

PEDAGOGICS

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Perceived Conflicts of Interest for Noel Castillo: This work is based on my doctoral dissertation while at Nova Southeastern University. My wife is the owner of T&D Youth Center.

Measuring the Social and Emotional Skills of Hispanic American Students in an Afterschool Karate Program

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Abstract

Background. The social and emotional learning skills of children play an important role in their development. These skills include persistence, self-control, and social competence. The lack of these skills can often be a predictor of future criminality and antisocial behavior. Aggressiveness in youth plays a key role in violence among juveniles.

Problem and aim. The purpose of this quasi-experimental, one-group, pre-test/post-test design study, was twofold. First, it examined the effects of traditional martial arts training on the social and emotional learning skills of persistence, self-control and social competence of students within a structured afterschool setting. Secondly, it investigated the effects of the same training on the ability to resolve problems with peers without becoming aggressive.

Materials and methods. The research subjects consist of 57 predominantly Hispanic students (ages 5-11) enrolled in an afterschool program at Tiger and Dragon Youth Center, throughout the 2018-19 academic school year. This program is in Miami-Dade County and teaches the traditional martial art of Kenpo Karate. The instrument used was the Child Trends Socio-Emotional Teacher's Survey. Results. Due to the means of the two tests (pre and post-test) and the direction of the *t*-value, we can conclude that there was a statistically significant improvement in all three testing categories (i.e., persistence, self-control and social competence) and a statistically significant improvement in the “resolved problems with peers without becoming aggressive” test scores.

Conclusion. Martial arts instruction serving as the cornerstone of an afterschool program, may prove to be an effective treatment approach going forward.

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Noel A. Castillo has worked in the law enforcement/correctional field for the past twenty-seven years. Noel has a PhD in Criminal Justice from Nova Southeastern University. He has participated in research regarding body worn cameras [Petersen *et al.* 2021]. He is a certified instructor/holds instructor rank in Police Defensive Tactics, Kenpo Karate and the art of Shootfighting.

Petersen, K., Mouro, A., Papy, D., Castillo, N., Ariel, B. (2021), *Seeing is believing: the impact of body-worn cameras on court outcomes, a cluster-randomized controlled trial in Miami Beach*, "Journal of Experimental Criminology", pp. 1-21.

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Alex Edmonds received his Ph.D. in Educational Psychology with a minor in Statistics and Measurement from Florida State University. He has published extensively in a variety of areas such as psychophysiology and educational psychology. He has authored several books on research design and authored numerous chapters on performance-related measurement applications. He teaches an array of research courses including design and mixed methodologies. His primary interest revolves around researching performance in simulated environments and applying unique methodological and statistical techniques as a means to exploring the relationship between emotions and performance in a variety of domains. Alex is a certified biofeedback practitioner and also regularly a volunteer coach of youth basketball and football.

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Authorship Statement:

I am an author on this submission, have adhered to all editorial policies for submission as described in your requirements, attest to having met all authorship criteria, and disclosed all potential conflicts of interest for inclusion on this manuscript.

Introduction*Nature of the Research Problem*

The social and emotional learning (SEL) skills of children play a key role in their healthy development [Scarupa 2014]. These SEL skills include persistence, self-control, and social competence. Kennedy, Burnett and Edmonds [2011] showed that deficiencies in these

skills can often be a predictor of future criminality and antisocial behavior. In several parts of the country, there is an absence of proven prosocial activities for violent juvenile offenders [Elrod, Ryder 2020].

A deficiency in the area of social competency can be exhibited in the form of aggressiveness. Church, Springer and Roberts [2014] noted that aggressive behavior tends to be associated with risk for delinquency. Of concern is

aggressive behavior exhibited in early childhood that ultimately increases the risk of violent crime [Brame *et al.* 2001; Church *et al.* 2014; Moffitt 1993; Moffitt, Caspi 2001; Tremblay *et al.* 1994]. These findings are relevant because it has been shown that several factors, including victimization, correlate with higher rates of delinquency and aggression for juveniles [Church *et al.*, 2014]. Duncan and Magnuson [2011] maintained that longitudinal studies [e.g., Leschied *et al.* 2008] have found that adult criminal offenders were much more likely to have been aggressive as young children than their non-offending adult counterparts.

Aggressiveness in juveniles and violent crime are often associated with each other. One of the major challenges to the current juvenile justice system involves violent crimes committed by juvenile offenders [Church *et al.* 2014]. From 1989-1994 violent juvenile offenses increased by 48% [Elrod, Ryder 2020]. Juvenile arrests for violent crimes declined from 1995-2004, but since then have fluctuated [Elrod, Ryder 2020].

What is known today is that violent crimes committed by juveniles are not as prevalent as other offenses they commit, such as status offenses and non-property crimes [Church *et al.* 2014]. In fact, juvenile crime is on the decline. Church *et al.* [2014] asserted that recent trends in juvenile delinquency indicated a consistent drop in the number of juvenile arrests (with a lone slight spike upwards in 2006). Puzzanchera and Hockenberry [2021] echoed similar findings, reporting that 2019 delinquency caseloads for property, drug, and public order offenses were at their lowest levels, not seen since 2005. Buchanan *et al.* [2020] recently suggested that COVID-19 related restrictions (e.g., reduced contact with peers, increased supervision from caregivers at home) have led to a decline in rates of delinquency during the pandemic. Dazio *et al.* [2020] reported that drops in crime both nationally and worldwide, may have been affected by COVID-19 related restrictions.

Despite an overall reduction of juvenile crime (including violent crime), violent crimes committed by juveniles are worthy of research due to their effects on minorities and as a predictor of future criminality. Minorities are still disproportionately affected by juvenile violent crime [Durant *et al.* 1994; Church *et al.* 2014; Akers *et al.* 2017]. Different forms of violence that are unreported (to include fighting, group fighting, and attacks with the intent to harm) also disproportionately affect minorities [Salas-Wright *et al.* 2017]. Despite the lower violent crime rates, adolescents still have the highest age-adjusted rates of violent victimization [Farrington 1989; MacDonald *et al.* 2013; Thornberry, Krohn 2000]. Committing serious delinquent or criminal acts at an early age is one of the strongest predictors of a future chronic violent offender [Piquero *et al.* 2012]. Li, Nussbaum, and Richards [2007] found that exposure to violence among African American youth was a prominent and predictive risk factor of delinquent behavior.

Hein *et al.* [2017] commented that a proportionally small group of violent adolescent offenders accounted for a large number of violent crimes. These reasons are enough to warrant a closer examination of juvenile violent crime and the offering of a possible solution.

Background and Purpose

There have been several approaches related to SEL skills training and reducing aggressiveness in children. These include counseling, psychotherapy, behavioral, cognitive, and cognitive-behavioral treatments [Beelman, Losel 2006]. Mathys and Born [2009] noted that the treatment of juvenile delinquents was generally performed in group settings. The current study focused on the test subjects' SEL skills of persistence, self-control, and social competence within a group setting. Central to these factors was the use of karate.

Martial arts have also been used as an intervention for SEL skills training. Kusnierz [2011] and Tadesse [2015, 2017], noted that martial arts practices have often been credited with reinforcing positive values such as self-respect, respect to others, and most notably, self-discipline. Lakes and Hoyt [2004] noted significant improvement in the areas of cognitive self-regulation, affective self-regulation, prosocial behavior and classroom conduct for the Tae Kwon Do students they studied.

Folino *et al.* [2014] reported that general exercise had been found to have a positive temporal effect on disruptive behavior exhibited by youth. Zivin *et al.* [2001] claimed that martial arts served as an effective approach to violence prevention. Others focused on the relationship between martial arts and anger management [Lotfian *et al.* 2011; Ziaee *et al.* 2012].

Vertonghen and Theeboom [2010] highlighted trends in martial arts research that guided this study, to include groups of participants and methodologies. Since the 1970's researchers have focused on the outcomes of martial arts practice [Vertonghen, Theeboom 2010]. Whereas most of the earlier studies primarily focused on the influence of martial arts practice on a variety of practitioners' personality traits, recent studies have focused on the relationship between martial artists and aggression. A host of studies have shown how martial arts training helped to reduce aggressiveness [Diamond, Lee 2011; Nosanchuk, MacNeil 1989; Reynes, Lorant 2004; Steyn, Roux 2009; Twemlow *et al.* 2008; Vertonghen, Theeboom 2014; Woodward 2009].

Since the 1990's, most martial arts related studies have focused on youth rather than adults [Vertonghen, Theeboom 2010]. Longitudinal studies have been replacing cross-sectional designs in martial arts-related research [Vertonghen, Theeboom 2010]. Studies within the last five years have looked at martial arts in relation to mindfulness, psychotherapy, executive functioning in children with autism disorders and effects on mental and psychosocial health [Bird *et al.* 2019; Moore *et al.* 2019;

Milligan *et al.* 2017; Phung, Goldberg 2019]. The current study reflects these trends in martial arts research.

The participants of this study were taught the traditional martial art of Kenpo Karate. It is considered a traditional martial art because it emphasizes the elements of philosophy, restraint, self-defense, uniforms, belt systems, control, and especially the use of katas [Nosanchuk, MacNeil 1989]. Castillo [2018] confirmed these elements were present in the Kenpo Karate instruction of the participants, particularly the use of kata. The use of kata is important in the teaching and learning of various forms of karate [Cynarski *et al.* 2017]. Several researchers highlighted the positive aspects of kata, particularly when it comes to social emotional skills [Reynes, Lorant 2004; Doria *et al.* 2009; Dodd, Brown 2016; Kindzer *et al.* 2018]. Movahedi *et al.* [2013] found that kata techniques training significantly improved social dysfunction in students with Autism Spectrum Disorders.

The purpose of this quasi-experimental, one-group, pretest–posttest design study, was twofold. First, we examined the effects of traditional martial arts training on the social and emotional learning skills of persistence, self-control and social competence of students. Secondly, we investigated the effects of traditional martial arts training on participants' ability to resolve problems with peers without becoming aggressive. The following research questions further guided the examination:

Does traditional Kenpo Karate training have a significant effect on the SEL skills of persistence, self-control and social competence in elementary school-aged participants, over a ten-month period (Aug.-May)?

Does traditional Kenpo Karate training have a significant effect on the ability to resolve problems with peers without becoming aggressive in elementary school-aged participants, over a ten-month period (Aug.-May)?

Materials and Methods

Participants

The research participants consisted of 57 predominantly Hispanic students (ages 5-11) enrolled in an afterschool program, Tiger and Dragon Youth Center (T&D) throughout the 2018-19 academic school year. This study used single-stage sampling (Researchers had access to the people in the population and they were sampled directly), since T&D had already given consent to share this data (without sharing the children's personal identifiers).

The nonprobability sampling technique used in the evaluation was purposive sampling, since the students met the needs of this evaluation's objective, design, and target population. Shneerson and Gale [2015] noted that in purposive sampling the issue of relevancy was more important than randomization. The sampling technique could be further specified as criterion sampling,

since the participants met a specific criterion (students enrolled in an afterschool program that offers traditional martial arts).

Instruments

As part of the contractual agreement (grant funding) between T&D and their funding sources, T&D is required to administer a host of tests, to include SEL skills testing. Parents enrolling their children in T&D's afterschool program gave consent to this testing, thus ensuring ethical protections of the research subjects.

The instrument used was a Child Trends Socio-Emotional Teacher's Survey. It was created from a partnership between the Tauck Family Foundation and Child Trends, a national leader in measuring children's development and well-being [Scarupa 2014]. The survey was created using a plethora of evidence-based source material [Bierman, Coie *et al.* 2004; Butler-Barnes *et al.* 2013; Chamberlain 1980; CPPRG 1995; Dahlberg *et al.* 2005; Greenberg *et al.* 1994; Hoover-Dempsey, Sandler 2005; Kendall, Wilcox 1979; McConnell *et al.* 1984; Midgely *et al.* 1998; Nicholls *et al.* 1989; Rorhbeck *et al.* 1991; Martin 1998].

The survey is used to measure and quantify self-control, responsibility, attentiveness, prosocial behavior, and mastery orientation in children. It categorically breaks down the SEL skills into the areas of persistence, self-control, and social competence. According to Scarupa [2014], there are two versions of this survey: namely, a student survey and a teacher's survey. This study used the teacher's survey. The teacher's survey contains several questions related to social competence including: worked well with peers, resolved problems with peers without becoming aggressive, was thoughtful of the feelings of his/her peers, cooperated with peers without prompting, understood the feelings of his/her own peers and resolved problems with peers on his/her own. One rater was used for the survey.

Data Analysis

The dependent *t*-test is the most appropriate parametric statistical test to use for this comparative analysis because it is used to compare the means between two related groups on the same continuous, dependent variable. The dependent variable in this study is the SEL testing scores for the areas of persistence, self-control, social competence and ability to resolve problems with peers without becoming aggressive.

This study compared the mean responses from pretest to post-test. Descriptive statistics were reported. Then the magnitude of the difference in means between the scores (e.g., small, medium, large) was assessed. If statistical significance was found, an effect size calculation was conducted to test for practical significance.

Results

Demographic Characteristics

All but one of the fifty-seven research participants were Hispanic (one White Non-Hispanic student). Forty of the students lived in poverty, as defined by U.S. federal guidelines [USDHHS 2020]. Four students were female, and the rest were males. Participants were enrolled in T&D's afterschool program throughout the 2018-19 academic school year and were enrolled in grades kindergarten – fifth grade at their local schools as noted in Table 1.

Table 1. Distribution of students by grade level.

GRADE LEVEL	# OF STUDENTS
Kindergarten	10
First Grade	8
Second Grade	14
Third Grade	11
Fourth Grade	8
Fifth Grade	6

A review of the student's files did not reveal any students who had documented aggressiveness issues prior to the start of the study. A review of the student's Individualized Education Programs (IEP) revealed eleven students with pre-existing SEL skill issues/disabilities.

Table 2. Students with pre-existing SEL skill issues/disabilities.

SEL Skill Issue/Disability	# OF STUDENTS
ADHD	5
Anxiety/Depression	1
Autism	1
Intellectual Disability	1
Learning Disability	3

All the students completed the SEL skills pre-test and post-test. Most of the students completed the entire ten-month program. Others either started the program after August and/or withdrew from the program before May.

Table 3. Distribution of students by completed program time.

Completed Program Time (months)	# OF STUDENTS
10 Months	35
8 Months	1
7 Months	1
6 Months	6
5 Months	2
4 Months	2
3 Months	9
2 Months	1

Our primary goal was to observe if test scores improved, worsened, or stayed the same for students from pre-test to post-test. Data analysis was facilitated by conducting a dependent *t*-test for the SEL categories of persistence, self-control and social competence. A second

dependent *t*-test was conducted on test scores indicative of the ability to resolve problems with peers without becoming aggressive. The dependent variable in this study was the SEL testing scores for the areas of persistence, self-control, social competence, and ability to resolve problems with peers without becoming aggressive. The independent variable was the Kenpo Karate training.

Does traditional Kenpo Karate training have a significant effect on the SEL skills of persistence, self-control, and social competence in elementary school-aged participants, over a ten-month period (Aug.-May)? This was the first research question. Due to the means of the two tests (pre and post-test) and the direction of the *t*-value, we can conclude that there was a statistically significant improvement in all three testing categories (i.e. persistence, self-control and social competence) following the Kenpo Karate training.

In the area of persistence, the results were as follows: $t(56) = -8.267, p < 0.0001$. Due to the means of the two tests and the direction of the *t*-value, we can conclude that there was a statistically significant improvement in test scores following the Kenpo Karate training from 2.6895 to 3.3607 ($p < 0.0001$); an improvement of 0.67. The Cohen's $d = -1.09502757$, which is a large effect size (i.e., more than 0.8).

Table 4. Descriptive Statistics.

Test	<i>n</i>	Min.	Max.	<i>M</i>	<i>SEM</i>	<i>SD</i>
Persistence Pretest	57	1.00	4.00	2.6895	.07515	.56736
Persistence Post Test	57	2.33	4.00	3.3607	.07441	.56178
Self-Control Pretest	57	1.00	4.00	2.7647	.06527	.49278
Self-Control Post Test	57	2.33	4.00	3.5533	.05928	.44756
Social Competence Pretest	57	1.66	4.00	2.9114	.05452	.41160
Social Competence Post Test	57	3.00	4.00	3.9174	.02715	.20494

In the area of self-control, the results were as follows: $t(56) = -11.915, p < 0.0001$. Due to the means of the two tests and the direction of the *t*-value, we can conclude that there was a statistically significant improvement in test scores following the Kenpo Karate training from 2.7647 to 3.5533 ($p < 0.0001$); an improvement of 0.78. The Cohen's $d = -1.57821005$, which is a large effect size (i.e., more than 0.8).

In the area of social competence, the results were as follows: $t(56) = -22.8353, p < 0.0001$. Due to the means of the two tests and the direction of the *t*-value, we can conclude that there was a statistically significant improvement in test scores following the Kenpo Karate training from 2.9114 to 3.9174 ($p < 0.0001$); an improvement of

1.00. The Cohen's $d = -3.02453397$, which is a large effect size (i.e., more than 0.8).

Research Question 2

Does traditional Kenpo Karate training have a significant effect on the ability to resolve problems with peers without becoming aggressive in elementary school-aged participants, over ten months (Aug.-May)? The results were as follows: $t(56) = -15.783$, $p < 0.0001$. Due to the means of the two tests and the direction of the t -value, we can conclude that there was a statistically significant improvement in the resolved problems with peers without becoming aggressive test scores, following the Kenpo Karate training from 2.8772 to 3.8421 ($p < 0.0001$); an improvement of 0.96. The Cohen's $d = -2.09058607$, which is a large effect size (i.e., more than 0.8).

Table 5. Measured improvement and Cohen's d .

SEL Category	Measure of Improvement	Cohen's d
Persistence	.67	-1.09502757.
Self-control	.78	-1.57821005
Social Competence	1.00	-3.02453397
Resolved Problems with Peers Without Becoming Aggressive	.96	-2.09058607

Discussion

All the SEL skills that were measured (i.e., persistence, self-control and social competence) and the solved problems with peers without becoming aggressive scores, showed marked improvement from pre- to post-test. The social competence scores showed the most improvement, while persistence the least. All the Cohen's d results showed a large effect size. Together this suggests that traditional Kenpo Karate training has a significant practical effect on the SEL skills of persistence, self-control, and social competence, and on participant's abilities in the area of resolution of problems with peers without becoming aggressive.

Interpretation of Findings

The findings of this study suggest that traditional Kenpo Karate training had a significant effect on the SEL skills of persistence, self-control, social competence, and the ability to resolve problems with peers without becoming aggressive, of the research participants. One expected these results given the wide array of literature highlighting the benefits of traditional martial arts training. Both categories of social competence and ability to resolve problems with peers without becoming aggressive had the highest measures of improvement, 1.00 and .96 respectively. This was also expected, given that the ability to resolve problems with peers without

becoming aggressive question was extracted from the social competence category.

What was unexpected in the current study centers on the student's participation time in the program. Only 35 of the students completed the entire ten-month program. The remaining 22 students only completed a portion of the program and still showed improvement. This phenomenon is interesting and future research could explore this further.

Table 6. Time of Students who did not complete.

Program Time of Students Who Did Not Complete the Full 10 months	# OF STUDENTS
3 Months	9
6 Months	6
5 Months	2
4 Months	2
8 Months	1
7 Months	1
2 Months	1

It could be theorized that the student's overall participation time in the program (2-10 months) may have mattered less than the frequency of Kenpo Karate classes per week (five times a week). Despite the participants' varying months in the program, they participated in class five times a week. Several studies that have examined afterschool programs have stressed the importance of duration time and frequency [Evans *et al.* 2011; Gottfredson *et al.* 2004; Reisner *et al.* 2004]. Evans *et al.* [2011] recommended a year-round program as opposed to a semester's worth of intervention.

The karate training in this study followed many of the evidence-based principles associated with more traditional approaches to child social skills training, apart from the frequency of training. Karate training in this program was conducted in a group training format and was conducted by martial arts professionals. This study's results hint at the possible importance of the frequency of classes over the duration time in the program.

Implications of Findings

Researchers have argued that most juvenile crime occurs approximately between 2 pm and 6 pm [Newman *et al.* 2000; Gottfredson *et al.* 2004]. By attending T&D's program, participants were in supervised/organized activities during the 2 pm – 6 pm.

Even if the SEL skill scores had not improved, there were other possible values of this program. Participants were not unsupervised and/or out in the streets during the time when most juvenile crime is committed. Lauer *et al.* [2006] highlighted the lack of parental supervision and the high rate of teen crime that occurs after school as some of the societal concerns that have led to the growth of afterschool programs in the United States.

The SEL skills of self-control and social competence reflect manifestations of informal deterrence; namely, controlling emotions and behavior, inhibiting negative behavior, considering other's viewpoints, and behaving in accordance with situational and social norms. Regarding informal deterrence, Akers *et al.* [2017] noted that perceptions of informal sanctions (e.g. disapproval of friends, one's own conscience and moral commitments) do have deterrent effects. Studies have shown that the deterrent effects stemming from informal deterrence tend to be more effective than other deterrence models such as certainty of arrest or severity of penalties [Green 1989; Grasmick, Bursik 1990].

It appears that the SEL skill of persistence can play a positive or negative role in a child's healthy development, contingent upon the context of their behavior. Duncan and Magnuson [2011] argued that persistent antisocial behavior problems in an early education setting were predictive of later crime. On the other hand, Peterson and Seligman [2004] defined persistence in children as the "voluntary continuation of a goal-directed action in spite of obstacles, difficulties, or discouragement" [229]. Regarding martial arts, Vertonghen and Theeboom [2013] noted that differences existed in the characteristics and social background of martial artists depending on the type of martial art being practiced. Highlighting the complexity of this research, they cautioned future research into these, and other possible mediating factors should be considered when trying to determine social-psychological outcomes of martial arts. The current study demonstrated support for the complexity of this research and why further research is necessary.

Furthermore, the results of the current examination are in line with recent studies that have examined the social-psychological outcomes of martial arts [Bird *et al.* 2019; Moore *et al.* 2019; Milligan *et al.* 2017; Phung, Goldberg 2019].

Limitations of the Study

The generalizability of these findings could come into question, given that most martial arts instruction does not take place within a structured afterschool setting. None of the martial arts studies researched to date and cited in this study have taken place in an afterschool program. The Child Trends survey is currently used locally (Miami-Dade County) at several afterschool sites, though none of these sites was a predominantly martial arts themed afterschool program.

The internal validity threat of history can occur when events outside of the study, effect the study participants [Edmonds, Kennedy 2017]. During the examined time period (the 2018-19 academic school year), both Tropical Storm Gordon and Hurricane Michael came close to South Florida, in early September and October 2018 respectively [National Hurricane Center 2020]. The stress associated with these storms (e.g. watches, warnings, school closures) may have affected the initial SEL skill scores.

Maturation is another threat to validity and occurs as a result of a passage of time. SEL skills in this study's participants, may have improved simply because they were maturing in the proposed time period.

Regarding selection bias, the one group pre-test-posttest design used for this study had (a) no control group and (b) no random assignment. No control group could be created since the students participating in the youth center's program were expected to participate in the martial arts. In regard to the survey instrument, only one rater was used.

Conclusion

Only 35 of the 57 students completed the entire ten-month program. The remaining 22 students only completed a portion of the program and still showed improvement. A future qualitative study could take a closer look at these 22 students and analyze why they showed improvement despite not completing the entire program. One could also examine if modeling strategies, rehearsal strategies, frequency of feedback and types of feedback contributed to the improvement. Since the sample size is small, this prospective qualitative study could use in-depth interviews of the participants.

Several studies have analyzed the effects of afterschool programs with mixed results [Evans *et al.* 2011; Hanlon *et al.* 2009; Reisner *et al.* 2004; Ross *et al.* 1992]. Due in part to the findings of this study, subsequent studies could be conducted at other martial arts schools that have a structured afterschool program and larger enrollment size. This may increase the sample size and allow for different selection methods. One could also look for afterschool programs that offer martial arts as an optional activity. The students that participate in the martial arts classes can be the experimental group, while the students that do not can be the control group.

The participants of this study were predominantly minority children (Hispanic) who live in an area with higher poverty levels and lack of child services. The literature reviewed [Church *et al.* 2014; Akers *et al.* 2017] clearly identified poverty and lack of social services as critical risk factors in predicting juvenile violence. We noted there is a paucity of research regarding martial arts and youth violence related to Hispanic youth. Several studies have noted that a key component of martial arts films and practices, is its proven appeal to minorities; particularly African Americans [Bowman 2013, 2010; Brown 1997; Hunt 2003; Marchetti 2003].

Van der Stouwe *et al.* [2021] noted that, "Social skills training may be a too generic treatment approach to reduce juvenile delinquency, because dynamic risk factors for juvenile offending are only partially targeted in SST" [1]. Martial arts instruction serving as the cornerstone of an afterschool program, may prove to be an

effective treatment approach going forward. The unique aspect of the setting of this study (within a structured afterschool program) highlights this study's innovative look at martial arts training and its effects within this setting. The fusion of martial arts training in an afterschool setting may be a new way to treat the problem of youth violence. Future researchers could broaden our knowledge and help those most in need by continuing to research the martial arts and its potentially positive effects on our youth.

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Pomiar umiejętności społecznych i emocjonalnych uczniów pochodzenia latynoskiego w pozaszkolnym programie karate

Słowa kluczowe: Amerykanie pochodzenia latynoskiego, Kenpo Karate, tradycyjne sztuki walki, społeczne i emocjonalne umiejętności uczenia się, agresywność, program pozaszkolny

Streszczenie

Tło. Społeczne i emocjonalne umiejętności uczenia się dzieci odgrywają ważną rolę w ich rozwoju. Umiejętności te obejmują wytrwałość, samokontrolę i kompetencje społeczne. Brak tych umiejętności często może być predyktorem przyszłej przestępczości i zachowań antyspołecznych. Agresywność wśród młodzieży odgrywa kluczową rolę w przemocy wśród nieletnich.

Problem i cel. Cel tego quasi-eksperymentalnego, jednogrupowego badania typu *pre-test/post-test* był dwojaki. Po pierwsze, zbadano wpływ tradycyjnego treningu sztuk walki na społeczne i emocjonalne umiejętności uczenia się wytrwałości, samokontroli i kompetencji społecznych uczniów w zorganizowanym środowisku pozaszkolnym. Po drugie, zbadano wpływ tego samego treningu na umiejętność rozwiązywania problemów z rówieśnikami bez używania agresji.

Materiały i metody. Przedmiotem badań było 57 głównie latynoskich uczniów (w wieku 5-11 lat) zapisanych do programu pozaszkolnego w Tiger and Dragon Youth Center w roku szkolnym 2018-19. Program ten odbywa się w hrabstwie Miami-Dade i uczy tradycyjnej sztuki walki *Kenpo Karate*. Zastosowanym narzędziem była ankieta społeczno-emocjonalna dla nauczycieli *Child Trends*.

Wyniki. Ze względu na średnie z dwóch testów (*pre-test* i *post-test*) oraz kierunek wartości *t*, można stwierdzić, że nastąpiła statystycznie istotna poprawa we wszystkich trzech kategoriach testowych (tj. wytrwałość, samokontrola i kompetencje społeczne) oraz statystycznie istotna poprawa w rozwiązywaniu problemów z rówieśnikami bez stawiania się agresywnym. Wnioski. Pomiar umiejętności społecznych i emocjonalnych uczniów pochodzenia latynoskiego w pozaszkolnym programie karate może okazać się skutecznym podejściem terapeutycznym w przyszłości.