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Scott M Ronspies, Eastern Illinois University



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Middle School Students' Perceptions of Coeducational and Same-Sex Physical Education

Scott Ronspies, Ph.D.

Department of Kinesiology and Sports Studies
Eastern Illinois University
sronspies@eiu.edu

Matthew Madden, Ph.D.

Department of Movement Studies & Wellness Education
Pacific Lutheran University
maddenmd@plu.edu

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Abstract

The prevalence of obesity and sedentary behaviors among children and adolescents is increasing at an alarming rate. The obesity epidemic is reaching proportions never seen across our nation. Therefore, the purpose of this study was to examine middle school students' perceptions of coeducational and same-sex physical education classes. The study consisted of 3 girls and 3 boys 12-13 years old. One-on-one semi-structured interviews were conducted with each participant to gain an understanding of their perceptions of physical education (P.E.) classes that were coeducational and same-sex in nature. The results indicated that middle school students shared a variety of perceptions concerning class structure, regardless of gender. Two of the three girls preferred coeducation P.E. versus same-sex P.E., boys felt they tried harder in same-sex P.E., girls were more embarrassed to make mistakes in coeducational P.E. class, and boys felt they learned more physical education content in same-sex P.E. In conclusion, it seems logical for schools to offer physical education experiences that are both coeducational and same-sex. Students agreed that both coeducational and same-sex physical education had pros and cons, and the interests of students were not met in just one class structure. The ultimate goal of any school curriculum should be student learning in an environment that is safe and positive for the students.

Key Words: Physical Education, Middle School, Qualitative Research

Introduction

The prevalence of obesity and sedentary behaviors among children and adolescents is increasing at an alarming rate. This epidemic is reaching proportions never seen across our nation. According to the National Health and Nutrition Examination Survey (2003-2004), it is estimated that about 17% of children (6-11 years) and adolescents (12-19 years) are overweight (Center for Disease Control & Prevention, 2010). The accelerating rate of youth obesity indicates that this generation of children and adolescents will grow into the most overweight generation of adults in U.S. history (Guo, 1994).

Regular physical activity is related to a decrease in chronic diseases and associated risk factors (Sirard & Pate, 2001). Physical activity is critical to any consideration of youth obesity. The President's Council on Physical Fitness and Sports (2001) recognized that 10,000 steps a day was likely to be too low for a youth population. The council recommended that 11,000 steps (girls) and 13,000 steps (boys) be taken at least 5 days a week for a standard health base of fitness. Measuring activity levels with pedometers is a practical means to determine the amount of steps an individual accumulates in a given time period. Hannon and Ratliffe (2005) compared step counts per minute of students who participated in coeducational and same-sex physical education classes. The purpose of the study was to investigate the effects of game-play settings on activity levels of middle school students. Students were engaged in flag football, soccer, and ultimate Frisbee. Boys, on average, had higher step count totals than girls in all settings. There were no differences in activity levels for girls between coeducational and same-sex game-play settings. There was evidence that in the ultimate Frisbee and soccer units, boys in same-sex settings were less active than were boys in coeducational settings. The results from this study

indicated that it is important to understand the physical education classroom environment and how students perceive it.

In terms of youth activity levels and obesity, it may be important to consider the factors in physical education that influence students' activity levels and interests. In addition, no studies of physical activity in coeducational and same-sex settings have taken into consideration the effects of variables such as teacher interaction and student preferences (Hannon & Ratliffe, 2005). It is possible that physical activity could be affected more by variables external to the setting itself.

Furthermore, the students' voice is often neglected when schools are developing physical education curriculum. The school district, the administration, and the teachers are often the sole voice in determining the curriculum. This method of developing and structuring classes may cause students to develop negative perceptions concerning physical activity, and contribute to the growing epidemic of youth obesity and sedentary behaviors because students may feel their individual needs and interests are not being met by the curriculum.

Therefore, the purpose of this qualitative study was to examine middle school students' perceptions of coeducational and same-sex physical education classes. The research question that guided this research was: What are middle school students' perceptions of coeducational and same-sex physical education classes? Specifically, this study investigated which class structure students preferred most, perceptions of the learning environment, and the social impact each class structure had on various students. The goal was to collect students' perceptions of physical education classes that were coeducational and same-sex in nature, and how the two learning environments affected class member dynamics. This study will add to the literature currently addressing the topic of coeducational and same-sex physical education by focusing on the

environmental and instructional variability between the two class structures, how students perceived these differences, and isolating the specific effect of coeducational and same-sex physical education on students' involvement during class.

Literature Review

Title IX Impact

Title IX (1972) required students to be organized by ability, not gender, and changed the face of physical education in four specific ways: 1) classes became coeducational, 2) teachers were assigned classes according to students' skill levels rather than by gender, 3) student grouping was based on ability rather than by gender, and 4) boys and girls had equal access to the entire physical education curriculum (Siedentop, 2004). Two exceptions to gender segregation are stated in Title IX. Physical education classes may be separated by gender when the focus and intent of the class involves bodily contact or human sexuality (DOE, 2002). Prior to Title IX, middle school physical education classes were traditionally separated by gender and elementary classes were coeducational (Department of Education [DOE], 2002). When the United States Congress passed Title IX (1972), secondary physical education was suddenly thrust into the realm of coeducational classes. The passage of this law created curriculum planning and teaching difficulties. The teachers were ill prepared to handle the changes and the demands required to make classes coeducational.

Student Perceptions & Preferences

The perceptions of middle school students have been investigated in relation to changes in curriculum as a result of Title IX. Middle school students have been shown to prefer same-sex physical education classes (Derry, 2002; Derry & Phillips, 2004; Lirgg, 1993). When examining students' perceptions, Olafson (2002) concluded that adolescent girls disliked physical education

because it was embarrassing and they felt inferior to boys. Girls suggested creating same-sex physical education classes to boost their attendance and enjoyment levels. Middle school girls who preferred same-sex classes to coeducational classes were typically those who perceived their ability and skill levels to be below the levels of the other girls (Lirgg, 1993). Boys in same-sex classes had lower confidence levels than boys in coeducational classes. Lirgg also found boys in the coeducational class were more confident in their ability to learn basketball skills than boys in same-sex classes. Derry and Phillips (2004) reported that students enrolled in same-sex classes had significantly more teacher interactions and engaged skill learning time. Girls in same-sex classes approached their teachers more often and asked more questions than those in coeducational classes. Girls in same-sex classes spent 47.3% more time actively participating or engaged in learning as compared to coeducational classes.

Osborne, Bauer, and Sutliff (2002) found preferences for coeducational or same-sex classes to be situational based. Even though students enjoyed interacting with members of the opposite sex, they were concerned about the privacy of personal issues when in proximity to the opposite sex. Girls stated they were unwilling to talk openly about issues relevant to females because they thought members of the opposite sex would look down upon them. Girls indicated they were not as satisfied with the effort and cooperation levels of the opposite sex during activity. The girls thought the boys were less cooperative, while the boys believed the girls were not putting forth enough effort during activity. Both sexes agreed that football and wrestling were better suited for an all boys' class, while flexibility and low intensity activities, such as gymnastics and volleyball, were better suited for an all girls' class.

Derry (2002) concluded that students are more likely to choose a partner of the same-sex when given student choice in physical education. Girls in this study reported a preference in

choosing another girl to be a partner because they seem to be more considerate and tend to be on the same ability level. The girls also recognized feelings of athletic superiority, as well as the obvious physical size and strength differences between males and females, which caused most girls to feel a sense of intimidation.

Treanor, Graber, Housner, and Wiegand (1998) examined middle school students' perceptions and found that boys perceived themselves to have more skill, strength, and muscular endurance than girls. Girls perceived themselves to be more overweight than boys. Boys, in general, enjoyed physical education more so than girls, while girls exhibited a systematic decrease in enjoyment of physical education from 6^{th} to 8^{th} grade.

Curriculum Considerations

Greenwood and Stillwell (2001) agreed that it seems logical to provide physical education experiences that are both coeducational and same-sex. From their findings, both genders agreed that coeducational settings would work for table tennis, track & field, and softball. Boys preferred all male classes for archery, basketball, football, soccer, and wrestling. Girls preferred all female classes for activities such as basketball, soccer, swimming, tennis, volleyball, and gymnastics.

The evidence from the literature suggested a wide range of preferences among middle school students. School curriculums may address this diversity in preferences by offering classes that are structured from both a coeducational and same-sex perspective. It should be the goal of any physical education curriculum to promote an understanding and involvement in physical activity for a lifetime so students can actively engage in activity that interests and benefits their well-being.

Methodology

Qualitative Tradition

"Qualitative research is an umbrella concept covering several forms of inquiry that help readers understand and explain the meaning of social phenomena with as little disruption of the natural setting as possible" (Merriam, 1998, p. 5). The present study paralleled the concepts of a phenomenological study. "In the conduct of a phenomenological study, the focus is on the essence or structure of an experience" (Merriam, 1998, p. 15). This study examined middle school students' perceptions of participating in both coeducational and same-sex experiences in a physical education curriculum.

Theoretical Perspective

"The theoretical perspective provides a context for the process involved and a basis for its logic and its criteria" (Crotty, 1998, p. 66). Interpretivism attempts to understand and explain human and social reality. "The interpretivist approach looks for culturally derived and historically situated interpretations of the social life-world" (Crotty, 1998, p. 67). The goal of the present study was to incorporate the interpretivism perspective in examining the data from middle school students, and to understand how physical education experiences are perceived through student responses of various situations in a physical education curriculum.

Research Stance

As K-8 coeducational physical education teachers of eight years, it was concluded from our experiences with students that coeducational classes were beneficial for both genders in terms of activity levels, enjoyment, and willingness to participate. Coeducational classes assisted students in developing an understanding the importance of personal and social responsibility through physical activity. Through this study, gaining a more thorough understanding of

students' perceptions of coeducational and same-sex classes in a physical education curriculum, and how the class structure affected the learning environment for students was the main focus. In addition, students' activity level in the two learning environments was a secondary focus in this research.

Participants & Setting

The participants were six 8th grade middle school students (three girls, three boys) who were 12-13 years old. Participants were selected based on the middle school physical education teachers' recommendations for providing quality data that would assist in answering the research question. Participants had experiences in both coeducational and same-sex physical education classes, and the participants were comprised of various skill levels. Same-sex classes were offered at the school for students in sixth and seventh grade, and coeducational classes were offered in eighth grade. Students were selected based on their interest in volunteering for the study about their individual perceptions of physical education classes. Parental consent and child assent forms were given to the students, and the first 6 students identified by the teacher that completed and returned the forms were participants in the study. The six students were enrolled in a Midwest school district.

Data Collection & Analysis

The physical education teacher distributed the parental consent and child assent forms to interested students. A one-on-one interview with each of the six participants was the primary method of data collection. Furthermore, semi-structured interviews were conducted as defined by Merriam (1998). The semi-structured interview protocol was implemented because it "allows the participants to talk about their experiences and feelings" (Kvale, 1996, p. 124) of physical education classes. "The important point is to describe the meaning of a small number of

individuals who have experienced the phenomenon" (Creswell, 1998, p. 122). Digital audiotaped interviews were conducted with each student for 20-30 minutes in the physical education office. Each student was asked a series of descriptive and open-ended questions (Appendix A) about physical education experiences that were both coeducational and same-sex in nature. The interviews offered an insight into participants' perceptions of the two types of classes and how each impacted their perceptions of physical education. The questions were structured in a manner that allowed the participants to understand and answer them thoroughly. The interview protocol was designed to allow students to feel comfortable discussing their experiences in physical education, and not feel intimidated to answer the questions openly and honestly. Interviews were transcribed verbatim following the completion of the six interviews.

A thematic analysis was employed to identify common and emerging themes from the participant interviews concerning their perceptions of coeducational and same-sex physical education classes. In addition, direct interpretation, or drawing mean from a single instance or statement, was completed with each interview (Creswell, 1998).

Trustworthiness

Trustworthiness in qualitative research has different meanings from validity and reliability in quantitative research. "Being able to trust research results is especially important to professionals in applied fields, such as education, in which practitioners intervene in people's lives" (Merriam, 1998, p. 198). In order to account for internal validity (confirmability), we employed techniques that Merriam (1998) suggests; peer examination, member checks, triangulation, and researcher's biases. Specifically, college professors in sport pedagogy and qualitative research examined the findings to ensure validity. Data collected from the participant interviews were taken back to the students to see if the results from the interviews were

plausible. Triangulation occurred in the form of interviews, transcriptions of the interviews, and employing multiple researchers involved with the study. Triangulation is used to indicate that more than two methods are used in a study for checking accuracy of results. Our professional backgrounds as physical educators for eight years qualified as what Merriam (1998) terms researcher's biases that assisted in strengthening the validity of the study.

Findings

To gain a thorough understanding of the results from the interview process, we will present a brief description of each student. This information will be beneficial to the reader in understanding how each student based their perceptions concerning coeducational and same-sex physical education. The following are the students' descriptions, which were based on our interactions with each during the interviews:

Jackie: Jackie enjoyed physical education. She explained that she was of average skill level and enjoyed various activities in P.E. Her friends were important to her and she enjoyed being in P.E. with them. Jackie felt boys were stronger than girls, but strived to prove to the boys that she was just as competent as they were.

Sara: Sara loved physical education. She described herself as being highly skilled and played several sports outside of school. Sara thrived on competition, and made it a point to always show the boys that she would never back down to a challenge. She liked physical play, and never backed down from the boys when they played rough.

Alex: Alex did not enjoy P.E. and said she was not skilled in P.E. She viewed class as a time to talk with boys and increase her circle of guy friends. Alex was concerned about her physical appearance, and did not like to work too hard in class. Friends were important to her and she felt class was more fun if there were several cute guys in class.

Mike: Mike was highly skilled in P.E. He was a hard worker who always gave maximum effort. He made it a point in class to never be outdone by another boy. Mike enjoyed all sports and played several in his free time. He was annoyed in class when other students would not give their best effort.

Tim: Tim was similar to Mike. He loved P.E. and participating in various types of activities. He was more concerned with trying his best in class, and was not upset if others were more skilled. Tim did enjoy having girls in class because this gave him a chance to "show off" for them.

Josh: Josh was a "ladies man". He enjoyed coeducational P.E. for the simple fact that he could talk to girls. Josh was average skilled in P.E. and tried his best when a task confronted him. He did not play any sports outside of school, and used P.E. as a time to show girls his "sensitive" side.

Theme #1: Class Structure Preference

From the data collected during the interviews, it was apparent that the students had a preference for either coeducational or same-sex P.E. Jackie explained that she preferred same-sex P.E over coeducational because "the boys are always getting in trouble because they are messing around and talking when the teacher is talking." She felt that large amounts of time were wasted in coeducational classes because the teachers had to discipline the boys so often. Jackie's views aligned with the research by Osborne, Bauer, and Sutliff (2002), which found that most girls are not satisfied with the cooperation levels of the opposite sex during coeducational physical education classes. She noted:

I get so tired of the boys screwing around in class. They are always grabbing each other or making rude comments to us while the teacher is talking. When they get yelled at, they try to blame us for talking to. The boys have a hard time sitting still when the teacher is

explaining to the class how to do a skill, like bumping in the volleyball unit. It seems like when we are in a coeducational class, we spend most of the time listening to the boys getting yelled at, and not enough time playing games.

Sara preferred coeducational P.E. for the simple fact that this was an avenue to display her high level of skill ability to the boys. Sara stated, "I am a sporty type of girl so I like class when there are boys in it because I can show them that I can play too." She did not mind the physical play in class, and reported that she liked rough play, especially when they had their football unit. Sara did not like football in same-sex P.E. because "the girls are too worried about how they look and don't try very hard." Sara's view conflicted with research by Osborne, Bauer, and Sutliff (2002), in which they concluded that girls felt football was better suited for an all male class.

Alex preferred coeducational P.E. for reasons that were socially motivated. She noted in the interview that, "I am not very good at P.E. but that's okay because if I tried harder I would be better." Her rationale for liking coeducational more stemmed from the fact that she had more friends in those P.E. classes, and since boys were in class, she enjoyed it more. When asked why she did not prefer same-sex P.E. she said, "Having all girls in one class is not good. They are too "clicky" and too busy judging how good you are." Alex was aware that her skill level was far below most of the girls in class, but she was still drawn to coeducational classes for the social aspect of interacting with the opposite sex. Alex's view of the class structure differed from results by Lirgg (1993). Lirgg found that girls who liked same-sex P.E. over coeducational P.E. were those who perceived their ability and skill levels to be below that of the other girls.

Mike's preferred same-sex P.E classes. He was athletic and wanted to experience competition at the highest degree. He enjoyed rough, competitive games where results were

determined near the completion of games. Mike mentioned in the interview, "Girls don't do anything in class and just stand there and watch us guys play." He was annoyed at the fact of girls not wanting to play or try their best. Mike noted, "Girls aren't as good as us guys anyways, so if they just stand there and watch I don't care!" This perception mirrored the findings of Treanor, Graber, Housner, and Wiegand (1998). The results of this study indicated that boys perceived themselves to have more skill than girls.

Tim had similar views to Mike with the exception of class preference. He preferred coeducational P.E. because it allowed him the opportunities to show the girls how skilled he was. Tim said in the interview that, "I love to have the girls watch me. When they cheer for me and yell my name it makes me feel cool." He was more understanding of other students' skill levels, and was not annoyed by the fact that others were not as good as him. Tim was the type of student who minded his own business and went about his way of doing things.

Josh was similar to Alex in that he preferred coeducational P.E. for social reasons. He was concerned by how he was perceived by girls, and used coeducational classes to show girls his "sensitive side." Josh stated:

I like coeducational P.E. because it gives me a chance to talk to girls and show them that I am a good listener. I want them to feel comfortable when they talk to me and I want them to know I care about their feelings. I think they know I truly care.

He did not care how other students viewed his skill ability, but rather how the girls viewed him as a listener to other students' concerns.

The participants' perceptions provided an understanding of each student's feelings about coeducational and same-sex physical education. Each student had their own personal reasons for which class they preferred, and offered rationale as to why they had these preferences. Gaining

an understanding of how the students perceived P.E. classes offered valuable insight to other factors in their learning process.

Theme #2: Perceptions of the Learning Environment

The learning environment plays a vital role in student learning (Derry & Phillips, 2004). How students perceive this atmosphere may influence factors such as activity time, off-task behavior, and skill development. From a health-related standpoint, if a student feels uncomfortable participating in class, this inactivity could lead to various health issues, such as heart disease, diabetes, and obesity. The probability of a student engaging in life-long activity may also decrease as a result of feeling uncomfortable in P.E.

Jackie perceived the learning environment in same-sex P.E. classes to be more conducive to learning content. She commented in the interview:

I learn more in class when it is same-sex because the teacher does not have to stop telling the boys to be quiet. I can focus more on the skill being taught in class that day and get more practice tries during class time. I also learn more in same-sex P.E. because I feel more comfortable to go and ask the teacher for help if I can't figure a skill out. In coeducational P.E., I don't ask for help as much because I don't want the boys to think I can't do something, and they will also laugh at me.

This perception was in agreement with Derry and Phillips (2204). From their findings, it was concluded that students enrolled in same-sex classes had significantly more teacher interactions and engaged learning time. Girls approached their teachers more often and asked more questions than those in coeducational classes.

Sara and Alex both agreed that they learned more content related to physical education in same-sex classes compared to coeducational classes. Alex admitted, "Although I like coed

classes more, I do learn more in same-sex P.E. because I am more focused." Sara's view of the learning environment was similar in regards to learning. She said, "In same-sex P.E., I am more focused on improving my skills and not so worried about outdoing the boys."

In terms of learning environment, Mike felt he learned more content in a same-sex class environment. He stated, "I feel I learn more stuff about sports in same-sex class. As far as asking for help, I don't mind asking for help in either class if I need it." He did say that he was more focused in same-sex P.E. because he wanted to show other boys that he was skillful during game play. Mike went on to say that the content of both classes was almost identical, in his opinion, since both concentrated on team sports.

Tim felt he tried hard in coeducational P.E., but as he thought more during the interview, he did mention that he tried more in same-sex P.E. He said, "I do try really hard in same-sex P.E. because I want to work on my skills to get better." Josh agreed that he does try harder in same-sex P.E. because in that environment he does not have to talk with girls about their feelings. All the boys agreed that they did not notice any student/teacher interactions that were different when comparing the two learning environments. This perception was ironic in the fact that the girls viewed the boys as always getting in trouble and needing the most discipline time from the teachers.

The data collected on perceptions of the learning environment was valuable in terms of student learning. Two objectives of a physical education's curriculum should be student learning and promoting life-long movement. If students are uncomfortable in the learning environment, they will not actively participate or take an active role in their learning process. If students do not feel comfortable asking the teacher for help, they may be missing valuable feedback in terms of executing and improving skills in physical education.

Theme #3: Social Impact & Class Structure

Class structure in physical education played a vital role in terms of how the middle school students socialized in class. In this study, both genders agreed that having more friends in class made the class more enjoyable. Jackie commented, "I like to play volleyball in class when I have a lot of friends in class. It just makes class more fun." Josh said, "I like to work on team related skills with a friend in class because I think we communicate better with them if I like them." From Jackie's interview, she concluded that she felt boys were bigger and stronger than most girls at this age. Derry (2000) indicated similar results. The results from this study found that girls do recognize and express feelings of boys having athletic superiority, as well as obvious physical size and strength differences. Girls were found to be intimidated by these differences and often did not socialize with boys who were bigger in stature during class time.

When it came to choosing a partner to work on skills, the results were mixed with these students. Boys tended to choose a male partner that was similar in skill ability. Mike said, "I like to choose another guy who is as good as I am so we can push each other." Josh, on the other hand, preferred having a girl partner for the obvious reason of being able to talk with them. Tim also preferred choosing a boy as a partner. He noted, "Another guy can help me improve on my skills, especially when we play basketball." Alex was similar to Josh in the fact that choosing a boy partner increased her social network of guy friends. Sara wanted to select an athletic boy as a partner for several reasons. In the interview she noted:

I want a guy as a partner who is really athletic and won't back down from me. I always pick the athletic guys because they push me to be better, and I want to show them that I can play with the guys too. I don't pick girls as partners because most of them are not as athletic as me, and they don't try very hard.

Jackie was the only girl who preferred choosing another girl as a partner. As the interview with her progressed, it became apparent that some of the boys affected the way she socialized with others in the coeducational P.E. class. She stated that she preferred choosing another girl as a partner because most girls were on the same level as far as ability. Jackie stated, "Girls just seem to understand girls better and girls mostly share the same strength level." Derry (2000) examined middle school students' partner choices, when giving student choice, and concluded similar findings. The results from Derry's study found that girls preferred to choose another girl as a partner because they seemed to be more considerate and tended to be on the same ability level.

Making mistakes in front of peers can have major social implications on students at any grade level. Boys in this study agreed that they were not more embarrassed to make mistakes in one class over another. Mike commented, "If I make a mistake, I make a mistake! It does not matter to me if I am around all guys or both genders." Tim and Josh shared similar views. The girls in this study had different perceptions when they made mistakes. All the girls agreed that they would rather make a mistake in a same-sex class compared to a coeducational P.E. class. Jackie noted, "Making a mistake in front of the boys sucks! They laugh at you and everyone in the class looks at you." Alex agreed that making a mistake in a same-sex P.E. class was more socially accepted:

If I make a mistake around all the girls in a class, I am not as embarrassed as I am in a coed class. In a coed class, if you make a mistake, all the boys will notice and they will tell other guys about how dumb you are.

Sara shared a similar view with the boys. She was not embarrassed to make a mistake in a samesex P.E. class, but did have some reservations about making mistakes in front of athletic boys. Sara said, "If I make a mistake around an athletic boy, I am embarrassed about what he thinks of me." Overall, her level of embarrassment was relatively low no matter the circumstance.

From the student data on social impact and class structure, it was evident that how peers perceived each other did play a role in the socialization process of middle school students. This perception related back to classroom environment and the expectations set by the teachers. These participants seemed very aware of their surroundings and how others perceived their actions.

Discussion

The purpose of this study was to examine middle school students' perceptions of coeducational and same-sex physical education classes. Specifically, this study investigated which class structure students preferred, perceptions of the learning environment in both classes, and the social impact the class structure had on the participants. Interpretation of the data suggested that students did have something important to say in terms of how physical education classes were structured at their school. Students liked components of both types of classes, shared a variety of viewpoints concerning coeducational and same-sex P.E., and benefited from the participation in both structures. The results paralleled the findings of Greenwood and Stillwell (2001). From their findings, it was concluded that it seemed logical to provide physical education experiences to students that are both coeducational and same-sex.

Another important piece of data that was collected during the interviews was girls' perceptions of the boys' behaviors during class, and how the boys perceived their own behaviors. Girls felt that the boys were consistently getting in trouble in class and had a hard time listening when the teaching was providing instruction. The girls found this behavior annoying and disruptive to the class environment. Girls expressed a concern since teachers constantly had to tell the boys to stop "messing" around and pay attention during P.E. The point of view of the

boys was much different compared to the girls. They did not perceive their behaviors as disruptive, and often times were not aware that the behaviors they displayed were inappropriate. The boys believed the girls were only trying to get them in trouble so they would look better than the boys in the teacher's eyes. It was evident from the results that the genders did not agree on the perceptions they had of various behaviors that were displayed during coeducational physical education classes.

Based on the findings, several key aspects of information were concluded. First, students did have a preference of class structure, and their voice was valuable in providing information concerning student preferences. Students are a marginalized group that deserves to be heard in terms of content and curriculum development. As previously stated, administration and teachers develop most of the curriculum with no input from students. Results indicated that if the goal of education is student learning, it may be necessary to allow the students' voices to be heard. Second, the learning environment was critical in student learning. Results identified that the classroom structure did impact student learning. This atmosphere should be a warm, positive atmosphere where all students feel comfortable and safe to learn. Input from students about the learning environment may assist educators in structuring classroom settings that are more conducive to learning. Finally, the social environment established in a classroom is vital in developing students who are respectful, responsible, and able to work with others. From the data, it was apparent that the students felt some social isolation throughout their experiences in physical education. If schools are designed to educate students, and the ultimate goal is student learning, it may be necessary that the students' voices are heard and have some impact in the curriculum design process.

The evidence from the research and this study seemed to point to a wide range of preferences among middle school students. School curriculums may address this diversity in preferences by offering classes that are structured from both a coeducational and same-sex perspective. It should be the goal of any physical education curriculum to promote an understanding and involvement in physical activity for a lifetime so students can actively engage in activity that interests and benefits their well-being. Assessing the classroom environment and how students perceive it may be the first steps in promoting quality physical education experiences for all students. In addition, with the rise in youth obesity and inactivity, quality physical education environments may be the only opportunity for students to learn the necessary skills and knowledge to be physically active and gain an understanding of the importance and benefits of doing so.

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Appendix A

Interview Question Protocol

1. Could you please tell me about your experiences in physical education classes?

How did you feel about class when it was coed?

How did you feel about class when it was same-sex?

- 2. Which type of class do you like more? Why?
- 3. Do you find that you try harder when the class is coed or same-sex? Why?
- 4. Do you feel that you learn more in class when it is coed or same-sex? Why?
- 5. Are you more embarrassed to make a mistake when the class is coed or same-sex? Why?
- 6. Do you work better with other students on tasks when the class is coed or same-sex? Why?
- 7. What are you favorite team sports in PE?

Do you like to play those sports more in coed or same-sex classes? Why?

8. What are your favorite individual sports in PE?

Do you like to play those sports in coed or same-sex classes? Why?

- 9. How do you feel teachers treat students in coed or same-sex classes? Why?
- 10. Anything else you would like to tell me about your experiences in coed and same-sex classes?