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ADDRESSING DISPROPORTIONALITY IN THE SCHOOLS: PERCEIVED CULTURALLY COMPETENT PRACTICES AT A MIDDLE SCHOOL WITH AN ETHNICALLY DIVERSE POPULATION

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Andrea L. Mischka

College of Liberal Studies
Psychology / School Psychology

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ADDRESSING DISPROPORTIONALITY IN THE SCHOOLS: PERCEIVED
CULTURALLY COMPETENT PRACTICES AT A SCHOOL
WITH AN ETHNICALLY DIVERSE POPULATION

By Andrea L. Mischka

We recommend acceptance of this thesis in partial fulfillment of the candidate's requirements for the degree of Education Specialist in School Psychology.

The candidate has completed the oral defense of the thesis.

Jocelyn H. Newton, Ph.D.
Thesis Committee Chairperson

Betty V. DeBoer, Ph.D.
Thesis Committee Member

Dung Ngo, Ph.D.
Thesis Committee Member

Thesis accepted

Vijendra K. Agarwal, Ph.D.
Associate Vice Chancellor for Academic Affairs
ABSTRACT


Disproportionate representation of minority students in special education is an ongoing problem at both a national and local level. One way in which school districts can address disproportionality is through the examination of culturally competent teaching practices. This study compared teacher and student perceptions of culturally competent teaching practices at a middle school with an ethnically diverse student population, to determine future need for teacher multicultural professional development.

Teacher perceptions of multicultural teaching skill and knowledge were measured using the 16-item Multicultural Teaching Competency Scale (MTCS; Spanierman, et al., 2008). Multiple regression analyses were conducted to determine if teacher characteristics reported in the study (years experience and multicultural professional development within the past five years) predicted multicultural teaching skill and/or knowledge on the survey. Results indicated that a significant positive relationship existed between reported hours of professional development and MTCS Skill but not MTCS Knowledge. However, the combination of the variables years of experience and multicultural professional development did not predict either MTCS Skill or Knowledge.

Student perceptions of culturally competent practices within the school were measured using the Student Survey developed by the Minneapolis Public Schools Positive School Climate Team (Minneapolis Public Schools, 2007). An independent sample T-test was conducted to determine whether eighth grade students differed in their overall perceptions of the school’s cultural competence based on their race/ethnicity. Results indicated that white students responded significantly more positively than minority students suggesting that minority students may feel as though the school is less culturally competent when compared to white students. A one-way Analysis of Variance (ANOVA) was conducted to further assess on which items white students responded differently than minority students. Levene’s statistic was significant for a few of the items indicating that one of the assumptions of ANOVA was violated; however, results were interpreted due to the robustness of the ANOVA. Although the nature of the differences between scores varied, white students responded more negatively on three items while minority students responded more negatively on one item.

Results from this needs assessment provide implications for the use of perception data when evaluating the cultural competence of a school. The results should be interpreted with caution and combined with other data when making decisions regarding needs within a school.
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CHAPTER I
LITERATURE REVIEW AND STATEMENT OF THE PROBLEM

Review of Literature

History of Racial Inequity in Schools

The unequal placement of African American students in special education is one of the most complex issues that have been facing educators, administrators, and legislators since the racial desegregation of schools in 1954. In 1968 the Office of Civil Rights (OCR) began collecting data regarding special education placement in school districts based on race due to concerns that racial minority students are being over-identified as having mild mental retardation (Artiles et al., 2002). A series of court cases challenging special education placement and assessment of minority students followed to address issues related to race and special education, including Diana v. California State Board of Education, 1970; Larry P. v. Riles, 1972/1974/1979/1984; Mills v. Board of Education, 1972; and PASE v. Hannon, 1980 (Skiba et al., 2008). The first special education legislation, Education of All Handicapped Children Act (EHA), Public Law No. 94-142 was passed in 1975 in which concerns about racial equity were addressed; however, racial inequity in special education continues to be a concern (Skiba et al., 2008). With each updated bi-yearly national OCR survey, African American students continue to be over-represented in the special education categories of learning disabilities, mental retardation, and emotional disturbance and underrepresented in the gifted and talented category (Hosp & Reschly, 2004).
The 1997 and 2004 reauthorizations of the Individuals with Disabilities Education Act (IDEA) have attempted to address over and under-identification of minority students. Provisions to the act require “policies and procedures designed to prevent the inappropriate over-identification and disproportionate representation by race and ethnicity of children as children with disabilities” (Williams, 2007). In addition, states must collect and examine data to determine if disproportionality is occurring; disaggregate data on suspension and expulsion rates by race and ethnicity; and review and revise policies, practices, and procedures based on this data (Wisconsin Department of Public Instruction, 2006). Despite ongoing efforts at the state and federal levels to address disproportionate representation of minority students in special education since the 1960s, this continues to be a complex and ongoing issue facing educators today.

**Defining Disproportionality**

Disproportionality in special education is defined as the over or under representation of a demographic group in a special education or gifted program compared to the representation of this group in the overall student population (National Education Association, 2007; Skiba et al., 2008). According to IDEA 2004, each state must define the way in which they measure disproportionality as there is not a single defined way to measure it (National Education Association, 2007). The most common ways for states to measure disproportionality include the composition index, risk index, and risk ratio (Klingner et al, 2005; Skiba et al., 2008). The composition index is determined by dividing the number of students of a racial group in a disability category by the total number of students in that disability category (Klingner et al., 2005; Skiba et al., 2008). The risk index is computed by comparing the number of students of a specific racial
group in a disability category by the total enrollment of that racial group in the school’s population (Klingner et al., 2005). The risk ratio compares a group’s representation in special education to other ethnic group representation in special education, by comparing the risk index of one racial group to the risk index of another racial group (Klingner et al., 2005; Skiba et al., 2008; Wisconsin Department of Public Instruction, 2006). The risk ratio is the most common way for states to determine disproportionality, and is also used by the Office of Special Education Programs (Klingner et al., 2005).

In most states, African American and American Indian students are over-represented in some special education categories, Asian American students are underrepresented in most categories, and Hispanic students are over-represented in some states and underrepresented in others (National Education Association, 2007; Parrish, 2002). Of all of the ethnic groups, the most extensive disparity occurs with African American students being over-represented in special education categories in at least forty-five states (Parrish, 2002). African American students are over-represented in the “soft” disability categories of mental retardation, emotional disturbance, and learning disabilities (Artiles et al, 2002; DeValenzuela et al., 2006; Parrish, 2002; Skiba et al., 2008).

Factors Contributing to Disproportionality

Current research identifies failures of the general education system and early intervention services in terms of behavior and academics, school culture and curriculum, inequities in the assessment process, and the subjectivity of the “soft” disability categories as being potential sources leading to disproportionality (Coutinho & Oswald, 2000; National Education Association, 2007).
The school’s culture is argued to be one of the main contributors to disproportionality, as it affects all other areas including academic and behavioral expectations, instructional approaches, and the referral process. Most school cultures in the United States are based on the white majority culture, creating a discrepancy with minority student cultures (Blanchett, 2006; Harry & Klingner, 2006; Sheridan, 2000; Singleton & Linton, 2006). Students from increasingly diverse backgrounds are enrolling in public schools throughout the United States, while the majority of teachers continue to be white, middle class, and female (Artiles et al., 2002). Despite this increasing enrollment, some scholars feel that schools continue to operate on the concept of cultural hegemony (Harry & Klingner, 2006). This means that the culture, values, and beliefs of mainstream society, or white middle-class, influence practices throughout the school (Blanchett, 2006; Harry & Klingner, 2006; Sheridan, 2000; Singleton & Linton, 2006).

Many current teacher training programs and professional development do not formally address cultural differences to help teachers better understand and address cultural differences within the classroom (Blanchett, 2006; Singleton & Linton, 2006). As a result, students from different cultures, languages, and ethnicities may be forced to adapt to the white middle-class culture characteristic of many of the public schools in the United States (Blanchett, 2006; Harry & Klingner, 2006; Sheridan, 2000). Incongruent cultural backgrounds between minority students and school cultures may lead to misunderstandings in behaviors and underachievement, which may ultimately lead to special education referral (Artiles et al., 2002; Blanchett, 2006; Singleton & Linton, 2006).
Once minority students are referred for special education, they may be found to have a disability due to assessment procedures that do not take into account cultural differences. Personal and institutional biases may affect the evaluation procedures and identification of students specifically in “soft” disability categories, leading to a disproportionate number of minority students being labeled (Coutinho & Oswald, 2000; Harry & Klingner, 2006). Cartledge (2005) recommends that assessments for special education take into account the referring teacher’s cultural competence, ecology of the classroom, pressures within the school to identify the student, and whether or not instruction is presented at the student’s level. Assessment teams must minimize biases by evaluating cultural differences prior to referral, through using culturally competent assessment measures through the evaluation process, and evaluating the school’s overall cultural competence through teacher practices and beliefs (Cartledge, 2005; Harry & Klingner, 2006). It is also essential for teams to evaluate the emotional, cultural, and cognitive processes that may be influencing a student’s learning as trauma, poverty, race, language, and cultural beliefs may affect cognitive, academic, and behavioral assessment measures (Harry & Klingner, 2006). For example, some psychologists may use cognitive assessments that are not normed on students from linguistically or culturally diverse backgrounds, ultimately affecting the overall score that a student receives on the assessment (Harry & Klingner, 2006).

The extent to which teachers engage in culturally competent practices and instruction may affect student achievement in a particular classroom (Klotz & Canter, 2006). Factors that may be contributing to the student’s academic or behavioral difficulties in a particular classroom may or may not be present in a different
environment (Cartledge, 2005). When teachers do not take cultural differences in behavior and learning into account in their classroom, they may be more likely to refer a child for special education because a child may not be acting according to the majority culture standards (Harry & Klingner, 2006). Research by Harry and Klingner (2006) indicated that white and Hispanic teachers were more likely to refer a child for a special education evaluation, while Black teachers tended to refer students less often. They further analyzed the research on teacher referrals and concluded that approximately 90% of students referred were formally tested, and 73% to 90% of these students were found eligible for special education services. When teachers do not address different cultures through their instruction, minority students may be more likely to underachieve compared to majority peers (Harry & Klingner, 2006). This underachievement may also lead to increased special education referrals for minority students.

**Socioeconomic Status and Disproportionality**

Students from a low socioeconomic status (SES) are also at a higher risk for placement in special education. However, SES does not explain the underachievement and special education overidentification of black students compared to white students. According to the National Center for Education Statistics, when comparing parental income and race, white students whose parents make less than $20,000 performed higher on the SAT (SAT score of 976) than black students whose parents make more than $60,000 (SAT score of 942) (Singleton & Linton, 2006). On the 2009 National Assessment of Educational Progress, fourth grade African American students average score was 217, compared to white student average score of 250 and low socioeconomic status student average score of 229 (Gasper, 2009). Consistent with assessment data
from previous years, African American students performed lower than their white peers, as well as students of low socioeconomic status. Unfortunately much of the research does not disaggregate data by race as well as SES so it is difficult to assess the influence of both SES and race on achievement. While it is important for districts to individually assess the influence of poverty on its students and overall practices, the emphasis of this research will be on culturally competent practices within the schools as it is related to race/ethnicity.

**Effects of Disproportionality**

The current legal criterion requires students to be identified as having a disability before receiving special education services. Some teachers view special education as an avenue to help students with behavioral or achievement concerns compared to majority culture expectations. However, longitudinal studies of students in special education suggest that this placement does not always help students improve behaviorally or academically. Students identified as having a special education need are placed in more restrictive special education classrooms, receive stigmatizing labels, and have lower achievement standards and behavioral expectations than their peers (Artiles et al., 2002; Blanchett, 2006; Cartledge, 2005; De Valenzuela et al., 2006; Fierros, 2005; Green, 2005; Harry & Klingner, 2006; Klotz & Canter, 2006; Ming & Dukes, 2006; Skiba et al., 2006). Many students are not exited from special education programming once identified as having a disability, so this label follows them throughout their education (Artiles et al., 2002). Teachers and other school personnel may focus on this disability label and use it to develop lowered behavioral and academic expectations for students (Harry & Klingner, 2006).
African American students specifically are affected by this labeling system. Research has shown that African American students are more likely than white students to be placed in more restrictive educational settings when they have the exact same disability label (Parrish, 2002; Skiba et al., 2006). Once special education students are in the most restrictive placement settings they are not likely to be returned to a less restrictive placement (Cartledge, 2005). Parrish (2002) found that African American students in California were more likely than white students to be identified as needing intensive services (29% vs. 23%) and more likely to be placed in restrictive settings such as self-contained special education classrooms (37% vs. 24%). Data collected by De Valenzuela and colleagues (2006) from a large urban district revealed that African American, Hispanic, Native American and English Language Learner (ELL) students were placed in more segregated settings than white, Asian, other, and non-ELL students. A study conducted by Skiba and colleagues (2006) also had similar findings with African American students being over-represented in most restrictive settings compared to their peers.

Students who are placed in most restrictive settings have less of an opportunity to be educated with their non-disabled peers in a general education setting and are less likely to be exposed to the general education curriculum (Artiles et al., 2002; Harry & Klingner, 2006; Skiba et al., 2006). The most restrictive placement segregates African American students from their peers and increases the likelihood that they will receive a weakened curriculum compared to their peers (Blanchett, 2006; Fierros, 2005; Green, 2005; Skiba et al., 2006). This decreases academic and behavioral expectations for African American students contributing to poor educational outcomes evident in high
achievement gaps between minority and white students, and a high drop out rate for minority students (Blanchett; Harry & Klingner; Klotz & Canter, 2006; Ming & Dukes, 2006; Singleton & Linton, 2006).

**Addressing Disproportionality through Culturally Competent Practices**

Public schools must learn to adapt to minority students’ emotional, behavioral, and academic needs to help them succeed in the public school environment. Teachers, administrators, parents, and students must work together to create a school environment that responds to students’ and families’ racial and cultural needs, increasing what is referred to as the school’s “cultural competence.” Cultural competence is defined as a set of values and principles that influence attitudes, beliefs, policies, and practices and ultimately enables individuals to work together in cross cultural situations (‘Defining Cultural Competence,’ 2003; Klotz & Canter, 2006; National Center for Cultural Competence, 2007; Lindsey, Robins, & Terrell, 2003). Culturally competent practices in schools have been shown to increase the quality of services delivered to students and produce better student outcomes by meeting the needs of individual students (‘Defining Cultural Competence,’ 2003; Klotz & Canter, 2006; Lindsey et al., 2003). Ultimately culturally competent practices in schools will increase student achievement and decrease special education referrals.

Culturally competent practices can be addressed in three different areas: institutional, personal, and instructional (Richards, Brown, & Forde, 2007). The institutional dimension addresses district administration and school policies and procedures (Harry & Klingner, 2006; Klingner et al., 2005; Richards et al., 2007). The personal dimension reflects cognitive and emotional changes school personnel must face
to become culturally responsive (Klingner et al., 2005; Lindsey et al., 2003; Richards et al., 2007). The instructional dimension addresses the cultural competence of teaching strategies and materials (Klingner et al., 2005; Richards et al., 2007).

**Institutional Dimension of Culturally Competent Practices**

School policies and procedures need to reflect culturally responsive practices because they affect the overall atmosphere of the school, including teacher, parent, and student attitudes toward diversity. The school’s administration has control over the hiring of culturally competent staff, use of appropriate discipline procedures, retention policies, the use of appropriate interventions, curricular decisions, resource allocation, and interactions with parents (Harry & Klingner, 2006; Klingner et al., 2005). Priorities should be given to quality instructional time without interruptions, equitable access to high quality teachers, use of pro-active discipline policies, and building relationships with families (Klingner et al., 2005). Overall, the school should foster a positive relationship with students and families, so families feel comfortable at the school and in the community (Richards et al., 2007).

Administrative policies and procedures are also responsible for federal and state fund allocation. According to IDEA 2004, schools are responsible for providing early intervention services for at-risk minority students to decrease the likelihood of special education referral and increase the likelihood of success in the regular education environment (Artiles et al., 2002; Blanchett, 2006; Cartledge, 2005; Williams, 2007). Under IDEA 2004, Local Educational Agencies are mandated to allocate 15% of their Part B funds to provide Early Intervening Services to children in Kindergarten through twelfth grade who require academic and/or behavioral support to succeed within the
general education setting (Williams, 2007). These services could include family support and education, health services, academic instruction, and programs to address deficits in readiness skills (Cartledge, 2005). Culturally responsive administration will allocate these funds in the best way possible in order to meet the needs of students of diverse backgrounds.

**Personal Dimension of Culturally Competent Practices**

Teachers initiate most special education referrals and are responsible for the overall school climate, so schools must address the cultural competence of individual teachers (Cartledge, 2005). In order to increase the cultural competence of the people working in the schools, school personnel should reflect on their own culture and personal beliefs, and also learn about the beliefs, values, and traditions of the students’ cultures (Lindsey et al., 2003; Ming & Dukes, 2006; Richards et al., 2007; Santos & Reese, 1999). They may engage in activities such as classroom and individual discussions about cultural diversity, talk to students about their background, engage in self-reflection about culture, engage in different community cultural activities, and read about different cultures (Lindsey et al., 2003; Ming & Dukes, 2006). Teachers will be able to apply their own knowledge about culture to help students learn after they have engaged in these activities, ultimately increasing their cultural competence (Ming & Dukes, 2006).

**Instructional Dimension of Culturally Competent Practices**

In addition to institutional and personal dimensions, teaching strategies and materials within the classroom should also reflect culturally competent practices. Schools may adopt scientifically-based instructional practices shown to work with diverse students (Klingner et al., 2005). Culturally responsive teaching strategies include
acknowledging differences as well as commonalities, validating students’ cultural identity in teaching, educating students about diversity, building on students’ prior knowledge and experiences, and promoting equity and respect among classmates (Klingner et al., 2005; Richards et al., 2006). Teachers must also be prepared to sensitively address issues pertaining to diversity within the context of learning (Lindsey et al., 2003).

Educators must also evaluate the actual curriculum that they are using in the classroom. They should assess materials for culturally appropriate content, explain technical terms and jargon that students of different cultural backgrounds may struggle with, and evaluate the language and graphics of materials sent home to families (Santos & Reese, 1999). They may also use multicultural literature in their classroom to help children feel as though they belong and facilitate discussion about diversity (Ming & Dukes, 2006).

Teachers should work to develop culturally competent behavioral expectations, since behavior referrals are based on the subjective teacher decision to refer. This will ultimately decrease the likelihood of African American students being referred for a behavioral disability. Schools can provide systematic interventions to support and develop pro-social behaviors in students (Klingner et al., 2005). The use of positive behavior supports are also beneficial because they examine the nature of the behavior, the social contexts in which they occur, and also the interactions of variables within the school (Klingner et al., 2005). Within their classrooms, teachers should create a structured and disciplined classroom, learn how to make appropriate modifications in the classroom, and learn about resources available in the district to help them address these
issues (Cartledge, 2005). Each of these approaches focuses on pro-active measures adopted by the school and the teachers to help support diverse students within the classroom before a referral is necessary.

Disproportionate placement of minority students in special education may also improve, once culturally competent practices are addressed on institutional, personal, and instructional dimensions (Klotz & Canter, 2006; Ming & Dukes, 2006). Students and families will feel safe and welcome in their school, and feel as though their unique needs are being met (Bergstrom, Cleary, & Peacock, 2004; Ming & Dukes, 2006). In a culturally competent school, students will be given an opportunity to validate their ethnic identity and culture, as well as develop their identity within the school culture (Violand-Sanchez & Hainer-Violand, 2006). When students are given the opportunity to build upon their ethnic and racial identity within the school environment, some researchers argue that they experience increased self-esteem, academic achievement, and school commitment (Violand-Sanchez & Hainer-Violand, 2006).

**Statement of the Problem**

The school district of Waukesha is located 15 miles west of Milwaukee. It is the seventh largest district in Wisconsin, with over 13,000 students attending three high schools, three middle schools, seventeen elementary schools, and four charter schools. The focus of this needs assessment will be on Central Middle School. The 2008-09 population at Central Middle School included 585 seventh and eighth grade students. Of those students, 0.7% was identified as being American Indian, 3.9% Asian, 4.1% Black, 16.9% Hispanic, and 74.4% White (Wisconsin Information Network for Successful Schools, 2009). Within the school population, 11.6% of the students received special
education services; 31.6% qualified for subsidized lunch; 9.1% of the students were identified as being Limited English Proficient (LEP) Spanish and 2.7% were LEP for other languages (Wisconsin Information Network for Successful Schools, 2009). Data are not available regarding the socioeconomic status of students disaggregated by race/ethnicity.

The minority population in Central Middle School has increased over the past ten years, primarily with Hispanic and Black students. In the 1996-97 school year, 1.7% of the students were Black and 11.0% were Hispanic (Wisconsin Information Network for Successful Schools, 2009). This is an increase of 2.4% Black students and 5.9% Hispanic students over the past 12 years. During the 2000-01 school year, 15% of students were eligible for subsidized lunch or of low socioeconomic status, an increase of 16.5% in the past 8 years (Wisconsin Information Network for Successful Schools, 2009). Staff has also informally commented on the changing face of the population at Central and the challenges that come with adapting to a more diverse population.

Despite these increasing numbers of minority students at Central Middle School, minority students continue to underachieve compared to white students based on participation in advanced courses. During the 2008-09 school year, according to data collected by the school district, approximately 75 percent of the students in seventh grade advanced English and Math classes at Central Middle School were white, and approximately 90 percent of the students in eighth grade advanced classes were white. This indicates that 25 percent of the seventh grade students and 10 percent of the eighth grade students enrolled in advanced classes were non-white. When comparing this to the overall enrollment of 25 percent non-white students, minority students are under-
represented in eighth grade advanced courses but not in seventh grade courses. This suggests that students may enroll in advanced courses as seventh graders but then may not to continue to pursue advanced courses as eighth graders.

Minority students also underachieve compared to white students based on performance on the Wisconsin Knowledge and Concepts Examination (WKCE) at Central Middle School. In the area of Reading, 90% \((n = 581)\) of white and 91% of Asian \((n = 20)\) seventh graders performed in the proficient to advanced range; while the percentage of Hispanic students \((63\%, n = 74)\) and Black students \((75\%, n = 21)\) performing within the proficient to advanced range was lower (Wisconsin Information Network for Successful Schools, 2009). Similar scores were obtained in the area of Math when comparing the groups. In the area of math, 91 percent \((n = 523)\) of white 7th graders and 91% \((n = 20)\) of Asian students performed in the proficient to advanced range. This is higher than the percentage of Hispanic \((58\%; n = 69)\) and Black \((54\%; n = 15)\) students who scored in the proficient to advanced range (Wisconsin Information Network for Successful Schools, 2009). Similar scores were obtained for eighth graders with disparities between the racial categories on the WKCE test scores (Wisconsin Information Network for Successful Schools, 2009).

The entire School District of Waukesha has experienced difficulty adapting to the influx of minority students, particularly African American students. For the past three years, the Wisconsin Department of Public Instruction indicated that the district is disproportionate in the representation of African American students in the areas of Emotional Behavioral Disability and Other Health Impairment. More specifically, African American students are three times more likely than their white peers to be labeled
as having an Emotional-Behavioral Disability and be placed in special education programming, with a weighted risk ratio of 2.97 for the 2007-08 school year (Wisconsin Department of Public Instruction, 2008). In the 2007-08 school year, 2% of white students were identified as having an Emotional-Behavioral Disability, while 5% of African American students were identified with the same disability (Wisconsin Department of Public Instruction, 2008). African American students are two and a half times more likely than their white peers to be labeled as having an Other Health Impairment and be placed in special education, with a weighted risk ratio of 2.50 for the 2007-08 school year (Wisconsin Department of Public Instruction, 2008). In the 2007-08 school year, 1.4% of white students were identified as having an Other Health Impairment, while 3.6% of African American students were identified as having this disability (Wisconsin Department of Public Instruction, 2008). Data were not yet available regarding disproportionality statistics during the 2008-09 school year, but anecdotal information supports its ongoing problem.

As noted previously, 31.6% of the students at Central Middle School are eligible for free/reduced lunch, an increase of 16.5% since the 2000-01 school year. Data are not collected regarding the placement of students receiving free/reduced lunch (low SES) in special education as school districts are not required to report this to the Wisconsin Department of Public Instruction. Therefore, it is unknown whether or not students of low SES have a higher placement rate in special education in the School District of Waukesha.
Purpose and Significance of the Study

The purpose of this study was to compare teacher and student perceptions of cultural competence at Central Middle School to determine future need for the development of culturally competent practices. Teachers were asked to report on their knowledge and skills in cultural competence. Students were asked to report their perceptions of levels of teacher cultural competence, as well as whether they feel as though their race/ethnicity is represented in the school. The perceptions of teachers and students were analyzed based on years of teaching experience, hours of culturally competent professional development over the past five years, and by ethnicity of the student. The results may be used in combination with other data to help determine whether or not there may be a need for teacher professional development in culturally competent teaching practices.
CHAPTER II

METHODS

Participants

All staff at Central Middle School had the opportunity to participate in this study. This included the guidance counselor, social worker, special education teachers, and regular education teachers. In addition, 275 eighth grade students had the option of participating in this study. Eighth grade students were chosen as opposed to seventh grade students as it was many of the students’ second year at Central Middle School so they were better able to evaluate the school’s cultural competence than the seventh graders that had only been in the building for one semester.

Data Collection and Evaluation

Measures

Teachers completed the Multicultural Teaching Competency Scale (MTCS; Spanierman, et al., 2008). They were also asked the following information in a demographic survey: years of experience as a teacher, and number of multicultural professional development hours accrued during the past 5 years (Appendix A). The MTCS is a 16 item 6-point Likert scale in which teachers rated themselves on their perceived multicultural teaching competence in skills and knowledge. The scale ranges from a score of 1 (strongly disagree) to 6 (strongly agree), with higher total scores indicating higher levels of perceived multicultural teaching competence (Spanierman et al., 2008). The MTCS includes two subscales or factors: the Multicultural Teaching Skill
(MTCS skill) and Multicultural Teaching Knowledge (MTCS knowledge). The items on the MTCS Skill subscale focus on the actual implementation of culturally sensitive teaching practices. A higher score on this subscale indicates that a teacher perceives him/herself to be implementing culturally competent practices in the classroom. The items on the MTCS Knowledge subscale reflect teacher knowledge of culturally responsive theories, resources, and classroom practices. A higher score on this subscale indicates that a teacher feels as though he/she is knowledgeable of culturally competent practices and theories. The scale is intended to be an evaluation of practices in these two areas, however, cut-off scores are not provided to indicate what is considered to be a high or low level of cultural competence compared to a normative population.

Research evaluating the psychometric properties of the MTCS suggests that it is a reliable and valid measure of multicultural teaching skills and knowledge, although there are very few similar measures available for use and comparison. It was developed through conducting an exploratory factor analysis using a 56-item scale, the Multicultural Teaching Competency Scale-Preliminary (MTCS-P), with 248 pre- and in-service teachers (Spanierman et al., 2008). Items were retained as part of the final version of the MTCS scale if they loaded .40 or higher on only one factor and if their cross loadings on other factors were less than .25 (Spanierman et al., 2008). The results yielded two factors or subscales, MTCS Skill (10 items) and MTCS Knowledge (6 items), which compose the final MTCS scale (Spanierman et al., 2008).

In order to further examine the reliability of this two-factor structure, Spanierman and colleagues (2008) conducted a confirmatory factor analysis using 258 pre- and in-service teachers. This established that the two-factor model was a good fit for the data
and of superior quality to competing available models (Spanierman et al., 2008). The reported Coefficient alpha was .83 for the Multicultural Teaching Skills subscale, .80 for the Multicultural Teaching Knowledge subscale, and .88 for the complete scale (Spanierman et al., 2008).

The MTCS was then compared to similar measures of multicultural attitudes in order to establish validity of the measure. Responses on the MTCS were compared to the Teacher Multicultural Attitude Survey (TMAS), a previously established measure of teacher multicultural awareness (Spanierman et al., 2008). Correlations were significant between the two subscales of the MTCS, the overall MTCS score, and the TMAS, ranging from .42 to .53 (Spanierman et al., 2008). The MTCS was also negatively associated with measures of lack of racism awareness, social dominance orientation by among social groups, and social desirability (Spanierman et al., 2008).

In addition to the teacher scale, eighth grade students were asked to complete the Student Survey from the Minneapolis Public School (MPS) Positive School Climate Kit, First Edition (Minneapolis Public Schools, 2007). They were also asked to share their ethnicity or race on the survey, but were cautioned against providing any other identifying information (i.e., name, class, etc.) to ensure anonymity of responses. The MPS Positive School Climate Team (MPS PSCT) created this survey to examine student perceptions of experiences related to diversity in their school (Minneapolis Public Schools, 2007). The survey consists of 12 items in which students respond to each item by selecting one of three answers that they believe reflects their experience of diversity in school (Minneapolis Public Schools, 2007). Reliability and validity data are not available for this measure or other similar measures, as it is designed to examine practices and
inform schools about their own practices. However, individual item analysis of this survey suggests that it is an appropriate measure that assesses culturally competent school climate.

**Procedure**

The school psychologist researcher informed teachers of the opportunity to complete the scale at a faculty meeting. The researcher provided a packet of materials to the teachers at this meeting, including an informed consent letter, a demographic questionnaire (assessing teaching experience and multicultural professional development involvement), and the MTCS. The informed consent letter accompanying the packet explained to teachers that their participation is completely voluntary and would not affect their employment in the school district, and that they have the right to terminate their participation at any time (Appendix B). It also informed teachers that they would have the opportunity to win one of two gift cards to a local restaurant upon completion of the survey. Teachers returned their surveys to a box located in the main office. They returned the cover letter with a randomly assigned number written on it to a separate box, to allow for the gift certificate drawing and also ensure anonymity of the survey responses. A drawing was held two weeks after the return of the surveys and teachers were informed of the winning numbers so that they could retrieve their gift certificates.

Eighth grade students were asked to complete the Student Survey from the MPS PSCT regarding their perceptions of multicultural competence of Central Middle School staff. Parental consent was not formally obtained as this information could have violated anonymity of participant responses. It was essential to ensure anonymity of responses as participants were at risk for harm as their responses could have impacted future teacher
perception and treatment based on how students report teaching styles on the survey. Instead of formal consent, a parent notification letter was mailed home to parents two weeks prior to administration of the survey. Parents had the option of calling the examiner to ask questions about the survey or to request that their child not take the survey. Either an English version (Appendix C) or a Spanish version (Appendix D) was sent home, depending on the primary household language as indicated on district language survey questionnaires from the beginning of the school year.

Eighth grade students were administered the survey during one of their classes, based on administrative recommendations to the researcher during that time in the school year. The researcher gave each student a packet of information, including the survey, an informed assent letter (Appendix E), and a word search puzzle to work on if they chose not to complete the survey. Students also had the option of completing homework assignments if they did not want to complete the survey. The researcher then read a script that explained the informed assent form and instructions on how to complete the scale (Appendix F). Items on the survey were read aloud to the students as they completed each question. This minimized the potential effects of reading ability levels on responses to items. Those students who chose not to participate completed the word search puzzle provided to them or worked on an academic assignment. Students were given the opportunity to ask the researcher questions before and after administration in the large group, and privately afterwards upon request.

**Research Questions**

The following questions were developed to guide the study:
1. Do teacher characteristics measured in this study (years experience teaching and multicultural professional development within the past 5 years) predict self-perceptions of multicultural teaching skill?

2. Do teacher characteristics measured in this study (years experience teaching and multicultural professional development within the past 5 years) predict self-perceptions of multicultural teaching knowledge?

3. Do eighth grade students at Central Middle School differ in their overall perceptions of the school’s cultural competence based on their race/ethnicity?

**Hypotheses**

The null hypothesis for this study was that teacher experience and multicultural professional development did not predict self-perceptions of multicultural teaching knowledge and skills for Central Middle School staff; and students did not differ in their reports of school cultural competence as a function of their race.

Alternative hypotheses included:

1. Teacher characteristics (years of experience and/or multicultural professional development) predicted self-perceptions of multicultural teaching skill, therefore suggesting a need for more training in this area for less/more experienced teachers or those who have not received multicultural professional development.

2. Teacher characteristics (years of experience and/or multicultural professional development) predicted self-perceptions of multicultural teaching knowledge, therefore suggesting a need for more training in this area for less/more experienced teachers or those who have not received multicultural professional development.
3. Student race/ethnicity predicted scores on the student survey, suggesting that there is a need for professional development in certain cultures for Central Middle School Teachers based on student survey responses for specific ethnic/racial groups of students.
CHAPTER III

RESULTS

The current study assessed the need for professional development in the area of cultural competence for teachers at Central Middle School. Teachers and students at this school completed surveys in order to gain multiple perspectives on this need. The teachers completed the Multicultural Teaching Competency Scale (MTCS; Spanierman, et al, 2008), and also reported their years of teaching experience and number of hours of multicultural professional development completed in the past five years. Eighth grade students completed an adapted version of a student survey developed by the Minneapolis Public Schools Positive School Climate Team (MPS PSCT, Minneapolis Public Schools, 2007) and responded to demographic questions. This chapter begins with a description of the demographics of the population that participated in this research study, followed by the results of the preliminary reliability and main analyses.

Demographics

All demographic information was collected through teacher and student self-report. A total of 267 participants completed surveys for this study. Of this total, 20 participants were teachers (representing 35% of all teachers at CMS) and 247 were eighth grade students (representing 90% of all 8th grade students at CMS). Demographic information summarizing reported years of teaching experience are presented in Table 1. Teachers reported between 5 and 39 years of teaching experience, with 80% of teachers reporting between 10 and 29 years of experience.
Table 1. Teacher Reported Years of Teaching Experience (N=20)

<table>
<thead>
<tr>
<th>Reported Years Experience</th>
<th>n</th>
<th>Total Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>0-4 years</td>
<td>0</td>
<td>0</td>
</tr>
<tr>
<td>5-9 years</td>
<td>1</td>
<td>5</td>
</tr>
<tr>
<td>10-14 years</td>
<td>4</td>
<td>20</td>
</tr>
<tr>
<td>15-19 years</td>
<td>8</td>
<td>40</td>
</tr>
<tr>
<td>20-29 years</td>
<td>4</td>
<td>20</td>
</tr>
<tr>
<td>30-34 years</td>
<td>2</td>
<td>10</td>
</tr>
<tr>
<td>35-39 years</td>
<td>1</td>
<td>5</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>20</strong></td>
<td><strong>100</strong></td>
</tr>
</tbody>
</table>

Teachers reported between 0 and more than 25 hours of professional development within the past five years. Table 2 summarizes these reported hours of multicultural professional development, with 50% of teachers reporting between 0 and 4 hours.
Table 2. Teacher Reported Multicultural Professional Development Hours Within the Past 5 Years (N=20)

<table>
<thead>
<tr>
<th>Professional Development</th>
<th>n</th>
<th>Total Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>0-4 hours</td>
<td>10</td>
<td>50</td>
</tr>
<tr>
<td>5-9 hours</td>
<td>1</td>
<td>5</td>
</tr>
<tr>
<td>10-14 hours</td>
<td>4</td>
<td>20</td>
</tr>
<tr>
<td>15-19 hours</td>
<td>0</td>
<td>0</td>
</tr>
<tr>
<td>20-24 hours</td>
<td>1</td>
<td>5</td>
</tr>
<tr>
<td>25 or more hours</td>
<td>4</td>
<td>20</td>
</tr>
<tr>
<td>Total</td>
<td>20</td>
<td>100</td>
</tr>
</tbody>
</table>

Students self-identified their race and/or ethnicity on the survey, which can be broken into ten different categories. All students in the regular education setting, including special education students, had the opportunity to complete the survey. Students in the self-contained cognitive disability classroom, however, were not given the opportunity to complete the survey due to the nature of their disability. Sixty-seven percent of student participants identified as being White (n=165), 14% Hispanic (n=34), 3% Asian (n=8), 3% Black and White (n=8), 2% Black (n=5), 2% Hispanic and White (n=5), 1% Native American (n=2), <1% Native American and White (n=1), <1% White, Black, and Hispanic (n=1), and 7% of students did not identify a race (n = 18) on the survey. The representation of student participation in the survey is generally consistent with the overall racial breakdown of the student population in the school.
Survey Results

Preliminary Reliability Analyses

Reliability analyses were conducted for both scales used in this study in order to determine whether these scales could reliably assess student and teacher perceptions of multicultural teaching competence to effectively address the primary research questions of the current study. Results of these reliability analyses are summarized in the following paragraphs.

The Multicultural Teaching Competency Scale (MTCS; Spanierman, et al., 2008) was used in this study to assess teacher self-perceptions of cultural competence. Cronbach’s Alpha values were computed for the overall MTCS scale and each of the subscales. Internal consistency values for the subscales and the overall scale of the MTCS were consistently higher than those reported by the authors of the scale, and exceed the recommendation of .60 for measures intended for group purposes (Ysseldyke, 2007). Cronbach’s alpha for the sixteen items was .88, which indicates that the items form a scale that has reasonable internal consistency reliability. Similarly, the alpha for the MTCS knowledge subscale (.74) and the MTCS skills subscale (.83) indicated good internal consistency.

Cronbach’s Alpha values were also computed to assess the reliability of the Student Survey from the Minneapolis Public Schools Positive School Climate Team. Item 3 (“My teachers and other school staff make me feel accepted and a part of my school by…”) was not included in this analysis because it was qualitative in nature, and differed from the other likert-type questions on the scale. Acceptable internal consistency
values were found in this study for the overall scale (.88), with values above .60 considered to be within the acceptable range for group measures (Ysseldyke, 2007).

**Main Analyses**

The purpose of this study was to examine the need for teacher professional development in cultural competence based on teacher and student perceptions. Three questions were developed to direct this study and guide the analysis of data to address this purpose. These questions and their corresponding analyses are presented in the following sections.

All data were analyzed using Statistical Package for Social Sciences (SPSS) version 15.0. To address the first and second research questions, a multiple regression analysis was conducted. For this analysis, the dependent variables were: self-perceptions of the teachers’ multicultural skills, and self-perceptions of the teachers’ multicultural knowledge (as assessed by the MTCS). The independent variables were: years of experience and multicultural professional development. The level of significance used for this analysis was $p<.05$.

To address the third research question, a one-way Analysis of Variance (ANOVA) was conducted. For this analysis, the independent variable was student ethnicity. The dependent variable was the student perceptions of school cultural competence (as measured by the student survey). The level of significance used for this analysis was $p<.05$.

**Teacher Reports of Multicultural Teaching Skill.** The first research question developed to guide the analysis of data was: Do teacher characteristics measured in this
study (years experience teaching and multicultural professional development within the past 5 years) predict self-perceptions of multicultural teaching skill?

A multiple regression analysis was conducted to determine if teacher characteristics reported in this study (years experience and multicultural professional development within the past 5 years) predicted self-perceptions of multicultural teaching skill on the MTCS. Survey results from teachers who did not complete all of the items on the MTCS skill subscale (n=2, 10%) were excluded from the analysis. The means, standard deviations, and intercorrelations can be found in Table 3. Before interpreting the main analyses, intercorrelations between the three variables were examined to address potential issues of multicollinearity. These correlations indicate a significant positive relationship exists between reported hours professional development and scores on the MTCS Skill subscale, $r=.49$, $p=.02$. However, the combination of variables did not significantly predict multicultural teaching skill on the MTCS, $F(2,15)=3.35$, $p=.06$.  


Table 3. Means, Standard Deviations, and Intercorrelations for Scores on MTCS Teaching Skill as a Function of Teaching Experience and Professional Development (N=18)

<table>
<thead>
<tr>
<th>Variable</th>
<th>M</th>
<th>SD</th>
<th>1</th>
<th>2</th>
</tr>
</thead>
<tbody>
<tr>
<td>MTCS Teaching Skill</td>
<td>41.06</td>
<td>9.51</td>
<td>.15</td>
<td>.49*</td>
</tr>
<tr>
<td>1. Years Teaching Experience</td>
<td>4.33</td>
<td>1.24</td>
<td>--</td>
<td>-0.20</td>
</tr>
<tr>
<td>2. Hrs of Professional Develop.</td>
<td>2.56</td>
<td>1.95</td>
<td>--</td>
<td>--</td>
</tr>
</tbody>
</table>

*p < .05

**Teacher Reports of Multicultural Teaching Knowledge.** The second research question developed to guide the analysis of data was: Do teacher characteristics measured in this study (years experience teaching and multicultural professional development within the past 5 years) predict self-perceptions of multicultural teaching knowledge?

To address this research question, a multiple regression analysis was conducted to determine if teacher characteristics reported in this study (years experience teaching and multicultural professional development within the past 5 years) predicted self-perceptions of multicultural teaching knowledge on the MTCS. The means, standard deviations, and intercorrelations can be found in Table 4. Examination of intercorrelations among the three variables in this analysis revealed no significant correlations among any pair. According to the multiple regression analysis, this combination of variables did not significantly predict multicultural teaching knowledge on the MTCS, $F(2, 17) = 1.51$, $p = .25$. The adjusted $R$ squared value was 0.05, indicating that only 5% of the variance on
the MTCS multicultural teaching knowledge can be predicted by years of teaching experience and multicultural professional development within the past 5 years.

Table 4. Means, Standard Deviations, and Intercorrelations for Scores on MTCS Teaching Knowledge as a Function of Teaching Experience and Professional Development (N=20)

<table>
<thead>
<tr>
<th>Variable</th>
<th>M</th>
<th>SD</th>
<th>1</th>
<th>2</th>
</tr>
</thead>
<tbody>
<tr>
<td>MTCS Teaching Knowledge</td>
<td>25.35</td>
<td>4.43</td>
<td>.22</td>
<td>.28</td>
</tr>
<tr>
<td>1. Years Teaching Experience</td>
<td>4.25</td>
<td>1.21</td>
<td>--</td>
<td>-0.16</td>
</tr>
<tr>
<td>2. Hrs of Professional Develop.</td>
<td>2.65</td>
<td>2.03</td>
<td>--</td>
<td>--</td>
</tr>
</tbody>
</table>

**Student Reports.** The final research question was: do eighth grade students at Central Middle School differ in their overall perceptions of the school’s cultural competence based on their race/ethnicity?

To address this research question, an independent sample T-test was conducted. Due to low numbers of students of diverse races/ethnicity in this sample, the race/ethnicity variable was dichotomized for this analysis into two groups: white (n=165, 67%) and minority students (n=64, 26%). Survey results from the students who did not identify a race or ethnicity (n=18, 7%) were excluded from the analysis. Total scores on the student survey for white students were compared to minority student total scores. The two groups differed significantly in their responses on the survey, \( t(2.33), df = 214, p = .021 \). White students (\( M = 28.47 \)) responded significantly higher than minority students (\( M = 27.36 \)), indicating that white students responded more positively than minority students on the student survey.
A one-way Analysis of Variance (ANOVA) was conducted to further assess which items white and minority students responded differently on the student survey. Levene’s statistic was significant for a few of the items, indicating that one of the assumptions of ANOVA (homogeneity of variance across the two groups) was violated. However, Roberts and Russo (1999) have noted that the ANOVA test is fairly robust measure especially when group sizes are similar. Therefore results of this analysis will still be interpreted within this study. Table 5 shows the number of participants, the mean, and standard deviation for responses for each item. A different number of participants is listed for each of the items because some students omitted some of the items, so their answers could not be included in the analysis of that item or in the total survey score.

Analysis of these results revealed interesting findings in light of the fact that the t-test assessing the overall scale score indicated that white students responded more positively to items in general than minority students in this survey. Specifically, there were significant differences between white and minority students on four items, although the nature of these differences was varied. Of these four items, white students responded more negatively to three of them, and minority students responded more negatively to one. White students responded significantly more negative (lower) than minority students on item number 2, “I feel that students of my race or culture are respected and treated fairly in my school,” \( F(1,225) = 6.39, \ p = .01 \). The mean for the white students on this item was 1.53, as compared to the minority student mean which was 1.94. White students also responded significantly more negative (lower) than minority students on item number 4, “My teachers seem comfortable talking to and teaching students from my race and culture,” \( F(1,225) = 6.54, \ p = .01 \). The mean for the white students on this item
was 1.15, as compared to the minority student mean of 1.30. The third item in which white students responded significantly more negative (lower) than minority students was item number 9, “There are pictures, videos, or assignments in my class/school that relate to my culture or race,” $F(1,219) = 8.19, p=.005$. The mean for white students on this item was 1.20, as compared to the minority student mean of 1.38.

Minority students responded significantly more negative (lower) than white students on student survey item 10, “I would like more pictures, videos, or assignments that relate to my culture or race,” $F(1,221) = 31.68, p<.0005$. The mean for white students on this item was 2.46, as compared to the minority student mean of 1.84.
Table 5. Means and Standard Deviations for Student Survey Item Responses as a Function of Race (N=216)

<table>
<thead>
<tr>
<th>Item</th>
<th>White Students</th>
<th>Minority Students</th>
<th>Difference Between Means</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>n</td>
<td>M</td>
<td>SD</td>
</tr>
<tr>
<td>1</td>
<td>164</td>
<td>1.29</td>
<td>.69</td>
</tr>
<tr>
<td>2</td>
<td>165</td>
<td>1.53</td>
<td>1.06</td>
</tr>
<tr>
<td>3</td>
<td>111</td>
<td>5.44</td>
<td>1.28</td>
</tr>
<tr>
<td>4</td>
<td>164</td>
<td>1.15</td>
<td>.37</td>
</tr>
<tr>
<td>5</td>
<td>163</td>
<td>1.50</td>
<td>.51</td>
</tr>
<tr>
<td>6</td>
<td>164</td>
<td>1.43</td>
<td>.50</td>
</tr>
<tr>
<td>7</td>
<td>163</td>
<td>1.26</td>
<td>.44</td>
</tr>
<tr>
<td>8</td>
<td>164</td>
<td>1.65</td>
<td>.55</td>
</tr>
<tr>
<td>9</td>
<td>161</td>
<td>1.20</td>
<td>.40</td>
</tr>
<tr>
<td>10</td>
<td>161</td>
<td>2.46</td>
<td>.67</td>
</tr>
<tr>
<td>11</td>
<td>164</td>
<td>1.74</td>
<td>.89</td>
</tr>
<tr>
<td>12</td>
<td>165</td>
<td>1.41</td>
<td>.80</td>
</tr>
<tr>
<td>Total</td>
<td>158</td>
<td>28.47</td>
<td>3.09</td>
</tr>
</tbody>
</table>
CHAPTER IV

DISCUSSION

The current study was designed to compare teacher and student perceptions of teacher cultural competence at Central Middle School to help determine possible future need for professional development in culturally competent teaching practices. Teacher and student perspectives were both elicited in order to examine the need for professional development from multiple perspectives. These perspectives were obtained through the use of The Multicultural Teaching Competency Scale (MTCS; Spanierman, et al., 2008) and the Student Survey from the Minneapolis Public Schools Positive School Climate Team (Minneapolis Public Schools, 2007).

This chapter discusses the main findings of this study, the author’s reflection of the process, and an action plan for use of results by the School District of Waukesha and Central Middle School. This chapter also outlines methodological limitations of the current study, as well as suggestions for future research.

Preliminary Reliability Analyses

Preliminary reliability analyses for the overall MTCS and its two subscales supported Spanierman, et al.’s (2008) findings and met the recommended Cronbach’s alpha value .60 standard desired for measures to collect group data (Ysseldyke, 2007). While no previous research regarding the reliability of the Student Survey from the Minneapolis Public Schools Positive School Climate Team was available, preliminary reliability analyses in this study met the desired Cronbach’s alpha value of .60 supporting
its use for group data collection (Ysseldyke, 2007). This suggests that both measures are reliable measures for purposes of this study.

**Main Analyses**

The main analyses of this study were intended to provide information as to whether or not teachers at Central Middle School require additional professional development in the area of cultural competence. The following sections summarize teacher and student perceptions as reported on the MTCS and the Student Survey form of the MPS PSCT.

**Teacher Reports**

The combination of reported teacher characteristics (years experience teaching and multicultural professional development within the past five years) did not predict self-perceptions of Multicultural Teaching Skill and Knowledge as reported on the MTCS. This lack of a predictive relationship between teacher characteristics of professional development hours and years of teaching experience and the subscales of the MTCS may be because these characteristics simply do not predict cultural competence on the MTCS. Another reason for this lack of correlation between scores may be due to the subjectivity of the questions on the MTCS. When reporting teacher characteristics, especially the two assessed in this study, answers were more concrete and lacked subjectivity so teachers may have been more honest in their answers. In contrast, items on the MTCS evaluated perceptions of teaching cultural competence and allowed for more subjectivity in answering the items, therefore it is possible that they may have over or under estimated their abilities.
Additional analysis of correlations among the variables examined in this study indicated that reported hours of professional development in the past five years were significantly correlated with MTCS Skills subscale. Teachers who reported more multicultural professional development in the past five years rated themselves as being more cultural competent in the skills that they use in the classroom on a daily basis. This suggests that hours of professional development is correlated with perceived multicultural competence skills as measured on the MTCS.

Reported years of teaching experience did not correlate with either the MTCS Skills or Knowledge subscales. This suggests that years of teaching experience may not predict perceived culturally competent skills or knowledge as measured on the MTCS. Teaching experience did not predict MTCS Skills or Knowledge, but a correlational relationship was observed between hours of professional development and the MTCS Skills subscale. Hours of professional development may have predicted multicultural skills but not knowledge, because teachers may be doing certain activities within their classroom that are considered to be culturally competent without knowing the theory or reason behind these skills. The teachers may be using skills that they know work with diverse students based on their experiences and may unconsciously be applying information that they obtained through professional development to their practices in the classroom. It is important to note, however, this relationship is strictly correlational and does not indicate causation between professional development and multicultural teaching skills, so further exploration of this data is encouraged before making recommendations to the School District of Waukesha.
Student Reports

Students completed a survey in order to evaluate their perceptions of teacher cultural competence at Central Middle School. Responses were categorized by student reported ethnic group (White, Black, Hispanic, Native American, Asian, Black and White, Hispanic and White, Black/White/Hispanic, Native American and White). Some students chose not to identify a race or ethnicity on the survey, and their answers were not analyzed for the purposes of this study. Due to small numbers of respondents in each of the minority groups, results were analyzed based on the white student population compared to all other minority groups. Asian students were included with the minority students, despite data suggesting achievement rates similar to white students, because this assessment focused on assessment of culturally competent practices rather than achievement.

Results of analyses of student survey responses were inconsistent and should be interpreted with caution before making recommendations to the school district. Total responses on the student survey indicated that white students responded more positively than minority students suggesting that white students may feel as though the overall school climate is more culturally competent than do minority students. This may provide some support for previous research suggesting that schools operate on a white middle-class standard. However, item analysis was contradictory to these results with white students responding more negatively than minority students on three items: “I feel that students of my race or culture are respected and treated unfairly in my school;” “My teachers seem comfortable talking to and teaching students from my race and culture;” and “There are pictures, videos, or assignments in my class/school that relate to my
culture or race.” This suggests that when compared to minority students, white students may feel as though they are not treated fairly, that teachers do not feel comfortable talking to them, and that there are not assignments/pictures/videos relating to their race. White students may feel as though teachers are treating them differently when compared to minority students, or that teachers are attempting to reach out to minority students but are not reaching out to white students.

While minority students responded significantly more negatively on the overall scale when compared to white students, they only responded significantly more negatively on one item. The difference between scores between white and minority student scores on this item was much larger than the difference between scores on all other items, ultimately affecting the total score. Minority students responded significantly different than white students on the item “I would like more pictures, videos, or assignments that relate to my culture or race.” This suggests that minority may like to see their race/ethnicity represented more throughout the school. However, results on this item were contradictory to the in which White students responded significantly more negatively on a similar item (“There are pictures, videos, or assignments in my class/school that relate to my culture or race”). It may be that minority students responded significantly different because they were responding to only part of the question (i.e., videos, which teachers would not have created themselves).

Reflection of the Process

The overall process of conducting this needs assessment has been challenging but also rewarding. The most challenging aspect of the needs assessment was finding the time to complete it, being a new professional in the schools and balancing graduate
school with professional duties. In addition, it was difficult to find time for teachers and students to complete the surveys during the school day.

The most rewarding aspects of this survey were beginning the communication with teachers regarding disproportionality and culturally competent practices. In the months preceding this survey, the School District of Waukesha developed the District Equity Leadership Team (DELT) to address disproportionality, cultural diversity, and the revision of policies to address these issues in district. As a member of this team addressing these needs on a district level, it was rewarding to be able to introduce these concepts to teachers and begin this discussion. It was also rewarding to be able to elicit student opinions and help them feel as though their opinions are valued, as well as be able to recognize me as a person that they can approach with concerns related to diversity.

In reflection of the methods of the project, an online survey for teachers and students may have encouraged more participation. Teachers are accustomed to using their computer since much of the primary communication at Central Middle School is via electronic mail and also most of the district surveys are completed online. Teachers also may have been more likely to lose the paper copy of the survey that was given to them. Students are also accustomed to completing surveys on the computer, so this may have increased their engagement and participation.

An online survey would also have helped the researcher with the data collection and analysis. This would have helped the researcher summarize data in a more efficient manner, and decrease the amount of paper involved in this process.
Barriers and Limitations

The evaluation of culturally competent teaching strategies from a teacher and student perspective was beneficial in helping to increase awareness of these concerns. It was also beneficial to begin collecting perception data from teachers and students as this data has not been previously collected by the district. The district may choose to use measures similar to these to continue to collect perception data regarding culturally competent practices. However, conclusions cannot be drawn from these data due to a lack of significant results and methodological issues related to collecting perception data and analyzing results of minority students in one group.

One of the main limitations of this study involves the instruments themselves, in that this study solely evaluates teacher and student perceptions. The actual use of culturally competent practices from another person’s perspective or observation is not addressed, so this study relies on the opinions of those involved. Research involving perception depends on how a person feels on a particular day and how they choose to respond to items. Even though surveys are anonymous, they may consciously or unconsciously respond more positively in order for others to view them in a more positive light. In addition, the surveys did not provide normative data to indicate what score would be a high, average, or low level of multicultural competence so it is unknown how teachers at Central Middle School compare to a nationwide population of peers.

Another limitation is related to the small number of participants involved in this study. Less than half of the teachers at Central Middle School responded to the survey, which may affect total scores and analysis of the data. Those teachers with a particular
interest in cultural competence or those who are more involved in the school may have chosen to complete the survey. This could have increased overall scores of perceived cultural competence in the surveys because these teachers would have engaged in more self-study and professional development than other teachers in the school. They also may have known how to answer the questions in order to make themselves appear to be more culturally competent.

Another limitation related participants is that a limited number of students in any minority category responded to the survey. Minority students were grouped into one category rather than being analyzed separately due to the limited number of students in any one category, in order to provide more reliable and valid results for use in this study. This does provide some limitations, however, in that responses of a particular minority group are not known. Specifically analyzing the responses of Black students would have provided valuable insight and data into addressing disproportionality since student perceptions of school climate related to culture, race, and ethnicity have not yet been gathered.

Research such as this involves a large financial and time commitment by the district to addressing this issue of culturally competent practices and the broader issue of disproportionality. With other district initiatives currently as priority, it may be difficult for teachers and administrators to find time in their busy schedules to learn about and address culturally competent practices from multiple perspectives using multiple sources of data.
Action Plan and Recommendations

The data collected and analyzed from this needs assessment may be shared with the Student Services Team at Central Middle School; including the Principal, Assistant Principal, Guidance Counselor, School Social Worker, School Nurse, and At-Risk Teacher. This team may use this information to brainstorm ways in which they may want to further investigate the possible need for professional development in cultural competence at Central Middle School.

Data from this needs assessment may also be shared with the District Equity Leadership Team (DELT). This team was developed during the 2008-2009 school year in order to address racial diversity and disproportionality on a district level, and will continue to be active within the district in the following years. The team may use this information to brainstorm methods to collect further data on cultural competence on a district-wide level. Further assessment of Central Middle School and other schools in the may help the DELT with addressing district-wide issues related to professional development of cultural competent practices.

Future researchers may want to evaluate each dimension of cultural competence, including the institutional, personal, and instructional dimensions. It may be beneficial to collect perception data specifically from African American students. Parent and community participation would also be essential to evaluate how they feel about the school’s climate. Future researchers also may want to evaluate district data related to disproportionality and reasons the district has been named disproportionate by DPI. These data may be dependent on specific schools, teachers, or special education evaluation practices.
Conclusions

Data collected from this study indicated a relationship between self reported teacher professional development and self reported perceptions of multicultural teaching skills. This study also provided some evidence that minority students may feel their school is less culturally competent than white students, although inconsistencies among similar items make this unclear. The school district is encouraged to use results of this study with caution, and collect additional data from multiple schools and perspectives before moving forward with requiring multicultural professional development for teachers.

Central Middle School, the School District of Waukesha, and school districts with increasing numbers of minority students may want to formally and informally assess the cultural competence of their schools from institutional, instructional, and personal dimensions. The perceptions of teachers, students, parents, and community members are an essential piece of data as they can provide valuable insight regarding their feelings and experiences with the schools. In addition to perception data, it is essential for districts to also collect concrete data related to practices and policies within the district and schools. Research has long supported the findings that all students can learn, regardless of race and ethnicity, and it is the duty of the school systems to provide opportunities for all students to succeed.
REFERENCES


APPENDIX A

TEACHER DEMOGRAPHIC SURVEY
Teacher Demographic Survey

Years Teaching Experience

_____ 0 to 4
_____ 5 to 9
_____ 10 to 14
_____ 15 to 19
_____ 20 to 29
_____ 30 to 34
_____ 35 to 39
_____ 40 +

Hours of Multicultural Professional Development in the Past 5 Years

_____ 0 to 4
_____ 5 to 9
_____ 10 to 14
_____ 15 to 19
_____ 20 to 24
_____ 25+
APPENDIX B

TEACHER INFORMED CONSENT STATEMENT
The Multicultural Teaching Competency Scale

This survey is designed to be a self-assessment of perceived multicultural teaching competency with no correct or incorrect answers. The information that you provide will remain anonymous and confidential. Your responses will help determine future professional development opportunities offered in our school district so your honest input is encouraged and appreciated.

Informed Consent Statement

The purpose of this study is to help determine if a need for professional development regarding cultural competence exists at Central Middle School. This consent requests your voluntary participation and permission for the researcher to analyze your responses. Your participation will involve minimal risk to you. The following procedures will be taken to insure your protection against all risks.

Voluntary Participation

1. Your participation is voluntary and will not influence your employment in any way. You have the right to choose to participate and withdraw your participation at any time.

2. All responses will be kept confidential. Your data will only be accessible to those people involved in the research of the study.

3. All participant information will be kept confidential. You will be asked to provide information regarding your years of teaching experience and number of multicultural professional development hours accrued in the past 5 years. You will not submit your name or any other identifying information on the survey.
Benefits

1. The primary benefit will be personal insight into your own level of cultural competence through honestly answering each of the items. You may also obtain insight into your work with students of diverse backgrounds.

2. Another potential benefit of completing the survey honestly is determining whether or not there is a need for professional development in culturally competent practices at Central Middle School.

3. The final benefit is the opportunity to win one of two $25 gift cards from La Estación Restaurant. If you would like to be eligible for this, please remember the number in the upper right hand corner of this letter. Please be sure to return your letter with your survey to designated boxes located outside of Andrea Mischka’s office. Two numbers will be drawn no later than two weeks after the survey deadline and the winners will immediately receive their prize.

Cost

There is no monetary cost to participate in the survey. Each participant will invest approximately 15 minutes of his or her time to complete the survey.

Contact Information

If you have any questions or concerns regarding this research study or your participation, please contact Andrea Mischka at (262) 970-3144 or amischka@waukesha.k12.wi.us. My thesis chairperson is Dr. Jocelyn Newton, newton.joce@uwla.edu.

You may also contact the University of Wisconsin – LaCrosse Institution Review Board (IRB) regarding human participation in research. The IRB contact information is:
APPENDIX C

INFORMATIVE LETTER TO PARENTS - ENGLISH
Dear Parent/Guardian,

Central Middle School is determining whether a need for teacher professional development exists regarding multicultural competence. As part of this determination, your child will be asked to respond to 12 questions about how they feel teachers at school interact with students.

Your child’s responses will remain anonymous and confidential, as they will be instructed not to write their names or identifying information on the surveys. Teachers will not have access to answers on individual surveys. Participation will not affect your child’s grades in any way. He/she will be given the choice to respond to these questions, to work on a word search puzzle, or work on a homework assignment. The survey will be given no later than two weeks from the time this letter was mailed and will be completed during the school day. It will take about 20 minutes of time.

Please contact Andrea Mischka at (262) 970-3144 or at mischka.andr@students.uwlax.edu with any questions or concerns that you may have regarding this or if you would not like your child to participate in the survey.

Sincerely,

Andrea Mischka, M.S.Ed.
School Psychologist
Central Middle School, School District of Waukesha
University of Wisconsin-LaCrosse, Graduate Student
25 de febrero de 2009

Estimados Padres,

Central Middle School va a examinar las prácticas multiculturales y va a determinar si una necesidad para el desarrollo profesional para los maestros existe con respecto a la competencia multicultural. Para ayudarnos a determinar esto, su hijo será pedido responder a algunas preguntas.

Las respuestas serán mantenidas confidenciales y anónimas. Los maestros no van a leer las respuestas y no afecta la nota en sus clases. Su hijo será dado la elección a responder a las preguntas o trabajar en un juego de sopa de letras si no quieran responder. Este ocurrirá en dos semanas y será hecha durante el día escolar por 20 minutos.

Si usted tiene cualquier pregunta o si no quiere que su hijo no participe, usted podría llamar a Andrea Mischka a (262) 970-3144 o mischka.andr@students.uwlax.edu.

Atentamente,

Andrea Mischka, M.S.Ed.
Central Middle School, Psicologa escolar
La Universidad de Wisconsin en LaCrosse
Student Assent

I understand that I am not required to answer these questions. If I choose not to answer them, then I will work on the word search in this packet or on a class assignment. I understand that if I choose to answer the questions, my answers will remain confidential. No one will know what I personally wrote because I will not write my name on the survey. I understand that I am being asked to answer these questions to help people better understand how teachers interact with students at Central Middle School.
APPENDIX F

SCRIPT FOR ADMINISTERING STUDENT SURVEY
The following will be read to the class by the researcher:

You are being asked to answer questions about how teachers interact with students at Central when it comes to different ethnicities and cultures represented throughout the school. Your parents have been notified that you will be participating in this survey only if you want to. If you do not want to answer the survey, you can complete the word search in this packet or work on a class assignment. If you want to answer the survey, you can keep the word search to work on later.

All of your answers will be kept confidential, meaning that no one will know how you responded to them. No one in school will ask you how you answered the questions. You should also respect your classmates and not ask how they responded, and keep your answers to yourself.

There are no right or wrong answers as this is not a test. You should answer what you think is the best answer to each question based on your experiences. It will not be scored and you will not receive a grade. Please answer honestly. This survey is important in looking at the environment at Central Middle School and in helping all students feel comfortable here.

Please turn to the page titled Student Assent and I will read this to you (researcher will read this statement). If you want to respond to the questions, turn to the next page titled Student Survey now. If you choose not to respond to the questions then you may turn to the word search now and work on it.

For those of you who would like to do the survey, I will read it out loud to you. Please put your ethnicity and grade at the top. Now I will read each question and each of the responses. If you want me to slow down or if you have any questions, you may raise your hand or ask me privately afterwards.

The researcher will then read the survey. When the survey is finished the researcher will have the students turn their surveys upside down on their desk and pick up the surveys.

The following will be read after the survey has been completed:
Thank you for taking the time to respond to these questions. I appreciate your help. Have a great day!