **Future Classroom Management**

<table>
<thead>
<tr>
<th>TC5 SS</th>
<th>TC9- Math</th>
<th>TC1- SS</th>
<th>TC7 Music</th>
<th>TC1</th>
<th>TC6</th>
<th>TC4 Math</th>
<th>TC13 English</th>
<th>TC2</th>
<th>TC12 Drama</th>
<th>TC8</th>
<th>TC10 Spanish</th>
<th>% El. Ed.</th>
<th>% Sec.</th>
<th>% K-12</th>
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<td>Respect for others (TC2, 3, 5, 9, 12)</td>
<td>5</td>
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<td>X</td>
<td></td>
<td>X</td>
<td>X</td>
<td></td>
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<tr>
<td>Coachable, Teachable (TC4, 8, 12)</td>
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<td>X</td>
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<td>1, 17%</td>
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<td>1, 20%</td>
<td>3, 50%</td>
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<tr>
<td>Isolation (TC3, 9, 13)</td>
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<th>TC2</th>
<th>TC12 Drama</th>
<th>TC8</th>
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<th>TC13 English</th>
<th>TC2</th>
<th>TC12 Drama</th>
<th>TC8</th>
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<td>Student centered (TC1, 3, 4, 5, 8, 10, 13)</td>
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<td>'Well-read' (Content Knowledge) (TC5, 11, 13)</td>
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<td>Fearless (TC4)</td>
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<td>Be on time, dress professionally (TC5)</td>
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### Emergent patterns

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<th>% Sec.</th>
<th>% K-12</th>
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<th>% Sec.</th>
<th>% K-12</th>
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<td>• <strong>Hopes &amp; Fears related to limited time:</strong></td>
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<td>X</td>
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<td>X</td>
<td>X</td>
<td>X</td>
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<td>Observed: The impact of limited time on educators (TC7, 9, 11, 13)</td>
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<td>X</td>
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<td>X</td>
<td>X</td>
<td>X</td>
<td>X</td>
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<td>Experimentation: Had experienced the impact of limited time within the educational setting (TC1, 2, 3, 5, 6, 8, 12)</td>
<td>7</td>
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<td>X</td>
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<td>X</td>
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<td>Reflection: Reflected on the importance of time management as an important skill for selves related to limited time.</td>
<td>2</td>
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Appendix M - Research Question Two: Data Across All Participants
**Research Question 2**

How do candidate identified strategies inform teacher education in regards to Korthagen, Loughran, and Russell’s (2006) model for effective teacher education?

<table>
<thead>
<tr>
<th>Views of knowledge and learning: authentic experiences that allow for the professional development of candidate self-views, philosophies, and skills and shift candidates from a focus on the subject to the student (Korthagen et al., 2006)</th>
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<tr>
<td><strong>Semester Prior to Student Teaching</strong></td>
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<tr>
<td>Participants suggested the use of directed observation protocol within the School Community</td>
</tr>
<tr>
<td>Teacher Education Directed Observation Protocol would assist candidates in professional growth (TC1, 3, 11) (n=3)</td>
</tr>
<tr>
<td>• Observation of mentor (TC1, 11)</td>
</tr>
<tr>
<td>• Observation of the school community (TC3)</td>
</tr>
<tr>
<td>Mentoring aided in developing candidate reflective practice (TC1, 2, 3, 5, 8, 9, 10, 11, 12) (n=9)</td>
</tr>
<tr>
<td>• Conversations with the cooperating teacher (TC2, 3, 5, 8, 9, 11, 12)</td>
</tr>
<tr>
<td>• Teacher education developed evaluations spurred feedback (TC1, 5, 8, 9, 10, 11, 12)</td>
</tr>
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</table>
Clinical Field Experiences encouraged candidate flexibility and adaptability (n=13)

| Field experiences provided an opportunity for application of knowledge (All) | 13 | X | X | X | X | X | X | X | X | X | X | X | X | 5, 80% | 6, 100% | 2 |
| Diversity of placements increased candidate flexibility and adaptability (TC2, 4, 8, 11) | 4 | X | X | X | X | X | X | X | X | X | X | X | X | 2, 40% | 2, 33% |

Program structures and practices: learning about teaching is enhanced through candidate research and opportunities to work closely with peers (Korthagen et al., 2006).

<p>| Participants suggested strategies for content application and collaboration | 13 | X | X | X | X | X | X | X | X | X | X | X | X | 5, 100% | 6, 100% | 2 |
| Use of case studies (TC1, 3, 4, 6, 7, 9, 11, 12, 13) | 9 | X | X | X | X | X | X | X | X | X | X | X | X | 3, 60% | 5, 83% | 1 |
| Computer simulations (TC1, 2, 3, 5, 7, 8, 9, 11, 12, 13) | 10 | X | X | X | X | X | X | X | X | X | X | X | X | 4, 80% | 5, 83% | 1 |
| Practicum debriefing discussions (TC2, 3, 5, 8) | 4 | X | X | X | X | X | X | X | X | X | X | X | X | 2, 20% | 2, 33% | 3 |
| Participant identified program expectations that promoted research (TC2, 4, 8, 11, 12, 13) | 6 | X | X | X | X | X | X | X | X | X | X | X | X | 3, 60% | 3, 50% |
| Required development of an online | 4 | X | X | X | X | X | X | X | X | X | X | X | X | 1, 20% | 3, 50% |</p>
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<th>Professional Portfolio (TC2, 4, 11, 13)</th>
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<th>X</th>
<th>X</th>
<th>X</th>
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<th>2, 33%</th>
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<tr>
<td>Required capstone presentation prior to student teaching (TC4, 8, 11, 12)</td>
<td>8*</td>
<td>X</td>
<td>X</td>
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<td>X</td>
<td>4, 80%</td>
<td>3, 50%</td>
</tr>
<tr>
<td>Quality of organization and staff: Characteristics of effective teacher educators, faculty, professors, staff and teacher education programs (Korthagen et al., 2006).</td>
<td></td>
<td>TC5 SS</td>
<td>TC9 Math</td>
<td>TC11 SS</td>
<td>TC7 Music</td>
<td>TC1</td>
<td>TC6</td>
<td>TC4 Math</td>
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<td>Participants discussed program quality and identified issues for resolution in teacher education course structure.</td>
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<tr>
<td>Participants evaluated teacher education program as effective (TC2, 3, 5, 6, 8, 10, 11, 12)</td>
<td>8*</td>
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<td>Participants identified the need for more content methods courses (TC9, 13)</td>
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<tr>
<td>Participants evaluated the sequence and structure for classroom management course (TC1, 2, 3, 4, 5, 6, 8, 10)</td>
<td>8*</td>
<td>X</td>
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<td>Participant identified teacher education strategies regarding interactions with the educational community</td>
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<td>X</td>
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<tr>
<td><strong>Clinical field experiences</strong> (n=12) (TC1, 2, 3, 4, 5, 6, 7, 9, 10, 11, 12, 13)</td>
<td>12</td>
<td>X</td>
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Appendix O - Average Number of Strategies Identified
Disaggregated by Level of Certification and Program Placement

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<th>Research Question One: Salient Selves (Hamman et al., 2010)</th>
<th>Research Question Two: Korthagen et al. (2006)</th>
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<tr>
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IR=interpersonal relationships, IS=instructional strategies, CM=Classroom Management, P=Professionalism
I=Views of Knowledge and Learning, II=Program Structures and Practices, III= Quality of Staff and Organization
## Appendix P - Examination Ballot

**KSU GRADUATE SCHOOL FINAL EXAMINATION BALLOT: DOCTORAL STUDENT**

<table>
<thead>
<tr>
<th>STUDENT NAME:</th>
<th>JILL GONZALEZ-BRAVO</th>
<th>STUDENT NUMBER:</th>
<th>886587002</th>
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<tbody>
<tr>
<td>OUTSIDE CHAIRPERSON:</td>
<td>DR. SHERYL HODGE</td>
<td>EXAMINATION DATE:</td>
<td>MARCH 4, 2015</td>
</tr>
<tr>
<td>EXAMINATION LOCATION:</td>
<td>303 BLUEMONT HALL</td>
<td>EXAMINATION TIME:</td>
<td>1:00PM</td>
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</table>

It is required that all members of this Examining Committee be present for the entire duration of the Final Examination. All members are expected to examine the student and to vote, including the outside chairperson of the committee who serves as the representative of the Graduate School. A negative vote is automatically recorded for any member of the committee who fails to record a vote, declines to vote, or is not present for the entire examination. When exceptional circumstances warrant, substitutions for regular committee members may be considered by the Dean of the Graduate School, approval must be requested and granted in writing. The examination is to be held only at the time and location stated on this form unless a change has been approved in writing by the Dean of the Graduate School.

The student is considered to have passed the examination if three-fourths (3/4) of the Committee members appointed vote in the affirmative. Permission to retain the failed oral examination may be granted by three-fourths of the Examining Committee, at a time interval of three months after the date of the failed oral examination. In such instances, written notification signed by the committee members must be submitted to the Dean of the Graduate School.

To the Dean of the Graduate School:

We, the undersigned members of the Committee appointed by the Graduate School, have examined the above listed student, a candidate for the doctoral degree, in accordance with the procedures set by the Graduate Council and record our vote by signature in the appropriate box below:

**Examining Committee**

<table>
<thead>
<tr>
<th>Name</th>
<th>Signature</th>
</tr>
</thead>
<tbody>
<tr>
<td>Dr. Trudy Salsberry</td>
<td>[Signature]</td>
</tr>
<tr>
<td>Dr. David Thompson</td>
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<tr>
<td>Dr. Donna Augustine-Shaw</td>
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<tr>
<td>Dr. Lotta Larson</td>
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</tr>
<tr>
<td>Dr. Sheryl Hodge</td>
<td>[Signature]</td>
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</tbody>
</table>

This ballot should be returned to the Graduate School, 253 Fairchild Hall, prior to submission of the dissertation.

As major professor, hereby the required copyright release has been obtained for published works within this dissertation.

As major professor, I authorize the Graduate School to change the grades for incomplete (I) and/ or non-report (NR) to credit (CR) for all previous semesters for 300-800 PhD Research. Current semester grades must be submitted via ISS by the Office of the Registrar deadlines.

Major Professor’s Signature: [Signature] Date Signed: 2-4-15