INITIATING OPPORTUNITIES TO ENHANCE PRESERVICE TEACHERS' PEDAGOGICAL KNOWLEDGE: PERCEPTIONS ABOUT MENTORING AT-RISK ADOLESCENTS

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ABSTRACT

Providing preservice teachers in urban settings with authentic educational experiences may be an effective approach in preparing them to teach diverse students. Therefore, this investigation examined preservice teachers' perceptions of mentoring at-risk high school students. Data analysis reflected preservice teachers' positive experiences and their role as future teachers. The social interaction with at-risk students fostered a deeper understanding of the importance of relationship building and helped to clear teachers' negative assumptions about at-risk students. This study suggests that preservice teachers in urban settings may enhance their pedagogical knowledge and course work learning by mentoring at-risk students.

Keywords: Disposition Development, Mentoring, Developing a Pedagogical Lens

Nationally, policy makers and practitioners face challenges in addressing the demand for preparing preservice teachers to succeed in diverse classroom settings (Barnes, 2006). Educator preparation programs must meet these challenges and equip preservice teachers with the necessary knowledge, skills, and dispositions (Akiba, 2011). Therefore, how can teacher preparation programs respond to this critical challenge? Mentoring at-risk students in urban settings may provide aspiring teachers with a realistic perspective on the challenges associated with teaching struggling adolescents.

The purpose of my investigation was to examine preservice teachers' perceptions about mentoring at-risk students and their influence on teachers' pedagogical knowledge. Personal interaction with adolescents may be a way to simulate future classroom challenges for preservice teachers and to better prepare them to meet the needs of diverse students (Garza, in press; Bullen, Faarruggia, Gómez, Hebaishi, & Mahmood, 2010). Although school/university-based mentoring initiatives for at-risk urban students have been successful and accepted as an approach to improve the educational preparation of aspiring teachers (Fresko & Wertheim, 2006), research that examines preservice teachers' development through mentoring at-risk students is limited.

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Youth Mentoring and Teacher Preparation

Youth mentoring, a process whereby a young person is guided, provided with instructional support, and encouraged by a much older peer or an adult, is common nationwide (DuBois & Karcher, 2005; Grossman & Rhodes, 2002). Effective youth mentoring relationships, based on mutual trust and empathy, may improve self-esteem, social skills, and academic experiences (Britner, Balcazar, Blechman, Blinn-Pike, & Larose, 2006; Rhodes, 2005; Schwartz, Lowe, & Rhodes, 2012; Schwartz, Rhodes, Chan, & Herrera, 2011). Although other researchers (Lee, Germain, Lawrence, & Marshall, 2010) have suggested that mentoring may influence mentors' perceptions and interactions with mentees and provide positive and valuable experiences for preservice teachers (Rose & Jones, 2007), improving the academic performance and success of the mentee (Dappen & Isernhagen, 2005; Wyatt, 2009) is generally the focus of school-based initiatives.

Mentoring programs for preservice teachers are introduced and developed through university and public school partnerships nation-wide (Huling & Resta, 2001). Research has suggested that programs that include mentoring and tutoring can expand preservice teachers' pedagogical knowledge, skills, and dispositions through practical experience (Fresko & Wertheim, 2001; Hedrick, McGee, & Mittag, 2000; McCluskey, Noller, Lamoureux, & McCluskey, 2004). For example, Bullen, Faarruggia, Gómez, Hebaishi, and Mahmood, (2010) reported that preservice teachers enhanced their pedagogical knowledge and improved their professionalism through their mentoring experiences. Some universities enrich preservice teachers' educational experiences through service-learning projects that include mentoring disadvantaged students (Keating, Tomishima, Foster, & Allessandri, 2002). One study (Hughes & Dykstra, 2008) involved 29 university students enrolled in an elective service-learning course that focused on mentoring students at a predominantly black urban high school. Preservice teachers developed a high comfort level interacting with students who were culturally different from them, improved their self-esteem as mentors, and recognized the challenges of teaching in an economically depressed environment. In a similar study (McCabe & Miller, 2003), 133 preservice teachers volunteered to mentor elementary children, predominantly located in high poverty environments. Preservice teachers enhanced their communication skills, improved their confidence as mentors, and adjusted their negative perceptions about economically-disadvantaged students.

In another study, university students participated in a service learning project that included mentoring as one aspect of the initiative (Meyer, 1997). Findings indicated that preservice teachers increased their confidence as mentors and cultivated genuine relationships with students. On a much larger scale, 299 preservice teachers volunteered to mentor lower middle class and poor students, ages 3-6, through the Perach Project in Israel (Fresko & Wertheim, 2006). Benefits included an increased empathy toward the students, knowledge about children, growth in problem-solving, and relationship building. While building self-esteem, developing cross-cultural appreciation, and improving communication skills were highlighted in these studies as benefits for preservice mentors, there is limited research about the pedagogical benefits for preservice teachers.

Methods

This qualitative study used a grounded theory approach and constant comparative analysis (Glaser & Strauss, 1967; Strauss & Corbin, 1998) to examine preservice teachers' written responses to an open-ended questionnaire about their experiences mentoring at-risk students. This interpretative study was framed within the theoretical underpinnings of a model of youth mentoring and the mentoring process (Bey & Holmes, 1992; Odell & Huling, 2000; Rhodes, 2005). Mentoring provides a model for one-to-one interaction, especially when assistance is lacking or inadequate, with the assumption that the protégé will gain support for growth and development (Caldarella, Gomm, Shatzer, & Wall, 2010; Cohen, 1999). *At-risk* in this study is defined as a freshman high school student consistently demonstrating academic difficulty in previous grade levels and/or failing to meet a passing standard on state-mandated assessments.

This investigation focused on the mentoring experiences of preservice teachers during their field-based internship. The following questions guided this study: 1) Does mentoring at-risk adolescents enhance preservice teachers' pedagogical knowledge and preparation? 2) Do preservice teachers perceive mentoring at risk-students as beneficial?

Participants

Participants, in their early to mid-twenties, included 47 high school preservice teachers, 21 females (2 African Americans, 4 Latinas, and 15 whites) and 26 males (1 African American, 6 Latinos, 18 whites, and 1 other), from different content areas enrolled in a field-based course at a large southwestern university. The participants were from middle-class backgrounds and included a married female student, and a single father. The field-based component was a requirement and students usually enrolled the semester before their student teaching practicum. Purposeful and convenience sampling (Creswell, 2007; Gall, Borg, & Gall, 1996) were used to identify the participants.

Procedures

The high school's academic dean selected the students (21 Latinos and 5 Whites) to participate in the mentoring sessions. Then the teacher candidates were randomly matched with one or two high school students because there were more adolescents than teacher candidates. As part of their field experience, the participants were required to meet every Tuesday for one hour at the school. The mentoring session times varied to avoid having the students miss the same class period every week. Although the participants were primarily responsible for helping their mentee with mathematics and reading comprehension, they also helped students to improve their study habits, to complete homework, or to improve any school-related learning skill. Since the field experience course was one semester, the at-risk adolescents had a different preservice teacher mentor the following semester.

Data Collection

Data were collected from an open-ended end-of-course survey that participants completed at the end of each respective semester (Marshall & Rossman, 1995). The

instrument included the following questions: (a) Considering your pedagogical knowledge, what aspects of your mentoring experience can you connect to teaching and managing students? (b) What are some positive aspects of your mentoring experience? (c) What are some challenges with our mentoring experience? (d) What else would you like to say about your mentoring experience?

Data Analysis

The data sources were analyzed using qualitative data reduction strategies in order to manage, categorize, and interpret data to identify themes (Marshall & Rossman, 1995). I started with open coding to sift through the data analytically and to reduce the concepts to identify their properties. As I separately read each group of surveys, I made handwritten notes and generated twelve preliminary categories after several readings. Then the preliminary categories were sorted using axial coding (Charmaz, 2006) and placed into six new subcategories. I then sorted and further reduced these subcategories using constant comparative analysis (Glaser & Strauss, 1967; Strauss & Corbin, 1998) and added descriptive statements taken from questionnaires to the new categories. A deeper analysis of the data was then performed by me by comparing initial codes, notes, and descriptive statements to generate the final three themes.

Discussion and Findings

My study suggests that a mentoring initiative implemented to provide instructional assistance to at-risk high school students in urban settings has the potential to enhance preservice teachers' pedagogical knowledge and preparation. Lee et al. (2010) agreed that practical experiences, designed to prepare preservice teachers to work effectively with a diverse school population are critical to their growth and professional development. Major findings encompassed three themes: (a) developing a pedagogical lens, (b) fostering relationships, and (c) developing dispositions. In the following section, I define the themes and expand on the pedagogical connections preservice teachers perceived as part of the mentoring process.

Developing a Pedagogical Lens

Developing a pedagogical lens refers to preservice teachers' emerging espoused belief about their role as a teacher. According to Sergiovanni and Starratt (2007), "An efficacious teacher believes that he or she has the power and ability to produce a desired effect" (p. 319). Teaching a diverse group of students, especially those who struggle or are reluctant to engage in the learning process, poses challenges for educators. Some participants mentioned the skills they used during the mentoring sessions (Meyer, 1997).

> I learned about dealing with students who claim they know the material, when they usually only know some part or aspect of it; I can evaluate how well they grasped the material much better, and have practiced some strategies that help determine how much progress they're making.

Employing effective strategies is one aspect associated with the complex dynamics of teaching. Therefore, a teacher must be very familiar with students' academic needs to influence success and achievement.

Another participant stated, "This experience has helped me see the way a student comprehends material. The strategies with scaffolding and prompting have helped with the mentoring process." This statement suggests that the one-to-one interaction with the mentee helped this preservice teacher to connect classroom instruction with practice, which in turn, promoted their social and cognitive growth and engaged them as active learners in the process (Schmidt, Marks, & Derrico 2004).

A majority of the preservice teachers reported that working with at-risk students was challenging but ultimately improved their learning. One participant said,

> It definitely made me aware of how much of a task it is to keep students focused and interested. It was a great hands-on approach to experience challenges and situations that may take place in a class setting. It is important to always have something for them to do so that they don't feel bored and can enjoy the class. Furthermore, it made it possible to see how relevancy is a big deal to the students.

This comment reflects the preservice teacher's reflection beyond the immediate context and suggests the impact on their lens as an educator (Caldarella et al, 2010).

Participants also commented on the effectiveness of using wait time with their mentee, establishing relevancy to maintain interest in the content area, and actively engaging the student for purposes of motivation. Mentoring adolescents provided a space for preservice teachers to explore the process of diagnosing students' needs, selecting the appropriate response, and employing appropriate interventions. These findings are in concert with research (Hedrick et al., 2000) that has supported hands-on-experience as a means to foster text-book learning.

Fostering Relationships

Fostering relationships refers to the notion of establishing rapport with students through meaningful interaction. An overwhelming majority of the participants perceived the mentoring experience as positive and rewarding (Rose & Jones, 2007). This finding is in concert with other research (Fresko & Wertheim, 2006; Grineski, 2003) that has suggested the importance of building trust and establishing a comfort level with students before learning can occur. One of the participants mentioned

> I saw that it was hard to connect with the student at first, but once I was able to find out what worked for us, we did great. I realize that I am going to have to do this with each of my students.

This comment reflects how the mentoring experience provided the context for preservice teachers to understand the critical nature of teacher/student relationships; it reveals a genuine caring attitude about the mentee, but more importantly, it suggests a reciprocal learning experience.

The participants also stated that the interaction with the mentee was beneficial to their pedagogical understanding consistent with findings from other research (Bullen, et

al., 2010; Garza, in press). For instance, one participant remarked, "I got to know one student much more intimately as far as their goals, ideas on education and their struggles." Another stated that he appreciated "getting to know how students feel about school, and knowing that I need to understand all students' home life and how it could affect school." These comments reflect preservice teachers' willingness not only to accept others, but also to recognize the uniqueness of their mentee. Mentoring at-risk students may promote a deeper understanding of the critical nature of a trusting relationship (Rhodes, 2005) and knowing the nuances of students can provide opportunities to validate students during the learning process (Gay, 2010).

The relationships that teachers establish with students influence students' perceptions about school and learning (Osterman & Freese, 2000). Getting to know students is a critical aspect of engaging students. "I learned that you have to make sure you connect with the students because if you don't they will close up and not want to talk" expressed another mentor. This suggests that preservice teacher mentors were excited and willing to connect with the at-risk adolescents. When teacher behavior reflected an attitude that was inviting and supportive, students were more apt to participate in the learning process because they wanted to be there (Garza, Ryser & Lee, 2009).

Developing Dispositions

Developing dispositions refers to preservice teachers' perceptions of at-risk students. Preconceived assumptions tend to influence what we think of those who may be economically, ethnically, linguistically, academically, and socially different from us. As a participant stated, "It was an experience where I got to build a relationship with a student that I would normally consider outside my circle. He changed my point of view about certain types of students." Preservice teachers experienced the relational aspects of teaching that helped them to adjust their personal assumptions about the adolescents (Hedrick et al. 2000). This insight is especially important because student mentoring can serve to establish a positive mental paradigm that can deter deficit thinking about struggling students (Garcia & Guerra, 2004).

Some participants recognized the uniqueness of students, resulting in a positive perspective toward them and others in general (Grineski, 2003; McCabe & Miller, 2003; Valverde, 2006). "It showed me that not necessarily all kids who fail the TAKS test [state assessment] are all-around academically challenged. She was extremely smart and driven," commented one participant. This statement reflects a shift from a negative conception about students who are labeled academically deficient. Preservice teachers who adjust their deficit thinking during their preparation phase may be more inclined to empathize with struggling students and help them to succeed (Crutcher, 2007).

Mentoring also provided a space for preservice teachers to engage in a personal approach to learn more about their mentee's personal life and consequently helped to change their initial perception. One of the participants explained:

> I was able to get her to open up about many things. When [I was] trying to teach her she said 'I just do not get it.' I tried different ways, and for some reason [or] other [they] worked better. She is a great student [who] just needs to be motivated.

Such comments support the need for teachers to build trusting relationships with students,

a necessary aspect of student success (Rhodes, 2005; Ripski, LoCasale-Crouch, & Decker, 2011). The majority of the participants embraced the opportunity to work with struggling adolescents and valued the mentoring experience. This is critical in the classroom because students who perceive an unresponsive teacher may become disengaged from the learning process, resulting in underachievement or leaving school (Kitano & Lewis, 2005).

Limitations

My study is limited by the gathering of data collected over two semesters at one large high school. Participants mentoring at-risk students in other educational institutions and geographical areas might encounter a different set of circumstances that may influence their perceptions and experiences. While the findings add to the extant literature on mentoring at-risk students, caution should be taken when generalizing the conclusions from this study to preservice teachers in diverse school settings due to the small sample size and interpretation of the findings. Finally, other researchers might label the themes differently.

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Concluding Thoughts

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Preservice teachers participated in a mentoring initiative that provided them with opportunities to interact emotionally, socially, and academically with high school students as a means to further their pedagogical knowledge. Developing quality educators requires a combination of course-work instruction and field-based experiences that provide preservice teachers opportunities to authentically apply their learning in urban settings. Requiring mentoring experiences with at-risk high school students may be an effective approach to enhancing preservice teachers' pedagogical knowledge and preparation (Fresko & Wertheim, 2001; Hedrick, et. al., 2000; McCluskey, Noller, Lamoureux, & McCluskey, 2004).

Although limited studies have addressed the connections of pedagogical knowledge to mentoring at-risk high school adolescents, research has suggested that mentoring can contribute to students' development (Garza, in press; Grineski, 2003). While working with at-risk students affords aspiring teachers a realistic perspective on the dynamics associated with teaching, student mentoring also contributes to their professional agency and provides a social space for them to interact successfully with students (Price & Nelson, 2011). These findings illuminate a potential approach to enhance preservice teachers' pedagogical knowledge and preparation, extending other research (Bullen et al., 2010) on effective ways to build preservice teachers' capacity. Therefore, it is important for preservice teachers to interact with at-risk adolescents as a starting point to acquire a possible profile of their future students and the challenges that may occur in the classroom.

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