The Effect of Participating in School-Wide Positive Behavior Support on Academic Performance and Number of Office Discipline Referrals

Nadine Sanders

Follow this and additional works at: https://dsc.duq.edu/etd

Recommended Citation
THE EFFECT OF PARTICIPATING IN SCHOOL-WIDE POSITIVE BEHAVIOR SUPPORT ON ACADEMIC PERFORMANCE AND NUMBER OF OFFICE DISCIPLINE REFERRALS

A Dissertation
Submitted to the School of Education

Duquesne University

In partial fulfillment of the requirements for the degree of Doctor of Education

By
Nadine E. Sanders

August 2009
DUQUESNE UNIVERSITY

SCHOOL OF EDUCATION

INTERDISCIPLINARY DOCTORAL PROGRAM FOR EDUCATIONAL LEADERS

Dissertation

Submitted in Partial Fulfillment of the Requirements
For the Degree of Doctor of Education (Ed.D.)

Presented by:

Nadine E. Sanders
M.S., Educational Leadership and Policy, Shippensburg University, 2003
B.S., Education, Shippensburg University, 1999

April 27, 2009

THE EFFECT OF PARTICIPATING IN SCHOOL-WIDE POSITIVE BEHAVIOR SUPPORT ON
ACADEMIC PERFORMANCE AND NUMBER OF OFFICE DISCIPLINE REFERRALS

Approved by:

______________________________, Chair
James E. Henderson, Ed.D.
Professor of Educational Leadership and Director,
Interdisciplinary Doctoral Program for Educational Leaders
Duquesne University School of Education

______________________________, Member
Todd Whitman, Ph.D., NCC, LPC, ACS
Assistant Professor
Department of Counseling and College Student Personnel
Shippensburg University

______________________________, Member
Theresa Kalm-Williamson, Ed.D.
Principal, Paramount Elementary School
Washington County Public Schools

______________________________, Member
Jane C. Johnston, Ed.D.
Director of Curriculum
Tuscarora School District

Program Director

James E. Henderson, Ed.D.
Professor of Educational Leadership and
Director, Interdisciplinary Doctoral Program for Educational Leaders
Duquesne University School of Education
ABSTRACT

THE EFFECT OF PARTICIPATING IN SCHOOL-WIDE POSITIVE BEHAVIOR SUPPORT ON ACADEMIC PERFORMANCE AND NUMBER OF OFFICE DISCIPLINE REFERRALS

By

Nadine E. Sanders

August 2009

Dissertation supervised by James E. Henderson, Ed.D

Schools continue to face the challenge of how to implement a behavior management plan in which students are not likely to become repeat offenders. Traditional management models that are restrictive and punitive have not been effective in bringing about appropriate student conduct. A non-traditional management strategy to improve student behavior is to develop and implement a comprehensive, school-wide set of strategies to support positive behavior and academic performance for all students that is individually tailored to a school’s context. School-Wide Positive Behavior Support (SWPBS) occur as part of a three-tiered system. The universal level addresses supports planned and designed for all students within a building. The targeted intervention level consists of strategies for at-risk students who have difficulty meeting behavioral
expectations designed for all students. The intensive interventions are designed for students who present severe and challenging behaviors that require individualized supports. This study investigated whether implementing SWPBS improved academic performance and decreased the number of discipline referrals. The cohort studied over a two year period did not indicate an increase in academic performance or a decrease in ODRs. Implementing a school-wide positive behavior support system did not automatically predict an increase in student performance in this study. Knowing this school’s staff is committed to this system approach, based upon the S.E.T. evaluation, it is critical to continue to monitor the implementation of this system and its impact on the school community overtime.
DEDICATION

I would like to dedicate my dissertation in honor and memory of my father. He took great pride in being the first in his family to receive his master’s degree. He instilled in me the importance of continuing your education and sharing what you learn with others.
ACKNOWLEDGEMENT

I would like to thank those individuals who were part of my dissertation journey. Kevin, my husband, I appreciate all of the support and encouragement you have provided to me. You have taught me to take care of myself and not let stress overtake my ability to enjoy what life has to offer. One of your best assets is the ability to make others laugh and you live each day to its fullest.

To my biological family, I have learned no matter what your family is always there for you. When I first started my journey down the road to doctoralville I knew one of the things I did not want to sacrifice was time with my family and I hope there were no times I said I had to work on my paper instead of spending time with all of you.

Thank you knitwyts, Betty, Bonnie, and Denise, for encouraging me to stay the course. To my friend and mentor, Dr. Bonnie Cornelious, thank you for helping me see the topic for my dissertation was right in front of me.

After complaining about only handling discipline referrals and not having time to be an instructional leader, Mrs. Mary Lou Graham, Tuscarora School District Special Education Coordinator, recommended a team from our school attend training at the Lincoln Intermediate Unit 12. Our team learned how to support our students, staff and parents under the direction of our SWEBS teachers, Mr. Thomas Wysocki and Mrs. Jeriesha Gilbert, Behavior Management Specialists.

This dissertation would not have been possible without the dedication and willingness of the St. Thomas Elementary School staff, parents, and students to take the journey to learn about SWEBS. I especially want to thank our School-Wide Effective
Support team members, Dr. Frank DeMatteo, Shaun Green, Michael Lord, Katherine Mellott, Coetta Ramsey, Wade Saylor, Vanessa Stepler, and Keith Walters.

I am grateful to Dr. Jane Johnston, Tuscarora School District Director of Curriculum, for taking time out of her busy schedule to join my dissertation committee. You provided the framework I needed to complete this dissertation. To the rest of my committee members, Dr. James Henderson, Dr. Theresa Kalm-Williamson, and Dr. Todd Whitman, thanks for being patient during my dissertation journey.

Thank you to the Tuscarora School District Board of Directors and Dr. Rebecca Erb, Superintendent, for allowing me the opportunity to research in the district.

For those of you who know me well and have been part of my doctoral journey, I believe you will agree this poem, whose author is unknown to me, sums up this part of my life’s journey. I look forward to sharing my future journeys with all of you.

Bits and Pieces

People important to you,

people unimportant to you,

cross your life,

touch it with love and carelessness,

and move on.

There are people who leave you

and you breathe a sigh of relief

and wonder why

you even came in contact with them.

There are people who leave you
and you breathe a sigh of remorse
and wonder why they had to go away
and leave such a gaping hole.

Children leave their parents,
friends leave friends,
acquaintances move on.

You may think of many who have moved
into your hazy memory
You look at those present and wonder.

I believe in God’s master plan for life.

He moves people in and out of each others lives,
and leaves a mark on the other.

You find you are made up of
bits and pieces
of all who ever touched your life,
and you are more because of it;
you would be less today if they
had not touched you.

Pray God that you accept the bits and pieces in humility
and wonder and never question
and never regret the bits and pieces.
TABLE OF CONTENTS

Abstract .............................................................................................................................. iv
Dedication ....................................................................................................................... vi
Acknowledgement ......................................................................................................... vii
List of Tables ................................................................................................................. xi
Chapter 1 ......................................................................................................................... 1
Chapter 2 ......................................................................................................................... 10
Chapter 3 ......................................................................................................................... 25
Chapter 4 ......................................................................................................................... 32
Chapter 5 ......................................................................................................................... 45
References ....................................................................................................................... 56
Appendix A ....................................................................................................................... 61
# LIST OF TABLES

<table>
<thead>
<tr>
<th>Table</th>
<th>Description</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>Table 1</td>
<td>Reading PSSA Student Participation</td>
<td>34</td>
</tr>
<tr>
<td>Table 2</td>
<td>Reading PSSA Academic Performance Trend Data</td>
<td>35</td>
</tr>
<tr>
<td>Table 3</td>
<td>Reading PSSA Performance Levels</td>
<td>36</td>
</tr>
<tr>
<td>Table 4</td>
<td>Math PSSA Student Participation</td>
<td>37</td>
</tr>
<tr>
<td>Table 5</td>
<td>Math PSSA Academic Performance Trend Data</td>
<td>38</td>
</tr>
<tr>
<td>Table 6</td>
<td>Math PSSA Performance Levels</td>
<td>39</td>
</tr>
<tr>
<td>Table 7</td>
<td>Math PSSA Paired Samples Statistics</td>
<td>41</td>
</tr>
<tr>
<td>Table 8</td>
<td>Reading PSSA Paired Sample Statistics</td>
<td>42</td>
</tr>
<tr>
<td>Table 9</td>
<td>Office Discipline Referral Paired Sample Statistics</td>
<td>43</td>
</tr>
</tbody>
</table>
CHAPTER I

INTRODUCTION

Bailey, Colorado. September 27, 2006. An intruder enters a high school and took six female students hostage, sexually assaulted them, and killed one of them, and then killed himself after a four-hour standoff.

Cazenovia, Wisconsin. September 29, 2006. A student walks into a rural school with a pistol and a rifle and fatally shot his principal.

Nickel Mines, Pennsylvania. October 2, 2006. A man walks into a one-room Amish schoolhouse with two rifles, a semi-automatic handgun, and 600 rounds of ammunition, selected all the female students, and shot them execution-style, killing five and seriously wounding a sixth, before killing himself.

Maxwell reported in Education Week (“School Shootings in Policy Spotlight,” 2006) that these three school shootings in less than one week which resulted in the deaths of one principal and six students raise the level of awareness for state and national officials concerning school safety. Safety experts caution, however, against over-reacting to these horrific, but rare, incidents. The National Threat Assessment Center of the U.S. Secret Service and the U.S. Department of Education Safe Schools initiative conducted a study that involved 37 “targeted” school shootings since 1974. The report concludes that most attackers did not attack suddenly or impulsively; did share their plan with others before the incident; did not threaten their targets prior to the attack; did not fit a profile of students who commit attacks; did engage in behavior that could be described as suspicious prior to the incident; did have difficulty coping with a significant loss or personal failure; and did consider or attempt suicide. Additionally, they were stopped by
means other than law-enforcement intervention (Voskuil, Fein, Reddy, Borum, & Modzeleski, 2002).

These tragic events help remind school officials of the importance of creating a safe environment where students can learn which is the responsibility of the principal with the help of students, teachers, staff, and community members (Lewis, Sugai, & Colvin, 1998). According to Maslow’s Hierarchy of Needs (Maslow, 1968), unless the need for safety (emotional or psychological) as well as the absence of threats is met, all other higher-level needs will become difficult to satisfy. Two factors important to school safety are having a relationship with someone in school and a place to succeed. “In their list of characteristics of safe and responsive schools, researchers Dwyer, Osher, and Warger include those school that “treat students with equal respect.” They note that ‘effective schools communicate to students and the greater community that all children are valued and respected.’ There is a deliberate and systematic effort . . . to establish a climate that demonstrates care and a sense of community (Bluestein, 2001, p. 149).”

Schools continue to face the challenge of how to implement a behavior management plan in which students are not likely to become repeat offenders. Traditional management models that are restrictive and punitive have not been effective in bringing about appropriate student conduct. Another approach to school-wide discipline would be proactive rather than reactive and would be individualized. If a student is struggling to decode a word, teachers diagnose the problem and teach the child strategies for decoding unknown words. Educators can also use strategies to address behavior problems rather than relying solely on consequences such as to encourage appropriate behavior. In most cases, the inappropriate behavior is continuous.
One strategy that has been effective to positively impact student behavior is School-Wide Positive Behavior Support (SWPBS). The main goal of SWPBS is to promote positive behavior and academic performance by developing a comprehensive, school-wide set of strategies to support positive behavior. This behavior support requires the help of all staff members because implementing an effective behavior support is too much for administrators to do on their own. For a school-wide behavior support plan to be successful, an administrative and staff commitment of 80% is essential (Muscott et al., 2004).

The emphasis of this study is to determine whether implementing School-Wide Positive Behavior Support (SWPBS) will decrease the number of office referrals and increase elementary students’ performance on the Math and Reading Pennsylvania State System of Assessment (PSSA).

Purpose of the Study

The purpose of this study will be to determine whether implementing SWPBS will decrease the number of office referrals resulting in an increase in elementary students’ academic performance on the Math and Reading PSSA because more time is spent instructing. This research study will benefit students, teachers, staff, parents, school psychologists, administrators, community, state, and national school safety officials because of the importance of finding effective behavior supports to decrease violent acts in schools and increase time for academic instruction.

Statement of the Problem

Will implementing SWPBS improve academic performance and decrease the number of discipline referrals?
Significance of the Problem

School safety continues to be a hot topic in education. Recent shootings have led local, state and national officials to re-visit how schools can keep students safe while educating them. These rare shooting incidents have raised educators’ level of awareness for asking about safety for our students and staff, as it relates to discipline referrals. Many recent reports in the newspapers have referred to the importance of schools developing a school-wide approach to discipline that includes all stakeholders such as students, educators, parents, administrators, and community members. SWPBS establishes and maintains an instructional approach to teaching and encouraging appropriate behavior expectations, focuses on preventing problem behavior, takes a team-based approach to leadership and problem-solving, and uses data to guide decision-making.

Research Question

What is the effect of participating in SWPBS on the academic performance and number of referrals of elementary students?

Research Hypothesis One

Elementary students will have higher Math PSSA scores after SWPBS implementation than elementary students with no SWPBS implementation.

Null Hypothesis One

There is no difference in Math PSSA scores of elementary students after SWPBS implementation.

Research Hypothesis Two

Elementary students will have higher Reading PSSA scores after SWPBS implementation than elementary students with no SWPBS implementation.
Null Hypothesis Two

There is no difference in Reading PSSA scores of elementary students after SWPBS implementation.

Research Hypothesis Three

Elementary students will have fewer ODRs after SWPBS implementation than elementary students with no SWPBS implementation.

Null Hypothesis Three

There is no difference in the number of ODRs of elementary students after SWPBS implementation.

Identification of Variables

The variables for this particular study are:

Independent Variable: SWPBS vs. Non-SWPBS implementation

Dependent Variables: Math PSSA, Reading PSSA, ODR

Operational Definitions

The following terms are operational for this study:

Academic Performance – Mathematics and reading scores from Pennsylvania State System of Assessment

PBS – Positive Behavior Support

PSSA – Pennsylvania State System of Assessment is a standards-based, criterion-referenced assessment measuring student performance of the academic standards and helps schools measure the extent to which its programs enable students to meet proficiency of the standards.
PSSA Performance Levels for Reading and Mathematics -

The Pennsylvania General Performance Level Descriptors, as developed by PDE and teacher panels, are given below.

Advanced: The Advanced Level reflects superior academic performance. Advanced work indicates an in-depth understanding and exemplary display of the skills included in the Pennsylvania Academic Content Standards.

Proficient: The Proficient Level reflects satisfactory academic performance. Proficient work indicates a solid understanding and adequate display of the skills included in the Pennsylvania Academic Content Standards.

Basic: The Basic Level reflects marginal academic performance. Basic work indicates a partial understanding and limited display of the skills included in the Pennsylvania Academic Content Standards. This work is approaching satisfactory performance, but has not been reached. There is a need for additional instructional opportunities and/or increased student academic commitment to achieve the Proficient Level.

Below Basic: The Below Basic Level reflects inadequate academic performance. Below Basic work indicates little understanding and minimal display of the skills included in the Pennsylvania Academic Content Standards. There is a major need for additional instructional opportunities and/or increased student academic commitment to achieve the Proficient Level (Data recognition Corporation, 2008, pgs. 127-128).
Scaled Score – “A scaled score, in the simplest sense, is a transformed number correct score. When all students take the same items, as in the common sections of the PSSA, the more points the student earns, the higher the associated scaled score. The value of switching to the more abstract scale score metric lies in the performance of a more general and equitable result” (Data Recognition Corporation, 2008, p. 126).

SET - The School-Wide Evaluation Tool (Horner, Todd, Lewis-Palmer, Irvin, Sugai, & Boland, 2004) which is also called the SET is a 28 item questionnaire designed to determine whether a school has fully implemented school-wide positive behavior support. The SET consists of 28 items organized into seven subscales that represent the seven key features of school-wide PBS:

1. school-wide behavior expectations are defined;
2. these expectations are taught to all children in the school;
3. rewards are provided for following expectations;
4. a consistently implemented continuum of consequences for problem behavior is put in place;
5. problem behavior patterns are monitored and the information is used for ongoing decision-making;
6. an administrator actively supports and is involved in every effort; and
7. the school district provides support to the school in the form of functional policies, staff training opportunities, and data collections options (Horner, Todd, Lewis-Palmer, Irvin, Sugai, & Boland, 2004, p. 5).
SWPBS – School-Wide Positive Behavior Support

School-wide positive behavior support is a proactive approach to discipline that promotes appropriate student behavior and increased learning. The system is based upon a three-tiered model. The first tier (universal) serves as the foundation upon which the other two tiers are built. This tier provides a system of supports to all students in a school based on preventative practices which emphasize teaching and reinforcing expected student behaviors. Tier two (secondary) provides targeted interventions to support students classified as “at risk,” who require more interventions than is typically provided within tier one universal supports. Supports offered in tier three (tertiary) require the most intensive level of intervention for students with the most significant behavioral/emotional support needs. (Pennsylvania Department of Education, n.d., p. 2)

Office Discipline Referrals (ODR) – An elementary student is referred to the office for bullying, classroom disruption, disrespect, drugs/alcohol, fighting, vandalism, late for class, littering, threats, tobacco, unacceptable language, and weapons.

Assumptions

It is assumed that:

1) The SWPBS school will have fully (80% or greater) implemented SWPBS systems based upon the School-Wide Evaluation Tool (SET).

2) Students remain in the school district for the administration of the PSSA tests.

3) The SET instrument accurately measures SWPBS systems in the school to be used in the study.
Limitations

1) The study is limited to an elementary school where the researcher will be comparing last year’s third graders (no SWPBS) to this year’s fourth graders (full SWPBS implementation).

2) The study is limited to elementary students who have taken the PSSA tests.

3) The study is limited to Pennsylvania elementary students.
CHAPTER II

LITERATURE REVIEW

Introduction

Positive Behavior Support (PBS) began as an application of analyzing behaviors to attain socially important behavior for students with severe disabilities (University of South Florida, 2006). More recently PBS has been extended from and individual intervention approached to entire schools (Colvin, Kameenui, & Sugai, 1993; Lewis et al., 1998). The Individuals with Disabilities Act highly recommends the use of positive behavior support interventions and a decrease in the use of suspensions and expulsions as school-wide discipline strategies (State of Florida Department of Education, 2002).

School-Wide Positive Behavior Support

The purpose of SWPBS is to develop a comprehensive, school-wide set of strategies to support positive behavior and academic performance for all students that is individually tailored to a school’s context (Wysocki & Gilbert, 2006; Scott et al., 2003). Effective behavior supports occur as part of a three-tiered system. The universal level addresses supports planned and designed for all students within a building. The targeted intervention level consists of strategies for at-risk students who have difficulty meeting behavior expectations designed for all students. The intensive interventions are designed for students who present severe and challenging behaviors that require individualized supports. Effective behavioral supports occur as part of a three-leveled system (George, Harrower, & Knoster, 2003; Lewis et al., 1998).
**Level 1: School-wide positive behavior support Systems**

The SWPBS approach is a non-punitive and an inclusive system. SWPBS is based on the following beliefs:

a. education must focus on academic and social competence;

b. teaching behavioral expectations and increasing behavioral competence requires building-wide, systematic and proactive approaches;

c. in order for behavior change to occur, positive approaches that build relationships and a positive learning climate must be implemented;

d. students need standards for behavior that are consistently enforced;

e. comprehensive services for students with chronic or intense problem behavior are most effective within the context of a larger building-wide commitment to the social and behavioral development of all students; no matter how strong the discipline system

f. students will not develop positive behaviors when exposed to consistent failure in the academic curriculum;

g. most behavior problems can be handled by having the school, family, and community working together;

h. and school, parents, and families need to be participants in planning student success (Wysocki & Gilbert, 2006).

Key features critical to the success of school-wide behavior support programs have been identified by behavior researchers (Taylor-Green et al., 1997). These include: defining behavioral expectations, teaching behavioral expectations, acknowledging appropriate behavior, proactively correcting behavior errors, evaluating and adjusting
team programs, providing administrative support, and providing individual student
support programs. The process from development to implementation of a comprehensive
school-wide plan takes approximately one year.

**SWPBS Training**

Once the plan is implemented, it is maintained by on-going assessment and
adjustments to meet the needs of students and staff. All school-wide teams receive
training in the following areas: basic behavior principles, data collection, and SWPBS
plan components. The school-wide teams plan training for their individual buildings to
assist in successful implementation of their school-wide plan. Since this is a data-driven
process, training is tailored to meet the individual needs of a building based on the data
collected.

**SWPBS Assessment**

SWPBS assessment includes using both baseline and on-going data. Baseline data
consists of the school team collecting qualitative data such as surveys and quantitative
data consisting of discipline referrals to the office, student absenteeism, student tardiness,
student grade failures, staff absenteeism, and standardized test scores. On-going data is
collected once the plan is implemented. The school team continues to collect data to
determine the plan’s effectiveness and make adjustments if necessary.

**SWPBS Planning**

Using baseline data, a plan addressing each component is written and shared with
the school staff for consensus. Behavioral expectations are defined in the form of school-
wide rules or expectations and shared with the staff. A structured system to reinforce
students for following the rules is developed and shared with the staff. Strategies for
correcting inappropriate behavior are developed, or current policies and procedures are reviewed for effectiveness. This includes review and development of strategies for at-risk students and students in need of intensive interventions. Staff and system support elements are determined. This includes staff behaviors which will prevent problem behavior and facilitate rule-abiding behavior such as being more visible in high problem areas and systems elements such as changing schedules to reduce overcrowding in particular area. Strategies to collect on-going data are developed and shared with staff. Prerequisites are planned for implementing the school-wide plan: lesson plans will be developed to teach the rules; plans to teach the reinforcement system to students will be developed; logistics of the implementation day will be developed; and staff training will be planned. The team then develops strategies to communicate information with important stakeholders such as parents and school board members. The team also determines methods of maintaining a productive core team.

**SWPBS Implementation**

Following the implementation schedule, all staff and students are trained based upon the system developed by the core SWPBS team. Structured reinforcement of students occurs according to the system developed. The SWPBS team plans booster training throughout the year to respond to trends to date and new students. The school team continues to meet and review the on-going data to determine what adjustments may be needed. Data is shared with the entire school staff to encourage commitment to the process. The team identifies students in need of targeted and intensive interventions and will consider rotating other staff members into the core team to avoid burnout.

According to Lewis et al. (1998),
In an attempt to understand why children and youth engage in challenging behavior, researchers have established compelling evidence that parents and communities contribute to the development of problem behaviors by failing to provide necessary prerequisite social skills and support and by modeling inappropriate social interactions. (p. 446)

Lewis et al. (1998) state there is concern in public education for the increased number of problem behaviors with the result of increased reactive and punitive strategies. More proactive interventions have been found to reduce problems behaviors. Lewis et al. (1998) examined the effects of a proactive school-wide approach to discipline on the number of problem behaviors displayed by elementary students in the cafeteria, recess and hallway transitions through the use of a social skill instruction program combined with direct instruction.

A multiple baselines across setting design were used to examine whether social skill instruction combined with direct instruction reduced problem behaviors. Social skill instruction did not have an effect on decreasing problem behaviors; however, there was a reduction in problem behavior with direct instruction. Interobserver agreement was calculated and fell within acceptable ranges of 84% for the cafeteria, 85% for the playground and 91% for transitions (Lewis et al., 1998).

There are several limitations to this study (Lewis et al, 1998). The authors in this study served as experts throughout the implementation stages of this behavior support. Schools need to have an expert to provide behavior input. This person is usually the school psychologist and there is a need for districts to re-define their roles so they are able to participate in these teams. Other limitations include examining the effectiveness
of interventions, replicating these procedures in other schools, and providing more explicit interventions for students who have serious behavior problems. A longitudinal study would contribute to the research on effectiveness of proactive programming to reduce problem behaviors.

According to Muscott, Mann, Benjamin, Gately, New Hampshire Center for Effective Behavioral Interventions and Supports, Bell, Saint Xavier University, Muscott, & Salem School District (2004), The New Hampshire Center for Effective Behavioral Interventions and Supports (NH CEBIS) was established in 2002 as a response to the state’s initiative to improve school climate and discipline. This study wanted to assess whether schools supported by the Center could implement positive behavioral interventions and supports (PBIS) with fidelity and based upon educational levels in elementary, middle, high and multi-level.

PBIS is a three-level system. The first level, universal prevention, is designed to reach the behavior concerns in 80 – 89% of the school population. Level two, secondary prevention, is intended to target 5 to 10% of students at risk for developing behavioral or mental disorders. The third level, tertiary prevention, is aimed at 1 to 5% of the student population who display symptoms related to behavior and mental disorders (Muscott et al., 2004).

PBIS requires teaching appropriate behavior, matching the level of intervention to resources, and designing and integrating multiple systems that address a full range of discipline challenges schools face. The ultimate outcome of PBIS is to reduce the frequency, intensity, and complexity of inappropriate behavior patterns and provide replacement behaviors (Muscott et al., 2004).
Invitations to participate in the study were sent to all schools with the understanding there would be a 3 year commitment and had to agree to the readiness requirements. Each school created a Universal Leadership Team that would create, implement and evaluate the program. On-going training and support was given from the NH CEBIS (Muscott et al., 2004).

The School-wide Evaluation Tool (SET) was used to measure fidelity. Acceptable limits were found for the validity and reliability of the SET evaluation. The internal consistency reliability of the set was .96 with a test-retest level of 97.3%. Over half of the participating schools participating in PBIS were successful with program implementation (Muscott et al., 2004).

There are several limitations to the study (Muscott et al., 2004). First, a small sample of each educational level limits the ability to generalize the study. Second, the high schools came into the project because of a dropout prevention grant which could affect results. Third, there was no baseline data for each cohort. Fourth, independent assessments did not occur because SET evaluators were NH CEBIS members. Fifth, a bias existed because most members of the investigating team who provided training were aware of the research questions. Finally, the SET was the only instrument used to collect data and no inter-observer reliability was collected.

This research provides several important components needed for an effective discipline policy which includes securing 80% of school-wide agreement and support from faculty and administration, ensuring training is done with technical assistance, and maintaining a database evaluation component to make informed decisions.
Students experiencing academic and/or behavior concerns in school can be referred to a school-based team, consisting of a psychologist, who collects data and develops a treatment plan for the student. Teachers are then tasked to implement the treatment plan, often with no consultation follow-up to ensure it is being put into action with positive effects to change the unwanted behavior of students. The study conducted by Noell et al. (2005) examined three consultation follow-up strategies to treatment plan implementation which were brief weekly interviews, commitment to implement treatment interviews, and performance feedback. The study included 45 elementary school students who were referred due to academic, behavior or a combination of both concerns.

Weekly interviews consisted of a brief interview with the consultant asking the teacher to what extent the plan was implemented, how the student was progressing and if there were any questions or concerns. The commitment emphasis condition was directed by the consultant who shared the importance of making sure a commitment was established among the student, teacher and parents to implement the treatment plan to ensure credibility and measure whether the plan was effective in making positive changes in student behavior. The consultant then worked with teachers to develop strategies on how to support the implementation of the treatment plan. The performance feedback procedure was composed of meeting with the teacher, discussing implementation strategies, graphing student behavior and graphing the progress of intervention implementation (Noell et al., 2005).

An analysis of variance was used to analyze the three consultation follow-up strategies. Commitment emphasis and weekly interviews did not differ significantly.
Performance feedback did indicate higher levels of treatment implementation which led to changing behavior. This research provides evidence that performance feedback is an effective means for sustaining treatment plan implementation (Noell et al., 2005).

Several limitations of this study include a small, homogeneous, sample size of consultees, consultants were not practicing school psychologist but rather doctoral students of psychology, interobserver data was not collected, there was a reliance on permanent products instead of direct observations to assess intervention implementation, the performance feedback group received more contact with the teachers in the follow-up than the other two treatments, and three weeks is a short time for treatment implementation (Noell et al., 2005).

**Level 3: Targeted Interventions**

Few schools have implemented early intervention strategies for at-risk students, which could be a result of school staff not wanting to label students early. Screening students for at-risk behaviors may include numerous students who need assistance and administrators may be concerned these students may qualify for special education which increases budgetary expenses. To begin to look at studying early intervention and screening, a descriptive study examining 72 students at risk for school failure in 3 elementary schools was conducted. These three elementary schools had a positive behavior supports system in place, used school-wide screening, rating scale instruments and office discipline referrals. Students were identified using the Systematic Screening for Behavior Disorders. The number of office, school-based support team, and functional behavior assessment team referrals were monitored. Results showed using office
discipline and school-wide screening processes are best to identify students at risk for school failure (Walker, Cheney, Stage, & Blum, 2005).

Several limitations to the study included having a small sample size, lacking baseline data on control schools, and limiting the ability to make comparisons because the social skills rating system was completed a year after the systematic screening for behavior disorders.

PSSA Scores and Performance

The school-wide behavior support model is intended to support administrators to evaluate current and emerging needs in light of existing resources in an effort to improve school climate by reducing incidents of problem behavior. Levels of behavior support include: school-wide, non-classroom, classroom and individual-student levels. By reducing student problem behavior there will be more time towards instruction. The authors provide problem-solving elements needed to establish positive behavior supports which include:

Step 1: Establish a Foundation for Collaboration/Operation
Step 2: Build Faculty Involvement
Step 3: Establish a Data-Based Decision-Making System
Step 4: Brainstorm and Select Strategies within an Action Planning Process
Step 5: Implement School-Wide Program through an Action Plan
Step 6: Monitor, Evaluate, and Modify the Program (George et al., 2003)

A study evaluated a comprehensive school-wide program based on an effective behaviors support approach for preventing disruptive behaviors implemented in seven elementary schools over a two year period. The program included a school-wide
discipline program, tutoring, conflict resolution, and functional behavioral intervention plans. Schools showed positive effects on student discipline and academic performance as compared to the district’s remaining 28 elementary schools (Nelson, Martella, & Marchand-Martella, 2002).

Several limitations of the study were indicated. First, a control group was not used. Second, a high level of attrition was noted. Third, the stability of treatment was not verified. Fourth, maintaining the project without funds is questionable. Fifth, the cost caused the researches not to analyze the effects of the individual components of the school-wide positive behavioral intervention and support program.

SET Evaluation

A 3-year longitudinal study was conducted involving several low income, inner-city schools. Results of the study were presented as a case study of one target middle school located in the Midwest. The average enrollment of this middle school was 623 and approximately 80 percent of the school population was economically disadvantaged because they met the criteria for free and reduced lunch programs (Lassen, Steele, & Sailor, 2006).

The following outcome measures were used to assess student problem behavior and overall school functioning: office discipline referral (ODR) and suspensions; school-wide evaluation tool (SET); positive reward system; and academic performance based upon the math and reading scores from the Kansas State Assessment.

The SET and positive reward system were analyzed using Cronbach’s alphas and indicated adequate reliability of .77. Two sets of analyses were conducted to examine the number of ODR and suspensions. Descriptive statistics and ANOVAs were conducted
that indicated statistically significant results of a decrease in ODR and suspensions. Two separate ANOVAs were used to analyze if test scores significantly increased over the three year study. The first ANOVA indicated no significant increase in reading scores over the study period but the second ANOVA indicated a significant increase in math scores. The final regression analyses conducted examined the relationship between disciplinary actions and academic performance. The analyses indicated students who had fewer ODR scored higher on the standardized reading and math tests.

Several factors may limit the generalizability of this study. First, there was no control school. Second, lacking specificity in positive referral ticket, ODR, and suspension data making it difficult to access and analyze. A third limitation was that the data was compared across different groups of students instead of tracking similar groups of students over time.

Office Discipline Referrals

A descriptive study examined 72 students at risk for school failure in three elementary schools. These three elementary schools had a positive behavior supports system in place, used school-wide screening, rating scale instruments and office discipline referrals. Students were identified using the Systematic Screening for Behavior Disorders. The number of office, school-based support team, and functional behavior assessment team referrals were monitored. Results showed using office discipline and school-wide screening processes are best to identify students at risk for school failure (Walker, Cheney, Stage, & Blum, 2005).

Several limitations to the study included having a small sample size, lacking baseline data on control schools, and limiting the ability to make comparisons because
the social skills rating system was completed a year after the systematic screening for behavior disorders.

Colvin, Kameenui, Sugai, and University of Oregon (1993) describe a school-wide staff development model based upon proactive instruction approaches toward problem behaviors rather than punitive. Project PREPARE (Proactive, Responsive, Empirical and Proactive Alternatives in Regular Education) is a school-wide management model based on design of instruction principles and staff development procedures. Project PREPARE activities are based on the assumption that the same procedures used to remediate academic problems can be applied to remediating social behavior problems, instead of past practices of addressing social behavior problems through punishment. “Although academic problems are “remediated: by applying instructional principles, problems social behaviors are ‘punished; by applying negative consequences” (Colvin, Kameenui, & Sugai, 1993, p. 366). A pro-active school discipline model includes:

1. Consistent management of behavior
2. School discipline is seen as an instrument for student success
3. Problem behaviors are managed using positive and preventative strategies
4. Building principal is actively involved
5. Staff is committed
6. Staff development is effective

Teacher-of-Teachers (TOT) was used to assess the need to implement a school-wide discipline plan, train the TOT teams, and evaluate, revise, and implement the school’s exiting discipline plan. One control group and one experimental group were tested.
To evaluate the PREPARE curriculum and the TOT model, one control group and one experimental group were used at the middle school level. The two schools were comparable related to enrollment, demographics and operating features. The target school received TOT training.

The goal of Project PREPARE was to develop, test and replicate a model of staff development that focused on a proactive, instructional approach to manage problem behaviors. Four challenges included administrative support, staff commitment, managing non participating staff, and maintaining drive.

School-wide positive behavior support (SW-PBS) components are defining, teaching, and monitoring appropriate behavior. Another key component to SW-PBS is using data to guide decisions. The purpose of this study was to explore the implementation of specific features of SW-PBS in three Head Start centers over a period of one year. A team of Head Start directors and staff attended a two-day workshop on implementing SWPBS. Dates were then chosen for each center to receive two SW-PBS and content of the in-services. Data was collected across three phases to track teachers’ use of features of SWPBS. The frequency of five teacher behaviors was recorded using a paper-and-pencil event-recording instrument. The behaviors recorded included: specific behavior praise; non-specific behavior praise; pre-corrections; directives; and reprimands. The findings were teachers decreased their use of reprimands and directives (Stormont, Covington, & Lewis, 2006).

There were several limitations to the study. First, it was clear teacher behavior changed but not as to whether student behavior changed. Second, the possibility of
researcher influence since the teachers knew they were from a local university. Third, an experimental control was not established.

Summary

Before students arrive, it is important for educators to plan for a learning environment that promotes academic and behavioral development. Positive behavior support is a means of considering and applying strategies to set students up for success. Stakeholders at the classroom level must decide upon behavioral expectations, instructional routines, and classroom arrangement. Good classroom management consists of students understanding their expected behaviors. Students should be given specific rules and guidelines for behavior. The behavior expectations should be few in number, stated as what students should do, simple, and enforceable. Teachers must have a discussion with students to present a rationale for the expected behaviors and offer examples related to student experiences. A classroom matrix can be developed to provide classroom rules and expectations. Educators should provide instruction on expected behaviors just like they do when teaching students how to read. Consistency and daily teaching of specific behaviors are essential for student success (Strout, 2005).

Descriptive statistics has been collected on whether implementing SWPBS decreases the number of ODRs and whether academic performance has been impacted. The study that will be conducted will further provide statistical measures that look at those schools who have implemented SWPBS with fidelity and whether this has decreased ODRs and increased elementary students’ performance on the Math and Reading PSSA.
CHAPTER III

METHOD

Introduction

This section of the research study will include the target population, method of sampling, instrumentation, data collection methods, statistical methods, researcher design and time schedule. The emphasis of this study will be to determine whether implementing SWPBS will decrease the number of office referrals and increase elementary students’ performance on the Math and Reading PSSA.

Target Population

The target population for this study includes comparing last year’s third grade students (non-SWPBS) to this year’s fourth grade students (SWPBS implementation) from a rural elementary schools in the same district in Pennsylvania.

During the 2006-2007 school year, the SWPBS elementary school housed approximately 390 students in grades kindergarten through fifth. The number of students in each grade level follows: kindergarten, 56; first, 61; second, 72; third, 71; fourth, 63; fifth, 67. The school’s diversity of students ranged as follows: American Indian, 0; Asian, 0; Hispanic, 8, African American, 6; and Caucasian; 376. One percent of migrant students are enrolled at this elementary school. There are 22% of students eligible for free lunch and 9% eligible for reduced lunch.

During the 2007-2008 school year, the SWPBS elementary school housed approximately 396 students in grades kindergarten through fifth. The number of students in each grade level follows: kindergarten, 65; first, 62; second, 58; third, 73; fourth, 74; fifth, 64. The school’s diversity of students ranged as follows: American Indian, 3;
Asian, 0; Hispanic, 12, African American, 4; and Caucasian; 377. One percent of migrant students are enrolled at this elementary school.

Method of Sampling

This was a non-random, purposive sampling. The SWPBS elementary school to be used in the study has implemented SWPBS with a very high degree of fidelity and is an 80-80 school, based upon the School-wide Evaluation Tool (SET), administered by Dr. Timothy Runge, Educational Consultant, Pennsylvania Training and Technical Assistance Network, and Jeriesha Gilbert, Behavior Support Consultant, Lincoln Intermediate Unit 12 (Appendix A). A total of two years of data will be used in this study. The researcher will be comparing last year’s third graders (no SWPBS) to this year’s fourth graders (full SWPBS implementation).

Instrumentation

The measurement devices used in this study will include the Pennsylvania School System of Assessment (PSSA) scores in math and reading to measure, and the Modular Management System (MMS) student information management system to obtain office discipline referral data, and the School-Wide Evaluation Tool (SET) to determine the level of SWPBS implementation.

The 2007 reading and mathematics PSSA assessment for grade 3 consisted of six sessions. It was recommended that each section be scheduled as one assessment session; however, schools were allowed to combine multiple sections into a single session with the stipulation that the assessment must be administered in the sequence the test booklet was printed. The third grade reading and math assessment included: section one math: 22 multiple choice, 2 open ended mathematics questions with a recommended student
testing time of 60 minutes; section two reading: 24 multiple choice, 1 open ended reading questions with a recommended student testing time of 65 minutes; section three math: 22 multiple choice, 2 open ended mathematics questions with a recommended student testing time of 60 minutes; section four reading: 18 multiple choice, 2 open ended reading questions with a recommended student testing time of 60 minutes; section five math: 22 multiple choice, 1 open ended mathematics questions with a recommended student testing time of 50 minutes; and section six reading: 16 multiple choice, 1 open ended reading questions with a recommended testing time of 50 minutes (Data Recognition Corporation, 2008).

The reading and math assessments multiple choice questions are scored using a scanner while the open ended questions are scored by trained readers on a 0 – 4 point item-specific scoring guide. School results are reported using the percent of total points achieved compared to district and state level results. Performance levels, advanced, superior academic performance; proficient, satisfactory academic performance; basic, marginal academic performance; and below basic, inadequate academic performance; are used to help interpret student performance (Data Recognition Corporation, 2008).

The researcher went to the Pennsylvania Department of Education website to locate the technical report for the 2008 reading and mathematics PSSA assessment. This technical report was not available from the Data Recognition Corporation.

MMS is the student information management system used to collect discipline data for this elementary school. This data collection system monitors disciplinary incidents, from tracking student infractions and actions taken, to gathering data on school-wide behavior patterns, to generating data for NCLB safe school reporting.
Discipline infractions can be traced by locations in school and outside of the classroom, by using incident identifications (Modular Management System, 2008).

The School-Wide Evaluation Tool (Horner, Todd, Lewis-Palmer, Irvin, Sugai, & Boland, 2004) which is also called the SET is a 28 item questionnaire designed to determine whether a school has fully implemented school-wide positive behavior support.

The SET consists of 28 items organized into seven subscales that represent the seven key features of school-wide PBS:

1. school-wide behavior expectations are defined;
2. these expectations are taught to all children in the school;
3. rewards are provided for following expectations;
4. a consistently implemented continuum of consequences for problem behavior is put in place;
5. problem behavior patterns are monitored and the information is used for ongoing decision-making;
6. an administrator actively supports and is involved in every effort; and
7. the school district provides support to the school in the form of functional policies, staff training opportunities, and data collections options (Horner et al., 2004, p. 5).

A trained observer gathers the necessary information for the SET by using multiple sources including products, interviews or observations. All information collected is scored with either a 0 = not implemented, 1 = partially implemented, or 2 = fully implemented. An overall summary score is produced based upon the percentage of
possible points. A school with an overall summary percentage of 80% and a score of 80% in the category of behavior expectations taught is considered an 80-80 school who has fully implemented SWPBS.

School board and school district personnel may find the SET a useful instrument for (a) assessing the need for training, (b) assessing the impact of personnel development efforts in the area of school-wide PBS, (c) assessing the sustained use of school-wide PBS procedures, and (d) developing locally effective strategies for building school-wide PBS outcomes. (Horner et al., 2004, p. 10)

Psychometric analyses were conducted to evaluate the SET. The content and construct validity of the SET was established by virtue of the researchers working directly with teachers and administrators to obtain the content and scoring of the instrument. One could persuasively argue that working teachers and administrators have the knowledge and expertise to design and attest to the relevance of the SET’s items and establish an informed professional consensus as to the applicability and utility of these items.

In addition, the researchers established convergent validity for the SET by comparing its scores to another established instrument, the EBSSAS, which measures similar constructs, to see how similar the scores from the two instruments would be. Indeed, the scores from the two instruments were statistically significantly positively correlated, Pearson’s $r = .75$, ($p \leq .01$).

The reliability was established many ways. First, Cronbach’s alpha is the measure of inter-item consistency. Essentially, this statistic provides an index of how well these items correlate to one another. The overall alpha was .96 which exceeds the criteria for
research purposes. This supports that the SET is measuring a particular construct and not a diverse collection of unrelated ones.

The SET was also examined via test-retest procedures, which provide a reliability coefficient. The authors found that the scores from the second administration of the SET differed from the first administration of the SET by only 2.7%, which is quite good. What the authors showed is that the SET is reliable—that is, it is *consistently* and *accurately* measuring the constructs it purports to measure. How? The scores didn’t change all that much after a 14-20 day interval between testing dates.

**Data Collection**

The researcher collected PSSA data and office discipline data from Betty Whalen, Chief Information Officer, who created the data base for the researcher with all identifiers stripped. The identifiers which were excluded from this data base included names and ethnicity. The researcher excluded ethnicity because of the small sample size and need to keep the data anonymous. The data base included PSSA math scores, PSSA reading scores, and office discipline data on an aggregate level. The researcher only compared pre-post scores for an entire class so there is no need for the Chief Information Officer to link these scores. The SET evaluation tool was administered by Dr. Timothy Runge, Educational Consultant, Pennsylvania Training and Technical Assistance Network, and results were given to the building principal (Appendix A).

**Data Analyses and Statistics**

The researcher compared last year’s third graders (no SWPBS) to this year’s fourth graders (full SWPBS implementation). A t-test was used to determine whether the differences between mean scores, meets the criterion for statistical significance. The data
compared was ODRs and PSSA math and reading scores. This group was selected because they have not participated in the district’s math remediation program which the researcher acknowledged would be a limitation to the study.

The researcher wants to determine if the mean number of ODRs went down from last year to this year, which may be attributed to SWPBS. The researcher is also looking to determine if more students scored in below basic, basic, proficient or advanced performance categories this year than last which may be attributed to SWPBS.
CHAPTER IV

RESULTS

Introduction

Schools continue to face the challenge of how to implement a behavior management plan in which students are not likely to become repeat offenders. Traditional management models that are restrictive and punitive have not been effective in bringing about appropriate student conduct. A non-traditional management strategy to improve student behavior is to develop and implement a comprehensive, school-wide set of strategies to support positive behavior and academic performance for all students that is individually tailored to a school’s context. SWPBS (School-Wide Positive Behavior Support) occur as part of a three-tiered system. The universal level addresses supports planned and designed for all students within a building. The targeted intervention level consists of strategies for at-risk students who have difficulty meeting behavioral expectations designed for all students. The intensive interventions are designed for students who present severe and challenging behaviors that require individualized supports. This study will evaluate the effect of participating in SWPBS on the academic performance and number of office discipline referrals of elementary students.

The purpose of this research study was to determine whether the implementation of SWPBS increased academic performance and decreased the number of office referrals for a cohort of elementary students during their third grade (no SWPBS) and fourth grade (SWPBS) school years. The school being studied implemented SWPBS with fidelity according to the School Evaluation Tool (SET) evaluation conducted in May of 2008 (Appendix A). The critical components to the success of SWPBS include: explicitly
defining behavior expectations, explicitly teaching behavior expectations, explicitly acknowledging appropriately behaviors, proactively addressing problem behaviors, and willingly relying on data to adjust and reevaluate team programs. The SWPBS framework limits the study’s generalizability because it is not a program which can be replicated from one population to another. However, it should be noted that the impact of SWPBS implementation on this school will have further implications for implementation in the other district elementary schools and future research. To address the limitation of not having a baseline school with which to compare, the researcher examined PSSA math and reading trend data to further provide evidence as to whether SWPBS implementation resulted in increased academic performance and decreased the number of Office Discipline Referrals (ODR). Trend data are listed in tables 2 and 5.
Table 1

*Reading PSSA Student Participation*

<table>
<thead>
<tr>
<th>Number of Students</th>
<th>2005 Grade 3</th>
<th>2006 Grade 3</th>
<th>2007 Grade 3</th>
<th>2008 Grade 4</th>
</tr>
</thead>
<tbody>
<tr>
<td>Females</td>
<td>24</td>
<td>36</td>
<td>33</td>
<td>32</td>
</tr>
<tr>
<td>Males</td>
<td>35</td>
<td>26</td>
<td>35</td>
<td>33</td>
</tr>
<tr>
<td>Total</td>
<td>59</td>
<td>62</td>
<td>68</td>
<td>65</td>
</tr>
</tbody>
</table>

Table 1 lists the number of third grade students who participated in the reading PSSA test from 2005 to 2008. Overall PSSA test participation from 2005 to 2008 varied slightly. Between those years a minimum of 24 females and 26 male participated in test administration for reading math. The number of students in the cohort being studied, from 2007 (68) to 2008 (65), is also included in this table. The data shows there has not been an equal number of both math and female students who have taken the reading PSSA from 2005 to 2008. Overall there was an increase in the total number of students from year to year, except in 2008 there was a decrease in the total number of students who participated (Pennsylvania Department of Education, 2005, 2006, 2007, and 2008).
Table 2

*Reading PSSA Academic Performance Trend Data*

<table>
<thead>
<tr>
<th>Performance Levels</th>
<th>2005 Grade 3</th>
<th>2006 Grade 3</th>
<th>2007 Grade 3</th>
<th>2008 Grades 4</th>
<th>Trend</th>
</tr>
</thead>
<tbody>
<tr>
<td>Advanced</td>
<td>25%</td>
<td>16%</td>
<td>19%</td>
<td>12%</td>
<td>Decline</td>
</tr>
<tr>
<td>Proficient</td>
<td>32%</td>
<td>26%</td>
<td>47%</td>
<td>51%</td>
<td>Increase</td>
</tr>
<tr>
<td>Basic</td>
<td>20%</td>
<td>26%</td>
<td>15%</td>
<td>20%</td>
<td>Stagnant</td>
</tr>
<tr>
<td>Below Basic</td>
<td>22%</td>
<td>32%</td>
<td>19%</td>
<td>17%</td>
<td>Decline</td>
</tr>
</tbody>
</table>

Table 2 lists the percentage of students who scored advanced, proficient, basic, and below basic in the reading PSSA test from 2005 to 2008. In general the percentages of students scoring below basic, basic, and advanced are stagnant or declining. Students scoring proficient increased (Pennsylvania Department of Education, 2005, 2006, 2007, and 2008).
Table 3

*Reading PSSA Performance Levels*

<table>
<thead>
<tr>
<th>Performance Level</th>
<th>2005 Grade 3</th>
<th>2006 Grade 3</th>
<th>2007 Grade 3</th>
<th>2008 Grade 4</th>
</tr>
</thead>
<tbody>
<tr>
<td>Advanced</td>
<td>≥1442</td>
<td>≥1442</td>
<td>≥1442</td>
<td>≥1469</td>
</tr>
<tr>
<td>Proficient</td>
<td>1235-1441</td>
<td>1235-1441</td>
<td>1235-1441</td>
<td>1255-1468</td>
</tr>
<tr>
<td>Basic</td>
<td>1098-1234</td>
<td>1098-1234</td>
<td>1168-1234</td>
<td>1112-1254</td>
</tr>
<tr>
<td>Below Basic</td>
<td>≤1097</td>
<td>≤1097</td>
<td>≤1167</td>
<td>≤1111</td>
</tr>
</tbody>
</table>

Table 3 lists the performance level scaled score ranges for the reading PSSA test from 2005 to 2008. The advanced scaled score remains ≥1442 for 2005, 2006, and 2007. The advanced performance scaled score for 2008 increases to ≥1469, a difference of 327; therefore, the criterion has been raised higher for students to score in the advanced performance category. The proficient scaled score range stayed the same from 2005 to 2007 at 1235-1441. In 2008, the scaled score ranged changed to 1255-1468; therefore, raising the score for students to place in the proficient category. In 2005 and 2006, students scored in the basic category if the score range was 1098-1234. In 2007, the basic range was 1168-1234, therefore, raising the cutoff score for students to place in the basic performance level. In 2008, students had to score 1112-1254 to be at the basic level, which decreased the score needed for students from the previous year to be considered at the basic performance level. The below basic cutoff score of ≤1097 remained the same for 2005 and 2006. The same trend occurred for the cutoff for below basic as basic scores.

Table 4

*Math PSSA Student Participation*

<table>
<thead>
<tr>
<th>Number of Students</th>
<th>2005 Grade 3</th>
<th>2006 Grade 3</th>
<th>2007 Grade 3</th>
<th>2008 Grade 4</th>
</tr>
</thead>
<tbody>
<tr>
<td>Females</td>
<td>24</td>
<td>36</td>
<td>33</td>
<td>32</td>
</tr>
<tr>
<td>Males</td>
<td>35</td>
<td>26</td>
<td>35</td>
<td>33</td>
</tr>
<tr>
<td>Total</td>
<td>59</td>
<td>62</td>
<td>68</td>
<td>65</td>
</tr>
</tbody>
</table>

Table 4 lists the number of third grade students who participated in the math PSSA test from 2005 to 2008. There were 24 female and 35 male participants in 2005. In 2006, there were 36 female and 26 male participants. There were 33 female students and 35 male students during the 2007 math PSSA assessment. In 2008, there were 32 females, indicating one less student from the previous year cohort and 33 males, indicating two fewer students in the original cohort group. The number of students in the cohort being studied, from 2007 (68) to 2008 (65), is also included in this table. The data show there has not been an equal amount of both math and female students who have taken the Math PSSA from 2005 to 2008. Overall there was an increase in the total number of students from year to year, except in 2008 there was a decrease in the total number of students who participated (Pennsylvania Department of Education, 2005, 2006, 2007, and 2008).
Table 5

*M Math PSSA Academic Performance Trend Data*

<table>
<thead>
<tr>
<th>Performance Levels</th>
<th>2005 Grade 3</th>
<th>2006 Grade 3</th>
<th>2007 Grade 3</th>
<th>2008 Grade 4</th>
<th>Trend</th>
</tr>
</thead>
<tbody>
<tr>
<td>Advanced</td>
<td>36%</td>
<td>23%</td>
<td>16%</td>
<td>15%</td>
<td>Decline</td>
</tr>
<tr>
<td>Proficient</td>
<td>36%</td>
<td>34%</td>
<td>49%</td>
<td>52%</td>
<td>Increase</td>
</tr>
<tr>
<td>Basic</td>
<td>20%</td>
<td>26%</td>
<td>28%</td>
<td>11%</td>
<td>Decline</td>
</tr>
<tr>
<td>Below Basic</td>
<td>8%</td>
<td>18%</td>
<td>7%</td>
<td>22%</td>
<td>Increase</td>
</tr>
</tbody>
</table>

Table 5 lists the percentage of students who scored advanced, proficient, basic, and below basic in the math PSSA test from 2005 to 2008. The percentage of students scoring advanced and basic decreased whereas proficient and below basic increased (Pennsylvania Department of Education, 2005, 2006, 2007, and 2008).
Table 6

*Math PSSA Performance Levels*

<table>
<thead>
<tr>
<th>Performance Level</th>
<th>Scaled Score Range</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>2005 Grade 3</td>
</tr>
<tr>
<td>Advanced</td>
<td>≥1370</td>
</tr>
<tr>
<td>Proficient</td>
<td>1180-1369</td>
</tr>
<tr>
<td>Basic</td>
<td>1050-1179</td>
</tr>
<tr>
<td>Below Basic</td>
<td>≤1049</td>
</tr>
</tbody>
</table>

Table 6 lists the performance level scaled score ranges for the math PSSA test from 2005 to 2008. The advanced scaled score remains ≥1370 for 2005, 2006, and 2007. The advanced performance scaled score for 2008 increases to ≥1445, a difference of 74; therefore, the criteria have been raised higher for students to score in the advanced performance category. The proficient scaled score range remained constant from 2005 to 2007 at 1180-1369. In 2008, the scaled score ranged changed to 1246-1444; therefore, raising the score for students to place in the proficient category. In 2005 and 2006, students scored in the basic category if the score range was 1050-1179. In 2007, the basic range was 1044-1179, therefore, raising the cutoff score for students to place in the basic performance level. In 2008, students had to score 1156-1245 to be at the basic level, which decreased the score needed for students from the previous year to be considered at the basic performance level. The below basic cutoff score of ≤1049 remained the same for 2005 and 2006. The same trend occurred for the cutoff for below basic as basic scores.

In reviewing and summarizing PSSA trend data, both math and reading for 2005 to 2008 indicated that the percentage of advanced students declined. The reading PSSA data revealed over time there was a higher percentage of students who scored proficient; however, there was an increase in the number of students who performed basic. The math PSSA data indicated a higher percentage of students scoring proficient; however, the data also revealed a higher percentage of students scoring below basic. Pennsylvania provides cutoff scores for advanced, proficient, basic and below basic and it is important to note that the state requires school districts to meet a certain percentage of proficiency each year.

As related to this study, this school did not meet adequate yearly progress (AYP), for the economically disadvantaged subgroup, as defined by the state. The AYP target for students scoring proficient or advanced was 56% for math and 63% for reading. Therefore, this school is on the official warning list to increase the subgroup by a minimum of ten percent (below basic-basic to proficient). Without an increase in the level of student performance, the school will be in school improvement which means the school to increase this subgroups proficiency, based upon the PSSA assessment.
Research Hypotheses

The research hypothesis states the implementation of School-Wide Positive Behavior Support will increase academic performance and decrease the number of office referrals for a cohort of elementary students during their third grade (no SWPBS) and fourth grade (SWPBS) school years. Looking at the above trend data, it showed academic performance increased for students in the math and reading proficiency performance categories.

Research Hypothesis

H1: Elementary students will have higher Math PSSA scores after SWPBS implementation than elementary students with no SWPBS implementation.

Table 7

*Math PSSA Paired Sample Statistics*

<table>
<thead>
<tr>
<th></th>
<th>M</th>
<th>N</th>
<th>SD</th>
<th>SE</th>
</tr>
</thead>
<tbody>
<tr>
<td>Math 06-07</td>
<td>1065.48</td>
<td>82</td>
<td>438.08</td>
<td>48.38</td>
</tr>
<tr>
<td>Math 07-08</td>
<td>1125.87</td>
<td>82</td>
<td>469.71</td>
<td>51.87</td>
</tr>
</tbody>
</table>

The difference between the means is not statistically significant ($t = -.825, df = 81, p > .01$). Data indicated there was no difference in Math PSSA scores after SWPBS implementation; therefore, the null hypothesis will be retained.

H2: Elementary students will have higher Reading PSSA scores after SWPBS implementation than elementary student with no SWPBS implementation.
Table 8

*Reading PSSA Paired Sample Statistics*

<table>
<thead>
<tr>
<th></th>
<th>M</th>
<th>N</th>
<th>SD</th>
<th>SE</th>
</tr>
</thead>
<tbody>
<tr>
<td>Reading 06-07</td>
<td>1123.35</td>
<td>82</td>
<td>463.06</td>
<td>51.14</td>
</tr>
<tr>
<td>Reading 07-08</td>
<td>1113.11</td>
<td>82</td>
<td>475.72</td>
<td>52.53</td>
</tr>
</tbody>
</table>

The difference between the means is not statistically significant ($t = .139$, $df = 81$, $p > .01$).

Data indicated there was no difference in Reading PSSA scores after SWPBS implementation; therefore, the null hypothesis will be retained.

H3: Elementary students will have fewer ODRs after SWPBS implementation than elementary students with no SWPBS implementation.
Table 9
Office Discipline Referral Paired Sample Statistics

<table>
<thead>
<tr>
<th></th>
<th>M</th>
<th>N</th>
<th>SD</th>
<th>SE</th>
</tr>
</thead>
<tbody>
<tr>
<td>ODR 06-07</td>
<td>.65</td>
<td>82</td>
<td>.97</td>
<td>.11</td>
</tr>
<tr>
<td>ODR 07-08</td>
<td>.67</td>
<td>82</td>
<td>1.74</td>
<td>.19</td>
</tr>
</tbody>
</table>

The difference between the means is not statistically significant ($t = -.123, df = 81, p > .01$). Data indicated there was no difference in the number of ODRs after SWPBS implementation; therefore, the null hypothesis will be retained.

Summary

Research hypothesis one stated elementary students will have higher Math PSSA scores after SWPBS implementation than elementary students with no SWPBS implementation. Data indicated there was no difference in Math PSSA scores after SWPBS implementation; therefore, the null hypothesis will be retained. The difference between the means of Math PSSA was not statistically significant and SWPBS implementation did not increase academic performance.

Research hypothesis two stated elementary students will have higher Reading PSSA scores after SWPBS implementation than elementary students with no SWPBS implementation. Data indicated there was no difference in Reading PSSA scores after SWPBS implementation; therefore, the null hypothesis will be retained. SWPBS implementation did not increase academic performance on the reading PSSA assessment.
Research hypothesis three stated elementary students will have fewer ODRs after SWPBS implementation than elementary students with no SWPBS implementation. Data indicated there was no difference in the number of ODRs after SWPBS implementation; therefore, the null hypothesis will be retained. SWPBS implementation did not significantly decrease the number of office discipline referrals.
CHAPTER V

DISCUSSION

Introduction

Houston and Sokolow (2006) remind leaders to “Remember that one of the keys to a successful organization is helping everyone become aware that he or she is part of the whole” (p. 102).

Ensuring the safety and education of students requires the organization setting up the opportunity for all of its members to participate which is summarized by this chapter’s opening quotation. The inception of this dissertation study began when three school shootings occurred in less than one week in 2006. School officials could easily over-react to these horrific, but rare incidents. Incidents, such as these, place urgency to find ways to ensure student safety is paramount, especially when you consider the need for safety (emotional or psychological) as well as the absence of threats is imperative for all other student higher-level needs to be satisfied (Maslow, 1968). Put into perspective, school officials can provide opportunities for students to feel safe by creating an environment which promotes positive behavior and academic performance and it is crucial this is done with the help of everyone in the school community.

Administrators constantly face the challenge of being responsible for finding ways to ensure student are safe and receiving an appropriate education. Being an instructional leader may only be a dream for some administrators because most of his or her time is spent handling discipline issues. Schools continue to debate on how to implement a behavior management plan in which students are not likely to become repeat
offenders. Traditional management models are restrictive and punitive leading to little effect in bringing about appropriate student conduct.

Not only are administrators seen struggling to find ways to address student behavior, teachers find it challenging to find time for instruction when struggling with students’ classroom behaviors. When disruptive student behavior occurs, instructional time is lost for the disruptive student and his or her classmates.

To educators it may seem common sense that School-Wide Positive Behavior Support mirrors what would be done for a student struggling academically. The intent of implementing SWPBS is to provide an intervention to decrease the number of disruptive behaviors with the intent of having more time for instruction. Critical components to the success of SWPBS include:

- Explicitly defining behavior expectations
- Explicitly teaching behavior expectations
- Explicitly acknowledging appropriate behaviors
- Proactively addressing problem behaviors
- Willingly relying on data to adjust and evaluate team programs

This study investigated how one school community took a proactive step to ensuring school safety by implementing the SWPBS framework to promote positive behavior and academic performance by developing a comprehensive school-wide set of strategies to support positive behavior.
Statement of Problem

This chapter will examine the findings based upon the overarching question: Will implementing School-Wide Positive Behavior Support (SWPBS) improve academic performance and decrease the number of discipline referrals? Questions guiding this research study included:

1. Elementary students will have higher Math PSSA scores after SWPBS implementation than elementary students with no SWPBS implementation.
2. Elementary students will have higher Reading PSSA scores after SWPBS implementation than elementary students with no SWPBS implementation.
3. Elementary students will have fewer ODRs after SWPS implementation than elementary students with no SWPBS implementation.

Finding and Interpretations

The literature review revealed a study measuring the relationship of school-wide positive behavior support to academic performance in an urban middle school. Lassen, Steele, and Sailor (2006) conducted a 3-year longitudinal study involving several low income, inner-city schools. Results of the study were presented as a case study of one target middle school located in the Midwest. The average enrollment of this middle school was 623 and approximately 80 percent of the school population was economically disadvantaged because they met the criteria for free and reduced lunch programs.

The following outcome measures were used to assess student problem behavior and overall school functioning: office discipline referral (ODR) and suspensions; school-wide evaluation tool (SET); positive reward system; and academic performance based upon the math and reading scores from the Kansas State Assessment.
The SET and positive reward system were analyzed using Cronbach’s alphas and indicated adequate reliability of .77. Two sets of analyses were conducted to examine the number of ODR and suspensions. Descriptive statistics and ANOVAs were conducted that indicated statistically significant results of a decrease in ODR and suspensions. Two separate ANOVAs were used to analyze if test scores significantly increased over the three year study. The first ANOVA indicated no significant increase in reading scores over the study period but the second ANOVA indicated a significant increase in math scores. The final regression analyses conducted examined the relationship between disciplinary actions and academic performance. The analyses indicated students who had fewer office discipline referrals (ODRs) scored higher on the standardized reading and math tests.

Several factors limited the generalizability of this study. First, there was no control school. Second, lacking specificity in positive referral ticket, ODR, and suspension data making it difficult to access and analyze. This meant school officials did not keep track of the number of office discipline referrals, suspensions and number of positive referral tickets were given making it difficult to determine whether the implementation of SWPBS impacted this data. A third limitation was that the data were compared across groups of students instead of tracking the same groups of students over time.

The limitations of the Lassen, Steele, and Sailor (2006) study were acknowledged in this research study. To address the limitation of not having a baseline school, the researcher examined PSSA Math and Reading trend data to further provide evidence as to whether SWPBS implementation resulted in increased academic performance and a
decrease in the number of Office Discipline Referrals (ODR). This study used the School-wide Evaluation Tool to measure fidelity of SWPBS implementation. This school implemented SWPBS with fidelity based upon the seven key features which include (1) Expectations Defined, (2) Behavioral Expectations Taught, (3) Reward System, (4) Violations System, (5) Monitoring and Decision-Making, (6) Management, and (7) District-level Support. This study also tracked students over time. A cohort of 83 students’ Math PSSA scores, Reading PSSA scores, and Office Discipline Referrals were examined during the 06-07 school years.

The researcher inferred, based upon previous literature reviewed, implementing a school-wide intervention to teach and positively reinforce positive behavior would have a direct relationship on academic performance, meaning more instructional time would be gained if less time was spent dealing with difficult behaviors of students. The study conducted by Nelson, Martella, and Marchand-Martella (2003), revealed positive effects on student discipline and academic performance over a two year period in seven elementary schools as compared to the district’s remaining 28 elementary schools without a comprehensive school-wide program. The 3-year longitudinal study conducted by Lassen, Steele, and Sailor (2006), also indicated a significant increase in math scores but not reading over the three year study.

The two year data collected from this cohort of students did not show a significant increase in Reading and Math PSSA scores after SWPBS implementation. A noted strength of this study, as compared to other studies reviewed in the literature, is that trend data were collected since a control group could not be established. The percentage of students scoring in the advanced and below basic performance levels declined while the
percentage of students performing proficient increased and the basic performance level percentage remained stagnant. The Math PSSA percentage of students scoring advanced and basic decreased from 2005 to 2008, while the percentage of students scoring proficient and below basic increased. The attainment goal for both Reading and Math PSSA performance levels would be to see an increase of all students moving toward proficiency or advancement.

Students in grades K-3, who score at risk on Dynamic Indicators of Basic Early Literacy Skills (D.I.B.E.L.S.), qualify for additional reading support from Title I services. The cohort being studied would have received this reading support in grade three but not in grade four which may attribute to the reading scores not increasing.

Students scoring below basic meaning inadequate performance in math were offered remediation in grades three and four during the 07-08 school year. Unfortunately, due to the large number scoring below basic in grades three and five, this cohort did not receive math remediation which could attribute to math scores not increasing.

Monitoring this trend data raises questions about curriculum and instruction which were not part of this research study. The researcher could infer because the trend data reported did not have a steady increase of the percentage of students moving upward in each performance category, naturally there would not be a significant increase in performance, despite SWPBS implementation. For an increase of academic performance to occur, this school needs to delve further into monitoring curriculum and instruction system-wide.

The changing of the PSSA level scaled score ranges from 2005-2008 made it harder to score proficient and advanced than in previous years. This could also be a
contributing factor in not being able to see the percentage of students increase in performance levels across time. This scaled score range change makes it hard to determine whether SWPBS implementation had an impact on improving academic performance.

In hindsight, the researcher also did not consider collecting data on formative assessments given to students throughout the school year in math and reading. PSSA is a summative assessment which gives one snapshot measurement of a student’s performance. PSSA may not be sensitive enough to pick up a change in actual skill acquisition; therefore, not allowing the researcher to measure growth in academic performance. Multiple assessment measures could be used to gain a more accurate picture of student academic performance.

Lewis et al. (1998) examined the effects of a proactive school-wide approach to discipline on the number of behaviors displayed by elementary students in the cafeteria, recess and hallway transitions through the use of asocial skill instruction program combined with direct instruction. A multiple baseline across setting design revealed there was no effect on decreasing problem behaviors; however, there was a reduction in problem behavior with direct instruction. The cohort in this study received direct instruction of behavioral expectation during the year of SWPBS implementation, which one could infer, from the previous study, would contribute to decreasing the number of ODRs. This cohort of students did not have fewer ODRs after SWPBS implementation. There were a total of 52 ODRs during the 2006-2007 school year without SWPBS implementation and 55 during the 2007-2008 year of SWPBS implementation. The data indicate no significant decrease in the number of office referrals; however, it is important
to note this school saw a decrease in the overall number of ODRs school-wide from before and after years of SWPBS implementation. Grades K-5 had a total of 316 ODRs at the end of the 2006-2007 school year and 267 ODRs at the end of the SWPBS implementation year of 2007-2008. This indicates a decrease of 49 student referrals which could be a result of SWPBS implementation.

The cohort being studied may not have seen a significant increase in overall ODRs due to not having incidents of problem behaviors being reported in the past. In particular, bus referrals were not always reported but data indicated this was an area of concern for the school community. Once the bus behavior expectations were defined, the number of referrals increased, probably due to more attention being placed on the importance of referring the problem behavior to the office for an intervention to occur. An inference can be made that an increase in referrals could be seen because more attention is being place on teaching appropriate and monitoring behaviors based upon shared expectations.

The researcher could infer not having an increase in Math and Reading PSSA scores resulted in the number of referrals increased, despite SWPBS implementation. If academic performance did not increase, it could result in student behavior increasing because students were not academically engaged. Students not being challenged and engaged academically could result in an increase in problem behaviors.
Conclusion

This study investigated whether implementing SWPBS improved academic performance and decreased the number of discipline referrals. The cohort studied did not indicate implementing SWPBS increase academic performance and decrease ODRs. Implementing a school-wide positive behavior support system did not automatically predict an increase in student performance in this study.

Continuing to collect this data overtime may indicate this system to promote positive behavior may improve academic performance and decrease ODRs. Knowing the staff is committed to this system approach, based upon the S.E.T. evaluation, it is critical to continue to monitor the implementation of this system and its impact on the school community.

This study is limited in generalizability to this school and cohort of students, yet the design of the research provides insight into the importance of using trend data to build a case for the impact of this framework’s implementation, especially knowing it difficult to find a control group because of demographics and the fact this is a framework and not a program that can be replicated. When analyzing the critical components to the success of this of this framework for behavior, one sees it mirrors Response to Intervention that focuses on providing best instructional practices and interventions that are monitored do ensure student academic success.

The researcher interacted in the setting where the treatment occurred which is a limitation to the study. The intermediate until that trained this researcher and the SWPBS team members is currently recruiting more districts each year to be trained and this will provide more data that can be analyzed. It would be beneficial to the research community
if someone outside these districts, could collect state data to provide more research on the impact of SWPBS on behavior referrals and academic performance. The researcher believes the SWPBS framework is more valuable than a program because it forces the community to make the model fit the organization’s needs. More data needs to be collected and analyzed to show how SWPBS contributes to the field.

Recommendations

The relationship between behavior and performance may not be as easily understood as we think. Because a student is not a behavior problem does not mean that he/she is achieving. It is highly recommended if this study is replicated to do so longitudinally and to include both SWPBS and RtI framework. It would be beneficial to the research community to look at academic performance and office discipline referrals overtime to see if SWPBS implementation impacts the data. The critical component would be to collect multiple measures of data which include but are not limited to:

- Attendance
- Office discipline data
- Classroom discipline data
- Number of positive behavior plans implemented
- Formative academic assessments
- Summative academic assessments

A future study could also include having a third party randomly visit and monitor the building office discipline referrals and research based instructional method implementation to support the fidelity of office referrals and instruction. The research community would also benefit from a qualitative study as it relates to SWPBS.
Summary

It is the responsibility of the school administrator to ensure students are safe and learning and this cannot be done without collaboration, problem-solving, and teamwork among the school community. It begins with asking the right question, “what” and ‘how” to help students be successful both academically and behaviorally. Miller (2006) calls this the Question Behind the Question (QBQ). “The QBQ is a tool that helps leaders at all levels practice personal accountability by asking better questions and making better choices in the moment” (p. 7).

This research provides insight into the implementation of SWPBS and its impact on ODRs and academic performance. This school took a proactive approach to addressing student behavior and we can infer will reap the benefits of this problem-solving system approach if it continues to follow the framework. This research also lends the importance of investigating further the impact of curriculum and instruction and its impact on behavior. This school has begun to implement the Response to Intervention Model which overtime the researcher could infer a positive impact on student performance over time.
REFERENCES


http://flpbs.fmhi.usf.edu/whatispbs_def.asp


APPENDIX A

Data from “St. Thomas Elementary School School-wide Evaluation Tool (SET)” and “St. Thomas May 2008 SET: Feature Scores and Implementation Average”
St. Thomas Elementary School
School-wide Evaluation Tool (SET)

**District:** Tuscarora School District  
**Date of Assessment:** May 13, 2008  
**SET Data Collectors:** Timothy Runge (PaTTAN) and Jeriesha Gilbert (IU 12)  
**Date of Report:** May 14, 2008  
**Submitted By:** Timothy J. Runge, Ph.D., SWPBS Regional Coordinator for PaTTAN

**SET Background:** The SET is a research instrument for determining the extent to which a school is implementing school-wide positive behavior support (SWPBS). The SET evaluates a total of twenty eight research questions across seven feature areas. The seven features include (1) Expectations Defined, (2) Behavioral Expectations Taught, (3) Reward System, (4) Violations System, (5) Monitoring and Decision-Making, (6) Management, and (7) District-level Support. Information necessary for this evaluation tool is gathered through multiple sources including a review of permanent products (including discipline handbook, school improvement plan for safety related goals, instructional materials, meeting minutes), observations, and brief staff and student interviews. The SET results provide a summary score that is used (a) to determine annual goals for school-wide effective behavior support, (b) to evaluate on-going efforts toward school-wide behavior support, (c) to design and revise procedures as needed, and (d) to compare annual accomplishments toward school-wide effective behavior support.

**SET Scoring:** For each of the seven broad features on the SET, a percentage is calculated which quantifies the extent to which each feature meets the twenty eight research questions. The following is a summary of St. Thomas’s results from the SET across the seven features. The summary bar graph for St. Thomas’s SET is attached to this report.

*Expectations Defined:* This feature of the SET evaluates the extent to which the school-wide rules and expectations are documented and visible throughout the building. Rules and expectations should be agreed upon by all staff and operationalized in five or fewer positively-worded statements. St. Thomas’s percentage of implementation on the *Expectations Defined* feature was 100%.

*Behavioral Expectations Taught:* This feature of the SET evaluates whether the behavioral expectations were documented in lesson plans, explicitly taught and reviewed by school staff, and whether students and staff could state the school-wide rules. St. Thomas’s percentage of implementation on the *Behavioral Expectations Taught* feature was 90%.

*Reward System:* This feature of the SET evaluates the documented system for rewarding student behavior, whether students received a reward (other than verbal praise) within the past two months, and whether staff indicated that they
delivered a reward (other than verbal praise) to students in the past two months. St. Thomas’s percentage of implementation on the *Reward System* feature was 83%.

**Violations System:** This feature of the SET evaluates the documented system for dealing with and reporting specific behavioral violations, administrator-staff agreement on what behaviors are office managed versus classroom-managed, availability of crisis plans, and administrator-staff agreement on procedures for handling extreme emergencies. St. Thomas’s percentage of implementation on the *Violations System* feature was 100%.

**Monitoring and Decision-Making:** This feature of the SET evaluates the comprehensiveness of the office discipline referral form to include all relevant objective and behavioral data, a clearly defined system to collect and summarize discipline referrals, regular reporting of discipline data to the entire staff, and use of discipline data by the behavior team members to make decisions in designing, implementing, and revising the SWPBS program. St. Thomas’s percentage of implementation on the *Monitoring and Decision-Making* feature was 100%.

**Management:** This feature of the SET evaluates the prioritization of the SWPBS program among other building initiatives, establishment of a representative SWPBS team to oversee the program, regularly scheduled SWPBS team meetings, an identified leader for the SWPBS team, the principal’s active participation on the SWPBS team, regular reporting of SWPBS efforts to the entire faculty, and a documented action plan for long- and short-term SWPBS goals. St. Thomas’s percentage of implementation on the *Management* feature was 100%.

**District-level Support:** This feature of the SET evaluates the level of district support for the building’s SWPBS program and whether district or building monetary resources are allocated to support SWPBS. St. Thomas’s percentage of implementation on the *District-level Support* feature was 100%.

**Implementation Average:** The average percent implementation across the above seven features is used to quantify the overall implementation of all aspects of SWPBS. St. Thomas’s overall average implementation across all features of the SET was 96%.

**Areas of Strength:** Given St. Thomas’s percent implementation of 100% on the following features, it is noted that these are areas of strength:

- Expectations Defined
- Violations System
- Monitoring and Decision-Making
- Management
- District-level Support
**Areas for Improvement:** SET data suggest the following areas the SWPBS team could target for improvement:

- Creating, documenting, and implementing a schedule for teaching all behavioral expectations and rules in all school environments. This would require the participation of all staff and students and would ideally be accomplished at the beginning of the year with booster sessions provided throughout the year as the discipline data indicated.
- Documentation of the reward system in the teacher and/or student handbook.

**Summary:** Results from multiple research studies indicates that schools that perform at least 80% implementation on both the Behavioral Expectations Taught feature and overall Implementation Average are schools that are implementing SWPBS with a high degree of fidelity. These schools, termed 80-80 schools for the minimum criteria for Behavioral Expectation Taught and Implementation Average, are implementing Tier 1 behavioral support very effectively and are ready to engage in developing Tier 2 levels of behavioral support for students who are behaviorally or academically at-risk.

St. Thomas’s percent implementation for Behavioral Expectations Taught was 90%, thus exceeding the 80% minimum standard. St. Thomas’s Implementation Average of 96% also exceeds the 80% minimum criterion. Therefore, results from St. Thomas’s SET indicate that this school’s SWPBS program is implemented with a very high degree of fidelity. Independent evaluation of St. Thomas’s SWPBS program indicates that this school is an 80-80 school and thus ready to move forward with developing, implementation, and evaluating Tier 2 behavioral supports and intervention.