Application of Positive Psychology Interventions within Schools:

Implications for Adolescent Mental Health

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DISSERTATION

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Section One: The Study Overview

This study assessed the efficacy of implementation of positive psychology interventions (PPI) within the school system with a focus on one specific attribute of PPI, Acts of Kindness, and evaluated the implications for adolescent mental health. Positive psychology is described as the scientific study of what makes life most worth living (Seligman et al., 2005). The founder of the positive psychology movement, Martin Seligman, posits the idea that happiness can be studied and achieved through attaining the "7 habits of happy people" which are as follows; relationships, acts of kindness, physical wellbeing, spiritual engagement, mindfulness, flow, and strengths. The driving force behind positive psychology is that strengths and resiliencies buffer against mental illness and negative life events. Seeking to live a full and meaningful life will direct people to make choices consistent with those goals (Seligman et al., 2005).

This study evaluated the effects of the implementation of a positive psychology intervention on a sample of thirty-three students at Bais Yaakov D'Rav High School in Monsey. One attribute of PPI was used for this intervention, "Acts of Kindness." The study included a pre-test evaluation of the mental health and well-being of the participants using a standardized scale. Then, the participants attended a session about Positive Psychology Interventions and how the implementation of core concepts into one's day-to-day living can transform the quality of life. One attribute of PPI was taught, Acts of Kindness, with a specific exercise for participants to perform and record acts of kindness over a month-long period. Following this intervention, the participants were given the same standardized scale on well-being and provided feedback about their experiences.

The National Association of Social Workers Code of Ethics (2021) applied to this study with the principles of service, dignity, and worth of individuals, and the importance of human

relationships at the forefront. The focus of service directs social workers to help people in need and address social problems when they arise. The needs of others come first, and nothing could be more important than providing adolescents with the tools to overcome adversity and hardship related to mental health issues. The mental health of America's youth is in peril, with statistics showing that the mental health of adolescents is at an all-time low and will continue to deteriorate, thus adversely affecting the population at large if immediate action is not taken. Recognition of this problem in the school setting requires action on the part of the school. Therefore, the knowledge and skills of the researcher were used in a positive way to help our teens in need and address the greater social problem of mental health issues at the same time.

The ethical principle of honoring the dignity and worth of an individual suggests that social workers treat the individuals around them with respect and dignity (National Association of Social Workers, 2021). Although it is the social worker's responsibility to help people in need, doing so requires giving people choices and tools to exercise self-determination. The use of a positive psychology approach supports this value as positive psychology teaches individuals to recognize and use their gifts, talents, and strengths to overcome challenges. Teaching high school students about positive psychology and the impact it can have on their ability to demonstrate resilience amidst hardship can provide students with valuable skills they can use throughout their whole lives.

This study was also relevant to the ethical principle of the importance of human relationships (National Association of Social Workers, 2021). This principle suggests that social workers understand that human relationships are a powerful component of change and that strengthening the relationship between people contributes to improved well-being. The positive psychology intervention of acts of kindness directly relates to this principle because it relies on

an individual interacting with another individual in a positive manner, thus strengthening the relationship between them. While this works on an interpersonal level, it also contributes to enhancing the well-being of social groups and organizations through service-directed behaviors. Therefore, acts of kindness strengthens human relationships.

This study makes the case for a proactive, positive psychology approach to adolescent well-being that teaches students how to improve their own well-being. Although there is research about positive psychology and its effect on mental health in general, the literature is limited in support of positive-psychology programs as a school-based intervention. By improving the body of knowledge on school interventions that demonstrate positive results, school social workers will have more evidence-based options to choose from when determining the best way to provide services to their students. Finally, this study highlights the possibility of the implementation of only one attribute of PPI as a means to improve adolescent well-being. The approach used for this study is unique as it affords schools the ability to reduce the time and cost of the program by implementing only one attribute of PPI. Results can therefore have a tremendous impact on students as schools will have the ability to implement a highly transformative research-based intervention program with limited resources and budget.

Section Two: The Study Problem

Recently there has been a surge in adolescent mental health issues with rates of teen substance abuse, depression, anxiety, and suicide increasing at an alarming rate. According to data from Mental Health America, over 19% of youth ages 12 to 17 experience major depression (Reinert et al., 2021). In conjunction with the rise in rates of depression, substance use by youth is increasing, with vaping marijuana one of the fastest-growing substances up from 7% in 2017 to 16% in 2021 (Johnston et al., 2021). The Centers for Disease Control and Prevention (2019) reports that more students experienced persistent feelings of sadness or hopelessness from 2009 through 2019 and about 1 in 5 students seriously considered suicide.

In addition to these mental health issues, youth are dealing with the effects of Covid-19 and the country's response to it, which impacted youth mental health. While there are not many studies yet about the long-term effect of Covid-19 on youth mental health, the evidence thus far suggests youth experienced a worsening of depressive symptoms during the pandemic and higher incidences of externalizing symptoms such as anger, irritability, disobedience, and attitude problems (Chadi et al., 2022). There is also mixed data about the increase in youth self-harm and suicidal ideation and a documented increase in eating disorders (Chadi et al., 2022). However, even if the data remains inconclusive, as adolescents return to school in greater numbers, it is important to address the risk of mental health issues as a result of the pandemic.

Adolescent mental health problems continue to rise, with Covid-19 compounding existing issues. In 2018, Greg Lukianoff and Jonathan Haidt wrote a book that addressed adolescent mental health and the current trends and statistics describing the alarming decline in adolescent well-being. Data revealed that those born after 1995 show far higher rates of anxiety and depression plus higher rates of suicide than the Millennial generation that came before them,

making them the most mentally ill in all of history (Lukianoff & Haidt, 2018). One might consider this a public health epidemic. In an update to the book published in 2021, the data continues to show the decline in mental health for adolescents (Lukianoff & Haidt, 2021). In just three years, the rate of depression for teenage boys rose from 6.4% to 8.8%, and for teenage girls 19.5% to 23% (Lukianoff & Haidt, 2021). The rates of self-harm and suicide follow these same upward trends. Among those between ages ten and 24, the suicide rate rose 56% from 2007 to 2017 and became a more common cause of death than homicide (Julian, 2020). All of these mental health statistics are even more alarming when one considers what happens to teens who feel anxious, depressed, and suicidal. Many of them turn to substances, stop doing schoolwork, isolate themselves socially, and engage in high-risk behavior, all of which have long-term consequences.

The research conducted on adolescent mental health issues in the 21st century substantiates that adolescent mental health issues are a serious concern not only for the immediate impact it has on adolescent functioning but also for the long-term consequences into adulthood. Mental health issues equal stress and prolonged stress can have adverse effects on the adolescent developing brain (Lane, 2013). This can lead to issues with concentration, focus, memory, impulse control, judgment, and academic problems (Shelton & Owens, 2021). Those adverse effects translate into physical, psychological, and social consequences. For instance, youth with high levels of chronic stress, regardless of its origination, have a higher likelihood of using illicit substances as a teen as well as throughout adulthood, higher risk of dropping out of school, increased risk of unplanned pregnancies and criminal behavior (Lane, 2013; Shelton & Owens, 2021). Also, they face an increased risk of heart disease, disability, underemployment, and lifelong engagement with the healthcare system (Lane, 2013). Therefore, it is imperative to

address mental health issues during adolescence in order to mitigate the risks of that adolescent growing up with severe problems that will significantly impact their quality of life during adulthood.

Research suggests that solutions to the problem of deteriorating adolescent mental health require a translational and multidimensional approach. For example, researchers tackling the opioid epidemic stress the need to address four interconnected themes including (1) social determinants of health and disease; (2) person-centered approaches for prevention and treatment; (3) bridging the gap between implementation science and practice; and (4) using data to build learning systems of care, relevant to public health approaches to address the opioid crisis (Blanco et. al, 2020). Additionally, environmental supports such as mentorship, apprenticeship, and friendship can promote well-being in at-risk youth (Sharfstein, 2019). Sharfstein (2019) suggests that while the adolescent mental health crisis seems daunting, the goal is to see a problem beyond one person at a time and to make the environmental changes necessary to contribute to positive change. In other words, do not limit interventions to treating a problem, but reimagining an environment to promote resilience and well-being. Sharfstein (2019) also suggests that adolescence is an ideal time in the human lifespan to integrate positive experiences because they will last a lifetime. Just as adverse adolescent experiences put a youth at risk of a lifetime of problems, increasing the number of positive experiences will have the opposite effect and contribute to the overall health of the population. For example, by improving social connectedness and promoting prosocial behavior can go a long way to improving adolescent mental health. This substantiates the need to create high school programs that are aligned with these goals and would provide students with the tools necessary to develop these critical skills.

Positive psychology provides concrete methods of approaching adolescent mental health and well-being in a proactive manner. Positive psychology is an approach to mental health that focuses on positive emotions, character traits, and building upon existing strengths (Seligman et al., 2005). A growing body of research suggests that positive psychology interventions are an effective measure to promote wellbeing and reduce mental health and addiction issues in children, teens, and adults (Carr et al., 2021). Additionally, research suggests that positive psychology approaches help reduce stress and improve well-being in people with serious mental health disorders (Chakhssi et al., 2018). Positive psychology provides an opportunity for prevention and interventions that can target adolescents and improve their mental health and well-being.

Adolescents spend a considerable amount of their time in school. If a teen spends approximately 6 hours in school per day for a school year of 180 days, they spend 1,080 hours at school. This amount of time makes schools an ideal location for noticing changes in an adolescent's academic performance, behavior or well-being. In fact, many schools offer various screening opportunities to detect learning disabilities, emotional instability, and crisis intervention (Shelton & Owens, 2021). With rising concerns over adolescent mental health, many schools have increased the number of personnel they devote to mental health needs including prevention and intervention services (Shelton & Owens, 2021). Schools, then, are an ideal location for providing students with positive psychology interventions that will improve their mental health and well-being.

For psychologists, social workers and other mental-health professionals to effectively address adolescent needs within the school system it is imperative to have an understanding of current social policy. Social policy creates the environment that allows social workers the ability

to provide effective interventions at the macro, mezzo and micro levels for the promotion of equal rights, social justice and ultimately inspire social change (Aquino et. al, 2017). Recent social policy recommendations from Youth.gov (n.d.) suggest that because children spend most of their time in school and schools are in a position to detect early warning signs, it makes sense to provide mental health prevention, intervention, and treatment within the schools. Adding mental health care to the school environment also improves access to treatment for underserved populations in urban areas who might not otherwise have access to mental health care and in rural areas where there often exists a significant shortage of mental health professions (Bradley et al., 2013; Moon et al., 2017). Teachers and administrators seem to support the idea that schools are a good location to take seriously the mental health needs of students and because of the connection between mental health and academic performance, schools have an obligation to pay attention to the needs of students (Moon et al., 2017).

Overall, legislatures and educators are progressively moving towards increased support for implementation of various strategies and interventions within the schools to address students with mental health needs. President Obama understood this need for improved mental health services in schools and therefore provided funding for an innovative project that was implemented nationally called Project AWARE. The Project AWARE initiative provided increased funding for mental health services and programs in the public schools in conjunction with other measures meant to make schools safer in response to the increase in school shootings (Kendziora et al., 2018). Project AWARE provided mental health first aid training to teachers, administrators, and staff to help identify at-risk students and provided them with early intervention services (Kendziora et al., 2018). Additionally, various states have begun providing funding for various mental health and wellness programs in the school such as suicide

prevention, mental health screening, increasing the number of mental health professionals on staff at schools, and increasing funding for training teachers and staff about mental health related issues (Rivera, 2021). The surge of mental-health programs within the schools substantiates the national need for intervention programs and research in the school that address social-emotional wellbeing of students. The recent data impacts the efficacy for this study and its importance as a means in addressing adolescent mental health issues in the school setting. This study directly correlates with this growing trend as it seeks to expand Positive Psychology Interventions within high schools and addresses the mental health needs of students through a proactive measure in improving adolescent well-being.

Parents, however, have begun raising concerns about mental health interventions in the schools. In various states throughout the country, parents are protesting the addition of mental health programs, social and emotional learning programs, and other types of mental health interventions offered in school (Kingkade & Hixenbaugh, 2021; Barry, 2022; Meckler, 2022). These parent groups express concern that mental health services, interventions, and social-emotional learning programs indoctrinate their children with ideas they do not agree with, and they work to create separation between children and parents (Kingkade & Hixenbaugh, 2021; Barry, 2022; Meckler, 2022). For example, parents in Southlake, Texas, disagree with the school board's suicide prevention efforts saying that the school is spending too much time and money on mental health instead of preparing students academically (Kingkade & Hixenbaugh, 2021). In other areas of the country, parents have expressed concern that school mental health programs are using social and emotional learning to indoctrinate their children on social justice issues like gender and equity (Kingkade & Hixenbaugh, 2021; Meckler, 2022). Others cite problems with privacy and the incursion on parent's rights (Barry, 2022; Kingkade & Hixenbaugh, 2021). There

seems to be some confusion about what goes into these programs, especially social and emotional learning. For example, Meckler (2022) reported that when parents are asked if schools should engage in "transformative SEL" in their schools, they said "no" but when asked if their children should learn "interpersonal skills" they say "yes." This suggests that using education and mental health jargon creates more resistance from parents. Therefore, this program will address that potential conflict by using simple language and focusing on a skill that parents will be more receptive to, such as acts of kindness.

The debate continues surrounding adolescent mental health interventions in school and focuses on whether schools or parents are responsible for addressing these issues. Implementing social-emotional programs in the school system allows all students to have access to character development programs that can improve student resiliency and help to decrease anxiety and depression in teens. However, parents are responsible for raising their children with specific values, morals and cultural practices that are important to them. Parent advocates stress that mental health and social-emotional learning fall under the purview of parenting and that schools should not be involved in it (Kingkade & Hixenbaugh, 2021; Barry, 2022; Meckler, 2022). The key to intervention programs and curriculum that focus on social-emotional skills within the schools, consequently, is to provide programs that do not contradict parent values or reduce the importance of parenting and culture that the home provides.

Although the introduction of a positive psychology interventions falls under the broad category of mental health prevention and social-emotional learning, this study aims to show that expensive, time-consuming curricula is not required to influence adolescent mental health in a positive way. Instead, the goal is to demonstrate that small, inexpensive character-building programs can have the same effect on adolescent well-being as the programs at the center of this

debate. Additionally, the concepts of positive psychology that this study seeks to promote amongst students are not aligned with any particular ideology, instead, they are associated with characteristics that parents can support and perhaps want their children to develop and strengthen whether at school or at home.

As a school administrator, school psychologist and practicing counselor who works with adolescents every day, I see the various factors contributing to the adolescent mental-health crisis such as but not limited to, anxiety, depression, suicide, bullying etc. amongst this vulnerable population. Unfortunately, the rates of these mental health problems within adolescents are in an upward trend with COVID-19 compounding the issue. Current research supports this observation and suggests that after the COVID-19 lockdowns, adolescents are experiencing more depression, less well-being, adverse mental health effects, and increased feelings of loneliness (Houghton et al., 2022).

The motivation behind this research is simple. Adolescents are facing unprecedented challenges and are suffering as a result. As school educators, school-psychologists, and social workers we are in a unique situation to promote social change. We must collaborate, gather resources, plan and implement interventions and work as a team to address these issues immediately. This study applies one attribute of Positive Psychology Interventions to show that seemingly small changes can make a big impact, especially when adolescents are encouraged to cultivate their unique strengths. Positive psychology concepts were chosen because they can be applied universally whether someone has a mental health issue or not. Additionally, research on PPI shows significant positive results for adolescents who suffer with anxiety, depression, poor school performance, social isolation, stress, and results in improved engagement, optimism, self-esteem, and overall well-being (Benoit & Gabolam, 2021; Chakhssi et al., 2018; Muro et al.,

2018; Narafshan & Noori, 2018; Platt, 2020; Roth et al., 2017; Shoshani & Steinmetz, 2014; Shoshani et al., 2016).

The duality of the approach adds significance and value to this study demonstrating that it can both decrease mental health issues and at the same time increase positive well-being. Positive Psychology Interventions enable students to improve upon their self-image as they build upon their character strengths creating confidence, resilience, social-connectedness, optimism and happiness (Pursuit of Happiness, 2022). If we can give our students these skills, we can proactively address the present national mental health crisis and prevent these young adults from developing anxiety, depression. Furthermore, not only does this study enable a proactive approach to decreasing mental health it enables students to acquire life skills that will allow them to be productive happy members of society (Pursuit of Happiness, 2022).

This methodology was chosen as a pilot program to see how the implementation of a program that is cost-effective and requires minimal school resources had the ability to influence adolescent well-being. The success of this evidence-based school intervention will inspire the evaluation of additional positive psychology programs within the school system.

Section Three: Literature Review

Adolescence is a time of identity formation which serves as the foundation for who a young person will become in adulthood. While the goal is to provide them with all the opportunities for healthy adolescence, society is failing in this regard as millions of adolescents struggle with mental health disorders. The problem with adolescent mental health disorders is not only that it acts as the foundation for identity formation into adulthood, but it also further impacts physiological changes in brain chemistry in ways that have a lifelong impact.

Adolescent Mental Health

Research suggests that too much stress changes the physical brain. Just as the adolescent is going through a developmental stage of identity formation, the teenage brain is also still developing through age 25 (Romeo, 2017). This means that structural components of the adolescent amygdala, hippocampal formation, and prefrontal cortex are significantly affected by what happens to them during adolescence, most especially exposure to chronic stress (Romeo, 2017). Romeo's (2017) brief review of studies about adolescent brain development suggests that the adolescent brain is more sensitive to stress-related adrenal hormones and that affects the amygdala in terms of how much stress it can regulate. Due to the link between stress bombardment in adolescence and its direct effect on stress regulation in adulthood, one can assume that the physical changes made to that part of the brain will continue in adulthood. Next, the hippocampus is the center of learning and memory, emotional function, and stress reactions, and chronically stressed adolescents will experience impairments in these areas that will carry into adulthood (Romeo, 2017). Finally, in the prefrontal cortex, responsible for executive functioning and other aspects of maturity, chronic stress changes the structure of that brain region, sometimes including atrophy, which can significantly impair attention, focus, and

concentration (Romeo, 2017). Therefore, chronic stress experienced by adolescents not only damages their mental health and well-being but likely changes the physical structure of the brain to the extent that they may carry those alterations into adulthood.

Chronic stress and negative life events are related, and research done on negative life events shows that they contribute to the potential for further bad decision-making by adolescents. Self-control, in particular, is important for managing emotions, regulating thoughts, making behavioral decisions, and pursuing goals (Wolff et al., 2020). In a study done by Duckworth et. al. (2013) a collection of three prospective, longitudinal studies where mothers rated the number of negative life events their children experienced by the third and fifth grades (Duckworth et al., 2013). Then, a year later, the researchers invited the teachers and parents of those children to rate the children on their social behaviors (Duckworth et al., 2013). The results indicated that the children who experienced more negative life events were rated as having lower self-control and the more recent the negative life experiences were, the lower the self-control scores (Duckworth et al., 2013).

The impact of chronic stress on the self-control of young adults was studied by Wolff et al. (2020) and evaluated 228 young adults, ages 19-27 in Germany. First, the study assessed for chronic stress and then the researcher's measured self-control and executive functioning using app-based questionnaires for a period of seven days (Wolff et al., 2020). What the researchers found was that high levels of chronic stress resulted in stronger desires and less effective self-control (Wolff et al., 2020). Granted, Wolff's study was done with young adults and did not exactly measure negative life events, only chronic stress. However, the inference that can be made from these three studies is that chronic stress, whether caused by life in general or traumatic events, can change the way the brain operates. When the brain changes the way it

operates, it means an adolescent has more impairments in the areas of memory, learning, concentration, and self-control. Those deficits were evident in young adolescents who experienced negative life events (Duckworth et al., 2013) and in young adults who experienced chronic stress (Wolff et al., 2020). There, negative life events and chronic stress make adolescents more susceptible to high-risk behaviors that can cause lifelong problems such as substance abuse.

Although the etiology of substance abuse is complex, one aspect of it is making a choice to ingest an unhealthy substance. Research suggests that nearly two-thirds of adolescents have used alcohol and half have used marijuana before they graduate from high school (Levy, 2018). Levy (2018) cited research published in *Facing Addiction in America: The Surgeon General's Report on Alcohol, Drugs, and Health,* which included data from the longest-running survey on drug use in the country, the National Survey on Drug Use and Health (NSDUH). Again, because the brain is still maturing during adolescence, those who start using drugs then are more likely to have significant lifelong substance abuse disorders (Levy, 2018). Some are using substances to deal with the effects of chronic stress and negative life events and others use substances because of a lack of self-control, but either way, adolescent use puts them at significant risk of using substances as an emerging adult (Qadeer et al., 2019). Therefore, adolescence is a critical time period for prevention and early intervention for helping them develop the skills they need to counter the negative effects of chronic stress and negative life events.

Adolescent Mental Health and Academic Performance

Mental health has an impact on academic achievement as evidenced by the research that shows the connection between poor mental health and poor academic achievement. Mental health issues directly relate to an adolescent's ability to focus, pay attention, concentrate, recall

and encode information, follow-through on tasks, and manage complex organizational tasks, all of which negatively impact academic performance (Now is the Time Technical Assistance Center, 2016). A longitudinal study of 1,700 children that followed them from age three through age 20 investigated the relationship between mental health and academic performance throughout those developmental stages and revealed some interesting findings (Agnafors et al., 2021). The first finding was that the children whose mothers reported they had emotional or behavioral problems at age three correlated to academic problems at age 12 (Agnafors et al., 2021). This is consistent with findings from Jones et al. (2015) that showed how the level of prosocial behavior in kindergartners predicted outcomes in adolescence. Also, Agnafors et al. (2021) found that conduct issues at age 12 were related to poor academic performance throughout their school years. This study also indicated that boys with who displayed conduct issues at age 12 were less likely to graduate high school and less likely to pursue higher education (Agnafors et al., 2021). The data from Jones et al. (2015) also suggested that children who displayed low prosocial behavior in kindergarten were more likely to have poor outcomes in well-being, education, employment, crime, substance abuse, and mental health in high school and beyond. That study conducted a secondary data analysis from a FastTrack study of 753 highrisk and non-high-risk children in low-income neighborhoods (Jones et al., 2015). The FastTrack study collected data when the participants were in kindergarten and again 19 years later. That study collected data on multiple variables, but Jones et al. (2015) focused on demographic data, social skills data, and academic data to put through regression models to determine the connection between early social skills and adult outcomes. The results indicated that when children in kindergarten demonstrated high levels of prosocial skills in kindergarten, they were more likely to experience more positive outcomes at age 25 (Jones et al., 2015).

Other research shows that adolescent mental health is related to problems in other areas that contribute to academic performance. Part of poor academic achievement includes attendance and discipline problems, with research noting that school absences, suspensions, and expulsions are strongly correlated with mental illness (Wood et al., 2012). These results came from an analysis of data from three longitudinal national studies that measured school attendance figures and youth mental health in 7th through 12th grades and included over 16,000 adolescents (Wood et al., 2012). The data showed a strong link of psychopathology, or mental health reasons, contributed greatly to absenteeism, but the reverse was not indicated (Wood et al., 2012). Furthermore, adolescents with mental health issues are more likely to guit school before graduation and less likely to continue their education beyond high school (Now is the Time Technical Assistance Center, 2016). Although other research suggests there is not a direct cause and effect relationship between mental health and poor academic performance, a meta-analysis of 122 research studies found "strong positive associations" (Bradley et al., 2013). Even despite this slight disagreement of whether this is a cause-and-effect relationship, there is enough evidence to suggest that mental health issues contribute to an adolescent's inability to manage school and the learning required to succeed academically.

Research also suggests that are millions of children in public schools who have undiagnosed or unidentified mental health issues which further impedes school performance. One review of the research suggests that at least one in ten adolescents has a mental health issue at any given time, yet a majority of them never seek help (Kaushik et al., 2016). The review included 42 research studies that examined stigma, mental illness, and adolescents (Kaushik et al., 2016). Data analysis revealed that stigma is a significant factor in youth mental health, with adolescents feeling more stigma from peers and the perceived threat of stigma from peers

contributing to self-stigma which leads adolescents to keep silent about mental health issues (Kaushik et al., 2016). The current research study addresses this problem with the added benefit of enabling school social workers and psychologists a means to immediately recognize warning signs amongst struggling adolescents. The research study uses the EPOCH scale that is administered pre and post intervention and measures five positive psychological characteristics: engagement, perseverance, optimism, connectedness, happiness (Kern et al., 2015). A quick overview of student responses on the scale that specify *Almost Never* to specific items such as *I feel happy (Item 4 Epoch scale)*, *I love life (Item 8 Epoch scale) When I have a problem, I have someone who will be there for me (Item 10 EPOCH scale)* indicate to school professionals which students may benefit from mental health services to address those concerns. Through analysis of the results from the EPOCH scale school social workers and psychologists can address undiagnosed students who are suffering with mental health issues that impede their academic success and provide them with much needed support.

There are other issues that also lead to a negative impact on academics. Adolescents do not even need to meet the threshold of a mental health disorder in order to experience the adverse effects of sub-optimal mental health and well-being. For example, a study of over 7,000 students in Spain found that students who demonstrated attention problems, delinquent behavior, high stress levels, and mild anxiety or depression suffered as much academically as those with diagnosed mental health disorders (Pagerols et al., 2022). These results were part of a larger national study conducted throughout the education system in Spain which collects data on student mental health (Pagerols et al., 2022). The study included 7,036 students whose parents agreed to participate by filling out questionnaires about their child's mental and behavioral health, stressful life events, lifestyle, and academic performance (Pagerols et al., 2022). School

records were also used to provide data for academic performance (Pagerols et al., 2022). The data revealed a strong association between mental health problems and low academic achievement, even after adjusting for socioeconomic factors (Pagerols et al., 2022). The results also suggested that academic performance suffered even when students did not meet diagnostic criteria for a mental health issue but showed some symptoms related to anxiety, depression, attention, and delinquent behavior (Pagerols et al., 2022). Other issues such as sleep issues, inability to manage stress, and physical health problems not only contribute to lower academic achievement, but the resulting lower academic achievement feeds back to create more stress, anxiety, depression, and sleep issues for adolescents (Pascoe et al., 2020). Pascoe et al. (2020) conducted a narrative review of peer-reviewed articles that included a study about the mental health of students in grade seven or higher, mental health, stress, substance use, sleep, and academics published globally to determine the existence of a relationship (Pascoe et al., 2020). Studies were included no matter what type of research design they included (Pascoe et al., 2020). From the narrative review, the authors determined that the feedback loop of stress and academic problems affects high school students in multiple cultures throughout the world (Pascoe et al., 2020). Therefore, there may be many students within our schools who do not receive any recognition or help for their mental health or well-being. If it were addressed, these students might experience better academic performance in addition to other positive outcomes.

The consequences of adolescent stress and mental health issues last well into adulthood and go beyond the problems related to doing poorly in school or not graduating. Since recent research notes that more than one-third of high school students experienced more mental health during COVID-19, it is appropriate to assume that a majority of adolescents experienced significant stress over the past two years (Jones et al., 2022). Research suggests that those who

experience adverse experiences in childhood, like the persistent stress of a pandemic, are more likely to be diagnosed with chronic conditions such as heart disease, respiratory diseases, obesity, and type 2 diabetes (Hughes et al., 2017). Stressed-out adolescents are also more likely to engage in high-risk behaviors like substance abuse, sexual risk-taking, and criminal activity (Hughes et al., 2017). When adolescents experience mental health issues when they are young, they are also likely to experience those issues throughout adulthood, which puts them at higher risk for unemployment, underemployment, social isolation, and disability (Jones et al., 2018). As adolescent stress and mental illness carry over into adulthood, there is also significant risk of negatively influencing the next generation, since children who grow up with parents who have mental illness are more likely to experience it themselves (Manyema et al., 2018). Intervening early and providing adolescents with positive experiences to combat stress not only invests in the current generation but also the next.

Positive Psychology Interventions

Many therapeutic interventions focus on addressing an individual's problems and then solving them, but positive psychology interventions take a different approach. Positive psychology interventions seek to identify positive character traits and strengths from which an individual can build healthier habits and coping skills to deal with stressful situations and negative life events (Seligman & Steen, 2005). By increasing the use of the positive, the individual learns to make better choices and thus chooses to no longer engage in the problem behaviors.

Positive psychology interventions have shown promise in decreasing symptoms of depression (Seligman et al., 2005; Gorges et al., 2020; Hendriks et al., 2020), improving well-being (Carrillo et al., 2021; Hendriks et al., 2020), decrease in alcohol use (Akhtar & Boniwell,

2010), improved management of chronic health issues (Bergner et al., 2018) and improved quality of life (Carr et al., 2020). In addition to improvements in well-being, positive psychology interventions demonstrate an ability to reduce the amount of distress experienced by people with clinical disorders (Chakhssi et al., 2018). While some studies suggest the effects do not stick around long (Carr et al., 2020), another study suggests that positive psychology interventions need to focus not only on improving well-being, but also require target symptom reduction (Jankowski et al., 2020). Therefore, positive psychology interventions that use the dual focus approach have a better chance of promoting the positive psychology concept of "flourishing" and this method is deemed most effective for long-term results (Jankowski et al., 2020). Therefore, the use of positive psychology interventions in the general population tends to yield positive treatment outcomes.

A limitation of positive psychology intervention research is that most of it has been done with white, middle-class populations (Rao & Donaldson, 2015). However, Gillham et al. (2019) have developed and implemented positive psychology interventions for adolescents in diverse communities throughout the world with positive results. They suggest the key to their success is the consideration of the cultural values of the population with whom they will work and selecting positive psychology traits to use that are congruent with the culture. With that in mind, they created programs that focused on character strengths and resilience, which can be adapted and applied to any setting (Gillham et al., 2019). Even in choosing those two approaches, they needed to consider how to adapt to local communities based on community values and experiences. In other words, resilience is a positive psychology trait, but its meaning is not universal. The researchers recommended that any programs aimed at diverse populations must involve the community when defining how to apply positive psychology interventions as well as

evaluating their impact (Gillham et al., 2019). Even online positive psychology interventions can be adapted to appeal to those whom they aim to serve by understanding the population first. For example, positive psychology interventions targeted toward sexual and gender minorities that have the greatest positive impact are those that focus on the character strengths of love, optimism, humor, spirituality, self-compassion, and gratitude (Job & Williams, 2020). Therefore, more research is providing guidance on how to adapt positive psychology interventions to reach diverse populations.

Research targeting adolescents also demonstrate positive outcomes in other contexts as well. A positive psychology text-based intervention improved well-being and positive health behaviors in adolescents who live with type 1 diabetes (Bergner et al., 2108). This method of delivery and its successful outcomes were shown to be acceptable and enjoyable by both the adolescent participants and their parents. Another study evaluated adolescent well-being and alcohol consumption in response to a positive psychology intervention that focused on increasing happiness, optimism, and positive emotions and the results indicated that the interventions succeeded in improving well-being which also contributed to significant declines in alcohol dependence (Akhtar et al., 2010). Other meta-analyses on adolescent addiction and positive psychology interventions yield mixed results due to the differences in study designs and positive psychology concepts used in the intervention (Krentzman, 2013) Positive psychology interventions that improve well-being, depression, and loneliness are also cost-effective (Weiss et al., 2020). Therefore, an accessible and affordance strategy for positive psychology intervention implementation is to conduct them in school.

School-based Positive Psychology Interventions

Students spend six to seven hours per day in school for 180 days every year, suggesting that kids spend approximately 1080-1260 hours per year in school. Compare that to adults who work a full-time job and spend 2,080 hours per year at an employer. Kids spend half the time that adults spend at work in school, which means school plays a significant role in the lives of children. Schools are also in a position to notice behavioral and emotional signs that may indicate the student needs help either through monitoring their academic performance or by noticing changes in peer relationships or other behaviors (Moon et al., 2017). In fact, administrators and teachers feel it is part of their job to look out for students and take their mental health seriously (Moon et al., 2017). It is not always appropriate to intervene formally on behalf of students but creating an environment that is conducive to positive personal growth can inspire students to take care of themselves. All the time that students spend in school also means what they learn at school influences them tremendously. A significant method of intervention as suggested by educators and administrators is to integrate topics that promote mental well-being throughout the school rather than having a program specifically dedicated to it (Moon et al., 2017). This perspective suggests that if teachers and school administrators want to have a positive impact on the mental health of their students, school-based interventions are poised to deliver substantial positive outcomes.

A recent meta-analysis determined that even though the literature is not robust yet, school-based positive psychology interventions improve adolescent mental health (Tejada-Gallardo et al., 2020). The review included nine studies of controlled trials, with many positive psychology studies excluded from the review due to poor study design or poor methods of measuring the positive psychology concept or mental health of the participants. However, of the nine studies included, the analysis showed improvements in the primary indicators of mental

health issues, namely depression, anxiety, and stress (Tejada-Gallardo et al., 2020). This supports previous research that used positive psychology interventions programs with seventh graders that indicated improved subjective well-being (Roth et al., 2017) and another that showed significant decreases in distress, anxiety, and depression in seventh to ninth graders (Shoshani et al., 2014). The study by Shoshani et al. (2014) evaluated 537 students over two years and found not only the decreases in the aforementioned symptoms but also strengthened self-esteem, self-efficacy, optimism, and reduced interpersonal sensitivity. A follow-up to that study looked at the students' social engagement and positive intervention effects on positive emotions, peer relations, emotional engagement in school, cognitive engagement, and grade point average scores (Shoshani et al., 2014). Therefore, these studies indicate that integrating positive psychology interventions in school can give students the tools they need to decrease the negative mental health symptoms and improve positive aspects of self which can help them cope with negative life events and chronic stress.

Positive psychology interventions may also improve academic performance. Muro et al. (2018) used a PPI intervention as part of a school's Response to Intervention program. Within that program, they identified 164 low-performing students to participate in either a PPI group or a private tutoring group (Muro et al., 2018). The PPI group went through a series of training and PPI activities spread out over 12 sessions that were taught by a trained specialist and measured the students' quantitative academic performance and the students' subjective motivation to keep studying (Muro et al., 2018). The findings from the study suggest that the students in the PPI group showed a greater increase in academic performance and a more reported motivation to continue studying than the group that received private tutoring (Muro et al., 2018). These results are profound and show how a PPI program for academically low-performing students had a

greater impact than tutoring. While more research in evaluating whether positive psychology interventions in schools improve academic performance is needed, it is possible to draw inferences about its effect by looking at the research showing the impact of SEL interventions. Further research is needed to encourage school administrators to implement these programs as part of core curriculum for their students with the dual benefits of not only increased social-emotional skills but improved academics as well.

According to policymakers, SEL programs have been implemented in thousands of schools throughout the country with the endorsement of the federal and state departments of education (Mahoney et al., 2018). From the formal perspective, SEL is characterized by helping students develop skills for emotional regulation, goals setting, demonstrating empathy for others, positive relationship skills, and positive decision-making (Mahoney et al., 2018). The research suggests these programs accomplish their goals and help improve academic performance (Durlak et al., 2011; Mahoney et al., 2018) and well-being (Taylor et al., 2017). Therefore, if schools are pushing for the implementation of SEL because it positively impacts academic performance, perhaps simplifying and focusing on positive psychology interventions would have similar or better results.

Implementation of school-based positive psychology interventions need not be complicated. For example, one program used a psycho-educational format called The Hummingbird Project which included eight weekly sessions conducted within the school's normal psychology class (Platt et al., 2020). The course covered various positive psychology topics such as happiness, well-being, grit, resilience, growth mindset, character strengths, mindfulness, mental health problems, stigma, hope, and gratitude (Platt et al., 2020). The second version of the project included only six weekly sessions integrated into the psychology course

(Platt et al., 2020). Both versions resulted in positive outcomes for the students and demonstrated that the concepts could be built into existing course material (Platt et al., 2020). The intervention used in the Shoshani et al. (2014; 2016) studies involved a more significant commitment from teachers who underwent 15 two-hour training sessions throughout the year regarding positive psychology concepts. The teachers, then, integrated those concepts into their daily lessons in ways they saw fit and appropriate for their classrooms, thus integrating positive psychology concepts into education as a whole and not separating it as an individual curriculum item (Shoshani et al., 2014; Shoshani et al., 2016).

Another study that implemented positive psychology interventions at school invited parent participation as well (Roth et al., 2017). Parents attended an information session where they learned about what the students would learn in their groups (Roth et al., 2017). The students in the positive psychology intervention group met during a school period once per week for ten weeks and followed manualized positive psychology curricula developed specifically to improve student well-being (Roth et al., 2017). During the ten weeks, parents were sent handouts about what the students were learning along with ways they could incorporate those activities in daily life (Roth et al., 2017). Students reported increased well-being as a result of this program, but the effects wore off two months after the program ceased (Roth et al., 2017). This suggests that the implementation of school-based positive psychology interventions has a positive effect, but they need to be integrated into a person's lifestyle rather than a one-time intervention.

Rather than implementing positive psychology interventions, many schools are focusing on a whole student approach by integrating social and emotional learning (SEL) into their programming. Data suggests that school spending on SEL grew by 45% in the past two years and now amounts to \$765 million (Prothero, 2021). SEL promotes five areas including self-

awareness, self-management, social awareness, relationship skills, and responsible decision making which aim to improve learning and development for students in order to supplement their academic learning (Wallace, 2021). Some of these concepts overlap with those of positive psychology interventions including self-awareness, self-management, and social awareness (Shankland & Rosset, 2017).

Furthermore, there is money to be made by schools that implement SEL since Every Student Succeeds Act (ESSA) requires evidence that schools include SEL in their reporting indicators (Wallace, 2021). Therefore, with schools already focusing on SEL, there is more willingness to investigate and implement different types of programs such as PPI interventions. However, some research that has been done on PPI Interventions in schools tend to involve curricula, workshops, or seminars that involve extra staff training or time allocated which takes time away from other activities (Shankland & Rosset, 2017). While schools move towards greater implementation of SEL, research suggest that positive psychology interventions would be more beneficial in promoting well-being and building positive character traits which impact mental health (Benoit & Gabola, 2021).

There are several limitations of PPI implementation which causes some debate among schools regarding its use. Those critical of PPI suggest that these types of interventions lack context, are too simple, and do not account for the myriad issues that may contribute to a student who does not buy into the program (Ciarrochi et al., 2016). Also, there is the suggestion that PPI promotes experiential avoidance by not giving distress or negative emotions enough attention, and what happens if the PPI intervention does not have the desired effect for a particular student which could be very unhelpful (Ciarrochi et al., 2016). Then, there is not a lot of consistent

literature in support of PPI in schools and the cost and involvement required by the schools for implementation are often prohibitive (Ciarrochi et al., 2016; Shankland & Rosset, 2016).

There are multiple types of PPI interventions available, but they also include limitations. Of the 16 intervention types reviewed by Shankland & Rosset (2016), some are multi-week interventions, some are whole-school interventions, others require someone who has specialized training conduct the intervention, or they require additional training for teachers and administration to implement them within the schools. Most fall under the four major categories of mindfulness, gratitude, character strengths, and positive relationships and Shankland & Rosset (2016) highlight several PPI activities that teachers can use in the classroom without the cost and time investment of the manualized PPI interventions.

There are some cultural criticisms of PPI as well. For example, much of the research on PPI interventions is done with white, middle class college students or schools and much of the content is ethnocentric to white populations (Rao & Donaldson, 2015; Shankland & Rosset, 2016). This means that making sure PPI is cross-cultural may require added effort as the Gillham et al. (2019) study indicated. However, other research suggests cultural adaptations are appropriate and future research will provide more evidence-based data showing that PPI can be used in other cultures and populations just as easily.

Positive Psychology Attribute: Acts of Kindness

One aspect of positive psychology that can be integrated into one's lifestyle both at home and at school is acts of kindness. Acts of kindness are defined as having three components including the motivation to be kind to others, recognition of kindness in others, and engaging in kind behavior daily (Otake et al., 2006). This behavior increases subjective well-being and social relationships (Shankland & Rosset, 2016). For example, a study by Rowland and Curry (2019)

found that acts of kindness performed over seven days increased happiness, and the more acts of kindness a person performed, the happier they felt.

Positive psychology interventions like acts of kindness can be particularly helpful for adolescents. Adolescents tend to be self-interested, which is a trait consistent with Erikson's depiction of this psychosocial stage of development during which adolescents seek to define their identity (Syed & McLean, 2016). This prompts them to focus inward, on their own experiences as well as focus on how their interactions with others influence their thoughts and emotions. In contrast to the natural tendencies of adolescence, which is a particularly selffocused stage of life, performing acts of kindness requires that an individual identify and meet the needs of others. Furthermore, short term interventions may be more suitable for adolescents who might otherwise lose interest in a prolonged program. Erikson's depiction of the adolescent psychosocial stages of development suggests that adolescents tend to be impulsive, therefore, a short program may be more appropriate (Syed & McLean, 2016). Acts of kindness fall under the broad category of prosocial behavior, which is a way of characterizing behaviors that benefit another person (Nelson et al., 2016). Previous research suggests that those who engage in prosocial behaviors like volunteering or caregiving report higher levels of general happiness than those who do not (Nelson et al., 2016). For example, a study evaluated the effect of pro-social behavior compared to self-focused behavior over six months (Nelson et al., 2016). This study included adult participants who did not have any mental illness per se, but the results indicate that those who engaged in pro-social behavior experienced significantly greater psychological flourishing than those who engaged in self-focused behavior (Nelson et al., 2016).

Even when people do experience some level of mental health issues, they seem to benefit from engaging in prosocial behaviors. A significant symptom in people who experience anxiety

and depression is social avoidance and isolation, which further exacerbates the negative effects of mental illness (Trew & Alden, 2015). However, research suggests that relationships and connection to others is a part of the healing process. One study looked at the effect that acts of kindness had on those who exhibit socially anxious behaviors (Trew & Alden, 2015). Although the participants were adults, over half came from non-white populations, the results indicated that the participants who practiced acts of kindness regularly changed their behaviors and became less socially avoidant (Trew & Alden, 2015). A significant symptom in people who experience anxiety and depression is social avoidance and isolation, which further exacerbates the negative effects of mental illness (Trew & Alden, 2015). However, research suggests that relationships and connection to others is a part of the healing process. One study looked at the effect that acts of kindness had on those who exhibit socially anxious behaviors (Trew & Alden, 2015). Although the participants were adults, over half came from non-white populations, the results indicated that the participants who practiced acts of kindness regularly changed their behaviors and became less socially avoidant (Trew & Alden, 2015). Both of these studies support the findings of a meta-analysis of studies that evaluated kindness-related interventions that showed kindness contributes to improved well-being (Curry et al., 2018).

The research with adult participants shows good results, and while there is not as much research about adolescents, there is some that shows positive outcomes. A study of sixth through eighth graders invited participants to engage in acts of kindness (Binfet et al., 2019). They were provided a booklet with information about how to plan and reflect on their acts of kindness as well as several assessments that evaluated psychological well-being (Binfet et al., 2019). The study found that not all students participated at the same level, but those who were rated high implementers saw the most positive results related to wellbeing and those who were low

implementers saw little to no improvement in wellbeing (Binfet et al., 2019). Other research from the Random Acts of Kindness Foundation (2022) suggests that those schools that implement their curriculum and resources report higher levels of connection and trust between students and fewer visits to the principal's office.

Another important study was conducted by Padilla-Walker et al. (2020) which evaluated two attributes of PPI to determine if they correlated as a protective factor against anxiety and depression. The study included 500 teens between the ages of 12 and 17 from the Flourishing Families Project which is a longitudinal research study of adolescent development (Padilla-Walker et al., 2020). Participant families were randomly selected from the larger study and invited to participate (Padilla-Walker et al., 2020). The adolescents filled out the Kindness and Generosity subscale of the Values in Action Inventory of Strengths, which was created by Peterson & Seligman (2004) (Padilla-Walker et al., 2020). Additionally, the adolescents filled out other positive psychology questionnaires regarding hope, persistence, gratitude and selfesteem and finally a depression and anxiety scale (Padilla-Walker et al., 2020). The participants filled out these scales at three separate points in time (Padilla-Walker et al., 2020). The data analysis revealed that the adolescents who reported more prosocial behavior toward strangers and family members also reported higher levels of character strengths and lower levels of depression and anxiety (Padilla-Walker et al., 2020). Again, although this was not conducted in a school setting, the data reveals the impact of prosocial behavior, on adolescent well-being and mental health. This study furthers the advancement of research detailing the efficacy of positive psychology interventions as a means to improve well-being and decrease anxiety and depression amongst adolescents.

A real-world application of acts of kindness is demonstrated in the success of a community-based program in Israel that targets at-risk adolescents, called SAHI (2022). The organization empowers at-risk youth, not by offering them help, but by inviting them to be of help to other people (SAHI, 2022). Since its founding, it has expanded to 35 chapters throughout Israel and provides weekly assistance to over 2,000 families (SAHI, 2022). The founders explain that its success is due to their "strengths-based approach that build's the youth's sense of belonging and self-worth...youth helping others while turning their own lives around, building leaders within underserved communities" (SAHI, 2022). Additionally, the teens who participate say that being part of this mission of doing good for others makes them feel valued, that they have a purpose, they feel competent, they matter to someone else, and they feel connected to something greater than themselves (SAHI, 2022). Although there is not a research study to support the effects of SAHI's approach to acts of kindness, these findings imply that getting outside of oneself and focusing on helping another person can have a great positive effect on psychological wellbeing.

Gaps in the Research

Although the research on positive psychology interventions shows promise, it remains inconsistent and diverse. There is no consistency in research designs and the use of control groups is sparse or nonexistent (Mangan et al., 2020). Regarding PPI constructs, there is little, if any, consistency in which ones are evaluated and with so many different studies of different PPI constructs, there is little to no replication of the research (Mangan et al., 2020). Just as the constructs are varied, so are the measured outcomes such as well-being, life satisfaction, motivation (Mangan et al., 2020; Shankland & Rosset, 2017). Most of the studies are done with complex, costly programs designed by the researchers with little to no research on the brief PPI

interventions (Shankland & Rosset, 2017). Furthermore, much of the research on SEL and PPI comes from public schools, and no research on its implementation in private schools could be found.

This study aims to address some of the limitations of Positive Psychology Interventions in the school system and to fill in the gaps in the existing literature. Firstly, this study was done in a private school to observe the effects of PPI within a private school setting versus a public school. Secondly, this study simplifies the process of implementing PPI interventions in school through the implementation of one attribute of PPI versus lengthy 8–12-week programs. Furthermore, research studies containing PPI interventions with a control group were sparse, this study fulfills that requirement by comparing results with a control group using a sample of adolescents from a similar private school.

The implementation of the acts of kindness project at the heart of this research will not cost schools anything, which means even low-income schools can implement the project. Since it only takes one class period to explain to students how the program works, there is no special training or extended time commitment required for teachers. Once students understand what acts of kindness are, they can determine what activities are most appropriate for them to do for the people in their lives. In addition, this study addresses the concern that PPI infringes on personal and cultural belief systems by implementing an attribute that can be universally implemented as any cultural group or specialized population can interpret an act of kindness according to their values and beliefs systems. Therefore, this study complements existing research on PPI by addressing the critical gaps in the literature and implementing a powerful cost -effective program that can significantly improve adolescent well -being. Through focusing on one attribute in positive psychology interventions, acts of kindness, adolescents will be given the tools to

practice an evidence-based approach for improving adolescent well-being both at school and home while building core positive characteristics that potentially will have lasting effects into adulthood.

Section Four: Theoretical Framework

Two theoretical orientations were selected as a framework for this study. The first is Erikson's Theory of Psychosocial Development and the second is Seligman's Theory of Positive Psychology. Erikson's theory provides a backdrop for the psychosocial stage of life during adolescence and its importance for identity formation (Orenstein & Lewis, 2021). Thus, it provides a foundational understanding for the development of positive psychosocial experiences that lead to healthy development. The choice of adolescence as a stage for a school-based positive psychology intervention is grounded in this theory. Then, Seligman's theory focuses on the development of positive subjective experiences and the value of those subjective experiences for building positive character traits and coping strategies (Seligman, 2005). Since adolescence is a challenging time for many, and as the well-being of teenagers is influenced by mental and emotional health, providing them with an intervention that teaches them a skill that improves positive subjective experiences is likely to influence their identity formation. Adolescence is a critical and formative stage of development thus making it the ideal time to introduce a positive psychology intervention that can decrease mental-health issues prevalent during this time period whilst promoting overall well-being.

Erikson's Theory of Psychosocial Development

The theory of psychosocial development expanded upon Sigmund Freud's psychosexual stages of development by adding social and environmental factors that influence human development (Orenstein & Lewis, 2021). Erik Erikson posited that humans go through several stages of development in sequence, with each stage including a psychosocial conflict that must be resolved. Each stage includes a positive, or syntactic side of the conflict and a negative or dystonic side of the conflict and humans resolve these conflicts on a spectrum. The way in which

one resolves one stage will influence whether or not the individual can resolve the next conflict. Therefore, if an individual experiences a dystonic resolution to an early stage, it is highly likely that all the stages that follow will result in similar dystonic resolution.

Although Erikson's stages occur during certain ages, the ages are not set and depend upon the individual; however, each stage coincides with a fundamental psychosocial task. The first stage occurs during infancy, with the conflict of trust versus mistrust where the infant develops a sense that their basic needs will be met by caregivers (Syed & McLean, 2016). Basically, if an infant cries and a caregiver attends to the child's needs, then the child learns to trust that when they need help, someone will be there to help them. When this stage resolves syntactically, a child learns hope, but dystonic resolution results in withdrawal and insecure attachments to others (Orenstein & Lewis, 2021). This stage is closely related to attachment theory and in cases of abuse and neglect, can severely impact a child's development in all psychosocial areas.

The second stage occurs during early childhood and centers around differentiating from parents (Syed & McLean, 2016). The conflict is referred to as autonomy versus shame and doubt during which time the child learns will, or the ability to do things on their own (Orenstein & Lewis, 2021). This is usually the time in life when toddlers learn toilet training, how to dress, how to explore their environment independently, and establish peer relationships. Healthy development results in a child feeling like they can try new things while unhealthy development will result in compulsive behaviors (Orenstein & Lewis, 2021). Therefore, to provide children with healthy development, parents should allow them to explore as much as possible.

The third stage occurs in later childhood, usually during elementary school age, and involves the further development of autonomy (Syed & McLean, 2016). This psychosocial stage

is called initiative versus guilt, where the child begins to separate even further from caregivers and doing things on their own through initiative. This stage is full of imaginative play and exploration of peer relationships and the world. With a positive resolution of this stage, a child develops their own interests and purpose while a dystonic resolution will result in a child feeling guilt about separating from the caregiver (Orenstein & Lewis, 2021; Syed & McLean, 2016). Children benefit from caregivers who help them explore and initiate play as well as develop various interests.

The fourth stage and final stage of childhood is middle childhood or late elementary age where children experience the conflict of industry versus inferiority (Orenstein & Lewis, 2021). As a child grows up and learns autonomy and initiative, this stage highlights the development of project completion or industry (Syed & McLean, 2016). Along with task completion, children learn self-motivation, new skills, and mastering various cultural demands and expectations (Syed & McLean, 2016). This is especially evident in school where children learn new interests and take on projects, they complete themselves. Children who resolve this conflict syntactically develop competence, while those dystonic resolutions learn passivity and apathy (Orenstein & Lewis, 2021). As each stage builds upon the previous, by the time a child reaches this stage of psychosocial development, they will either trust others and feel confident in their ability to accomplish tasks or they will be fearful of others and not confident in themselves, perhaps showing very little interest in pursuing activities.

The fifth stage occurs throughout adolescence and culminates in the conflict of identity versus role confusion; essentially discovering who they are (Syed & McLean, 2016).

Adolescents try on multiple identities and group affiliations to see which fits them best and this psychosocial stage resolves with a sense of fidelity in terms of who they are as an individual or

feeling rejected for who they are (Orenstein & Lewis, 2021). During this psychosocial stage, individuals are also developing their identities in relationship to parents, family members, and peers, often modeling their own behavior after those they admire. Relationships are central within this adolescent stage of development and play a key role in an adolescent's state of security and happiness. Research in neurobiology suggests that social relationships have an impact on the adolescent brain, their development, and behavior with positive peer relationships contributing to positive mental health and negative relationships contributing to adverse mental health (Lamblin et al., 2017). Furthermore, adolescents think in concrete terms focusing on the current status and lacking the ability at times to think of consequences and later repercussions as the pre-frontal cortex that controls executive functioning skills is still developing (Romeo, 2017).

Erikson's psychosocial stages of development continue through adulthood. The young adulthood stage is the conflict of intimacy versus isolation where young people form romantic relationships and either demonstrate the ability to make commitments or an inability to form meaningful relationships. Next stage occurs during middle adulthood and explores generativity vs. self-absorption as adults contemplate what they will leave behind for the next generation (Orenstein & Lewis, 2021). Finally, old age includes the conflict of integrity versus despair, where people confront the fact they will die and either feel like they lived well or despair that they did not (Orenstein & Lewis, 2021). Thus, the sequence of the psychosocial stages of development interrelates in an evolving process and even in the cases of dystonic resolution, corrective action can be taken to resolve previous stages and thus reset an individual for healthy development.

Seligman's Theory of Positive Psychology

Psychology is traditionally a field that focuses on people's problems, and then solutions to fix those problems, but positive psychology flips that narrative by suggesting that the cultivation of positive experiences and character traits can mitigate the effects of psychological problems (Seligman, 2005). In other words, instead of focusing on problems and the negative aspects of life all the time, the goal is to build upon one's strengths and positive experiences. The more positive experiences and strengths one has, the more they are able to cope when negative things happen. Seligman (2011) suggested there are "five pillars of wellbeing" which include positive emotion, engagement, relationships, meaning, and accomplishment. Through positive psychology interventions, those five pillars can be cultivated.

Positive psychology concepts are closely related to resilience, or the ability to adapt to adverse events or circumstances (Fenwick et al., 2018). Resiliency research also led to research into protective factors and risk factors. Protective factors are those individual, social, systemic, or environmental factors which are positive, and act as supports while risk factors contribute to an individual not being able to adapt. Examples of protective factors include having a supportive family, access to high-quality healthcare, and a group of close friends. Risk factors, on the other hand, might include things like growing up in an abusive home, low socioeconomic status, and exposure to violence. Therefore, positive psychology focuses on building up protective factors and thus increasing resiliency.

Conclusion

This study aims to determine the effectiveness of implementing one positive psychology intervention in a school setting for adolescents. The goal is to give participants positive tools to increase positive subjective well-being and thus increase protective factors and resilience. By

implementing this intervention during the psychosocial development stage that focuses on identity formation, the impact of the positive psychology intervention will have a positive impact on subsequent developmental stages (Carr et al., 2021; Chakhssi et al., 2018; Jones et al., 2015; Pursuit of Happiness, 2022) Furthermore, given what is known about the psycho-social stage of adolescents and the physiological chemistry of the adolescent brain keeping the intervention short and concrete is expected to improve participation willingness and outcomes (Orenstein & Lewis, 2021). Therefore, Erikson's Theory of Psychosocial Development and Seligman's Theory of Positive Psychology provides the theoretical orientations and fundamental basis for this research.

Section Five: The Research Question

This research study evaluated the impact of a school-based positive psychology interventions on improving the overall well-being of adolescents. Adolescent mental health is becoming a growing concern as rates of teen suicide, depression and anxiety are spiraling in a downward trend. Schools, therefore, need evidence-based approaches to implement that can effectively improve adolescent well-being and enable their student body to succeed. While broad PPI programs or SEL programs are currently being used to promote student well-being, these programs are complex, costly and time-consuming for schools to implement. This research addresses this critical need while highlighting the effects of using only one positive psychology attribute which will be more beneficial to schools with limited time and resources. Since acts of kindness was deemed to be cross-culturally appropriate and beneficial to students' well-being, this study focuses on a simplified implementation of this positive psychology intervention to examine its efficacy and explore how one intervention could benefit students. Therefore, the research question for this study is whether one attribute of PPI, acts of kindness, implemented within the school system can positively improve adolescent mental health? More specifically, the research question is broken up into multiple questions with the following hypotheses.

Research Question 1:

Can implementation of one attribute of Positive Psychology Intervention programs within the school system positively improve adolescent mental health, specifically overall well-being?

Hypothesis: Implementation of, Acts of Kindness, PPI intervention will positively improve adolescent mental health, specifically student happiness and overall well-being.

Research Question 2:

Can implementation of one attribute of Positive Psychology Intervention programs within the school system positively improve adolescent mental health specifically engagement, perseverance, optimism, social connectedness and happiness?

Hypothesis: Implementation of the acts of kindness PPI intervention will positively improve adolescent mental health, specifically student engagement, perseverance, optimism, social connectedness and happiness.

Research Question 3:

Do the following variables, controlling for time, have an effect on improved adolescent well-being, EPOCH pre-intervention scores, grade of student participants, total time spent on Acts of Kindness, and total student self-rating of positive feelings associated with Acts of Kindness.

Hypothesis: The following variables, EPOCH pre-intervention scores, grade of student participants, total time spent on Acts of Kindness, and total student self-rating of positive feelings associated with Acts of Kindness will affect the outcome of overall student well-being scores.

Research Question 4:

How did the school personnel find the implementation of the program, student engagement, and overall benefits of the program?

Hypothesis: Implementation of the acts of kindness PPI intervention will be positively received by school personnel and easy to implement.

By answering the first three research questions, this study provides evidence that implementing a simple, one-attribute PPI intervention can have a positive impact on student

well-being, happiness, student engagement, perseverance, optimism, social connectedness and can decrease student depression. Additionally, the results will provide school personnel with an understanding of how to circumvent the traditional barriers to implementing programs like this due to the simplicity of enactment and its low burden on school resources. In particular, social workers are well-suited to implement these interventions in schools since it aligns with key social work values such as service, promoting the dignity and worth of individuals, and stressing the importance of human relationships as the acts of kindness intervention aims to promote service to others, honoring dignity of others by recognizing their needs, and furthering human relationships by treating them with kindness (The National Association of Social Workers, 2021). Finally, the enhancement of implementation will come from the feedback from school personnel who are expected to notice a difference in the students and comment on the ease of adding this to their schools.

Schools face tremendous challenges for addressing issues that their students face every day, yet many of the recommended interventions require time, training, money, and complex implementation processes. This holds true for SEL programs as well as most evidence-based PPI programs. Answering these research questions about a very brief type of positive psychology intervention can contribute to the arsenal of tools available to schools. The importance of this research is especially relevant in a time when schools face constrained budgets and a high demand for services. Demonstrating the effectiveness of a simple, inexpensive intervention that improves student well-being and contributes to a more positive school environment can pave the way for future research on the implementation of other single-attribute PPI interventions. Thus, schools will have more evidence-based options from which to choose to help improve the mental health of their student population.

Section Six: Research Methodology

The current study is a quasi-experimental, cross-sectional study using pre and post testing without a control group. Mixed methods were used to further identify the specific types of acts of kindness performed by the students and to what extent those acts impacted their well-being and social context of their daily lives. The current study focused on pre and post scores of individual student well-being after completing an acts of kindness intervention. To assess the changes in score, a non-experimental cross-section design without a control group was applied. Although the study is non-experimental, the results remain meaningful because it occurred within a real-world situation to be as close to an actual implementation of the intervention rather than a more sterile, experimental version. The time between the pre and post evaluation was limited to one month and a feedback session was conducted with the students to collect their perceptions of the intervention as well as a teacher survey to supplement the quantitative data. The limitations of this method of sampling will be discussed.

The quasi-experimental design is one that allows a researcher to demonstrate a causeand-effect relationship between intervention and outcome but does not include randomization or
a control group (Harris et al., 2004). Randomization and the use of control groups is not
appropriate for all settings, but it does represent a significant weakness in the study (Harris et al.,
2004). Furthermore, there are other variables that can confound the results of a quasiexperimental pre and posttest study which interferes with making definitive outcome statements
(Harris, et al., 2004). However, to address the limitations of not using a control group, a sample
group from a similar school with similar demographics was used to compare EPOCH scores at
baseline with EPOCH scores post-intervention. The school used for the comparative analysis of
EPOCH scores at baseline was Bais Chaya Mushka High School, a local all-girls Jewish high

school that was similar to the school used for the intervention. Forty students completed an EPOCH scale to obtain baseline scores without any intervention being offered. These scores were then compared to the post-intervention EPOCH scores of thirty-three students who completed the intervention in Bais Yaakov D'av Hirsch of Monsey.

The study uses mixed methods to obtain both quantitative and qualitative data evaluating the effects of the implementation of a positive psychology intervention on a sample of adolescents at two local high schools. The mixed method approach used in this study is the explanatory sequential design where the research occurs in separate stages, beginning with collecting quantitative data and then using qualitative data to further explore the experience of the participants (Creswell & Clark, 2018). The benefit of this approach is that it allows for an analysis of quantitative results proving statistical significance for empirical evidence in using this intervention. At the same time, it combines the qualitative feedback that furthers an understanding of how students and school personnel found the implementation of the intervention with specific feedback regarding their experiences that add deeper and more meaningful insights into the findings of this research study.

This method was chosen because it would not only provide the quantitative data that would demonstrate changes in well-being scores for the participants but also provide information about the type of activities that were done as acts of kindness, the quality of the action, time spend on the action, how the action made the students feel, and what their thoughts and feelings were about participating in the study. In particular, the feedback session at the end of the study provided in-depth information about what the students experienced while they participated in the study and how they felt about the process. The interaction between the participants during the feedback session prompted further discussion and more sharing of ideas. Finally, the surveys for

school personnel also included their perspectives on program implementation. Therefore, mixed methods allowed for the most comprehensive data collection and analysis.

This study seeks to teach high school students a positive psychology intervention and measure its effect on their well-being. Quantitative data will be collected with the EPOCH Measure of Adolescent Well-being while maintaining confidentiality of all participants through de-identifying and coding the responses. During the follow-up session, the feedback session will be audio-recorded and transcribed for data analysis, but again, no names or identifying information will be used to protect the confidentiality of all participants. Additionally, school personnel, administrators, and teachers who interact with the students will be invited to answer a survey to determine the ease of implementation of the program as well as their perception of the results of the program (see Appendix G).

Participants

Recruitment of participants began by sending a letter to the school administrator briefly explaining the purpose of the study and requesting a meeting to discuss it in person (see Appendix A). At the meeting, the researcher presented the study and procedures to the school administrator and principal who agreed to allow the researcher to come in and implement the intervention with their student body. A date was set for the researcher to conduct a presentation during one class period that would explain an overview of Positive Psychology and the details of this specific Positive Psychology intervention (see Appendix B). Each grade was given a separate presentation during the designated allotted time that the principal provided. After the presentation, students were invited to participate in the study, and those who were interested were provided with informed consent forms (see Appendix C). Students who were not 18 years

old took the informed consent form home for parents to sign. When they brought the informed consent back, they were given permission to being participation.

The sample for this study consisted of high school students, ages 14-18 who attended, Bais Yaakov D'Rav Hirsch High School in Monsey, a private Jewish all-female high school in a major metropolitan area. This school was chosen as a convenience sample but also because of its location in an urban area with a diverse population. It is also representative of adolescent girls in middle-class communities throughout the country. As a private school, there were also fewer challenges with the bureaucracy of conducting a research study with high school students as the administrator had the authority to grant permission for the project.

Female students were chosen specifically for the sample because girls are more relational than boys, with much of their self-esteem and sense of social cohesion developed from peer relationships (Pickering et al., 2020). Furthermore, girls with negative friendship experiences tend to experience more social anxiety compared to boys and more relational bullying compared to boys who tend to experience physical and verbal bullying when it occurs (Pickering et al., 2020). Additionally, adolescent girls have higher rates of depression and anxiety than boys, with social comparison exacerbated by extensive social media use contributing to these trends (Twenge, 2017). Thus, the impetus for choosing this sample came from the potential for a greater change in mental health or well-being within a 30-day period due to a relational activity like acts of kindness.

Data Collection

The data for this study is cross-sectional and quasi-experimental. Data was collected using paper versions of the EPOCH instrument (see Appendix D) which were handed out to the students who agreed to participate. Participants filled them out by hand without putting any

identifying information on them. Each student wrote her age, current grade, and initials. All initials were coded by the researcher numerically so that each student was assigned a number and no personal information could be identified. Then, the acts of kindness recording worksheets (see Appendix F) were also given to participants and they filled them out by hand over the course of 30 days. Again, no identifying information was recorded on these worksheets. At the final meeting of the study, the students handed in their acts of kindness worksheets and then filled out another paper version of the EPOCH. Again, participants did not include any personally identifying information on the instrument. The EPOCH score sheet 1 pre-intervention and the EPOCH score sheet 2 post-intervention of each student along with their Acts of Kindness worksheet were matched with the same numerical coding to be compared for the analysis. When these three points of data collection were completed, the researcher tabulated and analyzed the results from the paper copies.

Data from the Acts of Kindness worksheet included the student age, grade and the assigned numerical coding that was given for each participant. The worksheet contained the following data used for the Quantitative analysis, time spent on acts of kindness recorded in minutes and self-rating of 1-10 on positive feelings after each of act of kindness was performed. The following data was used for the Qualitative analysis, to whom the acts of kindness was performed which were coded into the following categories: friends, family members, community members and others. Details of the types of acts of kindness that the students recorded was transcribed and the following themes emerged; helping peers with schoolwork, helping friends, chores at home, babysitting, helping neighbors, words of affirmation, presents, and community service that included miscellaneous acts of kindness that did not belong in the other categories.

Intervention

Only one attribute of PPI was used for this intervention, acts of kindness.

Presentations were conducted during a 45-minute class period separately for each grade level (ninth through twelfth). During the presentation, the researcher described the goals of the research and explained the procedures. The students were invited to participate in the study. The students who were 18 years old were able to consent to participate on their own, and those under 18 years old were required to obtain parental permission. Informed consent forms were provided to all students (see Appendix C). Then, the researcher discussed the background of positive psychology, how it can improve mental health, a background of acts of kindness and how performing them improves mental health. The students responded positively to this information and participated in a discussion about mental health and using one's strengths to perform acts of kindness. The discussion included brainstorming ideas about how each student could use their unique strengths to perform acts of kindness for others.

Following the discussion, the researcher gave out the recording sheet for the students to keep track of which acts of kindness they did and gave the students instructions for filling it out. The researcher informed the students that all worksheets and information collected for the study would be de-identified to maintain confidentiality. The presentation concluded with each student filling out the EPOCH questionnaire and handing it in.

At the end of the month, the researcher returned to the school and met with each class again for a follow-up session for 45 minutes during a designated period that the principal assigned. The students handed in their acts of kindness worksheets and repeated the EPOCH questionnaire. The researcher then invited the students to participate in an open discussion regarding their experience of the intervention, how it made them feel, ease or difficulty of

recording daily acts of kindness, if they liked or disliked the intervention and collected their responses

Only one attribute of PPI will be used for this intervention, "Acts of Kindness." The study included a pre-test evaluation of the mental health and well-being of the participants using a standardized scale called the EPOCH Measure of Adolescent Well-being (see Appendix D). Then, the participants attended a session about Positive Psychology Interventions and how the implementation of core concepts into one's day-to-day living has the ability to transform the quality of life. One attribute of PPI was taught, Acts of Kindness, with a specific exercise given for participants to perform and record acts of kindness over a month-long period using a worksheet that was provided to them (see Appendix F). The quality of the kindness intervention was determined by the length of time each act of kindness took. In addition, students were able to record how doing the specific acts of kindness made them feel rating sense of satisfaction on a scale of 1-10. Following this intervention, the participants were given the same standardized scale on well-being and be given an opportunity to provide feedback about their experiences.

Measurement

The instrument for evaluating well-being is a validated instrument to measure adolescents. The EPOCH Measure of Adolescent Well-being is an assessment of the five pillars of well-being noted by Seligman (2011) but modified for adolescents. Instead of the adult concepts of positive emotion, engagement, relationships, meaning, and accomplishment, the EPOCH Measure of Adolescent Well-being measures engagement, perseverance, optimism, connectedness, and happiness (Kern et al., 2016). The measure was validated with 4,480 adolescents over ten samples and was determined to be psychometrically sound for measuring adolescent well-being in accordance with positive psychology concepts (Kern et al., 2016). The

instrument (see Figure 1) includes 20 statements that require a participant to circle an answer on a five-point scale that relates to how much the statement describes the participant ranging from "almost never/not at all like me =1" to "almost always/very much like me = 5" (Kern et al., 2016).

Figure 1. EPOCH Scale of Adolescent Well-being

This is a survey about you! Please read each of the following statements. Circle how much each statement describes you. Please be honest - there are no right or wrong answers!

When something good happens to me, I have people who I like to share the good news with.	Almost	Sometimes	Often	Very	Almost Always
I finish whatever I begin.	Almost never	Sometimes	Often	Very Often	Almost Always
I am optimistic about my future	Almost	Sometimes	Often	Very Often	Almost Always
l feel happy.	Almost	Sometimes	Often	Very Often	Almost Always
When I do an activity, I enjoy it so much that I lose track of time.	Almost	Sometimes	Often	Very	Almost Always
I have a lot of fun.	Almost never	Sometimes	Often	Very Often	Almost Always
get completely absorbed in what I am doing.	Almost	Sometimes	Often	Very	Almost Always
l love life.	Almost never	Sometimes	Often	Very Often	Almost Always
I keep at my schoolwork until I am done with it.	Almost	Sometimes	Often	Very	Almost Always
When I have a problem, I have someone who will be there for me.	Almost	Sometimes	Often	Very Often	Almost Always
I get so involved in activities that I forget about everything else.	Almost	Sometimes	Often	Very	Almost Always
When I am learning something new, I lose track of how much time has passed.	Not at all like me	A little like me	Somewhat like me	Mostly like me	Very much like me
In uncertain times, I expect the best.	Not at all like me	A little like	Somewhat like me	Mostly like me	Very much like me
There are people in my life who really care about me.	Not at all like me	A little like me	Somewhat like me	Mostly like me	Very much like me
I think good things are going to happen to me.	Not at all like me	A little like me	Somewhat like me	Mostly like me	Very much like me
I have friends that I really care about.	Not at all like me	A little like me	Somewhat like me	Mostly like me	Very much like me
Once I make a plan to get something done, I stick to it.	Not at all like me	A little like me	Somewhat like me	Mostly like me	Very much like me
l believe that things will work out, no matter how difficult they seem.	Not at all like me	A little like me	Somewhat like me	Mostly like me	Very much like me
I am a hard worker.	Not at all like me	A little like me	Somewhat like me	Mostly like me	Very much like me
l am a cheerful person.	Not at all like me	A little like me	Somewhat like me	Mostly like me	Very much like me

The scale measures five domains of psychological characteristics of well-being for adolescents, Engagement, Perseverance, Optimism, Connectedness, and Happiness. Each domain has four questions related to it, and scores for each domain are totaled to yield a bar graph (Kern et al., 2016). The higher the scores in each domain, the higher the participant's well-being. Due to its validity and appropriateness to measure well-being in adolescents, this instrument is appropriate for this study.

The first domain is Engagement, described as the ability to become involved in activities of life and focus attention on them as seen in the scale by the following statements: "I get completely absorbed in what I am doing" and "When I am learning something new, I lose track of how much time has passed." The second factor is Perseverance, described as the ability to keep working towards one's goals even when obstacles are in the way as seen in the scale by the following statements: "I keep at my schoolwork until I am done with it" and "I am a hard worker." The third domain is Optimism, described as an attitude of positivity and hope for the future and confidence in one's ability to overcome challenges. Examples from the scale include; "I am optimistic about my future" and "I think good things are going to happen to me." The fourth domain is Connectedness, described as feeling a sense of belonging and feeling loved by one's family and peers as well as the ability to extend friendship and support to others. Examples from the scale include; "There are people in my life who really care about me" and "When I have a problem, I have someone who will be there for me." The final domain is Happiness, which is described as a state of positive mood and overall contentment in life. Examples from the scale include; "I feel happy" and "I love life" (Kern et al., 2016).

The EPOCH scale has strong psychometric properties for the constructs measured and the target audience. The original assessment of reliability and validity was conducted with 4,480

adolescents ranging in age from ten to 18 in the United States and Australia (Kern et al., 2016). The initial assessment of the instrument deemed in internally consistent and convergent and divergently valid thus making it an adequate measure of adolescent well-being (Kern et al., 2016; Rose et al., 2017). Additionally, the cross-time correlations with three separate samples (n = 262) found the measure had good test-retest reliability (Kern et al., 2016). The internal consistency of the scale was good with Cronbach's α = .92 (Kern et al., 2016). These findings were supported through a confirmatory factor analysis of the measure which also found it a psychometrically sound instrument with 3,444 adolescents from socioeconomically disadvantaged backgrounds (Choi et al., 2021). Additionally, the Chinese and Swedish translations of the EPOCH have been used and deemed a reliable and valid measure of adolescent well-being cross-culturally (Maurer et al., 2021; Zeng et al., 2019). Therefore, this instrument was deemed appropriate for this study and population.

The EPOCH scale also directly relates to the positive psychology construct at the heart of the study. Acts of kindness specifically target multiple aspects of adolescent flourishing. Acts of kindness is expected to improve engagement by increasing the awareness of adolescents to the needs of others in order to find opportunities for acts of kindness. The intervention is also expected to improve connectedness because the act of doing something nice for someone else should improve their relationships with those to whom they act kindly including family, friends, and members of the community. Acts of kindness is also expected to improve happiness because doing something for others makes someone feel good about themselves. That inner satisfaction then boosts happiness and a sense of connection with the people they help. Thus, the feedback loop of positivity interacts between the pillars of adolescent flourishing. Therefore, the

intervention of acts of kindness directly related to the subscales measured by the EPOCH assessment instrument.

Variables

Individual Demographic Variables. Demographic data was collected from participants to describe the sample and the extent to which it compared to samples in previous studies of school based positive psychology intervention. Demographic indicators were measured as age and grade.

EPOCH Scale. EPOCH scale (see Appendix C) includes 20 questions answered on a five-point scale where the participant selects the answer that most closely relates to their experience. For example, one question regarding engagement asks the participant to rate if the following sentence describes them "almost always" at the highest rating to "almost never" at the lowest: "I finish whatever I begin." At the end, the EPOCH scores are reported in ordinal (1 = almost never/not at all like me to 5 = almost always/very much like me). Each domain of the EPOCH corresponds to four questions, and the mean of each of those four scores yields a domain score. The higher the domain score, the higher level of a domain the participant exhibits and when all domain scores are totaled, the sum yields a score of well-being, with higher scores indicating increased well-being. A standardized total score will be used throughout the analysis.

Power of Kindness. The power of kindness worksheet (see Appendix E) included the students' initials which were de-identified and given a numerical coding, age, current grade and date. The acts of kindness were recorded on the worksheet upon which the participants wrote down a short description of the act of kindness performed, to whom they performed the act of kindness for, the length of time it took them to do it, and a subjective self-rating (1 = bad, 10 = excellent) of how it made the participant feel to perform the action.

Data Analysis

All statistics and data analysis used STATA version 17 (StataCorp, 2021). Data analysis included paired t-tests, independent sample t-tests and multivariate regression. In this study, paired t-tests were used to determine the significant changes between EPOCH scores pre- and post-intervention. This was the appropriate analysis used since paired sample t-tests are able to statistically compare continuous scores in a sample measured at two time points. Specifically, in the current study, the paired t-test measured whether there was significant increase in EPOCH scores in the intervention group from pre-intervention to post-intervention. This was done for the overall EPOCH scores as well as the five EPOCH subscale scores (Engagement, Perseverance, Optimism, Connectedness, Happiness) measuring if these individual positive psychological characteristics statistically improved.

A multivariate regression was performed to predict changes in EPOCH scores following the intervention cite. Specifically, EPOCH post intervention scores were entered as the dependent variable and the following variables were entered as the independent variables: EPOCH pre intervention scores, grade of student participants, total time spent on Acts of Kindness and total student self-rating of positive feelings associated with Acts of Kindness. This was the appropriate analysis because multivariate regression is able to determine how a group of independent variables predict a continuous outcome. Furthermore, in the study, total time spent on Acts of Kindness acted as the predictor or independent variable of interest and the other variables acted as control variables.

An independent samples t-test was used to compare EPOCH scores in the intervention group to students from another school that was used as the control group. This was the appropriate analysis because an independent samples t-test is able to statistically compare scores

on a continuous scale in two separate samples. In the current study, the two separate samples are the intervention group EPOCH post-intervention scores and the control group EPOCH scores.

Section Seven: Results

Descriptive Statistics

The intervention sample (see Table 1) consisted of 33 female students at Bais Yaakov D'Rav Hirsch High School in Monsey. The sample consisted of students ages 13-18 and the mean age of the sample was 15.15 years old. Students from the sample were in grades nine through 12 with the breakdown as follows; 15 ninth graders, six 10th graders, six 11th graders, and six 12th graders. The control sample consisted of 40 female students at Monsey Bais Chaya Mushka High School in Monsey. The control sample consisted of students ages 13-18 and the mean age of the sample was 15.7 years old. Students from the sample were in grades ninth through 12th, with the breakdown as follows; 11 ninth graders, eight 10th graders, 12 11th graders, and nine 12th graders. There was a 35.3% attrition rate in the number of participants.

There was a total of 51 participants, 18 students dropped out, leaving 33 students who completed the study.

Table 1Participant Demographics

Grade	nde Intervention Group		Control Group		
	n	Mean age	n	Mean age	
9	15	13.4	11	13.5	
10	6	14.3	8	15.4	
11	6	16.8	12	16.5	
12	6	17.7	9	17.7	

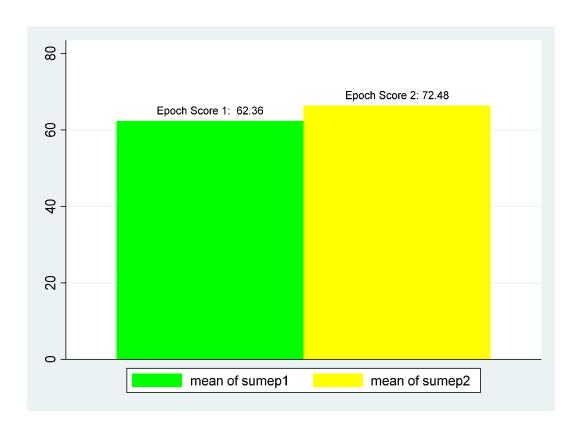
Note. Intervention group (n = 33) and control group (n = 40).

Quantitative Results

A paired t-test was performed to investigate if overall EPOCH scores changed from preintervention to post-intervention. The average EPOCH score in the intervention group was
higher post-intervention (M = 72.48, SD = 14.56) compared to pre-intervention (M = 62.36, SD = 15.48). This increase was found to be statistically significant, t(32) = 7.48, p < .0001. To show a
baseline of scores to compare to, EPOCH scores were compared to results from Kern et al.

(2016) with a sample of 1,515 adolescents from age 13 to 18 in the United States which
produced average EPOCH scores of (M = 72.6). These results support Research Question 1 and
demonstrate that overall EPOCH scores significantly increased from pre-intervention to postintervention.

Graph 1Pre and post intervention EPOCH scores that show the mean difference.



Note. mean of sumep1 = scores pre-intervention (M = 62.36) and mean of sumep2 = scores post-intervention (M = 72.48).

To answer Research Question 2, a series of paired t-tests were performed to investigate if the five EPOCH subscales changed from pre-intervention to post-intervention. The average Engagement score in the intervention group was higher post-intervention (M = 10.76, SD = 4.34) compared to pre-intervention (M = 9.55, SD = 4.15). This increase was found to be statistically significant, t (32) = 3.33, p = .002. This result supports Hypothesis 2 and demonstrates that Engagement scores significantly increased from pre-intervention to post-intervention.

The average Perseverance score in the intervention group was higher post-intervention (M = 13.61, SD = 3.90) compared to pre-intervention (M = 12.33, SD = 3.64). This increase was found to be statistically significant, t(32) = 3.44, p = .002. This result supports Hypothesis 2 and demonstrates that perseverance scores significantly increased from pre-intervention to post-intervention.

The average Optimism score in the intervention group was higher post-intervention (M = 14.97, SD=3.65) compared to pre-intervention (M=12.70, SD=3.72). This increase was found to be statistically significant, t (32) = 4.47, p = .0001. This result supports Hypothesis 2 and demonstrates that Optimism scores significantly increased from pre-intervention to post-intervention.

The average Connectedness score in the intervention group was higher post-intervention (M = 17.18, SD = 3.24) compared to pre-intervention (M = 14.82, SD = 4.35). This increase was found to be statistically significant, t(32) = 4.06, p = .0003. This result supports Hypothesis 2

and demonstrates that Connectedness scores significantly increased from pre-intervention to post-intervention.

The average Happiness score in the intervention group was higher post-intervention (M = 15.91, SD= 3.57) compared to pre-intervention (M = 13.09, SD= 3.74). This increase was found to be statistically significant, t (32) = 7.01, p < .0001. This result supports Hypothesis 2 and demonstrates that Happiness scores significantly increased from pre-intervention to post-intervention. The paired sample t-tests demonstrate that there were significant increases across all five EPOCH subscales, with the largest increase being in the happiness subscale.

Graph 2

Pre and post intervention EPOCH domain scores that show the changes in scores from each domain.

Figure 1 – Pre-intervention Domain Scores

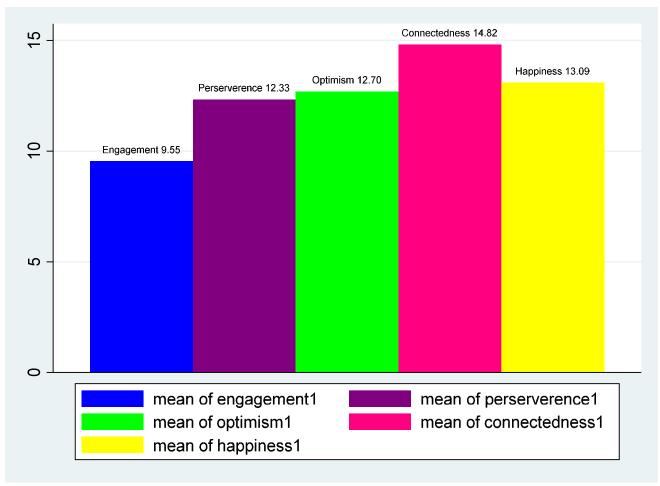
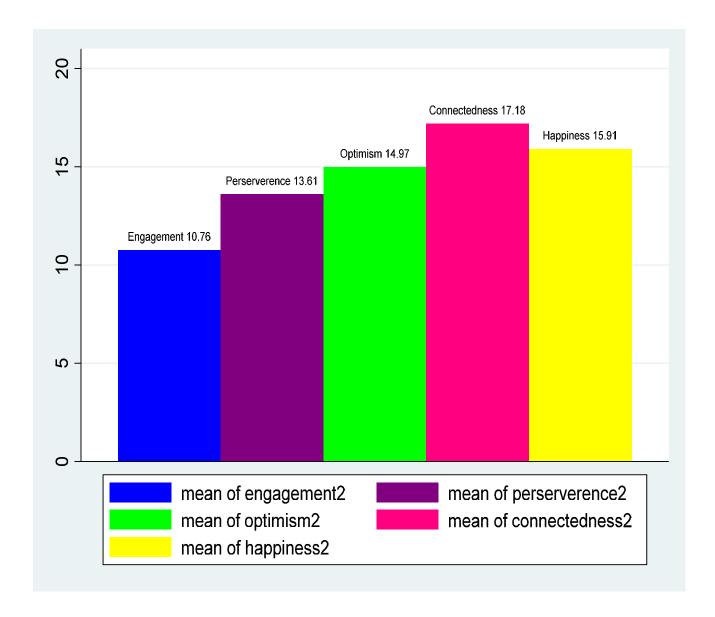


Figure 2- Post-intervention Domain Scores



To answer Research Question 3, multivariate regression was performed with EPOCH post-intervention scores entered as the dependent variable and the following variables entered as the independent variables: EPOCH pre-intervention scores, grade of student participants, total time spent on Acts of Kindness, and total student self-rating of positive feelings associated with Acts of Kindness. The overall regression model was statistically significant, F(4, 28) = 31.38, p

< .0001. Moreover, the regression model explained approximately 81.76% of the variance in post-intervention overall EPOCH scores.

The pre-intervention overall EPOCH scores were a significant predictor (B = .79, SE = .09, t = 8.91, p < .001). Students' self-rating of positive feelings associated with Acts of Kindness was also a significant predictor (B = .10, SE = .05, t = 2.06, p = .048). Total time spent on Acts of Kindness was a marginally significant predictor (B = .002, SE = .001, t = 1.74, p = .094) The grade of the student was not a significant predictor (B = 1.26, SE = 1.10, t = 1.15, p = .261). These results provide weak support for Hypothesis 3 due to total time spent on acts of kindness only being a marginally significant predictor of post-intervention overall EPOCH scores.

To answer Research Question 4, a program evaluation survey was distributed to school personnel at Bais Yaakov D'Rav Hirsch of Monsey to complete. A total of six school personal completed the Program Evaluation survey; the school administrator, school principal and one teacher from each grade level in grades ninth through twelfth. Participants rated each question on a Likert scale from (1 = strongly disagree, 5 = strongly agree). The following table details the mean response for each of the ten items on the Program Evaluation from School Personnel.

Results provided strong support for ease of implementation of program (M= 4.5) and minimal funding necessary (M=5). In addition, school personal reported student understanding of the worksheet (M= 4.7) motivation for completing the intervention (M=4.2) and that the intervention had a positive impact on student well-being (M= 4.8). Finally, when asked if the intervention was appropriate for all student types (M = 4.8) and if they would recommend implementation of the Acts of Kindness as a positive way to improve adolescent mental health within a school setting, responses were very positive (M= 4.8).

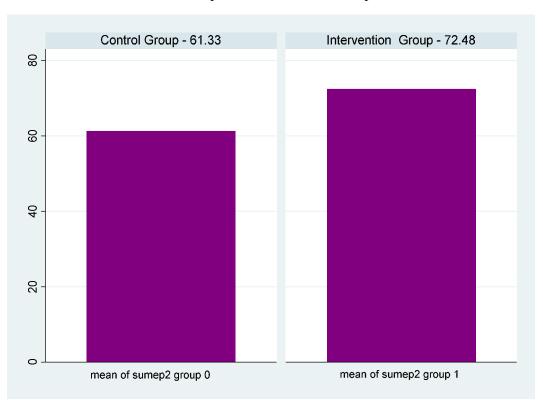
Table 2
Program Evaluation from School Personnel

Question	Mean Rating
1) The Acts of Kindness intervention required minimal time and effort.	4.5
2) The Acts of Kindness intervention required minimal allocation of school	5
funding	
3) The students had an easy time understanding and completing the worksheet	4.7
4) The students were interested and motivated to complete the intervention	4.4
5) The intervention appeared to foster positivity amongst the students	4.2
6) The intervention appeared to foster greater social connectedness amongst	4.4
the students	
7) The intervention had a positive impact on individual student well-being.	4.8
8) I would feel comfortable presenting an acts of kindness module within one	3.9
of my lesson plans.	
9) I would recommend this intervention as appropriate for all students.	4.8
10) I would recommend implementation of the Acts of Kindness as a positive	4.8
way to improve adolescent mental health within a school setting.	
Note. $N = 6$	

Quasi-Experimental Results -Intervention group vs Control group

An independent samples t-test was performed comparing post-intervention overall EPOCH scores in the intervention group with the overall EPOCH scores in the control group. EPOCH scores were found to be higher in the intervention group (M = 72.48, SD = 14.56) than the control group (M = 61.33, SD = 12.52). This difference was found to be statistically significant, t (71) = 3.52, p = .0008. This result provides support for Research Question 1 by demonstrating EPOCH scores to be significantly higher in the intervention compared to the control group. These results add valuable data proving the efficacy of the intervention to improve overall adolescent mental health as depicted by the higher mean scores at intervention group as compared to the control group.

Graph 3EPOCH scores of Control Group and Intervention Group that show the mean difference.



Note. mean sumep2 group 0 = scores of control group (M = 61.33) and mean sumep2 group 1 = scores of intervention group (M = 72.48).

Qualitative Results

When recording their acts of kindness, the students also recorded the amount of time they spent doing an act of kindness and their subjective rating of how it made them feel. The ninth-grade students spent the most time performing acts of kindness (see Table 3) for a mean per student of 1,104 minutes during the 30-day period for a mean of 55 minutes per act of kindness. The tenth-grade students spent a total of 478 minutes per student performing acts of kindness throughout the 30 days at a mean of 24 minutes per act. The 11th graders spend a total of 749 minutes per student performing acts of kindness over 30 days for a mean of 37 minutes per act, and the 12th graders spent a total of 995 minutes per student over 30 days for a mean of 50 minutes per act. Three out of the four grades gave each act of kindness a subjective positive feeling rating of eight out of ten.

Table 3

Time Spent on Acts of Kindness and Ratings of Positive Feelings

	Time Spent on Acts of Kindness		Positive Feeling Rating		
	(in	(in minutes)		(total score 200/ scale 1-10)	
Grade	Total	Per Act	Total	Per Act	
9	1,104	55	159	8	
10	478	24	150	8	
11	749	37	136	7	
12	995	50	164	8	

Note. Time recorded in minutes; positive feeling rating (1 = bad, 10 = excellent) total score for all 20 acts of kindness 200.

The qualitative component of the study sought feedback from the student participants to determine their thoughts and feelings about engaging in acts of kindness and how performing them affected their well-being in a more exploratory manner than the quantitative EPOCH measure. The qualitative data was gathered during a student meeting at the end of the study in an open discussion format. The students who attended were grinning when they entered the classroom and participated freely and openly. Several themes emerged from the discussion.

The first theme that emerged was the increase in general happiness. In addition to the observed body language of the students, many of them offered positive feedback about their state of happiness. For example, one student said, "See how happy I am! It worked!" Another student said, "This has really made me feel happier, I think because I feel good when I'm doing things and this intervention pushed me to do daily acts of kindness." Other student participants reiterated and supported these comments contributing to the general theme that performing acts of kindness made them feel happy.

The second theme from the discussion was an increased awareness of the needs of others and a greater focus outward as students focused more on the needs of others than themselves. Some students talked about thinking more about what kinds of acts of kindness they could do and paying more attention to the needs of others. They also reported paying attention to the reactions of people for whom they did an act of kindness. One student said, "I never realized that small acts of kindness can make such a difference." This was evident in the way the students talked about the impact acts of kindness had on family and others. One student said, "My mom was so happy, she couldn't understand why I was helping out so much at home." Other students supported that comment by relating their own family's responses, all of which were positive. Another student commented, "I never thought much about helping my neighbors, I offered to

babysit so my neighbor can run errands without her toddler, she was so thankful." Another student supported that idea stating, "I began walking my neighbor's dog who is elderly, I don't know how he managed till now." Yet another student related, "All of a sudden I was seeing opportunities for kindness everywhere at school, home and wherever I went."

Another theme that emerged was feelings of greater social connectedness that resulted from doing acts of kindness. Students reported that they felt better about themselves amongst their peers at school like one student related, "It made me feel closer to my friends" and another said, "I used to feel like I didn't really have a lot of friends, now I don't feel that way." Other students reported feeling closer to their family members. "I used to always get annoyed from my siblings, all of a sudden, I'm doing kind things for them and liking them more!" Another student supported that comment saying, "Lately, I feel closer to my mom." Therefore, based on these comments, it is evident that the more students reported that they did acts of kindness for others the more they felt connected to others felt that the quality of their relationships improved as well.

Finally, the acts of kindness intervention enabled students to become aware of their strengths and use it to help others. This was a theme throughout the discussion as students discussed which strengths they used when completing the intervention. "I never realized how good I was with kids, until I started babysitting." Another student beamed when she related, "I made dinner for my family for the first time, everyone loved it!" One student shared, "I've always been good at Math, so I helped my friend study for the Math regents. She passed! I think I'm going to become a teacher." Other students related similar sentiments about realizing their strengths and how good it made them feel to be able to help others. Several students said they enjoyed the activity so much, that they wanted to keep going. One student asked, "Can I have another paper so I can continue to fill it out daily acts of kindness?" From the discussion it was

evident that doing acts of kindness improved student's self-esteem and generated feelings of pride and achievement.

The second part of the qualitative component of this study was an evaluation of school personnel to obtain their feedback of the intervention. Participants included the school administrator who initially gave permission for the intervention to take place in the school, the principal who oversaw the study's implementation, and one teacher from each of the four grades representing a total of six school personnel. The school administrator related that he was not involved in implementation but did observe the students' interest and excitement in the program. The principal was more effusive very positive about the intervention, stating, "I absolutely loved it! Can you come back next year? Are there more Positive Psychology programs that you can implement in our school?" She related that it was easy to implement, the directions to students were clear and there was a noticeable positive impact on the student body. The ninth-grade teacher stated she really liked the intervention and noticed great results from her students. The 10th, 11th, and 12th grade teachers also commented on the ease of implementation and said that the students who participated enjoyed the exercise.

It should be noted that not all students in each class participated as participation was voluntary. In addition, the teachers reported that there were some students who initially joined and took home the worksheet but did not follow through on completing it. The ninth-grade teacher was the most involved and related that she reminded her student daily to fill out their acts of kindness worksheet. This resulted in her class having the most participants join the study with 15 students participating as opposed to the other grades which each had six students that completed the intervention. The other grades did not give reminders but agreed that it might have helped to keep students involved.

All of the teachers reported the positive impact they observed in the students who completed the acts of kindness worksheet and that they would recommend this intervention for all students as part of a school-wide promotion of acts of kindness. Furthermore, teachers reported that program was easy to administer with clear directives and a simple worksheet to record and keep track of progress. In the discussion teachers were asked if they would feel comfortable implementing this intervention in the future. Teachers consented that they did not need any additional training or resources if they were to implement the intervention in their classroom on their own in the future. Overall, the school personnel responded favorably to the acts of kindness program and related positive feedback with regards to satisfaction of the intervention and willingness to participate in more Positive Psychology Interventions in the future.

Section Eight: Discussion

The rise of adolescent mental health problems poses a serious concern for today's society as teens navigate the physiological and psychosocial changes within compounded with the myriad environmental challenges that have evolved int the 21st century. Schools provide a safe supportive structure where adolescents spend a sizeable amount of time making them an ideal location for the implementation of interventions focused at improving adolescent mental health. The question at the heart of this research, is there an intervention that can be implemented within the school system with a minimal investment of time and resources that can be successful at turning the tide on adolescent mental illness? Can implementation of an abridged Positive Psychology Intervention (PPI) using just one attribute be effective in improving adolescent well-being?

The current study sought to answer these questions and evaluated the impact of a single-attribute positive psychology intervention in schools, Acts of Kindness, and how performing acts of kindness would impact the well-being of high school students. The study included four research questions. The first research question focused on how one attribute of PPI, Acts of Kindness would affect the well-being of the student participants as evidenced by the overall EPOCH scores pre- and post-intervention. The implementation of the Acts of Kindness intervention for one month contributed to an increase in overall scores demonstrating success in the program in improving adolescent well-being. This data supports previous research that indicated PPI in general improved subjective well-being (Binfet et al., 2019; Roth et al., 2017). The results were further supported in the feedback session with students where many of them voiced their subjective feelings of happiness when doing acts of kindness. Previous research also suggested that the longer someone engaged in acts of kindness or prosocial behaviors, the

happier they felt (Rowland & Curry, 2019). This theme was implied again when the student participants asked if they could continue recording their acts of kindness, suggesting that they wanted to continue feeling the happiness they experienced. Therefore, this study supported the first hypothesis that implementation of the Acts of Kindness intervention within a high-school positively improved adolescent mental health, specifically happiness, and overall well-being.

The second research question addressed the five positive psychological characteristics of adolescent mental health measured by the EPOCH instrument which include engagement, perseverance, optimism, social connectedness, and happinessResults showed that the participant's scores in each of the EPOCH domains increased at the post-intervention evaluation. As expected, engagement and perseverance, while showing a statistically significant increase in scores pre- and post-intervention, were the lowest scoring amongst all five domains. Engagement is a domain that involves interest and absorption in an activity which loosely applies to acts of kindness, but not directly (Kern et al., 2016). The same is true for perseverance, which is the ability to stick with a task or project until it is done (Kern et al., 2016). In order to perform an act of kindness, one must be engaged with the people around them enough to find opportunities to be kind and then persevere in performing the action, but they are not as central to kindness as the other domains.

The next highest level of statistical significance occurred in the domain of optimism, which is defined as feeling hope, confidence, and positive view of life (Kern et al., 2016). The fact that this domain increased in score demonstrates that when people reach out to help others and receive positive feedback for doing so, they feel good about themselves. As one student said in the feedback session, she felt good that her mother noticed her doing acts of kindness and that gave her hope about improving her relationship with her mom.

Finally, the two domains that increased the most in terms of statistical significance were connectedness and happiness. These two domains increased at twice the rate of engagement and perseverance. Connectedness is described as feeling loved, supported, and valued by others but also refers to one's ability to reach out to others and feel that sense of belonging that contributes to positive relationships (Kern et al., 2016). This was a key domain targeted for the students and it was one that the teachers noticed the most. They noticed that instead of the usual self-emphasis and complaining about things that were not going well for them, the students were looking outwards for ways to help each other. These behavioral shifts are in opposition to the adolescent's natural tendency to view themselves as the center of their universe (Syed & McLean, 2016). In the feedback session, the students also said they found themselves looking for things they could do for others and did not think so much about themselves and their own problems. One girl even described how she was going through a difficult home situation that was causing her a lot of stress, through focusing on helping her friends study for finals she felt better.

The most statistically significant result by far was the happiness domain. Happiness is described as feeling a positive mood and contentment with life. In the formulation of this domain, Kern et al. (2016) described happiness as the opposite of depression. Since depression is correlated with poor academic performance and a decline in social relationships, the assumption is that happiness can improve those things (Muro et al., 2018; Nelson et al., 2016; Shankland & Rosset, 2016; Trew & Alden, 2015). The feedback session also provided insight into the level of happiness that students felt, including their desire to do more acts of kindness for others because it made them feel so good (Rowland & Curry, 2019). The teachers also commented that they felt like the general mood of their classrooms was more positive since the intervention started. These results support previous research that indicated increased self-efficacy, optimism, and

interpersonal relationships as a result of engaging in PPI (Shoshani et al., 2014). Therefore, this study confirmed the hypothesis that the Acts of Kindness intervention would positively improve adolescent mental health, specifically student engagement, perseverance, optimism, social connectedness and happiness.

The third research question sought to determine if other variables had any effect on the overall well-being of the participants. These variables included the pre-intervention scores on the EPOCH, grade of the participants, total time spent on acts of kindness, and student self-rating of positive feelings. The only two variables that significantly predicted the overall well-being scores of the students at the end of the study were the students' pre-intervention EPOCH scores and the students' self-rating of their positive feelings associated with the acts of kindness they performed. The total amount of time spent performing acts of kindness was a marginal predictor and the grade level of the student was not a predictor. However, it is noteworthy the number of hours the students spent on performing acts of kindness. Even though it was not a strong predictor of well-being, the fact that ninth graders spent an average of 18 hours being kind to someone else over 30 days means they spent almost a half hour per day going out of their way to be kind to others.

Another assumption is that if they are engaged in a positive activity that is improving their feelings of positivity to the point where they rate that activity eight out of ten in terms of good feelings and happiness, it can infer they are not experiencing depression or other negative feelings at that time. Despite the lack of statistical significance for this data, these findings are still important when considering how the Acts of Kindness intervention affected the participants. In general, however, there is weak support for the third hypothesis that the EPOCH preintervention scores, grade of student participants, total time spent on acts of kindness, and total

student self-rating of positive feelings associated with acts of kindness would affect the outcome of overall student well-being scores.

The fourth research question sought to determine how school personnel evaluated the program, the level of student engagement, and the overall benefits of the program. The school administrator, principal and teachers all cited the ease of implementation of the intervention and the positive impact it had on students. Teachers also reported that this intervention did not require any extra effort or resources from them, and did not interfere in their lesson plans. This is in contrast to the literature that cites excessive training and required resources for PPI programs in schools (Shankland & Rosset, 2017). These comments support previous research suggesting that PPI in schools makes a positive impact and integrating them throughout the school environment is more effective than creating a separate program (Moon et al., 2017; Platt et al., 2020; Shoshani et al., 2014). This intervention was unique as the single-attribute design allowed for less time and economic investment on behalf of the school while delivering the same benefit for students.

An important finding was the number of students who participated in each grade, with fifteen ninth graders and six students in grades tenth, eleventh and twelfth. The ninth-grade teacher reminded her students to fill out their acts of kindness worksheets which resulted in higher participation than in the other grades. Of the 34 students who participated, almost half of them were ninth graders and the teacher was involved and supportive of the study. In the grades where the teachers did not remind students, there was less participation evidence by fewer acts of kindness recorded. This suggests that a simple reminder goes a long way and is beneficial for the success of the program.

The data revealed other interesting findings as well. For example, the younger students, those who were 13, 14, and 15 years old, were more likely to perform acts of kindness for family members. In contrast, the older students who were 16, 17, and 18 years old performed most of their acts of kindness for their friends. This trend mirrors developmental literature that suggests young adolescents are more influenced by and connected to family, and as they get older, they become more connected to peers (Syed & McLean, 2016). Acts of kindness performed for family members included things like washing dishes, babysitting younger siblings, doing errands for mom, and cooking dinner for the family. Also, the acts of kindness performed at home generally scored lower on the subjective self-rating of positive feelings than those performed at school or outside the home. Acts of kindness performed at school for friends included things like lending a pen or helping a friend study for regents or teaching a friend material she needed to know. Examples of acts of kindness performed in the community included sitting with a sick child in the hospital and cheering them up, helping a neighbor bring in groceries, collecting mail for a neighbor while they were away, and walking the neighbor's dog. These results support previous research that showed acts of kindness increase well-being and social relationships including family (Padilla-Walker et al., 2020; Shankland & Rosset, 2014). These findings did not directly relate to the hypotheses in the research but present useful information that can be used for future research.

Most of the acts of kindness performed by the participants in this study did not take much time. A majority of them took less than 30 minutes with some taking as little as two to five minutes. The cumulative total amount of time spent on acts of kindness throughout the study did not impact overall well-being at the end of it; however, there were indications that acts of kindness that did not take much time yielded higher subjective positive feelings than acts of

kindness that took a long time. For example, helping mom with the dishes for 15 minutes yielded a higher positive feeling rating for that individual act than babysitting someone's children for four hours. This result suggests there may be a threshold that differentiates an act of kindness and a chore or job.

The qualitative findings provided more exploratory information about the participants' experiences. Insight into the types of acts of kindness performed, the quality of the acts of kindness and to whom students chose to perform the acts of kindness. The Acts of Kindness intervention promoted in the adolescents a greater awareness of others and those who could benefit from a helping hand. It encouraged students to help those at home, school, in the neighborhood and the greater community at large. It also enabled students to use their strengths to help others resulting in increased positive self-worth and feelings of satisfaction and pride.

Section Nine: Limitations of the Study

There are several limitations that apply to this study. First, the sample size for the study was small and took place in one school. The small sample size and cultural homogeneity limits the study's generalizability to the adolescent population in general. Second, since the school is an all-girls private school, results do not account for gender differences that may impact student disparities in program satisfaction and implementation. Additionally, the demographics of the school in the study included some diversity but did not reflect the overall diversity of adolescents throughout the country. A third limitation of the study is that it focuses on the implementation of only one attribute of the positive psychology intervention program as opposed to all seven attributes. However, it should be noted that through choosing only one specific attribute results are more definitive as they prove efficacy for Acts of Kindness as being the sole predictor of improved adolescent well-being. Also, the study did not evaluate the connection between performing acts of kindness, overall well-being, and the relationship to academic performance, nor did the study evaluate for anxiety or depression.

There are also limitations to using the EPOCH instrument to measure adolescent well-being. The instrument has demonstrated strong psychometric properties, including test-retest reliability, and validity with diverse populations including multiple countries and socioeconomically disadvantaged adolescents (Kern et al., 2016; Maurer et al., 2021; Zeng et al., 2019). However, there are limitations to administering the same instrument in such close proximity and no other research was found that used the EPOCH as a pre- and post-intervention measure. The test-retest reliability was conducted over four months or three years (Kern et al., 2019). In contrast, the time between this study's pre- and post-intervention assessment was very short and could contribute to bias. For example, the participants may have been subject to the

priming effect or the recency effect by filling out the same questionnaire only 30 days prior. They may have remembered the questions and answered them differently the second time to show some effect. Also, the participants were aware of the goals of the study and may have inflated the post-intervention ratings in an effort to support the researcher's stated hypothesis. Furthermore, the effects of the intervention may not have lasted beyond 30 days, which would be important to consider when determining whether to implement this type of intervention. If the effects do not last beyond the intervention, then the effectiveness of the intervention becomes questionable. Whilst these limitations may prevent generalizability to the population in general, the findings provide a means of inspiring future research by demonstrating whether the application of one attribute of the positive psychology intervention program can positively impact adolescent well-being.

Section Ten: Anticipated Contributions of the Study

Adolescent mental health continues to deteriorate, and psychologists and social workers are in a unique position to implement innovative and evidence-based interventions to improve it. This study aimed to evaluate the effectiveness of a school-based positive psychology intervention for improving adolescent well-being by focusing on acts of kindness. Schools are a significant intervention point for addressing adolescent mental health, and school psychologists and social workers comprise a significant portion of the staff appointed for that purpose (Shelton & Owens, 2019). Although there are several challenges faced by school mental health providers, they consistently report having too much work and not enough time or the tools to address the needs of those they serve in a timely fashion (Kelly, 2016). Furthermore, mental health providers in schools lack the robust evidence-based practice informed by research that can support the programs they choose to implement (Kelly, 2016). As school administrators demand more

accountability and more results from teachers and staff, the students are requiring more and more services. Therefore, providing school psychologists and social workers with the evidence-based tools they can use to demonstrate improvements in student well-being is instrumental to the profession. The structure of the school setting is an ideal place for learning and growth and allows the opportunity for mental health professionals to work together with educators to enable the students to rise above mental health challenges and use the skills taught in PPI programs to lead a successful life.

This study also demonstrated a way to implement PPI that refutes some of the stated challenges and barriers cited in the research. For example, limits to PPI tend to be related to the resources, training, and complex implementation strategies they require (Shankland & Rosset, 2017). This study showed that a one-month program that required zero training of school staff or teachers, zero financial investment, and minimal time commitment can improve student engagement, perseverance, optimism, connectedness, happiness, and overall well-being. Not only did this study show positive results with a minimal requirement necessitated from school personal, there was no resistance as there often is with new programming from any member of the school board, staff or parent body.

The students desire to continue the program on their own by keeping track of acts of kindness demonstrated the enthusiasm and positive outcome the program generated amongst the student body. With a little encouragement, these students are likely to continue the practice on their own because it made them feel good about themselves and much happier when they did it. Therefore, this type of simple, brief intervention is appropriate for schools in low socioeconomic areas with limited budgets as it only requires a school mental health provider to explain it and adult encouragement to perpetuate it.

Another asset of this PPI intervention is that it was appropriate for all student types regardless of differences in race, culture and even those with physical or mental disabilities. While some positive psychology attributes are culture-specific, kindness is a universal value shared by multiple cultures and is subject to an individual's interpretation of what a kind act consists of (Lambert et al., 2019; Otake et al., 2006). Therefore, this study not only demonstrates a simple implementation of an intervention that can improve outcomes for adolescents, but it is also appropriate for diverse populations.

This study focuses on only one attribute of PPI, acts of kindness; however, the results of its implementation can serve as the foundation for future research on different ways positive psychology intervention programs can be integrated into the school environment. While most of the positive psychology interventions in the literature were manualized and had multiple sessions, this intervention is simple. It allows schools to use a clear standardized evidence-based approach that will take little time and little expense to implement. Therefore, this study provides researchers with the groundwork for trying other single- attribute PPI interventions. Data from this study provides information about the ease of implementation, student perception of the intervention and the resulting impacts on adolescent well-being.

The results of the Acts of Kindness single attribute PPI intervention are groundbreaking. The success of a one-month PPI program as opposed to lengthy eight-week and twelve-week programs that require extensive training and funding, pave the way for future researchers to explore the idea of implementing other attributes of the positive psychology program such as mindfulness, spirituality, or relationships as a means of improving student well-being. This study provides much needed evidence-based data on brief PPI interventions that can have great impact on adolescent mental health within the school system.

An ideal implementation for PPI in middle schools and high schools would build on the successes of this study's results. A simplified PPI program would focus on one attribute at a time to give students an opportunity to practice them. By reducing the program to one attribute at a time, the schools can reduce the burden of training teachers and staff and eliminate the cost of complex programming. Schools could choose to focus on one PPI attribute that is appropriate for their school, or they could choose to highlight all seven attributes throughout the school year. No matter which option they choose, their students will benefit. Even brief PPI interventions that focus on one attribute at a time strengthens adolescent well-being and improves social relationships (Padilla-Walker et al., 2020; Shankland & Rosset, 2014). Integrating brief PPI interventions into the core curriculum is expected to lead to the improvement of student well-being which will also improve academic performance (Muro et al., 2018). Therefore, this research will contribute to the ability to offer schools affordable, easily implemented positive psychology interventions that foster wellbeing among their students and improve academic performance.

Future Research

This research provides many opportunities for future research directions. First, research can assess the various attributes of positive psychology in brief interventions to determine which are most effective at improving adolescent well-being. Researchers can choose any of the seven attributes of PPI to implement and assess which are most effective, have student engagement and positive school feedback. Future research can explore various design implementations, including implementation of all seven attributes using this single-attribute design of one at a time to provide more direct evidence for causal relationships. Implementation of two or three attributes built into school curriculum and assessment of desired improvement in adolescent well-being.

Second, connecting acts of kindness, adolescent well-being, and improved academic performance would strengthen the case for making PPI available in schools. Since schools are pressed for time and need to finish curriculum requirements in order for students to perform at or above level for standardized testing, schools are more likely to implement a program that can positively impact academic performance. Future research can include academic scales of achievement to assess increases in pre- and post-intervention scores.

Third, future research can evaluate if implementation of the Acts of Kindness intervention and other PPI interventions has a direct impact on reducing adolescent mental health issues such as stress, anxiety and depression. By providing students with scales on depression or anxiety pre- and post-intervention, future research can determine the efficacy of the program in reduction of mental health issues amongst adolescents.

Fourth, future research can explore whether pre-teens ages ten to twelve in middle school would benefit from this Acts of Kindness program and use a comparative analysis to see at which age this intervention is most effective. Research can adjust the intervention to make it age appropriate and assess for differences in outcome, engagement and overall well-being of students who participate. In addition, the role of school psychologists and social workers in implementation of the program at a younger age could be assessed to see if it requires the same minimal allocation of time and resources.

Fifth, this intervention was done as a brief implementation of PPI over a one-month period. Research can assess lasting changes in desired results of improved optimism, social connectedness, happiness and overall well-being at a three month follow up or six month follow up. This would greatly supplement the existing data to determine how long do these positive changes last and what if anything can be done to promote the sustained increase well-being.

Finally, future research can explore the effects the Acts of Kindness intervention has on relationships specifically on the family system and peer relationships. Research can explore whether all young adolescents (up to age 15) choose family to perform acts of kindness for and whether cultural and ethnic differences would affect those choices. What impact do acts of kindness have on the family system. For example, do families notice any behavioral changes in their children, and does one family member's acts of kindness inspire other family members to participate? Another question might explore what happens when adolescents do not have family members to perform acts of kindness for. Do they find other options and if they do, where do they turn? Also, further exploration into older adolescents' (16 and older) preference for performing acts of kindness for peers can help determine if that is the same in other populations and what effect it has on social relationships and school climate. Future research can look at how specific acts of kindness impact the social relationships of the student and how differences in gender, culture and ethnicity would play a role.

Conclusion

Adolescent mental health is a rising concern that affects not only the school system but society as a whole. As adolescents spend a substantial amount of time within school, school mental health care providers are in a position that both demands and allows for them to be conduits of positive change. Although many schools are faced with economic constraints and limited resources, the simplicity of this research design allows for implementation of an evidence-based interventions that can succeed in improving adolescent well-being without taxing school resources. The heart of positive psychology interventions is changing the perspective from what is wrong with teens – addiction, anxiety, depression, bullying etc. to what is right and looking for ways to build upon strengths to create positive change and build resilience. Positive

Psychology interventions allow adolescents the opportunity to gain tools and learn skills they can inculcate into their daily routine and practice for the rest of their lives. This study shows that the implementation of a single attribute of positive psychology interventions, Acts of Kindness, yields incredible positive outcomes for students. One act of kindness a day has the power to transform adolescent well-being creating lasting change.

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Plan for Completion of the Dissertation

	Sept	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	June	July	August
	'21	'21	'21	'21	'22							
Writing												
Study												
Problem												
Writing												
Literature												
Review												
Writing												
Methods												
Writing												
Limitations												
&												
Contributions												
Proposal												
defense												
IRB												
Sampling												
Intervention												
Data												
Collection												
Data Analysis												
Writing												
Results												
Writing												
Conclusion												
Dissertation												
Editing												
Dissertation												
Defense												

Appendix A: Request for Permission to Conduct Research in Schools



To whom it may concern,

My name is Hannah Phillip, and I am a doctoral candidate at Yeshiva University, Wurzweiler School of Social Work. I am inviting your school to participate in a research study called, **Positive Psychology Interventions within Schools: Implications for Adolescent Mental Health**.

The purpose of this study is to learn more about how implementation of PPI (positive psychology interventions) within schools can positively impact student well-being. Students will be asked to complete a short survey called the EPOCH Measure of Adolescent Well-being. Then will be given a PPI worksheet to complete in which they will record Acts of Kindness over a month-long period after which they will be given the same survey to complete again. The survey should take approximately five minutes to complete. All information will be kept anonymous and confidential. There are no inherent risks in participating in this study and students who do not wish to participate may withdraw at any time.

The benefit of this research is that you will be helping researchers to understand Positive Psychology and how we can use positive psychology interventions in a school setting to improve adolescent well-being. The proposed intervention provides concrete methods of approaching adolescent mental health in a proactive manner through giving students the skills to improve their own well-being. Results can therefore have tremendous impact for students as schools will have the ability to implement a highly transformative research-based intervention program with limited resources and budget.

Thank you so much for your consideration! Should you have any questions, please feel free to contact the researcher Hannah Phillip at: cphilli2@mail.yu.edu. Dr. Joan Rosenberg will serve as the principal investigator on this study and can be reached at joan.rosenberg@yu.edu.

Sincerely, Hannah Phillip Yeshiva University

Appendix B: Introductory Presentation of Research Study for Students

Hi,

My name is Hannah Phillip and I am here to talk to you about an exciting research study that I am conducting through Yeshiva University. The title of the research study is, *The Application of Positive Psychology Interventions within Schools: Implications for Adolescent Mental Health.*The research is studying the science of happiness specifically when it comes to adolescents -Is there a scientific way that we can improve levels of happiness in teenagers??

This research study posits the idea that by implementing daily acts of kindness into your lives you will not only be obviously helping others, but you will actually be improving your own levels of happiness as well.

Participation is simple, you will each be given a quick scale to rate your level of happiness then you will be given a worksheet to record 20 acts of kindness. At the end of the month, you will hand in the worksheet and complete the scale again.

Research has shown that acts of kindness has a tremendous impact; it fosters sensitivity as it enables you to look out outward to see what others need, it allows you to use your unique talents to help others thus building upon your strengths – through visiting an old age home, making a soup for a neighbor or helping a friend study for finals...the possibilities are endless and finally it creates greater social connectedness helping build better friendships, family bonds and sense of community. Obviously, the greater quality the acts of kindness you perform the better the results....so use your strengths do what your good at!

Participation is voluntary and all names will be removed using a coding system so that your information remains anonymous. Anyone who brings back the worksheet will be given a raffle ticket for the chance to win \$100.

Appendix C: Informed Consent

IRB APPROVED May 26, 2022

INFORMED CONSENT

TITLE: Application of Positive Psychology Interventions within the School

System: Implications for Adolescent Mental Health

PROTOCOL NO.: 0000

IRB Protocol #20222782

SPONSOR: Yeshiva University

INVESTIGATOR: Joan Rosenberg, PhD

2495 Amsterdam Ave

New York, New York 10033

United States

STUDY-RELATED

PHONE NUMBER(S): 845-709-8141

My name is Hannah Phillip, and I am a doctoral candidate at Yeshiva University, Wurzweiler School of Social Work. I am inviting you to participate in a research study called, Positive Psychology Interventions within Schools: Implications for Adolescent Mental Health. Involvement in the study is voluntary, so you may choose to participate or not.

The purpose of this study is to learn more about how implementation of PPI (positive psychology interventions) within schools can positively impact student well-being. You will be asked to complete a short survey called the EPOCH Measure of Adolescent Well-being. Then you will be given a PPI worksheet to complete in which you will record Acts of Kindness over a month-long period after which you will be given the same survey to complete again. The survey should take approximately five minutes to complete. All information will be kept anonymous and confidential. This means that your name will not appear anywhere, and I will not even know about your specific answers. In any articles I write or any presentations that I make, I will not use any information that can be used to identify you as a participant.

The benefit of this research is that you will be helping researchers to understand Positive Psychology and how we can use positive psychology interventions in a school setting to improve adolescent well-being. There are no inherent risks in participating in this study. Participation in this study is voluntary. If at any time you do not wish to participate in this study, or if you want to withdraw from this study at any time, there will be no penalty or loss of benefits to which you are otherwise entitled.

Should you have any questions, concerns or complaints about the study please feel free to contact the researcher Hannah Phillip at: cphilli2@mail.yu.edu. Dr. Joan Rosenberg will serve as the principal investigator on this study and can be reached at joan.rosenberg@yu.edu or 845-709-8141.

IRB APPROVED May 26, 2022

This research is being overseen by WCG IRB. An IRB is a group of people who perform independent review of research studies. You may talk to them at 855-818-2289 or researchquestions@wcgirb.com if:

- You have questions, concerns, or complaints that are not being answered by the research team.
- o You are not getting answers from the research team.
- o You cannot reach the research team.
- You want to talk to someone else about the research.
- You have questions about your rights as a research subject.

I choose, voluntarily, to participate in this research project. I certify that I am at least 18 years of age.

print name of participant	signature of participant	date
 of the child is so limi If assent is obtained, form 	ired to assent, unless the investigator deter ted that the child cannot reasonably be con have the person obtaining assent documen	nsulted nt assent on the consent
subject has agreed to OR	le to assent because the capability of the st	
Signature o	of person obtaining assent	Date
Your signature documents your research.	our permission for the individual named b	elow to take part in this
Signature of child subject's p individual authorized under s	parent or state or local law to consent to the child su	Date object's participation
⇒ Student Printe	d name of subject	Date

Sincerely, Hannah Phillip

Appendix D: EPOCH Measure of Adolescent Well-being

This is a survey about you! Please read each of the following statements. Circle how much each statement describes you. Please be honest - there are no right or wrong answers!

When something good happens to me, I have people who I like to share the good news with.	Almost never	Sometimes	Often	Very Often	Almost Always
I finish whatever I begin.	Almost never	Sometimes	Often	Very Often	Almost Always
I am optimistic about my future	Almost never	Sometimes	Often	Very Often	Almost Always
l feel happy.	Almost never	Sometimes	Often	Very Often	Almost Always
When I do an activity, I enjoy it so much that I lose track of time.	Almost never	Sometimes	Often	Very Often	Almost Always
I have a lot of fun.	Almost never	Sometimes	Often	Very Often	Almost Always
get completely absorbed in what I am doing.	Almost never	Sometimes	Often	Very Often	Almost Always
l love life.	Almost never	Sometimes	Often	Very Often	Almost Always
I keep at my schoolwork until I am done with it.	Almost never	Sometimes	Often	Very Often	Almost Always
When I have a problem, I have someone who will be there for me.	Almost never	Sometimes	Often	Very	Almost Always
I get so involved in activities that I forget about everything else.	Almost never	Sometimes	Often	Very Often	Almost Always
When I am learning something new, I lose track of how much time has passed.	Not at all like me	A little like me	Somewhat like me	Mostly like me	Very much like me
In uncertain times, I expect the best.	Not at all like me	A little like me	Somewhat like me	Mostly like me	Very much like me
There are people in my life who really care about me.	Not at all like me	A little like me	Somewhat like me	Mostly like me	Very much like me
I think good things are going to happen to me.	Not at all like me	A little like me	Somewhat like me	Mostly like me	Very much like me
I have friends that I really care about.	Not at all like me	A little like me	Somewhat like me	Mostly like me	Very much like me
Once I make a plan to get something done, I stick to it.	Not at all like me	A little like me	Somewhat like me	Mostly like me	Very much like me
l believe that things will work out, no matter how difficult they seem.	Not at all like me	A little like me	Somewhat like me	Mostly like me	Very much like me
I am a hard worker.	Not at all like me	A little like me	Somewhat like me	Mostly like me	Very much like me
I am a cheerful person.	Not at all	A little like	Somewhat	Mostly	Very much

Thank you!

Appendix E: EPOCH Measure of Adolescent Well-being Scoring Manual

Scoring EPOCH

Item	Question
C1	When something good happens to me, I have people who I like to share the good news with.
P1	I finish whatever I begin.
01	I am optimistic about my future
H1	I feel happy.
E1	When I do an activity, I enjoy it so much that I lose track of time.
H2	I have a lot of fun.
E2	I get completely absorbed in what I am doing.
H3	I love life.
P2	I keep at my schoolwork until I am done with it.
C2	When I have a problem, I have someone who will be there for me.
E3	I get so involved in activities that I forget about everything else.
E4	When I am learning something new, I lose track of how much time has passed.
02	In uncertain times, I expect the best.
C3	There are people in my life who really care about me.
03	I think good things are going to happen to me.
C4	I have friends that I really care about.
P3	Once I make a plan to get something done, I stick to it.
04	I believe that things will work out, no matter how difficult they seem.
P4	I am a hard worker.
H4	I am a cheerful person.

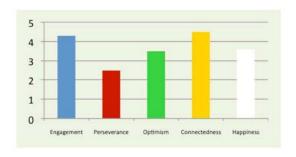
Across domains, each item is scored on a 1 to 5 scale (almost never/ not at all like me = 1; almost always/ very much like me = 5). Scores are computed for each domain as the average of the four items, and results can be presented as a profile across domains (see sample image below). That is:

Engagement = mean(E1,E2,E3,E4). Perseverance = mean(P1,P2,P3,P4) Optimism = mean(O1,O2,O3,O4) Connectedness = mean(C1,C2,C3,C4)

Happiness = mean(H1,H2,H3,H4)

Sample Scoring Presentation

We are working on the best way to display scores. To date, we have used bar graphs:



Appendix F: Acts of Kindness Record

The Power of Kindness

Worksheet: Efficacy of implementation of daily acts of kindness in improving well-being

Name: _____ Sex: ___ Age: ___ Grade: ___ Date: ____

Instructions: Please complete 5 acts of kindness weekly for a total of 20 acts in a period of 1 month.

	Act of Kindness	To whom	Length of time	Rating 1-10 (1 bad 10 excellent) How did it make you feel?
Act 1				,
Act 2				
Act 3				
Act 4				
Act 5				
Act 6				
Act 7				
Act 8				
Act 9				
Act 10				
Act 11				
Act 12				
Act 13				
Act 14				
Act 15				
Act 16				
Act 17				
Act 18				
Act 19				
Act 20				

Appendix G: Program Evaluation for School Personnel

Please choose your answer based on the degree to which you agree with the following statements.

	Strongly Disagree	Disagree	Neutral	Agree	Strongly Agree
1) The Acts of Kindness intervention required minimal time and effort.	1	2	3	4	5
2) The Acts of Kindness intervention required minimal allocation of school funding	1	2	3	4	5
3) The students had an easy time understanding and completing the worksheet	1	2	3	4	5
4) The students were interested and motivated to complete the intervention	1	2	3	4	5
5) The intervention appeared to foster positivity amongst the students	1	2	3	4	5
6) The intervention appeared to foster greater social connectedness amongst the students	1	2	3	4	5
7) The intervention had a positive impact on individual student well-being.	1	2	3	4	5
8) I would feel comfortable presenting an acts of kindness module within one of my lesson plans.	1	2	3	4	5
9) I would recommend this intervention as appropriate for all students.	1	2	3	4	5
10) I would recommend implementation of the Acts of Kindness as a positive way to improve adolescent mental health within a school setting.	1	2	3	4	5