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Implementation, Outcomes, And Perceived Effectiveness Of Positive Behavioral Interventions And Supports (Pbis) In A Title I School: A Program Evaluation

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Dedication

Some people don't think adults should reference their parents as heroes—I've never understood that premise. My mother and father came from humble beginnings. Under circumstances that would have caused most to quit, they kept going. My parents exude selflessness, resilience, and overall excellence. They are the epitome of everything I aspire to be.

This dissertation is dedicated to my heroes:

LTC. Harold R. Payne, Jr. and Dr. Patricia Payne

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Thank You, God. “If I had 10,000 tongues, I couldn’t thank You enough.” I’ve grown through adversity in ways I didn’t think were possible. There have been times the devil tried to stop me from being all that I am called to be, “but God.”

I’d be remiss not to acknowledge my mother and father for literally everything. I can’t begin to craft a sufficient list that details the love and support my parents provide, so I won’t even attempt. However, I do want to specifically acknowledge my parents for believing in me and my ability to earn a doctoral degree. I must have sent over one hundred drafts of my dissertation, and I’m pretty sure they read each version. My parents inspire and encourage me to reach heights that others referenced as impossible for me to even dream. Thank you.

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During my pursuit of a doctoral degree, I experienced what some refer to as a series of unfortunate events: I was T-boned in a car accident that caused my car to be smashed on all sides and its windows busted, travel across four lanes of traffic, and knock street signs out of a median. Doctors attributed my survival to young age and divine intervention. In addition, four loved ones passed away, and other loved ones were diagnosed with cancer and other serious illnesses. There are also other, even more personal, experiences that had a traumatic impact on my life during my educational journey; however, now I realize those experiences helped me grow. Everything that I went through, I got through—and I couldn’t have done it without my village. Thank you!

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Abstract

Students who miss instructional time as a consequence of discipline infractions can manifest outcomes reflected in both dropout and incarceration rates. The school-to-prison pipeline refers to the impact of exclusionary responses to discipline infractions that push students out of school and into the criminal justice system. African American students of low socioeconomic status are often subjected to exclusionary discipline practices. Positive Behavioral Interventions and Supports (PBIS) implementation aids the mitigation of discipline infractions, without relying on exclusionary practices. However, there is limited research on program efficacy and specific PBIS outcomes for African American students in combined Title I schools. This mixed-methods program evaluation examined disciplinary outcomes for the aforementioned population and serves as a resource for best practices regarding PBIS implementation. This study used the School-Wide Evaluation Tool (SET), Kruskal-Wallis test, and thematic analysis to triangulate data. The PBIS implementation fidelity score was 70%; the benchmark was 80%. The distribution of discipline infractions was statistically significantly different between implementation periods, $\chi^2(8) = 28.905$, $p = .001$. Thematic analysis highlighted the need for educators to promote positive behaviors, be consistent, and develop cultural competence. Educators must be intentional in ensuring equity. An all-encompassing recommendation is to provide professional development for systemic implementation of culturally responsive discipline practices using PBIS. With the proper interventions, students who display challenging behaviors can learn to display positive behaviors and become productive members of society.

IMPLEMENTATION, OUTCOMES, AND PERCEIVED EFFECTIVENESS OF POSITIVE BEHAVIORAL INTERVENTIONS AND SUPPORTS (PBIS) IN A TITLE I SCHOOL: A PROGRAM EVALUATION

CHAPTER 1

INTRODUCTION

Without proper interventions, students who display challenging behaviors can become unproductive members of society (Gagnon et al., 2008; Gilligan et al., 2003; Kim et al., 2010). Increased discipline infractions can lead to decreased academic achievement (McIntosh & Goodman, 2016; Pas & Bradshaw, 2012; Simonsen et al., 2015). Students who miss instructional time as a consequence of discipline infractions can manifest outcomes reflected in both dropout and incarceration rates. Accordingly, educators are prompted to improve discipline practices and policies (Flannery et al., 2014; Pas & Bradshaw, 2012; Simonsen et al., 2015).

Background

The term *school-to-prison pipeline* is often used to reference the effects of exclusionary responses to discipline infractions that push students out of school and into the criminal justice system (Darensbourg et al., 2010; Heitzeg, 2009; Losen & Martinez, 2013; Petteruti, 2011; U.S. Department of Education [USDOE], 2014; Wald & Losen, 2003). Exclusionary discipline policies resulting in harsh consequences for minor discipline infractions are considered factors that can contribute to the expansion of the school-to-prison pipeline; these consequences are typically suspensions and expulsions resulting from discipline referrals (Mallett, 2016; Morgan et al., 2014; National Council on Disability, 2015; Petteruti, 2011; USDOE, 2014). Minor discipline infractions include, but are not limited to, acting out in class, disobedience, truancy, dress code violations, cell phone use, disrespect, chewing gum, and cheating (Mallett, 2016;

USDOE, 2014). African American students of low socioeconomic status are often subjected to exclusionary discipline practices and pushed into the school-to-prison pipeline (Christle et al., 2004; Noltemeyer & Mcloughlin, 2010). Positive Behavioral Interventions and Supports (PBIS) is a systems approach to curbing inappropriate behaviors without relying on exclusionary discipline practices; moreover, the USDOE (2014) recognizes PBIS as a method to combat factors that lead to the expansion of the school-to-prison pipeline.

One school district in which PBIS has been implemented is State City School District (pseudonym), an urban school district where most of the student population lives at or below the poverty level. In 2016, district leaders emphasized established goals and articulated new goals for the school district; the goals included, but were not limited to, reducing office discipline referrals, closing the achievement gap, reducing dropout rate, and graduating 100% of students. In a community report, State City School District referenced PBIS as a proactive, systematic approach to meet/exceed the previously mentioned goals and produce college- and career-ready citizens.

There is a heavy focus on elementary and middle schools to improve behavioral and academic outcomes, prior to students entering high school. Wonderland School (pseudonym) is a Title I combined school in the State City School District. Wonderland School houses all of the grade levels (pre-kindergarten to eighth grade) preceding high school. Further, African American students make up 77.5% of Wonderland's student population. The district's leadership team charged Wonderland to decrease discipline infractions by implementing a PBIS program.

PBIS has been shown to have a positive effect on student behavior and academic achievement (Bear et al., 2017; Benner et al., 2013; Bohanon & Wu, 2014; Bosworth & Judkins, 2014; Childs et al., 2016; Flannery et al., 2014; J. P. Johnson, 2014; Simonsen et al., 2015;

Simonsen & Sugai, 2013). While there is a proven correlation between PBIS and positive behavioral outcomes, school leaders should not assume specific outcomes for majority Caucasian (or diverse) populations will be the same outcomes experienced by majority African American populations of low socioeconomic status (Losen & Martinez, 2013; Sullivan et al., 2013). There is limited research on program efficacy and specific PBIS outcomes for African American students in a combined Title I school. Regarding timeframe, Wonderland has been implementing a PBIS program for 7 years; however, there has been no formal evaluation of program implementation. This program evaluation examined disciplinary outcomes for African American students in a Title I school and serves as a resource for school leaders regarding best practices to implement PBIS with fidelity.

Program Description

PBIS is a multi-tiered approach to providing proactive strategies for defining, teaching, and supporting appropriate student behaviors that support the cultivation of positive school environments (PBIS, n.d.). More specifically, PBIS "strategies are important tools to decrease disruptions, increase instructional time, and improve student social behavior and academic outcomes" (Simonsen et al., 2015, p. 1). When implemented with fidelity, PBIS can also act as a vehicle to promote social justice by ensuring culturally responsive and equitable practices (Bal et al., 2016; A. D. Johnson et al., 2018; Reno et al., 2017; Sensoy et al., 2017).

Context

Of the teachers at Wonderland School, 24.4% are provisionally licensed (according to the State Department of Education website); 13.4% of the provisionally licensed teachers have less than 1 year of teaching experience. The highest degree earned by 51% of the teachers is a bachelor's degree; the highest degree earned by 43% of the teachers is a master's degree. The

remaining 6% of teachers hold a degree that is higher than a master's degree. In addition to scholarly achievements, every teacher at Wonderland has gone through an interview process. Prior to receiving a job offer, each teacher is expected to demonstrate an ability to educate Wonderland's students during an interview with school administrators. In short, faculty and staff of Wonderland are vetted prior to being hired. Further, each teacher receives new teacher training prior to the beginning of the school year (which continues for the duration of the school year).

Wonderland is in an urban school district where the majority of the students are eligible for free or reduced-price lunch (according to the State Department of Education website). The population of economically disadvantaged students at Wonderland is 89.7%. The population of students with disabilities at Wonderland School is 10%. A small percentage (.5%) of students are English Language Learners. Students of color comprise a large percentage of Wonderland's 1,161 student enrollment: 77.5% African American, 10.3% Caucasian, 7.1% two or more races, 3.9% Hispanic, .5% Asian, .1% American Indian, and .2% Native Hawaiian.

Wonderland's demographic, discipline, and academic data are considered by school leadership when developing strategies to attain and retain accreditation. The previous mentioned data are essential to developing a school learning plan because absenteeism and academic performance are determinants for accreditation. Students are deemed chronically absent when they miss 10% or more of the school year, regardless of reason for absence. In addition to absenteeism, Standards of Learning assessments are school-quality indicators for elementary and middle schools. For a school to attain accreditation, all school-quality indicators must evidence Level 1 or Level 2 performance. A school with one or more school-quality indicators at Level 3 is automatically accredited with conditions. Further, a school loses accreditation when it does not

implement corrective action plans to address Level 3 performance indicators. Level 1 represents a school performing at or above standards; Level 2 represents a school performing near standards and making improvements; Level 3 represents a school performing below standards. Teachers' ability to deliver instruction effectively has a direct effect on Wonderland's accreditation. Further, evidence of students' learning (on state assessments) also has a direct impact on Wonderland's accreditation.

Each year, Wonderland works to prepare for and accomplish the rigorous task of achieving an adequate pass rate on state assessments. For some schools, achieving an adequate pass rate is seemingly effortless. The travail for Wonderland to retain accreditation and increase student performance is not linked solely to instruction, but also to the lack of student presence during classroom instruction (according to the State Department of Education website). Sanctions for discipline infractions impact student presence during instructional time (Darling-Hammond et al., 2006). During the 2018-2019 school year, African American students at Wonderland accounted for 91.53% of total suspensions, while their non-African American peers only accounted for 8.47%. African American students are suspended 17.3% more than their population total; African American students make up 74.2% of the population and 91.53% of suspensions. Educators can contribute to reducing opportunity gaps, discipline infractions, and academic gaps by effectively implementing equitable programs (Bal et al., 2016; Banks, 2004; Dover, 2009; A. D. Johnson et al., 2018). According to the State Department of Education website, PBIS is designed to function as an equitable program that supports positive academic and behavioral outcomes for all students (Bohanon & Wu, 2014; Bosworth & Judkins, 2014; Childs et al., 2016; J. P. Johnson, 2014; Simonsen et al., 2015); therefore, Wonderland School has adopted PBIS as a means of reducing student discipline infractions.

Description of the Program

PBIS is an empirically supported program that can foster meaningful behavior changes among students with challenging behaviors (Flannery et al., 2014; Horner & Sugai, 2015). Further, PBIS is based on a systemic multi-tiered framework designed to intervene using preventative measures; in line with prevention science principles, PBIS implements a Response to Intervention (RTI) concept to ensure academic and behavioral instruction is delivered to all students, rather than waiting for problems to occur (Bal et al., 2016; Evanovich & Scott, 2016; Hill & Flores, 2014; Horner & Sugai, 2015). To affect all students, PBIS requires research-based strategies be applied at each tier (Bear et al., 2017; Evanovich & Scott, 2016; Horner & Sugai, 2015). As the PBIS program tiers progress in intensity, supports become specific to students who did not benefit from the preceding, more general strategies (Bradshaw et al, 2015; Evanovich & Scott, 2016; Horner & Sugai, 2015; Leverson et al., 2016).

The PBIS framework is intended to help school leaders foster a positive school climate and culture (Bradshaw et al., 2015; Djabrayan et al., 2014). PBIS is not a curriculum; rather, PBIS is described as a decision-making framework that guides the integration, selection, and implementation of behavioral practices for refining desired outcomes for every student (Bradshaw et al., 2015; Djabrayan et al., 2014). In addition to the proactive nature of PBIS, desired student outcomes are manifested through culturally responsive practices intended to counteract discipline infractions (Bradshaw et al., 2015; Djabrayan et al., 2014). The support provided through PBIS promotes the modification of behavior and belief systems for students, school personnel, and community stakeholders. By promoting a positive climate and culture

within schools, the support PBIS provides has been shown to lead to safer schools, college- and career-ready graduates, and the development of productive citizens (Bradshaw et al., 2015; Djabrayan et al., 2014).

Logic Model

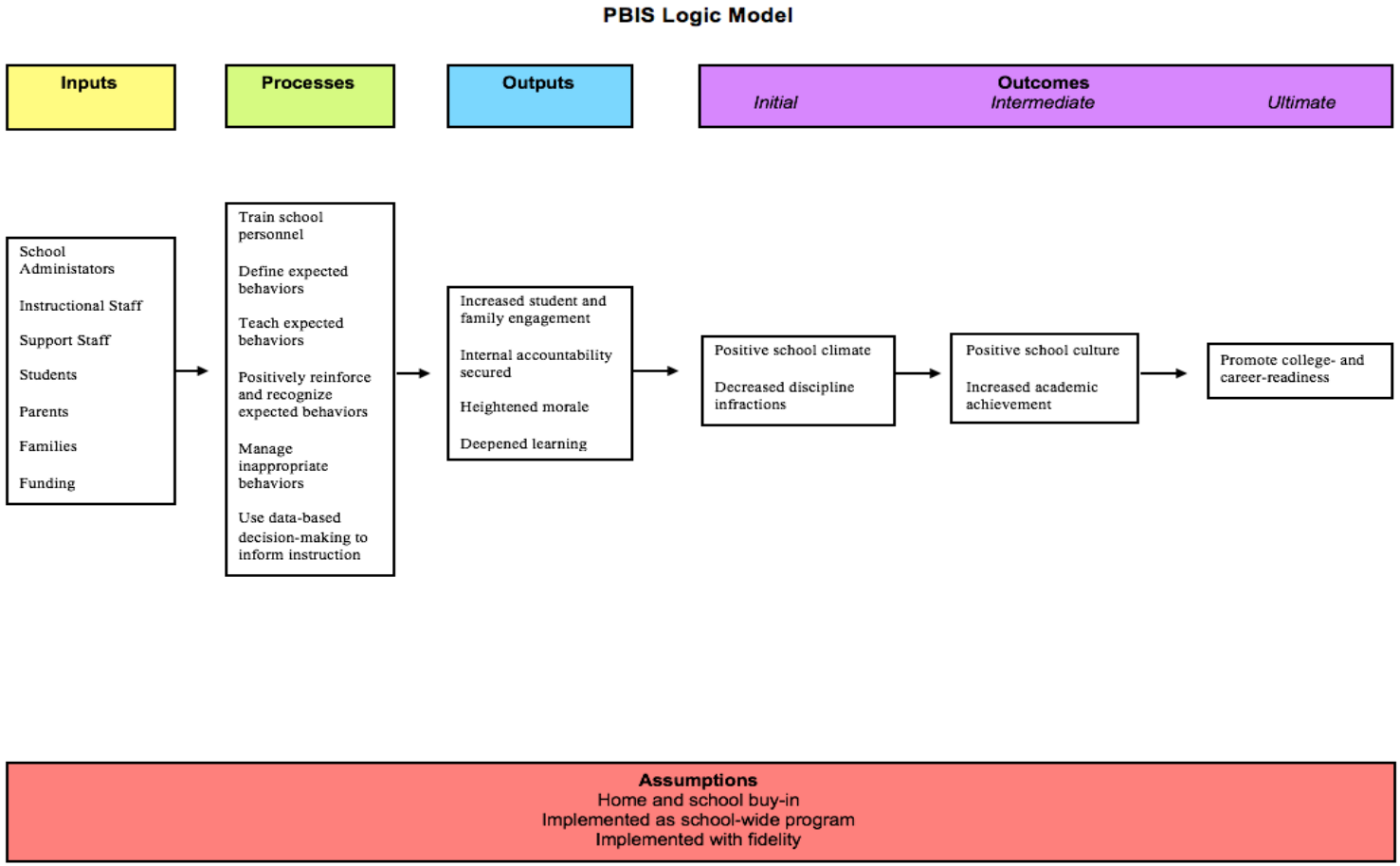
Figure 1 provides a logic model for the program. The conceptualization of the PBIS program presented in the PBIS Logic Model was discussed in Climate and Culture meetings held at Wonderland School. During the 2015-2016 school year, the chair of the Climate and Culture Committee, the chair of the PBIS Committee, the principal, the assistant principals, and a group of teachers met to discuss trends from student discipline data for the past 3 years. The team discussed methods for implementing PBIS to reduce student behavioral infractions and increase student academic performance (specifically for Wonderland's student population). The consensus findings from this meeting are incorporated in the logic model.

Scope

The logic model delineates the presumed process for enhancing Wonderland's climate and culture via PBIS. Climate and Culture Committee members determined Wonderland must embrace a complete paradigm shift to decrease student discipline infractions with integrity. The stakeholders considered when developing the PBIS Logic Model were students, parents, instructional staff, support staff, school administration, and central office administration. The efficacy of PBIS is influenced by stakeholder participation.

Figure 1

PBIS Logic Model



Note. The PBIS Logic Model provides an overview of program expectations before, during, and after implementation. The model also provides a description of desired initial, intermediate, and ultimate outcomes.

Organization of the Logic Model

The PBIS Logic Model is designed as a linear flowchart that should be read from left to right. Additionally, the logic model has five sections: inputs, processes, outputs, outcomes, and assumptions. Resources in the section of the model labeled "inputs" are those required for program operation. "Processes" are the interventions implemented and activities actualized by the summation of the inputs. The "outputs" in the logic model are the results manifested by program activities. To the right of the outputs are the "outcomes," which are the desired effects of the inputs, processes, and outputs detailed in the PBIS Logic Model. The outcomes represent the needs the program intends to address and the goals to be met. "Assumptions" represent the expected existing conditions that are essential for the program's overall success. In the sections that follow, each of these sections is discussed in detail.

Inputs. The resources in the inputs section are not listed in any particular order. For the purpose of this logic model, the administrative team at Wonderland School includes the building principal, three assistant principals, three school counselors, and a behavior specialist; this team design promotes program effectiveness (Horner & Sugai, 2015; PBIS, n.d.). The instructional staff includes all teachers, interventionists, and specialists. The support staff at Wonderland includes, but is not limited to, the family engagement specialist, nurses, a school resource officer, secretaries, security, and therapeutic day treatment counselors. All of Wonderland's students, parents, and families are considered resources in the PBIS Logic Model. The stakeholders, utilized as resources, work collaboratively to discuss implementation strategies for the PBIS program. The last resource listed is funding.

The PBIS program requires monetary support to effectuate professional development training and incentive programs. The school district is responsible for funding professional

development; PBIS coaches attend trainings and train their colleagues. School personnel receive training during professional development scheduled before school, during teacher planning periods, and after school. The Climate and Culture Committee also acquires monetary support through fundraisers. In the years prior to this study, monetary support has not been documented as a concern. The inputs described above are intended to make it possible for the processes to occur.

Processes. The six elements in the processes section of the logic model are listed in a particular order. A significant portion of implementing the PBIS program is developing necessary competencies for effective implementation; the competencies are described below (PBIS, n.d.). First, school personnel must receive adequate training to learn how to implement the PBIS program with fidelity. During training sessions, school personnel build capacity for teaching and learning, focus direction, set goals, and learn high-yield strategies to achieve goals. After receiving training, program implementation can begin. PBIS program implementation consists of five key components.

The key components of the PBIS program are: (a) defining expected behaviors, (b) teaching expected behaviors, (c) recognizing expected behaviors via positive reinforcement, (d) managing behavioral infractions, and (e) using data to inform future practice. Implementing key components of the PBIS program is intended to result in program success. Prior to outcomes, signs of program efficacy can be seen in the form of outputs. The six elements listed in the processes section of the logic model are intended to result in specific outputs.

Outputs. There are four elements in the output section of the PBIS Logic Model. While the order of elements does maintain a logical flow, the outputs are not necessarily in any particular order. The inputs and processes promote both student and family engagement.

Increasing student and family engagement aid in securing internal accountability. Internal accountability allows students and staff to assume responsibility (voluntarily) and take collective ownership of teaching and learning. True collaboration among students and staff yields a natural morale boost. Heightened morale levels can cause gains in confidence, and confidence gains lead to the deepening of learning. In a cyclical nature, the deepening of learning can cause gains in confidence that lead to increased morale for students and school personnel (Bosworth & Judkins, 2014; McKevitt & Braaksma, 2008; Miller, 2016; Mitchell & Bradshaw, 2013). The elements in the outputs section are presumed to serve as a catalyst for the realization of elements in the outcomes section (PBIS, n.d.).

Outcomes. The outcomes section of the PBIS Logic Model is broken down into three components (representing tiered outcomes); the outcomes of an effectively implemented PBIS program are detailed below (Madigan et al., 2016; Simonsen et al., 2015). The first level of outcomes is labeled *initial*. The initial outcomes are the cultivation of a positive school climate and the reduction of discipline infractions. After the initial outcomes are the *intermediate* outcomes, which are the cultivation of positive school culture and increased academic achievement. The *ultimate* outcome follows the intermediate outcomes; this consists of promoting college- and career-readiness. The expected timeline for the manifestation of outcomes varies by school. However, schools typically see evidence of effective implementation within 1 to 6 years; initial outcomes manifest within the first year, intermediate outcomes manifest prior to Year 6 (typically during Years 3 to 5), and the ultimate outcome typically manifests by Year 6 (Feuerborn et al., 2015; J. P. Johnson, 2014; T. J. Lewis et al., 2016). It is imperative to consider assumptions when considering the outcomes of the PBIS program.

Assumptions. The assumptions for the PBIS program are delineated at the bottom of the logic model. Assumptions reference the conditions necessary for program efficacy. These elements listed in the assumptions section are beyond the program's scope of implementation. Additionally, the elements listed in the assumptions section are not listed in the processes section because they are already believed to exist. Home-to-school connection and buy-in are vital to the success of the PBIS program. Student engagement, family engagement, and buy-in typically influence each other. Participation can be controlled; however, buy-in and engagement must be achieved. School-wide implementation and fidelity of implementation should function cohesively; further, school-wide implementation is an indicator of implementation fidelity.

Overview of the Evaluation Approach

This program evaluation is guided by the pragmatic paradigm, which is characterized by the use of mixed methods to analyze data that are identified to be particularly useful to stakeholders in gauging the effectiveness of the program and making decisions to strengthen the program (Mertens & Wilson, 2012). Though there are several program evaluation approaches within the pragmatic paradigm, Stufflebeam (Stufflebeam & Shinkfield, 2007) developed a Context, Input, Process, and Product (CIPP) model that is the best fit for this program evaluation (see next section for a description of the CIPP model). A combination of both quantitative and qualitative data sources was analyzed to evaluate the PBIS program at Wonderland School.

Program Evaluation Model

The PBIS Logic Model is a visual depiction of the four main elements of the CIPP program evaluation model; as a result, the model structures are similar. Stufflebeam (1971) explained the functions of the CIPP Model as follows:

1. *Context evaluation* serves planning decisions by identifying unmet needs, unused opportunities, and underlying problems that prevent the meeting of needs or the use of opportunities.
2. *Input evaluation* serves structuring decisions by projecting and analyzing alternative procedural designs.
3. *Process evaluation* serves implementing decisions by monitoring project operations.
4. *Product evaluation* serves recycling decisions by determining the degree to which objectives have been achieved and by determining the cause of the obtained results (p. 268).

The CIPP model is a decision-making model. By aggregating and disaggregating data, program evaluators can make informed interpretations of program implementation and respective adjustments (Frey, 2018; Given, 2008; Stufflebeam, 1971; Stufflebeam & Coryn, 2014). This program evaluation assessed the implementation and impact of the PBIS program at Wonderland and determined what changes can be made to improve efficacy. Given the purpose of this program evaluation, the CIPP model's design was justification for its use as an appropriate tool (to influence change). This study used two of the four components of the CIPP model, namely an evaluation of processes and products of the program (see Table 1).

Table 1

The Components of the CIPP Model and PBIS Program Evaluation

Component of CIPP Model	Component of PBIS Being Evaluated
Process	Explicit communication of expected behaviors, teaching of expected behaviors, recognition of expected behaviors via positive reinforcement, management of behavioral infractions, and use of data to inform practice
Product	Decreased discipline infractions

Note. CIPP = Context, Input, Process, and Product; PBIS = Positive Behavioral Interventions and Supports

Purpose of the Evaluation

The purpose of this program evaluation was formative. PBIS programs have been assessed and determined to be effective in school settings (Childs et al., 2016; Swain-Bradway et al., 2015). Furthermore, PBIS has proved to have a positive correlation with behavioral and academic outcomes for students of color (Bal et al., 2016; A. D. Johnson et al., 2018; Reno et al., 2017; Simonsen et al., 2015; Yuan & Jiang, 2018). There is little debate about PBIS programs' correlation with positive school outcomes. However, this study examined the implementation and outcomes of a specific PBIS program implemented in a Title I school, with a substantial population of African American students living in poverty; the information was used to strengthen Wonderland's PBIS program. Moreover, this study was intended to foster development and improvement; this study did not determine whether outcomes aligned with measurable goals.

Administrators, teachers, and other school personnel are the appropriate audience for this program evaluation. Parents and families can also be informed of evaluation results to spread

awareness and encourage involvement, thereby strengthening the home-school connection. However, the primary stakeholders who would find this evaluation relevant and useful are instructional leaders, members of the school's Climate and Culture Committee, and all persons responsible for program implementation (especially classroom teachers). Wonderland's students are the main intended beneficiaries of this program evaluation.

Instructional staff, support staff, and school administration need access to this information because it informs their daily practice. Central office administrators must be knowledgeable of the programs implemented within the schools as well as the outcomes of those programs. Such awareness allows central office staff to offer support when it is needed and replicate programs (pending success). Wonderland's administrators are the main intended audience for this program evaluation because they are the stakeholders who lead instruction within the school. The results of this study are available for school administration and other interested stakeholders.

Focus of the Evaluation

Most program evaluations focus on a particular function of a program (Stufflebeam & Shinkfield, 2007). For example, program evaluations can focus on the context, inputs, processes, and/or products of a program (Frey, 2018; Stufflebeam & Shinkfield, 2007). As previously mentioned, this program evaluation focused on processes and products. The PBIS program was assessed by examining fidelity of implementation, disciplinary outcomes, and teacher perceptions of the PBIS program. Additionally, it was expected that unintended positive and negative outcomes of implementation would be identified. Unintended outcomes can be critical to developing methods for implementation improvement (A. D. Johnson et al., 2018; Reno et al., 2017; Simonsen et al., 2015). Furthermore, this program evaluation may serve as a source of

information for making decisions on policy changes to improve practice (Skrla et al., 2009). In this context, policy changes consider systematic approaches on the school level. The results of the program evaluation may be used to provide feedback to increase program efficacy for Title I schools with a majority African American population.

Research Questions

The fidelity of Wonderland's PBIS implementation was assessed as a result of the influence implementation has on disciplinary outcomes (Filter et al., 2016; Swain-Bradway et al., 2015). Additionally, disciplinary outcomes of Wonderland's PBIS program were identified. The School-Wide Evaluation Tool (SET) is designed to measure fidelity of implementation. Moreover, SET assesses implementation alignment with key components of PBIS (Horner et al., 2004). To supplement quantitative findings, teachers' perceptions of the PBIS program were assessed. The research questions are:

1. With what degree of fidelity is PBIS implemented, as measured using the School-wide Evaluation Tool?
2. To what degree have discipline infractions changed since the inception of the PBIS program?
3. What are teachers' perceptions of PBIS program implementation, outcomes, and recommendations for improvement?

Definitions of Terms

Behavioral Infraction/Discipline Infraction. Behavioral infractions and discipline infractions are used interchangeably; both terms are an indication of a violation of a student conduct policy (Choong-Geun et al., 2011; Pas et al., 2011). Local school boards must provide

written copies of the student conduct policy to school personnel, parents/guardians of enrolled students, and students (according to the State Department of Education website).

Climate. School climate is the consistency and quality of interpersonal interactions in the school community that affect children's social, cognitive, and psychological development (Bradshaw et al., 2014).

Culture. School culture is manifested through the values, beliefs, and assumptions shared by faculty and staff; school culture is also expressed via the level of collaboration between school personnel (Pas et al., 2011).

Positive Behavioral Interventions and Supports (PBIS). PBIS is a culturally responsive, three-tiered, school-wide program for establishing a safe and nurturing learning environment that yields improved student behavioral and academic progress. Additionally, PBIS is an alternative approach to exclusionary practices that contribute to the expansion of the school-to-prison pipeline (PBIS, n.d.; USDOE, 2014).

CHAPTER 2

REVIEW OF LITERATURE

There is an established connection between exclusionary discipline policies and the school-to-prison pipeline (Darensbourg et al., 2010; Losen, 2012; Losen & Martinez, 2013; Mallett, 2016; National Council on Disability, 2015; USDOE, 2014). One method of combating the factors that contribute to the expansion of the school-to-prison pipeline is through the implementation of PBIS; this approach is an application of positive behavior support on a whole-school basis and incorporates multiple theories, including social learning theory, systems change, behaviorism, and prevention science (Cregor & Hewitt, 2011; Jolivette et al., 2013; Mallett, 2016; Mathur & Nelson, 2013; Morgan et al., 2014; National Council on Disability, 2015; Petteruti, 2011; Rafa, 2018; USDOE, 2014).

PBIS focuses on affecting behavior change within learning environments (Bradshaw et al., 2015; Putnam & Kincaid, 2015). As a result of its noncurricular model, PBIS is flexible enough to be adopted in different school contexts (Childs et al., 2016; Fallon & Mueller, 2017; Hinton & Buchanan, 2015). PBIS programs aid in decreasing discipline infractions and increasing academic achievement for all students (Bal & Trainor, 2016; McKenzie & Scheurich, 2004; Pitre, 2014).

An effective PBIS program can play a critical role in decreasing challenging behavior in students and promoting a positive school climate (Bear et al., 2017; Bosworth & Judkins, 2014; Flannery et al., 2014); however, many schools struggle to implement and sustain PBIS programs (Sanetti et al., 2013; Yeung et al., 2016). PBIS requires a considerable commitment from school

leaders and teachers (Bosworth & Judkins, 2014; Fallon et al., 2014; Horner & Sugai, 2015). School-wide PBIS is an effective response to challenging behaviors and discipline infractions; it is becoming an increasingly popular behavior management strategy that has been implemented in over 20,110 schools in the United States (according to Maryland State Department of Education's website at www.marylandpublicschools.org).

This chapter presents a review of related literature. The review starts with a discussion of studies on the educational experiences of African American students, then moves to examine the history of PBIS. After this discussion is a presentation of studies on the implementation of the PBIS program. This chapter offers a review of existing studies that show both support and concern regarding program implementation, followed by a discussion of the benefits of PBIS. The last section contains a discussion of the implications of a PBIS program.

Historical Background of the PBIS Program

Many PBIS principles and practices are grounded in interventions developed within the context of special education (Horner & Sugai, 2015; Kurth & Enyart, 2016). During the early 1900s, students with special needs experienced injustices and discrimination. For example, in 1919 (in the case of *Beattie v. Board of Education*), a student with a disability was denied access to free public education, with the rationale that the presence of the student would cause disruptions to the other students and to the school (Horner et al., 2014; Lane & Oakes, 2015; L. M. Scott, 2018).

The shift to a more progressive education system began with equality for African American students via the decision of *Brown v. Board of Education* in 1954 (Horner et al., 2014; Horner et al., 2004; Lane & Oakes, 2015; L. M. Scott, 2018; Simonsen et al., 2015). The finding

that the "separate but equal" principle was unequal gave hope to advocates of African American students, as well as advocates of students with special needs, because they believed all students—even those with special needs—should have equal access to education. Several amendments followed the *Brown v. Board of Education* decision, including the Special Education Act of 1961 and the Elementary Secondary Education Act (ESEA) in 1965 (Horner et al., 2014; Lane & Oakes, 2015; PBIS, n.d.; L. M. Scott, 2018). The ESEA was widely regarded as an educational war against poverty (Kantor, 1991; Klein, 2015). In 1990, the Education of All Handicapped Children Act was reauthorized as the Individuals with Disabilities Education Act (IDEA); IDEA required schools to aid students with disabilities in their transition from high school to postsecondary life (Horner et al., 2014; Simonsen et al., 2015).

In 1997, amendments were added to IDEA; a significant aspect of these amendments is the importance of positive behavior support for all students (Horner et al., 2004; Horner et al., 2014). Once the IDEA amendments were passed, positive behavior support was given attention as more schools attempted to meet the behavioral needs of all students in the school (Horner et al., 2014; Horner et al., 2004). In 1999, IDEA was reauthorized, again emphasizing the use of positive behavior support for students demonstrating problem behaviors (Horner et al., 2014).

In 2001, the Bush Administration passed NCLB, which emphasized the need to use evidence-based practices inside the classroom (Horner & Sugai, 2015; Horner et al., 2014; Horner et al., 2004). NCLB motivated educators to be more intentional when addressing academic and behavioral concerns. The Act required all students to be proficient in all academic subjects by 2014 (Horner et al., 2014; Horner et al., 2004). Additionally, NCLB encouraged schools to implement positive behavior systems to address student behavior and misconduct (Horner et al., 2014; Horner et al., 2004). IDEA and NCLB made schools accountable for using

positive strategies to address behavioral concerns and academic achievement (Horner & Sugai, 2015; Horner et al., 2014; Horner et al., 2004; Lane & Oakes, 2015; L. M. Scott, 2018). As a result, positive behavior support approaches were deemed both appropriate and necessary for all students. PBIS emerged due to IDEA and NCLB promoting the use of positive behavior support systems as a school-wide practice (Horner et al., 2014; Horner et al., 2004; Lane & Oakes, 2015; PBIS, n.d.; L. M. Scott, 2018).

Overview of the PBIS Program

Many people view PBIS as a school-wide behavior management program. While PBIS does assist in influencing and managing behaviors, it encompasses much more than a simple behavior management program (Horner & Sugai, 2015). Using culturally responsive practices, PBIS contributes to the discouragement of undesired behaviors and the overall cultivation of a safe learning environment (Bal et al., 2016; A. D. Johnson et al., 2018; Reno et al., 2017; Sensoy et al., 2017). Further, PBIS is a multi-tiered approach to reducing behavioral infractions; the promotion of positive behavior change yields a decrease in the number of office discipline referrals and school suspensions (Anyon et al., 2017; Bal et al., 2016; Banks, 2004; Childs et al., 2016; Madigan et al., 2016).

The three tiers of PBIS are universal (Tier 1, primary); selective (Tier 2, secondary); and individualized (Tier 3, tertiary) systems (Bradshaw et al., 2015; Putnam & Kincaid, 2015). The first tier is referenced as universal because it is applicable to all students. All students must be aware of the behavioral expectations and the corresponding rewards and consequences of displayed behaviors (Bradshaw et al., 2015; Putnam & Kincaid, 2015). The second tier is referred to as selective because it only involves 5% to 10% of the student population; this tier is for identifying and monitoring at-risk students (Bradshaw et al., 2015; Putnam & Kincaid, 2015).

The third tier is known as individualized because it only involves 1% to 5% of students; in this tier, the identified students receive individualized intervention programs (Bradshaw et al., 2015; Putnam & Kincaid, 2015). Table 2 presents a summary of the PBIS framework.

Table 2

Summary of PBIS Framework

Prevention Tier	Core Elements
Primary (All students)	• Define behavioral expectations • Teach behavioral expectations • Create a reward system • Create a continuum of consequences for problematic behavior • Conduct continuous collection of data and use it for decision making
Secondary (5-10% of students)	• Conduct universal screening • Monitor progress of at-risk students • Create a system to increase predictability • Create a system to include feedback • Create a system linking academic and behavioral performance • Create a system to improve communication between home and school • Conduct continuous collection of data and use it for decision making
Tertiary (1-5% of students, Individually Based)	• Conduct functional behavioral assessment • Conduct comprehensive assessment (team-based) • Create a system linking academic and behavioral support • Create and implement individualized intervention based on (a) prevention of problem contexts, (b) instruction on functionally equivalent skills, and instruction on desired performance skills, (c) strategies for placing problem behavior on extinction, (d) strategies for enhancing contingence reward of desired behavior, and (e) use of negative or safety consequences if needed • Conduct continuous collection of data and use it for decision making

Note. PBIS = Positive Behavioral Interventions and Supports. Adapted from "What is PBIS?" by Positive Behavioral Interventions and Supports (n.d.). https://www.pbis.org

Implementation of a PBIS Program

Implementation methods have been a topic of study for various PBIS program evaluations. Specifically, researchers have focused on providing adequate training, defining expected behaviors, teaching expected behaviors, recognizing expected behaviors, managing behavioral infractions, and using data to inform instruction as key elements of PBIS program implementation (Mathews et al., 2014; Pas & Bradshaw, 2012; Sanetti et al., 2013; Simonsen et al., 2015). The previously mentioned elements are critical to maintaining fidelity; fidelity is essential to program efficacy (Flannery et al., 2014; Madigan et al., 2016).

Providing Adequate Training

Effective implementation of a PBIS program is contingent on persons responsible for implementation receiving adequate training (Feuerborn et al., 2015; Lewis et al., 2016; Tyre et al., 2018). PBIS encompasses culturally responsive discipline practices that affect behavioral and academic outcomes (Bal et al., 2016; Banks, 2004; Dover, 2009; A. D. Johnson et al., 2018). The core members of a PBIS team must be knowledgeable of all features and elements of PBIS to maintain fidelity during program implementation (Feuerborn et al., 2015; T. J. Lewis et al., 2016; Tyre et al., 2018). T. J. Lewis et al. (2016) and Tyre et al. (2018) suggested training should begin with leaders of a PBIS team and then expand throughout the school.

Teams typically need 3 to 6 years to implement PBIS with 80% fidelity (Feuerborn et al., 2015; T. J. Lewis et al., 2016). The first year of training usually involves universal instruction, while the second and third years of training involve secondary and tertiary tiers of intervention programs, respectively (Feuerborn et al., 2015; T. J. Lewis et al., 2016). The PBIS team should

receive training 4 days throughout the school year; training for the remaining staff members may occur during staff meetings, after school, or when school is closed for students (Feuerborn et al., 2015; T. J. Lewis et al., 2016).

Teacher commitment to implementation fidelity will influence the overall effectiveness of a PBIS program (Feuerborn et al., 2015; Horner et al., 2014; Swain-Bradway et al., 2015; Tobia, 2015). Intersecting with commitment to fidelity, teachers are responsible for using evidence-based behavioral practices (Price & Steed, 2016; Reno et al., 2017; Tobia, 2015). Teachers must understand how to use data to effectuate social and emotional interventions and supports; this will promote the cultivation of a safe and nurturing learning environment that is conducive to learning. Support staff also play a significant role in implementing behavior change in schools; to ensure successful program implantation, both teachers and support staff should be trained accordingly (Fallon et al., 2014; Pinkelman et al., 2015).

Defining and Teaching Expected Behaviors

It is important to establish and define behavioral expectations (Bradshaw et al., 2015; Horner & Sugai, 2015; Horner et al., 2014; T. M. Scott et al., 2002; Simonsen et al., 2015). Behavioral expectations should be communicated as specific, observable behaviors for each location on school premises (Bradshaw et al., 2015; Horner & Sugai, 2015; Ross et al., 2012). Table 3 illustrates an example of defining expected behaviors.

Table 3

Example of Defining Expected Behaviors

Location	Expectations		
	Be responsible	Be respectful	Be safe
Classroom	Bring all necessary materials to class	Raise your hand when you want to speak	Walk
	Turn in homework on time	Look at the eyes of the individual speaking	Keep hands and feet to yourself
Hallway	When see you trash, pick it up and throw it in the garbage can	Use quiet voices	Walk
		Shut locker doors in a quiet manner	Keep hands and feet to yourself
Cafeteria	Clean as you go	Use quiet voices	Walk
	Put everything in its appropriate location	Demonstrate manners and etiquette while eating	Keep hands and feet to yourself

Note. Adapted from B. C. McKevitt & A. D. Braaksma, 2008, Best practices in developing a positive behavior support system at the school level. *Best Practices in School Psychology, 5*(3), 735-747.

Recognizing Expected Behaviors

In addition to defining and teaching expected behaviors, there is also a need to recognize students who display expected behaviors (Berkowitz et al., 2008; Owens et al., 2018; Walker et al., 2016). Walker et al. (2016) conducted a study on the implementation and sustainability of PBIS at the elementary level. They concluded it was significant for students at the elementary level to receive immediate feedback regarding their behaviors. Additionally, negative behaviors should be addressed through a positive statement or correction that includes reteaching an expectation (Horner et al., 2014; T. J. Lewis et al., 2016; Walker et al., 2016). Owens et al.

(2018) concluded that immediate feedback, via recognizing student behaviors, helps reduce discipline infractions (especially inside the classroom).

Managing Behavioral Infractions

Defining consequences is an important aspect of PBIS program implementation (Gray et al., 2017; Horner & Sugai, 2015). Teachers should manage behavioral infractions at the classroom level when appropriate (Horner & Sugai, 2015). This promotes the cultivation of meaningful relationships, causing students to be receptive to guidance from their teachers. However, extreme discipline infractions should be office-managed. The implementation of a PBIS program does not imply that school administrators can be uninvolved in school discipline. Though there must be a clear focus on encouraging positive behaviors, discipline infractions should not be ignored (Miller, 2016; Parsons, 2017; Reinke et al., 2013).

Using Data to Inform Instruction

Data collection is a vital aspect of PBIS program implementation. Data collection allows schools and school districts to evaluate the effect of PBIS on student behavior at the macro level (Horner & Sugai, 2015; Lane et al., 2016; S. R. Lewis & Pope, 2018). At the micro level, data inform teachers of antecedents, patterns, and best practices for improving behaviors (S. R. Lewis & Pope, 2018; T. J. Lewis et al., 2016). Lane et al. (2016) argued that data-based decision making is critical to the success of any framework. Valenti and Kerr (2014) also had similar assertions regarding the importance of incorporating data into the development of school rules and the implementation of PBIS programs. Data-based decision making and evidence-based practices are core components of PBIS.

Evaluating the Program

The School-Wide Evaluation Tool (SET) is an instrument used to collect data and evaluate a PBIS program (Horner et al., 2009; Meng et al., 2016; Sugai et al., 2001). Further, data from the SET can be used to determine what practices are beneficial and what practices need to be adjusted for improvement. The SET allows researchers to rate program efficacy on seven metrics: behavioral expectations defined, behavioral expectations taught, behavioral expectations rewarded, systematic response to rule violations, information gathered to monitor student behavior, management support for school-wide procedures, and district-level support for school-wide procedures (Childs et al., 2016; Horner et al., 2009; Horner et al., 2004; Sugai et al., 2001).

PBIS Corroboration

As noted earlier, a PBIS program can prove effective when implemented with fidelity. School reform is well underway, and national statistics have indicated that suspension and expulsion rates have decreased by 20% since 2012 (Steinberg & Lacoe, 2017). The change in discipline is the result of schools adopting more positive approaches to discipline, as compared to previous exclusionary and punitive approaches (Horner et al., 2015; Rogers & Richardson, 2014; Steinberg & Lacoe, 2017). Several public schools have experienced improved staff, student, and school outcomes following the implementation of a PBIS framework (Childs et al., 2016; J. P. Johnson, 2014; Simonsen et al., 2015; Simonsen & Sugai, 2013).

J. P. Johnson (2014) conducted a qualitative case study to explore stakeholder beliefs, values, and feelings regarding PBIS in a North Carolina middle school; a formal evaluation via a SET indicated a sustained, successful program after 6 years of implementation. PBIS is a systems approach to curbing inappropriate behaviors and ultimately promoting college and

career readiness (Bohanon & Wu, 2014). When implemented with fidelity, a PBIS program contributes to decreasing challenging behavior in students, thus promoting a positive school climate and increasing instructional time (Bear et al., 2017; Benner et al., 2013; Bosworth & Judkins, 2014; Flannery et al., 2014). Freeman et al. (2016) found a reduction in absenteeism due to PBIS; student presence during classroom instruction can have a positive effect on academic achievement and graduation rates. PBIS is also associated with increased teacher efficacy and lower levels of emotional exhaustion among teachers (Reinke et al., 2013; Sørlie et al., 2016). SET research has determined PBIS to be an evidence-based approach to improving behavioral and academic outcomes (Horner et al., 2015; Horner et al., 2009; Vincent et al., 2010).

Positive Reinforcement vs. Negative Reinforcement

Whether attention seeking or attention escaping, all behavior serves a purpose. PBIS can be used as a behavior management strategy to address challenging behaviors proactively, by attempting to understand the reason students display challenging behaviors (A. D. Johnson et al., 2018; T. J. Lewis et al., 2016). There are substantial differences between PBIS and traditional behavior management strategies; traditional strategies are reactive and punish students without considering the underlying causes of discipline infractions (Horner & Sugai, 2015; Parsons, 2017). Reactive and punitive interventions are problematic for curbing inappropriate behaviors (McDaniel et al., 2014; Ryoo et al., 2018; Simonsen et al., 2015).

Students will display desirable behavioral patterns when educators incorporate positive reinforcement into their daily practice (McIntosh et al., 2014). Punitive and reactive behavior management may achieve compliance and reduce inappropriate behaviors in the short term; however, sustaining compliance and reducing challenging behaviors are unlikely in the long term (Hill & Flores, 2014; McIntosh & Goodman, 2016). Negative reinforcement can cause problem

behaviors to return and increase; Horner and Sugai (2015) determined positive reinforcement is more effective for improving school climate and reducing disciplinary challenges. Benner et al. (2013) posited punitive punishment negatively influences the relationships between students and teachers; further, reactive punishment may result in coercion. Perceived coercion from teachers is significant among students with emotional and behavioral disorders (Benner et al., 2013). A positive reinforcement approach to discipline concerns will reduce coercion and improve teacher-student relationships (Benner et al., 2013; Tschannen-Moran et al., 2006).

Mitchell and Bradshaw (2013) investigated the relationship between classroom management strategies and student perception of school climate; students favor positive reinforcement. Students could not overcome their aversion regarding exclusionary discipline strategies and negative reinforcement (Mitchell & Bradshaw, 2013). Similarly, in their study of 30,071 students from Grades 3 to 12, Bear et al. (2017) found a correlation between punitive punishment and negative perceptions of school climate, as well as a correlation between rewarding appropriate behaviors and positive perceptions of school climate. PBIS has shown to be an effective approach for some schools to change their school climate and culture.

Incentives

Incentives are typically regarded as essential to implementing a PBIS program. Using incentives is an effective way to gain student compliance (Vincent et al., 2015). Although offering students incentives can be an effective way to promote compliance, incentives are not the sole component of a successful PBIS program (Horner et al., 2015; Reinke et al., 2013). Teachers who display high levels of general praise report greater efficacy, regarding classroom management, than those who display low levels of general praise (Reinke et al., 2013; Vincent et al., 2015). Further, teachers who have low levels of positive interaction have high reports of

disruptions and maladaptive behaviors (Reinke et al., 2013). Maladaptive behaviors include actions that result in a greater financial burden for the school district, reduced time for instruction, and the cultivation of an unsafe learning environment for students (Strunk & Rossi, 2016). Behavioral challenges are present in all schools. The approach used to curb behavior challenges has a substantial impact on the success of reducing discipline infractions and promoting academic achievement.

PBIS Concerns

Although a vast amount of the research indicates positive implications for PBIS, some researchers have voiced concerns about the program. It is possible that PBIS can have adverse effects on school environments if the implementers are not trained in applied behavioral analysis (Tincani, 2007). Praise and rewards in classrooms are oversold, and constant positive reinforcement may decrease the intrinsic motivation of students (Adelman & Taylor, 2006; Lawson & Lawson, 2013). Providing tangible rewards to students for good behavior lacks evidence of success (Sugai et al., 2001). Bear (2013) postulated teacher resistance to praise and rewards may be valid, as there is not a plethora of evidence regarding the success of positive reinforcement.

Freeman et al. (2016) found no significant relationship between PBIS and academic performance; they suggested the benefits of PBIS are only experienced by high-risk students, which does not necessarily affect school-wide performance. Miller (2016) stated there are no discernible differences in discipline referrals or student achievement for the first year after PBIS implementation; this represents the misconception that PBIS is a 1-year turnaround program.

Certain misconceptions about PBIS may affect implementation and desired outcomes; these misconceptions can be addressed through professional development programs (Bruhn et

al., 2014; McPhee & Givhan, 2016). One such misconception is that PBIS is only for students with special needs or disabilities. There are also concerns that school personnel, parents, and students believe PBIS is not effective and other programs should be implemented instead (Bruhn et al., 2014; Feuerborn et al., 2015).

Implementation Concerns

Some researchers feel there is a need for further exploration of specific success criteria for schools that claim successful implementation of PBIS. An effective PBIS program demands active planning; it also requires the identification of goals, use of data to inform decisions, selection of practices unique to the school needs, and fidelity of implementation (Farkas et al., 2012). A high degree of coordination among school personnel is needed to maintain consistent and coherent standards (Bruhn et al., 2014). Furthermore, it has been found that more than a year of commitment to PBIS is necessary to observe significant changes and produce data to monitor such changes (Flannery et al., 2014; Feuerborn et al., 2015; J. P. Johnson, 2014).

Schools strive for academic excellence; unfortunately, many factors can hinder academic excellence. All students should be taught by educators who employ adequate behavioral and instructional practices (Djabrayan et al., 2014; Miller, 2016; Pitre, 2014). PBIS provides schools with an operational framework as well as an array of sustainable practices to achieve positive behavioral and academic outcomes (Djabrayan et al., 2014). However, PBIS can be very complex and require substantial time, commitment, training, and financial support to be effective (Sanger et al., 2016). Teachers in schools that implement PBIS with fidelity experience significantly lower levels of exhaustion and higher levels of efficacy than schools that do not practice implementation fidelity (Ross et al., 2012). There is also a correlation between schools

with high levels of implementation fidelity and teachers who report greater feelings of personal accomplishment.

Schools all over the United States are implementing PBIS as a part of their school management plan (J. P. Johnson, 2014; Pitre, 2014; Simonsen et al., 2015; Swain-Bradway et al., 2015). Program factors that increase the probability of PBIS success are teacher buy-in, commitment, communication, leadership, collaboration, and voice (J. P. Johnson, 2014). J. P. Johnson (2014) and Walker et al. (2016) detailed the necessity of forming a PBIS team to develop an action plan. Walker et al. highlighted the role of teachers and noted that school administrators should give teachers the chance to provide input.

Urban schools typically attempt to address the needs of students who require secondary and tertiary interventions (Goodman-Scott et al., 2018; Horner et al., 2015; Leverson et al., 2016). However, some researchers have argued that the psychosocial needs of students are not considered when implementing PBIS programs; this is problematic because healthy self-esteem levels are paramount to student learning (Benner et al., 2013; Bennett, 2022). Additionally, some school personnel feel PBIS programs are not explicitly tied to student learning (McIntosh et al., 2014). Another concern is the belief that there is frequent, ineffective communication between school personnel and students (Bruhn et al., 2014; Feuerborn et al., 2015). Ineffective communication may cause students to perceive staff members as incapable of understanding and unwilling to change; this can affect how students receive guidance and redirection (Flannery et al., 2014; Freeman et al., 2016). If teachers do not develop meaningful relationships with students, students will be unable to receive the full benefits of PBIS.

Educational Experiences of African American Students

African American students have faced numerous challenges in U.S. education systems; however, they have demonstrated a history of academic resilience in their efforts to overcome educational challenges. The landmark 1954 Supreme Court case *Brown v. Board of Education of Topeka, Kansas* caused a major shift in public education that led to the elimination of legal segregation in schools (Garibaldi, 2014). The landmark case ruling allowed African American students to be educated with their non-African American peers inside the classroom. Desegregation was intended to increase the opportunity for African American students to receive equality in education by receiving the same lessons being taught to non-African American students.

Many researchers have investigated a range of factors concerning African American students' educational experiences, such as school-related racism (Bonilla-Silva, 2010; Von Robertson & Chaney, 2017); frequency of discipline issues that result in the school-to-prison pipeline (Fasching-Varner et al., 2014; Gagnon et al., 2008; Kim et al., 2010; Losen & Martinez, 2013; Mallett, 2016; Morgan et al., 2014; Petteruti, 2011); lack of support (Bradshaw et al., 2010; Eber et al., 2010); and lack of resources (Bradshaw et al., 2010; Mendez et al., 2002). Although the achievement gap for African American students has decreased to some degree, Fasching-Varner et al. (2014) argued that the education system itself still leads to the disenfranchisement of African American students.

Opportunity Gap

The opportunity gap perpetuates lower educational aspirations and achievement as a result of an unequal distribution of resources and opportunities. Both Gorski (2017) and Pitre (2014) posited there is an unequal opportunity for African American students to learn, compared

to other students, simply because of their race and socioeconomic status. Skiba et al. (2014) conducted a multilevel examination of factors such as infraction, student, and school characteristics related to racial disparities in out-of-school suspension and expulsion rates. These researchers found that race and socioeconomic status contribute to the likelihood of out-of-school suspension or expulsion. Additionally, low-income African American families typically have limited access to resources that promote academic achievement (Gorski, 2017; Howard & Navarro, 2016). Education equity between affluent Caucasian students and low-income students of color is one of the goals of the U.S. education system (Darling-Hammond, 2010; Howard & Navarro, 2016; Sensoy et al., 2017).

Disciplinary Concerns

Some students who come from troubled homes often demonstrate defiant, disruptive, and aggressive behaviors in the classroom that compromise the learning opportunity and safety for their peers (Kraft et al., 2012; Ross et al., 2012). Disruptive behaviors can cause teachers to lose instructional time; this can make it difficult for students to learn and increase academic achievement (Cohen et al., 2007; Pas & Bradshaw, 2012). Some students who demonstrate frequent troublesome behaviors come from minority groups of low socioeconomic status (Skiba et al., 2014; Skiba et al., 2002).

Students of color are more likely to receive out-of-school suspensions and expulsions than their peers. A growing body of research has affirmed that school discipline practices disproportionately affect African Americans (Choong-Geun et al., 2011; Price & Steed, 2016). Anyon et al. (2017) used critical race theory and administrative data from a large urban school district to explore the relationships between race and school subcontexts by which youth were disciplined. In 185 schools, 20,166 discipline incidents involved 9,170 students; Anyon et al.

found that African American students were more likely to receive discipline infractions than non-African American students. After examining 7 years of student data from every public school in Arkansas, Ritter and Anderson (2018) discovered African American students have a higher risk of experiencing exclusionary discipline sanctions than other student subgroups.

School-to-Prison Pipeline

The path from the schoolhouse to the jailhouse is referred to as the school-to-prison pipeline (Darensbourg et al., 2010; Heitzeg, 2009; Losen, 2012; Petteruti, 2011). Frequent suspensions and/or expulsions significantly increase the risk of involvement with the juvenile and criminal justice systems (Baker et al., 2001; Hammond et al., 2007). Juveniles in correctional facilities are disproportionately minorities of low socioeconomic status, with a history of academic underperformance and discipline infractions (Jolivette et al., 2013; Quinn et al., 2005).

While it is not the case that all students who experience disciplinary consequences in school will later experience the penal system, exclusionary school discipline systems can alienate students from learning, thus potentially driving them from the schoolhouse to the juvenile and criminal justice systems (Losen & Martinez, 2013; USDOE, 2014). Examples of exclusionary responses to discipline infractions include detention, in-school suspension, short-term suspension, long-term suspension, expulsion, and placement at alternative education centers (Darensbourg et al., 2010; Losen, 2012; Losen & Martinez, 2013; Rafa, 2018; USDOE, 2014). As a result, educational leaders have been prompted to focus on decreasing behavioral infractions by implementing positive behavioral intervention strategies (Madigan et al., 2016; Reno et al., 2017; Simonsen et al., 2015; USDOE, 2014).

Benefits of PBIS

At a basic level, benefits of PBIS include decreased behavioral concerns, appropriate use of instructional time, and increased academic performance (Sanger et al., 2016). Equitable practices and culturally responsive approaches make PBIS programs inclusive, adaptive, and supportive for all students (Bal et al., 2016; Bal & Trainor, 2016; Parsons, 2017; Price & Steed, 2016). School climate has a significant impact on student growth and development; school climate is the consistency and quality of interpersonal interactions within the school community that affect children's social, cognitive, and psychological development (Bradshaw et al., 2014). A PBIS program implemented with fidelity has the potential to change an entire school climate (Horner et al., 2015; Mitchell & Bradshaw, 2013).

The Effect of PBIS on Discipline Infractions

One of the most evident reasons to adopt and implement the PBIS framework is to decrease discipline infractions and referral rates among students. In several studies, the adoption and implementation of PBIS led to a reduction of office discipline referrals and suspensions (Anyon et al., 2017; Gray et al., 2017). For example, in its sixth year of PBIS implementation, Mountain Creek Academy reported a 46% reduction in discipline referrals, compared to 5 years prior (Rogers & Richardson, 2014). Students maximized program benefits and experienced the greatest change as they learned social skills and achieved academic success (Rogers & Richardson, 2014). Gray et al. (2017) posited that PBIS programs, serving kindergarten to eighth-grade students, can aid in reducing suspension rates.

Implications of PBIS Programs

Racial disproportionality has brought policy changes within the education system. IDEA, ESEA, and NCLB declared all schools must eliminate disparities and use federal funds to

implement early intervention programs. Among the responses for these disparities was PBIS. PBIS has been implemented in more than 20,000 schools in the United States (Horner et al., 2015).

Student behavioral infractions contribute to underperformance and impede academic achievement. Several schools have experienced improved staff, student, and school outcomes following the implementation of a PBIS framework (Simonsen & Sugai, 2013). The PBIS framework is specifically designed to promote positive student behaviors through positive reinforcement. The entire school community must buy in and contribute to program implementation in order to maximize program efficacy. Program efficacy manifests as behaviors begin to change. Behaviors are learned; this means behaviors must be taught. Educators must teach behavioral expectations before expecting students to adhere to behavioral expectations. Furthermore, it is imperative for educators to understand their own behavior must change, in addition to student behavior.

African American students are suspended at higher rates than other student subgroups (Bell, 2015; Cornell et al., 2009; Hinojosa, 2008; Skiba et al., 2002; Stetson & Collins, 2010). Exclusionary responses to discipline infractions cause students to miss instructional time; subsequently, discipline policies and practices are a relevant part of the education system. Schools are in dire need of evidence-based practices to curb discipline infractions and combat factors that contribute to the school-to-prison pipeline (Darensbourg et al., 2010; Heitzeg, 2009; Mallett, 2016). Further, there is a need for culturally responsive intervention programs to provide equal opportunity for African American students (Bal et al., 2016; Bal & Trainor, 2016; A. D. Johnson et al., 2018; Yuan & Jiang, 2018). PBIS has been specifically identified as appropriate for all students, which includes African American students.

The successful implementation of a PBIS program may result in students being more engaged; in turn, this will promote students' overall growth and development. The implementation of PBIS should be a long-term commitment; results may not be immediately visible. Although full implementation requires a minimum of 3 years, program sustainability may take as long as 6 years (Feuerborn et al., 2015; J. P. Johnson, 2014; T. J. Lewis et al., 2016). Several studies have assessed PBIS in terms of its positive correlation with student behavior and academic achievement (Bal & Trainor, 2016; Gregory & Roberts, 2017; Ritter & Anderson, 2018). However, there is a need to explore the specific impact PBIS has on African American students living at or below the poverty line during early adolescence (Bal et al., 2016; Martin & Steinbeck, 2017).

The implementation of the PBIS framework in the years prior to students entering high school could prove to be more effective in producing college- and career-ready citizens. The present study evaluated the fidelity of implementation for Wonderland's PBIS program, specific disciplinary outcomes, and perceptions of PBIS for African American students within a combined (pre-kindergarten to eighth grade) Title I school.

CHAPTER 3

METHODS

This program evaluation used a multiphase mixed-methods design. As Creswell (2014) noted, when researchers add a mixed-methods question, it "conveys the importance of integrating or combining the quantitative and qualitative elements" (p. 152). Further, the study focused on two components of the Context, Input, Process, and Product (CIPP) model (process and product) as an approach for program evaluation. A program evaluation is defined as "the systemic process of delineating, obtaining, reporting, and applying descriptive and judgmental information about some object's merit, worth, probity, feasibility, safety, significance, or equity" (Stufflebeam & Shinkfield, 2007, p. 698). This program evaluation assessed a PBIS program implemented in a Title I school with a substantial population of African American students.

The first research question in this study was addressed using qualitative and quantitative data; the second question was addressed using quantitative data; the third research question was addressed using qualitative data. The three research questions addressed in this study are:

1. With what degree of fidelity is PBIS implemented, as measured using the School-Wide Evaluation Tool?
2. To what degree have discipline infractions changed since the inception of the PBIS program?
3. What are teachers' perceptions of PBIS program implementation, outcomes, and recommendations for improvement?

The research broached the connection between meaningful relationships and student success. Further, this evaluation explored the benefit of intentionally promoting positive behaviors at a Title I school with a substantial population of African American students. The impact PBIS has on Wonderland, as it relates to behavioral support, discipline data, and teachers' perception of PBIS, provided a foundation for this program evaluation.

Sampling

During the 2019-2020 school year, there were 1,161 total students, 110 fifth-grade students, 86 teachers, and 4 administrators at Wonderland. African American students comprise a large percentage of the student population: 77.5% African American, 10.3% Caucasian, 7.1% two or more races, 3.9% Hispanic, .5% Asian, .1% American Indian, and .2% Native Hawaiian. Economically disadvantaged students total 89.7% of the student population. Wonderland was selected for this program evaluation through purposive sampling. Purposive sampling is the selection of participants based on criteria predetermined by the researcher, as relevant to addressing the research questions (Given, 2008). Specifications of respective sampling strategies are outlined below.

Extant Data

The School-Wide Evaluation Tool (SET) establishes a minimum number of interviewees; however, the only established criterion for selection was role (i.e., student, teacher, and administrator; see Appendix A). Random purposeful sampling was used to conduct the SET interviews; random purposeful sampling increases credibility (Patton, 2015). In this case, random purposeful sampling allowed representation from each fifth-grade classroom and staff who supported the fifth-grade students. Regarding the student discipline outcome report, homogeneous sampling was used to collect data from fifth-grade students. A homogeneous

sample is decided by individual membership in a subgroup that shares similar characteristics (Creswell, 2014).

Participants

Purposeful sampling was used to gain insight into teacher perceptions of the PBIS program; the teachers who were interviewed taught fifth grade in the 2019-2020 school year. Purposeful sampling allowed for the studying of information-rich data; studying information-rich data yields insights and in-depth understanding rather than empirical generalizations (Patton, 2015). As participation is not compulsory, teachers had the option to withdraw from the study at any time. In lieu of names, numerical values were used to organize the interviewees' responses.

Data Sources

As a mixed-methods program evaluation, both qualitative and quantitative data were collected in this study. Interviews, observations, products, extant data, and archival data were used to examine the disciplinary outcomes of PBIS at Wonderland.

School-Wide Evaluation Tool (SET)

The SET serves as a source for multiple forms of qualitative and quantitative data (Horner et al., 2004; Ross et al., 2012; Sugai et al., 2001). Implementation fidelity (as measured by the SET) is determined by evaluating 28 key questions across seven features of implementation. The features of PBIS (and the number of respective questions investigated) are:

1. Define behavioral expectations (2),
2. Teach behavioral expectations (5),
3. Positively reinforce and recognize expected behaviors (3),
4. System for responding to behavioral violations (4),
5. Monitoring and decision making (4),

6. Management (8),
7. District-level support (2; Horner et al., 2004).

The SET has been deemed both valid and reliable via psychometric analysis (Horner et al., 2004; PBIS, n.d.; Vincent et al., 2010). The validity and reliability of the SET have been established in multiple studies and at elementary, middle, and high school levels (Horner et al., 2004; Vincent et al., 2010). The more recent, independent assessment by Vincent et al. (2010) yielded strong internal consistency for the full scale at each school level (elementary $r = .850$, middle $r = .854$, high $r = .899$) and aligned with the earlier findings of Horner et al. (2004). The Team Implementation Checklist is a tool used to monitor the quarterly progress of a PBIS program. Vincent et al. (2010) also found overall high concurrent validity between the SET and the internal Team Implementation Checklist, suggesting that the SET is a valid measure of the identified key features of PBIS implementation. In addition to information regarding observations and assessing products, the SET provides a protocol detailing specialized interview questions (see Appendix A). The following are examples of data samples found in the SET (see Table 4).

Table 4

Example Data Samples from the School-Wide Evaluation Tool (SET)

Data Source	Details	Evaluation Questions
Observations	Wall posters	Are the agreed-upon rules and expectations publicly posted in 8 of 10 locations?
	Walls	Is the documented crisis plan for responding to extreme dangerous situations readily available in 6 of 7 locations?
Products	Discipline handbook; instructional materials	Is there documentation that staff has agreed to five or fewer positively stated school rules/ behavioral expectations? Is there a documented system for dealing with and reporting specific behavioral violations?
	Lesson plan books; instructional materials	Is there a documented system for teaching behavioral expectations to students? Is there a documented system for rewarding student behavior?
	Referral forms	Does the discipline referral form list (a) student/grade, (b) date, (c) time, (d) referring staff, (e) problem behavior, (f) location, (g) persons involved, (h) probable motivation, & (i) administrative decision?
	School improvement plan	Does the school improvement plan list improving behavior support systems as one of the top three school improvement plan goals?
	Annual plan	Does the team have an action plan with specific goals that is less than 1 year old?
Interviews	Staff interviews	Does 90% of the staff state teaching behavioral expectations has occurred this year? Can 90% or more of the staff asked list 67% of the school rules? Do 90% of staff agree with administration on office and classroom managed problems?
	Student interviews	Can at least 70% of 15 or more students state 67% of the school rules? Do 50% or more students asked indicate they have received a reward for expected behaviors over the past 2 months?
	Administrator interviews	Can the administrator clearly define a system for collecting and summarizing discipline referrals? Is the administrator an active member of the school-wide behavior support team?

Benchmarks of Quality is a tool used to assess the efficacy of a PBIS program. As the researcher, I selected the SET over the Benchmarks of Quality to provide a more comprehensive understanding of the success (i.e., fidelity) of Wonderland School's PBIS implementation. The SET is used for research and project evaluation purposes, sharing a view of Universal, or Tier I, PBIS implementation (Educational and Community Supports, 2020). By contrast, the Benchmarks of Quality tool is used only formatively, not for formal project evaluations or research purposes. Benchmarks of Quality is conducted by a school-based PBIS coach, in conjunction with selected team members; it lacks the case study and triangulation approach adopted by SET evaluators in completing a robust assessment of PBIS implementation fidelity (Educational and Community Supports, 2020).

Student Discipline Outcome Report

Data from discipline referrals served as quantitative data to represent students' behavioral performance. Office discipline referrals are submitted through an online database called Power School (at Wonderland), which was utilized for the duration of PBIS program implementation; student demographic information as well as date and time of submission are automatically populated in the database. Discipline referrals are documentation of staff-observed behavioral infractions; behavioral infractions are violations of school rules (Pas et al., 2011). However, this program evaluation did not investigate staff decision making or potential biases in documentation of discipline referrals.

Wonderland uses criteria developed by the school district to categorize discipline infractions and determine merit for discipline referrals. Further, teachers do not categorize discipline infractions at Wonderland; teachers report facts regarding event details. Administration has been trained to interpret and categorize referrals, according to State City

School District's expectations. Referrals are valuable in identifying students with at-risk behavioral problems. Students who receive discipline referrals are typically rendered consequences by an administrator; suspension is a probable sanction (Choong-Geun et al., 2011; Pas et al., 2011). Consequences are determined based on details of a specified incident; discipline infractions are organized by category.

Empirical studies have confirmed the validity of office discipline referrals as a standardized measurement of student behavior (Irvin et al., 2004; Messick, 1986). Sample categories of discipline infractions shown in the student discipline outcome report at Wonderland consist of the following:

1. Category 1 offenses: disrespect (discourteous or impolite speech), chewing gum, and insubordination;
2. Category 2 offenses: cheating (claiming authorship of work that is not of the student's origination), disruption (verbal actions that disrupt students), and obscene behavior (the drawing of obscene pictures);
3. Category 3 offenses: fighting, sexual activity, and possession of paraphernalia/drug-related objects. (State Department of Education website)

The school district's leadership team provides information regarding categorizing discipline infractions accurately and consistently. Additionally, provision of specific examples for each category strengthens reliability of infraction categorization at the school level. Further, administrators are trained in categorizing discipline infractions and making (related) critical decisions. Discipline infractions and their categorization are discussed (weekly) to ensure appropriate decision making. A shared understanding of infraction categorization minimizes implicit bias and other noxious influences.

Teacher Interviews

Teacher recruitment for interviews was conducted using purposeful sampling. Creswell (2014) considered purposeful sampling for the selection of individuals and sites that have significant insight into and understanding of the research problem central to the study. The teachers who were interviewed have 6 years of experience with PBIS. Additionally, the teachers interviewed taught fifth grade during the 2019-2020 school year. Interviews with fifth-grade teachers were conducted via Zoom, a cloud platform for video, voice, content sharing across mobile devices, desktops, and telephones. Further, each interview was estimated to total 30 minutes and was formatted using a semi-structured interview guide. The open-ended questions probed teachers' experiences with PBIS program implementation, outcomes, and recommendations for improvement (Lub, 2015; Patton, 2015). The semi-structured interview protocol gave teachers an opportunity to share information-rich responses (Given, 2008; Kallio et al., 2016). Such a protocol allows space for participants to share their subjective viewpoints and respective experiences, while directing the discussion toward points of interest for the study (Given, 2008; Kallio et al., 2016).

Data Collection

The SET is a research-based instrument used to aggregate multiple sources of qualitative data and quantitative data to highlight key aspects of PBIS implementation (Horner et al., 2009; Ross et al., 2012; Sugai et al., 2001). SET data collection took place during the 2019-2020 school year. Further, the SET is a validated instrument used to assess the fidelity of implementation of a school's PBIS program. As a participant-researcher, I put into place specific parameters to mitigate potential biases; the parameters are described in the section titled Ethical Considerations. Participants were also provided an appropriate opportunity to consent to

interviews. On February 13, 2020, I collected data in accordance with the SET's required data collection sources: observations of walls and wall posters; products, including the Student Rights and Responsibilities Handbook, school learning plan, teacher lesson plans/instructional materials; and interviews with administrators, students, and staff encountered during walks through the school. These observations, products, and interviews were used to answer the prescribed questions in the SET, resulting in an overall implementation fidelity score for Wonderland. To achieve inter-observer reliability, two people must score the SET; thus, the primary SET data collector and another individual serving as a reliability recorder scored the SET simultaneously.

As a professional school counselor at Wonderland and the primary data collector, I implemented parameters (described below) to mitigate potential biases. Mary Jones (pseudonym) served as the reliability recorder; Mary is a member of the district's equity collaborative learning team. Jane Johnson (pseudonym) is an Implementer Partner with the U.S. Office of Special Education Programs' National Technical Assistance Center on PBIS. As an Implementer Partner, Jane provides implementation and evaluation training to states across the country. Jane had provided training to ensure the proper scoring of the SET for this study. The SET contains protocols for collecting data via interviews, observations, and assessment of products (see Appendix A).

SET interviews were conducted with students and staff members. Specific interview questions are detailed in the SET Interview Guide. Further, the questions asked during the interviews required simple responses from the interviewees. Interviewee responses were recorded using the SET Interview and Observation form. Participants' responses to interview questions were kept anonymous. After the data were collected for the SET, the teachers

answered interview questions about their perceptions of PBIS. Teacher interviews were audio-recorded and transcribed to capture an accurate representation of teachers' perceptions. The interviews and SET results were stored on a password-protected computer.

Data from the student discipline outcome report for fifth-grade students were collected from archived records. The principal of Wonderland School provided access to archival discipline data via PowerSchool. Discipline data were downloaded to a computer; a passcode must be entered to access information on the computer.

Data Analysis

The data collected for this study were analyzed using both quantitative and qualitative methods. All of the data sources have proven validity and reliability. Data sources were analyzed in the order they were collected. Further, discipline data were analyzed for each year PBIS was implemented at Wonderland.

Question 1: With what degree of fidelity is PBIS implemented, as measured using the School-Wide Evaluation Tool? Data were collected via observations, product assessments, and interviews. The results of observations, product assessments, and interview responses were documented on the SET Interview and Observation Form. Responses were transferred to the SET Scoring Guide. A score of 0, 1, or 2 was assigned based on conclusions derived from the observations, products, and interviews. The SET Scoring Guide was used to attain descriptive statistics: mean, median, mode, and range. Further, the SET Scoring Guide was used to calculate feature scores and a cumulative score for implementation fidelity (see Appendix A). A cumulative score of 80% or higher indicates PBIS was implemented with fidelity (Horner et al., 2004).

Question 2: To what degree have discipline infractions changed since the inception of the PBIS program? Changes in discipline infractions were going to be tested using a one-way analysis of variance (ANOVA). However, the data did not meet the necessary assumptions; a boxplot showed outliers in the data. Transforming the data would not guarantee success (Wilcox, 2012). Modifying outliers could potentially introduce bias and removing outliers would alter conclusions of the study (Faraway, 2015; Ghosh & Vogt, 2012). Keeping the outliers could have been a justifiable option; however, the data also violated the assumption of normality. Discipline infractions were not normally distributed, as assessed by the Shapiro-Wilk's test. The Kruskal-Wallis *H* test can test for differences in distributions by comparing mean ranks as opposed to means; this non-parametric test can also compare the distribution of scores (Dunn, 1964). As a result, the Kruskal-Wallis was run to determine if PBIS implementation periods had an effect on discipline infractions.

The assumptions of the Kruskal-Wallis require: one dependent variable measured on a continuous or ordinal level; one independent variable that consists of two or more categorical, independent groups; and independence of observation. The last assumption requires evaluating distribution of scores for each group. The distribution of discipline infractions did not have the same variability. A decision had to be made whether to retain or reject the null hypothesis, H_0: the distribution of discipline infractions is the same across implementation periods. The Kruskal-Wallis was statistically significant; I rejected the null hypothesis. As a result, a post hoc test was run to determine which specific implementation periods were statistically significant from other implementation periods.

Question 3: What are teachers' perceptions of PBIS program implementation, outcomes, and recommendations for improvement? Teachers participated in semi-structured interviews. The interviews were transcribed verbatim to mitigate any potential biases. Further, member checking ensured the transcripts accurately reflected the interviews. The interviews were coded after reading and rereading the transcripts (Braun & Clarke, 2006; Saldaña, 2016). To avoid confirmation bias, elements that did not align with initial coding were also coded (Jones et al., 2014). Then, patterns were identified; pattern coding was used to group similar codes into categories (potential themes). The categories were shifted from descriptions to abstract classifications; category shifting is the naming of themes that describe aspects of phenomena, representative of the data (Braun & Clarke, 2006; Given, 2008; Jones et al., 2014). Next, the themes were reviewed and revised to ensure they fit in relation to coded data. Final themes were derived from an ongoing analysis of refining and defining themes, to ensure appropriate representation of participants' perspectives (Braun & Clarke, 2006). "Ideally, thematic analysis takes into account both patterns of commonality across all cases and the contextual aspects of the phenomenon that account for differences among participants" (Given, 2008, p. 868). This thematic analysis provided a systematically achieved understanding of teachers' perceptions of PBIS program implementation, outcomes, and recommendations for improvement. Table 5 details an alignment of the research questions, data sources, and methods of data analysis.

Table 5

Research Questions, Data Sources, and Data Analysis

Research Question	Data Sources	Data Analysis
1. With what degree of fidelity is PBIS implemented, as measured using the School-wide Evaluation Tool?	SET Interview and Observation Form; SET was used to observe and assess: *Behavior matrices *Wall posters *Student's Rights and Responsibility Handbook *School learning plan *Instructional materials *Interviews	Computing composite score based on predefined calculations for the SET Descriptive statistics: Mean, median, mode, and range
2. To what degree have discipline infractions changed since the inception of the PBIS program?	Archived school discipline outcome reports: discipline infractions, documented by office discipline referrals, organized by category of infraction	Kruskal-Wallis *H*
3. What are teachers' perceptions of PBIS program implementation, outcomes, and recommendations for improvement?	Interviews	Thematic analysis

Note. PBIS = Positive Behavioral Interventions and Supports; SET = School-Wide Evaluation Tool

Assumptions, Delimitations, and Limitations

Assumptions are the expectations of a study that a researcher cannot control. If the assumed expectations are not met, the validity of the study is essentially compromised (Given, 2008; Patton, 2015). Delimitations are boundaries a researcher intentionally sets to control the scope of a study (Creswell, 2014; Frey, 2018; Given, 2008). Limitations of a study are potential

weaknesses of a study that are not within a researcher's control (Leedy & Ormrod, 2016; Mertens & Wilson, 2012).

Assumptions

The first assumption was research participants will interact with integrity and provide honest responses. Regarding accuracy and consistency, office referrals have validity and reliability (Creswell, 2014; Irvin et al., 2004; Messick, 1986; Pas et al., 2011); the SET has validity and reliability (Horner et al., 2004; PBIS, n.d.). School leadership is accurate and consistent in recording referrals in PowerSchool for discipline infractions; this shared understanding mitigates subjectivity and implicit bias. Lastly, all instruments were assumed to be used appropriately to collect discipline data (with respect to their design).

Delimitations

The delimitations are intended to make this program evaluation relevant to a population that is not well-researched in this study's context. The PBIS program was assessed as implemented for all students; however, only discipline data for students in fifth grade were examined. This study assessed the impact PBIS has on students' growth and development just before they enter middle school. Another delimiting factor was evaluating a specific Title I school. Wonderland School was selected based on its connection with the school-to-prison pipeline. As a result of a global pandemic (COVID-19), extant data were used to determine fidelity of PBIS implementation. Further, the teachers who were interviewed were the same teachers who taught fifth grade during the 2019-2020 school year.

Limitations

Participants interviewed during an implementation fidelity assessment may not be equally perceptive or articulate (Creswell, 2014). There may be unknown conditions or factors that cause

responses from participants. Additionally, staff members were aware of observations beforehand; prior knowledge may cause participants to display behaviors that are not typical of normal interactions. Lastly, this study was conducted during a global pandemic (COVID-19).

Ethical Considerations

Several ethical principles were considered when developing this program evaluation. As a data collector, ensuring control for biases and expectations that could influence results was essential. Prior to scoring the SET, specialized training was received to ensure alignment with established guidelines. A colleague provided assistance as a reliability recorder; this also protected against the influence of bias. As a participant researcher, it was important that I be cognizant of and take appropriate steps to mitigate potential biases. All interviews were transcribed verbatim. For further protection against the influence of bias on the collection and analysis of data, open-ended questions were framed to promote truthful responses and emergent codes were recorded. Words and phrases that could potentially introduce bias or prompt participants to respond in favor of an assumption were avoided.

Individual participant data were protected during the research process. In accordance with the SET Interview Protocols, participant names were not recorded, and no identifying information was collected from lesson plans or observations; this protected participant confidentiality. Alphanumeric codes were used when referencing each interview, lesson plan, and observation. The informed consent notified prospective participants regarding the protection of their identities. Prospective participants were able to review the letter (informed consent) and decide whether to participate; they were also informed that there were no consequences for nonparticipation. Additionally, participants were informed of the ability to withdraw from the study at any time.

Individual student-level data were used for the analysis of discipline data. However, archival data were de-identified prior to receipt. The data were stored in a password-protected computer. Data from the study will be destroyed after 7 years. In addition to the specific steps built into the methodology, the Institutional Review Board (IRB) at the College of William and Mary has set guidelines to further ensure the maintenance of ethical integrity.

Institutional Review Board (IRB)

The completion of training in proper human subjects, mandated by the College's Protection of Human Subjects Committee, is required prior to scheduling the proposal defense and conducting research. Certifications are reported to the Office of Sponsored Programs for Federal Assurance. After the successful defense of the dissertation proposal, an application is submitted to the IRB of the College of William and Mary. IRB approval indicates safety and the appropriate use of human subjects in research studies. Human subject protocols are also required to be submitted to the Protection of Human Subjects Committee at the College of William and Mary. The IRB approval process at the College of William and Mary assures ethical protocols of proposed human subjects in research studies.

CHAPTER 4

FINDINGS

This chapter presents the evaluation findings of the PBIS program. Three research questions structured this program evaluation. The first research question was fundamental in assessing implementation fidelity of the PBIS program. The second research question focused on the changes in discipline infractions since the inception of the PBIS program. The third research question captured teachers' perceptions of PBIS program implementation, outcomes, and recommendations for improvement. This chapter details findings from quantitative and qualitative research to provide a coherent understanding of implementation, outcomes, and perceived effectiveness of the PBIS program at a Title I school (Wonderland), with a substantial population of African American students.

First Research Question

With what degree of fidelity is PBIS implemented as measured using the School-wide Evaluation Tool? The SET was used to collect data and assess implementation fidelity of the PBIS program at Wonderland. Prior to calculating the implementation fidelity score for the entire PBIS program, each implantation feature must be evaluated individually. A feature is proven to be implemented with fidelity if it receives a cumulative score of 80% or higher. Table 6 details the score for each implementation feature.

Wonderland's PBIS program had a cumulative feature score of 70%, indicating that PBIS was not implemented with fidelity. The cumulative feature score for implementation fidelity corresponds with the mean in Table 7.

Table 6

Implementation Feature Scores

Feature	Deciding Factors (Data Source)	Score
A. Expectations Defined	1. Staff agreed to 3 positively stated rules (P) 2. Expectations posted in less than 4 places (O)	50%
B. Behavioral Expectations Taught	1. System to teach behavioral expectations (P) 2. 90% of Staff taught behavioral expectations (I) 3. 90% of Staff were taught PBIS (I) 4. Less than 50% of students could state 67% of the school rules (I) 5. Less than 50% of staff could state 67% of the school rules (I)	60%
C. Ongoing System for Rewarding Behavioral Expectations	1. No system for how to reward students (P) 2. Over 50% of students received a reward within past 2 months (I) 3. 90% of staff delivered a reward within past 2 months (I)	83%
D. System for Responding to Behavioral Violations	1. System for managing specific behavioral violations (P) 2. 60% of staff agree on office vs classroom managed issues (I) 3. Crisis plan for responding to extreme danger readily available in 5 locations (O) 4. 90% of staff agree with admin on procedure for extreme emergencies (I)	75%
E. Monitoring and Decision Making	1. Discipline referral forms capture essential information (P) 2. Admin can define system for processing discipline referrals (I) 3. Staff receives at least 3 discipline data summary reports per year (I) 4. Less than 90% of staff report discipline data informs school-wide behavior support efforts (I)	88%
F. Management	1. Improving behavior support is not a top 3 goal in the school learning plan (P) (I) 2. 90% report there is a school-wide team to address behavior support systems (I) 3. Admin reports team membership includes representation of all staff (I) 4. 90% of the team can identify the team leader (I) 5. Admin is not consistently active on the team (I) 6. Team meetings do not happen monthly (I) 7. The team reports progress to staff at least 4 times a year (I) 8. The team has an action plan with specific goals that are less than 1 year old (P)	87%
G. District Level Support	1. The school budget does not have money allocated for school-wide behavioral support (I) 2. Admin can identify an out-of-school liaison (I)	50%

Note. (P) = Product; (O) = Observation; (I) = Interview

Table 7

Descriptive Statistics for PBIS Features

Descriptive Measure	Statistic
M	70.43
Mdn	75.00
Mode	50.00
Range	38.00

Note. PBIS = Positive Behavioral Interventions and Supports

Second Research Question

To what degree have discipline infractions changed since the inception of the PBIS program? A Kruskal-Wallis H test was used to determine statistical significance of differences in student discipline infractions between nine groups of participants at different PBIS implementation periods: SY 10-11, SY 11-12, SY 12-13, SY 13-14, SY 14-15, SY 15-16, SY 16-17, SY 17-18, and SY 18-19 PBIS implementation periods. Distributions of student discipline infractions were not similar for all groups, as assessed by visual inspection of a boxplot. The number of discipline infractions fluctuated between implementation periods (see Figure C1 in Appendix C). Evidencing an overall decrease in discipline infractions, SY 18-19 had the lowest number of discipline infractions since the inception of the PBIS program. The *p*-value of .001 confirmed statistical significance and informed conclusions on the hypotheses; $p < .05$ denotes statistical significance:

- Null hypothesis, H_0: the distribution of discipline infractions is the same across implementation periods.

- Alternative hypothesis, H_1: the distribution of discipline infractions is not the same across implementation periods.

The null hypothesis was rejected; the alternative hypothesis was accepted. The distribution of student discipline infractions was statistically significantly different between implementation periods, $\chi^2(8) = 28.905$, $p = .001$, as recorded in Table 8.

Table 8

Independent-Samples Kruskal-Wallis Test Summary

Test Measure	Test Summary
Test Statistic	28.905[a]
Degree of Freedom	8
Asymptotic Sig.	<.001
Total *N*	363

N in Tables 8 and 9 represent the number of students with discipline infractions. The mean ranks of discipline infractions were statistically significantly different between implementation periods. The mean ranks are in Table 9.

Table 9

Mean Ranks

Implementation Period	*N*	*M* Rank
SY 10-11	54	186.69
SY 11-12	44	196.16
SY 12-13	36	170.44
SY 13-14	36	171.93
SY 14-15	57	207.47
SY 15-16	39	205.63
SY 16-17	27	203.78
SY 17-18	45	160.42
SY 18-19	25	98.46

A post hoc test was necessary to determine which PBIS implementation periods were statistically significantly different from each other. As a result, pairwise comparisons were performed using Dunn's (1964) procedure with a Bonferroni correction for multiple comparisons; adjusted *p*-values are presented. The post hoc analysis revealed statistically significant differences in discipline infractions between SY 18-19 (*M* rank = 98.46) and SY 10-11 (*M* rank = 186.69; $p = .009$); SY 18-19 (*M* rank = 98.46) and SY 11-12 (*M* rank = 196.16; $p = .003$); SY 18-19 (*M* rank = 98.46) and SY 16-17 (*M* rank = 203.78; $p = .005$); SY 18-19 (*M* rank = 98.46) and SY 15-16 (*M* rank = 205.63; $p = .001$); and SY 18-19 (*M* rank = 98.46) and SY 14-15 (*M* rank = 207.47; $p = .000$). No other combination of groups revealed statistically significant differences. Each pairwise comparison is specified in Table 10.

Table 10

Pairwise Comparison of Implementation Periods

Sample 1-Sample 2	Sig.	Adj. Sig.
SY 18-19-SY 17-18	.012	.448
SY 18-19-SY 12-13	.005	.194
SY 18-19-SY 13-14	.005	.163
SY 18-19-SY 10-11	<.001	.009
SY 18-19-SY 11-12	<.001	.003
SY 18-19-SY 16-17	<.001	.005
SY 18-19-SY 15-16	<.001	.001
SY 18-19-SY 14-15	<.001	.000
SY 17-18-SY 12-13	.652	1.000
SY 17-18-SY 13-14	.605	1.000
SY 17-18-SY 10-11	.190	1.000
SY 17-18-SY 11-12	.090	1.000
SY 17-18-SY 16-17	.073	1.000
SY 17-18-SY 15-16	.038	1.000
SY 17-18-SY 14-15	.018	.633
SY 12-13-SY 13-14	.949	1.000
SY 12-13-SY 10-11	.447	1.000
SY 12-13-SY 11-12	.250	1.000
SY 12-13-SY 16-17	.188	1.000
SY 12-13-SY 15-16	.126	1.000
SY 12-13-SY 14-15	.080	1.000
SY 13-14-SY 10-11	.490	1.000
SY 13-14-SY 11-12	.278	1.000
SY 13-14-SY 16-17	.208	1.000
SY 13-14-SY 15-16	.142	1.000
SY 13-14-SY 14-15	.093	1.000
SY 10-11-SY 11-12	.639	1.000
SY 10-11-SY 16-17	.466	1.000
SY 10-11-SY 15-16	.365	1.000
SY 10-11-SY 14-15	.271	1.000
SY 11-12-SY 16-17	.754	1.000
SY 11-12-SY 15-16	.665	1.000
SY 11-12-SY 14-15	.570	1.000
SY 16-17-SY 15-16	.941	1.000
SY 16-17-SY 14-15	.874	1.000
SY 15-16-SY 14-15	.929	1.000

Third Research Question

What are teachers' perceptions of PBIS program implementation, outcomes, and recommendations for improvement? Five teachers participated in 30-minute interviews and provided insights into their perceptions of PBIS. Thematic analysis was used to analyze each interview transcript and discover the themes shown in Table 11.

Table 11

Summary of Major Findings for Themes of Teachers' Perceptions

Theme	Summary of Major Findings
Promote Positive Behaviors	Practitioners must establish and teach expected behaviors. Practitioners must acknowledge students that display positive behaviors; determine student motivators; and provide students with incentives and rewards.
Develop Cultural Competency	Students' race and socioeconomic status impacts practitioners' approach to PBIS implementation. Practitioners must develop meaningful relationships. Practitioners must learn and implement culturally responsive practices.
Impact on Student Conduct	As a result of PBIS, some students demonstrate an increased display of positive behaviors. However, practitioners' lack of understanding regarding implementation and application has an adverse impact on PBIS outcomes.
Barriers of Efficacy	Inconsistency from practitioners has an adverse impact on PBIS implementation. Practitioners must undergo capacity building to develop the necessary competencies for effective PBIS implementation.

Promote Positive Behaviors

Each teacher interviewed noted that promoting positive behavior plays a vital role in implementing a PBIS program. It can be perceived as unfair to hold students accountable for behavioral infractions without communicating behavioral expectations. Accordingly, teachers

must define and teach desired behaviors to students. Teachers at Wonderland stated students are more likely to display positive behaviors when they are acknowledged for them. Further, some students demonstrate positive behaviors when they are motivated by the possibility of receiving intrinsic and extrinsic rewards. Regardless of the specific method, teachers agreed that establishing behavioral expectations, acknowledging behaviors, and determining motivators are key aspects of promoting positive behaviors.

Establish Behavioral Expectations. With respect to PBIS implementation, Rita (all names are pseudonyms) shared her perspective of the importance of promoting positive behaviors by first establishing behavioral expectations. Further, Rita makes creating behavioral expectations a collaborative experience with her students; she stated that talking with her students, as opposed to making demands, tends to yield better results:

> I try to talk about the expectations and make it more of a conversation so that they feel as if they are a part of the planning of it, even though I know it's planned out already. So, I start off making a discussion and just let them know why some of those things are in place, and I take it from there.

Jennifer echoed Rita's sentiments and then explained how expectations are enforced in the classroom. In some situations, students play a role in enforcing expectations via public display of accountability: "We actually use it like a scale, to show whether they did well, or if their behavior is off a little bit. We move these little clips up and down as needed throughout the day" (Jennifer). Including students throughout the process by establishing behavioral expectations in a collaborative manner allows students to have a better understanding of their rights and responsibilities. For some students, understanding their responsibilities makes it easier

for them to take ownership of behaviors; meeting behavioral expectations can be perceived as a choice.

With respect to student choice, some decisions are easier to make than others. Three teachers referenced similarities between teaching behavioral expectations and teaching academic expectations. Some students learn more quickly than other students. There are also students working to unlearn old behaviors, while simultaneously learning new behaviors. Rita spoke about challenges students have while attempting to display positive behaviors: "Remind them of what is expected of them or point out other students who are doing the right thing. Sometimes they're trying to do it, but the unwanted behavior is something that's been learned over the years." However, there also are students who disregard behavioral expectations simply because they believe teachers are not providing supervision. Additionally, some students rebel against behavioral expectations in blatant acts of defiance. Even though there are instances when students do not adhere to established behavioral expectations, findings from the interviews suggested that the establishment of behavioral expectations is essential to PBIS implementation.

Jennifer expressed how teachers must do more than set behavioral standards to make students feel valued; teachers should encourage positive behaviors by letting students know when they are making positive choices. Three teachers referenced the effect that acknowledging behaviors has on peer-to-peer influence and promoting positive behaviors; commending students yields a trickle-down effect that makes displaying positive behaviors seemingly contagious. Kate noted the trickle-down effect is simply a benefit of acknowledging students, not the purpose of acknowledging students; it is important to acknowledge students, whether there is a classroom full of students or just one student in the classroom.

Acknowledge Students. Everyone deserves to feel seen. Kate recounted an experience from her childhood and cited it as a driving force for the need to acknowledge students:

> As a quick personal experience as a kid, I was always the one that did what I was told, and I felt like I was never recognized for it. So, for a typical school year, I am one that finds the positives first! Using Class Dojo, so kids can just, you know, rack up these points and know I see them, and they'll feel like yes! I'm doing great, I'm doing great!

Teachers should make a conscious effort to compliment their students more than they correct them. Megan added, "I think a lot of times they think everything's about getting in trouble. I think it helps students to know that we recognize good things they do." Similar to Megan's position, Kate shared that instant feedback allows teachers to encourage the continuation of positive behavior in real time: "I like it because even the kids who haven't been doing well or are not making the best choices, the second they do, I can address it quickly." While acknowledging students has proven to yield positive results, all the teachers agreed there is also a need to determine what type of rewards will motivate their students to display positive behaviors on a consistent basis.

Determine Motivators. The final component of promoting positive behavior is determining the best methods to reward students. After acknowledging students and recognizing behaviors, teachers use rewards to influence the sustainability of positive behaviors. Megan has discussions with her students to determine what rewards interest them:

> The way I implemented it is first I kind of get to know the students first and what motivates them. And then depending on what that is, I will reward them, based on what they do like and what appeals to them.

Student motivators can be differentiated to fit student preference. When teachers solicit feedback from students, it can increase the likelihood that the chosen rewards will motivate students to display positive decisions. Agreeing with Megan, Kate discussed the importance of learning about students on a personal level:

> That definitely comes from conversation with the kids. I always start the school year with a quick survey asking if you can choose from this list, what would you choose? Or I'll tell them to give me some ideas, and of course, there's the silly ones that say, Can you buy me a car? I ask just to see what's interesting to them.

On the contrary, Rita is not an avid supporter of the reward system. Rita cautioned against using incentives as a driving factor to influence positive behaviors:

> The only part we need to work on, in my opinion, is trying to get it away just from reward, reward. Reward should only be a part of it. How do we get our little ones to want to do this? They're not always going to get a tangible reward. So, we have to kind of wean them away from wanting something tangible and think of the big picture in mind.

Incentivizing behaviors can cause students to make positive decisions to receive a reward, as opposed to making positive decisions because it is the appropriate thing to do.

While some teachers believe showing kids they are valued and appreciated via commendation is simply acknowledging students, other teachers consider the recognition a reward. Some teachers reference verbal praise as a reward to motivate students and encourage positive behaviors. Three teachers agreed that verbal praise can have a more meaningful impact than physical incentives. Kate stated:

> For me, I feel like it is the rewards for the extrinsic motivation, but I think PBIS is supposed to be the focus on the positive, so that it's not always about the extrinsic. The verbal can be enough. They like that!

Megan agreed with Kate's feelings regarding verbal praise. Megan also referenced student population as a factor that influences what type of motivation will invoke positive responses:

> I think that there was something like I know we talked about people getting things versus like words. And I think as far as this population, I think, maybe, like, getting things like time or praise actually works a little better.

Determining motivators, acknowledging students, and establishing behavioral expectations (regardless of order) are key aspects of promoting positive behaviors. In some cases, identifying motivators only requires teachers to make observations or ask questions. However, sometimes teachers experience difficulty attempting to determine motivators. As a result, teachers can be intentional in learning their students to aid PBIS implementation. Specifically, each teacher-participant referenced the importance of understanding cultural context.

Develop Cultural Competency

The teachers agreed some students are seemingly uninfluenced by intrinsic or extrinsic motivation. Alex recalled a time she experienced difficulty determining effective motivators for students in her classroom:

> Some kids don't really care about getting scoreboards and things like that. So, that was kind of a challenge to try to figure out what I can implement that would get them interested in it if they didn't like the rewards. I think the types of rewards that you give may be different based on the population.

Each of the other teachers shared an experience similar to Alex's experience. Findings from the interviews indicated students' response to motivation varies according to factors such as socioeconomic status, demographics, and overall relationship with people outside of their own social and cultural context.

Socioeconomic Status and Equity. Although each teacher acknowledged that socioeconomic status and equity influence students' response to motivation, each teacher presented a different perspective of how socioeconomic status and equity influence students' response to motivation. Kate expressed that students living in poverty appreciate tangible rewards as a means of motivation and encouragement. However, in Megan's experience, students living in poverty are uninfluenced by tangible rewards:

> I think with a lot of these students, it is not really about getting things, but a lot of them have things. You know, people find a way to get stuff even with no money, they just, they don't have, like quality time, if that makes sense.

Adding a third perspective, Jennifer posited PBIS can be completely ineffective pending the student population:

> So, depending on the population in my classroom, sometimes I can implement it in a fashion that works. Sometimes it was just like, stop using that. Let's go do something else because, you know, maybe it didn't work, depending on my population behaviors.

Jennifer and Rita agreed societal conditions affect African American students' overall response to PBIS. However, the two teachers differed in opinion regarding next steps; Jennifer suggested giving up, while Rita suggested trying harder.

Rita explained her opinion regarding challenges teachers encounter when attempting to motivate some African American students living in poverty:

> We have a lot of African American, in fact, here especially, race ties into a lower socioeconomic background. I think, overall, just as a group of African Americans, if they have family or friends or parents helping, then okay. But I think it's difficult to raise children right now by yourself if you're working or in and out of the home without any form of support. So, for that African American child that has that balance, PBIS works for them. I think PBIS can work for all of them, but if that balance isn't there, from that background, it's just way more challenging.

Megan mentioned the importance of implementing PBIS with equity; teachers should be cognizant of students' needs during PBIS implementation. Equality is not always synonymous with equity. Though PBIS is a program designed for all students, it cannot be implemented the same way for all students. Rita shared personal information to add clarity on why PBIS must be implemented differently based on population:

> Our population makes a major difference for PBIS because they need a lot of the structure. Behaviors can happen when a child comes from a low socioeconomic place or even a single-parent home, and I know, especially for Black males. I have two sons. Even though I'm an educator, a teacher, it makes a difference that kids have two parents, whether male or female. Kids need that teamwork, that structure, that unfortunately a lot of students lack in my experience. Often lower socioeconomic students have that background, sometimes don't have that structure, and that plays into behaviors.

Jennifer echoed Rita's sentiments regarding the role a student's background has in their behavior. Jennifer expressed some students display physical aggression because their parents encourage fighting. She continued to explain that teachers do not understand why parents encourage their children to break school rules or how to intervene. By developing cultural

competency, teachers gain understanding of how to interact with people of different cultures. Consequently, teachers will have the capacity to create authentic connections and implement PBIS in a way that cultivates a sustainable display of positive behaviors.

Cultivate Meaningful Relationships. All teacher-participants agreed and reiterated the benefits of building meaningful relationships with the students. Three teachers referenced their rapport with students as a key element for PBIS implementation. Rapport building and PBIS implementation have a cyclic relationship. Building rapport with students can help teachers determine motivators, while applying knowledge of motivators can help teachers build rapport with students. Megan described the ascendency relationships and PBIS have on each other:

> So, I guess the way I implemented it is, first, I kind of get to know the students first and what motivates them…. I think the benefits are that I get to motivate students. I mean really motivate them. And they like that. And that makes them like me. And that's a consequence, and consequences aren't always bad. There's a good one or a bad one.

Like Megan, Kate enjoys conversing with her students. Kate dedicates time at the beginning of each day to connect with her students:

> Those students typically take a while to get to know and find out what really is the motivator, so I'll go with what's the majority until I figure it out, and sometimes it might take me maybe a whole quarter before I go, wow, you like this? I can do that for you! And that's where I really rely on my morning meetings, so they can have that open conversation, and it's just like having a conversation. They don't think that I have a secret agenda; they know like we're all just trying to learn each other.

In addition to learning the students, Kate and Rita also allow the students to learn them; meaningful relationships are not unilateral. Moreover, Rita does not think PBIS can be effective without the cultivation of meaningful relationships:

> So, I had that planned out and in place because a lot of planning goes into it. Then you start building that relationship, you know they want to know, who is this lady? Who is this person that is going to teach me this year? So, you kind of ease them into getting to know you. I don't think there's going to be any PBIS without building that relationship.

Some students put more effort into displaying positive behaviors when they believe their teacher cares about them.

Alex and Kate brought awareness to a controversial topic regarding the purpose of PBIS and students' reasoning for meeting behavioral expectations. Alex expressed some students display positive behaviors because they want to make their teacher proud, as opposed to understanding why it is important to make positive choices:

> It is a good way or a good strategy to build relationships with the kids and get kids to try and be on the same page with you. Even if they don't care about the rewards, at some point, they just want to make us proud. So, sometimes they do it for that as well. I know sometimes if the student misbehaves, I'll get a letter because they know that they did wrong and they have sent me a note or written me a letter, letting me know I'm sorry I disappointed you. So, I think building relationships too is a big part of it.

Teachers can appear inauthentic if they attempt to build relationships with the goal of improving their ability to implement PBIS; improving PBIS implementation should be viewed as a bonus. Moreover, some students will notice the lack of authenticity and respond unfavorably. Kate has a selfless perspective on relationship building:

> Sometimes, it's conversations about random topics. Sometimes, just being a little bit more interactive, so they can put their ideas out and they can move around a little bit. Either way, it is good to get to know each other, going over social-emotional learning, together, as it applies to them, just to help them out and just building community.

Every teacher-participant believes in the importance of cultivating meaningful relationships. While it should not be the reason for building relationships, teachers agree that the existence of meaningful relationships supports PBIS implementation. PBIS implementation can contribute to the promotion of a positive school climate and culture.

Impact on Student Conduct

Four teachers believed the PBIS program has an impact on student conduct. Megan stated the PBIS program assists in curbing negative behaviors. In addition to curbing negative behaviors, Kate mentioned PBIS strategies can yield immediate results: "And it doesn't have to be a big to-do, it can just be as simple as, 'Hey, great job keeping your feet on the floor,' or whatever the case may be, and then they act right." Alex believed PBIS has a limited impact on student conduct:

> I would say that it does, it does have an impact on it, but I honestly feel like children, they're going to do what they want to do at some point. So, I really don't think it's like, oh okay, since I'm going to get this sticker, like, I'm going to behave. And if somebody makes me mad, I'm not going to put my hands on them, or whatever the situation is. So, I just feel like sometimes they're going to do what they want to do, regardless of if they're going to receive a reward or an award.

Rita cautioned against implementing PBIS in the manner Alex referenced; teachers should focus on teaching students, as opposed to providing incentives.

With the proper implementation, the PBIS program can yield outcomes such as students displaying positive behaviors and understanding the importance of making positive choices. Rita also believed the PBIS program can help students develop a sense of accountability:

> They are able to come back and say to you. I shouldn't have done that, and it's genuine, and I can usually tell 90% of the time if it is or not. They should be able to tell you that, hey, I shouldn't have done that; I did not make the best decision.

Jennifer expressed having limited knowledge regarding PBIS implementation: "Normally, when I'm thinking about PBIS, I don't know what to do because I don't know a lot about it." Even with limited knowledge, the PBIS program is recognized as beneficial; Jennifer also stated, "I will say it; I think it reduces it," when discussing the effect PBIS has on discipline infractions. Jennifer was not the only teacher who was not well-versed in the PBIS program. Each teacher-participant expressed that making improvements to the PBIS program could enhance the program's effects.

Barriers to Efficacy

PBIS has been referenced as a challenging program to implement. Programmatic challenges can have an adverse effect on buy-in and implementation fidelity. Consistent with any program, identifying barriers and methods for refinement are key to improving efficacy. According to teachers, a lack of capacity and consistency contributed to pitfalls of the PBIS program at Wonderland.

Capacity Building. Three teachers stated they lacked knowledge of the PBIS program. Further, teachers who have not received any training are still expected to implement the PBIS program. It can be considered unethical for a doctor who is not a cardiovascular surgeon to perform a heart transplant. Using the previously mentioned logic, it can be considered unethical

for teachers who have not received the proper training to implement the PBIS program. Every teacher-participant expressed a need for preparation and training to implement the PBIS program with fidelity. Alex explicitly stated that teachers did not receive enough training: "I think if you implement it correctly, it will have a positive impact. Just don't feel like we got enough training on it to know how to really implement PBIS in the classrooms." Including modeling as a part of training can be beneficial for teachers. Jennifer indicated seeing PBIS modeled would encourage capacity building:

> I will think that—how can I say this? Modeling how to do it will make it better. To me, if someone modeled it for me or a teacher or any other person, it will teach it and will show us how it should be.

Jennifer specifically referenced a lack of support and training as a downfall of the PBIS program:

> So, I don't really fully use PBIS, but sometimes I use the clip. Sometimes. I didn't know as much about it as I probably should have. We don't know a lot about it. You know, they give you a chart and say use this, but you don't know that much about it, or how somebody else implemented it, and how well it worked. I think that's the downfall of it. So, I just think more training on it would probably help.

Moreover, teachers should be trained on how to implement PBIS for all students; some teachers referenced students' socioeconomic status and race as challenges to implementation. Rita agreed with Alex's and Jennifer's position that teachers need training. Unlike the other teachers, Rita had confidence in her ability to implement PBIS.

In addition to formal training, Rita believed teachers can learn PBIS from other educators in the building. Rita also communicated that there is more than one way to implement PBIS:

> It helps you to learn more about it because, as I said before, I've learned so much from other teachers over the years. A lot of the things that I use today are because another teacher shared that with me. Someone else shared it along the way, not even just a teacher, an educator, someone who works in a school, I've learned from instructional assistants as well. It's implemented, and it shouldn't just be a lesson, and I know they have to. I appreciate the lessons that I'm given, it's necessary guidance. But I think that some teachers may think it has to be exactly put up a picture, and someone is walking around with a clipboard, and they see what their flip chart playground was on the board.

Educators can vary in their approach to instructional delivery while still teaching the same content; likewise, PBIS implementation can be differentiated to account for various teaching styles. Moreover, PBIS can be modeled to fit needs of individual teachers without compromising the integrity of the program.

While the other teachers described a general need for support and training, Rita provided specific details. Rita posited PBIS must be integrated into daily operations:

> I think a misconception that I see, it cannot be during morning meeting, it cannot be scheduled at say 12 o'clock. It has to be, when this happened. What are you going to do as a teacher if something happens in the middle of your language arts class? You can't leave it and write it down. Or okay, tomorrow we're going to talk about that being said. Especially if it's happening now or about to happen. Some things you just have to deal with right away. So, I think your PBIS should be ongoing.

For clarity, Rita did not suggest PBIS lessons could not be scheduled. She communicated teachers should be flexible and capitalize on teachable moments:

> So overall, I think it's a great program, we just need to get it to move on from teachers thinking that this has to be only in the morning. They have to get in the habit of understanding, this is ongoing; this is all day long. That is a part of the teaching. When you're in math, you have to address the situation as you're going along and be consistent.

Consistency is a valuable trait for all staff to exhibit. Teachers expressed frustration regarding a lack of administrative support and consistency.

Lack of Consistency. Consistency can promote trust and improve buy-in. Some teachers make honest attempts to provide consistency and build student trust; however, some teachers are unsure if administration makes honest attempts to provide consistency. Four teachers expressed a concern with the lack of consistency from administrators. When presenting her perspective on barriers to efficacy, Megan stated, "I think we should just have consistency for all students. Well, as I said, if it's a consequence, it needs to be consistent. And if it's a system we need, I just feel overall we need some consistency." Megan presented a connection between consistency and trust:

> I feel it's all about trust, and some kids are promised a lot. And if you don't follow through when they're promised something, and they look forward to something, and then if it doesn't happen, then we let them down.

Although Megan provided the most context regarding consistency, she did not believe anyone should be held solely accountable:

> Sometimes, students are promised things they don't get, and I think, or we might say, you know, for example, I know for a while we had a cart at our school like we have the cart and then it like just disappears. And I feel like that breaks a little bit of trust, I feel like. I

> don't think it's anybody's fault. I think that the changes are good but just with everything else going on, that sometimes some of the PBIS things can fall by the wayside.

Jennifer and Megan expressed similar sentiments regarding trust. Jennifer also felt trust is difficult to regain, even if students are unaware of the connection between consistency and trust:

> I think once you break trust, it's kind of hard work to get back. And I feel, I don't know, that's probably my opinion, but I mean, I feel like maybe kids don't even look at it like you are breaking that trust. They are just like, you know, you said it and it didn't happen. I mean but we know it's breaking trust.

The lack of consistency can elicit the lack of trust between stakeholders. The lack of trust can hinder PBIS implementation. Moreover, a lack of trust can have an adverse effect on student development and inhibit desired program outcomes.

Summary of Findings from Interviews

Though specific details varied, each teacher-participant expressed that promoting positive behaviors and developing cultural competence are essential to PBIS implementation. Promoting positive behaviors consists of establishing behavioral expectations, acknowledging students, and determining motivators. Most of the students at Wonderland are African American students living in poverty; teachers must develop cultural competence and ensure the provision of equity.

Teachers have various perspectives of program outcomesf; pending implementation fidelity, PBIS can have a posifive impact on student conduct. Teachers also shared suggestions to improve the PBIS program. Capacity building and a lack of consistency were identified as barriers to program efficacy. The findings from the interviews detailed teachers' perspectives regarding program implementation, outcomes, and recommendations for improvement.

Summary of Findings

Chapter 4 presented findings that explored PBIS implementation fidelity, changes in discipline infractions, and perceived effectiveness of PBIS. The SET was used to measure implementation fidelity of key features and overall program implementation. Some features of the PBIS program at Wonderland met expectations for implementation fidelity. However, the PBIS program did not prove to be implemented with fidelity. Specifically, Wonderland's PBIS program scored 70% for program implementation fidelity. The Kruskal-Wallis Test was run to determine if the distribution of discipline infractions were statistically significantly different between PBIS implementation periods. The mean ranks and distributions of discipline infractions were found to be statistically significantly different between implementation periods, $\chi^2(8) = 28.905$, $p = .001$. Thematic analysis was used to reveal patterns of experience expressed by the teachers tasked to implement PBIS. Chapter 5 discusses the connotation of the findings, implications for policy and practice, and recommendations for future research.

CHAPTER 5

DISCUSSION, IMPLICATIONS, AND RECOMMENDATIONS

This chapter (a) provides context that brings meaning to the findings in Chapter 4; (b) asserts implications for policy and practice; and (c) presents recommendations for future research. Additionally, this chapter suggests recommendations based on findings that do not have a direct connection to specific research questions. Exclusionary discipline policies support the existence of the school-to-prison pipeline; PBIS programs have been found more effective in promoting sustainable positive behaviors than exclusionary discipline policies (Cregor & Hewitt, 2011; Rafa, 2018; USDOE, 2014). The purpose of this mixed-methods program evaluation was to assess a PBIS program implemented in a Title I school with a substantial population of African American students.

Discussion of Findings

Interviews, surveys, observations, extant data, and archival data were used to examine the PBIS program at Wonderland. Three research questions were used to structure this program evaluation. The first research question assessed the implementation fidelity of the PBIS program. The second research question focused on the changes in discipline infractions since the inception of the PBIS program. The third research question captured teachers' perceptions of the effectiveness of the PBIS program. Relevant findings from each research question are discussed in tandem to provide a coherent understanding of Wonderland's PBIS program.

Implementation, Outcomes, and Perceived Effectiveness

The PBIS program was implemented with 70% fidelity. The benchmark for implementation fidelity is 80%; thus, PBIS was not found to be implemented with fidelity. Wonderland's score for implementation fidelity was consistent with teacher perceptions. Each teacher expressed that teachers were not taught how to implement PBIS. Implementation fidelity was assessed using the SET, a research-based instrument used to analyze quantitative and qualitative data that highlight seven key features of PBIS implementation (Horner et al., 2009; Sugai et al., 2001). With implementation fidelity 10% short of the benchmark, changes in discipline infractions still proved to be statistically significant. However, some perceptions of program efficacy did not fully align with the discipline data. Creating a full circle moment, teachers believed challenges with program implementation have an adverse impact on program outcomes.

Behavioral Expectations. Wonderland earned a fidelity score of 50% for Feature A: Expectations Defined. There is documentation that staff agreed to five or fewer positively stated behavioral expectations. However, the behavioral expectations were posted in fewer than four places. Wonderland earned a 60% fidelity score for Feature B: Behavioral Expectations Taught. There is a documented system to teach school rules and behavioral expectations. Further, 90% of the PBIS team stated they reviewed the PBIS program with staff on an annual basis, and 90% of the staff stated they taught students behavioral expectations. However, fewer than 50% of the students could state 67% of the school rules. Teachers may have behavioral expectations for their classroom; however, school-wide expectations are less well known. During their interviews, teachers stressed the importance of promoting positive behaviors by establishing and teaching behavioral expectations. According to the SET, less than 50% of the staff could state 67% of the

school rules; the findings from the second research question reflected discipline infractions for behavioral expectations that may not have been clearly established.

In addition to establishing behavioral expectations, teachers also shared their perspective of acknowledging students and determining motivators as a means of promoting positive behaviors. Corroborating the interviews, Wonderland earned an 83% fidelity score for Feature C: Ongoing System for Rewarding Behavioral Expectations. At least 50% of the students stated they received rewards for displaying positive behaviors, and at least 90% of the staff indicated they provided rewards to students for displaying positive behaviors. However, Wonderland's documented system for rewarding student behavior does not detail methods to acknowledge students who display positive behaviors. Findings from teacher interviews supported the SET findings; teachers expressed that there is no established protocol for acknowledging or motivating students. According to teacher interviews, rewards are not always effective for African American students with low socioeconomic status. Further, some students have parents who do not support behavioral expectations taught in school.

While one teacher expressed confusion by the idea that parents encourage their children to fight, other teachers indicated staff should develop cultural competence and build meaningful relationships. Empathy and authenticity can aid teachers in their approach to PBIS implementation and cultivating sustainable change. All the teachers agreed there is a positive correlation between building meaningful relationships and promoting positive behaviors. Further, it can be beneficial to respond to behavioral violations by first seeking to understand the reason for the violation.

Discipline Infractions. Feature D: System for Responding to Behavioral Violations had a 75% fidelity score. Wonderland has a documented system for dealing with and reporting

specific behavioral violations. Moreover, protocols for extreme emergencies are documented in a crisis plan that is readily available in at least five locations. At least 90% of the staff agreed with administration about protocols for extreme emergencies. However, fewer than 89% of the staff agreed with administration about which violations should be office-managed as opposed to classroom-managed.

Office-managed and classroom-managed violations are recorded as discipline infractions. The number of discipline infractions fluctuated between implementation periods; however, SY 18-19 had the lowest number of discipline infractions since the inception of the PBIS program. The distribution of discipline infractions was studied for 9 school year periods of PBIS implementation using the Kruskal-Wallis H test. A *p*-value less than .05 confirmed statistical significance. The distribution of student discipline infractions was statistically significantly different between implementation periods, $\chi^2(8) = 28.905$, $p = .001$. Further, the results of a post hoc test detailed which PBIS implementation periods were statistically significantly different from each other. Each group of school year periods of PBIS implementation was compared as pair-wise comparisons. Five groups evidenced statistically significant differences in discipline infractions: SY 18-19 and SY 10-11; SY 18-19 and SY 11-12; SY 18-19 and SY 16-17; SY 18-19 and SY 15-16; SY 18-19 and SY 14-15. Factors assessed in Feature E: Monitoring and Decision Making supplemented context regarding discipline infractions.

Wonderland earned an 88% fidelity score for Feature E. The discipline referral forms captured appropriate demographic data; administration can clearly define the system for collecting and summarizing discipline referrals; and administration stated staff receives discipline data summaries at least 3 times a year. Wonderland did not receive a perfect score for Feature E because at least 90% of the PBIS team did not report that discipline data are used to

make decisions in designing, implementing, and revising school-wide behavior support efforts. The PBIS team's reports aligned with perspectives captured via interviews; teachers expressed feeling a lack of administrative support regarding program implementation.

Program Commitment. A factor that impeded Wonderland's fidelity score for Feature F: Management was the lack of administrative involvement; the score for Feature F was 87%. Although administration is not an active member of the school-wide behavior support team, administration stated the team includes representation of all staff. At least 90% of the staff reported there is a school-wide team to address behavior support systems, and they were able to identify the team leader. Further, the team has an action plan with specific goals that is less than 1 year old. Administration stated that the team reports progress to the staff at least 4 times a year. However, the school improvement plan does not list improving behavior support systems as one of the top three school improvement plan goals. Additionally, team meetings are not held frequently; administration did not confirm team meetings occurred at least monthly.

According to the interviews, monthly meetings were not all that lacked consistency. Teachers indicated that inconsistency from administration has a negative impact on program efficacy; sometimes administration provided rewards and incentives, and other times they did not. There is a possibility that Feature G: District-level Support provides context for the lack of consistency regarding the provision of incentives and rewards. Half of Feature G's fidelity score is based on budget. However, the school budget does not contain allocated funds for building and maintaining school-wide behavioral support; this could explain why administration presented as inconsistent. Absence of a program budget can have an adverse impact on program outcomes. The only reason Wonderland earned 50% for Feature G was because administration could identify an out-of-school liaison. Feature G is the last feature evaluated to determine the

cumulative implementation fidelity score. Discussion of implementation, outcomes, and teachers' perceptions of the PBIS program cultivates a holistic narrative of the findings.

Implications for Policy and Practice

The implementation of an effective PBIS program can aid in reducing negative behaviors and promoting good citizenship (Bear et al., 2017; Flannery et al., 2014). However, some schools experience challenges implementing effective PBIS programs (Sanetti et al., 2013; Yeung et al., 2016). PBIS data regarding implementation, outcomes, and perceptions were triangulated due to interrelation. This section presents implications and recommendations based on the findings from the study. A summary of the findings and their corresponding recommendations is documented in Table 12.

Provide Training for PBIS Implementation

According to findings from the SET, the PBIS program's cumulative implementation fidelity score was 70%; the benchmark was 80%. The chair of the PBIS committee is responsible for leading the PBIS program. However, the building principal must approve all initiatives and interventions that affect teaching and learning. When permitted by the building principal, information regarding PBIS is incorporated into an hour-long presentation at the beginning of the school year. Wonderland can benefit from adequate training through which staff can become knowledgeable of expectations for implementation fidelity (Hill & Flores, 2014; T. J. Lewis et al., 2016; Mathews et al., 2014; Tyre et al., 2018). Further, explicit teaching of key implementation features will enhance staff understanding of overall program implementation (T. J. Lewis et al., 2016; McKevitt & Braaksma, 2008).

Table 12

Findings and Recommendations

Findings	Related Recommendations
The implementation fidelity score for the PBIS program was 70%; the benchmark was 80%. The implementation features with the 3 lowest scores are Feature A: Expectations Defined (50%), Feature B: Behavioral Expectations Taught (60%), and Feature G: District-level Support (50%).	1. Provide training for PBIS implementation 2. Establish a budget for PBIS
SY 18-19 had the lowest number of discipline infractions since the inception of the PBIS program. The distribution of discipline infractions was statistically significantly different between implementation periods, $\chi^2(8) = 28.905$, $p = .001$.	3. Employ data-based decision-making and sustain PBIS implementation
Promoting positive behaviors, developing cultural competence, and practicing consistency are key aspects of PBIS program implementation. Program outcomes are impacted by staff understanding and application of implementation expectations. Staff require capacity building to improve program efficacy.	4. Provide professional development for systemic implementation of culturally responsive discipline practices

Note. PBIS = Positive Behavior Interviews and Supports

The feature implementation scores for behavioral expectations defined and taught were 50% and 60%, respectively. The lack of properly defined and taught behavioral expectations played a significant role in the PBIS program not meeting implementation fidelity (Bradshaw et al., 2015; Horner & Sugai, 2015; T. J. Lewis et al., 2016; Reinke et al., 2013). Behavioral expectations should be positively and explicitly stated to promote benevolent behaviors and mitigate confusion (Bradshaw et al., 2015; T. J. Lewis et al., 2016; Reinke et al., 2013). Additionally, behavioral expectations should be posted in 8-10 public locations (Bradshaw et al., 2015; Horner & Sugai, 2015; T. J. Lewis et al., 2016). Posted behavioral expectations can serve

as a reminder for students and aid teachers in teaching behavioral expectations. Rather than assuming students know how to display positive behaviors, educators must explicitly teach desired behaviors (Flannery et al., 2014; Horner & Sugai, 2015). Though the first two features of PBIS implementation are foundational, teachers must be knowledgeable of all features and elements of PBIS to achieve and sustain implementation fidelity (Feuerborn et al., 2015; Horner & Sugai, 2015; T. J. Lewis et al., 2016; Tyre et al., 2018). There is district-level support regarding PBIS. In the past, PBIS was a stand-alone initiative for the school district. Today, PBIS is integrated into district initiatives for climate and culture that also encompass social emotional learning and restorative practices.

Establish a Budget for PBIS

Feature G: District-level Support was the last feature evaluated in the SET. Due to the absence of a budget for the PBIS program, Wonderland could only earn 50% for Feature G. The Center on PBIS provides free training to help educators build competency regarding PBIS implementation. However, educators use allocated funds to receive extensive training and build proficiency. Funding is essential to the successful implementation of a PBIS program (Horner & Sugai, 2015; Horner et al., 2004; Ross et al., 2012). Funding is necessary for training, professional development, rewards, and incentives. School districts should bear the responsibility of providing monetary support for schools' PBIS programs (Cohen et al., 2007; J. P. Johnson, 2014; Pinkelman et al., 2015). Schools might experience difficulty sustaining program implementation without monetary support.

Employ Data-Based Decision Making and Sustain PBIS Implementation

In addition to budget allocation, data-based decision making will aid program sustainability. Program success requires the implementation of contextually appropriate,

evidence-based practices and the use of data to make decisions (Horner & Sugai, 2015; Simonson et al., 2008). Findings from discipline data supported the continuation of PBIS implementation. The distribution of discipline infractions was significantly statistically different between implementation periods. However, no implementation data were collected prior to this study. As a result, details about the features of PBIS implementation that contributed to the overall decrease discipline fractions are unknown. PBIS programs typically take between 3 and 6 years to reach full implementation and manifest ultimate outcomes (J. P. Johnson, 2014; T. J. Lewis et al., 2016). Wonderland was in its 7th year of implementation during the time this study was completed; this could serve as a justification for the difference in discipline infractions between implementation periods. Overall, there has been a positive trend in discipline data. Any sudden increase in discipline infractions could potentially be attributed to changes that Wonderland experienced in building leadership. Wonderland's leadership is directly responsible for the development of protocols designed to address and document discipline infractions.

Office discipline referrals are predictive of academic underperformance and expansion of the school-to-prison pipeline; subsequently, the reduction of discipline referrals is correlated with increased graduation rates and the development of productive citizens (Baker et al., 2001; Bohanon et al., 2009; Townsend, 2000). Consistently collecting and analyzing data to inform decisions will contribute to program sustainability and enhance program efficacy (Lane et al., 2016; Valenti & Kerr, 2014). Specifically, educators can learn to analyze data and gain insights into the overall impact PBIS has on student conduct; educators can also use data to discover antecedents and determine best practices for positive behavioral support (Horner & Sugai, 2015; Lane et al., 2016; T. J. Lewis et al., 2016).

Provide Professional Development for Systemic Implementation of Culturally Responsive Discipline Practices

In addition to implementation and outcome data, findings about the analysis of teachers' perceptions can aid in discovering best practices for positive behavioral support. The ability to promote positive behaviors and build meaningful relationships is essential to PBIS implementation. Findings from the interviews indicated teachers' approach to positive behavioral support must vary based on the identities of the students they serve. To improve PBIS implementation, staff can undergo capacity building that includes the development of cultural competency.

Teachers at Wonderland received training materials and broad directives from the PBIS team; however, the teachers did not receive explicit guidance for PBIS implementation. PBIS coaches and administrators may not know how to guide teachers effectively during program implementation. Accordingly, teachers, PBIS coaches, and administrators can benefit from professional development opportunities. Specifically, educators can benefit from professional development opportunities that aid schools in implementing culturally responsive practices systematically to enhance equitable positive behavioral support (Gorski, 2017; Leverson et al., 2016; Sugai et al., 2012).

The PBIS Cultural Responsiveness Field Guide: Resources for Trainers and Coaches defines cultural responsiveness within PBIS using five components:

1. Identity,
2. Voice,
3. Supportive Environment,

4. Situational Appropriateness,
5. Data for Equity. (Leverson et al., 2016)

The field guide is divided into two sections that detail action planning for continuous improvement. The first section emphasizes the importance of identity awareness. “Identity awareness, including that of practitioners and students, as well as how these identities affect school and classroom cultures. In addition, the section describes strategies to learn about and affirm the cultures and experiences of families, students, and communities” (Leverson et al., 2016, p. 7). The second section describes the effectuation of the Tiered Fidelity Inventory (TFI) Cultural Responsive Companion as a resource for embedding components of cultural responsiveness into the key features of PBIS. More specifically, the Cultural Responsive Companion details:

1. Team Composition,
2. Team Operating Procedures,
3. Behavioral Expectations,
4. Teaching Expectations,
5. Problem Behavior Definitions,
6. Discipline Policies,
7. Professional Development,
8. Classroom Procedures,
9. Feedback and Acknowledgement,
10. Faculty Involvement,
11. Student/Family/Community Involvement,
12. Discipline Data,

13. Data-based Decision Making,

14. Fidelity Data,

15. Annual Evaluation. (Leverson et al., 2016)

The field guide details explicit guidance to help practitioners understand and apply implementation expectations by providing scope and purpose, culturally responsive elaboration, non-examples, examples, and resources for each component.

The emphasis on equity may be new to those who have not attended to cultural responsiveness. Schools may approach PBIS with a cultural lens from the start of implementation or begin after evaluating initial implementation (Goodman-Scott, 2018; Leverson et al., 2016; Reno et al., 2017; Sugai et al., 2012). Leverson et al. (2016) suggested avoiding terms that emphasize cultural responsiveness: "We deliberately avoid the cultural responsive PBIS, or CR-PBIS, because using this term suggests that CR-PBIS is something distinct from PBIS. Instead, cultural responsiveness can and should be a core part of all PBIS implementation efforts" (p. 6). However, when equitable practices are not implemented, it can be beneficial to emphasize intentional cultural responsiveness. Further, even professional development may not be enough to guarantee the sustentation of a successful PBIS program. Teachers can benefit from administration assuming responsibility for supporting and monitoring PBIS implementation. PBIS is a school-wide initiative; therefore, instructional leaders should supervise the program accordingly. Explicitly stated, instructional leaders can use their influence on teaching and learning to promote the mandatory use of culturally responsive discipline strategies.

Culturally responsive discipline strategies should be employed to assist students who are at risk of actualizing unfavorable outcomes (Bahena et al., 2012; Bohanon et al., 2009; Bradshaw

et al., 2010; Hammond et al., 2007; Skiba et al., 2014). The behavioral and social challenges adolescents encounter can have a long-term impact on society in the form of dropout and incarceration rates (Bonilla-Silva, 2010; Flannery et al., 2014; Mallett, 2016). Juveniles in correctional facilities are disproportionately minorities of low socioeconomic status, with a history of academic underperformance and discipline infractions (Jolivette et al., 2013; Kim et al., 2010; Quinn et al., 2005). The use of culturally responsive discipline strategies has been shown to reduce both dropout and incarceration rates for African American students (Jolivette et al., 2013; Nelson et al., 2010; Quinn et al., 2005; T. M. Scott et al., 2002).

Recommendations for Future Research

This section addresses recommendations to enhance research aiming to study implementation, outcomes, and perceptions of PBIS programs. The first recommendation supplements the analysis of implementation fidelity for PBIS programs. The second recommendation mitigates study limitations of PBIS programs and increases generalizability.

Assess Quality of Plans, Goals, and Strategies Observed for PBIS Implementation

The SET is used to determine implementation fidelity of PBIS programs (Horner et al., 2009; Horner et al., 2004). Seven features of PBIS implementation are individually scored and cumulatively averaged to determine the program's implementation fidelity score. Many factors that contribute to a feature's implementation fidelity score are judged based on the observation of documented behavioral interventions (Horner et al., 2009; Sugai et al., 2001). Consequently, practitioners earn points towards program implementation fidelity by simply producing documentation of behavioral interventions (Horner et al., 2009; Mathews et al., 2014). However, the SET cannot be used to monitor or assess plans, goals, and strategies that comprise behavioral interventions (Lane et al., 2016; Valenti & Kerr, 2014). Practitioners can determine specific

areas of growth and strengthen program implementation by assessing the quality of plans, goals, and strategies designed to advance positive behavioral support (Cohen et al., 2007; Horner et al., 2014; McDaniel et al., 2014; Vincent et al., 2010).

Expand the Scope of the Study

This study evaluated a PBIS program implemented at a PK-8 Title I school with a substantial population of African American students. Equity within PBIS programs is not often studied within the parameters of this program evaluation (Bal & Trainor, 2016; Parsons, 2017; Vincent et al., 2015). Replication of this study by examining PBIS programs at multiple schools with similar populations can increase generalizability.

The rationale for this recommendation is multifaceted. African American students are subjected to exclusionary discipline practices at higher rates than other student subgroups (Bell, 2015; Hinojosa, 2008; Skiba et al., 2002). Further, African American students with low socioeconomic status are more likely to experience exclusionary discipline sanctions than students with middle or high socioeconomic status (Skiba et al., 2014; Sullivan et al., 2013). The impact of exclusionary practices that push students out of school and into the criminal justice system is widely referred to as the school-to-prison pipeline (Baker et al., 2001; Bell, 2015; Darensbourg et al., 2010; Losen & Martines, 2013; Mallett, 2016; USDOE, 2014). The successful implementation of a PBIS program can combat factors that contribute to the expansion of the school-to-prison pipeline (A. D. Johnson et al., 2018; Ryoo et al., 2018; USDOE, 2014; Vincent et al., 2015). Additionally, there is little research regarding PBIS implementation at combined schools. Results from a more expansive design of this study can affirm or refute findings from this study (Bal et al., 2016; Bal & Trainor, 2016; Reno et al., 2017; Ritter & Anderson, 2018).

Conduct Student Interviews

Teachers were interviewed to gain insight into their perceptions of the PBIS program. During the interviews, teachers presented their opinions of students' perspectives of myriad subjects. Though it was not the initial goal, interviewers can acquire an accurate synopsis of students' perspectives by interviewing students directly (Charmaz, 2006; Lub, 2015). Further, interviewers can use a semi-structured interview protocol to focus on specific subjects of interest while simultaneously providing students with the opportunity to share their experiences regarding the PBIS program (Charmaz, 2006; Given, 2008; Hinojosa, 2008; Kallio et al., 2016). Moreover, interviews can be used to capture students' perceptions of PBIS program efficacy and suggestions for improvement (Hinojosa, 2008; Kallio et al., 2016; Lub, 2015).

Summary

This study assessed implementation, outcomes, and perceived effectiveness for the PBIS program at Wonderland. Based on the data from the SET, it is recommended to provide teachers with adequate training (T. J. Lewis et al., 2016; Ross et al., 2012; Tobia, 2015). Through training, teachers will gain understanding of how to establish and teach behavioral expectations. Additionally, teachers will learn how to implement the other features of PBIS with fidelity. Another recommendation is to establish a budget for the PBIS program (Horner & Sugai, 2015; J. P. Johnson, 2014). PBIS programs require monetary support for professional development opportunities and incentives; school districts should bear the responsibility of monetary support (Cohen et al., 2007; J. P. Johnson, 2014; Pinkelman et al., 2015). Providing adequate training and establishing a program budget will lead to improved implementation fidelity (Cohen et al., 2007; J. P. Johnson, 2014; Pinkelman et al., 2015). Improved implementation fidelity can have a positive influence on program outcomes (Freeman et al., 2016; Pas et al., 2012).

PBIS program outcomes revealed statistically significant changes in discipline in fractions across implementation periods. Though discipline infractions fluctuated throughout PBIS implementation, the final year of PBIS implementation evidenced an overall decrease in discipline infractions since the inception of the PBIS program. As a result, it is recommended to employ data-based decision making and sustain PBIS implementation (Horner & Sugai, 2015; Simonson et al., 2008). Consistent analyzation of data will provide insights that could explain fluctuations in discipline infractions (Lane et al., 2016; Valenti & Kerr, 2014). Moreover, data-based decision making can improve program outcomes for the PBIS program (Horner & Sugai, 2015; Lane et al., 2016; T. J. Lewis et al., 2016).

A recommendation to improve program implementation and outcomes is to provide professional development for systemic implementation of culturally responsive discipline practices (Gorski, 2017; Leverson et al., 2016; Sugai et al., 2012). During the interviews, teachers communicated that some staff lacked understanding of PBIS implementation, and program outcomes reflected this accordingly. Upon elaboration, teachers expressed that students' identities affect the approach to PBIS implementation. Some teachers lacked the cultural competence necessary to promote program efficacy. As a result, staff need to be intentional in attending to culturally responsive practices while implementing PBIS (Leverson et al., 2016; Reno et al., 2017; Sugai et al., 2012). However, intentionality requires teachers, PBIS coaches, and administrators to participate in professional development (Leverson et al., 2016).

Researchers often conduct interviews to learn perceptions of participants (Lub, 2015). An additional recommendation is to interview students to learn their perceptions, as opposed to trusting teachers' opinion of students' perspectives to reflect students' experiences accurately (Hinojosa, 2008; Lub, 2015). A recommendation for future research is to evaluate the quality of

plans, goals, and strategies for PBIS implementation; theses data will provide more context regarding implementation fidelity (J. P. Johnson, 2014; Ryoo, 2018; Vincent et al., 2010). Another recommendation is to expand the scope of this study to increase generalizability (Bal & Trainor, 2016; Reno et al., 2017; Ritter & Anderson, 2018). Educators should effectuate the practical application of the recommendations detailed in this chapter to improve implementation, meliorate outcomes, and enhance the efficacy of Wonderland's PBIS program.

APPENDIX A

School-Wide Evaluation Tool (SET)

Overview

Purpose of the SET

The School-wide Evaluation Tool (SET) is designed to assess and evaluate the critical features of school-wide effective behavior support across each academic school year**.** The SET results are used to:

1. assess features that are in place,
2. determine annual goals for school-wide effective behavior support,
3. evaluate on-going efforts toward school-wide behavior support,
4. design and revise procedures as needed, and
5. compare efforts toward school-wide effective behavior support from year to year.

Information necessary for this assessment tool is gathered through multiple sources including review of permanent products, observations, and staff (minimum of 10) and student (minimum of 15) interviews or surveys. There are multiple steps for gathering all of the necessary information. The first step is to identify someone at the school as the contact person. This person will be asked to collect each of the available products listed below and to identify a time for the SET data collector to preview the products and set up observations and interview/survey opportunities. Once the process for collecting the necessary data is established, reviewing the data and scoring the SET averages takes two to three hours.

Products to Collect

1. _____	Discipline handbook
2. _____	School improvement plan goals
3. _____	Annual Action Plan for meeting school-wide behavior support goals
4. _____	Social skills instructional materials/ implementation time line
5. _____	Behavioral incident summaries or reports (e.g., office referrals, suspensions, expulsions)
6. _____	Office discipline referral form(s)
7. _____	Other related information

Using SET Results

The results of the SET will provide schools with a measure of the proportion of features that are 1) not targeted or started, 2) in the planning phase, and 3) in the implementation/ maintenance phases of development toward a systems approach to school-wide effective behavior support. The SET is designed to provide trend lines of improvement and sustainability over time.

School-Wide Evaluation Tool
(SET)

Implementation Guide

School _____ **Date** _____

District _____ **State** _____

Step 1: Make Initial Contact
A. Identify school contact person & give overview of SET page with the list of products needed. B. Ask when they may be able to have the products gathered. Approximate date: _____ C. Get names, phone #'s, email address & record below. Name_____ Phone_____ *Email* _____ **<u>Products to Collect</u>** 1. _____ Discipline handbook 2. _____ School improvement plan goals 3. _____ Annual Action Plan for meeting school-wide behavior support goals 4. _____ Social skills instructional materials/ implementation time line 5. _____ Behavioral incident summaries or reports (e.g., office referrals, suspensions, expulsions) 6. _____ Office discipline referral form(s) 7. _____ Other related information
Step 2: Confirm the Date to Conduct the SET
A. Confirm meeting date with the contact person for conducting an administrator interview, taking a tour of the school while conducting student & staff interviews, & for reviewing the products. Meeting date & time: _____

Step 3: Conduct the SET
A. Conduct administrator interview. B. Tour school to conduct observations of posted school rules & randomly selected staff (minimum of 10) and student (minimum of 15) interviews. C. Review products & score SET.
Step 4: Summarize and Report the Results
A. Summarize surveys & complete SET scoring. B. Update school graph. C. Meet with team to review results. Meeting date & time: _____

School-wide Evaluation Tool
(SET)
Scoring Guide

School _____ **Date** _____

District _____ **State** _____

Pre _____ **Post** _____ **SET data collector** _____

Feature	Evaluation Question	Data Source (circle sources used) P= product; I= interview; O= observation	Score: 0-2
A. Expectations Defined	1. Is there documentation that staff has agreed to 5 or fewer positively stated school rules/ behavioral expectations? (0=no; 1= too many/negatively focused; 2 = yes)	Discipline handbook, Instructional materials Other _____ **P**	
	2. Are the agreed upon rules & expectations publicly posted in 8 of 10 locations? (See interview & observation form for selection of locations). (0= 0-4; 1= 5-7; 2= 8-10)	Wall posters Other _____ **O**	
B. Behavioral Expectations Taught	1. Is there a documented system for teaching behavioral expectations to students on an annual basis? (0= no; 1 = states that teaching will occur; 2= yes)	Lesson plan books, Instructional materials Other _____ **P**	
	2. Do 90% of the staff asked state that teaching of behavioral expectations to students has occurred this year? (0= 0-50%; 1= 51-89%; 2=90%-100%)	Interviews Other _____ **I**	

Feature	Evaluation Question	Data Source (circle sources used) P= product; I= interview; O= observation	Score: 0-2
	3. Do 90% of team members asked state that the school-wide program has been taught/reviewed with staff on an annual basis? (0= 0-50%; 1= 51-89%; 2=90%-100%)	Interviews Other _____ **I**	
	4. Can at least 70% of 15 or more students state 67% of the school rules? (0= 0-50%; 1= 51-69%; 2= 70-100%)	Interviews Other _____ **I**	
	5. Can 90% or more of the staff asked list 67% of the school rules? (0= 0-50%; 1= 51-89%; 2=90%-100%)	Interviews Other _____ **I**	
C. On-going System for Rewarding Behavioral Expectations	1. Is there a documented system for rewarding student behavior? (0= no; 1= states to acknowledge, but not how; 2= yes)	Instructional materials, Lesson Plans, Interviews Other _____ **P**	
	2. Do 50% or more students asked indicate they have received a reward (other than verbal praise) for expected behaviors over the past two months? (0= 0-25%; 1= 26-49%; 2= 50-100%)	Interviews Other _____ **I**	
	3. Do 90% of staff asked indicate they have delivered a reward (other than verbal praise) to students for expected behavior over the past two months? (0= 0-50%; 1= 51-89%; 2= 90-100%)	Interviews Other _____ **I**	
D. System for Responding to Behavioral Violations	1. Is there a documented system for dealing with and reporting specific behavioral violations? (0= no; 1= states to document; but not how; 2 = yes)	Discipline handbook, Instructional materials Other _____ **P**	

Feature	Evaluation Question	Data Source (circle sources used) P= product; I= interview; O= observation	Score: 0-2
	2. Do 90% of staff asked agree with administration on what problems are office-managed and what problems are classroom–managed? (0= 0-50%; 1= 51-89%; 2= 90-100%)	Interviews Other _____ **I**	
	3. Is the documented crisis plan for responding to extreme dangerous situations readily available in 6 of 7 locations? (0= 0-3; 1= 4-5; 2= 6-7)	Walls Other _____ **O**	
	4. Do 90% of staff asked agree with administration on the procedure for handling extreme emergencies (stranger in building with a weapon)? (0= 0-50%; 1= 51-89%; 2= 90-100%)	Interviews Other _____ **I**	
E. Monitoring & Decision-Making	1. Does the discipline referral form list (a) student/grade, (b) date, (c) time, (d) referring staff, (e) problem behavior, (f) location, (g) persons involved, (h) probable motivation, & (i) administrative decision? (0=0-3 items; 1= 4-6 items; 2= 7-9 items)	Referral form (circle items present on the referral form) **P**	
	2. Can the administrator clearly define a system for collecting & summarizing discipline referrals (computer software, data entry time)? (0=no; 1= referrals are collected; 2= yes)	Interview Other _____ **I**	
	3. Does the administrator report that the team provides discipline data summary reports to the staff at least three times/year? (0= no; 1= 1-2 times/yr.; 2= 3 or more times/yr)	Interview Other _____ **I**	

Feature	Evaluation Question	Data Source (circle sources used) P= product; I= interview; O= observation	Score: 0-2
	4. Do 90% of team members asked report that discipline data is used for making decisions in designing, implementing, and revising school-wide effective behavior support efforts? (0= 0-50%; 1= 51-89%; 2= 90-100%)	Interviews Other _____ **I**	
F. Management	1. Does the school improvement plan list improving behavior support systems as one of the top 3 school improvement plan goals? (0= no; 1= 4th or lower priority; 2 = 1st- 3rd priority)	School Improvement Plan, **P** Interview **I** Other _____	
	2. Can 90% of staff asked report that there is a school-wide team established to address behavior support systems in the school? (0= 0-50%; 1= 51-89%; 2= 90-100%)	Interviews Other _____ **I**	
	3. Does the administrator report that team membership includes representation of all staff? (0= no; 2= yes)	Interview Other _____ **I**	
	4. Can 90% of team members asked identify the team leader? (0= 0-50%; 1= 51-89%; 2= 90-100%)	Interviews Other _____ **I**	
	5. Is the administrator an active member of the school-wide behavior support team? (0= no; 1= yes, but not consistently; 2 = yes)	Interview Other _____ **I**	
	6. Does the administrator report that team meetings occur at least monthly? (0=no team meeting; 1=less often than monthly; 2= at least monthly)	Interview Other _____ **I**	

Feature	Evaluation Question	Data Source (circle sources used) P= product; I= interview; O= observation	Score: 0-2
	7. Does the administrator report that the team reports progress to the staff at least four times per year? (0=no; 1= less than 4 times per year; 2= yes)	Interview Other _____ **I**	
	8. Does the team have an action plan with specific goals that is less than one year old? (0=no; 2=yes)	Annual Plan, calendar Other _____ **P**	
G. District-Level Support	1. Does the school budget contain an allocated amount of money for building and maintaining school-wide behavioral support? (0= no; 2= yes)	Interview Other _____ **I**	
	2. Can the administrator identify an out-of-school liaison in the district or state? (0= no; 2=yes)	Interview Other _____ **I**	

Summary Scores:					
	A = /4	B = /10	C = /6	D = /8	E = /8
	F = /16	G = /4	Mean = /7		

Administrator Interview Guide

Let's talk about your discipline system

1) Do you collect and summarize office discipline referral information? Yes No If no, skip to #4.
2) What system do you use for collecting and summarizing office discipline referrals? (E2)
   a) What data do you collect? _____
   b) Who collects and enters the data? _____
3) What do you do with the office discipline referral information? (E3)
   a) Who looks at the data? _____
   b) How often do you share it with other staff? _____
4) What type of problems do you expect teachers to refer to the office rather than handling in the classroom/ specific setting? (D2)
5) What is the procedure for handling extreme emergencies in the building (i.e. stranger with a gun)? (D4)

Let's talk about your school rules or motto

6) Do you have school rules or a motto? Yes No If no, skip to # 10.
7) How many are there? _____
8) What are the rules/motto? (B4, B5)
9) What are they called? (B4, B5)
10) Do you acknowledge students for doing well socially? Yes No If no, skip to # 12.
11) What are the social acknowledgements/ activities/ routines called (student of month, positive referral, letter home, stickers, high 5's)? (C2, C3)

Do you have a team that addresses school-wide discipline? If no, skip to # 19

12) Has the team taught/reviewed the school-wide program with staff this year? (B3) Yes No
13) Is your school-wide team representative of your school staff? (F3) Yes No
14) Are you on the team? (F5) Yes No
15) How often does the team meet? (F6) _____
16) Do you attend team meetings consistently? (F5) Yes No
17) Who is your team leader/facilitator? (F4) _____
18) Does the team provide updates to faculty on activities & data summaries? (E3, F7) Yes No
    If yes, how often? _____
19) Do you have an out-of-school liaison in the state or district to support you on positive behavior support systems development? (G2) Yes No
    If yes, who? _____
20) What are your top 3 school improvement goals? (F1)
    Does the school budget contain an allocated amount of money for building and maintaining school-wide behavioral support? (G1) Yes No

Additional Interviews

In addition to the administrator interview questions there are questions for Behavior Support Team members, staff and students. ***Interviews can be completed during the school tour.*** Randomly select students and staff as you walk through the school. Use this page as a reference for all other interview questions. Use the interview and observation form to record student, staff, and team member responses.

Staff Interview Questions
Interview a minimum of 10 staff

1) What are the _____ (school rules, high 5's, 3 bee's)? (B5)
(Define what the acronym means)

2) Have you taught the school rules/behavioral expectations this year? (B2)

3) Have you given out any _____ since _____? (C3)
(rewards for appropriate behavior) (2 months ago)

4) What types of student problems do you or would you refer to the office? (D2)

5) What is the procedure for dealing with a stranger with a gun? (D4)

6) Is there a school-wide team that addresses behavioral support in your building?

7) Are you on the team?

Team Member Interview Questions

1) Does your team use discipline data to make decisions? (E4)

2) Has your team taught/reviewed the school-wide program with staff this year? (B3)

3) Who is the team leader/facilitator? (F4)

Student interview Questions
Interview a minimum of 15 students

1) What are the _____ (school rules, high 5's, 3 bee's)? (B4)
(Define what the acronym means.)

2) Have you received a _____ since _____? (C2)
(reward for appropriate behavior) (2 months ago)

Interview and Observation Form

	Staff questions (Interview a minimum of 10 staff members)							Team member questions			Student questions	
	What are the school rules? Record the # of rules known.	*Have you taught the school rules/ behave. exp. to students this year?*	*Have you given out any _____ since _____? (2 mos.)*	*What types of student problems do you or would you refer to the office?*	*What is the procedure for dealing with a stranger with a gun?*	*Is there a team in your school to address school-wide behavior support systems?*	*Are you on the team? If yes, ask team questions*	*Does your team use discipline data to make decisions?*	*Has your team taught/ reviewed SW program w/staff this year?*	*Who is the team leader/ facilitator?*	*What are the (school rules)?* Record the # of rules known	*Have you received a _____ since _____?*
1		Y N	Y N			Y N	Y N	Y N	Y N		1	Y N
2		Y N	Y N			Y N	Y N	Y N	Y N		2	Y N
3		Y N	Y N			Y N	Y N	Y N	Y N		3	Y N
4		Y N	Y N			Y N	Y N	Y N	Y N		4	Y N
5		Y N	Y N			Y N	Y N	Y N	Y N		5	Y N
6		Y N	Y N			Y N	Y N	Y N	Y N		6	Y N
7		Y N	Y N			Y N	Y N	Y N	Y N		7	Y N
8		Y N	Y N			Y N	Y N	Y N	Y N		8	Y N
9		Y N	Y N			Y N	Y N	Y N	Y N		9	Y N
10		Y N	Y N			Y N	Y N	Y N	Y N		10	Y N
11		Y N	Y N			Y N	Y N	Y N	Y N		11	Y N
12		Y N	Y N			Y N	Y N	Y N	Y N		12	Y N
13		Y N	Y N			Y N	Y N	Y N	Y N		13	Y N
14		Y N	Y N			Y N	Y N	Y N	Y N		14	Y N
15		Y N	Y N			Y N	Y N	Y N	Y N		15	Y N
Total							X				Total	

Location	Front hall/ office	Class 1	Class 2	Class 3	Cafeteria	Library	Other setting (gym, lab)	Hall 1	Hall 2	Hall 3
Are rules & expectations posted?	Y N	Y N	Y N	Y N	Y N	Y N	Y N	Y N	Y N	Y N
Is the documented crisis plan readily available?	Y N	Y N	Y N	Y N	Y N	Y N	Y N	X	X	X

APPENDIX B

Interview Protocol

Good morning/afternoon,

My name is Brady Payne and I am a current doctoral candidate in the Educational Policy, Planning, and Leadership program at The College of William and Mary. I appreciate your participation in my study regarding the outcomes of the PBIS program. The purpose of this study is to investigate the to determine the implementation, outcomes, and recommendations for a PBIS program implemented in a single Title I school, with a substantial population of African American students living in poverty. Results will contribute to the overall improvement of the PBIS program at the school level, and the dissertation itself will contribute to a growing body of research on the topic of PBIS programs.

My goal for this interview is to come to understand your experiences with, perspectives on, and recommendations for the PBIS program. Your feedback will not be judged nor will I be forming an opinion. My interest is learning about the experiences and perception of teachers and school administrators. Your responses will be added to the responses of other interviewees. I will ask questions about particular details of your experiences; however, you responses will remain anonymous.

I do not anticipate our interview taking more than 30 minutes of your time. Also, I will be recording our discussion; this will ensure I capture your full responses to respective interview questions. The recording will only be used as a means for me to transcribe our conversation so that I can then analyze the responses from all of the interviewees; again, your responses will remain anonymous. Additionally, any identifying information provided will not be reported. Your participation is completely voluntary and you have the ability to discontinue the interview at any time. May I have your permission to begin recording this interview?

Turn on audio recorder.

This discussion will focus on your experiences implementing the PBIS program. Specifically, you will be asked questions regarding implementation, program outcomes, and recommendations for improvement.

(Note to interviewer: Re-phrase questions and/or ask probing questions as appropriate in order to prompt additional detail from interviewees if they seem to be unclear about a question.)

Program Implementation

1. How do you implement PBIS in your classroom?

2. What are some challenges you've experienced while implementing PBIS?

Program Outcomes

3. In your opinion, what are benefits of the PBIS program?

4. In your opinion, what are deficits of the PBIS program?

5. In your opinion, what impact does PBIS have on discipline infractions?

Recommendations

1. In your opinion, what steps should be taken to improve the PBIS program?

2. Is there any other information/feedback/insight you'd like to share?

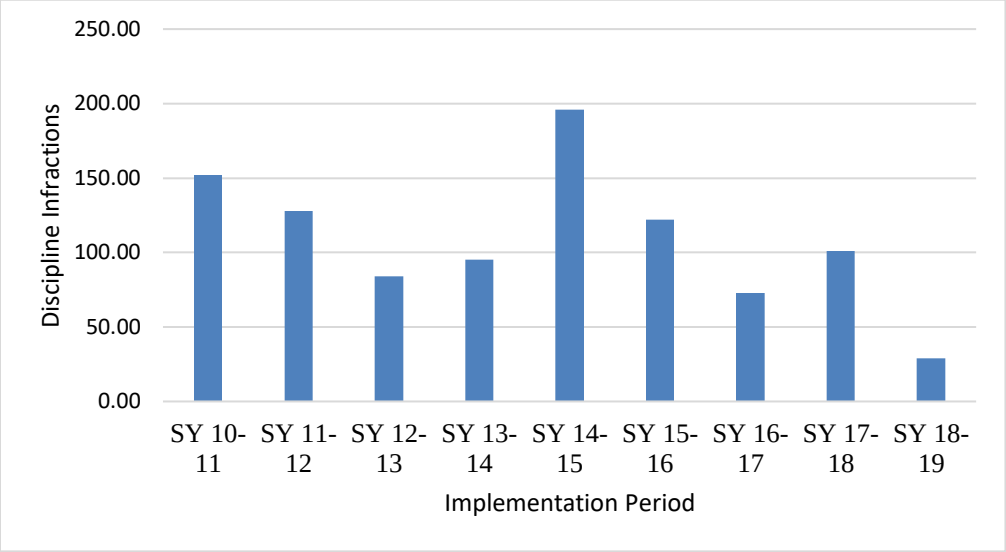
Thank you for taking the time to provide me with feedback for my study. I will provide you with a copy of the transcription, as soon as possible. Please review the transcription for accuracy and provide any feedback you deem necessary. If you have any additional information you feel will enhance my study, please let me know. Thanks again!

APPENDIX C

Discipline Infractions by Implementation Period

Figure C1

Discipline Infractions by Implementation Period



Note. Discipline Infractions by Implementation Period provides a visual of the documented discipline infractions for each period of PBIS implementation.

REFERENCES

Adelman, H. S., & Taylor, L. (2006). *Mental health in schools: Moving in new directions.* Corwin.

Anyon, Y., Lechuga, C., Ortega, D., Downing, B., Greer, E., & Simmons, J. (2017). An exploration of the relationships between student racial background and the school sub-contexts of office discipline referrals: A critical race theory analysis. *Race Ethnicity and Education, 21*(3), 390-406. https://doi.org/10.1080/13613324.2017.1328594

Bahena, S., Cooc, N., Currie-Riben, R., Kettner, P., & Ng, M. (2012). *Disrupting the school-to-prison pipeline.* Harvard Educational Review.

Baker, J. A., Derrer, R. D., Davis, S. M., Dinklage-Travis, H. E., Linder, D. S., & Nicholson, M.D. (2001). The flip side of the coin: Understanding the school's contribution to dropout and completion. *School Psychology Quarterly, 16*(4), 406-426. https://doi.org/10.1521/scpq.16.4.406.19901

Bal, A., Schrader, E. M., Afacan, K., & Mawene, D. (2016). Using learning labs for culturally responsive positive behavioral interventions and supports. *Intervention in School and Clinic, 52*(2), 122-128. https://doi.org/10.1177/1053451216636057

Bal, A., & Trainor, A. A. (2016). Culturally responsive experimental intervention studies. *Review of Educational Research, 86*(2), 319-359. https://doi.org/10.3102/0034654315585004

Banks, J. A. (2004). Teaching for social justice, diversity, and citizenship in a global world. *The Educational Forum, 68*(4), 296-305. https://doi.org/10.1080/00131720408984645

Bear, G. G. (2013). Teacher resistance to frequent rewards and praise: Lack of skill or a wise decision? *Journal of Educational and Psychological Consultation*, *23*(4), 318-340. https://doi.org/10.1080/10474412.2013.845495

Bear, G. G., Yang, C., Mantz, L. S., & Harris, A. B. (2017). School-wide practices associated with school climate in elementary, middle, and high schools. *Teaching and Teacher Education, 63*(2017), 372-383. https://doi.org/10.1016/j.tate.2017.01.012

Beattie v. Board of Education, City of Antigo, 169 Wis. 231 (1919).

Bell, C. (2015). The hidden side of zero-tolerance policies: The African American perspective. *Sociology Compass, 9*(1), 14-22. doi:10.1111/soc4.12230

Benner, G. J., Kutash, K., Nelson, J. R., & Fisher, M. B. (2013). Closing the achievement gap of youth with emotional and behavioral disorders through multi-tiered systems of support. *Education and Treatment of Children, 36*(3), 15-29. https://doi.org/10.1353/etc.2013.0018

Bennett, L. (2022, December 18). Family factors that influence students' behavior in school. *Hello Motherhood.* https://www.livestrong.com/article/562595-family-factors-that-influence-students-behavior-in-school/

Berkowitz, M. W., Battistich, V. A., & Bier, M. C. (2008). What works in character education: What is known and what needs to be known. In L. Nucci & D. Narvaez (Eds.), *Handbook of moral and character education* (pp. 414-431). Routledge.

Bohanon, H., Flannery, K. B., Molloy, J., & Fenning, P. (2009). Utilizing positive behavior supports in high school settings to improve school completion rates for students with high incidence conditions. *Exceptionality, 17*, 30-44. https://doi.org/10.1080/09362 8302590193

Bohanon, H., & Wu, M. J. (2014). Developing buy-in for positive behavior support in secondary settings. *Preventing School Failure: Alternative Education for Children and Youth, 58*(4), 223-229. https://doi.org/10.1080/1045988X.2013.798774

Bonilla-Silva, E. (2010). *Racism without racists: Color-blind racism and the persistence of racial inequality in the United States*. Rowman & Littlefield.

Bosworth, K., & Judkins, M. (2014). Tapping into the power of school climate to prevent bullying: One application of schoolwide positive behavior interventions and supports. *Theory Into Practice, 53*(4), 300-307. https://doi.org/10.1080/00405841.2014.947224

Bradshaw, C. P., Mitchell, M. M., & Leaf, P. J. (2010). Examining the effects of schoolwide positive behavioral interventions and supports on student outcomes: Results from a randomized controlled effectiveness trial in elementary schools. *Journal of Positive Behavior Interventions, 12*(3), 133-148. https://doi.org/10.1177/1098300709334798

Bradshaw, C. P., Pas, E. T., Debnam, K. J., & Lindstrom Johnson, S. (2015). A focus on implementation of Positive Behavioral Interventions and Supports (PBIS) in high schools: Associations with bullying and other indicators of school disorder. *School Psychology Review, 44*(4), 480-498. https://doi.org/10.17105/spr-15-0105.1

Bradshaw, C. P., Waasdorp, T. E., Debnam, K. J., & Johnson, S. L. (2014). Measuring school climate in high schools: A focus on safety, engagement, and the environment. *Journal of School Health, 84*(9), 593-604. https://doi.org/10.1111/josh.12186

Braun, V., & Clarke, V. (2006). Using thematic analysis in psychology. *Qualitative Research in Psychology, 3*, 77-101. https://doi.org/10.1191/1478088706qp063oa

Brown v. Board of Education of Topeka, Kansas, 347 U.S. 483 (1954).

Bruhn, A. L., Hirsch, S. E., Gorsh, J., & Hannan, C. (2014). Simple strategies for reflecting on and responding to common criticisms of PBIS. *Journal of Special Education Leadership, 27*(1), 13-25.

Charmaz, K. (2006). *Constructing grounded theory: A practical guide through qualitative analysis.* Sage.

Childs, K. E., Kincaid, D., George, H. P., & Gage, N. A. (2016). The relationship between school-wide implementation of positive behavior intervention and supports and student discipline outcomes. *Journal of Positive Behavior Interventions, 18*(2), 89-99. https://doi.org/10.1177/1098300715590398

Choong-Geun, C., Horner, R., May, L., Rausch, M., Skiba, J., & Tobin, T. (2011). Race is not neutral: A national investigation of African American and Latino disproportionality in school discipline. National Association of School Psychologists. http://www.nasponline.org/publications/ periodicals/spr/volume-40/volume-40-issue-1/race-is-not-neutral-a-national-investigation-of-african-american-and-latino-disproportionality-in-school-discipline

Christle, C., Nelson, C. M., & Jolivette, K. (2004). School characteristics related to the use of suspension. *Education and Treatment of Children, 27*(4), 509-526. https://www.jstor.org/stable/42899820

Cohen, R., Kincaid, D., & Childs, K. E. (2007). Measuring schoolwide positive behavior support implementation development and validation of the benchmarks of quality. *Journal of Positive Behavior Interventions, 9*, 203-213. https://doi.org/10.1177/10983007070090040301

Cornell, D., Sheras, P., Gregory, A., & Fan, X. (2009). A retrospective study of school safety conditions in high schools using the Virginia threat assessment guidelines versus alternative approaches. *School Psychology Quarterly, 24*(2), 119-129. https://doi/org/10.1037/a0016182

Cregor, M., & Hewitt, D. (2011). Dismantling the school-to-prison pipeline: A survey from the field. *Poverty and Race, 20*, 5-7. https://doi.org/10.1093/cs/cdaa016

Creswell, J. W. (2014). *Research design: Qualitative, quantitative, and mixed methods approaches*. Sage.

Darensbourg, A., Perez, E., & Blake, J. (2010). Overrepresentation of African American males in exclusionary discipline: The role of school-based mental health professionals in dismantling the school to prison pipeline. *Journal of African American Males in Education, 1*(3), 196-211.

Darling-Hammond, L. (2010). *The flat world and education: How America's commitment to equity will determine our future*. Teachers College Press.

Darling-Hammond, L., Ross, P., & Milliken, M. (2006). High school size, organization, and content: What matters for student success? *Brookings Papers on Education Policy, 2006/2007*, 163-203. https://doi.org/10.1353/pep.2007.0001

Djabrayan, J., D'Incau, B. J., Barnett, D., Lombardo, M., & Holmblad, H. (2014). *School-wide positive behavior intervention and support (PBIS): A multi-tiered system of supports (MTSS) for student wellness*. CASP Position Paper. California Association of School Psychologists. http://www.casponline.org/pdfs/position-papers/7%20CASP%20PBIS%20Position%20Paper-Final-2.pdf

Dover, A. G. (2009). Teaching for social justice and K-12 student outcomes: A conceptual framework and research review. *Equity and Excellence in Education, 42*(4), 506-524. https://doi.org/10.1080/10665680903196339

Dunn, O. J. (1964). Multiple comparisons using rank sums. *Technometrics, 6,* 241-252. https://doi.org/10.1080/00401706.1964.10490181

Eber, L., Upreti, G., & Rose, J. (2010). Addressing ethnic disproportionality in school discipline through positive behavior interventions and supports (PBIS). *Illinois Principals Association: Building Leadership, 17*(8), 1-12.

Educational and Community Supports. (2020). *PBIS assessment surveys*. https://www.pbisapps.org/Applications/Pages/PBIS-Assessment-Surveys.aspx#boq

Evanovich, L. L., & Scott, T. M. (2016). Facilitating PBIS implementation: An administrator's guide to presenting the logic and steps to faculty and staff. *Beyond Behavior, 25*(1), 4-8. https://doi.org/10.1177/107429561602500102

Fallon, L. M., McCarthy, S. R., & Sanetti, L. H. (2014). School-wide positive behavior support (SWPBS) in the classroom: Assessing perceived challenges to consistent implementation in Connecticut schools. *Education and Treatment of Children, 37,* 1-24. https://www.jstor.org/stable/44820715

Fallon, L. M., & Mueller, M. R. (2017). Culturally responsive wraparound supports: Collaborating with families to promote students' behavior regulation across settings. *Contemporary School Psychology, 21*(3), 201-210. https://doi.org/10.1007/s40688-016-0116-8

Faraway, J. J. (2015). *Linear models with R* (2nd ed.). CRC Press.

Farkas, M. S., Simonsen, B., Migdole, S., Donovan, M. E., Clemens, K., & Cicchese, V. (2012). School-wide positive behavior support in an alternative school setting. *Journal of Emotional and Behavioral Disorders, 20*(4), 275-288. https://doi.org/10.1177/10634266 10389615

Fasching-Varner, K. J., Mitchell, R. W., Martin, L. L., & Bennett-Haron, K. P. (2014). Beyond school-to-prison pipeline and toward an educational and penal realism. *Equity and Excellence in Education, 47*(4), 410-429. https://doi.org/10.1080/ 10665684.2014.959285

Feuerborn, L. L., Tyre, A. D., & King, J. P. (2015). The staff perceptions of behavior and discipline survey: A tool to help achieve systemic change through schoolwide positive behavior support. *Journal of Positive Behavior Interventions, 17*(2), 116-126. https://doi.org/10.1177/1098300714556675

Filter, K. J., Sytsma, M. R., & McIntosh, K. (2016). A brief measure of staff commitment to implement school-wide positive behavioral interventions and supports. *Assessment for Effective Intervention, 42*(1), 18-31. https://doi.org/10.1177/15345084 16642212

Flannery, K. B., Fenning, P., Kato, M. M., & McIntosh, K. (2014). Effects of school-wide positive behavioral interventions and supports and fidelity of implementation on problem behavior in high schools. *School Psychology Quarterly, 29*(2), 111-124. https://doi.org/10.1037/spq0000039

Freeman, J., Simonsen, B., McCoach, D. B., Sugai, G., Lombardi, A., & Horner, R. (2016). Relationship between school-wide positive behavior interventions and supports and academic, attendance, and behavior outcomes in high schools. *Journal of Positive Behavior Interventions, 18*(1), 41-51. https://doi.org/10.1177/1098300715580992

Frey, B. B. (2018). *The Sage encyclopedia of educational research, measurement, and evaluation*. Sage.

Gagnon, J. C., Rockwell, S., & Scott, T. M. (2008). Positive behavior supports in exclusionary schools: A practical approach based on what we know. *Focus on Exceptional Children, 41*(1), 1-20. https://doi.org/10.17161/foec.v41i1.6834

Garibaldi, A. M. (2014). The expanding gender and racial gap in American higher education. *Journal of Negro Education, 83*(3), 371-384. https://doi.org/10.7709/jnegroeducation.83.3.0371

Ghosh, D., & Vogt, A. (2012). Outliers: An evaluation of methodologies. *Proceedings of the Joint Statistical Meetings*, 3455-3460. https://www.semanticscholar.org/

Gilligan, C., Spencer, R., Weinberg, M. K., & Bertsch, T. (2003). On the listening guide: A voice-centered relational method. In P. M. Camic, J. E. Rhodes, & L. Yardley (Eds.), *Qualitative research in psychology: Expanding perspectives in methodology and design* (pp. 157-172). American Psychological Association.

Given, L. M. (2008). *The Sage encyclopedia of qualitative research methods*. Sage.

Goodman-Scott, E., Hays, D. G., & Cholewa, B. E. (2018). "It takes a village": A case study of positive behavioral interventions and supports implementation in an exemplary urban middle school. *The Urban Review, 50*(1), 97-122. https://doi.org/10.1007/s11256-017-0431-z

Gorski, P. C. (2017). *Reaching and teaching students in poverty: Strategies for erasing the opportunity gap*. Teachers College Press.

Gray, A. M., Sirinides, P. M., Fink, R., Flack, A., DuBois, T., Morrison, K., & Hill, K. (2017). *Discipline in context: Suspension, climate, and PBIS in the school district of Philadelphia*

(CPRE Research Report). Consortium for Policy Research in Education. https://repository.upenn.edu/cpre_research reports/106

Gregory, A., & Roberts, G. (2017). Teacher beliefs and the overrepresentation of Black students in classroom discipline. *Theory Into Practice, 56*(3), 187-194. https://doi.org/10.1080/00405841.2017.1336035

Hammond, C., Linton, D., Smink, J., & Drew, S. (2007). *Dropout risk factors and exemplary programs* [Technical report]. National Dropout Prevention Center. http://dropoutprevention.org/resources/major-research-reports/dropout-risk-factors-and-exemplary-programs-a-technical-report/

Heitzeg, N. A. (2009). Education or incarceration: Zero tolerance policies and the school to prison pipeline. *Forum on Public Policy Online, 2009*(2). https://eric.ed.gov/?id=EJ870076

Hill, D. A., & Flores, M. M. (2014). Modeling positive behavior interventions and supports for preservice teachers. *Journal of Positive Behavior Interventions, 16*(2), 93-101. https://doi.org/10.1177/1098300713478665

Hinojosa, M. S. (2008). Black-White differences in school suspension: Effect of student beliefs about teachers. *Sociological Spectrum, 28*(2), 175-193. https://doi.org/10.1080/02732170701796429

Hinton, V., & Buchanan, A. M. (2015). Physical activity: Positive behavior interventions and support in a physical activity summer camp. *The Physical Educator, 72*, 660-676.

Horner, R. H., & Sugai, G. (2015). School-wide PBIS: An example of applied behavior analysis implemented at a scale of social importance. *Behavior Analysis in Practice, 8*(1), 80-85. https://doi.org/10.1007/s40617-015-0045-4

Horner, R. H., Kincaid, D., Sugai, G., Lewis, T., Eber, L., Barrett, S., ... & Algozzine, B. (2014). Scaling up school-wide positive behavioral interventions and supports: Experiences of seven states with documented success. *Journal of Positive Behavior Interventions, 16*(4), 197-208. https://doi.org/10.1177/1098300 713503685

Horner, R. H., Sugai, G., & Lewis, T. (2015, April). *Is school-wide positive behavior support an evidence-based practice?* Evaluation Brief. Positive Behavior Interventions and Supports. https://www.pbis.org/resource/is-school-wide-positive-behavior-support-an-evidence-based-practice

Horner, R. H., Sugai, G., Smolkowski, K., Eber, L., Nakasato, J., Todd, A., & Esperanza, J. (2009). A randomized, wait-list controlled effectiveness trial assessing school-wide positive behavior support in elementary schools. *Journal of Positive Behavior Interventions, 11,* 133-145. https://doi.org/10.1177/1098300709332067

Horner, R. H., Todd, A. W., Lewis-Palmer, T., Irvin, L. K., Sugai, G., & Boland, J. B. (2004). The School-Wide Evaluation Tool (SET). *Journal of Positive Behavior Interventions, 6*(1), 3-12. https://doi.org/10.1177/10983007040060010201

Howard, T. C., & Navarro, O. (2016). Critical race theory 20 years later: Where do we go from here? *Urban Education, 51*(3), 253-273. https://doi.org/10.1177/0042085 915622541

Irvin, L. K., Tobin, T. J., Sprague, J. R., Sugai, G., & Vincent, C. G. (2004). Validity of office discipline referral measures as indices of school-wide behavioral status and effects of school-wide behavioral interventions. *Journal of Positive Behavior Interventions, 6*(3), 131-147. https://doi.org/10.1177/10983007040060030201

Johnson, A. D., Anhalt, K., & Cowan, R. J. (2018). Culturally responsive school-wide positive behavior interventions and supports: A practical approach to addressing disciplinary

disproportionality with African-American students. *Multicultural Learning and Teaching, 13*(2). https://doi.org/10.1515/mlt-2017-0013

Johnson, J. P. (2014). *Sustaining positive behavior intervention and support (PBIS)*. [Doctoral dissertation, Western Carolina University). https://libres.uncg.edu/ir/wcu/f/Johnson2014.pdf

Jolivette, K., Swoszowski, N. C., & Ennis, R. P. (2013). PBIS as prevention for high-risk youth in alternative education, residential, and juvenile justice settings. *Education and Treatment of Children, 36*(3), 1-2. https://doi.org/10.1353/etc.2013.0027

Jones, S. R., Torres, V., & Arminio, J. (2014). *Negotiating the complexities of qualitative research in higher education: Fundamental elements and issues* (2nd ed.). Routledge.

Kallio, H., Pietila, A. M., Johnson, M., & Kangasniemi, M. (2016). Systematic methodological review: Developing a framework for a qualitative semi-structured interview guide. *Journal of Advanced Nursing, 72*(12), 2954-2965. https://doi.org/10.1111/jan.1303

Kantor, H. (1991). Education, social reform, and the state: ESEA and federal education policy in the 1960s. *American Journal of Education, 100*(1), 47-83. https://doi.org/10.1086/444004

Kim, C. Y., Losen D. J., & Hewitt D. T. (2010) *The school-to-prison pipeline: Structuring legal reform.* New York University Press.

Klein, A. (2015, April 1). K-12 law's legacy blend of idealism, policy tensions. *Education Week, 34*(26), 1–21. https://www.edweek.org

Kraft, M. A., Papay, J. P., Charner-Laird, M., Johnson, S. M., Ng, M., & Reinhorn, S. K. (2012). *Committed to their students but in need of support: How school context influences teacher turnover in high-poverty urban schools.* (Working paper). Project on the Next Generation of Teachers, Harvard Graduate School of Education.

Kurth, J. A., & Enyart, M. (2016). Schoolwide positive behavior supports and students with significant disabilities: Where are we? *Research and Practice for Persons with Severe Disabilities, 41*(3), 216-222. https://doi.org/10.1177/1540796916633083

Lane, K. L., & Oakes, W. P. (2015). *Supporting behavior for school success: A step-by-step guide to key strategies*. Guilford.

Lane, K. L., Oakes, W. P., Cantwell, E. D., Schatschneider, C., Menzies, H., Crittenden, M., & Messenger, M. (2016). Student risk screening scale for internalizing and externalizing behaviors: Preliminary cut scores to support data-informed decision making in middle and high schools. *Behavioral Disorders, 42*(1), 271-284. https://doi.org/10.17988/BD-16-115.1

Lawson, M. A., & Lawson, H. A. (2013). New conceptual frameworks for student engagement research, policy, and practice. *Review of Educational Research, 83*(3), 432-479. https://doi.org/10.3102/0034654313480891

Leedy, P. D., & Ormrod, J. E. (2016). *Practical research: Planning and design* (11th ed.). Pearson.

Leverson, M., Smith, K., McIntosh, K., Rose, J., & Pinkelman, S. (2016). *PBIS cultural responsiveness field guide: Resources for trainers and coaches*. http://www.pbiscaltac.org/resources/culturally%20responsive/PBIS%20Cultural%

Lewis, S. R., & Pope, M. L. (2018). Someone like me: The impact of African American male instructors on African American male student success. In U. Thomas (Ed.), *Advocacy in academia and the role of teacher preparation programs* (pp. 239-254). IGI Global.

Lewis, T. J., Barrett, S., Sugai, G., Horner, R. H., Mitchell, B. S., & Starkey, D. (2016). *Training and professional development blueprint for positive behavioral interventions and*

supports. National Technical Assistance Center on Positive Behavior Interventions and Support.

Losen, D. J. (2012). Sound discipline policy for successful schools: How redressing racial disparities can make a positive impact for all. In S. Bahena, N. Cooc, R. Currie-Riben, P. Kettner, & M. Ng (Eds.), *Disrupting the school-to-prison pipeline* (pp. 45-72). Harvard Educational Review.

Losen, D. J., & Martinez, T. E. (2013). Out of school and off track: The overuse of suspensions in American middle and high schools. http://files.eric.ed.gov/fulltext/ED541735.pdf

Lub, V. (2015). Validity in qualitative evaluation: Linking purposes, paradigms, and perspectives. *International Journal of Qualitative Methods, 14*(5), 1-8. https://doi.org/10.1177/1609406915621406

Martin, A. J., & Steinbeck, K. (2017). The role of puberty in students' academic motivation and achievement. *Learning and Individual Differences, 53,* 37-46. https://doi.org/10.1016/j.lindif.2016.11.003

Madigan, K., Cross, R. W., Smolkowski, K., & Strycker, L. A. (2016). Association between schoolwide positive behavioural interventions and supports and academic achievement: A 9-year evaluation. *Educational Research and Evaluation, 22*(7-8), 402-421. https://doi.org/10.1080/13803611.2016.1256783

Mallett, C. A. (2016). *The school-to-prison pipeline: A comprehensive assessment*. Springer

Mathews, S., McIntosh, K., Frank, J. L., & May, S. L. (2014). Critical features predicting sustained implementation of school-wide positive behavioral interventions and supports. *Journal of Positive Behavior Interventions, 16*(3), 168-178. https://doi.org/10.1177/1098300713484065

Mathur, S., & Nelson, C. (2013). PBIS as prevention for high-risk youth in restrictive settings: Where do we go from here? *Education and Treatment of Children, 36*(3), 175-181. www.jstor.org/stable/42900219

McDaniel, S. C., Jolivette, K., & Ennis, R. P. (2014). Barriers and facilitators to integrating SWPBIS in alternative education settings with existing behavior management systems. *Journal of Disability Policy Studies, 24*(4), 247-256. https://doi.org/10.1177/ 1044207312465471

McIntosh, K., & Goodman, S. (2016). *Integrated multi-tiered systems of support: Blending RTI and PBIS.* Guilford.

McIntosh, K., Predy, L. K., Upreti, G., Hume, A. E., Turri, M. G., & Mathews, S. (2014). Perceptions of contextual features related to implementation and sustainability of school-wide positive behavior support. *Journal of Positive Behavior Interventions, 16,* 31-43. https://doi.org/10.1177/1098300712470723

McKenzie, K. B., & Scheurich, J. J. (2004). Equity traps: A useful construct for preparing principals to lead schools that are successful with racially diverse students. *Educational Administration Quarterly, 40*(5), 601-632. https://doi.org/10.1177/ 0013161X04268839

McKevitt, B. C., & Braaksma, A. D. (2008). Best practices in developing a positive behavior support system at the school level. In P. Harrison & A. Thomas (Eds.), *Best practices in school psychology* (5th ed., Vol. 3, pp. 735-747). https://www.esboces.org/cms/ lib07/NY01914091/Centricity/Domain/64/Best%20Practice%20in%20Developing%20PBIS%20-%20Article.pdf

McPhee, K. M., & Givhan, K. (2016). *PBIS teams perceived connections between culture and PBIS implementation.* Paper presented at Georgia Association for Positive Behavior Support Conference. https://digitalcommons. georgiasouthern.edu/gapbs/2016/2016/25/

Mendez, L. M. R., Knoff, H. M., & Ferron, J. M. (2002). School demographic variables and out-of-school suspension rates: A quantitative and qualitative analysis of a large, ethnically diverse school district. *Psychology in the School, 39*(3), 259-277. https://doi.org/10.1002/pits.10020

Meng, P. M., McIntosh, K., Claassen, J., & Hoselton, R. (2016). *Does implementation of SWPBIS enhance sustainability of specific programs, such as Playworks?* Evaluation Brief. Positive Behavior Interventions and Supports. https://www.pbis.org/resource/does-implementation-of-swpbis-enhance-sustainability-of-specific-programs-such-as-playworks

Mertens, D. M., & Wilson, A. T. (2012). *Program evaluation theory and practice: A comprehensive guide.* Guilford.

Messick, S. (1986). The once and future issues of validity: Assessing the meaning and consequences of measurement. *ETS Research Report Series, 1986*(2), 1-24. https://doi.org/10.1002/j.2330-8516.1986.tb00185.x

Miller, C. A. (2016). *The effect of the Leader in Me, a School-Wide Positive Behavior Intervention System (SW-PBIS), based on student achievement and office discipline referrals for fifth grade students in a rural elementary school in North Central Washington State.* [Master of Education Degree, Heritage University.] https://files.eric.ed.gov/fulltext/ED565636.pdf

Mitchell, M. M., & Bradshaw, C. P. (2013). Examining classroom influences on student perceptions of school climate: The role of classroom management and exclusionary discipline strategies. *Journal of School Psychology, 51*(5), 599-610. https://doi.org/10.1016/j.jsp.2013.05.005

Morgan, E., Salomon, N., Plotkin, M., & Cohen, R. (2014). *The school discipline consensus report: Strategies from the field to keep students engaged in school and out of the juvenile justice system.* Council of State Governments Justice Center.

National Council on Disability. (2015). Breaking the school-to-prison pipeline for students with disabilities. National Council on Disability. https://ncd.gov/sites/default/files/Documents/NCD_School-to-PrisonReport _508-PDF.pdf

Nelson, C. M., Jolivette, K., Leone, P. E., & Mathur, S. R. (2010). Meeting the needs of at-risk and adjudicated youth with behavioral challenges: The promise of juvenile justice. *Behavioral Disorders, 36,* 70-80. https://www.jstor.org/stable/43153832

Noltemeyer, A. L., & Mcloughin, C. S. (2010). Changes in exclusionary discipline rates and disciplinary disproportionality over time. *International Journal of Special Education, 25*(1), 59- 70.

Owens, J. S., Holdaway, A. S., Smith, J., Evans, S. W., Himawan, L. K., Coles, E. K., Girio-Herrera, E., Mixon, C. S., Egan, T. E., & Dawson, A. E. (2018). Rates of common classroom behavior management strategies and their associations with challenging student behavior in elementary school. *Journal of Emotional and Behavioral Disorders, 26*(3), 156-169. https://doi.org/10.1177/1063426617712501

Parsons, F. M. (2017). An intervention for the intervention: Integrating positive behavioral interventions and supports with culturally responsive practices. *Delta Kappa Gamma Bulletin, 83*(3), 52-57.

Pas, E. T., & Bradshaw, C. P. (2012). Examining the association between implementation and outcomes. *Journal of Behavioral Health Services & Research, 39,* 417-433. https://doi.org/10.1007/s11414-012-9290-2

Pas, E. T., Bradshaw, C. P., & Mitchell, M. M. (2011). Examining the validity of office discipline referrals as an indicator of student behavior problems. *Psychology in the Schools, 48*(6), 541-555. https://doi.org/10.1002/pits.20577

Patton, M. Q. (2015). *Qualitative research and evaluation methods: Integrating theory and practice* (4th ed.). Sage.

Petteruti, A. (2011). *Education under arrest: The case against police in schools.* Justice Policy Institute, Office of Justice Programs. https://justicepolicy.org/research/education-under-arrest-the-case-against-police-in-schools/

Pinkelman, S. E., McIntosh, K., Rasplica, C. K., Berg, T., & Strickland-Cohen, M. K. (2015). Perceived enablers and barriers related to sustainability of school-wide positive behavioral interventions and supports. *Behavioral Disorders, 40*(3), 171-183. https://doi.org/10.17988/0198-7429-40.3.171

Pitre, C. C. (2014). Improving African American student outcomes: Understanding educational achievement and strategies to close opportunity gaps. *Western Journal of Black Studies, 38*(4), 209-217.

Positive Behavioral Interventions and Supports. (n.d.). *What is PBIS?* http://www.pbis.org/

Price, C. L., & Steed, E. A. (2016). Culturally responsive strategies to support young children with challenging behavior. *Young Children, 71*(5), 36-43. https://www.naeyc.org/resources/pubs/yc/nov2016/culturally-responsive-strategies

Putnam, R. F., & Kincaid, D. (2015). School-wide PBIS: Extending the impact of applied behavior analysis: Why is this important to behavior analysts? *Behavior Analysis in Practice, 8*(1), 88-91. https://doi.org/10.1007/s40617-015-0055-2

Quinn, M. M., Rutherford, R. B., Leone, P. E., Osher, D. M., & Poirier, J. M. (2005). Youth with disabilities in juvenile corrections: A national survey. *Exceptional Children, 71*(3), 339-345. https://doi.org/10.1177/001440290507100308

Rafa, A. (2018). *Alternative school discipline strategies: Policy snapshot.* Education Commission of the States. https://www.ec.s.org/alternative-school-discipline-strategies/

Reinke, W. M., Herman, K. C., & Stormont, M. (2013). Classroom-level positive behavior supports in schools implementing SW-PBIS: Identifying areas for enhancement. *Journal of Positive Behavior Interventions, 15*(1), 39-50. https://doi.org/10.1177/1098300712459079

Reno, G. D., Friend, J., Caruthers, L., & Smith, D. (2017). Who's getting targeted for behavioral interventions? Exploring the connections between school culture, positive behavior support, and elementary student achievement. *Journal of Negro Education, 86*(4), 423. https://doi.org/10.7709/jnegroeducation.86.4.0423

Ritter, G. W., & Anderson, K. P. (2018). Examining disparities in student discipline: Mapping inequities from infractions to consequences. *Peabody Journal of Education, 93*(2), 161-173. https://doi.org/10.1080/0161956X.2018.1435038

Rogers, J., & Richardson, M. (2014). Successful implementation of PBIS in an alternative school setting. *Georgia Association for Positive Behavior Support Conference, 52.* http://digitalcommons.georgiasouthern.edu/gapbs/2014/2014/52

Ross, S. W., Romer, N., & Horner, R. H. (2012). Teacher well-being and the implementation of schoolwide positive behavior interventions and supports. *Journal of Positive Behavior Interventions, 14,* 118-128. https://doi.org/10.1177/1098300711413820

Ryoo, J. H., Hong, S., Bart, W. M., Shin, J., & Bradshaw, C. P. (2018). Investigating the effect of school-wide positive behavioral interventions and supports on student learning and behavioral problems in elementary and middle schools. *Psychology in the Schools, 55*(6), 629-643. https://doi.org/10.1002/pits.22134

Saldaña, J. (2016). *The coding manual for qualitative researchers*. Sage.

Sanetti, L. M., Kratochwill, T. R., & Long, A. C. (2013). Applying adult behavior change theory to support mediator-based intervention implementation. *School Psychology Quarterly, 28*(1), 47. https://doi.org/10.1037/spq0000007

Sanger, D. D., Maag, J. W., & Miner, C. (2016). Top ten tips for addressing behavioral challenges of incarcerated students with co-occurring language and behavioral problems. *Emotional & Behavioral Disorders in Youth, 16*(3), 72-76.

Scott, L. M. (2018). *Classroom teachers' perceptions of the PBIS program in an inner-city school.* [Ph.D. dissertation, Hampton University]. https://files/eric.ed.gov/fulltext/EJ1175692.pdf

Scott, T. M., Nelson, C. M., Liaupsin, C., Jolivette, K., Christle, C. A., & Riney, M. (2002). [/ Addressing the needs of at-risk and adjudicated youth through positive behavior support:

Effective prevention practices. *Education and Treatment of Children, 25,* 532-551. https://www.jstor.org/stable/42899727

Sensoy, O., DiAngelo, R. J., & Banks, J. A. (2017). *Is everyone really equal? An introduction to key concepts in social justice education*. Teachers College Press.

Simonsen, B., Freeman, J., Goodman, S., Mitchell, B., Swain-Bradway, J., Flannery, B., Sugai, G. M., George, H. P., & Putman, B. (2015). Supporting and responding to behavior: Evidence-based classroom strategies for teachers. http://www.pbis.org/common/cms/ files/pbisresources/Supporting%20and%20Responding%20to%20Behavior.pdf

Simonsen, B., & Sugai, G. (2013). PBIS in alternative education settings: Positive support for youth with high-risk behavior. *Education and Treatment of Children, 36*(3), 3-14. https://www.jstor.org/stable/42900208

Skiba, R. J., Chung, C. G., Trachok, M., Baker, T. L., Sheya, A., & Hughes, R. L. (2014). Parsing disciplinary disproportionality: Contributions of infraction, student, and school characteristics to out-of-school suspension and expulsion. *American Educational Research Journal, 51*(4), 640-670. https://doi.org/10.3102/ 0002831214541670

Skiba, R. J., Michael, R. S., Nardo, A. C., & Peterson, R. (2002). The color of discipline: Sources of racial and gender disproportionally in school punishment. *Urban Review, 34,* 317-342. https://doi.org/10.1023/A:1021320817372

Skrla, L., McKenzie, K. B., & Scheurich, J. J. (2009). *Using equity audits to create equitable and excellent schools*. Corwin.

Sørlie, M. A., Ogden, T., & Olseth, A. R. (2016). Examining teacher outcomes of the school-wide positive behavior support model in Norway: Perceived efficacy and behavior management. *SAGE Open, 6*(2), 1-13. https://doi.org/10.1177/ 2158244016651914

Steinberg, M. P., & Lacoe, J. (2017). What do we know about school discipline reform? *Education Next, 17*(1), 1-23. https://www.educationnext.org/what-do-we-know-about-school-discipline-reform-suspensions-expulsions/

Stetson, F. H., & Collins, B. J. (2010). Rethinking suspensions. *Principal Leadership, 11*(2), 40-44. https://eric.ed.gov/?id=EJ916295

Strunk, E., & Rossi, M. (2016, Spring). *A meta-analysis on the effectiveness of PBIS in reducing maladaptive behaviors*. Poster presentation at the University Presentation Showcase at Eastern Kentucky University, Richmond, KY. https://encompass.eku.edu/swps_graduategallery/39/

Stufflebeam, D. L. (1971). The use of experimental design in educational evaluation. *Journal of Educational Measurement, 8*(4), 267-274. https://doi.org/10.1111/ j.1745-3984.1971. tb00936.x

Stufflebeam, D. L., & Coryn, C. L. (2014). *Evaluation theory, models, and applications*. Jossey-Bass.

Stufflebeam, D. L., & Shinkfield, A. J. (2007). *Evaluation theory, models, and applications*. Jossey-Bass.

Sugai, G., Lewis-Palmer, T., Todd, A. W., & Horner, R. H. (2001). *School-wide Evaluation Tool* (Version 2.1). https://www.pbis.org/resource/ school-wide-evaluation-tool-set

Sugai, G., O'Keeffe, B. V., & Fallon, L. M. (2012). A contextual consideration of culture and school-wide positive behavior support. *Journal of Positive Behavior Interventions, 14*, 197-208. https://doi.org/10.1177/1098300711426334

Sullivan, A. L., Klingbeil, D. A., & Van Norman, E. R. (2013). Beyond behavior: Multilevel analysis of the influences of sociodemographic and school characteristics on students'

risk of suspension. *School Psychology Review, 42*(1), 99-114. https://doi.org/10.1080/02796015.2013.12087493

Swain-Bradway, J., Pinkney, C., & Flannery, K. B. (2015). Implementing schoolwide positive behavior interventions and supports in high schools. *Teaching Exceptional Children, 47*(5), 245-255. https://doi.org/10.1177/0040059915580030

Tincani, M. (2007). Moving forward: Positive behavior support and applied behavior analysis. *The Behavior Analyst Today, 8*(4), 492-499. https://doi.org/10.1037/ h0100635

Tobia, E. (2015). *Professional development on positive behavior intervention supports (PBIS) and its implications for school culture.* [Doctoral dissertation, Esteves School of Education]. Electronic Theses and Dissertations. Paper 2310. https://doi.org/10.18297/etd/2310

Townsend, B. L. (2000). The disproportionate discipline of African American learners: Reducing school suspensions. *Exceptional Children, 66*(3), 381-386. https://doi.org/10.1177/001440290006600308

Tschannen-Moran, M., Parish, J., & DiPaola, M. (2006). School climate: The interplay between interpersonal relationships and student achievement. *Journal of School Leadership, 16*(4), 386-415. https://doi.org/10.1177/105268460601600402

Tyre, A. D., Feuerborn, L. L., & Woods, L. (2018). Staff concerns in schools planning for and implementing school-wide positive behavior interventions and supports. *Contemporary School Psychology, 22*(1), 77-89. https://doi.org/10.1007/s40688-017-0130-5

U.S. Department of Education (USDOE). (2014). *Guiding principles: A resource guide for improving school climate and discipline.* https://www2.ed.gov/policy/gen/guid/school-discipline/guiding-principles.pdf

Valenti, M. W., & Kerr, M. M. (2014). Addressing individual perspectives in the development of school-wide rules. *Journal of Positive Behavior Interventions*, *17*(4), 245-253. https://doi.org/10.1177/1098300714544405

Vincent, C., Spaulding, S., & Tobin, T. J. (2010). A reexamination of the psychometric properties of the School-Wide Evaluation Tool (SET). *Journal of Positive Behavior Interventions, 12,* 161-179. https://doi.org/10.1177/1098300709332345

Vincent, C. G., Sprague, J. R., Pavel, M., Tobin, T. J., & Gau, J. M. (2015). Effectiveness of schoolwide positive behavior interventions and supports in reducing racially inequitable disciplinary exclusion. In D. J. Losen (Ed.), *Closing the school discipline gap: Equitable remedies for excessive exclusion* (pp. 207-221). Teachers College Press.

Von Robertson, R., & Chaney, C. (2017). "I know it (racism) still exists here": African American males at a Predominantly White Institution (PWI). *Humboldt Journal of Social Relations, 1*(39), 260-282. https://doi.org/10.55671/0160-4341.1015

Wald, J., & Losen, D. J. (2003). Defining and redirecting a school-to-prison pipeline. *New Directions for Youth Development, 99,* 9-15. https://doi.org/10.1002/yd.51

Walker, R. L., Burnette, S., Crook, C., Robinson, D., McSwain, V., Whitton, H., & Mandy, A. (2016). *Real life account of PBIS at the primary/elementary level.* Paper presented at the Georgia Association for Positive Behavior Support Conference, Atlanta, GA. https://digitalcommons.georgiasouthern.edu/gapbs/2016/2016/11/

Wilcox, R. (2012). *Modern statistics for the social and behavioral sciences: A practical introduction*. CRC Press.

Yeung, A. S., Craven, R. G., Mooney, M., Tracey, D., Barker, K., Power, A., & Lewis, T. J. (2016). Positive behavior interventions: The issue of sustainability of positive effects. *Educational Psychology Review, 28*(1), 145-170. https://doi.org/ 10.1007/s10648-015-9305-7

Yuan, T., & Jiang, H. (2018). Culturally responsive teaching for children from low-income, immigrant families. *Young Exceptional Children, 22*(3), 150-161. https://doi.org/10.1177/109625061875689

VITA

Brady P. Payne

EDUCATION

Doctor of Education in Educational Policy, Planning, and Leadership, May 2023
THE COLLEGE OF WILLIAM AND MARY, WILLIAMSBURG, VA
Dissertation: "Implementation, Outcomes, and Perceived Effectiveness of Positive Behavioral Interventions and Supports (PBIS) in a Title I School: A Program Evaluation"

Master of Arts in Professional School Counseling, May 2014
HAMPTON UNIVERSITY, HAMPTON, VA

Bachelor of Arts in Interdisciplinary Studies, May 2011
HAMPTON UNIVERSITY, HAMPTON, VA

PROFESSIONAL LEADERSHIP EXPERIENCE

Behavior Specialist

- Positive Behavioral Interventions and Supports Committee, Chair
- Provide support for teachers regarding classroom management, student engagement, and maximizing instructional time
- Lead Combat Chronic Absenteeism (CCA) Team and develop Corrective Action Plans for students with truancy concerns
- Assess and resolve behavior problems that disrupt the learning or safety of students or staff

Professional School Counselor

- Provide innovative individual and group counseling for self-awareness, self-management, responsible decision-making, social awareness, and relationship skills
- Collaborate with others to support students and families academically and behaviorally
- Serve as Local Education Agency (LEA) for 504 and Student Intervention Team (SIT) meetings; conduct Functional Behavioral Assessments (FBA); develop Behavior Intervention

Elementary School Educator

- Served as grade level chair 2013-2015
- Exhibited exceptional knowledge of best practices and the use of data to inform decision-making and lesson planning
- Restructured CLT meetings to prioritize a collaborative understanding of curriculum and use data to inform instruction

NOTABLE PRESENTATIONS

- Mask Off! [Implicit Bias Training]
  August 2020 | January 2021 | August 2021 | August 2022
- Understanding Trauma
  November 2019
- Social Emotional Learning Toolkit for Success (Rejuvenate!)
  August 2019 | March 2020
- Targeted Student Interventions and Supports and Special Education Services
  October 2019 | October 2020
- Restorative Practices
  October 2018 | November 2018 | October 2019 | November 2019 | June 2020