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The Integration of Positive Psychology and Positive Behavioral Interventions & Supports to

Improve Minoritized Students' Social, Emotional, and Behavioral Outcomes

by

Jasmine L. Gray

A dissertation submitted in partial fulfillment of the requirements for the degree of Doctor of Philosophy in School Psychology Department of Educational Psychological Studies College of Education University of South Florida

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Keywords: psychopathology, intervention, complete mental health, subjective well-being

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#### ABSTRACT

This study aimed to examine the effectiveness of a culturally adapted 9-session group positive psychology intervention with and without an added peer reporting intervention on student levels of social, emotional, and behavioral functioning. Many studies have evaluated either school-wide positive behavioral interventions and supports (SWPBIS) or positive psychology interventions (PPIs) in isolation, but very few studies have examined the extent to which combining these interventions and approaches may promote complete mental health. The Well-Being Promotion Program is a multitarget positive psychology intervention that has been evaluated in both elementary and middle school populations (Roth et al., 2017; Lenz et al., 2019; Suldo et al., 2014; Suldo et al., 2015). This study provided a culturally adapted WBPP in a small group format to elementary and middle school students who initially reported room for growth in life satisfaction. Students were also randomly selected to receive the positive peer reporting (PPR) which was aligned with the SWPBIS plan. PPR entails a randomly selecting students to receive positive peer reports at the end of group sessions and encourages students to identify the strengths of others. The intervention entailed nine sessions from the 10-core sessions of the WBPP provided twice weekly for five weeks in the fourth quarter of the 2021-2022 school year. Participants in this study included 26 5th-8th grade students in one K-8 school in the southeastern United States, a K-8 charter school that serves a predominately minoritized student population. Participants were stratified by grade level and then randomly assigned to receive the WBPP alone, or the WBPP including PPR. At the end of the intervention (WBPP or WBPP+PPR), students reported their feelings about the intervention by rating treatment acceptability. Students

completed a pre- and post-assessment examining levels of emotional well-being (life satisfaction, positive and negative affect), behavioral problems (hyperactivity, conduct problems, anxiety, and depression) and peer relationships (peer problems, satisfaction with friends). Regarding acceptability of the intervention, a series of t-tests indicated no significant differences between conditions in levels of desirability, feasibility, or understanding, but students who participated in the WBPP+PPR condition tended to rate the intervention as somewhat less acceptable, particularly with regard to desirability and understanding. This study analyzed the differential effects of the PPI (the WBPP) with and without the behavioral support (PPR) using a repeated measures analysis of variance (ANOVA). This study found that students who received the culturally adapted WBPP experienced similar social, emotional, and behavioral outcomes than students who received the adapted WBPP + PPR. Overall, this study determined that there were no differences in levels of emotional, social, or behavioral outcomes for students who received a PPI combined with a behavioral support compared to those who only received a PPI. The small sample size in this study and abbreviated duration of the intervention period should be considered when interpreting results. Future directions and implications for educational professionals are discussed.

#### **CHAPTER I: INTRODUCTION**

The provision of comprehensive social, emotional, and behavioral supports (SEB) in schools is considered a best practice approach to fostering overall well-being for students (Doll et al., 2021). Students today face a variety of stressors that affects their social and emotional well-being such as a global pandemic, race-related crises, and reduced social interactions due to the COVID-19 pandemic. Many students are having to navigate that stress while attempting to behave in socially appropriate ways despite experiencing internalizing symptoms of distress such as anxiety and depression. In the midst of the COVID-19 pandemic, the National Association for School Psychologists (NASP; 2020), asserts that "school psychologists will increasingly be called on to meet the social-emotional, behavioral, and mental health needs of students..." According to Kern et al., (2015), by directly assessing students' subjective well-being (SWB), schools may be more able to understand and promote well-being within their students.

SWB is only one part of the picture. The increase of SWB, or life satisfaction, is one of two components within a dual-factor model of mental health first proposed by Greenspoon and Saklofske (2001). While an increase in SWB is necessary, it is not sufficient in the promotion of complete mental health. The dual-factor model of mental health (Greenspoon & Saklofske, 2001; Suldo & Doll, 2021) asserts that complete mental health occurs with the upregulation of positive emotions that underlie life satisfaction and SWB, and with the downregulation of negative emotions that underlie psychopathology (PTH). PTH includes both internalizing and externalizing symptoms. Internalizing symptoms may include anxiety and depression while externalizing symptoms may include rule-breaking, impulsivity, aggression, and inattention.

As proposed by Doll et al., (2021) an appropriate approach to promoting complete mental health in the school setting is through a multi-tiered system of support (MTSS) framework, which may entail multiple or different interventions for different subgroups of students. An acceptable way to provide interventions for different subgroups of students may include culturally adapting an evidence-based protocol to consider language, culture, and context to fit with an individual's values (Bernal et al., 2009). A traditional MTSS framework include three tiers of intervention. At the bottom tier, also known as primary prevention or the universal level, mental health is promoted for all students. The middle tier, or selective interventions, are provided for students who continue to show evidence of mental health concerns despite supports given to all students. The top tier, or tertiary or targeted supports, are typically reserved for students who continue to have symptoms despite universal and selective supports. In general, Doll and colleagues (2021) assert that one intervention is unlikely to simultaneously increase subjective well-being (SWB) and diminish the presence of PTH such as depression, anxiety, or behavioral disorders. Promising interventions that address either SWB or PTH include a multitarget small group Well-Being Promotion Program consistent with Seligman's (2002) framework for increasing SWB (Roth et al., 2017), positive behavioral interventions and supports (PBIS), and peer reporting interventions such as positive peer reporting (PPR; Ervin et al., 1996).

#### **Positive Psychology Interventions (PPIs)**

Positive psychology has been described as the scientific study of what makes life most worth living (Peterson, 2008). Positive psychology focuses on positive events and experiences in an individual's life such as happiness. Diener (2000) asserted that subjective well-being (SWB) is the primary construct within the science of happiness. One such approach to promoting wellbeing as defined by Diener (2000) is through Seligman's authentic happiness model (2002).

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Seligman's authentic happiness model asserts that a person can develop and improve happiness through nurturing one's individual strengths known as character strengths. These strengths may include kindness, gratitude, optimism, humor, and many more identified by the Values in Action (VIA) inventory of strengths. Diener's (2000) model of SWB includes components of life satisfaction, satisfaction with domains such as school, and experiences of positive affect (i.e., joy) more than negative affect (i.e., sadness). Positive and negative affect refer to the frequency of one's emotions over time. Diener (2000) also asserts that rather than researching who is happy, SWB research should focus on why people are happy and the processes that influence their happiness.

For adolescents, experiencing more positive than negative emotions has been linked to better outcomes such as positive social relationships, good physical health, and even longer life (Kern et al., 2015). Research has indicated that positive psychology interventions (PPIs) have the potential to increase student happiness and connectedness to school and have been identified as a potential strategy for increasing SWB within the school setting. Positive psychology is described as the science of what makes life worth living (Peterson, 2008). This includes focusing on the positive events and experiences in one's life through various activities. However, there have been studies that demonstrate differential effects of PPIs on diverse populations (i.e., Hendriks et al., 2020; Khanna & Singh, 2021), which may be expected being that positive psychology research is typically conducted with White samples (Lopez et al., 2002).

PPIs typically involve activities that foster gratitude, the use of character strengths, resilience, optimism, and instill hope for the future (Waters, 2011). These strategies can be delivered in a self-administered manner (e.g., self-help), in a group format, or on an individual counseling modality in line with an MTSS framework. A review of brief school-based PPIs

conducted by Shankland and Rosset (2016) provides examples of PPIs in the domains of mindfulness, gratitude, character strengths, and positive relationships. Some of these PPIs include acts of kindness, active constructive responding, gratitude journaling, writing a gratitude letter, strengths spotting, identifying one's own strengths, and mindful breathing. Prior research suggests that using various strategies in a multicomponent approach rather than one or two specific strategies is beneficial to overall happiness (Quoidbach et al., 2010).

One multicomponent intervention that fosters gratitude, the use of character strengths, hope, and optimism using some of the strategies listed above is the Well-Being Promotion Program (WBPP; Suldo, 2016) which has been evaluated on a classwide level (i.e., universal support) and in small groups in both elementary and middle school populations (e.g., Lenz et al., 2019; Roth et al., 2017; Suldo et al., 2015). The WBPP has been found promising in increasing SWB but has fallen short when it comes to reducing the presence or impact of PTH. In addition, research has not determined the impact of cultural adaptations on the effectiveness of the program to address the cultural gap identified in prior positive psychology research.

While PPIs hold promise for increasing SWB, PPIs have not yet been found to also reduce PTH simultaneously. The increase in SWB does not include the reduction of some forms of internalizing distress (e.g., withdrawal or anxiety) nor externalizing forms of psychopathology such as aggressive behavior, bullying behaviors, or hyperactivity. PPIs have been found to be effective in the promotion of subjective well-being, psychological well-being, and decrease in depressive symptoms (Bolier et al., 2013). Other research suggests that positive emotions can be increased through an emotion regulation framework by integrating and utilizing positive strategies (Quoidbach et al., 2015). In line with the reimagined MTSS framework proposed by Doll and colleagues (2021), multiple interventions may be necessary to promote complete mental

health. One such approach to diminishing the presence of PTH is through the implementation of PBIS.

#### **Positive Behavioral Interventions and Supports (PBIS)**

PBIS is a set of strategies and tools that have been found to result in a decrease in externalizing problems (Bradshaw et al., 2010; Gage et al., 2019; Grasley-Boy et al., 2019; Nelen et al., 2021) as well as improvements in academic achievement (McIntosh et al., 2011). PBIS is typically delivered in a tiered format similar to the one described in above sections, and sometimes is used interchangeably with school-wide positive behavioral interventions and supports (SWPBIS), indicating the school-wide implementation of PBIS. PBIS typically focuses on the social and emotional development of children through the reduction of inappropriate behavior and is often identified as a mechanism for which to provide social, emotional, academic and behavioral supports through teaching appropriate student behaviors to promote a positive school environment (Center on PBIS, 2021). Schools that participate in PBIS activities typically outline three to five positively stated behavioral expectations for their students to follow and also identify interventions that can assist in promoting those expectations (i.e., Check In Check Out, self-management strategies, small group instruction, etc.) and assisting with academic outcomes (Center on PBIS, 2021). One approach to improving student social interactions and behavior aligned with PBIS includes peer reporting interventions.

# **Peer Reporting Interventions**

In theory, positive psychology combined with positive behavioral interventions and supports (PBIS) may increase the effects of PPIs in increasing one's quality of life (Enyart et al., 2017) and reinforce behaviors that promote wellness (Doll et al., 2021). Positive peer reporting (PPR) and tootling are two types of peer reporting interventions. A meta-analysis of peer reporting interventions conducted by Collins and colleagues (2020) found that with regard to the intervention characteristics, 61.9% of studies included tootling, and 42.9% of studies included positive peer reporting. Tootling is like positive peer reporting and is an intervention meant to teach students to tattle or "tootle" the prosocial behavior of their peers in opposition to their negative behaviors. Tootling has been found to reduce the amount of classroom behaviors when used classwide with elementary students (Cihak et al., 2009). Positive peer reporting was originally developed to improve the social interactions of socially withdrawn and disruptive children (Ervin et al., 1996). PPR includes verbally reporting the positive behavior of peers and is usually tied to a group contingency to increase motivation to provide positive reports. PPR has been found to improve positive peer interactions (Moroz & Jones, 2002) and academic achievement (Chaffee et al., 2020), all while also increasing the number of positive peer reports (Moroz & Jones, 2002) as reported by teachers. An added benefit of PPR in thinking about positive psychology, includes the ability to identify positive and prosocial behaviors in others, and thus promoting these behaviors through positive reinforcement.

PPIs typically focus on the upregulation of positive emotions and leaves out a focus on downregulating negative emotions (e.g., sadness, anger) or reducing externalizing behavior, the latter of which is usually encouraged by PBIS. Research has demonstrated that PPIs may have a positive impact on adolescents' emotion regulation as well as improvements in social functioning (Morrish et al., 2018). In addition, research proposes that while difficulties in downregulating *negative emotions* is related to psychological distress, downregulating *positive emotions* may lead to diminished mental health (Morrish et al., 2018). Quoidbach and colleagues (2015) proposes using the Process Model of Emotion Regulation as a framework for adapting PPIs in promoting emotion regulation in adolescents. The process model includes five families of

emotion regulation strategies (situation selection, situation modification, attentional deployment, cognitive change, and response modification) that can be used in the context of well-being interventions to identify PPIs that may act as an emotion regulation strategy (Quoidbach et al., 2015). For example, optimism, or looking for the silver linings, may be considered an attentional deployment strategy by focusing on the positive factors after an experience have already begun, thereby upregulating positive emotions which leads to improved mental health. More research is needed to determine the effectiveness of using the Process Model of Emotion Regulation as a framework for promoting emotion regulation using PPIs in group settings.

By identifying whether educators can observe increases in SWB and reductions in internalizing and externalizing psychopathology by combining the PPIs and PPR aligned with PBIS, we can determine whether an intervention grounded in positive psychology and including a behavioral support may be useful in school settings for increasing school climate and ultimately impacting student achievement specific to social, emotional, and behavioral success. As proposed by Doll and colleagues (2021), multiple interventions may be necessary within a reimagined MTSS framework. As such, more research will be needed to determine what combination of interventions may best promote social, emotional, and behavioral success in the school setting.

#### **Statement of the Problem**

The research that has focused on interventions for increasing positive emotions has not also focused on decreasing externalizing problems. Many studies have evaluated either PBIS or PPIs in isolation, but there are no known studies that have examined the extent to which combining these interventions and approaches may promote complete mental health through social, emotional, and behavioral supports. With more guidance emerging in policy on how to

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effectively conduct universal social, emotional, and behavioral screening to promote complete mental health (Briesch et al., 2018; Doll et al., 2021), it would be helpful to identify an intervention, or combination of interventions, acceptable within the school setting that can provide support to students who may be at risk for social, emotional, and/or behavioral problems. Currently, there are no such interventions identified that may be acceptable to increase students combined social, emotional, and behavioral functioning, although there is some guidance on interventions that may improve one of two factors in Greenspoon and Saklofske's (2001) complete mental health model. Additionally, best practice states that practitioners should use interventions that have been found effective for the population they intend to serve. However, much of the research on PPIs and PPR has been with White populations, and there are few interventions found to be well-established for minoritized populations (Pina et al., 2019). Although PPIs are promising in improving subjective well-being, much positive psychology research was grounded in a Western perspective (Lopez et al., 2002). Culture is not always considered and ignoring its impact could lead to inaccurate judgments about the activities that may or may not improve subjective well-being. It is important to identify an intervention that may be culturally adapted and further evaluated to be effective for minoritized students. It is also important to determine whether including a behavioral support in a multicomponent PPI would enhance well-being outcomes.

# **Purpose of the Study**

The purpose of this study was to examine whether integrating a behavioral component, positive peer reporting, into a culturally modified 9-session selective PPI, the Well-Being Promotion Program (WBPP) would enhance the effects of the intervention not previously observed such as reduced internalizing and externalizing symptoms. Further, this study investigated whether the potential improvements observed could translate into better peer relationships within the school setting. This study also aimed to identify whether culturally adapting this PPI for minoritized students may have the same or similar effects as previous studies with this intervention. As much of the research conducted with the WBPP has been with a majority White or Hispanic sample (Lenz et al., 2019; Roth et al., 2017), this study also aimed to analyze the acceptability of the culturally adapted intervention through the eyes of minoritized students.

#### **Research Questions**

This dissertation aimed to answer the following research questions:

- 1. How acceptable is a culturally adapted version of a positive psychology and behavioral intervention as perceived by minoritized middle school students?
- 2. What outcomes are associated with participation in a culturally adapted positive psychology or positive psychology in addition to a behavioral intervention with regard to:
  - a. Emotional well-being (i.e., life satisfaction, positive and negative affect)?
  - Behavior problems (i.e., externalizing behaviors [conduct problems, hyperactivity], internalizing behaviors [anxiety, depression])?
  - c. Peer relationships (e.g., peer problems, satisfaction with friends)?
- 3. Are changes in outcomes larger when the culturally adapted positive psychology intervention is combined with behavioral supports compared to the culturally adapted positive psychology intervention alone?

# Hypotheses

With respect to research question one, this researcher hypothesized that both the culturally adapted intervention as well as the culturally adapted intervention with the behavior

support would be found acceptable by student participants based on prior research of the acceptability of the particular intervention as well as research on the acceptability of a different culturally adapted intervention (Cramer & Castro-Olivo, 2015; Suldo et al., 2015). This researcher felt that students would find the intervention meaningful and relevant, and as such may be more engaged with the material. With more engagement and meaning, this researcher hypothesized that students would find more ways to incorporate the material into their community and school environments. Given that the behavior support would include an incentive, this researcher hypothesized that students may find the culturally adapted intervention with the behavior support to be slightly more acceptable than the positive psychology intervention alone.

With respect to research question two, this researcher hypothesized that there would be increases in emotional well-being and social relationships, as well as a decrease in behavioral problems, among students who receive the intervention with the embedded behavioral support. Prior research indicates improvements in emotional well-being through the use of PPIs (Roth et al., 2017; Shoshani & Steinmetz, 2014; Suldo et al., 2014; Suldo et al., 2011). There have also been demonstrated improvements in academic outcomes, behavior, and social relationships (Algozzine & Algozzine, 2007; Bradshaw et al., 2010; Cook et al., 2015; Gage et al., 2019) with PBIS and other behavioral supports.

With respect to research question three, this researcher hypothesized better overall outcomes would be associated with the integrated approach than with positive psychology alone. Previous research has demonstrated that a combination of PBIS and social emotional learning (SEL) has greater effects in reducing externalizing problems than just PBIS or SEL alone (Cook et al., 2015). Although the intervention that was evaluated is specific to increasing SWB and not specific to SEL, it is thought that complete mental health is a combination of increased wellbeing and the absence of psychopathology (Suldo et al., 2015). Well-being may be viewed as an increase in positive emotions and a decrease in negative emotions, an aim of the WBPP.

## **Definition of Key Terms**

# **Minoritized Students**

This study uses the term minoritized in lieu of the term "minority" for a variety of reasons. To be minoritized means to be pushed to the margins by means out of your own control (Paniagua, 2015). For example, people are not minorities, but rather placed in these groups by the larger society. As stated by Privette (2021), "minoritized" can refer to people or groups seen as "others" who may not be the numerical minority, but classified as minoritized for the dominant group to maintain social power. In the context of the present study, minoritized students refer to those who identify as Black/African American and/or Hispanic.

#### Social, Emotional, and Behavioral Supports (SEB)

Social, emotional, and behavioral (SEB) supports refers to psychological programs and practices that foster students' overall well-being (Doll et al., 2021). These supports target internalizing problems (i.e., trauma, environmental stressors, symptoms of anxiety/depression, etc.), externalizing problems (i.e., unsafe settings, substance abuse, aggression, bullying behaviors, etc.), social relationships (i.e., social skills), and overall life satisfaction (i.e., gratitude, empathy, meeting basic needs, use of character strengths, etc.). This can be done through PPIs as well as through behavioral interventions such as positive peer reporting (PPR) which is described below.

# **Culturally Adapted**

In this study, a culturally adapted intervention refers to the use of session materials more relevant to the students. In a systematic review conducted by Brown et al. (2018), most studies (80%) made adaptations to the content of the intervention to match the social and economic values of the target students. As such, this study refers to culturally adapted by modifying the content to match the interests of the target students without modifying the intervention topic. For example, more or new activities (i.e., identifying the character strengths in others, creating positive affirmations, and looking for optimistic thoughts) will be introduced to help students better understand the concept being presented. Students will also be better able to apply these concepts outside of the school setting.

### **Mental Health**

#### **Positive Indicators of Mental Health**

Positive indicators of mental health include the presence of positive emotions and overall positive affect in relation to lower levels of negative affect. Other positive indicators may include positive school grades and the absence of externalizing concerns. In the context of this study, positive indicators include good grades, increased life satisfaction, improved or positive school attendance, the presence of positive affect, low negative affect and healthy social relationships.

#### Negative Indicators of Mental Health

Negative indicators of mental health may include the presence of psychopathology in the form of internalizing and/or externalizing problems. Psychopathology typically refers to a mental or behavioral disorder. Internalizing forms of behavior include the presence of symptoms consistent with anxiety and/or depression. Externalizing forms of behavior include hyperactivity, aggression, or other conduct problems. Negative indicators may include social withdrawal,

conduct problems, or peer problems, lack of school engagement, and also diminished selfefficacy. In the context of this study, negative indicators of mental health include the presence of internalizing and externalizing problems, diminished school attendance, and negative or lack of social relationships.

## **Positive Psychology**

Positive psychology has been described as the science of what makes life worth living (Diener, 2000). In this study, positive psychology refers to the study of student happiness, or life satisfaction. Positive psychology may be viewed through the lens of authentic happiness as an essential component of living a positive life and overall SWB (Seligman, 2002).

## **Positive Psychology Interventions (PPIs)**

PPIs are strategies that have empirical support for increasing student happiness and SWB, and/or intentionally target a correlate of SWB such as gratitude. PPIs are intended to increase positive emotions, resilience, and the use of positive character strengths (Waters, 2011). In the present study, PPI strategies include gratitude journaling, gratitude visits, identification and use of character strengths, learning about optimism and hope, and applying these concepts to one's own culture and life circumstances. When provided as a package as within the 10 core sessions of the Well-Being Promotion Program (WBPP), these strategies have been found effective in increasing subjective well-being among sixth and seventh grade students within the school setting (Roth et al., 2017; Suldo et al., 2014).

# **Behavioral Supports**

Behavioral supports are intended to reduce inappropriate or unwanted behaviors in the school setting while potentially teaching appropriate behaviors. Typically, behavioral supports target student externalizing behaviors and aim to reduce the number of office discipline referrals

that an individual receives rather than targeting internalizing forms of behavior such as withdrawal, feeling nervous or sad, or having concentration problems. In the present study, behavioral supports refer to any potential strategies that may decrease externalizing forms of behavior such as the use of PBIS strategies or positive peer reporting.

#### **Positive Behavioral Interventions and Supports (PBIS)**

PBIS utilizes a three-tiered evidence-based framework that schools may utilize to improve student behavior within the school setting. The Center on PBIS provides information on a tiered framework (2021). At tier one, supports are provided to all students that gives most students the tools to be successful and the prevention of future problems. At tier two, supports for specific skills deficits are provided to students typically in a group format. At this level, the use of formal assessments may or may not be warranted to identify the specific skill deficit. Students may be identified by a screener (i.e., office discipline referrals, teacher nominations, or specific screening instruments). At tier three, students receive the most intensive level of supports typically including the use of formal assessments. At this most intensive level, students are typically given an individual support plan along with goals related to appropriate behavior. In the context of the present study, this researcher will be focusing on a tier two behavioral support, positive peer reporting, to increase the identification and utilization of appropriate behaviors in line with the schools' current PBIS plan.

#### **Positive Peer Reporting (PPR)**

Positive peer reporting (PPR) is an evidence-based behavioral intervention for improving the behavior of socially rejected and/or disruptive children (Skinner et al., 2002). As described by Murphy and Zlomke (2014), PPR is a peer-mediated intervention that involves designating time for positive comments, offering positive reinforcement, and offering feedback in the appropriateness of positive comments. Positive statements usually follow the form of praise for effort, behavior, and attitude. Students involved in the intervention typically are able to accumulate points for positive statements over time with a larger reward given at the end of the intervention period. In the context of the proposed study, PPR will be used within a group setting to help students spot character strengths and appropriate behavior aligned with the schools' PBIS expectations in an attempt to also improve peer relationships and identify the positive behaviors of peers. Students will be given time at the end of each intervention session to provide positive comments to 1-2 students within the group setting. Students are challenged to accumulate 75 or more positive comments over the course of the intervention period to be given a larger reward at the end of the 10-session group intervention.

#### **Contributions to the Literature**

PPIs have been identified as having the potential to increase student happiness and SWB within the school setting. PPIs have also been associated with better overall outcomes such as better social relationships, reduced aggressive behaviors, as well as an increase in positive emotions. However, PPIs typically focus on the upregulation of positive emotions, often without attention to the downregulation of negative emotions. The integration of positive behavioral interventions and supports with PPIs has the potential to alleviate this gap and help to promote complete mental health. Complete mental health is described as an increase in positive affect and life satisfaction) and a decrease in psychopathology (i.e., negative affect and conduct problems). Universal social, emotional, and behavioral screening has been examined as a potential mechanism for schools to identify students who may experience diminished mental health within the school setting. While there is guidance through policy on how to conduct such

screenings within the school setting, there is little guidance given on how to best support students identified as at-risk within the school setting.

More studies are needed that identify universal or selective interventions that may be effective within the school setting. However, recent guidance suggests that in order to address complete mental health within a MTSS framework, multiple interventions may need to be combined. By examining the effects of an evidence-based PPI when combined with an evidencebased behavioral support for socially withdrawn and socially aggressive youth, one can determine whether this is an acceptable and effective approach to promoting complete mental health within the school setting. This researcher hypothesized that by culturally adapting the intervention to the target population, students would be highly engaged and potentially more likely to incorporate elements of the WBPP into their home and school environments (i.e., spotting the strengths of others, performing acts of kindness, etc.). With more engagement in the sessions, students may be more likely understand and remember the concepts being taught, and thus able to apply it to different contexts. This researcher also hypothesized that improvements in emotional well-being, academics, social relationships, and behavior will be observed among all students participating in either intervention, but the effects would be more enhanced for students who also receive the behavioral intervention. The aim of this study was to evaluate the effects of a PPI with a behavioral support to identify an acceptable and effective approach to promote complete well-being in the school setting through social, emotional, and behavioral supports rooted in positive psychology and PBIS.

#### CHAPTER II: REVIEW OF THE LITERATURE

Providing social, emotional, and behavior (SEB) screening within the school setting is increasingly emphasized in legislature (Briesch et al., 2018). More research is needed to explore how to provide comprehensive supports in line with social, emotional, and behavioral challenges and the extent to which these supports may be beneficial for students. It is especially important to examine whether cultural adaptations to these supports may be helpful for diverse populations. To set the stage for the proposed study, this chapter will begin by exploring the current literature regarding the evidence for using a dual-factor model of mental health (DFM) within the school setting. With research suggesting that the downregulation of negative emotions and the upregulating of negative emotions are related to psychological and mental well-being, the DFM is a framework that best explains why it is important to assess both the presence of positive emotions and psychopathology in students and their link to academic achievement. This chapter will also examine the current literature related to effects of a multi-tiered systems of support (MTSS) for SEB on student-level outcomes. This discussion will also include a proposed MTSS model for providing such supports for students within the school setting. This includes the potential role of positive psychology and positive behavioral interventions and supports (PBIS), also referred to as school-wide PBIS (SWPBIS) in some studies, and more specifically the current research surrounding the Well-Being Promotion Program (WBPP) and positive peer reporting (PPR). Lastly, this chapter will identify the relevance and extent to which existing evidence-based practices (EBPs) for positive psychology interventions (PPIs) and behavioral interventions have been developed for and evaluated specifically with minoritized students. This

will include examples of culturally adapted school-based mental health interventions and PPIs as well as information related to common and acceptable adaptations to these interventions. This chapter will conclude with an overall summary of the evidence including what is currently lacking within the current literature and how the present study aims to address these gaps.

#### **Dual-Factor Model of Mental Health (DFM)**

The traditional model of mental health views mental health as the absence and/or presence of psychopathology (PTH) without regards to a person's level of subjective well-being (SWB). SWB has been defined as the including components of increased positive emotions, life satisfaction, positive affect, and low negative affect (Diener, 2000). The dual-factor model of mental health (DFM) posits that the absence of PTH alone does not constitute complete mental health as proposed in the traditional model. Rather, as first identified by Greenspoon and Saklofske (2001), the absence of elevated PTH in addition to the presence of high subjective well-being (SWB) constitutes complete mental health. With the DFM, both PTH and SWB are considered, and multiple studies have been conducted to assess the validity of such a system with adolescents and elementary students (for a review, see Suldo & Doll, 2021). Within the DFM, a person may fall into one of four categories: complete mental health (low PTH and high SWB), symptomatic but content (high PTH, high SWB), vulnerable (low PTH, low SWB), or troubled (high PTH, low SWB). To date, previous research has identified links between group membership and specific demographic factors (i.e., Suldo & Shaffer, 2008) as well as academic, behavioral, and emotional outcomes (i.e., Antaramian et al., 2010; Lyons et al., 2013; Suldo et al., 2011; Suldo & Shaffer, 2008). While we can expect between 57-67% of students to fall within the complete mental health group (Antaramian et al., 2010; Suldo & Shaffer, 2008), research is needed to better understand how to best support those who may fall into one of the

other three categories due to the links between group membership, race/ethnicity, socioeconomic status, and school-related outcomes.

A study conducted by Greenspoon and Saklofske (2001) began the wave of research on the DFM. In this study, participants included 407 students spread across 17 schools in Canada. Students ranged from grades 3 through 6 and 50% of the sample identified as male. With the unidimensional model of mental health, students were first classified as having high/low PTH. In an effort to identify two additional groups using a DFM, a series of discriminant function analyses were conducted. Group 1 (high SWB, low PTH), Group 2 (low SWB, high PTH), Group 3 (low SWB, low PTH), and Group 4 (high SWB, high PTH) were all identified in this study. Results of this study confirmed that if only psychopathology had been assessed, students in Group 2 would have been considered healthier than indicated and students in Group 4 would have been missed altogether as students in group 2 would have appeared healthier (i.e., higher subjective well-being) and students in group 4 would not have emerged as a separate from group 2. Without the additional assessment of SWB, multiple students may have been missed and would not have received additional supports. In addition, this study found that classification was consistently obtained for Groups 1 and 2, indicating that these groups are similar, yet distinct. This indicates the stability of these groups and the importance of assessing more than one area of mental health.

Suldo and Shaffer (2008) extended the work of Greenspoon and Saklofske (2001) to examine the existence of the dual-factor model in early adolescence. Participants in this study included 349 students (grades 6-8) from one middle school in a southeastern state. Student ages ranged from 10 to 16 years old and were 60% female. The sample was reported to be 55% Caucasian, 14% African American, 12% Hispanic or Latino, 10% multiracial, and 8% other

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ethnicities. Twenty-six percent of students were also identified as eligible for free or reducedprice lunch (FRL). Internalizing symptoms were self-reported whereas externalizing symptoms were reported by teachers. Youth with complete mental health (57% of the sample) scored low to average in internalizing and externalizing symptoms with a satisfactory level of SWB. With regard to demographic characteristics, students with low socioeconomic status (SES) and/or whose parents are not married were found to be significantly underrepresented in the complete mental health group while students with high SES and/or with married parents were found to be overrepresented. Youth identified as vulnerable (13% of the sample) were found to have low psychopathology as well as low SWB. Another group, symptomatic but content made up 13% of the sample and was found to be characterized by high psychopathology and average to high SWB. One last group, troubled emerged and made up 17% of the sample. Troubled youth were identified as having high psychopathology and low SWB. Within this troubled group, youth who are American Indian, low SES, and/or have unmarried parents were found to be overrepresented, whereas youth from high SES and/or married families were found to be overrepresented. The results of this study extended the four-group classification originally identified by Greenspoon and Saklofske (2001) with an adolescent population specifically in the United States. The study also brings to light the probability that students of low SES background and/or of unmarried parents may be at an increased risk of being identified within the troubled mental health classification and underrepresented within the complete mental health group indicating a potential need for additional supports for these students. The educational functioning of the complete mental health group was found to be superior to that of vulnerable peers on a test of reading skills, school attendance, perceptions of academic abilities, the value of schooling, as well as efforts directed toward self-regulation. The social functioning of youth with complete

mental health was also found to be superior to that of vulnerable peers in that these students reported fewer social problems as well as greater social support from peers and parents. While students of low SES and unmarried parents may be overrepresented in groups with diminished mental health, the identification of low SES or unmarried parents alone does not affect certain outcomes, but rather group membership does. It would be helpful to identify how to best support these students within the troubled group to increase SWB while reducing PTH in order to promote complete mental health. More information is also needed to determine how a troubled mental health status may affect student performance within the school setting, or whether race/ethnicity may also predict group membership.

Similar to Suldo and Shaffer (2008), Antaramian et al. (2010) investigated the utility of using a dual-factor approach to differentiate students, and examined between-group differences on school related variables (i.e., levels of student engagement, academic achievement, and environmental context). Participants included 373 7<sup>th</sup> grade students and 391 8<sup>th</sup> grade students (54.2% female). Majority of the sample identified as Caucasian (63.6%), followed by 29.6% African American, 2.6% Asian, 1.3% Hispanic, and 2.9% of other racial identities. A total of 20.5% of the sample were identified as eligible for FRL. The positive mental health group (i.e., students with complete mental health) was found to be the largest group (66.9%), followed by 17% symptomatic but content, 8% vulnerable, and 7.7% troubled. All groups were classified based on the same parameters as previous studies (i.e., Greenspoon & Saklofske, 2011; Suldo & Shaffer, 2008) in regard to levels of SWB and PTH. Similar to the study conducted by Suldo and Shaffer (2008), adolescents from nonintact families were found to be overrepresented in both the troubled and vulnerable groups. In terms of student engagement, mental health status had a significant effect with the highest engagement among students with positive/complete mental

health, and students in the troubled and vulnerable groups exhibiting the lowest levels of engagement. Students in the positive mental health group also demonstrated significantly higher grade point averages (GPAs) than students in all other groups with the effect size being the largest versus the vulnerable group. With regard to the environmental context to facilitate engagement and achievement (i.e., family and peer support and teacher-student relationships), this study found that the positive mental health group had more perceived family support than all other groups, with the symptomatic but content group reporting more perceived support than the vulnerable and troubled groups. Results were similar when analyzing perceived teacher-student relationships, with no difference observed between the troubled and vulnerable groups. Students in both the positive mental health and symptomatic but content groups also reported higher perceived peer support than both the vulnerable and troubled groups. The results of this study indicate that students with positive mental health may be more engaged in school, likely to experience better academic outcomes, and likely to also experience more peer and family support, as well as better teacher-student relationships. This provides evidence that students in the vulnerable and troubled groups may benefit from increases in SWB and/or decreases in PTH, while also providing support to improve teacher, family, and peer relationships. With research indicating that specific groups of students may be overrepresented in troubled and vulnerable groups, more research is needed on how to best support these students within the school settings, and to identify supports that could support both complete mental health through increases in SWB and social relationships.

Overall, there is evidence that the DFM demonstrates stability across populations. The findings that certain diverse groups are more likely to be underrepresented in the complete mental health group shows an area of concern for school-based professionals. The current

literature demonstrates the possibility of student SES and parental marital status being risk factors to look out for in the context of universal SEB screening. The effect of SWB seems to be more prominent than the presence or absence of PTH alone as proposed by the traditional model of mental health. Students with complete mental health typically experience better emotional, social, and academic outcomes. Typically, these students also experience better social support and less stressful life events. This research suggests the need to provide interventions that both foster SWB and reduce PTH, especially within the school setting where all children can hypothetically be reached. The next section introduces a reimagined MTSS model for promoting complete mental health through SEB supports using a DFM and the interventions or intervention components that may be promising. In thinking about the reimagined MTSS framework proposed by Doll and colleagues (2021), the discovery that certain groups of students are overrepresented in certain groups may strengthen the rationale for the delivery of culturally modified interventions. The next section of this manuscript explores the extent to which the DFM can predict school related outcomes, which is critical to document to determine the relevance of such a model in school settings.

# Multi-Tiered Systems of Support for Promoting Complete Mental Health via Social, Emotional, and Behavioral (SEB) Supports

An MTSS framework is typically a three-tiered model of service delivery. At the universal level, all students are offered the same supports. Universal screening provides schools with a means of identifying students who may be at-risk of developing later social, emotional, or behavioral problems in addition to those who may struggle academically in order to provide selective interventions for these students beyond what is offered to all students. The students identified by universal screeners usually receive selective supports in addition to what is

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provided to all students at the universal level. At the top of the tiered system, students who continue to demonstrate signs of significant impairment in some form receive an intensive, usually individualized support in addition to the universal and selective approaches in an attempt to relieve symptomology. In a book chapter written by Doll and colleagues (2021), authors proposed a reimagined MTSS framework for complete mental health that entails the promotion of emotional well-being and diminishing the impact of pathology using the three-tiered approach as aforementioned. As explained by Doll and colleagues (2021), a single intervention is not likely to address both psychopathology and well-being—the factors of complete mental health. A promising MTSS framework for complete mental health may entail multiple interventions at each tier described above, or different interventions for different subgroups of students.

Briesch et al. (2018) found that there are about nine states, including D.C., with no mention of universal SEB screening in any policies or procedures. Of the remaining 42 states, 95% included some reference to universal screening within the context of describing MTSS. Despite this, only one state, New Mexico, was found to provide policy that required universal SEB screening. While articles have been released that provide guidance on best practices in universal SEB screening, little research has been conducted that actually looks into the benefits of SEB interventions or how to effectively modify existing positive psychology interventions and incorporate elements of PBIS to address complete mental health via MTSS for SEB. This section explores the benefits of both positive psychology and PBIS in promoting elements of complete mental health. As described in the first chapter of this proposal, both PPIs and PBIS have been identified as potential strategies to combine in the promotion of complete mental health through an MTSS framework. This section also introduces two interventions, one aligned with positive psychology and the other with PBIS, that will be evaluated in the present study. The current research and evidence for the effectiveness of both interventions in promoting SWB or diminishing the presence of PTH will be explored.

## **Positive Psychology**

Positive psychology is regarded as the science of what makes people happy (Diener, 2000). Positive psychology interventions (PPIs) have been found to be effective in the promotion of SWB, psychological well-being, and reduction in depressive symptoms (Bolier et al., 2013). However, this does not include the reduction of externalizing forms of PTH such as aggressive behavior, withdrawal, bullying behaviors, or the occurrence of office discipline referrals (ODRs). Social emotional learning (SEL) has been defined as "the process through which all young people and adults acquire and apply the knowledge, skills, and attitudes to develop healthy identities, manage emotions and achieve personal and collective goals, feel and show empathy for others, establish and maintain supportive relationships, and make responsible and caring decisions," (CASEL, 2020). Within the core competencies of SEL outlined by the Collaborative for Academic, Social, and Emotional Learning are components of self-awareness, selfmanagement, social awareness, relationship skills, and responsible decision-making. Both SEL and positive psychology have been found to contribute to the promotion of positive mental health and subjective well-being, with positive psychology focused on helping individuals upregulate positive emotions whereas traditional SES emphasizes downregulating negative emotions (Quoidbach et al., 2015). Positive psychology interventions place a greater emphasis on helping students to feel good about their past, present, and future with a greater focus on personal growth through fostering hope, gratitude, resilience, and character strengths (Waters, 2011). Programs that have been evaluated for improvements in subjective well-being to date in middle school

samples include the Penn Resiliency Program (PRP; Gillham et al., 2007), Strong Minds (Burckhardt et al., 2016), and the Well-Being Promotion Program (WBPP; Suldo, 2016).

Waters (2011) conducted a first review of school-based PPIs. The aim of this study was to review the school-based interventions that were designed to foster student well-being and improve academic performance. Within this review, Waters (2011) reported that PPIs are significantly related to student well-being, relationships, and academic performance. More specifically, PPIs were found to foster hope, gratitude, serenity, resilience, and character strengths within students. Unfortunately, many of the studies reviewed did not use random assignment. In addition, many of these studies were conducted internationally. While this review evidences promise of PPIs for increasing students' SWB, more research is needed that allows for random assignment to compare effects of PPIs to other methods. More research is also needed within populations in the United States to determine whether the same effects can be observed.

Tejada-Gallardo and colleagues (2020) published a more recent review of school-based positive psychology interventions, focusing on an adolescent population. A total of nine studies were included in this meta-analysis. There was a total of 4,898 participants, ages ranging from 10 to 18 years (54% female) across the nine studies. The interventions in all nine studies were delivered in a group format, with programs ranging from 4 to 30 weeks. A significant small effect size was observed for SWB, psychological well-being, and effects on depression symptoms. Larger effects for both SWB and depressive symptoms were observed with a multicomponent positive psychology intervention that was combined with an additional positive intervention (i.e., Well Being Therapy and anxiety management strategies) than studies with a multicomponent positive psychology intervention only. The results of this meta-analysis demonstrate the promise of PPIs in enhancing the SWB of adolescents—one component of complete mental health. In addition, these studies show evidence for the likelihood of PPIs in decreasing the impact of depressive symptoms—another component of complete mental health. This meta-analysis also demonstrates the likelihood that larger effect sizes may be observed when a multicomponent PPI is combined with an additional support to reduce symptoms of psychopathology. More research is needed to determine which PPIs may be effective for the school setting, especially with minoritized populations as well as which combinations of interventions may specifically diminish the impact of externalizing forms of PTH in addition to the increases in SWB and reductions in internalizing forms of PTH observed in this study.

In part to identify whether PPIs may improve internalizing forms of psychopathology for adolescents, Shoshani and Steinmetz (2014) studied a school-based PPI intended to promote adolescents' mental health and well-being. Participants in this study came from a large middle school in Israel. A total of 537 7<sup>th</sup> to 9<sup>th</sup> grade students participated in a 1-year intervention program and were compared to 501 students in a demographically similar school. Results of this study found significant decreases in general distress, anxiety, and depressive symptoms for students who participated in the intervention. Results also indicated improvements in selfesteem, self-efficacy, and optimism. This shows promise in that PPIs target internalizing forms of psychopathology and also improves SWB. As targets of complete mental health, PPIs are showing promise in being effective for school-based use. However, more research is still needed within the United States. In addition, this study did not report the effect of PPIs on externalizing forms of psychopathology, indicating another gap in the research. More information is needed on how PPIs may reduce externalizing problems, or how PPIs may be modified to address such issues, if at all. It would also be beneficial to determine whether PPIs will need to be combined with an additional behavioral or positive support in order to diminish the impact of externalizing problems on student achievement and complete mental health.

#### The Well-Being Promotion Program (WBPP)

A promising PPI developed to improve the SWB of students within U.S. schools is the WBPP (Suldo, 2016). The WBPP is a 10-session multitarget, multicomponent positive psychology intervention based in Seligman's (2002) authentic happiness framework. Students engage in activities such as gratitude, hope, optimism, and exploration of character strengths to improve their feelings about their past, present, and future. Through the program, students are given "homework" assignments to complete aligned with session topics that increases the likelihood of better understanding and applying the concepts outside of the sessions. As identified by Doll and colleagues (2021), the WBPP has the potential of addressing one of two factors of complete mental health within an MTSS framework using the DFM.

Suldo et al. (2014) first evaluated the efficacy of the 10-session WBPP when used with middle school students who reported being less than delighted with their lives. A total of 55 6<sup>th</sup> grade students were randomly assigned to treatment or a waitlist control group. Majority of the total sample identified as either Caucasian (35%) or Hispanic (30%). The intervention group demographics were reported as 60% female, 25% Caucasian, 15% African American, 25% Asian, 30% Hispanic/Latino, 5% Native American, and 40% identified as low SES. The waitlist control group demographics were reported as 65% female, 40% Caucasian, 5% Asian, 30% Hispanic/Latino, 5% Native American, 10% multiracial, 10% other racial/ethnic group, and 40% identified as low SES. There were no African American students included in the waitlist control group. Participants in the study were aged 10-12 years. In assessing the acceptability of the intervention, 86% of respondents mentioned specific PPIs included within the 10-session

program as the most important aspects of the intervention, indicating that PPI components may be seen as beneficial by middle school students. Results of this study indicated that life satisfaction of students in the intervention group increased significantly from baseline to posttreatment while the control group declined during the intervention period. These gains in the intervention group were found to be maintained at the end of the school year. This study provides preliminary evidence for the usefulness of a comprehensive PPI on improving students' life satisfaction. In addition, the presence of study acceptability opens the possibility that students may find meaning within the intervention activities and thus may be more likely to continue applying the concepts after termination of the intervention period. More information is needed that identifies the effects of such an intervention on students' internalizing and externalizing forms of psychopathology to promote complete mental health within the school setting. More information is needed to address whether cultural modifications to this intervention are needed based on the demographics of the school, recognizing that using the intervention may change the results of the intervention. For example, this study included a majority White and/or Hispanic population, and by evaluating cultural adaptations for minoritized students (i.e., African American, low SES), schools may be more likely to use such an intervention in their respective school settings.

Roth et al. (2017) also examined the impact of the WBPP on student mental health, when provided via small groups of students in 7<sup>th</sup> grade. This study sought to examine the impact on students' SWB and symptoms of internalizing and externalizing forms of psychopathology. Participants in this study included 42 7<sup>th</sup> grade students (50% male; 83.3% White, 9.5% African American, 2.4% Asian-Pacific Islander, and 4.8% as other; 21.4% eligible for FRL) from one large middle school within a southeastern state. Student ages ranged from 11 to 13 years. Results

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of this study indicated that the change in student life satisfaction, positive affect, and negative affect of students who participated in the intervention outpaced the change observed in the waitlist control group. In addition, a significant decrease in positive affect was found for the waitlist control group at seven weeks follow up compared to the intervention group (p < .05). Internalizing and externalizing problems declined greater for the intervention group than the control group, although these findings were not statistically significant (p > .05). This study evidences promise in that the 10-session group PPI may be effective in improving seventh grade students' complete mental health compared to not receiving any supports. While the decreases in internalizing and externalizing problems were not found to be statistically significant in this underpowered study, it would be interesting to examine whether including elements of PBIS could increase the chances of these findings being statistically significant. While this 10-session includes elements based in positive psychology research, integrating a behavioral intervention that may improve relationships and students' ability to spot character strengths or positive behaviors in others may be of promise and aligned with positive psychology research. In addition, it would be beneficial to examine whether making cultural modifications to the intervention with a minoritized population may enhance the benefits of the program as this study evaluated a majority White male population.

Suldo and colleagues (2015) evaluated the same multitarget PPI (the WBPP) with an elementary age sample. Several sessions were modified to be developmentally appropriate for the elementary students in the sample, including by omitting the two sessions focused on optimistic thinking and hope due to the cognitive complexity required to complete the activities. Participants included 15 students in one fourth-grade class. The study only reports data from 12 students (ages 9 and 10) as the other 3 withdrew from the school during the intervention period.

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Approximately 67% of students were male, with 50% identifying as African American, 17% White, 17% Hispanic, 8% multiracial, and 8% Asian. About 92% of students were eligible for free or reduced-price school meals. Study staff were assisted by the classroom teacher when providing the intervention, and the retained nine sessions of the WBPP were provided classwide. Students were assessed pre- and post-intervention using the Positive and Negative Affect Scale for Children (PANAS-C; Laurent et al., 1999), the Multidimensional Students' Life Satisfaction Scale (MSLSS; Huebner, 1994), and the Students' Life Satisfaction Scale (SLSS; Huebner, 1991). Teachers completed a treatment integrity checklist, and children were also asked to complete a one-page form describing what they liked and disliked about the program. Results of the study indicated that students seemed to enjoy the intervention; 73% of respondents noted enjoying time with the facilitators and 55% of respondents indicated no suggestions for improvements. Furthermore, repeated measures analyses indicated statistically significant increases in positive affect and satisfaction with self from baseline to post-intervention. There were no statistically significant changes in mean levels of negative affect and no differences in the domains of school and family satisfaction. While this study shows promise in that students experienced increases in life satisfaction and positive affect, more information is needed to suggest in what ways can negative affect be diminished (e.g., the addition of a peer reporting intervention to increase social relationships). This study also shows promise in making developmental modifications with student acceptability as well as implementation with minoritized students, but more research is needed with cultural modifications within a middle school population to determine whether cultural modifications, aside from developmental modifications, may enhance the effects of the program.

The most recent evaluation of the WBPP was conducted by Lenz and colleagues (2019). The purpose of this study was to examine intervention effectiveness with elementary-aged students within a predominantly Hispanic school. The program sessions were delivered in five weeks versus 10 weeks, with two sessions delivered each week. Participants also engaged in a focus group interview at the conclusion of the intervention to determine how the intervention was perceived by the participants. No other adaptations to the original program were reported. Participants in this study included 34 students (53% male) in fourth (56%) and fifth (44%) grades. Approximately 68% of participants identified as Hispanic, 24% Caucasian, 6% Asian American, and 2% African American. Participants were assessed on indicators of protective factors and life satisfaction. From qualitative analyses, improved emotional expression (i.e., emotional vocabulary), enhanced self-discovery (i.e., character strengths), and increased empathy were all observed. Results of this study also indicated increases in reported protective factors as well as a significant change in life satisfaction. While this study shows promise in that students may experience an increase in potential protective factors and life satisfaction, more research is needed with a middle school population. This study also suggests that students of minoritized backgrounds may experience increased life satisfaction after completing the program in the form of increased empathy and improved emotional expression. It would be beneficial to examine whether we can also observe decreases in PTH, or if the addition of a behavioral support will enhance the effects of the program on complete mental health beyond just improvements in SWB. In addition, while this study holds promise, no adaptations beyond decreasing the length of the program and including focus groups were reported. More research is needed that evaluates the effectiveness of this program when culturally adapted for a population, with such research detailing the adaptations made.

Overall, the multitarget WBPP seems to be a promising intervention for increasing life satisfaction and positive affect. The extent to which negative affect can be diminished, especially within middle school samples, is less known. Further, it is possible that making cultural modifications to the program will not diminish the effects of the program and may contribute to student acceptability of the intervention for students of minoritized identities. More research is needed that examines the effects of the program after being culturally adapted to a minoritized population as well as whether the addition of a behavior support in line with a PBIS framework could result in additive effects for the program.

#### **Positive Behavioral Interventions and Supports (PBIS)**

Positive Behavioral Interventions and Supports (PBIS) is an evidence-based three-tiered framework for addressing student behavior through systems change (Center on PBIS, 2021). When implemented with integrity, PBIS has the potential to reduce exclusionary discipline (Bradshaw et al., 2010; Grasley-Boy et al., 2019) and improve social and academic outcomes (Bradshaw et al., 2010). PBIS is sometimes referred to as school-wide PBIS (SWPBIS) indicating a school-wide emphasis and implementation, rather than classwide. Most research on PBIS focuses on the effectiveness of PBIS on externalizing behavioral outcomes (i.e., ODRs), and few studies have investigated the effectiveness of PBIS on internalizing problems as improving symptoms of psychopathology includes reductions in both externalizing and internalizing symptoms. PBIS has been cited as a strategy that may be used within an MTSS framework based on the DFM (Doll et al., 2021). As such, identifying whether PBIS has an effect on reducing internalizing symptoms and the extent to which PBIS may improve students' SWB would be beneficial to schools wishing to promote complete mental health for their students. In addition, identifying whether PBIS may have effects on at least one component of

complete mental health with the potential for being combined with another intervention targeting a different component may be beneficial for schools who struggle to improve students' complete mental health for the purposes of academic achievement.

Nelen et al. (2021) examined SWPBIS specifically in Dutch elementary schools, to determine the relationship between SWPBIS implementation fidelity and student outcomes. Participants included 66 Dutch elementary schools (approximately 14,256 students) that were followed over the course of three years. Student demographic characteristics were not provided in this study. Results of this study found that an increase in fidelity scores were associated with a decrease in the number of students who reported that there were unsafe locations in or around their school campus. This indicates that SWPBIS is potentially linked to increases in school safety and school climate. In addition, this study found that changes in fidelity were also related to changes in both students' social well-being and the number of externalizing problems. This finding indicates that SWPBIS may have an impact on social and behavioral components of SEB. However, more research is needed to determine the specific effects on students' complete well-being in terms of social and emotional outcomes. This study is also limited in that it included a Dutch population. More research is needed to determine whether these same finding will hold true in the United States as well as if there are differential impacts of SWPBIS based on student demographic characteristics (i.e., race/ethnicity, SES).

Grasley-Boy et al. (2019) examined the effect of SWPBIS on student discipline in students with and without disabilities. A total of 544 schools implementing SWPBIS were propensity score matched with another 544 schools that had never been trained in SWPBIS. Results indicated that there were statistically significantly fewer out of school suspensions (OSSs) and days missing due to OSS across all students regardless of disability status, within

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schools implementing SWPBIS with fidelity. Students with disabilities were also found to be significantly less likely to be sent to alternative behavior in schools that implemented SWPBIS with fidelity. This study points to the fact that SWPBIS is found to be effective in reducing behavioral problems within the school setting that would typically result in a student being suspended from school, and thus missing valuable instruction time. However, this study does not show whether SWPBIS has any positive effects on students social and emotional skills or students' internalizing symptoms. Further, this study did not specify the types of externalizing behaviors that were reduced, but rather noted the reduction in OSSs. It would also have been helpful if this study identified whether these same outcomes could have been demonstrated based on student race/ethnicity, or socioeconomic status.

Similar to Grasley-Boy et al. (2019), Gage et al. (2019) also evaluated the effectiveness of schools trained in SWPBIS in reducing suspensions in comparison to schools that have never been trained. Researchers first identified 593 schools implementing SWPBIS with fidelity and propensity score matched these schools with 593 schools that have never been trained in SWPBIS. Results of this study were similar to that of Grasley-Boy et al., (2019) in that researchers found statistically significant fewer OSSs for students with disabilities. In addition, this finding was also held for Black students particularly within schools implementing SWPBIS with fidelity. This shows promise that SWPBIS may also be effective for minoritized and/or culturally diverse populations as long as schools are implementing SWPBIS with fidelity. However, this study did not compare SWPBIS to other methods, nor did this study include measures of student outcomes beyond school suspensions. More research is needed to also assess what level of fidelity is necessary for these outcomes to be obtained, or if including elements of SWPBIS (i.e., interventions aligned with PBIS principles) may be sufficient in improving externalizing behavior. This study also did not specify whether the schools investigated were primary or secondary.

Also examining the effectiveness of SWPBIS, Bradshaw et al. (2010) investigated 37 Maryland public elementary schools from five school districts to determine the effects of SWPBIS on student behavioral outcomes. Results of this study found that schools trained in SWPBIS reported a significant reduction in both percentage of students with a major or minor ODR as well as a reduction in the overall percentage of major and minor ODRs. Schools trained in SWPBIS also evidenced a reduction in the rate of overall suspensions while the rates of suspensions of untrained schools did not change. Although not statistically significant, this study also found that the standardized test scores of schools that were trained in SWPBIS tended to outpace improvements found by nontrained schools, hinting at the possibility of PBIS improving student academic achievement. This study echoes the research conducted by Grasley-Boy et al. (2019) and Gage et al. (2019). This study also points to the possibility of SWPBIS being effective in improving academic outcomes for students in schools that have been trained in the framework, possibly through reduced suspensions, and thus less time spent out of academic instruction. More research is still needed to identify whether SWPBIS improves internalizing symptoms as well as social and emotional skills of students in such schools, or if the improvement in standardized scores is more indicative of less disruptive or externalizing behavior in the classroom.

McIntosh et al., (2011) extended the research on SWPBIS by examining effects of SWPBIS on externalizing behavior, academic achievement and perceptions of school safety. This case study included a mid-size urban public school district including 49 schools in Canada. Approximately 15,000 students were enrolled and included in the analyses. A total of 11 elementary school (grades K to 7) and one secondary school (grades 8 to 12) were implementing SWPBIS. The original purpose of the study was to examine the value of evaluation plans of this school district. The results of this study found that implementation of SWPBIS was related to positive outcomes in problem behavior, academic achievement, and school safety perceptions. Community risk factors was also found to be less of a risk factor for schools that implemented SWPBIS. While based in Canada, this study provides preliminary evidence for the impact of SWPBIS on student outcomes beyond just externalizing behaviors. More research is needed in this area when looking at components of SWPBIS or other behavioral efforts especially within the United States. In addition, this study did not specify what positive outcomes on problem behavior or academic achievement were observed, whether that was in relation to fewer ODRs, improved GPAs, improved school attendance, or better standardized test scores.

To identify whether the effects of PBIS alone are superior to the effects of social emotional learning (SEL) alone or whether a combination of the two may yield better outcomes, Cook et al. (2015) investigated two large elementary schools in the southeastern U.S. The purpose of this study was to examine both the independent and combined effects of PBIS and SEL on student mental health outcomes. Both schools included in the study were reported to serve a high proportion of economically disadvantaged youth. School 1 included a 51% female population (82% White, 16% African American, 2% other) with 84% of the population also identified as eligible for FRL. School 2 included a 47% female population (22% White, 73% African American, 5% other) with 91% of the school population identified as eligible for FRL. There was a total of 191 students across 8 classrooms with an average age of 9.8 years included in the study analyses. Using separate measures for externalizing and internalizing behavior, this study found that the combination of PBIS and SEL (COMBO) demonstrated significantly greater change from pre to post than SEL alone, PBIS alone, and business as usual (BAU) conditions in reducing externalizing symptoms. The study also found that the COMBO condition demonstrated significantly greater change than PBIS only and BAU in reducing internalizing behavior, but not SEL alone. Although the combination of PBIS and SEL was equally effective as SEL alone in reducing internalizing problems, results are still promising in that the combination of these may be better for student mental health (in terms of internalizing and externalizing behaviors) than just PBIS or SEL alone. This study illustrates the need to further understand how to best integrate the two approaches for overall complete mental health whether that is through the combination of positive psychology interventions that have been found to upregulate positive internalizing emotions and PBIS which has demonstrated the decrease of externalizing symptoms.

In general, PBIS is an effective set of strategies for improving student problem behavior. This improvement in problem behavior could be associated with reductions in ODRs and OSSs which can increase the amount of academic time that a student receives. While SEL has been identified as a means of improving social and emotional skills, research has found that the combination of PBIS and SEL may be associated with better outcomes than either approach alone, and could be an indication of the potential in combining PBIS with an approach that could improve student positive emotions. More information is needed that best describes how to integrate the two approaches and whether that may be completed through the use of positive psychology interventions. In addition, the extent to which individual components of PBIS (i.e., interventions aligned with PBIS) are effective in reducing problem behavior is something that should be explored. One such intervention aligned with PBIS that was developed to improve the behavior and social relationships of socially withdrawn and/or disruptive children is described below.

## **Positive Peer Reporting (PPR)**

Peer reporting interventions are typically aligned with PBIS and have been cited as a potential way to encourage wellness-promoting behaviors in the school setting (Doll et al., 2021). Peer reporting interventions, typically implemented at the tier one level, also have been found to have a non-zero, positive impact on student outcomes, such as increases in appropriate behavior and decreases in inappropriate behavior (Collins et al., 2020). Positive peer reporting (PPR) is a form of a peer reporting intervention and is an evidence-based behavioral intervention for improving the behavior of socially rejected and/or disruptive children (Skinner et al., 2002). PPR involves giving points to classmates for making positive comments about a target students' prosocial behavior (Ervin et al., 1996) such as social interactions, academic engagement, or other factors outlined by the schools PBIS expectations. Common components of the school based PPR intervention include designating time for positive comments, offering positive reinforcement, and offering feedback regarding the appropriateness of comments made (Murphy & Zlomke 2014). Creative titles for recipients of praise have also been utilized in prior studies of PPR. The effectiveness of PPR has been evaluated classwide in elementary and middle school populations and are reviewed below.

Most recently, Collins and colleagues (2020) conducted a meta-analysis of peer reporting interventions. Peer reporting interventions requires students to observe and report on the positive behavior of their peers. These interventions typically capitalize off of peer influence in promoting appropriate behaviors. Of the 21 studies that met inclusion criteria, 61.9% of studies included tootling, and 42.9% of studies included PPR. Most of these studies included an

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interdependent group contingency, meaning that students worked towards a shared group goal. For increases in behavior, the overall effect size across the studies was observed to be about 0.28, or a 32% increase in behavior from baseline. The overall effect for decreases in behavior was observed to be -0.48, or about 62% decrease in behavior from baseline. A Tau calculation determined that there is no overlap in about 72% of the data. The positive impact observed in this meta-analysis was not determined by specific categories of behaviors (i.e., disruptive behavior, academically engaged behavior, and social behavior). The results of this study indicate that tootling, and PPR has the potential for reducing inappropriate behaviors and increasing appropriate behaviors. Unfortunately, most of these studies included tootling. As such, more information is needed to determine the effectiveness of PPR with this population, and any modifications that may be necessary to promote generalization.

Moroz and Jones (2002) evaluated the effects of PPR on elementary students' social involvement. Participants in this study included three elementary students referred by their classroom teacher due to low rates of peer interactions, regardless of conduct problems. All three participants were Caucasian females ages 7, 8, and 10 years old. Social involvement increased for all three participants during the course of the intervention (two weeks), but only remained high for one participant following termination. However, results indicated a high treatment acceptability reported by teachers, with two of three teachers planning to use PPR in subsequent years. While results indicate that the effects of PPR during treatment can improve social involvement, more research is needed to determine whether a longer treatment phase may result in improved long-term outcomes. In addition, it would be helpful to determine the acceptability of the treatment from a student's perspective. It would also be helpful to determine the effects of

PPR in middle school populations and whether these effects may translate to decreases in externalizing behaviors.

Morrison and Jones (2007) examined the effects of PPR as a classwide positive behavior support in two third grade general education classrooms. A total of 27 students (approximately 93% African American, 7% White) were included in this study. Approximately 95% of the school's enrollment was classified as economically disadvantaged and qualified for free or reduced-price lunch. PPR was utilized in a way that all students in each classroom had the opportunity to give and receive positive statements. In both classrooms, the frequency of behavioral events from baseline to treatment decreased during the course of the intervention. The number of "socially isolated" students based on sociometric nomination also decreased after the intervention phase. The results of this study show promise in that using PPR in a way that allows all students to benefit rather than singling out a few students may improve the effects of the intervention. This study indicates that improvements in externalizing behavior after the intervention phase, especially in minoritized and economically disadvantaged populations may be possible with PPR. However, more information is needed to determine the acceptability and the effectiveness of this intervention in middle school populations.

Chaffee et al. (2020) examined the effects of a classwide PPR intervention on middle school students' behavior. This study utilized a single-subject A-B-A-B-C reversal design in two middle school classrooms meaning that the intervention was withdrawn and presented twice before a maintenance phase was introduced. The school populations included approximately 19% receiving free or reduced lunch, 6.5% English Language Learners, and 19.1% receiving special education supports. One classroom in the study included 17 students (59% male; 59% White, 35% Asian American, 6% Black). The other classroom included 24 students (54% male;

67% White, 21% Asian American, 12% Black). During the implementation of the intervention, both classrooms exhibited increased academically engaged behavior and decreases in disruptive behavior. The effects decreased during the withdrawal phase demonstrating that the intervention was improving behavior and no other factors contributed to this change. It remained that academically engaged behavior was higher than baseline as well as disruptive behavior was lower than baseline even during withdrawal. One classroom reported enjoying the intervention more than the other classroom. The results of this study support the possible utility of PPR in increasing academically engaged behavior and reducing disruptive behavior. Although conducted with a middle school population, this study did not include a high number of students from minoritized groups. While the study does demonstrate possible acceptability of the intervention, it would be helpful to determine the effects of the intervention with minoritized populations, and whether similar decreases in disruptive behavior and increases in academically engaged behavior may be observed.

In sum, there is a growing evidence base demonstrating the effectiveness of PPIs on students' subjective well-being. One acceptable PPI includes the WBPP, which has been found effective at improving the positive affect, life satisfaction, and in general, the SWB of elementary and middle school students. The extent to which this intervention may improve externalizing forms of psychopathology is unknown. With the promise of PBIS improving externalizing outcomes, it may be beneficial to incorporate behavioral components aligned with positive psychology research into evidence-based PPIs. PPR is an acceptable intervention that has been found to reduce the frequency of disruptive behavior and improving academic engaged time as well as social interactions. More research is needed to better understand how this approach may improve students' complete mental health as well as academic outcomes as

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research has demonstrated that students who are considered troubled or vulnerable based on the DFM may experience diminished social relationships and support. It would also be necessary to examine the acceptability of such an intervention with minoritized populations. Furthermore, whether or not cultural adaptations to link interventions to student individual values and goals may improve the effects of the intervention may be another focus area for research. The section below explores culturally competent practices and the relevance of making such adaptations to evidence-based interventions for minoritized students.

## **Culturally Competent Practices**

The extent to which existing evidence-based practices (EBPs) for PPIs and behavioral interventions have been developed for and evaluated with minoritized students is still lacking. This limitation is not unique to interventions designed to foster SWB or reduce externalizing problems. Many EBPs in mental health care have not been culturally adapted, or not evaluated with minoritized students. An evidence base update conducted by Pina and colleagues (2019) regarding psychosocial interventions for ethnic-minority youth details that the research literature remains mostly focused on testing interventions with White students with little to no progress made with some groups, particularly Asian American or Native American youth. A review of evidence-based treatments for ethnic minority youth demonstrates that most studies conducted on psychosocial interventions involve low statistical power and poor representation of minoritized youth as well as the lack of studies that evaluate the effects of cultural adaptations (Huey & Polo, 2008). With best practices that emphasize the utilization of evidence-based interventions that have been formally evaluated with the target population, more research is needed that uses these minoritized populations in particular. One acceptable approach to this issue is to adapt evidence-based protocols based on the contexts, language, and culture of the

population being served (Bernal et al., 2009). As such, this section first introduces research that demonstrates the relevance of cultural adaptations, then reviews proposed guidelines for culturally adapting PPIs as well as the typical cultural adaptations to PPIs deemed appropriate for use with ethnically minoritized youth.

## Efficacy of PPIs with Diverse Groups of Youth

Khanna and Singh (2019) sought to determine whether replicating Seligman et al.'s (2005) initial positive psychology activities with adolescents would demonstrate similar results with a different culture and demographic group. Participants in this replications study by Khanna and Singh (2009) included 372 Indian adolescents (56% male) ranging in ages from 11 to 13 years. Students in this study came from two schools; 12 participating 7-8th grade classrooms were randomized across 5 intervention groups (three good things in life, gratitude visit, you at your best, using signature strengths, using signature strengths in a new way) with one control group (recalling early memories). Participants completed self-report measures of well-being (Mental Health Continuum—Short Form), affect (Scale of Positive and Negative Experience), happiness (Brief Multidimensional Students' Life Satisfaction Scale and Steen Happiness Index), and depressive symptoms (Centre for Epidemiological Studies-Depression Scale) both pre- and post-intervention. There was an overall significant effect observed at time 2 for all measures with some measures demonstrating differences between intervention groups. In general, results of this study demonstrate that some activities were not associated with significant quantitative gains. In particular, students who engaged in gratitude visits and using signature strengths in new ways demonstrated better gains in well-being, life satisfaction, and happiness than the students who recalled three good things in life. Other groups (students who recalled early memories for a placebo control) did not demonstrate significant effect on the well-being measures. The results of this study demonstrate that although there is promise in positive psychology activities, there may be differential effects for different populations. More research is needed to determine what activities may be more effective at improving the well-being of other demographic groups. It is important to note that this study took place in India, and future research should determine whether similar patterns may be observed in the United States. It would also be helpful to determine whether adaptations to these interventions may yield better gains in well-being outcomes.

## **Guidelines for Cultural Adaptations of PPIs for Minoritized Youth**

In preparing to make cultural adaptations to a PPI, Hendriks and Graafsma (2019) developed and proposed a four-phase iterative process for adapting interventions, as well as 17 guidelines to consider. The four phases-inventory, adaptation, implementation, and evaluation align with the 17 guidelines proposed. In inventory, the background information of a targeted population is collected. Among the guidelines aligned with this phase included gaining a general awareness of the target population, creating stakeholder involvement, gathering demographic data of participants, identifying strengths and virtues of the target population, and identifying flourishing factors that can be used to facilitate resistance. This background information that is collected is used in the adaptation phase to ensure that the adaptations made are relevant to the population, and so that appropriate positive activities are selected and included. Such adaptations, as written in the proposed guidelines, can include using a positive role model, understanding the spiritual framework of participants, integrating religious practices and rituals, integrating culturally appropriate meditation, using trainers who are local and possess specific cultural knowledge relevant to the target population, speaking the language of the participants being mindful of communication styles, and finally identifying any primers, or elements that

promote a positive change such as the layout of desks and chairs in the room. Continuing into the implementation phase, planning of the intervention logistics include a plan to monitor the adherence to session protocols. Hendriks and Graafsma (2019) proposes selecting activities that balance between individual and group well-being. This phase can also include a pilot study if necessary. For evaluation, it is proposed that one is conducted on the trainer, one for participants, and one for stakeholders. The includes evaluating attrition and participant perceptions of the trainer or facilitator. Throughout the adaptation process, the final guideline reminds practitioners to document everything. While there have been studies that have analyzed adaptations made to PPIs, few studies reported adaptations in enough detail to determine the effectiveness of such adaptations. Future studies should aim to apply these guidelines for a more uniformed process of applying adaptations to PPIs. In doing so, practitioners will be better able to adapt evidencebased treatments for students of diverse ethnic and cultural backgrounds and determine which previously adapted intervention may be effective for a targeted population for efficiency in providing supports. Overall, Hendriks and Graafsma (2019) provided clear and detailed guidelines for culturally adapting PPIs.

Brown et al. (2018) conducted a systematic review of the types of cultural adaptations that were made for SEB interventions, specifically for students of color. In this review, a total of 10 studies met inclusion criteria. This review sought to address the gap between scholarly recommendations for culturally adapting interventions and the methods for putting these recommendations into practice. This review also sought to identify the most common methods used to adapt interventions for students of color. Results of this review found that in the area of content adaptations, 100% of the studies included in this review made adaptations to the language of the intervention, mostly adapting to the language of the population of interest. Additionally, most studies (80%) made adaptations to the content of the intervention to match the social and economic values of the target students. Adaptations to metaphors, concepts, and the overall goals of the interventions were reported less frequently (40%, 40,%, and 20%, respectively), yet still may be beneficial to students. This indicates that most interventions may only be adapted in the realm of language and overall content to match the language and values of the students that they are intended for, but other adaptations have been examined. It may also be useful to adapt metaphors and concepts to the cultures of the students targeted. In addition to content adaptations, this review analyzed the extent to which implementation adaptations were employed. All of the studies in this review made adaptations to the implementer by matching the characteristics of the implementer to the characteristics of the population of interest. A little over half of these studies also found it helpful to provide adaptations in the location of the interventions (i.e., classroom or other location). About 70% of the studies also found it helpful or relevant to adapt the context in which the interventions were implemented. Less frequently, intervention methods and the persons conducting the interventions (i.e., teachers versus mental health professionals) were employed. Although this study did not evaluate the extent to which these adaptations enhanced or decreased the effects of the intervention for minoritized populations, this study provided some information as to the most common adaptations to such interventions. More research is needed to identify how and if these modifications may be perceived as acceptable to the youth participants, and ultimately improve the effects of evidencebased protocols for minoritized students.

Schick and colleagues (2021) proposed using the social-ecological model as a framework for making adaptations to PPIs, specifically for Native American Indigenous (NAI) populations. The social-ecological consists of four levels–individual, relationships, community, and society, which are presented as concentric circles. With this proposed method, a practitioner would have to think about how the PPI can be adapted at each level. In presenting the use of this framework, Schick and colleagues (2021) also provided examples of adaptations of PPIs for NAI populations in this paper. The individual level the practitioner should consider the biological and psychological factors relevant to an individual when selecting and adapting an intervention. An intervention that can be used is identifying one's signature strengths and using them in new ways. For NAI populations, Schick et al. (2021) proposes considering how an individual can use their strength to benefit the larger community. At the relationship level, activities should be related to both familial and non-familial connections. A PPI that can be modified to emphasize supportive and caring relationships with others is the "You at Your Best" activity. In this activity, an individual would write about a time when they felt that they were at their best. An adaptation as described by Schick and colleagues (2021) would involve writing about the family or the community instead of the individual person. This a time that the client can reflect on the strengths of the family or the community and describe a positive memory. At the community level, practitioners should focus on the physical and social environment, including role models and opportunities. A PPI that can be adapted to fit this level is performing random acts of kindness. To connect more to the community, an individual could perform an act of kindness that promotes community connectedness such as volunteering with youth or visiting elders (Schick et al., 2021). Lastly, the societal level includes considering social and cultural norms and practices. For NAI populations specifically, this could include embracing one's culture and heritage and being involved with cultural activities. To apply this to other populations, and in line with the guidelines suggested by Hendriks and Graafsma (2019), a practitioner should collect background information about the target population which will be used to inform the adaptations that will

most likely be relevant to the cultural context. This paper, in addition to guidelines proposed above (Hendriks & Graafsma, 2019) are promising starting points for those who wish to implement adaptations to PPIs. More research is needed that considers these guidelines as well as the social-cultural framework with diverse populations and measures the effectiveness of applying these tools.

## **Examinations of Culturally Adapted SEB Interventions including PPIs**

To address the lack of emotional well-being interventions for Hispanic/Latino adults atrisk for cardiovascular disease, Hernandez and colleagues (2018) piloted an 8-week well-being intervention that was based on positive psychology. Participants in this study included 16 Hispanic/Latino adults (68.80% female) with a mean age of 54.06 years. Research assistants recorded the blood pressure of each participant at baseline and post-intervention. Participants completed a brief questionnaire to elicit background information and were given an accelerometer to monitor their physical activity for the duration of the study. Participants also completed self-report measures of psychological well-being, emotional well-being, and subjective health status at baseline and post-intervention. Measures of psychological well-being included depressive symptoms (Center for Epidemiologic Studies-Depression scale [CES-D]), optimism (Life Orientation Test-Revised [LOT-R]), emotional vitality (select items from the General Well-being Schedule), happiness (Subjective Happiness scale), and overall psychological functioning (Mental Health Composite Scale of the 12-item Short Form Health Survey [SF-12]). Activities included in this intervention were identifying an individual's signature strengths (week 1), expressing gratitude and writing gratitude letters (weeks 2-4), and mindfulness meditation and positive reappraisal (weeks 5-7). Similar to an adaptation proposed by Schick et al. (2021) for NAI populations, the final week of the intervention involved

participants to invite at least one family member and identify strengths of friends, family, or the larger community. Results of this study indicated a 57.89% completion rate, with reasons for dropout being unrelated to the intervention or delivery method. At the end of each session, participants reported satisfaction with the session (97.10%), satisfaction with the skills taught (98.50%), satisfaction with the in-session activity (98.50%), and confidence in their ability to apply the skill to their life (98.60%). Approximately 72.70% of participants demonstrated reliable improvement in the usage of happiness-inducing behavior at post-intervention as well as 54.50% of participants in emotional vitality and 27.30% of participants in subjective happiness. Both the increases in emotional vitality and subjective happiness were found to be statistically significant. There were no statistically significant changes found in relation physical health. While this study explores PPIs with adult populations, it shows promise in that culturally adapted PPIs may improve the emotional well-being and subjective happiness of participants. This study also demonstrates that participants are typically satisfied with the culturally adapted program. However, similar studies are needed within the school setting with adolescent populations to determine whether similar increases may be observed. Similar research is also needed in multiple populations as much of the research on PPIs tend to involve White populations. It would also be interesting to see if providing the culturally adapted intervention in the school setting would eliminate the potential of participant dropping out prior to program completion since participants in this study were clients in a clinic setting.

A case study conducted by Cressey (2019) sought to illustrate an interdisciplinary system of targeted support. Drawing from SEL, PBIS, and culturally responsive practices (CRPs), this case study outlined how to best develop a system for culturally responsive SEB supports. Over a three-year period, this case study started with a PBIS framework and made small adaptations to a selective, tier two Check In/Check Out (CICO) intervention for a large Spanish/English bilingual K-5 school in the Northeast. A total of 681 students (66.9% Hispanic, 22.5% White, 3.7% African American, 3.2% Multiracial, 0.6% Asian, and 0.1% Native American) attended this urban/suburban school. A total of 59.5% of students reported English as a second language, 19.5% of students were reported as a student with a disability, and 47.1% of students were categorized as economically disadvantaged. PBIS was identified as a strong influence throughout the change process. Of the adaptations made, Cressey found that adjusting incentives for CICO that were found to be culturally responsive to the interests and strengths of the students was more accepted and appreciated by the students. For example, students may have been awarded more basketball play time for their progress and were more likely to attempt to earn this award by performing in socially appropriate ways. Students eventually were more engaged, and by the end of the study, all students were meeting or exceeding their goal in behavioral points. This case study indicates that a culturally responsive system can be developed, and this system can improve behavioral outcomes of students. A culturally responsive system must be relevant to the population of interest taking into consideration their personal goals. Furthermore, this study demonstrates that providing incentives that are culturally relevant to students' interests and strengths may increase engagement with the targeted intervention, and thus retention and application of the skills learned. More research is needed on how other adaptations may improve students' complete mental health (i.e., adaptations to the content or implementation of an intervention). However, by adjusting incentives of a program, we may be able to engage students more in the intervention components which may lead to better outcomes.

Regarding the effects of a culturally adapted program on students' internalizing problems, Cramer and Castro-Olivo (2015) examined student self-reports of resiliency and

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social-emotional internalizing problems to determine the intervention effects of a culturally adapted SEL program. Specifically, the Strong Kids SEL program was culturally adapted for Spanish-speaking students. Participants in this study included 34 students in grades 9 and 10, but only 20 students completed all data points and were included in the study analyses. Student demographics were reported to be primarily Latino/Hispanic (75%) followed by 15% African American, 5% Caucasian, and 5% of unknown racial/ethnic group. Approximately 25% of students reported being born in Mexico, and 40% of students reported Spanish as their primary language. Twenty-five percent of students reported both English and Spanish as their primary languages. Most of the students (95%) were identified as eligible for FRL. Cultural adaptations to this program included (a) interventionist training to the cultural needs of the group, (b) encouraging students to consider their own culture in the application of SEL skills, (c) introducing concepts of acculturative stress and ethnic pride, (d) encouraging students to consider the application of SEL to home and school considering their unique life circumstances, and (e) instructing students to set goals for home and school that considered their cultural values. Results of this study demonstrated statistically significant gains in student self-reported resiliency immediately after the intervention measured by the Behavioral and Emotional Rating Scale-Second Edition, Youth Rating Scale (BERS-2 YRS). These gains were found to be maintained at two-month follow up. There were no statistically significant reductions in students' self-reported internalizing problems. Despite mixed support for impact on mental health, there were high levels of intervention acceptability and relevance reported by participants. This study demonstrates that while cultural adaptations to interventions may not always produce immediate effects on all target outcomes, these adaptations are accepted as culturally relevant to students. Further, these adaptations may better foster resiliency and

improve protective factors of culturally and linguistically diverse students through the use of better engagement and application to their home and community settings. Future research should focus on how these adaptations may affect student SWB and complete mental health, beyond just internalizing psychopathology. It would also be helpful to identify whether these same adaptations (i.e., considering concepts to their life circumstances, setting goals at home and school that consider their cultural values, and encouraging application of skills to their own culture) may be helpful among racially diverse populations.

To evaluate the effectiveness of a culturally adapted multicomponent PPI on resilience, Hendriks et al. (2020) conducted a randomized control trial of 158 adults in the Caribbean. This study was conducted in the Netherlands during an economic recession. Employees were recruited from three different companies and screened based on age, fluency in Dutch, and availability. A total of 158 employees (39.9% male) were included in the final sample with a mean age of 36.53 years. Participants completed self-report measures of resilience, mental wellbeing, depression, anxiety, stress, psychological flexibility, financial distress, positive and negative affect, and client satisfaction. Hendriks et al. (2020) adapted the Strong Minds Suriname program by reducing the number of sessions to six, revising assessment measures, renaming the sessions to appeal to clients, using facilitators who matched the demographic features of the participants, developing a new session based on research with this population, and adapting the language in the manual. Results of this study demonstrated significantly higher levels of resilience, mental well-being, and positive affect with decreases in levels of depression, anxiety, and negative affect. There were no significant differences for stress, financial wellbeing, and psychological flexibility. Improvements in all outcome areas except for psychological flexibility were observed, while only differences in positive affect from post-intervention to

follow-up were deemed significant. This study demonstrates that there is promise in improving resilience, mental well-being, and reducing symptoms of depression and anxiety with culturally adapted multicomponent PPIs. Similar to the guidelines proposed by Hendriks and Graafsma (2019) the researchers ensured that they began with collecting background information to help determine which adaptations would be beneficial for their target populations. More research is needed with other diverse populations, with other programs, and in school settings to determine whether generally, the process of culturally adapting PPIs may prove beneficial for diverse students.

Being that Cressey (2019) found some success in a targeted intervention by adapting incentives to the strengths and interests of students, it would be helpful to identify how to adapt interventions aimed at broadening students' strengths beyond the VIA classification to include community-specific strengths. Rashid et al.'s (2013) chapter on the assessment of character strengths in children and adolescents provides a promising framework to consider. Rashid and colleagues conducted three studies that examined a strength-based approach to a PPI. In study one, researchers randomly assigned 6<sup>th</sup> grade students to either the PPI group or a control group. Participants were mostly males (41% females) with a mean age of 11.77 years. The eight-session group format intervention included students writing a "You at your best" story, introduction to and identification of character strengths, applying character strengths to solving problems, and recognizing the character strengths of others. Results of the study found that there was no change on measures of depression or life satisfaction, however, statistically significant changes were found in student well-being and social skills. At 6-month follow up, these gains were maintained in well-being, but not social skills. Study two was a replication of study one with a population that presented with elevated behavioral and emotional challenges. Demographics of this

population were not reported, but a total of 43 6<sup>th</sup> grade students were included in analyses. The Negativity Bias exercise was added in this replication study. While no differences were observed between intervention and control groups on any outcome measures, it was found that participants' degree of enjoyment was related to how much they perceived they learned from being in the group. Although not measured, teachers also reported that students who participated in the intervention group started discussing their strengths and their problem-solving skills improved over time. The third study addressed the challenges observed in study 2, mainly that many of the students had trouble completing the VIA classification of character strengths or the student did not want to explore their strengths. Participants in this study were 59 6th grade students from two Canadian elementary schools with a mean age of 11.76 years. Majority of the sample were identified as females (53%) and 42% of the sample identified as Caucasian, followed by 21% Asian. About 19% of participants were from a Chinese background. Instead of doing structured lessons as in the first two studies, the teacher integrated strengths into the curriculum and parents were given strategies to share with their students. There were no structured exercises in the third study. Overall results indicated that the use of signature strengths improved social skills, and parents reported improvements in problem behaviors. There were also significant teacher-reported improvements in students' academic performance. The inclusion of character strengths in problem solving and the curriculum as well as parent involvement seemed helpful in improving outcomes for these sixth-grade students. The results of these studies should still be taken in context being that each intervention was slightly different and measured different outcomes. However, this chapter provides evidence that the instruction and incorporation of character strengths into the curriculum and school setting may be beneficial for students' academic achievement. By broadening the use of character strengths and applying

these strengths to both home and school, students may benefit both academically, socially, and emotionally. More research is needed that best demonstrates how to adapt interventions provide the cultural relevance of character strengths for the improvement of student life satisfaction.

### **Summary and Conclusion**

With the emphasis on providing SEB supports within the school setting increasing, more research is needed to explore how to provide comprehensive supports and the extent to which these supports may be beneficial for students. Research has demonstrated that the DFM is a useful model for exploring complete mental health in youth (Suldo & Doll, 2021). Those with positive mental health typically experience better outcomes and resources than those who are considered to be troubled or vulnerable (Suldo & Shaffer, 2008). More research is needed that identifies how best to support those who may be identified with less than positive mental health. In thinking about providing SEB supports through MTSS, it is possible that the integration of PBIS and PPIs may prove to be an effective mechanism for improving SWB and both internalizing and externalizing forms of psychopathology (Doll et al., 2021). Some research supports that PBIS combined with SEL has been found as a superior mechanism than either component alone in the improvement of student related outcomes (Cook et al., 2015). PBIS alone has demonstrated effectiveness in the reduction of ODRs and OSSs, thus improving academic instruction time and possibly academic outcomes (Bradshaw et al., 2010; Grasley-Boy et al., 2019; McIntosh et al., 2011). PPIs have historically demonstrated effective in improving students' social and emotional skills in addition to reductions in certain forms of internalizing psychopathology such as anxiety and depressive symptoms (Bolier et al., 2013; Shoshani & Steinmetz, 2014; Tejada-Gallardo et al., 2020). When thinking about applying these frameworks within CRPs, more research is needed that identifies what cultural adaptations may be more

significant or relevant for minoritized populations. Suggestions for how to modify the WBPP and PRP to best serve students from minoritized groups can be gleaned from the literature (Brown et al., 2018; Cramer & Castro-Olivo, 2015; Hendriks & Graafsma, 2019; Hendriks et al., 2020). As such, this study aims to close the gap in research by examining a culturally adapted PPI that has been combined with a behavioral intervention that will be rooted in the schools' larger PBIS implementation plan.

## CHAPTER III: METHODS

The present study was designed to examine the effects of a culturally modified group well-being intervention on the social, emotional, and behavioral functioning of racially and ethnically minoritized elementary and middle school students, when combined with a behavioral support. This chapter describes the setting and participants, procedures used during recruitment, and measures that were used in screening and pre- and post-assessment. The interventions implemented used are described, including the cultural adaptations that were included in a 9session version of the Well-Being Promotion Program (WBPP; Suldo, 2016), a positive psychology intervention that has demonstrated prior effectiveness in increasing subjective wellbeing of middle school student samples. The positive peer reporting (PPR) intervention is described with an emphasis on how it was used in this study. This chapter also describes important ethical and COVID-19 related considerations.

#### **Research Design**

This study used a quantitative pre/post research design. This study is classified as a true experiment. A true experiment includes random assignment and allows for better internal validity than other designs such as a quasi-experimental design. However, limitations may include reduced external validity due to the inability to control for extraneous variables such as homeroom teacher, student age, home life experiences, extracurricular activity involvement, adverse childhood experiences, and others. Participants in this study were stratified by grade level and randomly assigned to participate in either a culturally adapted version of the Well-Being Promotion Program (WBPP; Suldo, 2016) only, or the adapted WBPP with an integrated

behavioral support, positive peer reporting (PPR). Students were first screened for life satisfaction and presence of conduct problems to be included in the study. Measures of SWB (i.e., positive affect, negative affect), psychopathology (i.e., internalizing problems, and externalizing problems), and relationship satisfaction (i.e., peer relationships) were collected preand post-intervention. In addition, students self-reported demographic characteristics during preintervention, and a measure of intervention acceptability was collected post-intervention.

## Setting

The study sample came from one K-8 charter school in a southeastern state of the United States. Of note, earlier in the school year this researcher first invited numerous public schools in one large district to take part in this study. Principals of all public schools that were invited declined to participate due to time constraints associated with catching up on instruction lost due to the COVID-19 pandemic. The school district suggested reaching out to private or charter schools due to the increased local autonomy of these setting to make their own decisions about research participation and use of instructional time. Faculty within the USF College of Education identified potential partners, and the principal of the first charter school approached accepted the offer for additional supports for its students. The charter school included a high population of minoritized students, including students of refugee status. With the exception of a school counselor, the school had relatively few professional supports in the areas of social, emotional, and behavioral wellness. Regarding the demographic features of this school, the most currently available data in the National Center for Educational Statistics school details (2020-21) indicate a K-8 total school population of 448 students (40-62 students by grade level). In this urban school, 98.9% of students were eligible for free school meals, and 52.9% were male. Regarding race/ethnicity, 42.2% of students were African American, 36.8% Hispanic, 13.8% White, 1.8%

Asian, and 5.1% multiracial. The school district in which the charter school is located is a very large, diverse school district and includes over 233,000 students, of which majority identify as Hispanic or African American/Black.

Prior research has found that school climate explains a significant amount of variability in student life satisfaction (Suldo et al., 2013). In this school setting, administrators expressed strong commitment to supporting their students' social, emotional, and behavioral (SEB) skills, as evidenced by their agreement to participate in this study that would provide targeted supports for students identified through a universal screening of life satisfaction and conduct. Further, when the study began in spring 2022, the school already had in place other SEB initiative including a school wide PBIS system where students could earn "bucks" that can be used to purchase larger rewards such as snacks and candy. Each morning during the morning announcements, the school had a mantra repeated to all students that encouraged them to work hard in class, have positive interactions with peers and teachers, and continue to try their best. A fuller description of the aspects of school climate observed during the intervention implementation is provided as the end of this chapter.

# **Participants**

Participants in this study included 26 students from grades 5, 6, 7, and 8 grade. Half of the students in this study identified as Black/African American (50%), and one-third of students were Hispanic/Latinx (30.8%). Approximately more than half (about 54%) of the sample identified as male. Refer to Table for more details of the participant demographic features. Student SES levels were unable to be obtained due to not obtaining permission from the school for that information.

	Entire Sample ( $N = 26$ )				WBPP + PPR $(N = 12)$	
	п	%	п	%	п	%
Race						
White	2	7.7	0	0.0	2	16.7
Black	13	50.0	10	71.4	3	25.0
Pacific Islander	1	3.8	0	0.0	1	8.3
Native American	1	3.8	0	0.0	1	8.3
Asian American	1	3.8	0	0.0	1	8.3
Multiracial	3	11.5	2	14.3	1	8.3
Other	5	19.2	2	14.3	3	25.0
Ethnicity						
Not Hispanic/Latinx	18	69.2	11	78.6	7	58.3
Hispanic/Latinx	8	30.8	3	21.4	5	41.7
Grade						
Fifth	6	26.9	3	21.4	3	25.0
Sixth	10	34.6	5	35.7	5	41.7
Seventh	4	11.5	0	0.0	4	33.3
Eighth	6	26.9	6	42.9	0	0.0
Gender						
Male	14	53.8	6	42.9	8	66.7
Female	12	46.2	8	57.1	4	33.3
Religion						
No Religious	1	3.8	1	7.1	0	0.0
Affiliation						
Unsure	4	15.4	1	7.1	3	25.0
Christian	11	42.3	7	50.0	4	33.3
Buddhist	0	0	0	0.0	0	0.0
Hindu	0	0	0	0.0	0	0.0
Islam	4	15.4	1	25.0	3	25.0
Judaism	1	3.8	1	7.1	0	0.0
Muslim	3	11.5	2	14.3	1	8.3
Catholic	0	0	0	0.0	0	0.0
Other	2	7.7	1	7.1	1	8.3

Table 1.Demographic Characteristics of the Study Sample

*Note:* Students self-reported demographic characteristics. Due to low sample sizes, only one group was able to be formed in grade 7 and the group was randomly assigned to condition. To balance that assignment, all students in grade 8 were allotted to the other condition. Thus, all 8<sup>th</sup> grade students participated in the WBPP only condition and all 7<sup>th</sup> grade students participated in the WBPP+PPR condition.

# **Issues of Diversity and Ethical Treatment**

This study was considered a program evaluation and was thus exempt

from institutional review board (IRB) oversight. The principal of the participating charter school

provided permission for the school to partner with the student researcher for the program implementation and evaluation; approval from the larger school district was not necessary because of the school's status as a charter school with full local decision-making authority. Even though this project was exempt from IRB oversight, this researcher still employed procedures of parent notification and consent as would be typical of a research study. For instance, prior to the screening of life satisfaction and behavior to identify students to invite to the intervention, parents of all students in grades 5-8 at the partner school were sent a Notification of Screening letter (see Appendix A). Students who were subsequently invited to participate in the intervention were given a consent form for their parent/guardian to sign and return by a specified date (i.e., before April 7th, 2022) to be able to participate in the study. This parent consent form included anticipated risks and benefits of participation in this study as well as information as to what the study entailed (i.e., pre- and post-assessments and participation in up to 10 group sessions). The consent form also included information on why the student was selected to participate in the project and let the parent know that participation is not mandatory which means that students did not receive any consequences for choosing to not participate. A copy of the parent consent form is included in Appendix B. Parents were able to provide consent either verbally to the principal investigator or dean of students, physically using the consent form, or virtually using a Qualtrics version of the consent form that contains the same information. Verbal consent was documented on a blank consent form. For the one parent who provided verbal consent, a physical copy of the consent for was provided and returned. Students also provided verbal assent to participate in the project prior to the first session or completing the preassessment. A copy of the student assent form is included in Appendix C. This information was verbally relayed to students, and they were reminded that the program was voluntary. During the

intervention, three students either withdrew assent early in the intervention or otherwise participated minimally in the intervention (i.e., did not attend more than 3 sessions due to refusal or absences). The data for these students was destroyed and were not included in any analyses. Participant pre- and post- assessment data was entered into an Excel file in a secure cloud folder maintained by the university. Only members of the positive psychology research group involved with data collection or program facilitation, as overseen by this student researcher in collaboration with her major professor, had access to any files that linked student names to code numbers. All physical data (i.e., paper assessments) were stored in a locked file cabinet and maintained by this student researcher. Facilitators of the WBPP sessions consisted of individuals trained in the use of the WBPP, specifically graduate students who are active participants of the USF positive psychology research team who have completed prior training in the WBPP.

## Materials

## The Well-Being Promotion Program (WBPP)

The Well-Being Promotion Program (WBPP) is a multitarget positive psychology intervention intended to increase students' happiness. The WBPP can be delivered either classwide or in a group format. Previous research with the WBPP has demonstrated improved outcomes for sixth and seventh grade students (Roth et al., 2017; Suldo et al., 2014) when 10 core sessions were implemented within a group format. The WBPP is divided into three phases focusing on emotions of the (1) past, (2) present, and (3) future. Each session of the WBPP takes approximately 45-minutes to complete. A breakdown of the 10-core session activities listed by session are included in Table 2 below, which has been adapted from the *Promoting Student Happiness* text (Suldo, 2016). Each target included within the WBPP has been identified as a component related to subjective well-being and aligns with Seligman's authentic happiness

framework.

Session Activities Target Positive introduction You at your best 1 Phase 1: Past emotions Gratitude journals 2 Gratitude Gratitude visit 3 Gratitude Phase 2: Present emotions 4 Kindness Acts of kindness 5 Character strengths Introduction to strengths (VIA classification) Survey assessment of signature 6 Character strengths character strengths 7 Character strengths; savoring Use of signature strengths in new ways; savoring methods Phase 3: Future emotions 8 **Optimistic thinking** Optimistic explanatory style 9 Best-possible self in the future Hope All Termination; review of strategies and 10 plan for future use

Table 2.Overview of WBPP Sessions and Activities

The *Promoting Student Happiness* (Suldo, 2016) text includes information about the research behind the WBPP as well as detailed session-by-session outlines for someone who would like to implement the program. Each session outline includes recommended verbatim instructions that can be read aloud to student participants. At the end of each session, the facilitator assigns homework, and based on the interests of the students, rewards the completion of the homework assignment.

# **Cultural Adaptations to the Well-Being Promotion Program**

The present study focused on a population of racially and ethnically minoritized students. As such, a few modifications were employed to the WBPP. Each session of the WBPP includes homework and rewards for completing the homework assignments. In line with prior research (i.e., Brown et al., 2018) that suggests most modifications are typically in content and context as well as the incentives students can receive, students were asked for their input regarding the rewards they may receive for completing homework assignments (i.e., tangible rewards, extended time on homework, etc.) during the first session. These rewards were approved by the school site for appropriateness and included snacks such as chips and chocolate. Session 8 (Optimistic Thinking) was omitted due to the inclusion of fifth grade students in the sample. In previous work with the WBPP, students in elementary school typically did not have the cognitive capacity necessary to understand the complex concept of optimism as presented by the activity in the manual (Suldo et al., 2015). Activities pertaining to optimism (i.e., Looking for Optimism worksheet) were included as supplements within Session 9 (Hope). In the Looking for Optimism activity, students were instructed to count the number of *red* objects in the room for 10 seconds. After 10 seconds, students were asked to state the number of *blue* items identified although the instructions were to look for red. Facilitators explained that looking for positivity usually results in finding positivity, like their experience of only noticing the red items when they searched for only red items. Facilitators discussed that optimist thinking generates more confidence about the future, as we look for the positive instead of the negative.

Other adaptations included discussion of family and cultural values during topics of character strengths. For example, students were prompted to consider how the topics discussed in session may apply to family members or peers (i.e., identifying strengths of family members or others not included in the intervention group). For the *You at Your Best* homework activity (i.e., "Take Home Challenge") connected to session one, students were encouraged to think about a time they felt their community, or their school, was "at their best" or a time they particularly enjoyed that setting. For acts of kindness, students were encouraged to think about ways their community or school performed acts of kindness (i.e., one student identified specific language their family uses that demonstrates an act of kindness). Students also had the opportunity to strengths-spot in their community and home setting. Throughout the 9-session intervention, the facilitator was encouraged to provide relevant, personal examples and make language modifications based on the needs of the students served by the intervention (i.e., using simple words to explain certain concepts or allowing drawing instead of writing in gratitude activities).

In the current study, all homework assignments were presented to students as a "Take Home Challenge." Students who completed these challenges received individual rewards (i.e., chips, candy) at the start of each session that a challenge is due. Rewards were used to improve the likelihood of compliance and completion of Take Home Challenges. Some weeks, students were able to earn more than one reward for completing more than one Take Home Challenge.

Another modification to the WBPP involved adding more interactive activities and games to keep students engaged throughout sessions. Case in point, students played "Strengths Bingo" to help gain familiarity with each of the 24 strengths identified by the VIA classification. This was completed before students completed the VIA survey. Students also completed activities related to creating and using affirmations during session 9. In this activity, students were encouraged to evoke positive feelings about their present and future by creating positive affirmations that can make them feel better when attempting to achieve their best possible self in the future. Students were also encouraged to pick attributes about themselves that they often feel others do not notice or may be made fun of because of it (i.e., hair, accent). For a Take Home Challenge, students were encouraged to repeat the affirmations daily and record them on a form.

Due to copyright restrictions, the manual for the WBPP cannot be reproduced in this document. However, detailed descriptions of session adaptations are included in Appendix D

within the Facilitator session outlines. Due to the omission of Session 8 on optimism, students in this study had the opportunity to participate in nine sessions of the WBPP as opposed to the 10-core sessions. An adapted version of intervention targets and activities are included in Table 3 below. Modifications and additions to the original program are italicized.

Session	Target	Activities
1	Positive	Icebreaker: Two things that make you happy
	introduction	You at your best
		Homework: You at Your Best
Phase 1: Pa	ast emotions	
2	Gratitude	Gratitude journals
3	Gratitude	Gratitude visit
Phase 2: Pr	resent emotions	
4	Kindness	Kindness challenge
		Acts of kindness
		Homework: identify and perform acts of kindness
5	Character strengths	Introduction to strengths
	_	VIA posters
		Strengths bingo
		Homework: identify strengths of family members and peers
6	Character strengths	Survey assessment of signature character strengths
7	Character strengths;	Use of signature strengths in new ways; savoring methods
	savoring	
Phase 3: Fu	iture emotions	
9	Hope	Looking for Optimism
	-	Replacing Negative Thoughts with Positive Affirmations
		Best possible self in the future
		Homework: Using positive affirmations
10	All	Termination; review of strategies and plan for future use at
		home and school

 Table 3.

 Overview of Adapted WBPP Sessions and Activities

*Note.* Session 8 from the core 10-session program described in the intervention manual was omitted from the study due to the inclusion of  $5^{th}$  grade participants.

# **Positive Peer Reporting (PPR)**

Positive peer reporting (PPR) is a behavioral support originally developed for socially

rejected or disruptive children (Ervin et al., 1996). PPR has demonstrated effectiveness in

improving peer relationships and decreasing teacher reports of disruptive behaviors in the

classroom settings (Moroz & Jones, 2002; Morrison & Jones 2007). PPR was included as an additional behavioral component in the WBPP+PPR groups of the current study described below. The students in the WBPP+PPR group were reminded at the beginning of each group session to look for positive behaviors aligned with the schools' SWPBIS behavioral expectations of other students in the group as well as student character strengths displayed in session. Two students were chosen at the beginning of each session, and their name were written on the white board to help students remember. At the end of each group session, students verbally reported positive behaviors of the students selected at the beginning of the session. Students were also given a total number of positive peer reports that have been given up to that point in sessions. This occurred throughout the intervention for each treatment session. At each session, a different pair of students were selected as the peers to receive positive reports, therefore all students had a chance to hear positive reports from peers. By the end of the intervention period, each student within the group had at minimum of one opportunity to be the identified child to receive structured peer praise. Students were challenged to give at least one positive comment to at least one person between intervention sessions and given a goal of 10 positive reports per student in the group. Students were given time to report and reflect on their positive report experience at the beginning of each session. A protocol for PPR is included in Appendix E and has been adapted to be delivered in a group format instead of classwide based on the systematic review of PPR procedures by Murphy & Zlomke (2014).

# **Study Variables**

# **Control Groups: WBPP Only**

Students were first stratified by grade level, and then a random group generator was used to assign students to either treatment or control. Control groups for this study were considered the students who were randomly assigned to the culturally adapted WBPP only condition. Students in this group were not on a waitlist; rather, students in the control group received the adapted 9-session WBPP without PPR.

# **Treatment Groups: WBPP + PPR**

Treatment groups for this study were considered the students who were randomly assigned to the culturally adapted WBPP with PPR condition. Students in the treatment group received the 9-session adapted WBPP with PPR as an included support.

#### **Dependent Student Outcomes**

Student outcomes in this study were related to the dual-factor model of mental health. Student demographic characteristics were collected at the beginning of the study in order to assess the diversity of the sample. Students were assessed both pre- and post-intervention on measures of life satisfaction and psychopathology. Students were also assessed on indicators of externalizing forms of psychopathology (i.e., self-reported symptoms of conduct problems and hyperactivity), internalizing forms of psychopathology (i.e., symptoms of depression and anxiety), and life satisfaction (i.e., life satisfaction in specific domains and positive and negative affect). Students' perceptions of peer relationships (i.e., satisfaction with friends; peer problems) was also examined. One last outcome measured in this study was the students' acceptability of the intervention. The measure of treatment acceptability was only administered at the end of the intervention period.

## Measures

## Screening

Screening for inclusion in the study included of a brief measure of life satisfaction as well as a brief measure of conduct problems since the intervention of choice is designed for students who could benefit from increases in life satisfaction *and* could show reductions in behavior problems given the intent to evaluate the impact of the additional intervention (PPR) on behavior problems. Students were invited to participate in the intervention based on average life satisfaction scores below six out of seven on the Brief Multidimensional Student Life Satisfaction Scale (BMSLSS; Seligson et al., 2003), *and* any score above one on the externalizing problems composite from the Strengths and Difficulties Questionnaire (SDQ; Goodman, 2001).

The BMSLSS measures student satisfaction in multiple domains (i.e., family life, friendships, school experience, self, neighborhood, and whole life) using one item for each domain (six total items). Students respond to each item on a seven-point response metric: (1) *Terrible*, (2) *Unhappy*, (3) *Mostly Dissatisfied*, (4) *Mixed* (equally pleased and unhappy), (5) *Mostly Satisfied*, (6) *Pleased*, and (7) *Delighted*. Students with mean BMSLSS scores below 6 were invited to participate in the study.

The SDQ has been found in prior research to be a measure of child mental health as children with higher difficulties scores were found to have increased psychopathology (Goodman & Goodman, 2009). The full SDQ includes 25 items across five subscales. The externalizing scale is a combination of the hyperactivity and conduct problems subscales which includes 10 items (five items for each subscale). Students respond to the measure on a three-point metric indicating whether the statement is (0) *Not True*, (1) *Somewhat True*, or (2) *Certainly True* about themselves. Students who reported any presence of externalizing problems (sum score above one) were eligible to participate in this study. A copy of the screener is included in Appendix F. This measure was administered in a paper-and-pencil format.

# **Demographic Survey**

Student demographics were collected so that they may be reported with the intervention outcomes. Student age, birthdate, gender identity, racial/ethnic identity, and religious identity were self-reported by students invited to participate in the study and subsequently provided both consent and assent. Demographics were included with the pre-assessment of student emotional well-being. A copy of the demographic survey is included in Appendix G.

#### Pre- and Post-Assessment of Student Emotional Well-Being

For each measure used in the pre- and post-assessment, the internal consistency reliability of the measure was calculated using an online statistical software (i.e., SPSS). All measures included below were combined into one document that was administered to participants both pre- and post-intervention. After consent to participate in the study had been obtained, students completed the emotional well-being survey prior to the first group session, and again within one week of completing the final group session. Students were administered the pre-assessment in a small group format (3-5 students) to ensure that students had support with any items that seemed unclear. Students completed the post-assessment during the specified time for their normal group session within one week after the final session. A full version of the combined measures included in the pre- and post-assessment are included in Appendix H. Each individual assessment is described below. Reliability of a measure refers to its consistency and can be determined by calculating Cronbach's alpha. A Cronbach's alpha is generally considered acceptable if the value is above .70 (Taber, 2018), while some scholars report values 0.6-0.7 as acceptable (Griethuijsen et al., 2014). The Cronbach's alpha of each measure in the current study is also reported below.

# Life Satisfaction

Life satisfaction was measured using the Multidimensional Student Life Satisfaction Scale (MSLSS; Huebner & Gilman, 2002) and the Students Life Satisfaction Scale (Huebner, 1991). The 40-item MSLSS directly assesses students' perceived life satisfaction in the domains of family (seven items), friends (nine items), their living environment (nine items), self (seven items) and school (eight items). Student responses to items that compose the *friends* domain of the MSLSS were used as an indicator of peer relationships. The 7-item SLSS assesses students' perception of the quality of their lives overall without respect to domain or context. This measure yields a global life satisfaction score based on student responses. On both measures, students respond to items using a six-point Likert scale: (1) Strongly Disagree, (2) Disagree, (3) Mildly Disagree, (4) Mildly Agree, and (5) Agree, and (6) Strongly Agree. The MSLSS and SLSS are presented together in Appendix H, with the SLSS items interspersed within the lengthier MSLSS. The SLSS and MSLSS demonstrated internal consistency with Cronbach's alpha ranging from .84 to .91 for total scale scores, respectively, and .77 to .87 for subscale scores in prior research with middle school students (Haranin et al., 2007). Life satisfaction as measured by the MSLSS was found to be significantly correlated with internalizing and externalizing behaviors across time. Life satisfaction as measured by the SLSS correlated .50 with internalizing behavior measured at the same time.

In the current study, the MSLSS *friends* scale yielded a Cronbach's alpha of 0.69 at baseline, and 0.87 at post-intervention. A Cronbach's alpha between 0.6 and 0.8 has been cited as acceptable in previous studies (Taber, 2018), with other textbooks noting 0.7 and above as acceptable. The reliability of the other composite scales analyzed are as follows, for pre- and

post-intervention points: family = 0.70 and 0.89; school = 0.78 and 0.83; self = 0.80 and 0.67; living environment = 0.71 and 0.79; global = 0.81 and 0.82, respectively.

#### **Positive and Negative Affect**

To assess positive and negative affect, students completed the 10-item Positive and Negative Affect Scales for Children (PANAS-C-10; Ebesutani et al., 2012). This was given preand post-intervention to identify any changes in affect for students who participate in the study. The complete PANAS-C consists of 29 self-report items on a five-point Likert scale. For efficiency, the 10-item version of this measure was used and has been found to be similar in validity to the full 29-item version (Ebesutani et al., 2012; Laurent et al., 1999). The PANAS-C-10 includes 10 items from positive affect and negative affect items that consists of words of feeling or emotion. Students respond to the items on a five-point metric ranging from (1) Very Slightly or Not At All to (5) Extremely, indicating to what extent they felt the emotion in the past several weeks. The reduced 5-item positive affect scale demonstrated a Cronbach's alpha of .86 compared to the .89 demonstrated by the original 12-item scale (Ebesutani et al., 2012). The reduced 5-item negative affect scale demonstrated a Cronbach's alpha of .82 compared to the .90 demonstrated by the original 15-item scale (Ebesutani et al., 2012). In the present study, the positive affect scales demonstrated a reliability of  $\alpha$ =.86 and  $\alpha$ =.92 during pre- and postassessment, respectively. The negative affect scale yielded a Cronbach's alpha of 0.69 and 0.75 pre- and post-assessment, respectively.

# **Psychopathology**

**Internalizing Forms of Psychopathology.** Student internalizing forms of psychopathology were measured using a narrowband measure of anxiety and depression symptomology. The Patient-Reported Outcomes Measurement Information System (PROMIS) is an initiative that aims to help measure patient reported clinical outcomes. The PROMIS includes two narrowband measures that can be used to assess clinical symptoms of internalizing distress, specifically anxiety and depression. The full measures of anxiety and depression include a total of 24 total items that assesses feelings of anxiety and/or depression in the past seven days. Irwin et al. (2010) recommended a subset of items to be included on the 8-item short forms for the PROMIS Pediatric Anxiety and Depressive Symptoms Scales. All items use a 7-day recall period (the preface is "In the past seven days"). Students respond to the items using a five-point metric scale: (1) *Never*, (2) *Almost Never*, (3) *Sometimes*, (4) *Often*, and (5) *Almost Always*. Research indicates a goodness of fit of the items from both of these measures, with separability of the anxiety and depression dimensions (Irwin et al., 2010). The reliability of the scales analyzed are as follows, for pre- and post-intervention points. (*Anxiety* = 0.76 and 0.84; *Depression* = 0.89 and 0.91, respectively).

**Externalizing Forms of Psychopathology.** Student externalizing behaviors were measured using student educational records and the Strengths and Difficulties Questionnaire (SDQ; Goodman, 2001). The SDQ has been found in prior research to be a measure of child mental health as children with higher difficulties scores were found to have increased psychopathology (Goodman & Goodman, 2009). The full SDQ includes 25 items across five subscales. Students respond to the measure on a three-point metric indicating whether the statement is (0) *Not True*, (1) *Somewhat True*, or (2) *Certainly True* about themselves. The Hyperactivity and Conduct Problems subscales comprises the Externalizing Score obtained on the SDQ. For the purposes of this study, only the Hyperactivity, Conduct Problems, and Peer Problems subscales of the SDQ were administered. The Peer Problems subscale of the SDQ was used as an indicator of peer relationships. The Hyperactivity and Conduct Problems subscales were used as indicators of externalizing behaviors. For the current study, the externalizing scale demonstrated an internal consistency at baseline and post-assessments of  $\alpha$ =.66 and 0.74, respectively. The peer problems subscale demonstrated poor reliability of  $\alpha$ =.21 and  $\alpha$ =.52 at baseline and post-assessment, respectively.

## **Intervention Evaluation**

The intervention acceptability was evaluated using the Children's Usage Rating Profile (CURP; Briesch & Chafouleas, 2009). The CURP is s self-report measure that assesses personal desirability, feasibility, and understanding. Individuals respond to the 21-item measure on a 4point Likert scale: (1) I totally disagree, (2) I kind of disagree, (3) I kind of agree, and (4) I totally agree. Items included in the CURP are specific to whether the student liked the intervention and would participate in the future, whether the student feels that he/she understands the purpose of the intervention and can do it independently, and whether the student feels that the intervention is feasible. As such, the CURP yields domain scores of *feasibility*, understanding, and *desirability*. For the purpose of this study, the CURP was modified to have wording that is more relevant to the WBPP. A copy of the modified CURP is included in Appendix I and has been validated with middle school students in prior research (Briesch & Chafouleas, 2009). In this present study, the desirability, feasibility, and understanding scores all yielded acceptable reliability ( $\alpha$ =.86, .83, and .88, respectively). The measure of intervention acceptability was only given post-intervention at the same time as the post-intervention assessment and included areas for student comments on specific strategies that they liked or did not like, as well as their perceptions on the effectiveness of the intervention.

#### **Data Collection Procedures**

This researcher used a simple random sampling strategy. This ensured that all students had the same opportunity to be included in the study. Screening, assessment, and intervention occurred within the Spring 2022 school semester.

## **Screening and Recruitment**

At the beginning of March, a total of 170 students completed the self-report BMSLSS and SDQ measures to detect instance of student experiences of room for improvement in life satisfaction (a score of less than 6 on the BMSLSS) *and* any presence of externalizing behaviors (a score of one on the externalizing scale of the SDQ) to identify which students may benefit from additional supports. Of the 170 students screened, a total of 131 students met inclusion criteria. An additional 25 students were nominated to participate by school administration and teachers who perceived these students as in need to supplement emotional and behavioral supports.

All 156 students identified through self-report or educator nomination were given consent forms for their parents to sign and return to the school prior to beginning the intervention. Through the school's electronic communication system, these parents also received a digital link (tiny url web address) that brought them to a Qualtrics survey where they were prompted to view and complete an online version of the parent consent form. The period for consent lasted approximately four weeks, including one week during spring break. During the recruitment period, parent communication methods included distribution and collections of paper consent forms, electronic consent forms completed online via Qualtrics, and some instances of verbal consent that resulted during conversations with the parents when administrators or this researcher called parents to ensure they received consent forms from their students. A total of 29 students obtained consent to participate (18.6%), which mirrored school administrators' prior experiences with obtaining active consent from parents due to the relatively low rates of parent communication with educators. Of the 29 students, 26 were identified in the screening and three came from the pool of students that were later nominated by educators.

In April of 2022, the 29 students with parent permission to participate were then provided an explanation about the program, informed that the program was voluntary, and asked to complete the pre-assessment of student emotional well-being. The pre-intervention assessments were administered in small group format (i.e., no more than 5 students). Students were also assigned a unique code number to ensure confidentiality and to match baseline and postintervention assessment scores to demonstrate whether any improvements have been made. One student refused assent after session one, one student refused after session 2, and another student was chronically absent during her group time, resulting in a sample of 26 students. All three students who withdrew assent to participate were in the fifth grade.

#### **Intervention Implementation and Evaluation**

The intervention lasted for approximately five consecutive weeks, with two sessions delivered per week, beginning in April 2022 and ending May 2022. Post-assessments were administered the week immediately after the final intervention session to the 26 students who participated in more than five sessions. In sum, 26 or 29 students initially enrolled in the study (89.7% retention rate) completed more than half of the intervention and provided complete data for analysis.

Two graduate students facilitated a total of seven small groups. This researcher determined that a minimum number of students needed per group would be four. Four was chosen in anticipation of absences (i.e., if one student is absent, three students can still participate in PPR). The original goal was to run a total of eight groups (two per grade level), but due to the small sample size, there were not enough students enrolled at the beginning of the program to randomly assign 7<sup>th</sup> and 8<sup>th</sup> grade students into two groups, resulting in all students in each grade to be randomly assigned to one condition (i.e., all 7<sup>th</sup> graders assigned to the WBPP+PPR condition and 8<sup>th</sup> graders assigned to the WBPP only condition). Eighth grade students were split into two groups due to scheduling (i.e., administration not wanting students to miss science instruction). Of note, at the start of intervention implementation, there were originally nine fifth grade students enrolled in the study, so two separate groups were created.

The facilitators had prior experience implementing the WBPP and were also trained on the use of PPR prior to beginning the intervention. Facilitators received weekly guidance and an opportunity to report progress and troubleshoot any issues during the weekly USF positive psychology research group meetings led by Dr. Shannon Suldo, this student researcher's major professor. All materials including a facilitator binder and all students and parent handouts were provided to each facilitator prior to each session.

When implementing the intervention, these group facilitators observed that during student arrivals, staff members would say "good morning" to each student while making sure they received breakfast and had a mask to wear. The school displayed positive posters throughout the school, including posters that celebrated the culture and history of their students (i.e., black history posters that detailed inventions and pioneering work by black Americans). The school demonstrated care and concern for their students throughout these activities and displays. There were multiple instances of students being reprimanded which could have negatively affected school climate. This also may have led to negative relationships with teachers and peers if students perceived that they were being unfairly punished. For instance, during one session, students in group 6A (sixth grade students receiving the WBPP and PPR) were hard to calm after perceiving that one of their mutual friends, who was not in the group, had been unfairly punished for an incident with a different student. This illustrates some instances of poor student-teacher relationships in this setting. In addition, some teachers were often absent during the intervention period, thus hindering the development of positive student-teacher relationships that may foster SWB. This may contribute to a school environment where life satisfaction is not fully nurtured, but rather suppressed. In previous research, dimensions of student-teacher relations, order and discipline, student interpersonal relations, and parent involvement in schooling all were identified as unique predictors of life satisfaction for middle school students (Suldo et al., 2013). This information in its entirety regarding school climate should be considered when reviewing the results of this study.

#### **COVID-19** Considerations

The COVID-19 pandemic was, and still is, a concern for many schools. Some concerns regarding COVID-19 included appropriately social distancing participants, exchanging physical papers, and wearing masks in the school setting. In addition, it was important to consistently sanitize as sessions occurred in the same two classrooms. These were considered and proper social distancing guidelines were followed as well as the school's COVID-19 policies. No COVID-19 related closures or quarantines occurred during this study.

### **Overview of Analyses**

First, this researcher conducted descriptive statistics for initial comparisons of mean scores pre- and post-intervention. This provided initial insight into whether any changes in life satisfaction, affect, internalizing and externalizing problems, or social relationships would be observed in the more detailed analyses, as well as if there were any potential problems with the data that has been entered. This was done for all research questions. The SPSS program was used to conduct all analyses in this study.

#### **Research Question 1 (RQ1)**

1. How acceptable is a culturally adapted version of a positive psychology and behavioral intervention as perceived by minoritized middle school students?

For research question one (RQ1), this researcher first used descriptive statistics to check for missing or incorrect data and to analyze student acceptability of the culturally modified intervention. Students responded to 21 items about intervention desirability, feasibility, and understanding of the concepts (i.e., the CURP). A series of independent samples T-test were used to determine whether there were differences in intervention acceptability based on condition. No other analyses were used for this research question, but supplemental data obtained through written student feedback (Appendix K) in conjunction with the results of this study may help educators decide whether students appreciated the intervention and whether students are likely to continue using the skills obtained after the intervention period is complete.

#### **Research Question Two and Three (RQ2 and RQ3)**

- 2. What outcomes are associated with participation in a culturally adapted positive psychology or positive psychology in addition to a behavioral intervention with regard to:
  - a. Emotional well-being (i.e., life satisfaction, positive and negative affect)?
  - Behavior problems (i.e., externalizing behaviors [conduct problems, hyperactivity], internalizing behaviors [anxiety, depression])?
  - c. Peer relationships (e.g., peer problems, satisfaction with friends)?

3. Are changes in outcomes larger when the culturally adapted positive psychology intervention is combined with behavioral supports compared to the culturally adapted positive psychology intervention alone?

After conducting descriptive statistics and determining that there would be no violations of assumptions, this researcher conducted a mixed model analysis of variance (ANOVA) to address research questions two and three. A mixed model ANOVA is used when you want to determine the difference both between and within groups. In the context of this study, the variance within groups (whether students improved from time 1 to time 2) as well as the variance between groups (students who received PPR versus students who did not receive PPR) was of importance. Grade level was included as a factor within the mixed ANOVA to control for grade level influences. This ensures that grade level does not change the outcomes as previous research suggests that there may be differences in salience of factors the older a student becomes (i.e., Yang et al., 2020). Student grade level was reported to the researcher by school administration.

A mixed model ANOVA assumes that groups are normally distributed and the homogeneity of variances. An analysis of normality was conducted to ensure than no violations of assumptions occurred. Cronbach's alpha was also calculated to determine the reliability of the measures used for both baseline and post-intervention assessments. There were some departures from normality but given the robustness of the ANOVA assumptions according to Stevens (2007), it seemed reasonable to proceed with the analysis.

#### **Summary**

This study used a quantitative pre/post-test design. A total of 170 students were first screened for diminished life satisfaction and presence of conduct problems to determine whether they were a good fit for inclusion in the intervention and larger study. A total of 132 students

demonstrated being less than delighted with their overall life and evidenced signs of externalizing problems and an additional 25 students who were nominated by faculty, were invited to participate in a selective intervention, the Well-Being Promotion Program (WBPP). The WBPP has prior support for improving students' subjective well-being. The WBPP was modified from the 10-core sessions tested by Roth et al., (2017) and Suldo et al., (2014) into a nine-session intervention intended to be more culturally relevant to participants and include more interactive activities as well as homework assignments that link group activities to the home and school settings. A total of 29 students received permission to participate in the intervention and were first stratified by grade level and then randomly assigned to one of two intervention groups: students receiving the culturally modified version of the WBPP only (control group), or students receiving the culturally modified version of the WBPP with an embedded behavioral support, positive peer reporting (PPR; treatment group). PPR provides a structured approach for students to provide positive peer statements for group members who engage in positive behaviors. The WBPP is provided as a small group counseling intervention, and there was three total control groups (N=14) and three total treatment groups (N=12).

Students who returned parental consent for participation in the WBPP completed a longer assessment of life satisfaction (i.e., MSLSS), positive and negative affect (i.e., PANAS-C-10), and indicators of internalizing and externalizing forms of psychopathology (i.e., SDQ and PROMIS) before and after the intervention period. Students also completed a demographic survey during baseline and a modified Children's Usage Rating Profile (CURP) to measure acceptability of the modified intervention being that this intervention has not been previously studied in the modified format. Responses to these measures were compared by treatment condition and grade level using a mixed model ANOVA for research questions two and three. For research question one, an independent samples T-test was used to identify significant differences in student perceptions of acceptability with the intervention content.

Considerations for this study in accordance with the COVID-19 pandemic included the use of paper materials as well as appropriate space to properly social distance participants and the interventionists. The school's COVID-19 procedures were followed. Classrooms that were used for student sessions were constantly sanitized and hand sanitizer was always available for students to use.

#### CHAPTER IV: RESULTS

This chapter describes the results from the quantitative analyses conducted to answer the research questions. Each analysis is described along with results separated by research question. This chapter also briefly describes the results of the analyses in relation to the hypotheses. Data screening for all research questions is presented first followed by each individual research question, its aims, and results of the analysis.

#### **Data Screening**

All data were first screened for any outliers or missing data. For each variable of interest, the rate of missing data was calculated. All 26 participants completed each item within each survey administered pre- and post-intervention. Being that it is not unusual that a student may miss an item, each survey was checked to ensure that each item was completed, and no items were skipped or double marked. In the event of items being skipped or double marked, the student was given the survey back with the item of concern verbally specified.

# **Intervention Implementation and Participation**

#### **Session Completion**

A total of 29 students began this study and completed baseline assessments, and 26 of these participants did not withdraw assent and subsequently completed post-assessments as well. All students with data included in this study (i.e., the 26 students with pre- and post-data) completed a minimum of 4 group sessions (M=7.58 sessions). Students were marked "present" for a session if they were physically present during the initial facilitation, or if the student received supplemental information or a makeup session regarding the content missed in the event

the student was absent from the scheduled small group meeting. Most students in this study completed at least 7 sessions. The frequency of sessions completed by participants is included in Table 4 below.

	WBPP only ( <i>N</i> =14)		WBPP+PPR (N=12)		
	Ν	%	Ν	%	
4 sessions	1	7.1%	1	8.3%	
5 sessions	0	0.0%	0	0.0%	
6 sessions	2	14.3%	1	8.3%	
7 sessions	3	21.4%	3	25%	
8 sessions	2	14.3%	4	33.3%	
9 sessions	6	42.9%	3	25%	

Table 4.Intervention Dose (Number of Sessions Complete) by Intervention Condition

# **Fidelity of Session Implementation**

Session fidelity was determined by facilitator completion of fidelity checklists immediately following the group session. For sessions where there was more than one facilitator, the co-facilitator tracked fidelity during the session in real time. The fidelity checklists used in this study are included in Appendix J. The average overall fidelity of implementation across groups was observed to be 99% of planned session elements enacted. To ensure that the WBPP only condition was not exposed to the PPR intervention, group sessions occurred in two separate classrooms and were facilitated by different trained graduate students. There was no mention of PPR during the WBPP only sessions. Being that student groups were led by different facilitators, no students in the WBPP only condition questioned why another group (WBPP+PPR) ended later than the other. Per anecdotal report from group facilitators, group sessions in the WBPP only condition typically ended 5-8 minutes earlier than groups within the WBPP+PPR condition. See Table 5 below for a breakdown of session fidelity by small group.

	Group	Group	Group	Group	Group 7	Group	Group
	5A	5B	6A	6B	(WBPP+	8A	8B
	(WBPP+	(WBPP	(WBPP+	(WBPP	PPR)	(WBPP	(WBPP
	PPR)	only)	PPR)	only)		only)	only)
Session 1	94%	100%	94%	100%	100%	100%	100%
Session 2	100%	100%	100%	100%	100%	100%	100%
Session 3	100%	100%	100%	100%	100%	100%	100%
Session 4	94%	100%	100%	100%	100%	100%	100%
Session 5	100%	100%	100%	100%	100%	100%	100%
Session 6	94%	100%	100%	100%	100%	100%	100%
Session 7	94%	100%	100%	100%	100%	100%	100%
Session 9	100%	100%	100%	100%	94%	100%	100%
Session 10	100%	100%	100%	100%	100%	100%	100%
Total	97%	100%	99%	100%	99%	100%	100%

Table 5.Fidelity of Implementation of Each Session, by Small Group

*Note*. Number within Small Group name (e.g., 5A) references grade level of students within the group (e.g., 5<sup>th</sup>) and whether the study included one or two groups per grade level. Due to scheduling issues, the 8<sup>th</sup> grade students were split into two groups, although receiving the same condition, to avoid disrupting core subject instruction.

There were a few challenges to the implementation of the intervention despite the high rate of fidelity. During the intervention period, students were amid state standardized testing, which occurred on days where the WBPP sessions did not occur. There were also variable levels of engagement and compliance across groups. Variable levels of engagement and compliance may have been due to peer influences, testing fatigue, or due to missing out on preferred activities to attend group sessions. Students in the 6A group (identified in Table 5) were less compliant some weeks, as was group 5A. Typically, some students were less engaged in the presence of other students (i.e., a student refusing an activity after another student refused the activity). Engagement was also variable being that students were only able to attend sessions during elective courses, thus enthusiasm was hampered due to the loss of a desired alternative activity (i.e., PE, art, foreign language, STEM class). This was evidenced by students sometimes asking if they would be leaving sessions early or have time to make it to their electives during

session. Some students would also refuse to go to session in lieu of the activity in their elective courses. These implementation challenges may influence the results of this study described next in unknown ways.

# **Research Question One**

1. How acceptable is a culturally adapted version of a positive psychology and behavioral intervention as perceived by minoritized middle school students?

Research question one aimed to determine whether the culturally adapted intervention was found feasible, desirable, and acceptable by the middle school students. The modified Children's Usage Rating Profile (CURP; Appendix I) was used to measure intervention acceptability. Students respond whether they agree or disagree on a 4-point Likert scale (ranging from 1 to 4) to items related to the desirability and feasibility of the intervention as well as their understanding of the intervention and its purpose.

Student *desirability* of the intervention was measured by using the average of 7 items for desirability, 8 items for feasibility, and 6 items for understanding. Students responded to items such as "I could see myself using this program again," and "If my friend was having trouble, I would tell him/her to try this," to help determine the desirability of the program. An average desirability score was calculated as the mean of CURP items 3, 4, 6, 8, 16, 18, and 21, after item 6 was reverse scored so that higher scores on each item reflect greater perceptions of acceptability. Student perception of *feasibility* was measured by student responses to 8 items such as "this program was too much work for me," and "this took too long to do." An average feasibility score was calculated as the mean of CURP items 1, 10, 11, 12, 13, 15, and 17. Higher scores in this domain indicate lower perceptions of feasibility. For *understanding*, students rated whether they agree or disagree to statements such as "it is clear what I had to do," and "I was

able to do every step of the program." An average understanding score was calculated as the mean of CURP items 2, 5, 9, 14, 19, and 20. Higher scores in this domain indicate more positive perceptions of understanding. Table 6 below includes the mean scores by each scale of the CURP (i.e., desirability, feasibility, understanding).

SD 0.60	Std. Error Mean
0.60	
0.60	
0.60	
0.00	0.16
0.64	0.17
0.72	0.19
0.82	0.24
0.75	0.22
0.80	0.23
	0.64 0.72 0.82 0.75

Table 6.

Using descriptive statistics, results indicate that overall, students who received the additional behavior support (Positive Peer Reporting; PPR) rated the intervention as less desirable and less understandable than students who received the culturally adapted intervention without PPR. Interestingly, students who received PPR rated the intervention as slightly less feasible than students who did not receive PPR.

A series of independent samples T-tests were used to determine whether differences in mean ratings for each dimension of acceptability are statistically significantly different by condition. The 12 participants who received the culturally adapted WBPP+PPR group compared to the 14 participants in the control group (WBPP only) were not found to demonstrate significantly different perceptions of intervention desirability, t(24) = 1.26, p = .22. There were also no significant effects for feasibility [t(24) = -.36, p = .69] or understandability [t(24) = .77, p = .94], despite students in the 'No PPR' group rating these areas slightly higher than the 'PPR'

group. The full results of the independent samples T-test are included in Table 7. Although the differences in means were not found to be statistically significant, it is notable that a review of mean scores suggests that the students in the WBPP only reported higher levels of desirability and understanding than students in the WBPP+PPR condition. Specifically, if a benchmark of subscale mean score at or above 3.0 (corresponding to a minimal rating of agreement) was used to indicate high acceptability for desirability and understanding, and a benchmark of at or below 2.0 was used to indicate high acceptability for feasibility (corresponding to a minimal rating of disagreement with these negatively worded items), the mean scores for the WBPP only condition would meet benchmarks on three of three dimensions of acceptability, and the mean scores for the combined condition would meet benchmarks for one dimension of acceptability.

Table 7.Intervention Acceptability by Condition

Variable	t	df	р	Mean Difference
Desirability	1.26	24	0.22	0.35
Feasibility	-0.36	24	0.72	-0.10
Understanding	0.77	24	0.45	0.23

Note: \*p < .05

Supplemental information on acceptability can be gleaned from student responses on the *Program Feedback Request* form given to all students who participate in the WBPP. The feedback form is collected anonymously, so there is no way to track which groups gave what feedback. A summary of the feedback presented in aggregate, by question, can be found in Appendix K.

## **Research Questions Two and Three**

- 2. What outcomes are associated with participation in a culturally adapted positive psychology or positive psychology in addition to a behavioral intervention with regard to:
  - a. Emotional well-being (i.e., life satisfaction, positive and negative affect)?

- Behavior problems (i.e., externalizing behaviors [conduct problems, hyperactivity], internalizing behaviors [anxiety, depression])?
- c. Peer relationships (e.g., peer problems, satisfaction with friends)?
- 3. Are changes in outcomes larger when the culturally adapted positive psychology intervention is combined with behavioral supports compared to the culturally adapted positive psychology intervention alone?

Research question two aimed to determine whether any significant positive changes in emotional well-being, externalizing behaviors, or peer relationships could be observed regardless of whether students received an additional behavioral support or not. In other words, this researcher wanted to determine what were the changes in outcomes associated with each condition. Research question three aimed to determine whether the changes observed in students was dependent on the condition the student was assigned to. This researched wanted to determine whether better outcomes are observed with or without PPR as an additional support. For both research questions, a mixed model ANOVA was conducted.

A mixed model ANOVA assumes that scores for each condition are normally distributed, equal error variances, and sphericity of the covariance matrix. For normality, this researcher examined the individual box plots by condition. There were some departures from normality but given the robustness of the ANOVA assumptions according to Stevens (2007), it seemed reasonable to proceed with the analysis. The descriptive statistics of each scale are included in Table 8 separated by condition.

	1	М	S	SD	Ske	wness	Kur	tosis
	Pre	Post	Pre	Post	Pre	Post	Pre	Post
WBPP only ( <i>N</i> =14)								
Friends Satisfaction	4.83	4.42	0.61	0.83	0.13	-0.22	-1.32	0.28
Family Satisfaction	4.33	4.12	0.78	1.00	0.13	0.07	-0.15	-0.44
School Satisfaction	3.39	3.70	0.74	0.91	0.20	0.16	-0.20	2.08
Satisfaction with Self	4.37	4.37	0.77	0.63	0.59	-0.57	0.03	-0.63
Satisfaction with Living	3.77	3.87	0.85	0.84	-0.50	-0.33	-0.24	-0.23
Environment								
Global Life Satisfaction	3.72	3.77	0.87	0.90	-0.29	-0.15	0.23	-0.37
Positive Affect	2.04	2.29	0.80	0.99	0.90	0.12	0.65	-1.34
Negative Affect	3.11	3.36	0.84	1.12	-0.20	0.65	-1.53	0.12
Anxiety	16.86	18.43	5.64	6.73	0.61	0.44	-0.33	-0.86
Depression	18.64	18.64	7.5	7.65	-0.22	0.26	-1.48	-1.02
Externalizing Behaviors	6.71	7.00	3.85	3.57	0.53	0.46	-0.002	0.24
Peer Problems	2.79	3.14	1.37	1.70	-0.60	-0.26	0.05	-0.45
WBPP+PPR (N=12)								
Friends Satisfaction	4.49	4.42	0.60	0.92	0.58	-0.42	0.74	0.22
Family Satisfaction	4.74	4.42	0.72	1.30	-0.70	-1.64	-0.08	4.04
School Satisfaction	3.85	3.54	1.05	1.02	0.67	-0.24	-1.22	0.36
Satisfaction with Self	4.19	4.31	0.96	0.85	0.10	0.71	-0.02	-0.32
Satisfaction with Living	4.02	4.09	0.87	1.09	0.56	-1.01	-0.10	2.88
Environment								
Global Life Satisfaction	4.11	4.21	1.02	1.11	-0.24	-1.20	-0.03	2.17
Positive Affect	2.02	2.00	0.87	0.66	0.50	-0.92	-1.63	0.45
Negative Affect	3.45	3.63	1.10	1.11	0.69	-0.08	-0.52	-1.64
Anxiety	18.67	18.17	7.13	8.08	0.12	0.90	-0.52	0.11
Depression	17.67	16.33	8.63	9.18	0.89	1.09	0.21	0.53
Externalizing Behaviors	8.83	8.92	3.13	3.99	-1.27	0.22	0.11	-0.24
Peer Problems	3.67	3.42	1.44	1.83	0.48	-0.11	-0.83	-1.20

Table 8.Descriptive Statistics of Measures by Condition

# **Emotional Well-Being**

# Life Satisfaction

Student life satisfaction was measured using the 40-item MSLSS and the 7-item SLSS dispersed within the larger MSLSS. The MSLSS yields scores of satisfactions with friends, family, peers, self, and living environment, including an average life satisfaction and global life satisfaction domains. An average satisfaction score for each domain was calculated as the mean

of MSLSS items with some items being reverse scored. A full breakdown of which items contribute to which scores and which items were reverse scored is included in a table note within Appendix H.

A visual review of the means of the pre and post MSLSS scores by condition suggests that students in the WBPP+PPR condition may have experienced more improvements than the WBPP only condition, with respect to more positive change in satisfactions with self and reductions in depressive symptoms and peer problems. Based on the results of the multiple mixed model ANOVAs, the main effect of time was non-significant for each individual subscale as well as the interaction between time and condition, which fails to support any reliable changes in life satisfaction either over time or by condition (i.e. WBPP only or WBPP+PPR). The main effect for grade observed for students' global life satisfaction [F(1, 21) = 4.62, p = .01]. This suggests that effects of global life satisfaction may change with students' grade. More specifically students in 5<sup>th</sup> and 7<sup>th</sup> grade were found to have statistically significant differences in their mean [t(3) = 2.75, p = .01 and , t(3) = 2.14, p = .04, respectivel] than 8<sup>th</sup> grade students. Specifically, these students were observed to report higher global life satisfaction than students in 8<sup>th</sup> grade. Table 9 on page 93 includes the results of the ANOVA as it relates to areas of life satisfaction.

#### **Positive and Negative Affect**

Student levels of positive and negative affect were measured using the 10-item Positive and Negative Affect Scale for Children (PANASC-10). The five items for positive affect were averaged to create a mean score for frequency of positive emotional experiences, as were the five items for negative affect. Refer to Appendix H for the breakdown of which items contributed to which scales. The main effect of time was not statistically significant for either positive or

Variable	df	Mean	F	р	Partial η <sup>2</sup>	
		Square			·	
Family Satisfaction						
Time	1	0.51	1.68	0.21	0.074	
Condition	1	0.12	0.08	0.78	0.004	
Grade	3	2.99	2.19	0.12	0.238	
Time x Condition	1	0.70	2.27	0.15	0.097	
Time x Grade	3	0.42	1.27	0.28	0.163	
School Satisfaction						
Time	1	3.66	0.00	0.99	0.000	
Condition	1	0.14	0.10	0.75	0.005	
Grade	3	0.96	0.70	0.56	0.091	
Time x Condition	1	1.37	3.13	0.09	0.130	
Time x Grade	3	0.18	0.40	0.75	0.054	
Satisfaction with Self						
Time	1	0.004	0.008	0.93	0.000	
Condition	1	0.74	0.86	0.36	0.039	
Grade	3	1.13	1.33	0.29	0.159	
Time x Condition	1	0.04	0.09	0.77	0.004	
Time x Grade	3	0.08	0.17	0.92	0.023	
Satisfaction with Living						
Environment						
Time	1	0.03	0.11	0.74	0.005	
Condition	1	0.82	0.64	0.43	0.030	
Grade	3	2.59	2.04	0.14	0.226	
Time x Condition	1	0.15	0.71	0.41	0.032	
Time x Grade	3	0.31	1.39	0.27	0.166	
Global Life Satisfaction						
Time	1	0.01	0.02	0.88	0.001	
Condition	1	0.04	0.04	0.85	0.002	
Grade	3	5.15	4.62	0.01*	0.398	
Time x Condition	1	0.31	1.37	0.26	0.061	
Time x Grade	3	0.63	2.79	0.07	0.285	

Table 9.Life Satisfaction Tests of Within- and Between-Subjects Effects

*Note.* p < .05; Friends Satisfaction was removed from these analyses due to being used as a measure of peer relationships later in this chapter.

negative affect [F(1, 21) = 0.81, p => .05 and F(1, 21) = 1.03, p => .05, respectively]. The interactions between time and condition were also not significant [F(1, 21) = 0.05, p => .05 and F(1, 21) = 0.07, p => .05, respectively]. This fails to support the notion that changes in positive and negative affect were different for students who received the additional behavioral support.

These results also do not support significant improvements in positive or negative affect over time. However, the main effect of grade was found to be significant for negative affect [F(1, 21) = 3.78, p = .03]. This suggests that students' negative affect may change over time with grade level. More specifically, students in 5<sup>th</sup> grade initially reported a significant difference of higher negative affect (p=.02) at baseline assessment. Table 10 below includes the results of the

ANOVA as it relates to positive and negative affect.

Positive and Negative Af	fect Tests of W	Vithin- and Bet <sup>-</sup>	ween-Subjects	Effects	
Variable	df	Mean	F	р	Partial $\eta^2$
		Square			
Positive Affect					
Time	1	0.38	1.52	0.23	0.067
Condition	1	0.15	0.13	0.72	0.006
Grade	3	0.86	0.73	0.55	0.095
Time x Condition	1	0.01	0.05	0.83	0.002
Time x Grade	3	0.50	1.98	0.15	0.221
Negative Affect					
Time	1	0.53	1.05	0.32	0.048
Condition	1	0.01	0.01	0.93	0.000
Grade	3	4.88	3.78	0.03*	0.351
Time x Condition	1	0.001	0.002	0.96	0.000
Time x Grade	3	0.01	0.02	1.00	0.003

Table 10.Positive and Negative Affect Tests of Within- and Between-Subjects Effects

Note: \*p < .05

# **Psychopathology**

# **Externalizing Behaviors**

Student levels of externalizing psychopathology were measured using two subscales of the Strengths and Difficulties Questionnaire (conduct problems and hyperactivity) which included a total of 10 items. All 10-items from the two scales were summed, with higher scores indicating more externalizing behaviors. There was a non-significant main effect of time [F(1, 21) = 0.09, p = > .05], as well as a non-significant interaction between time and condition [F(1, 21) = 2.28, p = > .05]. This fails to demonstrate that changes in externalizing behavior over time was different for students who received the additional behavioral support. This also does not support significant changes in externalizing behaviors over time. Table 11 below includes the within- and between-subjects effects.

Externalizing Benaviors Tests	of Within- a	and Betweer	n Subjects I	lffects	
Variable	df	Mean	F	p	Partial $\eta^2$
		Square			
Externalizing Behaviors					
Time	1	0.41	0.13	0.72	0,006
Condition	1	55.13	2.34	0.14	0.100
Grade	3	18.66	0.79	0.51	0.101
Time x Condition	1	6.13	1.91	0.18	0.083
Time x Grade	3	7.55	2.36	0.10	0.252

Table 11.Externalizing Behaviors Tests of Within- and Between Subjects Effects

# Note: \*p < .05

# Internalizing Behaviors

Internalizing behaviors in this study included self-reported symptoms of anxiety and depression. Levels of anxiety and depression were measured using the anxiety and depression short forms of the PROMIS which consisted of 16 items total. In this study, the raw scores obtained from student self-reports were used in analyses. However, a T-score for each participant was documented by hand using conversion tables provided by the test developers. On this measure, higher scores correspond to the presence of more symptoms. There were no significant main effects of time or interactions between time and condition for both anxiety and depression. This indicates that there were no significant changes in levels of anxiety or depression observed at the end of the 9-session program, nor were there any significant changes dependent upon condition. Table 12 on page 96 includes the results of the ANOVA as it relates to anxiety and depression.

Variable	df	Mean	F	р	Partial $\eta^2$
		Square			
Anxiety					
Time	1	3.18	0.18	0.68	0.009
Condition	1	71.10	0.53	0.47	0.025
Grade	3	114.56	0.86	0.48	0.109
Time x Condition	1	0.01	0.000	0.98	0.000
Time x Grade	3	35.24	2.01	0.14	0.223
Depression					
Time	1	3.63	0.15	0.71	0.007
Condition	1	1.58	0.02	0.90	0.001
Grade	3	256.15	2.44	0.09	0.259
Time x Condition	1	30.23	1.22	0.28	0.055
Time x Grade	3	66.42	2.69	0.07	0.277

 Table 12.

 Internalizing Behaviors Tests of Within- and Between Subjects Effects

Note: \*p < .05

# **Peer Relationships**

Peer relationships in this study were measured using the Friends subscale of the MSLSS as well as the Peer Problems subscale of the SDQ. Measures for peer problems indicated a very low reliability which means to use caution as an additional administration may yield very different results. A review of mean scores suggests that students in the WBPP+PPR may have experienced a reduction in peer problems, whereas the WBPP only group may have experienced a slight increase in peer problems. There were no significant changes in peer problems or satisfaction with friends observed over time, nor was there a significant interaction between time and condition. These results fail to indicate that there were significant changes over time in friend satisfaction and problems with peers. The results of the ANOVA are included in Table 13.

Variable	df	Mean	F	р	Partial n <sup>2</sup>
		Square			
Peer Problems					
Time	1	0.15	0.13	0.72	0.006
Condition	1	8.00	1.95	0.18	0.085
Grade	3	2.87	0.70	0.56	0.091
Time x Condition	1	1.13	0.98	0.33	0.045
Time x Grade	3	0.87	0.75	0.53	0.097
Friend Satisfaction					
Time	1	0.74	2.00	0.17	0.087
Condition	1	1.30	1.71	0.21	0.075
Grade	3	0.52	0.68	0.57	0.089
Time x Condition	1	0.04	0.11	0.75	0.005
Time x Grade	3	0.65	1.75	0.19	0.200

Table 13.Peer Relationships Tests of Within- and Between Subjects Effects

*Note*. \**p* < .05

#### CHAPTER V: DISCUSSION

The purpose of this study was to examine whether integrating a behavioral component, positive peer reporting, into a culturally adapted nine-session selective positive psychology intervention (PPI), the Well-Being Promotion Program (WBPP), would enhance the effects of the intervention that has not been previously reported such as improved peer relationships and reductions in externalizing behaviors. In this study, the WBPP was culturally adapted, and participants in grades 5 and 6 were randomly assigned to also participate in the positive peer reporting (PPR) intervention (random assignment for all students occurred at the grade level, with all students in grade 7 allocated to one condition and students in grade 8 in the other due to sample size). Using a series of analysis of variances (ANOVAs), this researcher analyzed the effects of this culturally adapted intervention on emotional well-being, behavior problems, and peer relationships of 26 5th through 8th grade students who participated in a nine-session culturally adapted version of the WBPP with and without PPR. The current study administered the program twice per week instead of once weekly as in previous studies of the WBPP. Students were given 2-3 days to complete homework activities described as "Take Home Challenges" which were connected to program targets. The sample included minoritized students (50% Black, 30.8% Hispanic/Latinx) to address gaps in the literature regarding feasible social, emotional, and behavioral (SEB) interventions for these students. Relevant key findings of these analyses and how it fits with the current limited knowledge on culturally adapted interventions as well as the limited knowledge base on SEB supports. Implications for future research is described throughout this chapter with general limitations presented last.

### **Key Findings**

#### Acceptability of the Culturally Modified Intervention

A goal of this study was to determine whether the culturally adapted version of the WBPP would be deemed feasible, understandable, and desirable by the students who participated. The WBPP has not been previous adapted to fit the need of a minoritized population. Previous research with culturally SEB interventions indicates the possibility of interventions being acceptable by students (Cramer & Castro-Olivo, 2015). The WBPP, when delivered as intended, has been previously found to be highly acceptable and enjoyed by participants (Roth et al., 2017) as evident in written feedback collected during the final session. There are no known evaluations of intervention satisfaction or acceptability using a more standardized measure. Thus, we are unable to compare means from previous studies with the results of this study.

It is notable that mean levels of intervention feasibility reported (Table 6) by students in either condition were low (below a score of 2 on the modified CURP indicating "agree"), meaning students may find the intervention to be reasonable and *not* a lot of work. However, students in the WBPP only condition self-reported a lower mean feasibility than those in the WBPP+PPR condition (M = 1.84 and 1.94, respectively). The results of the t-test were not indicative of mean differences in desirability or understanding of the intervention based on condition, but a review of means indicated that students who participated in the WBPP only selfreported more desirability of the intervention than those in the WBPP+PPR condition (M = 3.26and 2.90, respectively) and more understanding (M = 3.13 and 2.90, respectively). Being that the CURP utilizes a 4-point Likert scale with 1 being disagree, mean scores from the WBPP+PPR condition indicates the possibility of mixed reviews. In general, students in the WBPP only condition tended to report higher levels of intervention acceptability than students in the WBPP+PPR condition.

The mean scores of desirability, feasibility, and understanding self-reported by participants indicates that students in the WBPP+PPR condition may have felt that the addition of the behavior support made the program slightly less feasible. In all three domains, the students in the WBPP+PPR condition reported lowers levels than the WBPP only condition. The PPR intervention was implemented at the end of each WBPP session (i.e., providing positive reports at the end of the WBPP content). It could have been viewed by students as something additional that prolonged sessions, and sometimes students were eager to return to class as evidenced by questions of if they would be able to spend a few minutes in their elective course.

While the WBPP and PPR have been evaluated for acceptability as separate interventions, little research is available on the acceptability of these interventions when combined into an abbreviated 5-week intervention with two sessions provided each week, as opposed to the suggested 10-week format with weekly sessions. Previous studies with PPR were conducted classwide and were implemented at the last 5-minutes of the class period on a daily basis (Murphy and Zlomke, 2014). In the current study, students who participated in this intervention also were amid statewide educational testing, as well as preparation for end-of-year exams. The WBPP was administered on days that the students did not have statewide testing. However, students were only allowed to participate in the WBPP during elective courses (i.e., P.E., art, foreign language). With previous research indicating it is possible that there were setting specific variables that were unable to be accounted for (i.e., students felt they were missing more desirable activities). There were also complaints about the reward for reaching the require PPR goal at the end of the program. Students wanted rewards that were not within the scope of the program and not approved by the school administration. These implementation challenges may have limited the potential positive impact of these interventions that have prior support for improving mental health. With the absence of a no-treatment control group, it is not possible to fully understand how student mental health would have changed in the absence of any treatment.

Students completed the *Program Feedback Request* as part of WBPP Session 10 procedures. The Program Feedback form collects qualitative data on students' perspectives on acceptability. Compiled student responses are in Appendix K. Feedback is overwhelmingly positive, and suggests understanding of many concepts taught in the program. It is interesting that most students indicated they intended to continue to use optimistic thinking as a strategy although the session devoted to optimism was omitted from the program, suggesting that the brief optimism activities added to session 9 (Hope) were salient to students. Positive activities involving Acts of Kindness and Using Signature Strengths were also popular. Changes in student mental health among students in the two intervention conditions is described next.

### **Emotional Well-Being**

Emotional well-being in this study was characterized as life satisfaction and the presence of positive and negative affect. It was predicted that there would be an observed difference preto post-assessment regardless of which condition the student was randomly assigned. Prior research with positive psychology interventions (PPIs) found PPIs to be significantly related to well-being, relationships, and academic performance (Waters, 2011). Being that this study used a multicomponent PPI that was also combined with an additional positive activity, we expected to see a significantly large effect size for life satisfaction as well as depression like prior research (Tejada-Gallardo et al., 2020). However, this study did not demonstrate any significant changes in indicators of emotional well-being (SWB) over time, or differences regarding emotional wellbeing and condition. However, some differences when reviewing the means each scale depict a trend in scores.

#### Life Satisfaction

In the current study, there were no observed statistically significant changes in global or domain-specific satisfaction over time or by condition. This study did find a statistically significant effect of grade on global life satisfaction (p < .05) indicating that grade level may influence students' perception of global life satisfaction which is in line with previous research that suggests there may be differences in salience of factors the older a student becomes (i.e., Yang et al., 2020). Specifically, students in 5<sup>th</sup> and 7<sup>th</sup> grade were found to have statistically significant different means of global life satisfaction, such that students in 5<sup>th</sup> grade reported higher satisfaction than all other groups. In this case, we could not rule out student grade as a moderating factor in whether differences in global life satisfaction may be observed.

Prior research suggests that school climate may predict about 19% of the variance in life satisfaction (Suldo et al., 2013). Being that the school setting emphasized discipline and order, it is likely that this may have affected student self-reported responses regarding satisfaction in multiple areas. Suldo and colleagues (2013) found that among middle school students, discipline and order, student interpersonal relations, parent involvement in schooling, and student-teacher relations were factors that accounted for variability in life satisfaction. Within the current setting students were observed to be under strict discipline and order due to the continuous behavior problems. In some sessions students expressed dissatisfaction with the discipline process. If students perceived that discipline was unfair in some, the fostering of life satisfaction may have been hindered instead of nurtured. Participants in this study reported moderate levels of global life satisfaction when beginning the study (M=3.72 for WBPP only; M=4.11 for WBPP+PPR). These mean scores indicate room for growth, but not extremely low life satisfaction. It is important to consider all of the situational factors specific to the setting of this study.

### Positive and Negative Affect

Positive and negative affect was measured by the PANAS-C-10. The results of the series of ANOVAs conducted in this study demonstrated no statistically significant changes in positive affect over time or by condition. Grade level was found to have s a statistically significant effect on self-reported levels of negative affect. Specifically, 5th grade students reported higher levels of negative affect than other grade levels. This lack of significant change in affect, either positive or negative, contrasts with findings from prior studies that use repeated measures analyses to assess subjective well-being over time. In particular, significant effects on positive and negative affect were reported when the WBPP was provided to a class of 12 fourth grade students (Suldo et al., 2015). These students were observed to have increases in positive affect and satisfaction with self, but no other statistically significant differences in indicators of externalizing behavior (i.e., office discipline referrals, attendance). In the present study, grade level was found significant for differences in negative affect among participants (p=.03). This finding suggests that students in 5<sup>th</sup> grade reported higher negative affect at the beginning of the intervention than all other grade levels (p=.02). Overall, this suggests that regarding emotional well-being, there were no differences across time or treatment condition, but grade may influence some of these effects as such that some students perceive specific grade levels as less satisfying.

When examining means of the student self-reported levels of positive and negative affect, students in the WBPP only experienced slight increases in both positive and negative affect,

indicating diminishing emotional well-being. Students who participated in the WBPP+PPR condition reported a slight decrease in positive affect with an increase in negative affect. It is likely that the accelerated and shortened version of the intervention may not yield similar results as the 10-session intervention (Roth et al., 2017; Suldo et al., 2015). A smaller sample size also may have contributed to the inability to detect differences in means if any are present in the actual population.

### **Behavior Problems**

Behavior problems in this study included both internalizing (i.e., depression, anxiety) and externalizing (i.e., conduct problems, hyperactivity) forms of behavior as measured by the SDQ. While PPIs typically improve students' positive emotions, the current study ncluded a behavioral component rooted in SWPBIS to improve externalizing behaviors. Prior studies indicated that combining these two components reduced both internalizing and externalizing forms of behavior than either condition alone (Cook et al., 2015). This study found no significant differences over time for changes in student externalizing nor internalizing behaviors.

### **Externalizing Behaviors**

For the WBPP+PPR condition, a slight decrease in peer problems was observed in reviewing the means of student reports, but this change was not statistically significant. Students in the WBPP only condition reported a small increase in peer problems from pre- to postassessment. It is also interesting to note that satisfaction with friends decreased for both conditions, which could be indicative of challenges in the study setting, but the average decreased more for students in the WBPP only condition. Findings from the current study may be location specific as it relates to externalizing behaviors; replication in other settings is warranted.

In this study, PPR more likely targeted peer relationships by increasing positive interactions. PPR has not yet been evaluated in a small group rather than class-wide format. Students verbally reported enjoying giving "positive comments" to peers and hearing them from their peers. Students also began to give positive comments to the facilitators and throughout sessions instead of just at the end of the it may be that the effects of this intervention did not generalize to the larger classroom setting. It would be helpful to identify ways to better generalize the purpose of the intervention to the general classroom setting as it was impossible to monitor students' interactions between sessions. While visual changes were observed in sessions with less disruptive behavior toward the end of the program and more positive interactions among students, this was not reflected to be statistically significant in this study. Since effects of increasing academically engaged behavior and reducing disruptive behavior have been observed in prior research (Morrison & Jones, 2007; Chaffee et al., 2020), it may be likely that the effects of this intervention did not generalize to the larger classroom setting. It would be helpful to identify ways to better generalize the purpose of the intervention to the general classroom setting as it was impossible to monitor students' interactions between sessions.

Previous research indicates that factors of student climate may increase the presence of anxiety and depression symptoms as well as oppositional behavior (Hendron & Kearney, 2016). In this sense, a snowball effect occurs, and students may begin to skip class or not engage if they feel they will gain nothing due to their disruptive peers. It would be interesting to examine whether the timing of the intervention would change the results of the study. For example, this study took place towards the end of the school year during a time where students were preparing for the summer break. It is possible that an increase in behavior problems were occurring with the end of the school year approaching or that students were becoming burnt-out with school given the high initial mean scores of externalizing behaviors (max=10).

Given the level of order and discipline within the school setting as well as the high rate of students who were identified by the screener due to room for growth in low life satisfaction, it would be interesting to examine whether a universal rather than group implantation of this intervention, with and without PPR, would produce greater effects. Such a modality would be warranted in the context of the current school setting, given the high number of students who met eligibility criteria during the screening process. Implementing interventions at Tier 1 vs. Tier 2 reduces chances for stigma experienced by students who participate in a selective intervention. A facilitator of the WBPP intervention noted that one student, who ultimately withdrew assent from the program, was teased about going to "be happy" when leaving for the program. This study was unable to control from any outside peer influences including statements made outside of the group session. These influences, as demonstrated in prior research, may also lead to student engaging in oppositional behavior (Hendron & Kearney, 2016). A universal implementation could have possibly led to the use of PPRs generalizing and decreasing the presence of disruptive behavior as seen in prior research involving the classwide implementation of PPR (Chaffee et al., 2020; Morrison & Jones, 2007).

Over time, the disruptive behaviors observed during sessions reduced by the end of the program for some participant groups. This was not reflected in the results of this study. Students in the WBPP+PPR also regularly called out and identified positive behaviors within sessions, especially after the sessions on signature strengths, instead of waiting for the end of the session. Facilitators observed student's strengths spotting in other students as a form of positive peer

reports. Future research should examine changes in office discipline referrals (ODRs) and use a more reliable measure of externalizing behaviors in addition to ODRs.

#### **Internalizing Behaviors**

Internalizing behaviors were measured using the PROMIS anxiety and depression short forms. Raw scores were used in the series of ANOVAs for ease of interpretation. No previous studies of the WBPP alone have demonstrated significant differences in symptoms of anxiety or depression but have evidenced trends for such (e.g., Roth et al., 2017). The results of the present study did not indicate any significant differences in either anxiety or depression over time or between conditions. There is less research in this area, however, research combining SEL with anxiety management strategies have been found to result in significant differences in internalizing symptoms (Cook et al., 2015). This suggests that possibly the inclusion of a behavior support, or strategies related to reduction of anxiety and depression, may result in larger outcomes over time. In the present study, students who participated in the WBPP+PPR group did evidence signs of decrease in anxiety and depression symptoms, but this decrease evidenced in means reported in Table 8 was not statistically significant. Interestingly, students who received the WBPP only reported a small increase in symptoms of anxiety and no change in depression (M=16.86 pre- and 18.43 post-assessment for anxiety; M=18.64 pre- and post-assessment fordepression).

Within sessions, there were observed changes by the facilitator in specific groups of students' behavior as students would interact positively during session and correct any other student who was acting negatively towards peers. While students verbally reported feeling happier and better able to deal with their emotions at school, this was not reflected in the results of this study. In addition, students also reported better relationships at home due to activities

such as gratitude visits and gratitude journaling. Some students also reported performing acts of kindness for their parents and siblings following the sessions on those topics. It would be interesting to examine whether the 5-week version of the WBPP yields differing outcomes than the 10-, or 9-week version, especially as it relates to improvements in positive and negative affect.

### **Peer Relationships**

Peer relationships were evaluated based on the satisfaction with friends subscale of the MSLSS and the peer relationships subscale of the SDQ. Peer relationships has not been previously evaluated (or reported) in prior research of SEB supports. Students in the WBPP+PPR condition reported a reduction in peer problems while students who participated in the WBPP only reported an increase in peer problems, but this difference was not found to be statistically significant. Both groups demonstrated a small reduction in satisfaction with friends and show continual room for improvement. This difference was not statistically significant.

During one session, students described a sometimes-hostile climate within the school setting due to peer influences. This is in line with prior research that suggests student perceptions of satisfactions depends on how safe students feel within the school setting (Suldo et al., 2013). Victimization by peers was deemed an influence on school climate in previous research (Long et al., 2021). As discussed with previous variables in this study, it is likely that the small sample size used in this study yields results that are more indicative of situational specific factors.

With research supporting PBIS combined with SEL as a superior mechanism to improve student outcomes than either component alone (Cook et al., 2015), this researcher hypothesized that the WBPP with PPR would produce better outcomes than the WBPP alone. In previous studies, the WBPP demonstrated changes in life satisfaction, positive affect, and negative affect of students who participated in the program compared to those who did not (Suldo et al., 2015; Roth et al., 2017). However, with the small sample size of 14 and 12 students in either condition, there were no statistically significant differences found in the current study that featured an abbreviated intervention period during a period of end-of-year testing. While some trends in differences are suggested when examining post-assessment means of the two groups, it is important to note that the pre-assessment means were not equal between groups.

#### **Implications for Practice**

One important implication for practitioners includes deciding whether a classwide or universal rather than group or selective intervention would be more applicable to the school setting. The screening results of this study indicated that a universal or classwide approach may have been more appropriate to assist students in this school setting. As such, the challenges that students experienced outside of sessions were still apparent. With research suggesting that school climate is an important factor in improvements in student emotional and behavioral health, educators should be more diligent in choosing the correct modality of interventions.

In thinking about a selective rather than a classwide approach, another implication for practice includes selecting appropriate evidence-based interventions. In this study, PPR was used as a behavioral support. Previous research with PPR has only been evaluated in classwide settings, allowing generalization in this setting. In the current study, PPR was administered in a group format rather than classwide. The effects of this behavioral intervention may not have generalized to the classroom setting since all students did not participate in the intervention. For future uses of the WBPP with a behavioral support, it would be important for educators to identify a behavioral intervention that has been evaluated at the level of the intended intervention (i.e., universal, selective, individual).

It is important to get student perceptions of intervention acceptability, especially when evaluating a modified intervention. Prior research suggests that students are more likely to engage with interventions they find to be acceptable. Educators should continue to strive to ask students for their feedback regarding the implementation of any intervention. This study shows promise that even with results that are not statistically significant, qualitative reports from students tell a different story. Students overall seemed to enjoy the program and wished that other students would get to experience it. It is also telling that the vast majority of students were not opposed to attending sessions, and it did not appear that students viewed the intervention as a negative consequence of their behavior. It is important for schools to continuously monitor acceptability of interventions within the school setting.

This study also demonstrated that it was possible to combine PPR with the WBPP. Facilitators verbally reported being able to implement PPR easily and with fidelity as evidenced by each session fidelity about 90%. For educators, this suggests that it may be helpful, and easy, to include a behavioral component to PPIs. This study also shows evidence that adding a behavioral support, especially for a school with high levels of disruptive behavior, may lead to better outcomes as evidenced by smaller increases in externalizing behavior reported by students in the WBPP+PPR condition.

In future uses of any intervention across multiple grade levels, another lesson learned of this current study is to identify rewards that are of high interest for each grade level. While it is easier and possible more cost-effective to have a set list of rewards for all students to access, it is also likely that the selected rewards may not have motivated all students in the same way. For example, fifth and sixth grade students appreciated the opportunity to make slime at the end of the program as a reward, but not all older students shared this enthusiasm.

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Practitioners should also be mindful about when they provide a tier 2 support and over how much time. The current study implemented the intervention toward the end of the school year during testing, in an accelerated format than previously studied. Previous studies with the WBPP were conducted over longer periods of time and earlier in the school year. Educators and practitioners should consider the timing of an intervention before implementation. Older students (sixth grade and beyond) may experience more testing-related stress than younger students (i.e., fifth grade students) due to increased state standardized testing in addition to end-of-year subject area exams. As such, it may be more helpful to conduct interventions earlier in the school year for improvements to be maintained throughout the year and for students to be able to use the skills they learned in high stress times (i.e., during exam time).

Mental health is often stigmatized in minoritized populations which can hinder treatment and pursuit of well-being (Gary, 2005). During this study, one student who subsequently withdrew assent, was observed to be teased by another student for going to the "happy program." In future implementations of the WBPP, educators in given setting should plan for how to prevent and manage negative sentiments directed towards participating students, perhaps as part of a larger plan to mitigate the stigma of mental health care. It is recommended that any negative comments are addressed immediately, in addition to psychoeducation for all students and staff on the importance of mental health supports, and that seeking support is tied to improved skills, resources, and outcomes rather than indicating that something is wrong with you.

### Limitations

One limitation of this study is the lack of generalizability. All participants in this study attended one single K-8 school in a southeastern state. As such, findings cannot be extended to populations outside of this geographic region, especially with the small sample size. There may have been situational factors specific to location that influenced the results of this study. A true experiment does not allow the researcher to necessarily control for extraneous variables such as motivation to engage, teacher initiatives to improve behavior, or parental support at home. As such, this is a concern for the study and is noted as a limitation. It is possible that by sampling students on an individual level rather than a classroom level, other factors such as teacher practices may cause concerns in the results of this intervention. For example, one student may show more positive outcomes than another student if their teacher is perceived as warm and inviting and if the teacher includes strategies to increase happiness within their classroom.

Sample size is also a limitation for this study. Due to the low number of participants in 7<sup>th</sup> and 8<sup>th</sup> grades, these students were unable to be randomly assigned to both conditions. As such, all 7<sup>th</sup> graders were selected to randomly receive PPR, and the 8<sup>th</sup> grade students were selected to receive the WBPP only. This caused the researcher to be unable to assess for differences in these grade levels with and without PPR. In the analyses, grade and treatment group were confounded due to the lack of multiple groups for each grade level, which reduces the ability to identify some of the treatment effects after controlling for grade level. A small sample size also makes it difficult to determine whether the study's findings are true findings, or whether type II errors are occurring in that the null hypothesis is incorrectly accepted that no differences are observed. A larger sample size may afford more sensitivity to detect between-group differences. As such future research should prioritize recruiting a larger sample size.

Reliability of a measure refers to its consistency and can be determined by calculating Cronbach's alpha. A Cronbach's alpha is generally considered acceptable if the value is above .70 (Taber, 2018), while some scholars report values 0.6-0.7 as acceptable (Griethuijsen et al., 2014). In this study, the SDQ and PANASC-10 both indicated a reliability below  $\alpha$ =.70 which

indicates low correlation on the measures, and thus indicates the possibility of poor relatedness between items. As such, caution is warranted when interpreting results. To improve internal consistency, more items can be added, or a different measure for positive and negative affect and externalizing behaviors may be used. Low reliability could also stem from the total number of questions in a measure and how difficult the question may be for your audience.

The use of self-reported data in this study is also a possible limitation. Students were able to self-report their feelings. It is possible that the Hawthorne effect occurred, meaning that students behaved or responded differently because they knew they were being observed. Although the facilitators of the intervention reminded students that their individual responses were kept confidential, it is possible that students responded to the post-assessment in a way that they thought we would like for them to respond.

While the limits of confidentiality did not change, there was the potential for some students to be singled out because of their participation in the study if other students or staff found out that they were involved in the study from other study participants. Group facilitators did notice one student being actively teased for being in the program, and this student subsequently stopped attending sessions.

#### **Summary and Future Directions**

The results of this study failed to prove that a culturally adapted PPI combined with a behavioral support produced better outcomes for students who only receive a culturally adapted PPI. It is important for school professionals and other researchers to keep in mind the low reliability of the measures used as well as previous research that have found improved student outcomes with other PPIs and behavioral interventions (i.e., Shoshani & Steinmetz, 2014; Suldo et al., 2014; Cook et al., 2015; Roth et al., 2017). Thus, the unanticipated findings from this study may

be situation specific, due to a small sample size, or due to low internal consistency of the measures used.

With prior research that demonstrates the effectiveness of either PPIs or PBIS-based behavioral interventions, it is likely that a different combination of interventions may produce favorable outcomes. For example, using a behavioral intervention that specifically targets externalizing behaviors or an internalizing behavior (i.e., anxiety) may produce favorable outcomes in those specific areas. It is also likely that the accelerated nature of this program during "testing season" for these students did not produce favorable outcomes. Some students noted that they would rather miss a different class period or that they wish it was not twice per week.

Although the results of this study were insignificant, the study raises more questions for future research. The high levels of acceptability for the culturally adapted WBPP provides evidence of promise for readiness of inclusion in future students conducted to evaluate impact. Future research should aim to recruit a larger sample size. In addition, future research should include different measures of externalizing behavior and peer relationships that can demonstrate better reliability than the measures used in this study. It may also be helpful to not use an accelerated approach to the WBPP to ensure that all students understood the concepts being taught and sufficient opportunity to practice the positive activities introduced in a given session. Future research should also aim to determine whether improved acceptability and positive impact on student mental health follow a universal/classwide implementation of the WBPP and WBPP + PPR than a small group modality, particularly in school contexts that indicate high levels of student need.

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## APPENDIX A: NOTIFICATION OF SCREENING

# **Notification of Screening**

March 2, 2022

Dear Parent or Guardian,

is beginning an exciting partnership with the University of South Florida (USF) to deliver the Well-Being Promotion Program to select 5<sup>th</sup>-8th grade students. The Well-Being Promotion Program is an extra support designed to increase students' happiness.

To assess students' current level of happiness, all students in grades 5-8 will be asked to complete a short survey about their satisfaction with multiple areas of life, and their current behavior. This survey takes about 5-10 minutes to complete, and students' responses will be kept confidential. Extra support will be offered to students whose screening data suggests that they might benefit from the Well-Being Promotion Program. This support offered involves 10 group sessions led by Ms. Jasmine Gray and other graduate students from the USF School Psychology Program, supervised by Dr. Shannon Suldo. Within each session, students learn about different ways to increase their satisfaction with their past, present, and future endeavors. In addition to completing activities to increase gratitude, kindness, and hope, students will identify their character strengths and plan how to apply their strengths at home and school. Some students will also receive an additional behavioral support called Positive Peer Reporting, which is designed to increase positive interactions with classmates.

If you would like any additional information, please call the school at PHONE NUMBER and ask for SCHOOL CONTACT. If you are okay with your student completing the short survey of their happiness and behavior, you do not need to take any further steps; either keep this letter for your records or select "yes" below and return the signed form to your child's teacher. If you would prefer that your child <u>not</u> take part in this screening, please select "no" below and return the signed form to your child's teacher by Wednesday, March 9<sup>th</sup>, 2022.

Sincerely,

Jasmine Gray, M.A. Doctoral Candidate USF School Psychology Program

Yes, I give permission for my student (	) to
No, I do not give permission for my student (	)

Student's Name

Parent's Signature

Date

## APPENDIX B: PARENT CONSENT FORM

Dear Parent or Caregiver:

This letter provides information about a project that will be conducted at your child's school by school psychology trainees from the University of South Florida (USF). The goal of the project is to evaluate promising school-based counseling programs that can improve students' social, emotional, and behavioral well-being.

- ✓ <u>Who We Are</u>: The USF team is led by Ms. Jasmine Gray, a doctoral candidate in the School Psychology Program at USF under the supervision of Dr. Shannon Suldo. Our team of trained graduate students is planning the project in cooperation with school leaders to ensure the project provides information that will be helpful to the school.
- ✓ Why We are Requesting Your Child's Participation: This project is part of Ms. Gray's dissertation entitled, "The Integration of Positive Psychology and Positive Behavioral Interventions and Supports to Improve Minoritized Students' Social, Emotional, and Behavioral Outcomes." Your child is being asked to participate because he or she is enrolled at grade.
- ✓ Why Your Child Should Participate: Schools need evidence-based programs to help students improve their social, emotional, and behavioral health, especially in the midst of the COVID-19 pandemic. To address this need, we are providing a 10-session group intervention designed to improve the happiness of students who engage in the program. The information that we collect from students in sessions will help us to evaluate the extent to which this is an acceptable and effective intervention to improve student well-being. Please note neither you nor your child will be paid for your child's participation in the project. However, all students who participate will receive an incentive for completing homework activities related to session content.
- ✓ What Participation Requires: Students with permission to participate will be asked to complete two assessments (one at the beginning of the intervention and one at the end of the intervention) as well as participate in 10 group sessions. The assessment will take no longer than 20 minutes to complete. The assessment will examine student levels of life satisfaction, positive and negative emotions, peer relationships, and symptoms of emotional or behavioral problems. Student responses to these assessments will be kept confidential and will be pooled for the results of the study. Individual responses will not be shared with your child's teacher or school administration. Each of the 10 sessions will last about 45 minutes. The sessions will occur during regular school hours, scheduled to be minimally disruptive to your child's time during the 2021-2022 school year.
- Please Note: Your decision to allow your child to participate in this project is completely voluntary. You are free to allow your child to participate in this project or to withdraw him/her/them at any time. Any decision to participate, not to participate, or to withdraw participation at any point during the study will in no way affect your child's student status, their grades, or your relationship with your child's school, USF, or any other involved party.

- ✓ Confidentiality of Your Child's Responses and Project Risks: This project is considered to be minimal risk. This means that the risks associated with this project are the same as what your child faces every day. There are no known additional risks to those who take part in this project. Your child will receive no benefits by participating in this project aside from the possibility of improved happiness and peer relationships. Your child's privacy and records will be kept confidential to the extent of the law. The USF team will not share your child's individual responses with school personnel or anyone other than our trained staff. Please be aware, though, that we cannot guarantee that what your child says during the group sessions will not be repeated by other students who participate in the same group session. Your child's responses to the assessments will be assigned a code number to protect the confidentiality of their responses. Only we will have access to the locked file cabinet stored at USF that will contain all records linking code numbers to participants' names. All records from the project will be destroyed in five years. Please note that although we aim to protect your child's confidentiality at all times, if your child indicates that he or she intends to harm him or herself or someone else, we will contact the school counselor to ensure the safety of your child and others.
- ✓ What We'll Do With Your Child's Responses: We plan to use the information from the individual assessments to evaluate the effectiveness of program on children's social, emotional, and behavioral health. Results from data collected during this project may be published. However, the data obtained from your child will be combined with data from other students in the publication. The published results will not include your child's name or any other information that would in any way personally identify your child, including the name or location of the school.
- ✓ <u>Questions?</u> If you have any questions about this project, please contact us at (813) 421-1034 (Jasmine Gray) or (813) 974-2223 (Dr. Suldo).
- ✓ <u>Want Your Child to Participate?</u> To permit your child to participate in this project, complete the consent form below (titled "Consent for Child to Participate in this Program Evaluation"). <u>Have your child return the completed form to their teacher</u>. Please keep a picture or copy of this letter for your records.

Sincerely,

Jasmine L. Gray, M.A. Doctoral Candidate College of Education Psychological Studies Shannon Suldo, Ph.D. Professor of School Psychology Department of Educational and

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### **Consent for Child to Participate in Program Evaluation**

I freely give my permission to let my child take part in this project. I have taken a picture of, or otherwise copied, this letter and permission form for my records.

\_\_\_\_\_

Printed name of child	Grade level of child	Child's teacher
Signature of parent of child taking part in the study	Printed name of parent	Date

**Statement of Person Obtaining Parent/Guardian Permission (for USF Staff only)** I certify that participants have been provided with an informed consent form that explains the nature, demands, risks, and benefits involved in participating in this project. I further certify that a phone number has been provided in the event of additional questions.

Signature of person obtaining parent	Printed name of person obtaining parent	Date
permission for child's participation	permission for child's participation	

# APPENDIX C: STUDENT ASSENT FORM

### Dear Student:

Today you will be asked to take part in a project by responding to several questions during a group discussion. This study is part of a larger project we are conducting. The goal of the project is to develop an educational program to help students improve their happiness and behavioral functioning. This program is intended to improve students' academic outcomes and emotional well-being.

- ✓ Who We Are: I am Jasmine Gray, a doctoral candidate in the School Psychology program at the University of South Florida under the supervision of Dr. Shannon Suldo. My research team of trained graduate students and I are working with your school's leadership to make sure this study provides information that will be helpful to your school.
- ✓ Why We're Asking You to Take Part in the Project: This project is part of a dissertation titled, "The Integration of Positive Psychology and Positive Behavioral Interventions and Supports to Improve Minoritized Students' Social, Emotional, and Behavioral Functioning." You are being asked to take part because you are a student enrolled at grade.
- ✓ Why You Should Take Part in the Project: We are in the process of helping schools identify a program that can be used to increase student's happiness and reduce behavior problems at school. The information that we collect from student surveys will be used to identify students who may benefit from our program and determine whether the program worked. Please note you will not receive money in exchange for taking part in the study. However, all students who participate will receive an incentive (i.e., chips or time to play games) for completing homework assignments related to session content in the program.
- ✓ <u>Participating in Group Sessions:</u> You are being asked to take part in 10 group sessions and complete two assessments. The group sessions and assessment completion will occur during regular school hours. We will schedule them to be least disruptive to your academic course schedule. During the group sessions, we will talk about topics such as gratitude, hope, optimism, and becoming your best possible self. The assessment will be the same and given at the beginning and end of the program. The assessment will ask about your life satisfaction in multiple areas, positive and negative feelings, experience with anxiety or depression, and presence of certain behaviors. In total, participation will take no more than 12 hours of your time during the 2021-2022 school year.
- ✓ <u>Please Note</u>: Your involvement in this project is completely voluntary. By signing this form, you are agreeing to take part in this project and participate in a group program. If you choose not to participate, or if you wish to stop taking part in the study at any time, you will not be punished in

any way. If you choose not to participate, it will not affect your grades or your relationship with your school, USF, or anyone else. You do not have to participate in this project.

- ✓ <u>Confidentiality of Your Responses and Project Risks</u>: This project is considered to be minimal risk. That means that the risks associated with this study are the same as what you face every day. There are no known additional risks to those who take part in this project. You will receive no benefits by participating in this project. Your privacy and records will be kept confidential (private, secret) to the extent of the law. People approved to work on this project may review the records, but your individual responses will not be shared with people in the school system or anyone other than us and our research assistants. Please be aware, though, that we cannot guarantee that what you say during the group sessions will not be repeated by other students who participate in the same group session. Your responses to the assessments will be given a code number to protect the privacy of your responses. Only we will have access to the locked file cabinet stored at USF that will contain all records linking code numbers to names. Please note that although your specific responses will not be shared with school staff, if you indicate you plan to harm yourself or someone else, we will let school mental health counselors know in order to make sure you and others are safe.
- ✓ What We'll Do With Your Responses: We plan to use the information from the assessments to determine whether the program helped to improve your happiness and academic outcomes. The results of this project may be published. However, your responses will be combined with responses from other people in the publication. The published results will not include your name or any other information that would in any way personally identify you.
- ✓ <u>Questions?</u> If you have any questions about this project or if you have questions about your rights as a person who is taking part in a project, please raise your hand now or ask us at any time during the group sessions. Also, you may contact us later at (813) 421-1034 (Ms. Jasmine) or (813) 974-2223 (Dr. Suldo).

Sincerely,

Jasmine L. Gray, M.A.	Shannon Suldo, Ph.D.
Doctoral Candidate	Professor of School Psychology
College of Education	Department of Educational and
Psychological Studies	

### Assent to Take Part in this Project

I freely give my permission to take part in this study. I understand that this is research. I have received a copy of this letter and assent form for my records.

Signature of child taking part in the study

Printed name of child

Date

### Statement of Person Obtaining Informed Assent (for USF staff only)

I certify that participants have been provided with an informed assent form that has been approved by the University of South Florida's Institutional Review Board and that explains the nature, demands, risks, and benefits involved in participating in this study. I further certify that a phone number has been provided in the event of additional questions.

Signature of person obtaining assent

Printed name of person obtaining assent

Date

# APPENDIX D: WELL-BEING PROMOTION PROGRAM PROTOCOL MODIFICATIONS

Session/Week	Target	Activities
1	Positive introduction	Icebreaker: Two things that make you
		happy
		You at your best
		Homework: You at Your Best
	Phase 1: Past eme	otions
2	Gratitude	Gratitude journals
3	Gratitude	Gratitude visit
	Phase 2: Present er	notions
4	Kindness	Kindness challenge
		Acts of kindness
		Homework: identify and perform acts
		of kindness
5	Character strengths	Introduction to strengths
		VIA posters
		Strengths bingo
		Homework: identify strengths of
		family members and peers
6	Character strengths	Survey assessment of signature
	_	character strengths
7	Character strengths; savoring	Use of signature strengths in new
		ways; savoring methods
	Phase 3: Future en	notions
9	Норе	Replacing Negative Thoughts with
		Positive Affirmations
		Best-possible self in the future
		Homework: Using positive
		affirmations
10	All	Termination; review of strategies and
		plan for future use at home and
		school

# WBPP Modified Session Sequence and Activities

Session 1	: You at You	r Best Modifications
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~ .	
Goals	• Establish group rapport and a supportive environment.
	• Introduction to positive peer reporting.
	• Increase awareness of subjective well-being.
	Introduce students to the broad determinants of happiness.
Overview of	A. Get to Know You Activity: Two Things that Make Me Happy
Procedures	Icebreaker
	B. Introduction of Positive Peer Reporting (Intervention Group Only)
	C. You at Your Best Activity
	D. Group Discussion: Initial Definition and the Importance of Happiness
	E. Clarify Purpose of the Group
	F. Establish Group Norms
	G. Homework: You at Your Best
Materials	• Facilitator binder to hold documents provided and created throughout
	the program, to stay in the practitioner's possession for ready access at
	the beginning of each group session
	• Folder in which students can transport group homework assignments, to
	stay in the student's possession for ready access between group
	meetings
	• White board or easel
	What Determines Happiness? figure
	What Determines Happiness? handout
	Overview of Program Activities handout
	Confidentiality handout
	Procedures Defined
A. Get to Know	v You Activity: Two Things that Make Me Happy Icebreaker
Set the Stage	Before we talk about why we're all here in this group, I'd like to do an
0	activity to help us get to know one another, in particular things that make
	us happy. We're going to go around the room and say two things that make
	us happy. I'll give us 3 minutes to think about it, and then I will start us off.
	Wait 3 minutes – you may use a timer to keep you on track
	Facilitator will begin the activity by identifying two things that make them
	happy. Examples: being in school, helping others, pets, family members,
	hobbies, etc.
	n of Positive Peer Reporting (Intervention Group Only)
Set the Stage	Now that we know a little bit about each other, I'd like to introduce
	something that we will be doing during each time we meet together. This is
	called Positive Peer Reporting.
	Facilitator will adhere to the Docitive Dear Departing protocol "A mandiage
	Facilitator will adhere to the Positive Peer Reporting protocol " <u>Appendices</u> to Session 1: Introducing and Teaching Positive Peer Reporting"
	<u>10 Session 1. Introducing and Teaching Positive Peer Reporting</u>

C. You at Your	C. You at Your Best Activity	
Set the Stage	Now, I'd like to do an activity to help us identify things that we are good at.	
G. Homework: \	Facilitator will adhere to original Session 1 protocol at this time, beginning with the You at Your Best activity by providing students with writing materials. (A. Get to Know You Activity: You at Your Best)	
Set the Stage	Discuss specific incentives that will be provided weekly for completion of	
	group homework, such as school supplies, stickers, candy, tickets toward rewards used in the school's PBIS program, and so on.	
Assign	<ul> <li>For each night this week, students should read their story and think about the strengths they demonstrated in the story. They can share the story with family members or someone else if they like.</li> <li>Before the next session, students should be instructed to write a story about their community or school. Similar to "You at Your Best" students should write about a time when they felt their school/community/neighborhood was "at their best." Students will be invited to share their stories next session.</li> </ul>	
Looking	• A brief discussion in the next session will touch on student follow-	
Ahead	through with homework and resulting feelings of happiness.	

No modifications to Sessions 2 and 3.

#### Session 4: Acts of Kindness Modifications

[	
Overview of	A. Review Homework: Gratitude Visits and/or Gratitude Journals
Procedures	B. Group Discussion: Initial Definition and Importance of Kindness
	C. Student Estimations of Acts of Kindness
	D. Homework: Performing Acts of Kindness and the Kindness Challenge
	Procedures Defined
D. Homework:	Performing Acts of Kindness and the Kindness Challenge
	each, and Sheldon (2004) found that people who performed five acts of
kindness in 1 day	<i>y</i> , each week for 6 weeks, showed a significant increase in well-being. This
week's homewor	k assignment is based on that and subsequent research.
Assign	<ul> <li>I want you to pick a day this week to perform five acts of kindness. As we talked about, acts of kindness are behaviors that benefit other people or make others happy, typically at the cost of your time and effort. They can range from small acts, like giving a compliment or holding a door, to large acts like helping your dad wash his car.</li> <li>Help students brainstorm some ideas of the acts of kindness they might like to perform.</li> <li>Which can they do at school? [In the classroom? Before school or during lunch?]</li> <li>Which can they do at home?</li> <li>Distribute the Acts of Kindness Record Form to jot down their plans</li> </ul>
	as well as record additional kind acts after they have been performed.
	• Ask students to decide on a date to perform the acts.
	<ul><li><i>Additionally, I have a challenge for you all for the next week.</i></li><li>Distribute Kindness Challenge worksheet</li></ul>
	For the students who complete the kindness challenge, they will receive an additional reward. Once you check off that act of kindness, you must get the person to "sign off" or write their initials that you completed the act. It must be another adult at the school, or an adult at home.

### Session 5: Introduction to Character Strengths Modifications

Overview of	A. Review Homework: Performing Acts of Kindness and the Kindness
Procedures	Challenge
	B. Group Discussion: Character Strengths and Virtues
	C. Student Identification of Perceived Character Strengths
	D. Activity: Strengths Bingo
	E. Group Discussion: Positive Feelings in the Present
	F. Homework: Continue Performing Acts of Kindness and/or Identifying
	Strengths of Others
Materials	Tangible rewards for homework completion
	• Blackboard, white board, or easel
	Lined paper
	• VIA Classification of 24 Character Strengths handout
	Strengths Bingo handout
	<ul> <li>Performing Acts of Kindness Record Form Handout</li> </ul>
	<ul> <li>Strengths Identification Worksheet Handout</li> </ul>
	Strengths Identification worksheet Halidout     Procedures Defined
	r rocedures Denned
D. Activity: Stre	engths Bingo
Set the Stage	Now, I want us to play around with our strengths a little more. We are
0	going to play a game or two of Strengths Bingo (depending on time). I will
	read the description of a strength on your VIA Classification of 24
	Character Strengths handout. You will have to figure out which strength I
	am describing a use the Bingo chips that you have been provided to mark it
	off on your individual Bingo cards. The first person to shout "Bingo" will
	win a prize!
Materials	Pass out individual Bingo worksheets to each student
E. Group Discus	ssion: Positive Feelings in the Present
Introduce the	Facilitator will continue with original protocol section "D. Group
Actions-	Discussion: Positive Feelings in the Present"
Feelings	
Connection	
	Continue Performing Acts of Kindness and/or Identifying Strengths of
Others	
Assign	Just like last week, I want you to pick a day this week to perform five acts of
	kindness. Remember, changes in happiness occur with repeated use of
	exercises such as performing acts of kindness.
	• Distribute an Acts of Kindness Record Form to jot down their plans as
	well as to record additional kind acts after they have been performed.
	• Ask students to decide on a date to perform five acts of kindness.
Others	<ul> <li>kindness. Remember, changes in happiness occur with repeated use of exercises such as performing acts of kindness.</li> <li>Distribute an Acts of Kindness Record Form to jot down their plans as well as to record additional kind acts after they have been performed.</li> </ul>

practice identifying strengths in up to 10 people to identify their sibling, friend, teacher, or a per	
e e	ification Worksheet for students to identify
individuals and their strengths	
	e of the person and their strengths in the
boxes on the worksheet.	
<ul> <li>Remind students that they have</li> </ul>	ve the VIA Classification of 24 Character
Strengths handout that they can	use to remind them of strengths to identify.

No modifications to Sessions 6 and 7. Session 8 has been omitted.

#### **Session 9: Hope Modifications**

Overview of	A. Review Homework: Optimistic Thinking
Procedures	B. Initial Appraisal of Hope
110000000000	C. Group Discussion: Definition and Importance of Hope
	D. Activity: Replacing Negative Thoughts with Positive Affirmations
	E. Writing Activity: Best Possible Self in the Future
	F. Homework: Best Possible Self in the Future (expanded) and/or Using
	Positive Affirmations
Materials	Tangible rewards for homework completion
	Blackboard, white board, or easel
	Lined paper and/or sticky notes
	• Examples of Optimistic Thinking handout
	New Uses of My Fourth Signature Strength handout
	My Optimistic Thoughts handout
	Creating Affirmations handout
	Acts of Kindness Record Form handout
	Positive Affirmations Record Form
	Procedures Defined
D. Activity: Re	placing Negative Thoughts with Positive Affirmations
Provide	An affirmation is a form of emotional support or encouragement. Given our
Rationale	discussion about how hope and optimism tie in together, I would like for us
	to take some time to create a positive affirmation of our own that can help
	us feel motivated to work toward our positive future goals. Examples of
	positive affirmations include:
	• I am worthy
	• I am confident
	• I believe in my dreams
	Are there any positive affirmations that you all can think of?
	• Engage students in discussion and write examples on the board.
Introduce	Hand out the Creating Affirmations worksheet
Activity	Now, I want you all to think of one negative thought that you have had. This
	can be something you think often, or something negative that you may have
	told yourself after receiving a bad grade. I want you to write the negative
	thought on a sticky note or piece of paper. Use the worksheet I provided to
	write a positive affirmation that is the opposite of your negative thought.
	After you have written your positive affirmation, crumbled your sticky note
	or piece of paper in a ball and throw it in the trash. From now on, I want
	you to say your positive affirmation when you think the negative thought.
	• Give students 5-8 minutes to complete this activity.
	• Make sure to assist students who may have trouble creating a positive
	affirmation.
	tivity: Best Possible Self in the Future
Facilitator will u	se original protocol "D. Writing Activity: Best Possible Self in the Future"

F. Homework: Affirmations	Best Possible Self in the Future (expanded) and Using Positive
Assignment 1	I want you to continue writing about your best possible selves in the future. Review your story each night and add new thoughts and ideas. You can also make changes to what you have already written. Focus on identifying ways you can achieve the goals you imagine for your future.
Assignment 2	In addition to continuing our story, I want you to practice using positive affirmations this week. Each of you will be given a form to record when you use your affirmations. You may use the affirmation that you created in session today, or you may come up with a new affirmation that helps you to visualize your best possible self in the future. • Hand out the Positive Affirmations Record form.

No modifications to Session 10.

# APPENDIX E: POSITIVE PEER REPORTING (PPR) PROTOCOL

### **Appendices to Session 1: Introducing and Teaching Positive Peer Reporting**

**Step 1:** Teach students how to properly praise each other.

Set aside 5-10 minutes at the beginning of the session to review the fundamentals of praise statements with your group. Begin the lesson by paying several compliments to students. Examples:

- Tom, I like how you made it to session in a reasonable time even though you had a long way to walk.
- Anita, I love that you are being engaged today.
- Franklin, I like how you were honest today.

Introduce the concept of 'praise' and define the term for students.

We are going to practice giving praise to our peers each time that we meet. Praise is used when you express admiration or approval of something. For example, "I'm happy to see you working like that" or "You're working really hard today." What are some other forms of praise that you would like to hear from your friends?

Ask students to volunteer positive statements that they know their friends like to hear.

- Call on students to give their own examples of praise. Encourage discussion about when students might use these statements.
- You may also make statements using character strengths.

Step 2: Introduce the Positive Peer Reporting intervention.

Each session I will announce at the start of group the names of 1-2 students. The students that are chosen will be different each session so that every student has a chance to be selected. The names will be chosen at random. At the end of each session, we will review the list of chosen students. For each student chosen, I will ask for volunteers to raise their hands to offer praise statements about that person. If I call on a student and that student is able to offer a sincere and appropriate compliment about the person on the list, the group will earn a point toward the larger group reward that will be given at the end of the program on week 10. The group has to earn 75 points by the end of the program to earn the reward.

Step 3: Start the Positive Peer Reporting intervention.

- Be sure to keep a list of students that were chosen for each session so that each student gets a chance to be selected. If you would like, you may strategically select students to be chosen. For example, if Eric seems to struggle with confidence or being positive, you may select him during the optimism or hope week.
- Announce the list of names to the group and remind the group that they will be asked to come up with compliments for each student on the list at the end of session. (You may want to write the names of the selected students on the blackboard as an additional memory aid.)

- At the end of the session, review the list. For each name listed, ask students to go one-byone and provide one compliment. You may choose whether to provide all compliments to one student first or to let students give all their compliments to both students at once.
- Tally the number of compliments given and add that number of points toward the class group reward. Be sure to announce to the students their progress.

### **Positive Peer Reporting Protocol for Sessions 2-9**

Start the Positive Peer Reporting intervention before beginning the session for the day. Repeat step 3 (copied below) and remind students of their current progress towards the group goal. Remind students that if they have provided at least 75 compliments over the duration of the program collectively, they will earn the group reward decided by the school administration.

- Be sure to keep a list of students that were chosen for each session so that each student gets a chance to be selected. If you would like, you may strategically select students to be chosen. For example, if Eric seems to struggle with confidence or being positive, you may select him during the optimism or hope week.
- Announce the list of names to the group and remind the group that they will be asked to come up with compliments for each student on the list at the end of session. (You may want to write the names of the selected students on the blackboard as an additional memory aid.)
- Proceed with the content for the session.
- At the end of the session, review the list. For each name listed, ask students to raise their hand if they have an appropriate compliment for the student. Once an individual has received 2-3 genuine compliments, move to the next name on the list.
- Tally the number of compliments given and add that number of points toward the class group reward. Be sure to announce to the students their progress.

## **Positive Peer Reporting Protocol for Session 10**

- Announce that all students will be chosen this week and remind the group that they will be asked to come up with compliments for each student at the end of session.
- Proceed with the content for the session.
- At the end of the session, ask students to raise their hand if they have an appropriate compliment for each student. Be sure to proceed with each student one-by-one and announce which student is being complimented Once an individual has received 2-3 genuine compliments, move to the next student.
- Tally the number of compliments given and add that number of points toward the class group reward. Be sure to announce to the students their progress and whether they have obtained the group reward.

Remember: If students have provided at least 75 compliments over the duration of the program, they will earn the group reward decided by the school administration.

## APPENDIX F: BRIEF SCREENER FOR STUDY INCLUSION

We would like to know what thoughts about life you've had *during the past several weeks*. Think about how you spend each day and night, and then think about how your life has been during most of this time. For each statement, circle a number from (1) to (7), where (1) means you feel *terrible* about that area of life and (7) means you are *delighted* with that area of life.

During the past several weeks	Terrible	Unhappy	Mostly Dissatisfied	Mixed (about equally satisfied & dissatisfied)		Pleased	Delighted
1. I would describe my satisfaction with my <i>family life</i> as:	1	2	3	4	5	6	7
2. I would describe my satisfaction with my <i>friendships</i> as:	1	2	3	4	5	6	7
3. I would describe my satisfaction with my <i>school experience</i> as:	1	2	3	4	5	6	7
4. I would describe my satisfaction with <i>myself</i> as:	1	2	3	4	5	6	7
5. I would describe my satisfaction with <i>where I live</i> as:	1	2	3	4	5	6	7
6. I would describe my satisfaction with my <i>whole life</i> as:	1	2	3	4	5	6	7

The next items ask about your behavior *over the last six months*. For each statement, circle a number from (0) to (2), where (0) means Not True, (1) means Somewhat True, and (2) means Certainly True. It would help us if you answered all items as best you can even if you are not absolutely certain.

In the last 6 months		Somewhat True	Certainly True
1. I am restless, I cannot stay still for long	0	1	2
2. I get very angry and often lose my temper	0	1	2
3. I usually do as I am told	0	1	2
4. I am constantly fidgeting or squirming	0	1	2
5. I fight a lot. I can make other people do what I want	0	1	2
6. I am easily distracted, I find it difficult to concentrate	0	1	2
7. I am often accused of lying or cheating	0	1	2
8. I think before I do things		1 1 1	

9.	I take things that are not mine from home, school or elsewhere	0	1	2
10.	I finish the work I'm doing. My attention is good	0	1	2

Note: Items 1, 4, 6, 8, and 10 contribute to the hyperactivity subscale. Items 2, 3, 5, 7, and 9 contribute to the conduct problems subscale. The hyperactivity and conduct problems subscales are combined to create the externalizing scale.

### APPENDIX G: DEMOGRAPHIC SURVEY

Spring 2022

Code #:\_\_\_\_\_

- 2. My age is: \_\_\_\_\_
- 3. Gender identity:
  - o Male
  - o Female
  - Other: \_\_\_\_\_
- 4. I identify as:
  - White
  - o African American/Black
  - Pacific Islander
  - o Native American
  - Asian American
  - o Multiracial
  - Other:
- 5. I am:
  - o Hispanic or Latino
  - Not Hispanic or Latino
- 6. My religion is:
  - No religion
  - o I'm not sure
  - Christian
  - Buddhist
  - o Hindu
  - o Islam
  - o Judaism
  - o Muslim
  - o Catholic
  - Other: \_\_\_\_\_

### APPENDIX H: ASSESSMENT OF STUDENT EMOTIONAL WELL-BEING

#### MSLSS

We would like to know what thoughts about life you've had <u>during the past several weeks</u>. Think about how you spend each day and night and then think about how your life has been during most of this time. Here are some questions that ask you to indicate your satisfaction with life. In answering each statement, circle a number from (1) to (6) where (1) indicates you **strongly** <u>disagree</u> with the statement and (6) indicates you **strongly agree** with the statement. It is important to know what you REALLY think, so please answer the question the way you really feel, not how you think you should. This is NOT a test. There are NO right or wrong answers.

	Strongly Disagree	Disagree	Slightly Disagree	Slightly Agree	Agree	Strongly Agree
<i>1</i> . My life is going well	1	2	3	4	5	6
2. My friends are nice to me	1	2	3	4	5	6
3. I am fun to be around	1	2	3	4	5	6
4. I feel bad at school	1	2	3	4	5	6
5. I have a bad time with my friends	1	2	3	4	5	6
6. There are lots of things I can do well	1	2	3	4	5	6
7. I learn a lot at school	1	2	3	4	5	6
8. I like spending time with my parents	1	2	3	4	5	6
9. My life is just right	1	2	3	4	5	6
10. My family is better than most	1	2	3	4	5	6
11. There are many things about school I don't like	1	2	3	4	5	6
12. I think I am good looking	1	2	3	4	5	6
13. My friends are great	1	2	3	4	5	6
14. My friends will help me if I need it	1	2	3	4	5	6
15. I wish I didn't have to go to school	1	2	3	4	5	6
16. I like myself	1	2	3	4	5	6

17. I would like to change many things in my life	1	2	3	4	5	6
18. There are lots of fun things to do where I live	1	2	3	4	5	6
19. My friends treat me well	1	2	3	4	5	6
20. Most people like me	1	2	3	4	5	6
21. I enjoy being at home with my family	1	2	3	4	5	6
			1			-

	Strongly Disagree	Disagree	Slightly Disagree	Slightly Agree	u Agree	Strongly
22. My family gets along well together	1	2	3	4	<b>√</b> 5	6
23. I look forward to going to school	1	2	3	4	5	6
24. My parents treat me fairly	1	2	3	4	5	6
25. I wish I had a different kind of life	1	2	3	4	5	6
26. I like being in school	1	2	3	4	5	6
27. My friends are mean to me	1	2	3	4	5	6
28. I wish I had different friends	1	2	3	4	5	6
29. School is interesting	1	2	3	4	5	6
30. I enjoy school activities	1	2	3	4	5	6
31. I wish I lived in a different house	1	2	3	4	5	6
32. Members of my family talk nicely to one another	1	2	3	4	5	6
<i>33</i> . I have a good life	1	2	3	4	5	6
34. I have a lot of fun with my friends	1	2	3	4	5	6
35. My parents and I do fun things together	1	2	3	4	5	6
<i>36</i> . I like my neighborhood	1	2	3	4	5	6
37. I wish I lived somewhere else	1	2	3	4	5	6
38. I am a nice person	1	2	3	4	5	6
39. This town is filled with mean people	1	2	3	4	5	6
40. I like to try new things	1	2	3	4	5	6
41. I have what I want in life	1	2	3	4	5	6
42. My family's house is nice	1	2	3	4	5	6
43. I like my neighbors	1	2	3	4	5	6
44. I have enough friends	1	2	3	4	5	6
45. I wish there were different people in my neighborhood	1	2	3	4	5	6
46. I like where I live	1	2	3	4	5	6

47. My life is better than most kids'	1	2	3	4	5	6
Note. Items 2, 5, 13, 14, 19, 27, 28, 34, and 44 contribute to	the frie	nds do	omain. I	tems 8,	10, 21	l,
22, 24, 32, and 35 contribute to the <i>family</i> domain. Items 4,	7, 11, 1	5, 23,	26, 29,	and 30		
contribute to the school domain. Items 3, 6, 12, 16, 20, 38, a	and 40 c	ontrib	ute to th	ne <i>self</i> d	omain	1.
Items 18, 31, 36, 37, 39, 42, 43, 45, and 46 contribute to the	e living e	enviro	<i>nment</i> d	omain.	Items	1,
9, 17, 25, 33, 41, and 47 contribute to the global life satisfact	ction do	main.	Items 4	, 5, 11,	15, 17	,
25, 27, 28, 31, 37, 39, and 45 are reverse scored.						

## PANAS-C-10

This scale consists of a number of words that describe different feelings and emotions. Indicate to what extent you have felt this way during <u>the past few weeks</u>. Circle a number from (1) to (5), where (1) means you felt that way *very slightly or not at all* in the past few weeks, and (5) means you felt that way *extremely* in the past few weeks.

-		Very slightly	4 11.1		0.1	<b>D</b> . 1
Fee	ling or emotion:	or not at all	A little	Moderately	Quite a bit	Extremely
1.	Sad	1	2	3	4	5
2.	Нарру	1	2	3	4	5
3.	Scared	1	2	3	4	5
4.	Miserable	1	2	3	4	5
5.	Cheerful	1	2	3	4	5
6.	Proud	1	2	3	4	5
7.	Afraid	1	2	3	4	5
8.	Joyful	1	2	3	4	5
9.	Mad	1	2	3	4	5
10.	Lively	1	2	3	4	5

*Note*. Items 1, 3, 4, 7, and 9 contribute to the negative affect scale. Items 2, 5, 6, 8, and 10 contribute to the positive affect scale.

#### PROMIS

Next, think about how you have <u>felt in the past week</u>. For each item, circle a number from (1) to (5), where (1) means you *never* felt that way in the past week, and (5) means you *almost always* felt that way.

		Almos	G		Almos t
In the past 7 days	Never	t Never	Some- times	Often	Alway s
1. I felt too sad to do things with friends.	1	2	3	4	5
2. I felt afraid to go out alone.	1	2	3	4	5
3. I was less interested in doing things I usually enjoy.	1	2	3	4	5
4. I worried when I was at home.	1	2	3	4	5
5. It was hard for me to have fun.	1	2	3	4	5
6. It was hard to do schoolwork because I was nervous or worried.	1	2	3	4	5
7. I felt everything in my life went wrong.	1	2	3	4	5
8. I felt sad.	1	2	3	4	5
9. I felt worried.	1	2	3	4	5
10. Being worried made it hard for me to be with my friends.	1	2	3	4	5
11. It was hard for me to care about anything.	1	2	3	4	5
12. I felt afraid.	1	2	3	4	5
13. I felt lonely.	1	2	3	4	5
14. I felt like I couldn't do anything right.	1	2	3	4	5

	Not at	A little	Some-	Ouite	Verv
In the past 7 days	all	bit	what	a bit	much
15. I worry that my health might get worse.	1	2	3	4	5
16. I worry about doing well in school.	1	2	3	4	5

*Note.* Items 1, 3, 5, 7, 8, 11, 13, and 14 comprise the PROMIS depression pediatric short form. Items 2, 4, 6, 9, 10, 12, 15, and 16 comprise the PROMIS anxiety pediatric short form.

#### SDQ

For each item on this page, please circle a number from 0 to 2 (0 means *Not True*, 1 means *Somewhat True*, and 2 means *Certainly True*. It would help us if you answered all items as best you can even if you are not absolutely certain. Please give your answers on the basis of how things have been for you over the last six months.

		Somewhat	Certainly
In the last 6 months	Not True	True	True
1. I am restless, I cannot stay still for long	0	1	2
2. I get very angry and often lose my temper	0	1	2
3. I would rather be alone than with people of my age	0	1	2
4. I usually do as I am told	0	1	2
5. I am constantly fidgeting or squirming	0	1	2
6. I have one good friend or more	0	1	2
7. I fight a lot. I can make other people do what I want	0	1	2
8. Other people my age generally like me	0	1	2
9. I am easily distracted, I find it difficult to concentrate	0	1	2
10. I am often accused of lying or cheating	0	1	2
11. Other children or young people pick on me or bully me	0	1	2
12. I think before I do things	0	1	2
13. I take things that are not mine from home, school or	0	1	2
elsewhere			
14. I get along better with adults than with people my own age	0	1	2
15. I finish the work I'm doing. My attention is good	0	1	2

*Note.* Items 1, 5, 9, 12, and 15 contribute to the hyperactivity subscale. Items 2, 4, 7, 10, and 13 contribute to the conduct problems subscale. The hyperactivity and conduct problems subscales are averaged together to create the externalizing scale of the SDQ. Items 3, 6, 8, 11, and 14 contribute to the peer problems subscale. Items 4, 6, 8, and 15 are reverse scored.

#### APPENDIX I: MODIFIED CHILDREN'S USAGE RATING PROFILE

#### CURP

Lastly, please think about the **Happiness Program** that you have done in small groups led by USF counselors. After reading each sentence, circle the number that matches your belief about the program. For example, if the sentence was "I like chocolate ice cream," you might circle "4" for "I totally agree."

	I totally disagre e	I kind of disagre e	I kind of agree	I totally agree
1. This program was too much work for me.	1	2	3	4
2. I understand why my school picked this program to help me.	1	2	3	4
3. I could see myself using this program again.	1	2	3	4
4. This is a good way to help students.	1	2	3	4
5. It is clear what I had to do.	1	2	3	4
6. I would not want to try this program again.	1	2	3	4
7. This took too long to do.	1	2	3	4
8. If my friend was having trouble, I would tell him/her to try this.	1	2	3	4
9. I was able to do every step of this program.	1	2	3	4
10. I felt like I had to use this program too often.	1	2	3	4
11. Using this program gave me less free time.	1	2	3	4
12. There are too many steps to remember.	1	2	3	4
13. Using this program got in the way of doing other things.	1	2	3	4
14. I understand why the program was needed.	1	2	3	4
15. This program focused too much attention on me.	1	2	3	4
16. I was excited to try this program.	1	2	3	4
17. This program made it hard for the other students in my class to work.	1	2	3	4
18. I would volunteer to do this program again.	1	2	3	4
19. It is clear what the adult leading the group needed to do.	1	2	3	4

20. I was able to use this program correctly.	1	2	3	4
21. I liked this program.	1	2	3	4

*Note.* Items 1, 7, 10, 11, 12, 13, 15, and 17 contribute to the *feasibility* domain. Items 2, 5, 9, 14, 19, and 20 contribute to the *understanding* domain. Items 3, 4, 6, 8, 16, 18, and 21 contribute to the *desirability* domain. Item 6 was the only item reverse scored. Higher scores on the feasibility domain are associated with poorer perceptions of acceptability.

# APPENDIX J: MODIFIED IMPLEMENTATION FIDELITY CHECKLISTS

# Intervention Integrity Checklist Session 1

Date:

Leader(s):\_\_\_\_\_

	Session Activity		
1.	Two things that make me happy icebreaker: students share 2 things.	Yes	No
2.	Description of positive peer reporting with clear examples and non-	Yes	No
	examples of appropriate positive peer reports.		
3.	Write names of 2 target students in a visible location before beginning the	Yes	No
	session.		
4.	You at your best activity: students write their personal stories.	Yes	No
5.	Students share their you at your best stories.	Yes	No
6.	Discuss strengths students' displayed in their stories.	Yes	No
7.	Discuss perceived importance of happiness.	Yes	No
8.	Discuss purpose of group (to increase students' happiness).	Yes	No
9.	Discuss what determines happiness.	Yes	No
10.	Comprehension check: Overview of Program activities handout	Yes	No
	(complete What Determines Happiness? And Purpose of Group).		
11.	Discuss confidentiality.	Yes	No
12.	Comprehension check: definition of confidentiality.	Yes	No
13.	Develop rules for appropriate behavior in group.	Yes	No
14.	Discuss incentives available for completing group homework.	Yes	No
15.	Assign homework (read and reflect on you at your best stories).	Yes	No
16.	Prompt students to give 1-2 positive peer reports about the first target	Yes	No
	student		
17.	Prompt students to give 1-2 positive peer reports about the second target	Yes	No
	student		
18.	Record number of positive peer reports total on PPR Log.	Yes	No

A. Number of session activities completed (circled "Yes"):	A
--	---

B. Number of session activities expected:	B. 13 or 18
Percentage of activities implemented this session (box A/box B):	%

Date: \_\_\_\_\_

Leader(s):\_\_\_\_\_

	Session Activity	Comp	leted?
1.	Write names of 2 target students in a visible location before beginning the	Yes	No
	session.		
2.	Homework review: you at your best.	Yes	No
3.	Provide incentives for students who completed homework.	Yes	No
4.	Discuss definition of gratitude.	Yes	No
5.	Students rate personal level of gratitude.	Yes	No
6.	Share gratitude level with group.	Yes	No
7.	Discuss benefits of gratitude.	Yes	No
8.	Decorate gratitude journals.	Yes	No
9.	Encourage students to include illustrations or words related to their racial	Yes	No
	and/or cultural identity on their gratitude journal covers.		
10.	Complete initial entry in gratitude journal.	Yes	No
11.	Share notebook entries.	Yes	No
12.	Assign homework (gratitude journaling).	Yes	No
13.	Prompt students to give 1-2 positive peer reports about the first target	Yes	No
	student		
14.	Prompt students to give 1-2 positive peer reports about the second target	Yes	No
	student		
15.	Record number of positive peer reports total on PPR Log.	Yes	No

A. Number of session activities completed (circled "Yes"):	A
B. Number of session activities expected:	B. 11 or 15
Percentage of activities implemented this session (box A/box B):	%

Date:

Leader(s):\_\_\_\_\_

	Session Activity	Comp	leted?
1.	Write names of 2 target students in a visible location before beginning the	Yes	No
	session.		
2.	Homework review: gratitude journals.	Yes	No
3.	Provide incentives for students who completed homework.	Yes	No
4.	Students create a list of people who have been kind/helpful to them.	Yes	No
5.	Students share story about how someone has helped them.	Yes	No
6.	Students write a letter to a person to whom they are grateful.	Yes	No
7.	Complete the Gratitude Visit Planning Form.	Yes	No
8.	Discuss link between grateful thinking and current feelings of happiness.	Yes	No
9.	Discuss how grateful thinking is a purposeful activity.	Yes	No
10.	Assign homework (gratitude visit).	Yes	No
11.	Assign homework (at least one gratitude journal entry).	Yes	No
12.	Prompt students to give 1-2 positive peer reports about the first target	Yes	No
	student		
13.	Prompt students to give 1-2 positive peer reports about the second target	Yes	No
	student		
14.	Record number of positive peer reports total on PPR Log.	Yes	No

A. Number of session activities completed (circled "Yes"):	A
B. Number of session activities expected:	B. 10 or 14
Percentage of activities implemented this session (box A/box B):	%

Date: \_\_\_\_\_

Leader(s):\_\_\_\_\_

	Session Activity	Comp	leted?
1.	Write names of 2 target students in a visible location before beginning the	Yes	No
	session.		
2.	Homework review: gratitude visits.	Yes	No
3.	Homework review: gratitude journals.	Yes	No
4.	Provide incentives for students who completed homework.	Yes	No
5.	Students create a list of kind behaviors.	Yes	No
6.	Discuss link between kindness and current feelings of happiness.	Yes	No
7.	Group leader shares example types and approximate frequency of his or her personal acts of kindness.	Yes	No
8.	Students discuss example types and approximate frequency of acts of kindness displayed by friends and/or family members.	Yes	No
9.	Encourage students to think of examples specific to their culture or religion (e.g., complimenting others on their natural hair texture, praying for a friend in need)	Yes	No
10.	Students discuss recent acts of kindness they have performed.	Yes	No
11.	Students estimate the current frequency of their acts of kindness.	Yes	No
12.	Students complete the <i>Acts of Kindness Record Form</i> to plan homework assignment.	Yes	No
13.	Assign homework (acts of kindness).	Yes	No
14.	Assign homework (kindness challenge).	Yes	No
15.	Prompt students to give 1-2 positive peer reports about the first target student	Yes	No
16.	Prompt students to give 1-2 positive peer reports about the second target student	Yes	No
17.	Record number of positive peer reports total on PPR Log.	Yes	No

A. Number of session activities completed (circled "Yes"):	A
B. Number of session activities expected:	B. 13 or 17
Percentage of activities implemented this session (box A/box B):	%

Date: \_\_\_\_\_

Leader(s):\_\_\_\_\_

	Session Activity		Completed?	
1.	Write names of 2 target students in a visible location before beginning the session.	Yes	No	
2.	Homework review: acts of kindness.	Yes	No	
3.	Homework review: kindness challenge.	Yes	No	
4.	Provide incentives for students who completed homework.	Yes	No	
5.	Discuss definition of character strengths.	Yes	No	
6.	Distribute written list of strengths in the VIA framework, such as the VIA Classification of 24 Character Strengths handout.	Yes	No	
7.	Discuss definitions of the 24 individual character strengths.	Yes	No	
8.	Strengths bingo activity: play until 1 student achieves bingo.	Yes	No	
9.	Group leader discusses own strengths exemplified in you at your best story.	Yes	No	
10.	Students discuss strengths exemplified in their and/or their peers' you at your best story.	Yes	No	
11.	Students write list of their self-identified strengths and current feelings of happiness.	Yes	No	
12.	Discuss link between using character strengths and current feelings of happiness.	Yes	No	
13.	Discuss positive feelings related to choice and effort involved in use of character strengths.	Yes	No	
14.	Inform group of use of online survey to determine character strengths in the next meeting.	Yes	No	
15.	Assign homework: acts of kindness	Yes	No	
16.	Assign homework: strengths spotting in family and peers	Yes	No	
17.	Prompt students to give 1-2 positive peer reports about the first target student	Yes	No	
18.	Prompt students to give 1-2 positive peer reports about the second target student	Yes	No	
19.	Record number of positive peer reports total on PPR Log.	Yes	No	

A. Number of session activities completed (circled "Yes"):	A
B. Number of session activities expected:	B. 15 or 19
Percentage of activities implemented this session (box A/box B):	%

Date: \_\_\_\_\_

Leader(s):\_\_\_\_\_

	Session Activity	Comp	leted?
1.	Write names of 2 target students in a visible location before beginning the session.	Yes	No
2.	Homework review: acts of kindness	Yes	No
3.	Homework review: strengths spotting	Yes	No
4.	Provide incentives for students who completed homework.	Yes	No
5.	Students individually complete the entire VIA-Youth survey.	Yes	No
6.	Make a hard-copy record of students' top five strengths, through printing results from website or jotting them down.	Yes	No
7.	Discuss expected vs. survey-identified signature strengths.	Yes	No
8.	Discuss fit of signature strengths.	Yes	No
9.	Students identify one signature strength to work on this week and talk about a way they have used it previously.	Yes	No
10.	Students brainstorm (list) new ways to use the selected character strength during the upcoming week at home and in the community setting.	Yes	No
11.	Students complete the <i>New Uses of My First Signature Strength</i> record/planning form, by listing methods from the brainstormed list.	Yes	No
12.	Assign homework: use of one character strength in a new way.	Yes	No
13.	Assign homework: choose acts of kindness or gratitude journal.	Yes	No
14.	Prompt students to give 1-2 positive peer reports about the first target student	Yes	No
15.	Prompt students to give 1-2 positive peer reports about the second target student	Yes	No
16.	Record number of positive peer reports total on PPR Log.	Yes	No

A. Number of session activities completed (circled "Yes"):	A
B. Number of session activities expected:	B. 12 or 16
Percentage of activities implemented this session (box A/box B):	%

Date:

Leader(s):\_\_\_\_\_

	Session Activity	Completed?	
1.	Write names of 2 target students in a visible location before beginning the	Yes	No
	session.		
2.	Homework review: acts of kindness or gratitude journal.	Yes	No
3.	Homework review: using signature strength in new ways.	Yes	No
4.	Provide incentives for students who completed homework.	Yes	No
5.	Discuss the domains of life most pertinent to students.	Yes	No
6.	Identify a different (second) strength to use in new ways this week.	Yes	No
7.	Students independently make lists of new ways to use strength.	Yes	No
8.	Categorize volunteers' new ways to use their signature strength into life	Yes	No
	domains on the whiteboard.		
9.	Problem solve potential obstacles for student volunteers.	Yes	No
10.	Complete the New Uses of My Second Signature Strength planning form	Yes	No
	for each student.		
11.	Define savoring and its relation to happiness.	Yes	No
12.	Discuss ways to savor an experience related to the students' heritage or	Yes	No
	cultural upbringing (i.e., savoring a holiday celebration or important		
	cultural event).		
13.	Assign homework (use signature strength in new ways and savor).	Yes	No
14.	Assign homework (gratitude journals or acts of kindness).		
15.	Prompt students to give 1-2 positive peer reports about the first target	Yes	No
	student		
16.	Prompt students to give 1-2 positive peer reports about the second target	Yes	No
	student		
17.	Record number of positive peer reports total on PPR Log.	Yes	No

A. Number of session activities completed (circled "Yes"):	A
B. Number of session activities expected:	B. 13 or 17
Percentage of activities implemented this session (box A/box B):	%

Date: \_\_\_\_\_

Leader(s):\_\_\_\_\_

	Session Activity	Completed?	
1.	Write names of 2 target students in a visible location before beginning	Yes	No
	the session.		
2.	Homework review: use of signature strength in new ways.	Yes	No
3.	Homework review: acts of kindness or gratitude journal.	Yes	No
4.	Provide incentives for students who completed homework.	Yes	No
5.	Discuss students' definition of hope.	Yes	No
6.	Students rate personal level of hope.	Yes	No
7.	Share hope level with group.	Yes	No
8.	Discuss scientific definition of hope as goals, pathways, and	Yes	No
	motivation.		
9.	Discuss importance of hope, including link between hope and	Yes	No
	happiness.		
10.	Complete the Looking for Optimism handout.	Yes	No
11.	Discuss link between hope and optimism.	Yes	No
12.	Complete writing activity: best-possible self in the future	Yes	No
13.	Complete activity: Replacing negative thoughts with positive	Yes	No
	affirmations (Creating Affirmations handout).		
14.	Assign homework: continue writing best-possible self in the future	Yes	No
15.	Assign homework: Using positive affirmations (Positive Affirmations	Yes	No
	Record Form).		
16.	Prompt students to give 1-2 positive peer reports about the first target	Yes	No
	student		
17.	Prompt students to give 1-2 positive peer reports about the second	Yes	No
	target student		
18.	Record number of positive peer reports total on PPR Log.	Yes	No

C. Number of session activities completed (circled "Yes"):	A
D. Number of session activities expected:	B. 14 or 18
Percentage of activities implemented this session (box A/box B):	%

Date: \_\_\_\_\_

Leader(s):\_\_\_\_\_

	Session Activity	Completed?	
1.	Homework review: best-possible self in the future writing including group members' reflections.	Yes	No
2.	Homework review: use of positive affirmations.	Yes	No
3.	Provide incentives for students who completed homework.	Yes	No
4.	Review the <i>What Determines Happiness?</i> Handout, with emphasis on the purposeful, positive activities that were the intervention focus.	Yes	No
5.	Review the Happiness Flowchart handout.	Yes	No
6.	Categorize each positive activity as a way to promote positive feelings about one's past, present, or future.	Yes	No
7.	Discuss links between these positive activities and personal happiness about one's past, present, and future.	Yes	No
8.	Distribute the Program Summary Sheet and help students fill in their signature character strengths.	Yes	No
9.	Plan for ways that students will continue to practice their preferred positive activities.	Yes	No
10.	Allow time for personal quiet reflection on personal growth.	Yes	No
11.	Students share personal changes they experienced during program duration.	Yes	No
12.	Provide Certificate of Completion.	Yes	No
13.	Administer intervention acceptability and utility measure (Program Feedback Request form) to gather student perceptions.	Yes	No
14.	Provide incentive if PPR goal is met.	Yes	No

C. Number of session activities completed (circled "Yes"):	A
D. Number of session activities expected:	B. 14
Percentage of activities implemented this session (box A/box B):	%

# APPENDIX K: PROGRAM FEEDBACK SUMMARY

are son most in things	me of the mportant you d in the am? ended)	<ul> <li>Happiness and how to be grateful (9)</li> <li>How to be happy and giving people compliments</li> <li>New traits</li> <li>Acts of kindness (9)</li> <li>Being more optimistic</li> <li>Hope and gratitude</li> <li>Signature strengths (3)</li> <li>Appreciating everything given to me</li> <li>Myself</li> <li>Savoring</li> <li>How to see others</li> <li>To talk to others</li> </ul>
	oout the am? ended)	<ul> <li>People</li> <li>Having fun and making new friends (3)</li> <li>Seeing my friends (2)</li> <li>Gratitude journals</li> <li>Snacks (5)</li> <li>Challenges (2)</li> <li>Slime (2)</li> <li>Gratitude letter</li> <li>The instructors (2)</li> <li>The nice people</li> <li>Fun activities (3)</li> <li>Compliments (3)</li> <li>Everything (2)</li> <li>Talking about my life</li> </ul>
	did you like bout the am? andad)	<ul> <li>It's not permanent</li> <li>The work (2)</li> <li>The schedule sometimes is a problem (2)</li> <li>Rewards</li> <li>Having to remember to do the challenges</li> <li>Skipping P.E. (3)</li> </ul>
that yo in the	activities ou learned meetings u likely to	<ul> <li>You at your best (7)</li> <li>Gratitude visit (8)</li> <li>Gratitude journal (8)</li> <li>Acts of kindness (18)</li> <li>Savoring (15)</li> </ul>

	continue to do on your own? (check all that apply)	<ul> <li>Optimistic thinking (23)</li> <li>Signature strengths (15)</li> <li>Best possible self in the future (10)</li> <li>None (2)</li> </ul>
5.	What suggestions do you have to improve the program? (open-ended)	<ul> <li>More people</li> <li>Going up to people and telling them things</li> <li>Longer</li> <li>More fun games and more activities (3)</li> <li>Have the program everyday</li> <li>Less work</li> <li>More days that we come for the program</li> <li>Having the whole group deciding on a period to do it (2)</li> <li>Bring juice</li> <li>Do it at a time a student would not mind missing</li> </ul>
	Any additional comments? (open-ended)	<ul> <li>Keep doing this</li> <li>I will never forget this wonderful program</li> <li>Please do this next year</li> <li>I hope another school does the same thing we did!</li> <li>Less work</li> <li>Have more fun!!!</li> </ul>

*Note.* "Compliments" refer to the positive reports made during the PPR intervention. The number next to a statement indicates the number of students who mentioned or checked the same thing. For example, three students mentioned that they would like to have more fun game and more activities when asked for suggestions to improve the program.