Walden Dissertations and Doctoral Studies

2018

After-School Mentorship Program and Self-Efficacy Beliefs in Middle-School Students

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2018

Abstract

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by

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MA, Concordia University, 2012

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Dissertation Submitted in Partial Fulfillment

of the Requirements for the Degree of

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August 2018

Abstract

Middle-school students in Nova Scotia are perceived to have low self-efficacy for achieving learning outcomes. Strong self-efficacy beliefs developed through effective curricula have been linked to improved academic performance. However, there is a need for the formal evaluation of effective curricula that aim to improve self-efficacy. The purpose of this project study was to investigate a 10-week, after-school mentorship (ASM) curriculum that has never been evaluated. The outcomes of the curriculum design are to strengthen self-efficacy beliefs via relationship building exercises, public speaking training, and character education. Bandura's theory on self-efficacy, which states that treatment influences can alter the strength of self-efficacy, informed the conceptual framework. Evaluation questions explored apparent changes in the self-efficacy of the students from the perspective of 7 adult-caregivers and the program's instructor. Interview data were triangulated with quantitative descriptive statistics on the self-efficacy scores of 10 middle-grade students before and after program participation using the Children's Hope Scale. Comparison of the mean, median, and mode pre- and posttest scores did not show statistically significant differences in self-efficacy beliefs of the students. However, analysis of interview data revealed that children's self-efficacy beliefs grew, the largest increase being in those described as reserved at the beginning of the program. This study promotes positive social change through an increased understanding that can inform efforts to increase self-efficacy in middle-school students.

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Dedication

I dedicate this study to my husband Sergio Mark Thomas, who supported me

throughout my doctoral journey. Thanks to my adult-caregivers, Ashton Mark and Ingrid

Grant for being my number one cheerleaders all my life.

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Section 1: Introduction to the Study

Introduction

Self-efficacy determines whether students approach new challenges as a task to

master or as an undesirable undertaking to avoid (Lee, Lee, & Bong 2014). A strong

sense of self-efficacy prepares students to become fully functioning, self-assured

individuals. Bandura (1997) described self-efficacy as an individual's belief to achieve a

particular outcome. Bandura noted that self-efficacy can be enhanced through mastery

experience (enactive attainment), the modeling of tasks (vicarious experience), ongoing

feedback (verbal persuasion), and managing negative emotional stimulus (physiological

arousal). Students' self-efficacy is an important topic among educators seeking to

improve academic achievement levels because students' self-efficacy beliefs positively

relate to academic success (Hwang, Choi, Lee, Culver, & Hutchison, 2016; Ker, 2016;

Lucio, Hunt, & Bornovalova, 2012; Mann, 2013).

The Problem

A private after-school mentorship (ASM) program in eastern Canada claims to

provide an innovative curriculum for increasing self-efficacy beliefs in middle-school

students (James, personal communication, May 31, 2016). ASM provides students in

third through seventh grades with opportunities to develop a stronger sense of self-

efficacy (nondisclosed Canadian mentorship program, 2016). However, the problem is

that the ASM program has never been formally evaluated for its intended outcome of

raising self-efficacy beliefs in students. The ASM program aims to increase students'

belief to achieve personal goals (academic and nonacademic) via relationship building

exercises, public speaking training, and character education (nondisclosed Canadian mentorship program, 2016). This 10-week, privately owned program provides reformers, administrators, and teachers with a model curriculum for middle-school students intended to improve self-efficacy beliefs. My study addressed the problem of a need for the formal evaluation of programs that aim to improve self-efficacy beliefs.

Despite curriculum development designed to improve students' self-efficacy (Nova Scotia Education and Early Childhood Development, 2013) a recent survey of more than 19,000 educational stakeholders in Nova Scotia (Nova Scotia Education and Early Childhood Development, 2015) revealed that most middle-school students are still perceived to have low self-efficacy. Innovative programs such as ASM, which has an intended outcome of improving self-efficacy beliefs in middle-school students, should be evaluated to determine its success. Researchers such as Hushman and Marley (2015); Winnaar, Frempong, and Blignaut (2015); and Fernández-Díaz, Rodríguez-Mantilla, and Jover-Olmeda (2017) have called on educational policy makers to examine instructional curricula and programs designed to improve self-efficacy beliefs in students. Such recommendations indicate a current need to evaluate conventional instructional practice as well as innovative practices that may increase efficacy beliefs in middle-school students. Self-efficacy is important to educational reformers who evaluate curricular practice according to its success in raising achievement (Lee, Lee, & Bong 2014).

The formal evaluation of self-efficacy curricula is useful for examining achievement outcomes. For instance, Snipes et al. (2015) examined the outcome of a summer math program on eighth grade students' self-efficacy and achievement after 19

days. The authors randomly assigned a sample of 477 students across eight study sites to treatment (239) and control groups (238). The results of the pre-post treatment indicated students had higher self-efficacy and mathematics achievement scores. In addition, Mann (2013) evaluated a 2-week self-efficacy program designed to help struggling middle-school girls and found that the program yielded positive academic outcomes. Such evaluations provide information regarding whether programs are producing the intended outcomes.

A Grade 6 student who is unable to master assignments, during what Erikson (1968) described in his fourth stage of psychosocial development as industry versus inferiority, can experience an inferiority complex such as low self-efficacy beliefs in self-regulated learning, a barrier to academic achievement (Zuffianò et al. 2013). In instances where children are unable to achieve industry, a secure environment such as an after-school program can assist in meeting students' higher needs. Newell, Zientek, Tharp, Vogt, and Moreno (2015) found after-school programs valuable in supporting students' self-efficacy beliefs and developing social skills. After participating in a semester long after-school program, pretest-posttest results revealed a 24.6% improvement in 64 urban students' knowledge and attitude toward learning science in the United States. The findings suggested that future after-school programs focused on improving self-efficacy can have a positive influence on students' attitude toward learning and achievement. This outcome-based program evaluation determined ASMs success at improving self-efficacy beliefs in middle-school students. My study also addressed a current gap in practice,

namely, the evaluation of innovative programs that aim to improve self-efficacy in school children. In the next section, I assess the problem from a local context.

The Local Problem

By using a community approach, ASM claims to engage students in new experiences to increase self-efficacy beliefs through the development of leadership skills, individual interests, and talents (James, personal communication, May 31, 2016). This program was borne out of a perceived need seen by its designer who said, "Students are adults in the making and should be allowed to learn like adults do, through opportunities to experience the world outside the four walls of the classroom" (James, personal communication, May 31, 2016). Informal testimonials about ASM on the program's website provide anecdotal evidence of its success: "I am more confident in myself and no longer scared to speak in front of a million people. Thank you for everything" (Chloe, Grade 6, nondisclosed Canadian mentorship program, 2016). Another student said, "School is just sitting there learning, but [ASM] is . . . WOW" (Caitlynn, Grade 4, nondisclosed Canadian mentorship program, 2016).

A formal evaluation of this innovative program aimed at improving self-efficacy can help policy makers and school officials identify corrective measures to the problem of low self-efficacy and provide cues for curriculum improvement that will increase the value or worth of programs. Reynolds and Chiu (2013) explored informal learning environments, such as after-school programs, on middle-school students' attitude toward learning for a full school year. The findings suggested that programs designed to provide positive intrinsic motivation improve students' self-efficacy. In addition, Lindfors and

Hilmola (2016) conducted an outcome evaluation to determine whether the curriculum implemented in comprehensive schools (basic education) for children aged 7 to 16 years supported students' self-efficacy. The authors analyzed craft, design, and technology (CET) national test data collected from a stratified sample of 661 children in Grades 1 through 9 across 152 comprehensive schools using Kruskal-Wallis test and the Pearson χ^2 test. Results indicated that students' academic self-efficacy were fairly moderate. Both studies provide evidence of the need for more educational research into instructional designs intended to influence students' motivation to achieve particular outcomes. Evaluation research is useful for educational stakeholders seeking to implement targeted interventions at a micro or macro level. The outcome-based program evaluation sought to determine whether ASMs works to improve self-efficacy beliefs in middle-school students. In this study, I addressed a current gap in practice, namely, the need for the formal evaluation of innovative programs that aim to increase self-efficacy in students.

Rationale

Programs that aim to increase self-efficacy have relevance to future outcomes in children. Despite the existence of community-based self-efficacy school curricula (Minister's Panel on Education, 2014), a survey of more than 19,000 educational stakeholders, including teachers, students, and adult-caregivers, revealed that middle-schoolers still have low self-efficacy (Nova Scotia Education and Early Childhood Development, 2015). Researchers such as Winnaar et al. (2015) have called on educational policy makers to evaluate programs aimed at improving self-efficacy, as it affects students' attitudes toward how they approach future academic goals and

challenges. Lim (2015) agreed, recommending that more research into students' self-efficacy is necessary to broaden the understanding of its possible role in enhancing academic performance. A formal evaluation is a helpful tool for educational stakeholders, such as principals, teachers, and adult-caregivers, to understand the strengths and weakness of innovative self-efficacy curricula with the goal of improving policies and practices. The offsite, privately owned, ASM program was never formally evaluated for increasing self-efficacy beliefs in learners. The purpose of my study was to conduct an outcome-based evaluation of ASM for its role in motivating higher self-efficacy in students and to determine the program's strengths and weakness as perceived by stakeholders.

Definition of Terms

The terms that I used in this study are defined as follows:

Love language: Communicating with children in a manner that has personal meaning to them, which includes words of affirmation, acts of service, receiving gifts, quality time, and physical touch (Chapman & Campbell, 2016, p. 22-23).

Outcome-based evaluation: The assessment of the progress in the objectives a program seeks to achieve (Worthen, Sanders, & Fitzpatrick, 1996, p. 14).

Program evaluation report: A means of communicating the usefulness of the collection, analysis, and interpretation of the outcome-based evaluation findings. (Worthen, Sanders, & Fitzpatrick, 1996, p. 407).

Self-efficacy: An individual's belief to achieve a particular outcome, based on one's capabilities (Bandura, 1997, p. 36).

Thick description: Analysis that involves determining the social context and meaning individuals attach to activities, expressions and objects (Geertz, 1973, p. 9).

Significance of the Study

Self-efficacy curricula in middle-schools may support students' beliefs to achieve academic goals. The results of a survey of more than 19,000 educational stakeholders revealed that middle-school students in eastern Canada still have low self-efficacy (Nova Scotia Education and Early Childhood Development, 2015). One of the goals of the ASM program is to motivate students between the ages of 8 to 11 years to develop a stronger sense of self-efficacy so they can thrive and reach their fullest potential (nondisclosed Canadian mentorship program, 2016). However, this program has never been formally evaluated for its intended outcome of raising self-efficacy in middle schoolers. Hushman and Marley (2015) called for the evaluation of instructional curricula and programs designed to improve students' self-efficacy beliefs. With this study, I filled a gap in professional practice through a formal appraisal of ASM's curriculum, which aims to increase self-efficacy beliefs in learners. The evaluation of ASM contributes to positive social change by apprising middle-school reformers, administrators, and teachers of the possible structure of effective self-efficacy curricula. This outcome-based program evaluation determined whether ASM is successful at improving self-efficacy beliefs in middle-school students.

A formal evaluation verified whether ASM achieves one of its stated goals, and there are implications for student learning and achievement through the introduction of self-efficacy curriculum and instructional strategies that depart from conventional

practice. The outcome-based evaluation also revealed additional issues, not initially anticipated when developing ASMs objectives, providing critical information on potential aspects for program improvements that can yield positive social change. In this study, I also reported on the benefits and drawbacks of participation in the ASM program, as perceived by stakeholders including primary adult-caregivers and the program's lead teacher. Kamimura et al. (2016) agreed that such an approach would assist in identifying factors affecting the advantages and disadvantages of program participation for middle-schoolers. Such a comparison will assist the program's designer understand the perceived significance of the ASM in improving self-efficacy of middle-school children and determine whether the curricula design implemented achieves one of its stated goals. The outcome-based evaluation of ASM determined its role in motivating higher self-efficacy in students and identifies the program's strengths and weakness as perceived by stakeholders.

Research Questions

Low self-efficacy among middle-school students remains a meaningful topic in the educational discipline (Lee, Bong, & Kim, 2014; Lofgran, Smith, & Whiting, 2015; Madjar & Chohat 2016). Despite curriculum development designed to improve students' self-efficacy (Nova Scotia Education and Early Childhood Development, 2013), a survey of more than 19,000 educational stakeholders in Nova Scotia (Nova Scotia Education and Early Childhood Development, 2015) revealed that most middle-school students are still perceived to have low self-efficacy. Primary stakeholders, including policy makers and school officials, must work to provide a suitable curriculum for supporting self-efficacy

beliefs in children. One practical shortcoming, however, is the lack of formal evaluations of curricula that aim to improve self-efficacy. The evaluation of the ASM self-efficacy curriculum helped to determine its success in strengthening students' self-efficacy beliefs, along with the possible benefits and drawbacks of program participation.

For this outcome-based program evaluation, I collected and analyzed descriptive quantitative and qualitative data. Data sources included semistructured interviews with adult-caregivers and the program's designer, who is also the lead teacher. Qualitative interview data were triangulated with quantitative self-efficacy scores from student participants. The following evaluation questions guided the appraisal of the ASM program.

1. Quantitative: What are participants' mean, mode, and median self-efficacy scores before and after 10 weeks of participation in the ASM program using the Children's Hope Scale?

2. Qualitative Interview: From the perspective of the lead teacher what changes in students' self-efficacy, if any, are apparent?

3. Qualitative Interview: From the perspective of adult-caregivers what changes in children's self-efficacy, if any, are apparent?

Review of the Literature

My purpose in this section is to review this study's conceptual framework as it relates to self-efficacy and discuss the current literature on the broader problem, that is, the need to formally evaluate programs geared toward increasing self-efficacy beliefs in children. The conceptual framework started with a review of the foundational literature

on self-efficacy. I then discuss the connections among key elements of the conceptual

framework and framework's relation to the evaluation questions and data analysis. The

second part of the review continues with a critical review and analysis of the broader

problem relating to the evaluation of programs seeking to improve self-efficacy in

children and the importance of self-efficacy curricula. Self-efficacy is a meaningful topic

within the education discipline.

Conceptual Framework

Bandura's (2006) concept of self-efficacy formed the basis for this study's

conceptual framework. This theory was useful for understanding the importance of self-

efficacy in students who aim to achieve high goals. The review begins with the

connections among key elements of the conceptual framework and its relationship to this

study's evaluation questions and data analysis.

Self-efficacy has its roots in Bandura's (2006) social cognitive theory.

Educational psychologist and social learning theorist Bandura (2006) defined *self-*

efficacy as a "judgment of capability" to execute given tasks (p. 309). Self-efficacy is

more than the feel-good self-confidence in one's value or worth. Perceived self-efficacy

relates to an individual's belief to achieve a particular outcome, based on one's abilities.

Self-efficacy determines how well students handle challenging tasks and how much effort

they expend to achieve set goals.

Bandura's concept of self-efficacy is based on the behaviorist model of stimulus

response. Bandura (1997) argued that treatment influences can alter the strength of self-

efficacy. Adults can help strengthen students' self-efficacy through enactive attainment

derived from past mastery experience, vicarious experience gained through the

modeling of tasks, verbal persuasion or ongoing feedback, and physiological arousal

through the management of negative emotional stimulus.

Self-efficacy influences must be meaningful and come from a setting that

stimulates targeted reactions and emotions. Based on such interactions, students learn

how to respond to activities, encourage themselves, and act. For instance, after analyzing

585 student questionnaire responses, Ross, Perkins, and Bodey (2016) concluded that

self-efficacy beliefs guided desires as well as the strategies individuals would use to

achieve particular outcomes. Additionally, the authors found that both intrinsic and

extrinsic motivation influences students' self-efficacy beliefs. Ross et al. supported

Bandura's conclusions that self-efficacy is a powerful motivation construct.

Connections Between Research and the Conceptual Framework

Bandura's theory maintains that intervention strategies can effectively alter

personal self-efficacy, influencing an individual's motivation, performance, and

persistence. This theory has been tested recently with middle-school students. Song,

Grutzmacher, and Munger (2016) performed a quasi-experimental pre-post design on a

yearlong self-efficacy program designed to positively affect diet-related behavior in

children. Data collected from 665 fourth- and fifth-grade students showed significant

improvement in their self-efficacy to choose more nutritious alternatives. A similar study

performed by Kim and Choi (2017) also linked self-efficacy to predictions in behavioral

changes. A pre-post design measured the effect of the intervention program designed to

decrease smoking in middle-school boys ($n = 97$). Results revealed a significant

improvement in self-efficacy beliefs and positive behavior change (cessation). Self-perception of one's ability to accomplish a set goal determines what an individual does with the knowledge and skills they have. Both intrinsic and extrinsic classes of motives are important for educators seeking to increase self-efficacy.

Whether or not a person believes they can complete a task depends on the strength of their self-efficacy (Bandura, 2006). Positive verbal reinforcement can increase an individual's intrinsic motivation and strengthen their self-efficacy beliefs to complete tasks. Gaylor and Nicol (2016) examined 14 students' self-efficacy using a mixed-method case study before and after the completion of a career education course. Classroom assignments, curriculum documents, interviews, and pre-post self-efficacy scores using *t*-test analysis revealed, "group work and positive facilitator and peer feedback appeared to foster feelings of competence" (Gaylor & Nicol, 2016, p. 5). Parental involvement has also been found beneficial to externally boosting children's efficacy beliefs and achievement (O'Sullivan, Chen, & Fish, 2014).

When individuals are presented with opportunities for choice, intrinsic motivation increases. According to King and Howard (2016), students tend to be positively motivated when teachers provide them with the ability to choose their learning goals for intrinsic reasons. Hu and Zhang (2017) presented a case for programs that facilitate learner choice. In the study of a year-long program, which used both qualitative and quantitative methods, the authors noted the importance of individual contributions to the learning process. The curriculum provided 11 learners with personal choice, resulting in increased self-efficacy. This study confirmed the importance of allowing students choice

in contributing to the development of activities when building self-efficacy. Similarly, Aho et al. (2015) found mentor-guided self-directed learning can be an effective educational approach toward helping students achieve goals. In fact, survey responses from the ($n = 12$) sample revealed that self-directed learning improved skills associated with practiced tasks. The interview protocol yielded an in-depth analysis of how ASM may build opportunities for students to build mastery experience, as out-of-class activities that occur once per week depends on the specific interests of student participants in the program.

Intervention strategies can positively influence students' attitudes toward goals. For instance, programs that create educational experiences that contribute to peer interactions allows for improvement in students' attitudes and perception of personal self-efficacy (Scrabis-Fletcher & Silverman, 2017, p. 99). The interview protocols provided a broaden understanding of how ASM might build opportunities for transforming student participants' attitude toward setting and achieving goals, leading to improved self-efficacy. Children with a strong sense of self-efficacy tend to motivate themselves to achieve goals (Uçar & Sungur, 2017), whereas students with low self-efficacy tend to experience low achievement (Lofgran et al., 2015, p. 374). So self-efficacy curricula may have a positive influence on students' attitude toward learning and achievement. A sense of connectedness to a group minimizes negative environmental stimulus.

Controlling negative emotional stimulus is another construct of Bandura's self-efficacy theory that aligns with the evaluation of ASM. Patton, Deutsch, and Das (2016) explored negative emotional stimulus with peers and mentors. Weekly 2-hour session

observations, performed by trained doctoral, postdoctoral, and faculty researchers, suggested that similar mentoring environments could assist children in learning how to relate to others in a healthy manner, thereby supporting their emotional development. Hence, peer interactions and group activities may have a positive influence on students' emotional health and well-being. The interview protocol of the present study produced information on how ASM might generate positive emotional stimulus for students, as group activities form a noteworthy part of the curriculum.

Framework's Relation to Evaluation Questions and Data Analysis

Because one of the goals of the ASM program is to increase students' self-efficacy, I used the Children's Hope Scale, developed by Snyder et al. (1997), to assess self-efficacy, a fundamental construct of Bandura's theory. The ASM program serves students aged 8 to 11 years, which corresponds to Erikson's (1968) fourth stage of psychosocial development: industry versus inferiority. At this stage, children between the ages 6 and 12 years either develop pride in their accomplishments through social interactions and encouragement from adults or inferiority if they fail to master tasks. According to Synder et al. (1997), the Children's Hope Scale is appropriate for use in all children aged 8 to 16 years, so this scale is a suitable measure of self-efficacy.

I used Bandura's (2006) concept of self-efficacy to investigate Evaluation Question 2: From the perspective of the lead teacher what changes in students' self-efficacy, if any, are apparent? I used qualitative analysis to evaluate self-efficacy learning using Bandura's framework to classify elements that predict self-efficacy: mastery experience (enactive attainment), the modeling of tasks (vicarious experience), ongoing

feedback (verbal persuasion), and controlling negative emotional stimulus

(physiological arousal)**.**

I also used Bandura's framework to examine Evaluation Question 3: From the

perspective of adult-caregivers what changes in students' self-efficacy, if any, are

apparent? In this research project, I evaluated the extent to which the tenants on which

ASM operates align with the four elements of Bandura's (2006) self-efficacy theory,

namely, mastery experience, the modeling of tasks, ongoing feedback, and controlling

negative emotional stimulus. Any single or combination of the four elements can trigger a

change in self-efficacy beliefs. Both interview protocols for the lead teacher and primary

adult-caregivers addressed each construct of self-efficacy as it relates to the design of the

ASMs curriculum.

Historical overview of self-efficacy. The historical understanding of the role self-

efficacy plays in middle-school children evolved with time and it is important to

understand how this role developed. Researchers have primarily focused on three areas

related to self-efficacy. In the first instance, self-efficacy relates to career and college

choices in individuals, particularly in the fields of science and mathematics (Lent &

Hackett, 1987). The literature suggests that intervention strategies can affect career

choices in both men and women. Lent and Hackett's (1987) research has important

implications for counsellors and those practicing occupational psychology. The second

area of study related to self-efficacy is teacher self-efficacy (Ashton & Webb, 1986),

which affects instructional strategies and student outcomes as a measure of teacher

effectiveness in the classroom. The third area identified in the literature is most applicable to the current study.

The third area of research relates to students' academic self-efficacy and how it is relevant to their development, that is to say, how self-efficacy beliefs influence children's response to future goals and challenges. Collins (1982) examined the interaction between a child's self-efficacy beliefs to achieve and their academic performance. This groundbreaking research showed that children with high self-efficacy completed more mathematics problems correctly after instruction. Other researchers such as Carr (2013) also confirmed findings that a strong sense of self-efficacy is essential for students to achieve their full educational potential. In a review of the literature, Carr noted that students' self-efficacy beliefs positively impacted learning, especially those who received the right type of support. Trevino and DeFreitas (2013) also examined self-efficacy and found that high levels of self-efficacy influences intrinsic motivation and academic outcomes (pp. 303-304). Fernández-Díaz et al. (2017) have called on educational policy makers to examine the type of curricula needed to positively affect self-efficacy beliefs and achievement motivation. The current body of research relating to the assessment of self-efficacy curricula is fundamental to understanding its importance to the current study, and I discuss it further in the next section.

A Review of the Broader Problem

This portion of the literature review provided a critical analysis of the broader problem: the need for formal evaluations of self-efficacy curricula. Various combinations of search terms, such as *self-efficacy*, *after school*, *evaluation*, *middle school*, and *mentor*

yielded more than 100 journal articles using the Google Scholar search engine and multiple databases, including Education Research Complete, Thoreau, and ERIC at the Walden University Library. I used no public data relating to the evaluation of the privately offered ASM program.

The need for program evaluations. Evaluating curricula that aims to increase self-efficacy is important for children's achievement motivation. Lin, Lawrence, Snow, and Taylor (2016) performed a randomized study of a self-efficacy literacy program called "word generation" designed to support the academic vocabulary of students. The program lasted 15 minutes a day and occurred during classroom discussion in four disciplines, namely, ELA, social studies, science, and mathematics. The analysis of survey data using a paired sample t-test from $n = 5,870$ middle-school students (sixth to eighth grade) in 12 urban schools revealed that the treatment group had higher levels of self-efficacy when discussing topics covered in the program. This study showed that programs intended to improve students' self-efficacy have positive outcomes in children's academic ability to openly discuss controversial topics. The ability to discuss topics that include mostly unresolved issues in the public domain is important to children's future academic development.

Evaluating curricula that aims to increase self-efficacy through self-regulated learning, which includes planning (goal setting), performance, and self-reflection (Barber & Gallagher, 2015, p. 129) is important to the academic development of children. In a longitudinal assessment of a school-based mentoring program for middle-graders designed to increase self-efficacy of self-regulated learning, Núñez, Rosário, Vallejo, and

González-Pienda (2013) found that students with high self-efficacy tended to be more engaged in the learning process and generally more highly motivated to achieve academically. After assessing the program in the third, sixth, and ninth months, findings showed that program participants were more prepared to meet school demands because of the self-regulated learning skills developed as a result of program participation (Núñez et al., 2013, p.19). The study cited previously evaluated a program that uses similar techniques to ASM, and the evaluation showed positive results. Although the authors noted that the study's findings align with previous research, the study sample of 14 is small, and thus cannot be generalized to larger populations.

Other researchers have found the evaluation of self-efficacy curricula that uses self-regulating learning strategies yielded positive achievement motivation in students. Cleary, Velardi, and Schnaidman, (2017) conducted an evaluation of the effectiveness of a self-regulated empowerment program (SREP) relative to a coexisting school-based remedial mathematics program called "What I Need" (WIN) (p. 31). Using a stratified random sample of 42 seventh grade students, analysis of pretest-posttest t-test scores revealed that students participating in the SREP program were generally more successful at adapting their study strategy and developing more comprehensive study plans for boasting their achievement than WIN program participants. The findings suggested that the participants of the SREP program consistently performed above average. The positive outcome of the evaluation of a program that uses similar techniques as ASM revealed the importance of the current research project. The study had limited generalizability, as the

sample, which was drawn from sixth- and seventh-grade students only, did not explore the effects of the program on children at other development levels.

Self-efficacy curricula have been successful at motivating students to complete homework and improving learning in schools. Tas, Sungur-Vural, and Öztekin (2014) noted in a survey of 168 middle-school teachers that self-regulated learning facilitated open communication with adult-caregivers and this communication improved homework completion rates. The authors found that students were more confident in practicing skills taught in class, more prepared for the next lesson, more engaged in the learning process, experienced personal development (e.g., time management techniques), facilitated parent teacher communication, completed policy requirements, and supported student confidence in communicating with each other. The study revealed positive outcomes of self-efficacy curricula that aim to motivate students to achieve their goals. These outcomes also acted as a guide to the questioning techniques used when primary adult-caregivers shared on the lead teacher's role in boosting students' self-efficacy beliefs to pursue academic goals.

The importance of self-efficacy programs. A synthesis of current literature (Lee et al., 2014; Lofgran et al., 2015; Madjar & Chohat 2016) indicated that low self-efficacy among middle-school students is a meaningful topic in the educational discipline, demonstrating the need self-efficacy curricula. Evidence of the importance of academic self-efficacy is apparent in innovative self-efficacy curricula found in community-based programs for middle-school students. The vision for community-based learning is to facilitate out-of-classroom activities that supplement the curriculum through job

shadowing, mentoring, and apprenticeship in an attempt to build students' efficacy beliefs. Pilkington, Singh, Prescod, and Buettgen (2013) concluded that a community approach toward providing an engaging curriculum supported students' self-efficacy beliefs. The participatory processes encourage buy-in from the community, teachers, principals, and students.

Findings from the study performed by Pilkington et al. (2013) stemmed from interviews, written and verbal feedback from eight participants, and the limited data collected during the implementation of the Mosaic project. The authors found that the 3-year publicly funded mentoring program provided support in the education of elementary school, middle-school, and high school students to pursue higher education. The program showed strength in the use of a community approach to recruit youth from diverse backgrounds, rallying social support in mentoring activities, and providing an engaging curriculum. This study makes a case for improving future youth mentoring projects aimed at promoting self-efficacy through sustainability planning, the execution of data collection plans, and the use of scientific measures of self-efficacy. Innovative programs aimed at building self-confidence in an individual's abilities to achieve particular outcomes warrant self-efficacy an important construct.

Another example of an innovative program aimed at increasing self-efficacy is Project Challenge. Mann (2013) examined the two-week program designed to promote academic self-efficacy and school success in girls who encountered traumatic life experiences. Qualitative measures reinforced quantitative findings of elementary school girls ($n =37$) aged 13 to 15 years in a city located near North Central Florida. Project

Challenge had a strong positive impact on students' self-efficacy beliefs and accomplished its goals. In another study, Marcus et al. (2013) conducted an evaluation of a different innovative after-school mentored program. Designed to improve students' self-efficacy beliefs through health education, this after-school mentoring program took place at an elementary school site and served 17 fourth grade students. Participants scores from the School Physical Activity and Nutrition Project (SPAN) questionnaire and a 10-item knowledge test before the intervention in fall and after the intervention at the end of the school year, supported the effectiveness of the program in promoting the education of health issues and actively contributing to improved self-efficacy in children. Although the authors were unable to scientifically measure the transfer effect of health education on students' self-efficacy, the use of health education to support students' efficacy beliefs is another example of an innovative self-efficacy curricula.

In another example, Monk et al. (2014) used a qualitative approach for assessing EnvironMentors, a program that paired high school students with university student mentors to improve academic self-efficacy. To determine whether the program's goals were met, the authors collected qualitative data from student surveys, a focus group session with mentors during the first year, and written open-ended feedback from students and mentors during the second year. Participants who completed EnvironMentors were found to be (a) more knowledgeable on environmental science and were enrolling in secondary institutions; (b) more interested in environmental science education as a result of their exposure to new experiences, and (c) more skilled at sharing their knowledge with other students. In this study, the program delivered by University

mentors positively impacted high school mentees self-efficacy beliefs. This research

led to the conclusion that there is need for the evaluation of self-efficacy curricula.

Self-efficacy is important to learning. Howardson and Behrend (2015) collected

performance data from $n = 278$ online excel trainees after the completion of an online

course. Using residual relative importance analysis, the authors found that vicarious

experience was the most important source of self-efficacy after removing the effect of

achievement orientation (p. 246). This results show the importance of the social

environment to learning and confirmed the importance of self-efficacy in successful

training programs. However, this study's findings is limited to online training only.

Ozerbas and Erdogan (2016) conducted an experimental study on $n = 58$ 7th grade

students to determine whether self-efficacy was affected by the digital classroom

environment. After four weeks of implementation, pre-post test results revealed no

significant differences in students' academic success of self-efficacy.

Implications

As a result of the outcome-based program evaluation, I presented a program

evaluation report on the value of the ASMs curriculum to middle-school students' self-

efficacy beliefs. Findings included pre-post self-efficacy scores, the perceptions of the

lead-teacher as well as the perceptions of adult-caregivers about the promised program

outcome of improved self-efficacy beliefs. The evaluation report started with an

introduction to the importance of self-efficacy, the problem of a need to evaluate the self-

efficacy curricula designed for middle-schoolers, followed by an analysis of the findings

from the outcome-based evaluation of ASMs self-efficacy curriculum. The concept of

self-efficacy was presented within the context of an outcome-based evaluation on

ASMs strengths, challenges, opportunities, and limitations. Like Lang, Fisher, Craig, and

Forgasz (2015), this evaluation yielded another outcome: it provided the program's

designer and lead teacher with cues for program improvement, thereby increasing the

value of ASM. A formal appraisal of the ASM curriculum through an outcome-based

evaluation provided useful information to future curriculum writers and instruction

developers seeking to provide targeted interventions for increasing self-efficacy among

middle-school students.

Summary

Self-efficacy relates to an individual's perceived belief to achieve a particular

outcome, based on one's abilities. More evaluations of conventional and innovative self-

efficacy curricula are needed to ensure that they support self-efficacy (Lee, Lee, & Bong

2014). Recent literature (Lee et al., 2014; Lofgran et al., 2015; Madjar & Chohat 2016)

indicated that low self-efficacy among middle-school students continues to be a

significant topic in the educational discipline. Biggs et al. (2014) asserted that programs

should be evaluated to determine its success at improving participants' self-efficacy

beliefs. Other researchers (Hushman & Marley, 2015; Winnaar et al., 2015) have called

on educational policy makers to examine instructional curricula and programs designed

to improve students' self-efficacy beliefs. A private ASM program in eastern Canada

claims to provide an innovative curriculum for increasing self-efficacy beliefs in middle-

school students (James, personal communication, May 31, 2016). However, this program

has never been formally evaluated for its intended outcomes. The purpose of this study

was to conduct an outcome-based evaluation of ASMs role in motivating higher self-efficacy in students and determine the program's strengths and weakness as perceived by stakeholders.

This outcome-based evaluation provided primary stakeholders, such as teachers, administrators, and policy makers with an assessment of a curriculum intended to increase self-efficacy in middle-school students. The study also provided information to ASM's designer on potential aspects for program improvement. The next section presents an overview of the project's methodology, which included justification for the outcome evaluation, participants, data collection methods, data analysis, and considered the limitations of the research design.

Section 2: The Methodology

Introduction

Students' self-efficacy is an important topic among educators seeking to improve academic achievement levels. Uçar and Sungur (2017) noted that students with a strong sense of self-efficacy tend to have higher levels of achievement. Lim and Chapman (2015) agreed, concluding that more research into students' self-efficacy beliefs is needed to better understand its possible application to learning. Among middle-school students, curricula aimed at increasing self-efficacy beliefs while supporting individual interests led to higher achievement levels (Lee et al., 2014). Because middle-school students are perceived to have low self-efficacy (Early Childhood Development, 2015) and research literature indicates that low self-efficacy among middle-schoolers is a meaningful topic in the education discipline (Lee et al., 2014; Lofgran et al., 2015; Madjar & Chohat, 2016), evaluating curricula that aim to improve self-efficacy is necessary.

The designer of ASM is a licensed teacher qualified to program plan for children. The 10-week curriculum design caters for small groups of 10 to 12 middle school students who attend sessions twice per week, one on-site and one off-site. The major goal of ASM is to increase students' sense of self-efficacy by providing "one-on-one mentoring and learning experiences that inspires children to reach for their highest potential by setting high expectations" (James, personal communication, January 25, 2018). Because ASM is independently organized with no connection to the standard education system, learning activities are classified as extracurricular. Since programs that

fall under "extracurricular" are not required to meet all minimal education standards, program planners are allowed greater creative flexibility in curriculum development.

Not many of the children registered in ASM suffer from chronic behavioral issues. However, there have been 10 to 12 kids of the 150 children completing the program in the last 3 years who have been "challenging" according to the teacher-mentor. If a child decides to "test the boundaries" and ignore previously agreed-on standards, the teacher-mentor is "not afraid to address things as long as consequences rationally matches the offence." When signal warnings are not enough, the incident is isolated: The child and the parent(s) are called into a "mini-meeting" to address the behavior and a path to moving forward is modeled in a firm but loving manner that the child can identify.

The designer of ASM created this program for mature students to help them "unlock their highest potential." According to James,

> A program such as ASM "should have existed when I was a child . . . and in some ways, I am giving that experience to a different generation. [ASM] mimics the moral and values instilled in me by my loving adult-caregivers and local community (personal communication, January 25, 2018).

The program's structure is set up to give students the tools they need to increase their sense of self-efficacy.

Evaluating innovative practices that may increase efficacy beliefs in middle school students helps identify corrective measures to low self-efficacy. Other researchers (Hushman & Marley, 2015; Winnaar et al., 2015) have called on educational policy makers to examine instructional curricula and programs designed to improve students'

self-efficacy beliefs. I sought to evaluate the curriculum of ASM, a 10-week, offsite, privately owned program that aims to increase students' self-efficacy.

Research Design and Approach

The research literature indicates that low self-efficacy among middle-schoolers is still a meaningful topic in the education discipline (Lee et al., 2014; Lofgran et al., 2015; Madjar & Chohat 2016) and evaluating curricula that aim to improve self-efficacy is needed. The designer of the ASM program designed it to inspire children's natural self-confidence, build leadership skills, and support individual interests and talents through activities such as public speaking training and character education, contributing to higher self-efficacy (nondisclosed Canadian mentorship program, 2016). However, the program has never been evaluated for the promised outcome of raising self-efficacy in participants. The appraisal of ASM's curriculum yielded pre-post student self-efficacy scores (RQ1) and the perceptions of the lead teacher as well as adult-caregivers about the extent to which the program increases self-efficacy beliefs in students (RQ 2 & RQ3). I provided descriptive statistics on quantitative pre-post self-efficacy scores from students and used inductive methods to assess qualitative interview data from the lead teacher and primary adult-caregivers.

An evaluation study assesses the design, implementation, or effects of a program (Worthen et al., 1996). Different types of evaluations measure various aspects of a program's development. Program evaluations include formative/process evaluation and summative/outcome evaluations. A formative evaluation determines whether the program activities are applicable, feasible, and suitable (Worthen et al., 1996). This type of

evaluation is appropriate when a program or activity is newly developed, or an existing program or activity needs modification. A process evaluation would be best suited for documenting and analyzing whether program activities occurred as planned (Worthen et al., 1996). Summative evaluations represent a comprehensive measure of the changes produced by a program (Worthen et al., 1996). An outcome-based evaluation, which assesses how well a program meets its main objectives, is most fitting when considering whether ASM is successfully motivating increased self-efficacy in students.

In this study, I evaluated the outcomes of the ASM program. By allowing students to set and achieve goals based on individual interests and talents and facilitating the internalization and integration of externally motivated tasks, the ASM program aims to increase students' self-efficacy. I analyzed descriptive statistics on quantitative pre-post self-efficacy scores from students and used inductive methods to assess qualitative interview data. The following articles support the use of the methodological framework I used to evaluate the curriculum of the ASM program.

Methodology Review

This section serves as an overview of the methodology for the outcome-based evaluation, which included the use of quantitative and qualitative data. In the project study, I followed the model for program evaluation used by Karahan, Canbazoglu Bilici, and Unal (2015). The authors used a combined approach of qualitative and quantitative methods to provide a holistic assessment to determine whether program goals were being met. The study conducted by Karahan et al. showed strength in its application of all four elements of Guba's (Poggenpoel, 1998) model for trustworthiness: credibility,

transferability, dependability, and confirmability. I measured the quality of this

evaluation study against the evaluation standards developed by the Joint Committee on

Standards for Educational Evaluation (JCSEE). I discuss further the details surrounding

evaluation quality in the next subsection.

Karahan et al. (2015) reported quantitative pre- and post-survey data from 21

science, technology, engineering, and mathematics (STEM) education eighth graders who

participated in a 14-week long research study. Like Karahan et al. (2015), I presented

descriptive statistics on students' self-efficacy as measured by the Children's Hope Scale

(Synder et al., 1997) before and after program participation. The small sample size did

not allow for inferential statistical analysis. However, the students' pre-post self-efficacy

scores provided initial evidence of ASMs main goal of increasing self-efficacy in

children (RQ1).

Qualitative analysis of interview transcripts from semistructured interviews with

primary adult-caregivers of registered middle-grade student participants and the lead-

teacher accompanied quantitative descriptive statistics. I evaluated the perceptions of the

lead teacher about any changes in students' self-efficacy as a result of program

participation (RQ 2) as well as the perceptions of adult-caregivers about any changes in

children's' self-efficacy as a result of program participation (RQ 3) using Bandura's

(2006) self-efficacy framework. I used semistructured interviews with adult-caregivers

and the lead-teacher because it allowed for a detailed analysis of participants' experiences

within the program setting and the context of individual families (Miles & Huberman,

1994). Other qualitative approaches such as ethnography, which is better suited for

investigating cultural groups, or narrative inquiry, which is better suited for capturing

life-changing events, or phenomenology, which studies the meaning people place around

their experiences (Lodico, Spaulding & Voegtle, 2010) are not appropriate.

Participants

The study's participants consisted of the lead teacher and the primary adult-

caregivers of students registered for the 10-week Winter 2018 program session. Since I

have no previous relationship with the program; I received consent from the program's

designer through an introductory letter. As a result, the program designer agreed to

provide secondary data on self-efficacy scores collected as part of ASMs process upon

IRB approval. I then sought the support of adult-caregivers to participate in the study

during two separate pre-arranged site visits.

What follows is a description of the methods used to establish a positive working

relationship between this study's participants and myself. Before the start of each

interview, I reviewed the importance of the study and the participant's role as a volunteer.

I reassured interviewees that their responses will remain strictly confidential and kept

secured by using a pseudonym (fake name) to protect their identity when reporting the

study's findings. Participants understood that their involvement in the study will not

negatively impact students enrolled in the program. I also provided reassurance to

participants that they could choose to stop at any point and neither the university nor

ASM would treat them differently.

I used a convenience sample of all primary adult-caregivers from the pool of

registered students willing to participate. Merriam (2009) noted that convenience

sampling is a well-known method in the qualitative tradition. This form of sampling

does not allow for generalization to larger populations, but is useful for conveniently

accessing participants. All primary adult-caregivers of registered students were part of the

population best suited for sharing first-hand what they believe is the value or worth of the

ASM program. Each primary caregiver was introduced to the study through an

introductory letter and completed an informational questionnaire which reflected their

willingness to participate in a study. However, only adult-caregivers of registered

students who volunteered to participate in the study were invited to take part. The

maximum class size was 10, and I expected at least six to seven primary adult-caregivers

to volunteer for interviews. According to Guest, Bunce, and Johnson (2006), a sample

size of six to twelve is ample for data saturation when "the aim is to understand common

perceptions and experiences among a relatively homogenous group of individuals" (p.

79).

Other researchers have used similar sample sizes in qualitative research. Monk et

al. (2014) used a qualitative approach in assessing EnvironMentors, a program that paired

high school students with university student mentors to provide informal environmental

science education. To determine whether the program's goals were met, the authors

collected qualitative data from ($n = 9$) student surveys, a focus group session with

mentors, and written open-ended feedback from students and mentors. Similarly,

Pilkington et al. (2013) conducted an evaluation of the Mosaic project, a three-year

publicly funded program that sought to support diversity in the education of elementary,

middle, and high-school students considering a profession within the healthcare sector.

Data sources included (a) semi-formal interviews, (b) written and verbal communication from participants during the project, and (c) enrollment numbers throughout the years. These studies provided evidence that the use of descriptive quantitative statistics in studies with sample sizes that are less than 15 are still useful for gaining information regarding participants' perceptions and experiences.

Research Ethics

Fulfilling Internal Review Board (IRB) requirements (IRB approval # 01-22-18-0403056) are essential for research involving human subjects. According to Lodico et al. (2010), the IRB requires researchers to weigh all possible risks. Such principles stems from regulations to protect human subjects found in the Belmont Report (U.S. Department of Health & Human Services, 2016). The Belmont Report, premised on three ethical principles, justice, beneficence, and respect for persons, became law in 1979 (U.S. Department of Health & Human Services, 2016). Justice refers to fairly distributing the benefits and burdens of research. Beneficence seeks to maximize the possible benefits of research while minimizing harm (privacy, participants' standing). Respect for persons involves acknowledging autonomy and protecting those with diminished autonomy.

All adult participants who decided to take part in this study were exposed to minimal risks. Administering consent forms to adult participants made the purpose of the study and participant's role, as a volunteer in the research process, clear (participants respected). The participants also understood that it is their right to choose whether to participate or not participate in the study at any time (justice). I sought permission from the designer of the ASM program for access to the site through a Letter of Cooperation. I

reassured all prospective adult participants that everything said will remain private and that even if I do use quotations in reporting findings, their identity will remain anonymous through the use of pseudonyms (beneficence). Students were not primary participants in this evaluation study. I accessed secondary self-efficacy scores of students, collected as part of ASM's process, with the permission of the program designer. As such, student assent was not needed. I kept prints of all codes, reflective notes, taped interview transcripts, and records of personal biases in a locked drawer when not in use. All raw data will be erased (audio recording) and shredded (paper) after 5 years, as required by Walden University's IRB.

Data Collection

Data from students' perceived self-efficacy scores before and after program participation and semi-formal interviews with primary adult-caregivers and the lead teacher addressed this study's evaluation questions. I have no previous relationship with the ASM program or the program's designer, other than having seen the Program's lead-teacher present on the program's purpose as part of my employer organization's commitment to increase learning opportunities for students in my community. In fact, I work in an entirely different industry and was introduced to the program through a one-time presentation at an event unrelated to the education field. Therefore, gaining permission to use the ASMs site for research required what Creswell (2012) termed negotiation between the researcher and gatekeeper. My first form of contact with the ASM program's designer, who is also the lead teacher-mentor, came through an

introductory letter. Therefore, data collection process was objective, since I have no previous association with the program, program's participants, or program setting.

The program's designer, who is also the lead teacher, provided permission for the use of the site pending IRB approval through a letter of cooperation. I used a mixture of published and researcher-produced instruments for answering this study's evaluation questions. All data and emerging understandings were recorded using interview transcripts, The Children's Hope Scale, and the Children's Hope Scale Scoring Sheet.

Instruments

The Children's Hope Scale instrument is a quantitative measure selected to answer RQ1: What are the mean, mode, and median self-efficacy scores of students before and after 10 weeks of participation in the ASM program? Snyder et al. (1997) derived the name of the instrument "children's hope" given their concept of self-efficacy. Children's hope is a two-factor model that consists of both a pathway and an agency component (Snyder et al., 1997, p. 401). The pathway component consists of a cognitive set of beliefs in one's ability to achieve goals regardless of circumstances, and the agency component reflects one's self-motivation to initiate and sustain movement toward set goals.

Measuring self-efficacy using the Children's Hope Scale aligns with this study's conceptual framework. Snyder et al. (1991) noted the conceptual overlap between self-efficacy and hope. Snyder's definition of children's hope is similar to Bandura's self-efficacy and how children think about themselves when achieving particular goals. Other researchers such as Marques, Lopez, and Pais-Ribeiro (2011) and

Table 1

Evaluation Questions and Data Sources

Evaluation questions	Data source
1. What are the mean, mode, and median self-efficacy scores of students before and after 10 weeks of participation in the ASM program?	Self-efficacy scores from the Children's Hope Scale (Snyder et al., 1997).
2. From the perspective of the lead teacher what changes in students' self-efficacy, if any, are apparent?	Semiformal interviews with the lead teacher-mentor.
3. From the perspective of adult-caregivers what changes in students' self-efficacy, if any, are apparent?	Semiformal interviews with adult-caregivers.

Otis, Huebner, and Hills (2016) have used the Children's Hope Scale to show how program interventions can enhance positive qualities in individuals that promote the achievement of goals. Snyder et al. (1991) noted that the two-factor model (agency and pathways) of hope proved credible through confirmatory factor analysis. Rigorous testing of the instrument revealed internal consistency (Cronbach α reliability = .72 to .86), temporary stability (test-retest relationship, r (89) = 0.73, $p < .001$), and convergent validity ($p < .001$) for research purposes (Snyder et al., 1991).

The designer of the privately owned and operated ASM program, as a part of its regular function, collects information regarding students' perceived self-efficacy as part

of its process. I accessed de-identified test scores from the Children's Hope Scale at

the start and end of 10-weeks (Table 1). I accessed the scale responses from the lead-

teacher as agreed upon in the Data Use Agreement, after IRB approval. I stored all survey

documents in a locked desk to protect participant's privacy when not in use.

Qualitative interviews helped reveal teacher perception of self-efficacy changes in

students and addressed RQ2: From the perspective of the lead teacher what changes in

students' self-efficacy, if any, are apparent? Qualitative interviews also informed RQ3:

From the perspective of adult-caregivers what changes in students' self-efficacy, if any,

are apparent? One-on-one, semistructured interviews with primary adult-caregivers and

the lead teacher took place at the off-site mentorship compound. Audiotaped interviews

lasted approximately an hour. All questions were open-ended and based upon the guiding

questions and conceptual framework presented above. Interviewees had the opportunity

to respond honestly and comprehensively. The interview questions, reviewed by a panel

of experts consisting of three experienced PhD Education professors, were clear and

aimed to elicit meaningful data about participants' experiences, feelings, and knowledge

(Merriam, 2009, p.114). In developing the questions, I considered the content, phrasing,

and sequencing of the interview questions.

I presented the study to the primary adult-caregivers at the end of the first

program session. I presented each family with a sealed, customized envelope. Each

package included an introductory letter detailing the importance of the evaluation study,

an informational questionnaire, a confidentiality agreement, and instructions for the

return of the informational questionnaire to the program's site. Initially, I planned to

SYMBOLS											
Test Scores	★									★	
Interviews			✚						✚	✚	

WEEK	1	2	3	4	5	6	7	8	9	10
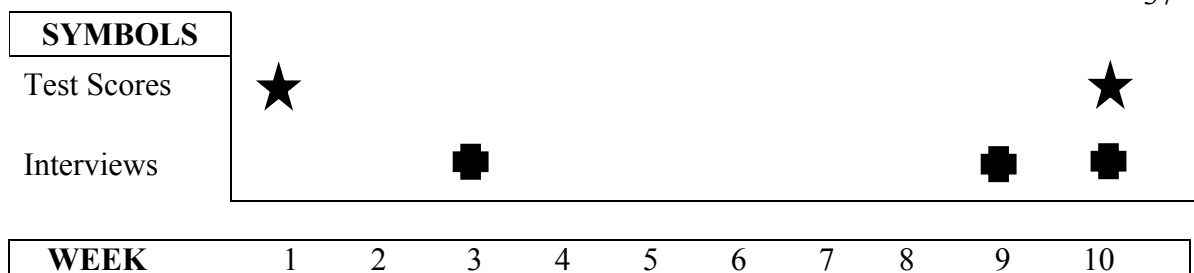
Figure 1. Timeline for collecting interview data and efficacy scores data.

return to the site during the third, fifth, and seventh week to gain the support of other prospective adult participants. However, all adult-caregivers completed the informational question on site, and listed their preferred mode of contact for scheduling interviews during the ninth and tenth week.

Adult-caregivers, interviewed once during the ninth and tenth week (Figure 1), described whether program activities improved children's self-efficacy, and the role ASM played in developing children's sense of self-efficacy. I interviewed the teacher-mentor twice, once during the third week of the 10-week program and a final follow-up interview during the ninth week (Figure 1). A paid professional transcriptionist transcribed verbatim the interview scripts after signing a confidentiality agreement.

Data Analysis

The ASM program claims to engage students in new experiences to increase self-efficacy beliefs through the development of leadership skills, individual interests, and talents (James, personal communication, May 31, 2016). However, this program was never evaluated for its intended outcomes. The purpose of this study was to conduct an

outcome-based evaluation of the ASM program. The evaluation study determined

whether ASM achieves one of its main outcomes of increasing self-efficacy beliefs in

children as well as the perceived strengths and weakness of program participation

according to stakeholders. Quantitative descriptive data and qualitative data analysis

addressed this study's evaluation questions.

I listed the quantitative self-efficacy scores from the Children's Hope Scale (CHS)

using an Excel scoring sheet. Scoring sheet data, quantified using descriptive statistics,

provided the answer to RQ1: What are the mean, mode, and median self-efficacy scores

of students before and after 10 weeks of participation in the ASM program? The lead

teacher collects student scores during the first and last week of the 10-week program.

Sample questions included "My past has prepared me for future success," "I energetically

pursue my goals," "There are lots of ways around any problem," and "I can think of

many ways to get the things in life that are most important to me" (Snyder, et al., 1997, p.

419). The students responded to each item from a six-option Likert scale ranging from:

"None of the time" to "All of the time." Six (maximum) represents high self-efficacy

beliefs and one (minimum) represents low self-efficacy beliefs.

Overall, a high score indicates a student's strong belief that he or she can set and

achieve goals. I recorded the value of the total score from the CHS for each answer

choice from the $n = 10$ student participants in fields A-F. In field G, I summed the scores

across all questions and divided the results by $n = 10$ participants to calculate the total

mean score. I also calculated the median and mode score. These results were descriptive

statistics only. I reported the mean, mode, and median self-efficacy scores pre-post

program participation, as the sample size was too small for inferential statistical

analysis. Inductive methods guided the qualitative analysis of interview transcripts with

adult-caregivers and the lead-teacher.

Qualitative analysis of interview transcripts informed the answer to RQ2: From

the perspective of the lead teacher what changes in students' self-efficacy, if any, are

apparent? as well as RQ3: From the perspective of the adult-caregivers what changes in

students' self-efficacy, if any, are apparent? Consistent with Creswell's (2012) process of

qualitative data analysis, after transcribing interviews verbatim, I used *a priori* codes

(such as mastery experience, modeling of tasks, regular verbal feedback, and managing

of negative emotions) and open codes to identify patterns (LeCompte&Preissle,1993) and

develop themes through cross-case analysis (Miles & Huberman, 1994). After collecting

a single data set, I reviewed the purpose of the study, then carefully read through the data

and journal personal reflections, tentative themes, and ideas for the next data collection

session (Merriam, 2009), noting ASM's strengths, challenges, limitations, and successes.

The reexamination of descriptive codes in interview data provided confirming evidence

of participants' experiences and the program's role in motivating higher self-efficacy in

students. Confirming and disconfirming data were both important to this study's findings.

Confirming data provided deeper insight into conclusions drawn while discrepant

data that stem from the open codes suggested the need for further research to clarify the

implications for the ASM program. Lodico et al. (2010) cautioned that researchers must

report disconfirming data, perhaps as unique to a particular group or individual. Analysis

not only involved explaining data that supported *a priori* expectations but also

acknowledging deviations in the dataset. Booth et al. (2013) suggested the use of a structured report form for analyzing disconfirming data through reflective discussion of findings: For instance "What do we expect to find from the evaluation but have not" (gap analysis) and "What we have found but did not expect (unexpected findings) (p. 20). Any differences arising out of the data analysis process are relevant. I used a similar approach to Booth et al. (2013) and reported the results as unique findings.

At the end of the 10-week period, I analyzed the interview recordings and transcriptions for a tentative list of themes using open codes as well as *a priori* codes (Appendix E). I applied color-coding techniques to interview transcripts in order to code data, all guided by the conceptual framework, namely, mastery experience (enactive attainment), the modeling of tasks (vicarious experience), ongoing feedback (verbal persuasion), and managing negative emotional stimulus (physiological arousal). Color-coding techniques helped identify patterns, themes, and discrepancies (Karahan et al., 2015).

Evaluation Quality

The criteria used to judge the quality of this assessment followed the evaluation standards developed by the Joint Committee on Standards for Educational Evaluation (JCSEE). The application of the evaluation standards enhanced qualitative and quantitative data analysis (Worthen, Sanders, & Fitzpatrick, 1996). The quality of this outcome-based evaluation depends on the degree to which this study meets the core standards for evaluation practice: utility, feasibility, propriety, accuracy, and accountability standards.

The utility standard ensured that the resulting evaluation report provided valuable information to stakeholders. A key factor determining evaluation use is the extent to which potential users are involved throughout the evaluation process (Worthen, Sanders, & Fitzpatrick, 1996). Given the purpose of this outcome-based evaluation is to determine the program's role in motivating higher self-efficacy in students and identify the program's strengths and weakness as perceived by stakeholders, the use of clear language to communicate evaluation findings and implications to internal stakeholders is critical. Owing to the utility standard, the evaluation report was adapted to provide clear and useful information concerning the ASM program's value or worth to primary and secondary stakeholders. Primary stakeholders included the program's designer, who is also the lead teacher, primary adult-caregivers, and student participants. Secondary stakeholders included policy makers and community partners.

The feasibility standard ensures that the evaluation is effective and efficient. According to Lodico et al. (2010), credibility in research (internal validity) depends on the extent to which the data analysis process is rigorous. Rigorous analysis ensured efficiency of the evaluation process and effectively assessed whether or not the ASM program achieves one of its main outcomes. While the feasibility standard seeks to find the most effective and efficient means of conducting the evaluation, the propriety standard supports an analysis that is legal and ethical.

This evaluation study employed methods that are proper, fair, legal, right, and just (propriety standard). For instance, ethical consideration included a candid discussion on the benefits and risks to participants of interviews, issues surrounding privacy, and

informed consent (Merriam, 2009). I am aware of the legal and ethical issues surrounding the research process through the completion of the National Institutes of Health (NIH) web-based training course "Protecting Human Research Participants," an IRB requirement. I maintained the privacy of participants by using a pseudonym (fake name) to protect participants' identity and kept all prints with codes, reflective notes, taped interview transcripts, and records of personal biases in a locked drawer. All raw data will be erased (audio recording) and shredded (paper) after 5 years, as required by Walden. Furthermore, the evaluation involved a fair and complete examination of the program's strengths, challenges, opportunities, and limitations, which accurately conveyed information regarding ASMs merit, or worth.

The accuracy standard ensured that the evaluation produces findings that are sound. The accuracy of findings supplemented interpretations through member-checking techniques (Creswell, 2012) such as following up with the lead teacher on the accuracy of the summary of recorded experience during our face-to-face interviews. Including thick descriptions added depth to the study's findings and provided reliable information (dependability) that may inform future research. Although the results cannot be generalized to larger populations due to the small sample size ($n <30$), providing enough description to add context to the research situation supported transferability, thereby achieving external validity.

Triangulation also strengthened the trustworthiness of evaluation findings. According to Lodico et al. (2010), triangulation "adds to the thoroughness, richness and in-depth understanding of the study" (p. 35). Conducting semi-formal interviews that

included the teachers perspectives and those of adult-caregivers led to internal triangulation of qualitative data. Karahan et al. (2015) also internally triangulated data by conducting semi-formal interviews with multiple persons, which added credibility and confirmability to the study's conclusions. In addition, the authors inserted parts of the interview transcripts with students and teachers in the findings of the study (transferability and dependability) resulting in a rich description of the data collection process. However, no mention was made concerning how the researchers controlled for personal bias. Using the Karahan et al. (2015) study as a model for the current outcome-based evaluation, I determined whether ASM successfully fosters stronger self-efficacy beliefs in middle-school students.

Program evaluation studies must maintain the high technical and ethical standards that guide professional practice. The evaluation standards utility, feasibility, propriety, accuracy, and accountability acted as a framework for formulating the evaluation design. The application of the all evaluation standards addressed the adequacy of the evaluation quality and design.

Limitations

One major limitation of the study is that the Children's Hope Scale does not address positively biased responding, which suggests there might be some positive bias for children who already experience high self-efficacy. Because scores on the Children's Hope Scale can be positively correlated with socially desirable responding (Synder et al., 1997), the common tendency to use positive self-descriptions might limit students' propensity to accurately report on personal competencies. Given that participants

registered for the ASM program are not troubled children per se, this instrument does carry some risk of positive bias toward those children with already high self-efficacy. This instrument may inaccurately inflate the scores of children who already experience high self-efficacy to begin with and attend the ASM because they wish to aim even higher. The median scores will not be sensitive to outliers and reporting the standard deviation will help identify outliers. However, it is more important that students are consistent in their scoring, pre-post program participation since the goal is to calculate the mean, median and mode self-efficacy scores after 10 weeks.

Another limitation of the project study relates to the validity and reliability of using face-to-face interviews as a research instrument. Interviewee bias might have caused participants to answer questions according to what they thought the interviewer wanted to hear or interviewees may have felt uncomfortable expressing themselves to a stranger regarding their personal experiences. As a result, I employed additional steps to maintain the validity and reliability of interview data as suggested by Alshenqeeti (2014). For instance, I pilot tested interview protocols with third parties having similar profiles as participants, reduced dependence of the digital recorder by taking written notes to record personal thoughts and observations during interviews, and presented interviewees with an opportunity to summarize or clarify points made at the very end of the interview. Such techniques were meant to reduce response bias in interviewees and maintain the accuracy and validity of interview data.

Data Analysis Results

The problem addressed by this study is the need for the formal evaluation of programs that aim to improve self-efficacy beliefs. The purpose was to conduct an outcome-based evaluation of the ASM program for its role in motivating higher self-efficacy in students and to determine its strengths and weakness as perceived by stakeholders. The data included quantitative self-efficacy scores from students as well as qualitative semistructured interviews with the teacher-mentor, who is also the designer of ASM, and from the adult-caregivers. The findings generated through the coding process supported a series of recommendations outlined in the evaluation report (Appendix A). The following findings present the patterns and themes embedded in the data.

RQ1: What are the mean, mode, and median self-efficacy scores of students before and after 10 weeks of participation in the ASM program?

The designer of the privately owned and operated ASM program regularly collects data regarding students' perceived self-efficacy scores as part of its process. I accessed de-identified test scores at the start and end of the 10-week program from all ten children in grades 4-8 registered for the winter session. I summarized data from each item in the survey in an Excel spreadsheet. Frequency distributions calculated showed the number of times students identified items for each of the six questions on the Children's Hope Scale (CHS).

The CHS survey has six questions and uses a six-point scale (1=None of the time to 6 = All of the time). The minimum total score is 1 and the maximum total score is 6 (Snyder, et al., 1997, p. 419). The dataset yielded a total of 60 Likert scale items on the

CHS survey at the start of the program, and another 60 Likert scale items at the end of

the program. I displayed this data in a frequency distribution table to determine the

differences in students' responses to the same statements before and after program

participation. In addition, the data from the quantitative survey were transformed and

coded so it could be triangulated with qualitative interview data.

The first evaluation question asked, "What are the mean mode, and median self-

efficacy scores of students before and after 10 weeks of participation in the ASM

program?" Data collected from the CHS informed the findings of this evaluation

question. Data analysis revealed that total scores for the pretest data were skewed.

Almost 33% of all students chose all six items with 5 = "most of the time." In addition,

approximately 13% of all students chose all six items with "6=All of the time." The

average total score of all students ($n = 10$) was 4.1 before the start of the program, which

is very near the median of 4 (A lot of the time). The pretest CHS score that occurred most

often was 5 (Most of the time).

Posttest data showed that total scores were also skewed. Almost 30% of all

students chose all six items with "5= Most of the time" and approximately 28% of all

students chose all six items with "6=All of the time." The average total score of all

students ($n = 10$) was 4.617 after the 10-week program, which is near to the median of 5

(Most of the time). The posttest CHS score that occurred most often was 5 ("most of the

time"). The evidence suggested that there were similarities in how students' felt about

personal self-efficacy beliefs at the start and end of the program.

Pre Test Response Rates

Legend:
- None of the time
- A little of the time
- Some of the time
- A lot of the time
- Most of the time
- All of the time

Values: 2%, 13%, 13%, 17%, 22%, 33%

Post Test Response Rates

Legend:
- None of the time
- A little of the time
- Some of the time
- A lot of the time
- Most of the time
- All of the time

Values: 1%, 7%, 7%, 27%, 28%, 30%
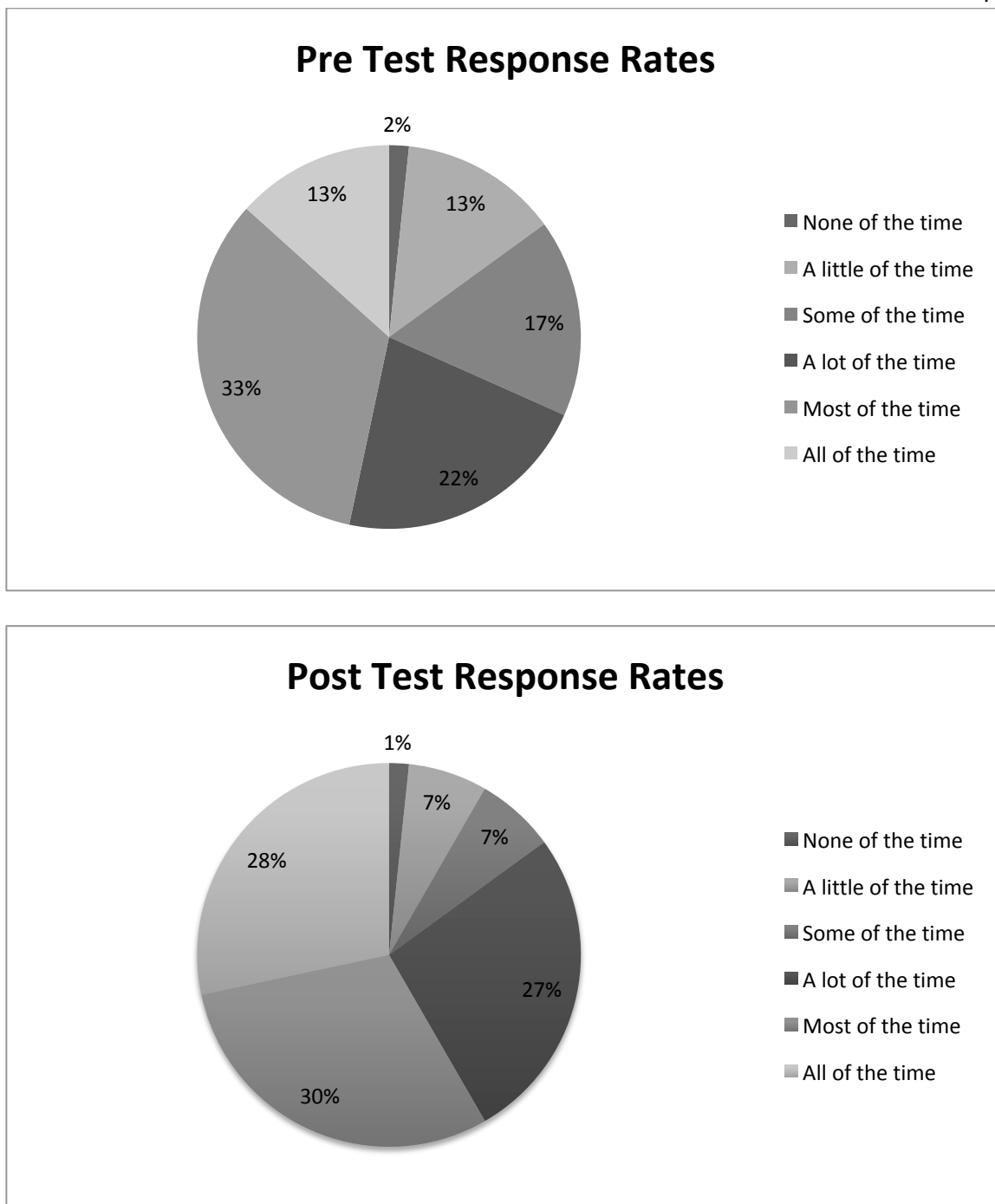
Figure 2. The Children's Hope Scale pretest and posttest scores. This figure illustrates the distribution of pre-posttest data responses from student participants.

Overall, the higher the score, the higher student's belief that he or she can set and achieve goals. A score greater than 5 (Most of the time) is considered high (Snyder, et al., 1997) and indicates that children have high self-efficacy. If the total score is less than 3 (Some of the time), it is considered low (Snyder, et al., 1997) and indicates that children's self-efficacy is low. The findings showed a small but statistically insignificant increase in children's' self-efficacy scores after 10-weeks of program participation from 4.116 (*SD= 0.40*) to 4.617 (*SD=0.147*). The statistical comparison of mean scores before and after program participation did not show remarkable differences. However, there was an upward shift in the distribution of mean and median self-efficacy scores after 10-weeks of program participation. The analysis of qualitative interview data supported quantitative findings, which indicate that children who are more reserved at the start of the program experience the largest increase in self-efficacy beliefs.

RQ2: From the perspective of the lead teacher what changes in students' self-efficacy, if any, are apparent?

After collecting transcribed audio recorded one-on-one interview data, I carefully read through the data sets and journal personal reflections. After reviewing the purpose of the outcome-based evaluation, I identified common themes that provided evidence of ASMs role in motivating higher self-efficacy in students, using Bandura's 2006 theoretical framework as a guide. I reported themes that did not follow *a priori* expectations according to Bandura's theory as discrepant cases. The second evaluation question asked, "From the perspective of the lead teacher what changes in students' self-efficacy, if any, are apparent?"

Table 2

Descriptive Statistics for CHS

	n	Mean	Median	Mode	Min	Max
Pre CHS total score	10	4.116	4	5	1	6
Post CHS total score	10	4.617	5	5	1	6

Participants experience mastery transformation. The first major theme relates to students' mastery transformation after program participation. Adults can help children succeed through supporting them in taking steps toward achieving goals (Xu, 2013). Mastery experience allows students to succeed and builds a robust sense of self-efficacy. When children have the opportunity to control their environment to make decisions and practice skills, it facilitates growth of mastery experiences. According to the lead mentor, there are two types of students who typically attend ASM: "The generally polite, well-mannered kids, who are intuitive and have personal goals to be better… and the shy, withdrawn, anxious type." The teacher-mentor went on to explain the changes typically observed in children after attending ASM program sessions:

> Typically, the end changes seen in students depend on their disposition prior to
> beginning the ASM program. The [mastery] transformation is more pronounced
> for the shy anxious kid. In other kids, the transformation is not as visible, because
> they already had high levels of self-confidence to achieve personal goals,
> however, the relational transformation is notable. They experience a bond that
> gives them a sense of importance and value…saying things like, they want the

values learnt at [ASM] to be a part of their lives (James, personal

communication, January 25, 2018).

The teacher-mentor felt that adults could help strengthen the self-efficacy beliefs of

students who wanted to be mentored or needed encouragement to push personal

boundaries to reach their highest potential.

Student mastery transformation after program participation aligns with Bandura's

(2006) self-efficacy framework. Mastery experience can increase an individual's personal

sense of self-efficacy through enactive attainment. The teacher-mentor explained how

enactive mastery transformation occurs through public speaking training. James (2018)

explained "at [ASMs] Closing Ceremony, the kids perform a 10-minute presentation in

front of an audience of approximately 100 persons, including adult-caregivers, school

teachers, program guest speakers, and other persons of influence serving in public

office." The goal is for children to demonstrate the public speaking skills mastered

throughout the program on a topic for which they are passionate. The data suggest that

the mastery transformation in children who entered the program as shy or full of anxiety

is especially pronounced during the public speaking presentation. "I literally give those

kids wings to fly, because at the start of the program, they could not believe that it would

ever be possible" (James, personal communication, January 25, 2018). After mastering

major tasks, students become empowered to pursue other challenging undertakings such

as completing a difficult assignment or excelling at a sport.

The research literature supports the conclusion that student mastery

transformation improves self-efficacy after program participation. Song et al. (2016)

performed a quasi-experimental pre-post design on a yearlong self-efficacy program

designed to positively affect diet-related behavior in children. Survey data collected from

665 fourth and fifth grade students showed significant improvement in their self-efficacy

to choose more nutritious alternatives after program participation. In another study,

Kronholz (2014) presented an educational case example on how the Tuscan Charter

School students outperformed 40 countries in 2012 Program for International Student

Assessment (PISA). The author noted during interviews and questioning with students

that 5th graders could be assigned up to 90 minutes a day of homework. The culture of

homework and enthusiasm for deep learning challenged students who wanted more than

what regular schools offer. This commentary provides evidence of how programs

stimulate students' self-efficacy beliefs to achieve at high levels through mastery

experiences.

Participants observe modeled standards. The second theme that relates to

changes in students according to the lead teacher is the modeling of appropriate standards

for increasing children's self-efficacy beliefs. The high expectations modeled are put into

practice as a result of the experiences gained at ASM. For instance, students provide

handshakes to adult guest speakers at appropriate moments, exhibit good table-manners

at restaurant nights including how to order a meal or the appropriate use of table utensils,

and utilize public speaking techniques including talking into a microphone with a suitable

pitch and proper posture. According to the teacher, high expectation standards are

modeled very early on in the program and positively influences students' ability to

conduct themselves confidently in various other situations.

Modeling appropriate standards (vicarious experience) that assist children in reaching for and achieving high goals aligns with Bandura's (2006) self-efficacy framework. The teacher noted that students' embody the high standards modeled as a result of program participation. According to James "it is not about teaching kids they are better than others, instead, the focus is on [modeling] high expectations for one-self, so each individual can become the best version of themselves." (James, personal communication, January 25, 2018). The teacher-mentor noted the importance of setting expectations, which is exemplified by the active life lived by adults. Having appropriate role models is especially important when considering future staffing. James continued,

> There is no divide between adult and child when it comes to lifestyle choices, who you are as an individual, and what's healthy. Future staff must be sincere, and should not be a different person at home than with the kids. This is what ASM embodies…and it is a heavy responsibility, which cannot be done if it's not one's heart (personal communication, January 25, 2018)

The lead teacher maintains that modeling strong self-efficacy beliefs must be meaningful and come from a setting that stimulates the right reactions and emotions.

James noted that "you can't reach a child's head until you've reached their heart. Based on our personal interactions, children determine how to think, act, and speak" (James, personal communication, January 25, 2018). According to the lead teacher, after 10 weeks of program participation, children gained confidence to pursue their individual passions by observing and learning from positive role models. Adult-caregivers agreed noting the that children experienced a new zeal for learning and

confidence for pursuing passions after program participation, for example taking time

to make dinner time with family an enjoyable experience. This evidence suggests that

modelled behaviors during program sessions helped children succeed at personal goals

and achieve a higher sense of self-efficacy.

Participants receive regular feedback. The third theme that relates to changes in

children's self-efficacy according to the lead teacher is the role quality feedback plays in

helping children realize high goals. The teacher-mentor provides quality feedback by

using the five love languages to communicate how students' attitudes, behaviors, and

choices work to support and/ or impede their achievement of personal dreams. The

concept behind providing students with quality feedback using the five love languages

was made popular by Gary Chapman and Ross Campbell (2016). The authors posit that

every child receives and expresses love through one of five communication styles and

when children feel loved they strive to be their best. The teacher-mentor explained:

> I am very fluent in the five love languages. So for children who are affectionate, I
>
> have kids come up and sit on my lap for 5 minutes. The schools discourage that
>
> but I don't, I let the child initiate. I also share words of affirmation to encourage
>
> the kids. There is a lot of gifts. We have memory boxes, so the kids who speak
>
> that love language gather knick knacks that speak to what they're learning at
>
> [ASM]. Acts of service would apply to a lot of what we do whenever we meet,
>
> and quality time is expressed in the undivided attention received during one-on-
>
> one mentoring. (James, personal communication, January 25, 2018)

The lead teacher noted that such feedback help children become more motivated to achieve personal goals and dreams. The feedback, communicated to students in a fair and firm but loving manner, appear helpful in supporting higher self-efficacy beliefs.

The positive relationship between quality feedback and children's sense of self-efficacy aligns with Bandura's (2006) self-efficacy framework. Some children experienced marked changes in their sense of self-efficacy to achieve goals through the collection of souvenirs which motivated students to achieve outcomes. According to James, some children feel a higher sense of self-efficacy through accumulating trinkets that act as reminders of the goals they are working toward. For instance, one child, after collecting a box full of objects that reminded her of her dream of becoming a radio presenter, persisted in working together with the teacher-mentor to request an interview on air with a local radio broadcaster. Now, the group of students are going to have their own radio show, after being invited once to speak on what ASM has empowered them to achieve personally. Other children connected with quality time during one-on-one mentoring. For example, the teacher-mentor takes students to coffee shops to discuss their personal dreams. During this time, the teacher examines workarounds to possible barriers to achieving goals. The result is children seeking out opportunities for authentic learning experiences, outside of assigned school tasks.

The literature also supports the theme of raising children's self-efficacy through consistent high quality feedback. Plakht, Shiyovich, Nusbaum, and Raizer (2013) conducted a study that revealed students who received positive feedback during clinical practice achieved higher grades than those students who received negative feedback.

Other researchers such as Valiante and Morris (2013) found feedback particularly important for keeping individuals open-minded about their potenial in sports. Providing consistent and high quality feedback to children is positively related to their confidence in their ability to achieve goals.

Participants experience emotional transformation. The fourth theme that relates to changes in children's self-efficacy according to the lead teacher is addressing negative emotions such as the fear of failure. The teacher-mentor coaches children who experience extreme anxiety via one-on one-mentoring. Students learn how to address fears through regular self-efficacy talks. For example, children who experience fear of failure are asked to describe what makes them believe others will consider their efforts a failure. According to the teacher-mentor, each myth that causes fear or anxiety in children is demystified and replaced with a new concept of positive self-image, all wrapped in the expectation attitude of "I can do anything." (James, personal communication, January 25, 2018). The teacher suggested that at the end of the program, students learn how to speak positively about personal effort and control for negative emotions.

The teacher's comment about managing student's negative emotions such as fear, aligns with Bandura's (2006) self-efficacy framework. Bandura agreed that developing coping strategies to deal with risky situations help individuals manage situations in times of anxiety. Also, Soni (2015) would agree, since they found that adults can emotionally support, motivate, and challenge middle school students who experience negative emotional barriers through the use of intrinsic methods, including self-efficacy talks. Xu

(2013) noted that teachers and adult-caregivers should monitor the strategies students choose to motivate achievement and promoted the use of reassuring self-efficacy talks.

The role of caring relationships. One theme that relates to increasing students' self-efficacy beliefs not identified by the *a priori* expectations outlined in Bandura's theory is the role of caring relationships. The teacher-mentor stressed on the importance of trust and care among the families in supporting children's attitude toward achieving personal goals. These relationships are forged through "Facebook, which connects families in ways that an email wouldn't, ordinarily" (James). The teacher is convinced that this close bond reinforces children's motivation, as "families sometimes meet up outside of [ASM] to provide support to one another." Such partnerships help children accomplish personal goals. In other cases, the teacher is invited to and sometimes attends school-related activities to support children who work arduously to succeed at accomplishing academic goals.

The teacher-mentor believes that caring relationships fosters achievement outcomes among students, however, there is one limitation. The teacher-mentor, James, who is also the designer of ASM, lacks the resources necessary for correctly identifying hired help that would prove to be a good fit for the program. Hired help will allow for more time to capitalize on the latent positive effects of caring relationships on raising children's self-efficacy beliefs. ASM is James and James is ASM. This model is not sustainable in the long-run. Learning to "let go a little of the reins" and accept "hired help" is becoming more necessary to allow more time for exploring the latent benefits of forging caring relationships with families. The teacher-mentor suggested that the genuine

care expressed for each child and time invested in creating strong communication

bonds between adult-caregivers and the teacher-mentor may be linked to improved self-

efficacy even after program participation.

The association between self-efficacy and peer and family support among middle

schoolers exist in the literature. Martinez et al. (2017) conducted an analysis of a 10-week

after school program aimed at improving the health and well-being of middle school

students. Survey findings from participants revealed that the caring relationship between

students and facilitators was an important factor for motivating higher levels of student

engagement. Likewise, Bagci (2018) conducted a correlation study with 319 children in

sixth, seventh and eighth grades. Middle school participants completed a 40-minute

questionnaire during classroom hours. The findings showed that academic self-efficacy

and perceived support from family related positively to student motivation. In the next

section, I triangulated the feedback from the teacher-mentor on the changes in children's

self-efficacy from the perception of adult-caregivers.

RQ3: From the perspective of adult-caregivers what changes in children's self-efficacy, if any, are apparent?

A total of 10 adult-caregivers were invited to participate in the study. However,

only six adult-caregivers volunteered to be interviewed during follow-up calls, five

females, and one male. Five out of six adult-caregivers who agreed to be part of the study

identified themselves as having a Caucasian background, one caregiver chose not to

identify. Three adult-caregivers held university degrees, two held college diplomas, and

one adult caregiver held a post-secondary trade certification. Adult-caregivers possessed

occupations in educational services, healthcare, financial services, construction, as well

as other support services. All caregivers were over the age of 41 and had at least two

children under their care, with one child enrolled in ASM. Adult-caregivers learned about

the program through Facebook, referrals from friends, or marketing materials. All

children in the program live or attend a school no more than 10 minutes drive away from

the program's site. The third evaluation question asked, "From the perspective of adult-

caregivers, what changes in students' self-efficacy, if any, are apparent?"

Participants experience mastery transformation. The first theme that related to

changes in self-efficacy is children's mastery experience transformation according to

adult-caregivers. Caregivers noted that their decision to enroll their child into ASM was

based on the unique learning experiences ASMs curriculum offered. Since

"extracurricular activities at [ASM] depart from the traditional learning offered in the

public schools" (Parent 1) children have opportunities to master authentic learning

experiences. Other adult-caregivers agreed, noting that on-site and off-site activities

piqued children's natural curiosity (Parent 3) in a "fun way" (Parent 4) to motivate

mastery transformation. Moreover, ASM has become even more critical now at a time

when teachers in the province are on strike (working to rule). According to one parent,

ASM activities allow children the opportunity to make decisions and practice skills

needed to gain mastery experiences, a current gap in the traditional school system:

> Teachers are only doing what's on their job description, and not a lot of the extras.
>
> Today, they are still without an agreement, and our kid's learning is
>
> suffering…However, ASM allows kids to experiment with what it would be like

to …be on the radio and now apparently, the kids are going to have their own

radio show. Also having the opportunity to train with the choir, practice at home,

and then perform at the graduation ceremony showed how the children came

together and worked to achieve those very specific goals (Parent 2).

The evidence suggests that the experiences gained at ASM help students succeed at goals

and build a robust sense of self-efficacy.

Another parent noted that her daughter became more aware of things around her,

and has found a new passion for learning:

She has gotten a good basis at [ASM]. A few weeks ago she said to me that she

wanted to learn all about apples. That led to a trip to the library. Now, every day, I

buy her a different type of apple and she is discovering differences in [how

apples] taste, feel, and look. I want her to keep that quest for learning. Especially,

at school with her science projects. (Parent 3)

Adult-caregivers generally felt that after ASM, children experienced a new zeal for

learning and confidence for pursuing passions. The evidence suggested that the

experiences mastered during program sessions helped children succeed at personal goals

and achieve a higher sense of self-efficacy.

Adult-caregivers believed that experiences at ASM provided children with a

greater desire to become even more self-disciplined in setting and achieving personal

goals. For instance, one parent indicated that at first, singing was only a hobby for her

daughter. Having gone through the more structured experience of attending choir training

at ASM and personal practice in order to prepare for the final performance at the Closing

Ceremony, there was a change in attitude. " She never liked going, but it became one of the more favorite sessions" (Parent 2). Another parent reflected, "the program has brought about a certain sense of independence [to my daughter] and time management [skills]. She's out the door on time every morning without much prompting from me. That seems to relate to how well the sessions are timed at ASM" (Parent 5). The evidence suggests that children became more self-disciplined in their personal lives after program participation.

  Participants observe modeled standards. The second theme that relates to changes in children's self-efficacy after program participation is the modeled standards of excellence (vicarious experience). Adult-caregivers discovered through this study that the lead teacher's role was much larger than first anticipated. "It has turned out to be much more than supplemental in many key regards…James is a role model" (Parent 1). Adults appreciated the small groups at ASM. "The teacher to student ratio is also appropriate" (Parent 1) and adds to its effectiveness in transforming students' attitudes.

  Adult-caregivers felt the ASM experience pushed children "outside of their comfort zone of personal interests" (Parent 2) to include externally motivated tasks through modeled behavior. Children not only pursue personal interest but also learn other life-long skills. For example, going to a restaurant to practice table etiquette. "Sometimes, I'm rushing out the door. You don't notice that you don't sit down to eat at the table. [My daughter] is taking the time to speak properly, set the table and is even asking to spend more time with me over dinner. That was a big change for me, as a mother" (Parent 6). In this instance, the evidence implies that table etiquette modeled as part of ASMs

curriculum made having dinner with family a more enjoyable everyday experience. ASMs uniquely organized activities improved children's' perception of their ability to make positive changes in their personal life.

The lead-teacher, described as a role model for children by adult-caregivers, is someone who adult-caregivers would want their kids to be influenced. "Every experience at ASM is way beyond what you'll expect…teaching our kids the right things, giving them good morals, and teaching them how to treat people" (Parent 2). This parent went on to explain:

> Previously, [my daughter] was helping me [serve] coffee at our church during a social event and a homeless man walked in… at the end of the night, [my daughter] said, mummy make sure you get this one in the dishwasher, the homeless man had his lips on them. WOW I was furious. The following week, [ASM] had a planned visit to homeless shelter. I was so nervous. (Parent 2)

After the visit to the not for profit shelter, children learned more about the people who lived there and the important role volunteerism plays in the community. "[My daughter] came back from that trip excited, talking about a woman who formerly lived at the shelter, but returned to say thanks after having found a job and new apartment" (Parent 2). This parent felt relieved that the experience had a positive outcome on her daughter's attitude toward individuals facing financial hardship. "It was important to teach kids how to give back to the community through volunteering" (Parent 3).

Having the lead-teacher incorporate volunteering time with charitable organizations helped [kids] become more empathetic to the situation of others" (Parent

2). The evidence suggests that adult-caregivers thought children were positively influenced by the teacher-mentor and improved children's perception of their ability to turn negative situations into positive experiences by taking action (for example volunteerism). Also, pursuing personal interest as well as other life-long skills observed during ASM (e.g., Setting the dinner table) makes for a more enjoyable everyday experience with family.

Also, writing to pen pals in three different continents (pen pals are the kids of the lead teacher's old pen pals as a child) - France, South Africa, and South Asia- not only gave ASM kids the opportunity to practice writing skills, but also learn about other people from other cultures" (Parent 2). " It taught [her] how to appreciate diversity, showed her cultures and people who are different to us" (Parent 3). Adult-caregivers unanimously felt that the lead teacher played a pivotal role in delivering the program's goal of increasing personal self-efficacy through being a role model from whom the children can learn. The evidence suggests that ASM increases children's awareness of the world around them, and allows them to seek out learning opportunities.

Participants receive regular feedback. The third theme that relates to changes in children's self-efficacy after program participation is the role of ongoing feedback through one-on-one mentoring. "The [lead teacher] holds [ASM] kids to higher standards and is not afraid to provide constructive feedback that will challenge kids to be better" (Parent 2). Adults believed children had the opportunity to meet other like-minded children in the program and receive one-on-one feedback through mentoring to support their self-efficacy beliefs. A display of well-behaved, self-disciplined children was

observed during a parent accompanied bus ride to an off-site visit: "Have you been on an ASM bus before? The [transformation in children's] behavior is amazing" (Parent 2). The evidence suggests that regular feedback supports positive behavior changes in children.

Adult-caregivers also noticed the positive influence of one-on-one mentoring with the lead teacher-mentor on children's perception about themselves. After the program, some children appeared to become "more assertive and outgoing" (Parent 4). For example, children may still feel nervous during public speaking presentations, however, the biggest difference seen is children not shying away from delivering presentations. "[Public speaking] is a skill that will become more important as she goes into high school" (Parent 4). Another parent noticed increased confidence in her child's personal decisions:

Initially, [she] did not like [ASM], now, she has really opened up. She's coming out of her shell, and is not as anxious about meeting or talking to new people. She enjoyed going to [ASM] and has had an overall positive experience" (Parent 3).

The social environment at ASM supports students' self-efficacy beliefs, leaving them more confident in their decisions.

In a warm environment, students experience sense of belongingness. The findings suggests that ASM provides students with a safe space to develop personal skills with supportive feedback from the lead teacher and peers. It is a space that is "more acceptable to be oneself… than at school" (Parent 4). Children can "have [personal] opinions there

[ASM]" (Parent 6). The evidence suggests ASM provides students with a safe environment to give and receive feedback.

Participants experience emotional transformation. The fourth theme that relates to changes in children's self-efficacy after program participation is associated with learning to control for negative emotional barriers. Children seem to show marked improvements in managing emotions. For example, learning to "express [oneself] openly, and calmly." Some adult-caregivers suggested that children were experiencing "a lot of anxiety" (Parent 3) and negative environment pressures at school (Parent 5), leading to excessive shyness and misguided choices. ASM seemed to have provided children with supplemental emotional support.

Other adult-caregivers noted that children who struggled previously with negative emotions experienced remarkable transformations. My daughter would say things like "I can't do this" or "I am no good at that" (Parent 5). Another felt like the child was being "super self-conscious" and "extremely hard on [her]self" (Parent 6). Yet another parent noted that their child simply "refused to try new things" (Parent 4). However, since attending the program, adult-caregivers believed that these negative emotions have become more controlled and there was a general sense that children felt empowered to do anything they put their minds to by using positive self-talks. "She now corrects herself after realizing that she made a negative pronouncement about [her]self and turns it around to a positive statement. I think that is [a] telling [transformation]" (Parent 5). For instance, "she is willing to try new experiences, and give it her best" (Parent 4). The above evidence suggests that at the end of the program, children learn how to control for

negative emotions and become bold when undertaking uncomfortable situations but using positive self-talks.

As predicted, the qualitative findings from adult-caregivers are consistent with children's self-efficacy scores from the Children's Hope Scale. Many of the adult-caregivers felt like their child's self-confidence to reach for and achieve goals was mostly high before program participation. However, after program participation, adult-caregivers believed children's sense of self-efficacy grew even stronger. ASM experiences allowed children to "open up [their] minds to the number of possibilities in the real world and to never be afraid to reach for even higher goals" (Parent 1). Another parent thought that experiences at ASM enhanced what was already there: "it solidified his attitude and kept him on the trajectory we hoped for" (Parent 1). The close relationships developed as a result of program participation supported students' self-efficacy beliefs.

The role of caring relationships. The ASM program fostered caring relationships among primary stakeholders, including students, adult-caregivers and the teacher-mentor. The kids "hang out at each other" (Parent 4) outside of program hours at school and play dates. One parent saw close friendships developing between kids in the program. " She has formed a bond with a younger girl, who's a couple years younger than her, where prior to [ASM] she would never had, it seems to be a safe environment for kids to connect without judgement" (Parent 3).

The individual families also seemed to have bonded together in a special way. The adult-caregivers were able to connect through Facebook and learn more about each

other. One parent was fascinated with the way one family approached homeschooling their kids:

> If it were not for this program, we would not have met these people. Just being in their home, and given a tour was incredible. I have never seen the home of a parent who homeschools their kids. I think they do a fantastic job, it was interesting for [my son] to see how they've set up their home and life uniquely. That opened up [my son's] eyes and in some ways, mines too.

ASM not only builds relationships between families and their kids, but also between children and the lead teacher.

Another parent described the relationship between the children and the lead teacher as especially unique. This parent felt that the lead teacher is very skilled at bringing relationships around:

> When starting the program, [my daughter] did not want to follow one of the rules. Things got a bit tense, and me and her father were called in to a meeting. But then, everything was out in the open, and from then on, everything was fine. It seems like something to me…because for me, I would have been, that's it! I hate that teacher! . . . But they've gotten closer to each other. That experience taught [my daughter] a good example of how to deal with difficult situations (Parent 2).

The caring relationships developed during the program seemed pivotal to the high value adult-caregivers place on the program. Future research is necessary to investigate the positive effects of caring relationships on the motivational outcomes related to children's self-efficacy beliefs at ASM.

Evidence of Quality

The criteria used to ensure the quality of this evaluation study followed the evaluation standards developed by the Joint Committee on Standards for Educational Evaluation (JCSEE). The application of the evaluation standards enhanced qualitative and quantitative data analysis through the use of the utility, feasibility, propriety, accuracy, and accountability standards (Worthen, Sanders, & Fitzpatrick, 1996). Member checking, triangulation, data saturation, peer review, rich thick descriptions, and clarification of researcher bias were the key techniques used to address quality concerns.

Member-checking techniques employed during one-on-one interviews with adult-caregivers and teacher-mentor ensured the accuracy of the data collected. For instance, following up with the lead-teacher on the accuracy of the recorded experience during the initial face-to-face interview allowed for greater clarity. Also, including thick descriptions added depth to the study's findings and provided reliable information (dependability) that may inform future research. Although the results cannot be generalized to larger populations due to the small sample size ($n <30$), providing enough description to add context to the research situation supported transferability, thereby achieving external validity.

Triangulation, achieved through the use of multiple data sources, provided reconfirming evidence of the study's findings, as quantitative analysis corroborated qualitative evidence. The reexamination of descriptive codes in interview data provided confirming evidence of participants' experiences and the program's role in motivating higher self-efficacy in students. While confirming data provided deeper insight into

conclusions drawn, discrepant data that stem from the open codes suggested the need

for further research to clarify findings and determine implications for the ASM program.

I used a similar approach to Booth et al. (2013) to reflect and report the unique findings.

Summary of Findings

The research literature indicates that self-efficacy among middle-schoolers is a

meaningful topic in the education discipline (Lee et al., 2014; Lofgran et al., 2015;

Madjar & Chohat 2016) and there is need to evaluate curricula that aim to improve self-

efficacy. This outcome-based program evaluation investigated whether ASM works to

increase students' self-efficacy. The findings showed the patterns, relationships, and

themes supported by the data.

Using both a quantitative and qualitative approach to data analysis, the findings

revealed that children on average had high levels of self-efficacy prior to program

participation. Comparison of mean scores before and after program participation did not

show remarkable differences. However, data analysis of interview data indicated that

children who are more reserved at the start of the program experienced the largest

increase in self-efficacy beliefs. Consistent with Bandura's (2006) self-efficacy theory,

participants' experience included enactive mastery through public speaking training,

vicarious experience through modeled expectations such as volunteering, verbal

persuasion through regular quality feedback, and learning how to manage negative

emotions such as anxiety or fear through self-efficacy talks (physiological arousal).

Mastery experience allows students to succeed at goals and build a robust sense of

self-efficacy. According to the teacher-mentor, mastery transformation in children who

entered the program as shy or full of anxiety is especially pronounced during the public speaking presentation. Adult-caregivers agreed that ASM activities allowed children the opportunity to make decisions and practice skills needed to achieve set goals, for instance, performing at the graduation ceremony and re-discovering a zeal for learning .

Two aspects of the program experiences that fell outside of *a priori* expectations included the role of non-verbal feedback and caring relationships in supporting children's self-efficacy. In addition to verbal feedback, the ASM program uses four other "love languages" to communicate with children in a manner that has personal meaning to them, including acts of service, gifts, quality time, and affection. Also, the close and caring relationships formed among the teacher-mentor, students, adult-caregivers, and their community departs from the *a priori* expectations outlined by Bandura. Martinez et al. (2017) found that the caring relationship between students and teachers facilitated increased academic self-efficacy. Experiences are reinforced at home due to the strong relationship network, bringing about positive change in children's day to day life. After program participation, adult-caregivers felt children's sense of self-efficacy increased as a result of the experiences at ASM.

Adult-caregivers discovered through this study that the teacher-mentor's role in raising children's self-efficacy as "special" and "unique." The lead teacher held ASM kids to high standards and was not afraid to provide constructive feedback that challenged them to be better. Adult-caregivers felt the children's experiences allowed them to consider alternative avenues for achieving different goals. The teacher-mentor motivated students to accomplish higher goals, pushing kids outside of their comfort

zones of "personal interests" to include life skills. Adult-caregivers felt ASM was successful in helping to support children's self-confidence to pursue passions and awaken their zeal for learning (self-efficacy). Adult-caregivers indicated ASM has been an overall pleasant experience for both adult-caregivers and children, with no reported drawbacks to children as a result of program participation. One area worth considering is making such a program available to all students. Adult-caregivers felt the price attached to the privately offered program limits accessibility to those from lower socioeconomic backgrounds.

The next section describes the product of the outcome-based evaluation study. The purpose of this study was to determine ASMs role in motivating higher self-efficacy in students, along with identifying the program's strengths and weakness as perceived by stakeholders. The project study will be a program evaluation report that provides information about the value of ASM in increasing self-efficacy in middle school students. The project begins with an introduction, followed by the rationale behind the type of project and a review of the literature to guide the development of the project.

Section 3: The Project

Introduction

The project study consists of a program evaluation report on the formal appraisal of ASM. This privately owned, 10-week, after-school curriculum aims to improve self-efficacy beliefs in middle school students. The formal evaluation curricula and programs designed to improve self-efficacy is necessary (Hushman & Marley, 2015; Winnaar et al., 2015; Fernández-Díaz et al., 2017) to provide a clear judgement on the value of the program to stakeholders (Worthen et al.,1996). In an outcome-based evaluation, I compared students' self-efficacy before and after program participation. In addition, I interviewed adult-caregivers and the lead teacher about whether ASM works to increase self-efficacy beliefs in students. The primary goal of the program evaluation report is to communicate the findings from the outcome-based evaluation of ASM and suggest recommendations for program improvements (Patton et al., 2016). The format of the program evaluation report is as follows.

I begin the program evaluation report with an introduction, followed by a brief description of the purpose of the report, and the problem statement. I then present an overview of the study's outcome-based evaluation. I provide references to support the interpretation of data and along with recommendations for program improvements resulting from the findings of the outcome evaluation (Worthen et al., 1996). The program evaluation report was written clearly and succinctly to a target audience (Worthen et al., 1996; Patton et al., 2016) of curriculum writers and school leaders who affect the design, implementation and evaluation of innovative self-efficacy curricula.

This evaluation report will provide school leaders with the findings from the outcome-based evaluation, allowing education professionals to draw some conclusion regarding the value of ASM in raising self-efficacy beliefs in middle-school children.

Rationale

Despite curriculum development designed to improve students' self-efficacy (Nova Scotia Education and Early Childhood Development, 2013), a recent survey of more than 19,000 educational stakeholders in Nova Scotia (Nova Scotia Education and Early Childhood Development, 2015) revealed that most middle-school students are still perceived to have low self-efficacy. Primary stakeholders, including policy makers and school officials, should work to provide a suitable curriculum for supporting self-efficacy beliefs in children. One practical shortcoming, however, is the lack of formal evaluations of curricula that aim to improve self-efficacy. The evaluation of the ASM self-efficacy curriculum was necessary to determine its success in strengthening students' self-efficacy beliefs, along with any other possible benefits and drawbacks of program participation.

After-school programs should occasionally examine the needs of participants as well as the factors that enable and hinder the achievement of program goals. A program evaluation report is a highly effective approach to communicate the findings of the outcome-based evaluation to key educational stakeholders (Worthen et al., 1996; Little, 2014; Patton et al., 2016). The language is written for an audience of curriculum writers and school leaders to understand. Therefore, the program evaluation report provides education stakeholders with clear, logical conclusions and recommendations based on the evaluation findings, with scholarly support from the research literature.

Review of the Literature

My purpose in this section literature review is to present a scholarly overview of literature related to the genre of the chosen project as well as the recommendations presented in the program evaluation report. In this review, I take into account the data analysis in Section 2 and conduct a critical examination of how theory and research support the content of this project, a program evaluation report. Various combinations of search terms, including *self-efficacy*, *after school*, *evaluation*, and *middle school* yielded more than 100 journal articles using the Google Scholar search engine and multiple databases, including Education Research Complete, Thoreau, and ERIC at the Walden University Library.

The importance of the program evaluation report. A program evaluation report can help to relate information to stakeholders on aspects for program improvement and can inform future program decisions. The core purpose of the evaluation report is to communicate evaluation findings (Worthen et al., 1996; Little, 2014; Patton et al., 2016). Several authors suggested a number of forms in which this communication might occur. For instance, evaluation reports that facilitate individual learning include short communications such as memos and e-mail reports; scheduled and unscheduled interim or progress reports, and final written reports such as executive summaries, newsletters, and website communications (Torres, Preskill, & Piontek, 1996; Worthen et al., 1996). Other forms of communication facilitate interactive group learning, including verbal presentations, posters or photo essays, poetry, drama, film, or video reports (Torres et al., 1996; Worthen et al., 1996). Evaluation reports can be useful tool for providing evidence

for the continued existence of a program, creating awareness of program successes and promoting sustainability (Karahan et al., 2015; Salerno et al., 2015; Gaylor & Nicol, 2016; Jarpe-Ratner et al., 2016).

In the first instance, the evaluation report can help determine what works and what does not work. The program evaluation genre was shown to be an appropriate for student programs through Jarpe-Ratner et al. (2016). Jarpe-Ratner et al. conducted a quasi-experimental outcome-based program evaluation of a 10-week after school program. The cooking and nutrient education program offered 271 students in Grades 3 through 8 an opportunity to increase healthy consumption choices. Pre-post survey results analyzed through t-tests showed a significant ($p < 0.5$) increase in nutrient knowledge, cooking self-efficacy, and vegetable consumption after. After only 10 weeks of participation, 2 hours per week, the transfer of knowledge led to positive behavior change in middle-school children. The students who participated in this study come from a low socioeconomic background, and as such it is uncertain whether the results will apply to students from a higher socioeconomic standing. These findings highlight is need to consider the socioeconomic backgrounds of participants, because it is uncertain whether the evaluation findings from participants with higher socioeconimics standings will apply to students from a lower socioeconomic backgrounds. Therefore, the program evaluation report is effective in building awareness and providing a basis for asking further questions regarding what works and what may not work.

In the second instance, an evaluation report can help showcase the success of programs to stakeholders. Salerno et al. (2015) used an evaluation study to measure the

extent to which adult training was successful in supporting children's behavioral outcomes. This study revealed that knowledgeable, skilled, and confident adults can be an effective means to support children. Similar to the present project, the authors presented descriptive statistics of pre-post assessment to measure the success of 3 training sessions for adults ($n = 52$) aimed at improving their knowledge, skill, and self-efficacy in effectively mentoring youth. The outcomes were positive and significant ($p < .05$). In this study, I provided a practical application of conducting program evaluations to determine program outcomes that facilitate sustained growth and improvement for program participants.

In the third instance, the evaluation report can increase the program's capacity to conduct critical self-assessments for future planning. Karahan et al. (2015) internally triangulated data by conducting semi-formal interviews with multiple persons, which adds to the credibility of the evaluation report conclusions. Gaylor and Nicol (2016) also used a mixture of classroom assignments, curriculum documents, interviews, and t-test analysis of pre-post self-efficacy scores to determine program outcomes. Similarly, in the current outcome-based evaluation study, I used a mixed-method research design by triangulating secondary survey data from students' self-efficacy scores before and after program participation, with primary data from the teacher and parent interviews. As a result, the evaluation report demonstrates accountable findings from the appraisal of ASM that can inform future program decisions.

How the program genre addresses the study's problem. This project genre addresses the problem of a lack of formal program evaluations. The primary goal of the

program evaluation report is to communicate the findings from the formal appraisal of ASM and suggest recommendations for program improvements (Worthen et al., 1996; Little, 2014; Patton et al., 2016). In the evaluation report, I summarize the findings from the outcome-based evaluation and provided evidence from the literature that support program recommendations. This program evaluation report would not be possible without first conducting a formal evaluation of ASMs self-efficacy curriculum.

The evaluation of curricula aimed at improving children's self–efficacy is important. Low self-efficacy among middle-school students continues to be a contentious topic within the educational discipline (Lee et al., 2014; Lofgran et al., 2015; Madjar & Chohat 2016) because students' self-efficacy beliefs positively relate to academic success (Hwang et al., 2016; Ker, 2016; Lucio et al., 2012; Mann, 2013). One practical shortcoming, however, is the lack of formal evaluations of self-efficacy curricula. Researchers such as Hushman and Marley (2015), Winnaar et al. (2015), and Fernández-Díaz et al. (2017) have called on educational policy makers to examine innovative curricula and programs designed to improve self-efficacy beliefs in students. The formal evaluation of ASM fills a current gap in practice, namely, the assessment of an innovative curriculum that aims to improve self-efficacy in middle-school students. Therefore, the program evaluation report indirectly addresses the problem of a lack of formal evaluations of self-efficacy curricula.

The criteria used to develop the project. The final program evaluation report is the single, most transparent document that details information about the program, stakeholders, evaluation design, activities, results and recommendations. Worthen et al.

(1996) suggested an outline for a well-written, comprehensive evaluation report. The generic table of contents include but is not limited to, ". . . an introduction to the report, focus of the evaluation, overview of the evaluation plan and procedures, presentation of evaluation results, conclusions, and recommendations" (Worthen et al., 1996, p. 414). The program evaluation report was written to a target audience (Worthen et al., 1996; Patton et al., 2016) of curriculum writers and school leaders who affect the design, implementation and evaluation of innovative self-efficacy curricula. This evaluation will provide school leaders with the study's findings regarding the value of ASM in raising self-efficacy beliefs in children.

I designed the report to include a brief description of the purpose of the report and the problem statement in the introduction. According to Worthen et al. (1996), the introduction should outline the purpose of the report. I then present an overview of the study's outcome-based evaluation. Based on Worthen et al. (1996) recommendation, I also presented an overview of the evaluation, including the evaluation questions. The presentation of the results and their meaning provided clear interpretations of the qualitative and quantitative evaluative findings. The conclusion was organized under the headings of "key strengths" and "areas for growth." Worthen et al. (1996) noted several advantages to this approach, including providing a balanced presentation of both positive and negative judgements (p. 418). Finally, I included scholarly literature to support logically sound recommendations based on the findings of the outcome evaluation.

Evidence supporting the Recommendation in the Evaluation Report

A major part of the program evaluation report is the judgements formed about the outcome-based evaluation findings. According to Worthen et al. (1996), recommendations are typically contained in any well-written evaluation reports and is the key responsibility of the evaluator. The recommendations provided in Appendix A are as a direct result of the findings of the outcome-based evaluation. My purpose in this section is to present a thorough, critical, and interconnected analysis of how theory and research support the content of the project recommendations, based on the findings from Section 2.

The evaluation findings, detailed in Section 2, suggested that ASM children on average had high levels of self-efficacy prior to program participation. Consistent with Bandura's theory, participant experience included enactive mastery through public speaking training, vicarious experience through modeled expectations, verbal persuasion through regular quality feedback, and learning how to manage negative emotions such as anxiety or fear using self-efficacy talks (physiological arousal). Two aspects of the program experiences that fell outside of these *a priori* expectations included the use of the four "love languages" to communicate with children in a meaningful manner and the role of caring relationships in supporting children's self-efficacy. Although there were no reported drawbacks to program participation, adult-caregivers believed the price attached to the privately offered program limits accessibility to those from lower socioeconomic backgrounds. In the project, I make three main recommendations. First, the need to implement a school-based curriculum to increase program availability to all children for

as long as they need, secondly, incorporate peer-on-peer mentoring to support children's self-efficacy, and finally implement ongoing evaluations of ASM. In the following section, I present the scholarly rationale behind these recommendations.

Recommendation 1: Implementing a School-Based Self-Efficacy Curricula

A school-based self-efficacy curricula may work to increase program availability to children who experience low self-efficacy. Increasing self-efficacy is an important topic relating to children's educational development (Hwang et al., 2016; Ker, 2016; Lucio et al., 2012; Mann, 2013). Several studies in the field of education support school-based intervention strategies to improve self-efficacy using Bandura's theory, namely, mastery experience (enactive attainment), modeling of tasks (vicarious experience), ongoing feedback (verbal persuasion), and managing negative emotional stimulus (physiological arousal) (Gillen-O'Neel, Huynh, & Fuligni, 2013; Tas et al., 2014; Bulanda, Tellis, & Tyson McCrea, 2015; Martinez et al., 2017). A school-based ASM self-efficacy curriculum may have benefits to children.

Encouraging students to engage in self-regulated learning produces mastery experience that promotes self-efficacy. According to Green, Bean, and Peterson (2013), self-regulatory learning contributed to a high sense of self-efficacy in students, and was the foundation of achievement motivation in the study subjects. Thus, homework remains one forum in which students learn how to master strategies and skills taught in school, including reading, watching good TV programs, or writing about their experiences. Self-guided learning experiences, as well as other reflective activities, pique children's natural curiosity, leading to learning (Tas et al., 2014). ASMs curricula can be used to create

school-based reflective activities that enhance students' mastery experience and achievement motive. Correctly incorporating activities as a part of self-regulated learning can lead to the positive development of self-efficacy beliefs in individuals in a school-based setting.

Self-regulated learning helps students' develop the discipline of setting and achieving personal goals in a school setting. ASM uses similar strategies when building students' self-efficacy through mastery experiences. For example, in a longitudinal study on how daily choices affected adolescents in grades 9-12, Gillen-O'Neel, Huynh, and Fuligni (2013) found that studying consistently on school days helps reduce extra nights of studying, and an associated decrease in academic functioning the next day, especially in grade 12. Studying daily provides young learners with a structure for building good habits by increasing self-efficacy through mastery experiences. Kronholz (2014) presented an educational case in which students outperformed 40 countries in the 2012 Program for International Student Assessment (PISA). The author noted during interviews with students that 5th graders can be assigned up to 90 minutes a day of homework. The enthusiasm for deep learning through mastering homework assignments challenged students who want more than what regular schools provided. This research provides insight into how alternative school models can stimulate students' self-efficacy beliefs to achieve at high levels through mastery experiences in a school setting.

School teachers who model tasks to students help develop a stronger sense of self-efficacy. The positive effect of mentoring on students' self-efficacy beliefs is noted in the literature. Biggs, Musewe, and Harvey (2014) evaluated the impact of adult mentoring on

Black, under-resourced, urban, middle-grade students' self-efficacy levels (grades 6-8).

The results revealed that adult mentoring affected the academic performance of the study

subjects, in the subject of reading. The researchers suggested the need to look more

closely at the measured impact of school mentoring projects aimed at promoting self-

efficacy through the use of scientific measures.

Regular teacher feedback is key to increasing self-efficacy. Bulanda, Tellis, and

Tyson McCrea (2015) conducted an outcome-based evaluation of the after-school

program, *Stand up! Help out*! (SUHO). Participants were aged 14 to 18 years. This

school-based curricula that incorporated regular teacher feedback improved the attitudes

in children living in a disadvantaged, high-crime community in southern Chicago. Using

133 interviews between 2008 and 2011 and a focus group session of 6 SUHO members,

results showed that one aspect of mentoring appreciated by the study subjects was the

care and compassion demonstrated through the supportive feedback of teacher-mentors.

This study also provided insight into one aspect of one-on-one mentoring deemed

essential to changing attitudes in youth: regular feedback. The profound sense of

connectedness that results from regular feedback lent itself to improved self-efficacy.

Regular feedback resulting from the completion of homework supports students'

self-efficacy beliefs. The Department of Nova Scotia Education and Early Childhood

Development (2015) noted that self-efficacy is important for motivating students to

complete homework and improve learning in schools. Tas et al. (2014) agreed, noting in

a survey of 168 middle school teachers that homework (work performed after school

hours) was found to be a means of providing feedback that supported self-efficacy

beliefs. Homework facilitated open communication with adult-caregivers and this communication improved homework completion rates. Here, homework contributed to students practicing skills taught in class, prepared students for the next lesson, increased participation, contributed to personal development (e.g., time management techniques), facilitated parent /teacher communication, completed policy requirements, and supported student interaction with each other. The positive outcomes associated with providing regular homework feedback may point to the role of a school-based self-efficacy curricula in boosting student's confidence to pursue and achieve goals. Overcoming negative emotional barriers raises self-efficacy in children.

Children can learn how to overcome negative emotional barriers that reduce self-efficacy. Xu (2013) called on school teachers to monitor the strategies students choose to motivate achievement and promoted the use of intrinsic strategies such as reassuring themselves through self-efficacy talks. School teachers can emotionally support and challenge students to overcome negative emotional barriers to self-efficacy. Since students spend a significant portion of their day in a school setting, it is important to consider how self-efficacy curricula may look in a school classroom. If the evaluation study revealed that ASMs curriculum and instructional design is beneficial to improving self-efficacy, policy makers may wish to consider the possibility of using ASM as a model curriculum in a school-based setting. In one case study, Soni (2015) explored the educational role of a school-based adult mentor in emotionally supporting, motivating, managing, and challenging middle school students who experience barriers to learning such as low self-efficacy. The findings from (a) focus group discussions with six learning

mentors, (b) sixteen written attendance scripts and content supervision sessions with ten mentors, and (c) qualitative and quantitative data from questionnaires, suggested that mentoring encourages the educative sharing of ideas and best practice (education function) that is child-centered and provides solution-focused help (supportive function) for students.

In an evaluation, Cook-Cottone et al., (2017) measured the outcomes of a customized, yoga-based efficacy program targeted toward middle school females. Sessions, conducted once a week for 90 minutes, extended for a 14-week period. The authors divided 132 fifth grade girls who volunteered to participate into a control group ($n = 40$) and treatment group ($n = 92$). The authors used ANCOVA modeling to examine pre-post survey results. The intervention yielded a significant increase in self-care behavior (including nutritional eating, hydrating exercising, completing homework, and building healthy friendships) among those who participated in the program when compared to the control group. This study showed strength in the use of a scientific approach to measure outcomes, however, a lack of randomization in the selection process, and the female only sample limited the generalization of results. The authors also noted the limited use of a customized program, as the effects of such a program are small in a universal setting. This outcome is particularly interesting as I consider program recommendations for ASM. Perhaps a more generalized, school-based intervention may be more useful for improving self-efficacy in children.

Recommendation 2: Implementing Peer-on-Peer Mentoring

Mentors who model positive behavioral traits and provide ongoing verbal support to overcome self-doubt and other self-efficacy barriers can be effective in transforming the beliefs of students toward a more positive and self-fulfilling attitude. Recent studies present the role of a mentor as critical to supporting children's holistic development (Strapp et al., 2014 & Goddard et al., 2015). Mentors assist students in improving efficacy by setting goals, sustaining motivation, building self-regulating skills, and overcoming negative emotional barriers. However, mentors come in various forms, such as teacher-mentors, community mentors, and peer mentors. Each type of mentor can play a critical part in supporting students' self-efficacy beliefs and is key for my recommendation for introducing peer-led mentors to ASMs curriculum structure as a possible continuation strategy for the longevity of ASM.

Role of adult teacher-mentors. Adult mentoring emphasizes the role that teachers play in a collaborative learning environment. In the present study's context, this would mean that it is the responsibility of teacher-mentor to help learners set high goals, see the big picture of mastering all skills necessary for sustainable learning, and discover how small achievements inspires future pursuits (Fruiht and Wray-Lake, 2013). Based on recent findings, Carr (2013) suggested that teacher-mentors can help students set goals, sustaining motivation, and evaluate outcomes. This can be done through the integration of self-regulating skills into the curriculum. Strategies presented by Carr (2013) can play a vital role in overcoming negative emotional stimulus and motivating increased self-efficacy beliefs children.

Teacher-mentors play an important role in delivering a curriculum with potentially positive outcomes for students. Goddard, Goddard, Sook Kim, and Miller (2015) found that teacher interaction promotes positive learning experiences in students. In a supportive environment, students can discover how to process their individual beliefs and reassess situations from diverse standpoints (Fruiht and Wray-Lake, 2013). Balakrishnan and Narvaez (2016) maintained that adults could use the zone of proximal development as a tool to motivate students' self-efficacy. Scaffolding activities provide steps for learners' to acquire necessary skills that build self-efficacy.

Scaffolding techniques are a good approach to promoting self-efficacy in children. The study by Green, Bean, and Peterson (2013) offered support for the proactive promotion of student motivation and mastery of skills outlined in the curriculum through self-regulatory routine. In a longitudinal assessment, the authors illustrated how procedural schemata (scaffolding activities) developed through hours of practice favorably supported students' self-efficacy belief to achieve and deep learning, resulting in better transfer to a variety of real work contexts. The findings support current learning theories that use scaffolding activities to encourage deep learning and help students apply concepts to real-world situations.

Other researchers agree that teacher-mentors can support childrens' self-efficacy beliefs. Recent studies show the role of a teacher-mentor as critical to supporting children's holistic development (Strapp et al., 2014 & Goddard et al., 2015). Teacher-mentors assist students in improving efficacy by setting goals, sustaining motivation, building self-regulating skills, and overcoming negative emotional barriers. Research

conducted by Zhbanova, Rule, and Stichter (2015) showed the development of curricula that utilizes differentiated instruction to improve students' self-efficacy. Other researcher highlighted six categories of classroom group interactions using the Team Interaction Observation Protocol (TIOP), namely, task-oriented (focusing team discussions, tasks, giving direction), response-oriented (sharing of ideas), learning-oriented (asking questions), support-oriented (agreement, praise), challenge-oriented, and disruptive (starting or participating in off-task conversations) (Yasar, Purzer et al., 2008 as cited by Purzer, 2011, pp. 662-663). This categorization of group interaction provided examples of a various instruction strategies teachers employ when seeking to improve efficacy levels. Other adults can support students' self-efficacy beliefs. In other programs, collaborative efforts with community partners provide opportunities for students to develop self-efficacy.

A community approach. Jarpe-Ratner et al. (2016) conducted a quasi-experimental outcome-based program evaluation of a 10-week after school program. The community-based cooking and nutrient education program offered 271 students in grade 3-8 an opportunity to increase healthy consumption choices. Pre-post survey results analyzed through t-tests showed a significant ($p < 0.5$) increase in nutrient knowledge, cooking self-efficacy, and vegetable consumption. The students who participated in this study came from a low socio-economic background, and as such it is uncertain whether the results will apply to students from a higher socio-economic background. This study is interesting because the program successfully utilized a community approach to improving children's self-efficacy.

Community mentors can also enhance student self-efficacy in and out of the classroom. The interactions between the type of mentor (i.e. kin, teacher, or friend), the time that mentor became important (i.e. before, during, or after high school), and ethnicity has implications for academic success. Using the National Longitudinal Study of Adolescent Heath of 7th -12th graders in the United States, Fruiht and Wray-Lake (2013) determined the critical role of mentors in providing social capital and informational support to students in middle school. In fact, having a mentor in middle school, as opposed to high school, had a bigger impact on students' achievement. Moreover, students with a Hispanic and African American background tended to have mostly kin mentors versus white students, who reported having an adult mentor. The current study highlighted the potential effectiveness of ASMs model in serving middle-schoolers, a critical stage of development.

In other programs, collaborative efforts with community partners provide opportunities for students to develop self-efficacy. Pilkington et al. (2013) examined the outcome of a collaborative, community approach toward mentoring. The authors evaluated the Mosaic project, a three-year publicly funded program that sought to support diversity in the education of elementary, middle, and high school. Data on students considering a profession within the healthcare sector consisted of (a) semi-formal interviews; (b) written and verbal communication from participants during the project; and (c) enrollment numbers throughout the years. The program showed strength in the use of participatory processes to recruit youth from diverse backgrounds, rallying social support through community leaders when developing mentoring activities, and providing

an engaging curriculum that supported students' confidence to speak on topics relating

to health. This study supports the use of a community approach to increase self-efficacy

in learners through a partnership between schools and the local community. Student

learners can receive comprehensive guidance through opportunities for empowerment

(Fitzpatrick, 2013), however peer on peer feedback has some influence on students' self-

efficacy beliefs.

  Peer on peer mentors. Key aspects of one-on-one mentoring are deemed

essential to improving self-efficacy levels in students. Feedback plays a significant role in

promoting students' self-efficacy beliefs (Määttä & Järvelä, 2013). However, other

individuals, such as peers who act as extracurricular coaches or surrogate adult-caregivers

can provide additional support to schools aiming to build students' self-efficacy. It is

within this context that I recommend further study into the possible role of peer mentors

in supporting students self-efficacy beliefs to achieve personal goals.

  Social development theory describes the relevance of a teacher-mentor in

facilitating learners' development of a stronger sense of self-efficacy within the zone of

proximal development. Two principles of Vygotsky's (1978) social development theory

are (a) the More Knowledgeable Other (MKO), someone who is of a higher ability than

the learner to execute a certain task, process, or concept; and (b) the Zone of Proximal

Development (ZPD), which is what the learner can accomplish alone verses what can be

accomplished with the assistance of an individual with a higher ability level. For ASM,

the adult teacher-mentor corresponds to the More Knowledgeable Other in Vygotsky's

theory. The ASM program implements the self-efficacy curriculum within the zone of proximal development, which stimulates learning in a safe, collaborative environment.

Vygotsky's social development theory provides a context for establishing the role a MKO plays in supporting students' self-efficacy beliefs. Although a teacher-mentor offers student learners comprehensive guidance through opportunities for empowerment (Fitzpatrick,2013), peer on peer feedback has some impact on student efficacy and cannot be ruled out as a possible continuation strategy for the longevity of ASM. A peer mentor can support student's self-efficacy in a collaborative environment. Strapp et al. (2014) suggested that giving positive feedback is an important aspect of peer on peer mentoring, as it highlights how children might maintain high self-efficacy. Patton et al. (2016) explored self-efficacy support from with peer mentors. Weekly two-hour session observations, performed by trained doctoral, post-doctoral, and faculty researchers, suggested that similar mentoring environments could assist children in learning how to relate to others in a healthy manner, thereby supporting their emotional development. Hence, peer interactions and group activities may have a positive influence on students' emotional health and wellbeing (psychological arousal) leading to improved self–efficacy.

The role of peer mentors in building self-efficacy is significant. Eskicioglu et al. (2014) conducted a quasi-experimental evaluation to assess the outcomes of a 90-minute, peer-led, after school program aimed at improving self-efficacy and knowledge of healthy living behaviors in fourth grade children ($n = 151$) over 5 months between 2010-2011 and 2011-2012. The authors also used a parallel control group recruited from the

same community (fifth grade students) to compare outcome measures pre-program intervention. Linear regression analysis revealed that the change in self-efficacy was the greatest predictor of the primary outcome measure - waist circumference and BMI z-score (Eskicioglu et al., 2014, p. 1627). This study provides further evidence that peer mentors can play a role in increasing self-efficacy among students.

Interestingly in the evaluation of Eskicioglu et al., (2014) peer led intervention featured limited parent involvement. Similar to ASM, this after school program allowed adult-caregivers the opportunity to observe the program, through invitation. Although there was no established curriculum for adult-caregivers to support the healthy living behaviors children learned during program sessions, this study brought into question the role of adult-caregivers in supporting self-efficacy in middle school children and the promotion of healthy living behaviors at home. O'Sullivan et al. (2014) found parental involvement to be beneficial in externally boosting children's efficacy beliefs and achievement. The homogenous features of student participants at ASM bring into question whether program outcomes are achievable among students who do not have as much parental support.

Recommendation 3: Implementing Ongoing Program Evaluations

Tracking changes in children's attitude over time is a plausible reason behind the recommendation of ongoing program evaluations. For instance, Martin et al. (2015) conducted a multilevel regression analysis on a sample of 1,601 middle school students from 44 different schools. The results showed student mathematics self-efficacy and academic engagement declined significantly from Grades 6 to 7 and 7 to 8 when

compared with grade 6 students. This study provided insight into the struggles of middle school aged children who experience a fall in mathematics self-efficacy. Testing this model in another subject area such as science may yield different results. The authors followed the three cohorts (children in Grades 6, 7, and 8) for more than 1 year. The authors drew the sample for this evaluation study from the non-government catholic school sector. Future evaluation studies at ASM may want to test its model in government and independent school setting, and report on participant's development over a period longer than 10-weeks.

Ongoing evaluations can also help educators consider other variables when seeking to improve self-efficacy in students. For instance, in a review of the literature, Arundell et al. (2016) used a coding model to determine the association between children/adolescents and after-school sedentary behavior. The authors defined sedentary behavior as low-energy expending activities, equivalent to "a sitting or reclining posture" (p.1). Results showed sedentary time increases with age. The results are weakened by the evaluation of self-efficacy intervention strategies for healthy levels of after-school activities in children and teens.

Ongoing evaluations of educational programs are important, as not all evaluation studies have found that programs meet their goals (Little, 2014). According to Ng, Lai, and Chan (2014), programs that seek to facilitate positive outcomes in children should be evaluated for effectiveness. Holmes, Redmond, Thomas, and High (2012) agreed, noting that it is important to assess programs that aim to increase participants' self-efficacy beliefs because it can influence students' attitudes toward their studies. The failure of

Factors and resources		Program Activities		Output		Outcomes
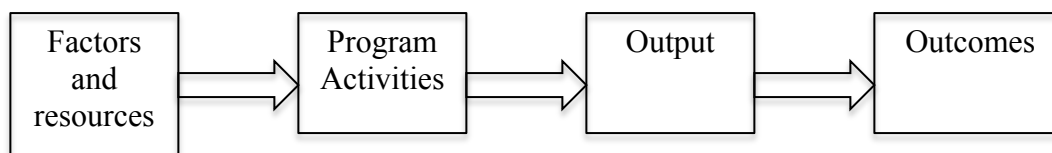
Figure 3. A basic logic model. This figure illustrates how to assess the outcomes of a program (as cited in Little, 2014, p. 123).

programs to deliver on set objectives, according to Little (2014), is in part, due to a disconnect between programs and their evaluation outcomes. Outcome-based evaluations are useful for providing stakeholders with critical information about the program to participants. Little (2014) noted that aligning program efforts with evaluation outcomes becomes pivotal when major program decisions such as funding depend on the results of evaluation studies. A basic logic model (Figure 3) is one useful approach of displaying how a program works, linking outcomes with activities, given the resources available. This model may be an excellent tool for guiding ongoing outcome-based evaluation of ASM.

Ongoing evaluations have merit. In another evaluation study, Ohmori et al. (2015) examined the outcome measure of vocabulary development before and after administering the newborn hearing-screening (NHS) program. 210 children participated in the study and *t*-test analysis of pre-post testing showed a significant improvement in vocabulary development post NHS. A comparative study using a single institute made it possible to isolate the outcome of a single type of education intervention. However, a

follow up study geared toward children beyond the preschool level will add value to the study's results. Similar to the evaluation of ASM, this outcome-based evaluation used pre-post intervention data to determine program influence on children.

In yet another outcome-based evaluation, a sample of 425 middle school children in southern US were randomly assigned to an experimental group and control group to determine the short-term effects of a safety promotion and cyber bullying prevention program. Roberto et al. (2014) used a post-test control group design. This study has strength in the use of an experimental design to assess the outcomes of the school-based program. Although the evaluation examined the short-term outcomes of an existing intervention, Lim (2015) urged that even more evaluation research is needed. The evaluation of ASM outcomes is the first one done, and it has strong short-term practical applications like the findings of Roberto et al. (2014). However, ongoing evaluations are important to determine actual behavior changes over time.

In another study, Martinez et al., (2017) presented an illustrative case study of a critical service-learning intervention aimed at improving the health and well-being of low-income middle school students in Boston Jamaica. Sixty-eight students selected through a convenience sample completed the 10 week after school program by attending weekly sessions, Monday through Thursday from 2:30pm to 5:00pm. The first 40 minutes consisted of academic homework support to students followed by the implementation of the intervention curriculum. Analysis of pre-posttest survey, facilitator and parent interview data, session observations and document review, revealed a statistically significant increase in youth mean knowledge score. Similar to the findings

of ASM, the caring relationship between students and facilitators encouraged high

engagement levels. The framework provided a real world example of how engaging

youths in program initiatives can promote opportunities for critical learning experiences.

This is a similar approach used by ASM, as the specific skills and interests of the

program participants determine many of the program activities offered during the 10-

week session. However, this conclusion could not have been drawn without first

conducting an evaluation study.

Project Description

The program evaluation report delivered to education leaders and curriculum

writers, including the designer of the ASM program, required the creation of data

collection tools, analysis of pre-post self-efficacy scores collected as part of ASMs

process and the writing and delivery of the program evaluation report. Worthen, Sanders,

and Fitzpatrick (1996) noted that a good written evaluation report must be "effective,

interesting, and fair" (p. 420). The conclusions and recommendations included in the

program evaluation report provided critical information on characteristics of an

innovative self-efficacy curricula that increases students' sense of self-efficacy.

Potential Resources and Barriers

In order to create a program evaluation report, one needs to conduct a program

evaluation. The potential resources and barriers to creating the report rests in the

instruments used when conducting the program evaluation. Worthen, Sanders, and

Fitzpatrick (1996) strongly urged evaluators to circulate a draft of the evaluation report to

key stakeholders to challenge anything perceived as minor errors, factual errors, or

interpretive errors and provide alternative facts or personal interpretations (p. 428).

Lodico et al. (2010) agreed, noting that credibility is reflected in the extent to which the

data collection and analysis process is rigorous. I will ensure the accuracy of the findings

that support interpretations through member checking techniques (Creswell, 2012) from

key stakeholders. Qualitative interview data from primary stakeholders, including the

designer of ASMs curriculum and adult-caregivers of registered students as well as

quantitative self-efficacy scores from the Children's Hope Scale are the existing support

for the program evaluation report.

Sample questions from the Children's Hope Scale include "My past has prepared

me for future success," "I energetically pursue my goals," "There are lots of ways around

any problem," and "I can think of many ways to get the things in life that are most

important to me" (Snyder, et al., 1997, p. 419). Students respond to each item from a six-

option Likert scale ranging from: "None of the time" to "All of the time." Six (maximum)

represents high self-efficacy beliefs and one (minimum) represents low self-efficacy

beliefs. Self-developed interview protocols for the teacher-mentor and adult-caregivers

were designed to elicit responses that allowed interviewees to openly discuss their

experiences at ASM. The quantitative self-efficacy scores and qualitative feedback

provided analysis evidence and recommendations suggested in the evaluation report.

However, the implementation of recommendations is left up to those in authority who can

affect change.

The major barrier that can constrain the execution of the program evaluation

report included recruiting adult-caregivers to volunteer for one-on-one interviews. Poor

response rates can lead to inaccurate evaluative feedback. Potential solutions to low

feedback rates, as recommended by Peytchev, Riley, Rosen, Murphy, and Lindblad

(2010), include highlighting the need for a minimum participation rate to ensure accurate

reporting for program stakeholders. Guest, Bunce, and Johnson (2006) noted that a

sample size of six to twelve is ample for data saturation when "the aim is to understand

common perceptions and experiences among a relatively homogenous group of

individuals" (p. 79). Because participants were limited to adult-caregivers of students

registered for the Winter 2018 session, only 10 individuals qualified. Although I

requested the willing participation from as many adult-caregivers as possible to ensure

the reliability and validity of study's findings, only 6 participants agreed to continue past

the informational questionnaire.

Proposal for Implementation and Timetable

Because the project is a program evaluation report, implementation involves the

dissemination of the information contained therein. I will present the program evaluation

report (Appendix A) to primary stakeholders, including the designer of ASM, James,

adult-caregivers, and student participants at a Closing Ceremony. According to Ng, Lai,

and Chan (2014), programs that seek to facilitate positive outcomes in children should be

evaluated for effectiveness. My 10-minute presentation will take the form of a discussion

of the findings from the program evaluation in the program evaluation report. The

evaluation study included an analysis of quantitative survey data from student

participants, as well as qualitative interview data from the teacher-mentor and adult-

caregivers. As recommended by Worthen et al. (1996), I will provide a one page written

summary of the program evaluation report to adult participants on the study's

evaluation findings.

Roles and Responsibilities of the Student and Others

I am charged with the task of providing stakeholders with a written evaluation

report and the stakeholders are responsible for holding me accountable for the findings

presented in the evaluation report. Worthen, Sanders, and Fitzpatrick (1996) provided a

checklist that typify a good evaluation report (p. 430). The program evaluation report

presented to the designer of ASM and adult-caregivers will provide the results of the

outcome-evaluation, as well as an outline of program strengths and recommendations for

program opportunities. The evaluation report will be finalized after stakeholder review by

the designer of the offsite, privately owned ASM program, and adult-caregivers. Findings

may help the program designer make informed decisions about possible program

improvements, given the strengths and recommendations for program opportunities.

I will be responsible for presenting the final recommendations of the program

evaluation report to primary stakeholders as well as responding to any queries regarding

the findings, as outlined in the report. The utility of this evaluation report is key for

determining its worth (Joint Committee on Standards for Educational Evaluation, 1994)

but if the evaluation is not used, then it is worthless regardless of it technical, practical

and ethical merits (Worthen, Sanders, & Fitzpatrick, 1996). Cost is an important factor

that affects the use of evaluation findings. Should I be called upon to be a apart of the

implementation of any recommendations, such as future evaluation initiatives, the

funding, time and resources necessary to execute additional responsibilities must be

borne by the program. Worthen, Sanders, and Fitzpatrick (1996) cautioned evaluators

to examine research on how report findings can be utilized and the factors influencing its

application. Thus, the evaluation will only be justified to the extent in which it saves on

resources or adds substantial value to the well-being of primary stakeholders.

Project Evaluation Plan

The program evaluation report will provide stakeholders with the findings of the

outcome-based evaluation of ASM. The purpose of the outcome-based evaluation was to

investigate ASMs role in motivating higher self-efficacy in students and determine the

program's strengths and weakness as perceived by stakeholders. Worthen et al. (1996)

noted that the report should provide a clear judgement on the value of the program to

stakeholders such as policy makers wishing to adopt a self-efficacy curricula, the

program designer who determines resource allocation for program continuity, or

education leaders who may have interest in knowing about the program for other reasons.

The program evaluation report has two objectives. Firstly, the program evaluation report

fills a current gap in practice, namely, the assessment of an innovative program that aims

to improve self-efficacy in middle-school students. Secondly, the program evaluation

report provides stakeholders with recommendations for program improvement based on

the findings of the outcome-based evaluation.

To determine whether the ASM program delivers on one of its major objectives of

improving self-efficacy beliefs in middle-school students, an outcome-based evaluation

should be implemented on a continuous basis throughout the existence of the program.

This outcome-based evaluation study yielded useful information on the strengths and

weaknesses (Worthen, Sanders, & Fitzpatrick, 1996) of the ASM program. Moreover, the program designer can use the research, resources and recommendations proposed in the program evaluation report to guide future evaluations annually or semi-annually.

Once stakeholders receive the program evaluation report, I will avail myself to respond to any queries relating to the study's findings. I will also provide stakeholders with an evaluation questionnaire as outlined in the "checklist for good evaluation reports" (Worthen et al., 1996, p. 430). The questionnaire for the program designer will included questions about whether recommendations will be utilized. Other stakeholders will receive a feedback form that includes questions on their thoughts about the proposed recommendations and how these recommendations can be utilized.

Project Implications

The main implication of the program evaluation report in the local context is the findings of the outcome-based evaluation. This report will provide primary stakeholders, such as teachers, administrators, and policy makers with the findings of an assessment of a curriculum intended to increase self-efficacy in middle-school students. The study also provides information to ASM's designer on potential aspects for program improvement. In the larger educational context, the evaluation report allows the education profession to understand areas in which ASM is successful and perhaps worth being modelled or require further investigation (e.g., aspects of the curriculum that falls outside of Bandura's four treatment influences).

The Local Context

ASM has been in operation since April 2015, however, it has never been formally evaluated for one of its main goals of increasing students' sense of self-efficacy. Outcome-based evaluations are important for determining whether programs are successfully achieving its stated objectives (Hushman & Marley, 2015; Winnaar et al., 2015; Fernández-Díaz et al., 2017). The purpose of the program evaluation report was to discuss the implications of the outcome-based evaluation. The program evaluation report also identified ASMs strengths and weakness as perceived by stakeholders.

The content of the program evaluation report may also reveal additional issues, not initially anticipated when developing ASMs objectives. The report therefore provides a critical analysis of potential aspects for self-efficacy curricula improvements that can yield positive social change. Kamimura et al. (2016) agreed that such an approach would assist in identifying factors affecting the advantages and disadvantages of program participation for middle-schoolers. For example, the report described opportunities for program improvement from the perspectives of primary adult-caregivers and the program's lead teacher, which included reducing program cost, making the ASM program available for students of lower socioeconomic backgrounds, identifying resources for correctly identifying teacher-mentors who will prove to be a good fit for program, and extending program continuity. These findings outline factors affecting the perceived advantages and disadvantages of program participation for middle-schoolers. The program evaluation report can further guide the decisions of policy makers seeking to improve students' self-efficacy, such as administrators, school boards and the

department of education. This report indicates that students do benefit from participating in ASM; therefore, policy should be written that provides funding that will permit all students to attend ASM and as well as help staff qualified personnel for the program. The funding budget should also include ongoing formative and summative program evaluations.

The Larger Context

The program evaluation report has implications in the larger educational discipline. Firstly, the report allows the education profession to understand the areas in which ASM is successful and perhaps worth being modeled. Researchers (Hushman & Marley, 2015; Winnaar et al., 2015) have called on educational policy makers to examine instructional curricula and programs designed to improve students' self-efficacy beliefs. The evaluation report, grounded in Bandura's (1997) conceptual framework aligns with ASM curriculum activities that are largely successful in achieving one of its stated goals, namely, increasing students' who registered for the 2018 term self-efficacy. Other factors that lie outside of the *a priori* expectations include the role of caring relationships in increasing self-efficacy beliefs.

The project will also have implications for student learning through the introduction of a unique self-efficacy curriculum that departs from conventional practice. Uçar and Sungur (2017) noted that students with a strong sense of self-efficacy tend to have higher levels of achievement. Lim and Chapman (2015) agreed, concluding that the examination of self-efficacy curricula is needed to better understand its possible application to learning. This program evaluation report provides cues for curriculum

improvement that will increase the value or worth of programs seeking to motivate

higher self-efficacy in middle-school students.

Section 4: Reflections and Conclusions

Introduction

This outcome-based evaluation study helped the program designer determine whether the ASM delivers on one of its main stated objectives of improving self-efficacy beliefs in middle school children. The outcome-based evaluation also yielded useful information for the program's designer regarding ASMs strengths and weaknesses. Although students who participated in the 10-week program were already academically meeting provincial averages in Nova Scotia, adult-caregivers believed that the children required supplementary nonacademic support to increase their self-efficacy beliefs to strive for and reach higher goals. The program designer created ASM for children who are already accomplished at their stage of development but wanted more (James, personal communication, January 25, 2018). However, ASM was never evaluated for main outcome of increasing self-efficacy in children. Therefore, it was necessary to assess value of ASM to student participants from the perspective or the teacher-mentor and adult-caregivers, which provide cues for curriculum improvement.

The rationale behind the outcome-based program evaluation related to the need for a systematic evaluation for ASM to determine whether the program is successful at increasing students' self-efficacy beliefs from the perspective of adult-caregivers and teacher-mentor. The outcome based evaluation addressed the three evaluation questions that guided the program evaluation report. Based on the study's findings, the program's influence on students' attitude and behavior at home, school, and play along with

concluding recommendations are reported. The policy recommendations can be used to guide future program reform.

Project Strengths and Limitations

Innovative programs such as ASM, which has an intended outcome of improving self-efficacy beliefs in middle-school students, should be evaluated to determine its success. Researchers such as Hushman and Marley (2015), Winnaar et al. (2015), and Fernández-Díaz et al. (2017) have called on educational policy makers to examine instructional curricula and programs designed to improve self-efficacy beliefs in students. This outcome-based inquiry fulfilled the current need to evaluate innovative practices that may increase efficacy beliefs in middle-school students. Data collection included semiformal one-on-one interviews with the designer of ASM, who is also the lead teacher-mentor, and adult-caregivers. Quantitative descriptive statistics on the self-efficacy scores of 10 middle-grade students before and after program participation accompanied qualitative interview data. The ASM program already collects self-efficacy data as part of its process using the Children's Hope Scale. Program recommendations were based on the evaluation findings, outlined in the program evaluation report (Appendix A).

The findings from the outcome-based evaluation also provided insight on program's strengths and weaknesses. Strengths of the project included the evaluation program report, which revealed components of the program and details of the evaluation findings (Worthen et al., 1996). In addition, triangulation of multiple data sources added to the validity and reliability of the evaluation findings (Lodico et al., 2010). The

evaluation captured the overall outcome of the program. The findings will empower

the program designer with the tools for making data driven decisions and conclusions on

the program's value or worth.

The outcome-based evaluation provided the program designer with evidence

needed to make conclusions about the value of ASM in meeting one of its major goals of

improving self-efficacy beliefs in middle schoolers. Although self-efficacy scores were

collected as part of the program's process, I was able to add value by conducting a mean

score analysis using pre and posttest scores and then displaying this data using a

frequency distribution. Because of the small sample size, statistical data analysis did not

allow for significant differences in gain scores. Continued collection of students' self-

efficacy scores over a longer period will provide statistical data for strong quantitative

evidence of whether ASM is meeting its main objective of improving self-efficacy.

The use of a survey instrument to investigate the perceptions of the teacher-

mentor and adult-caregivers on the role of ASM in improving children's self-efficacy

also yielded suggestions for program improvements. The semi-formal interview

questions, reviewed by a panel of experts consisting of three experienced PhD Education

professors, allowed for in-depth questioning that helped me to verify the participants'

understanding of the questions. Interviews were effective in quickly and reliably eliciting

clear and meaningful data about participants' experiences, feelings, and knowledge as

suggested by Merriam (2009). Using a mixed method approach to the outcome-based

evaluation generated sufficient data for analysis, which yielded a series of

recommendations for program improvements. Although the program evaluation was

successful in providing evidence of the value of ASM, there is one major limitation to the study.

One of the major drawbacks of this study pertained to the analysis of quantitative self-efficacy scores, collected as part of the program's process. I did not consider the impact of attendance and behavior when analyzing students' mean score. Analyzing student survey data from these perspectives would have added strength to the study's findings and provided stakeholders with more specific evidence of how the ASM program is working to improve children's self-efficacy according to their scores.

Another major drawback of this study is the selective group of participants drawn from a convenience sample of all primary adult-caregivers of registered students. It is clear that these students, who come from families that could afford the cost of a private program and have vested in their children's development, already experience high self-efficacy. Jarpe-Ratner et al. (2016) conducted a quasi-experimental outcome based program evaluation of a 10-week after school program. The community-based cooking and nutrient education program offered 271 students in grade 3-8 by variable inclusion an opportunity to increase healthy consumption choices. Most students who participated in the program were chosen according to a particular criteria set by the school staff, therefore the results were not generalizable to the wider population. Similar to Jarpe-Ratner et al. (2016), a stronger evaluation of ASMs value will involve assessing the outcomes of children who are struggling with low self-efficacy and who come from lower socioeconomic backgrounds.

Recommendations for Alternative Approaches

Despite curriculum development designed to improve students' self-efficacy (Nova Scotia Education and Early Childhood Development, 2013) a recent survey of more than 19,000 educational stakeholders in Nova Scotia (Nova Scotia Education and Early Childhood Development, 2015) revealed that most middle-school students are still perceived to have low self-efficacy. Innovative programs such as ASM, which has an intended outcome of improving self-efficacy beliefs in middle-school students, should be evaluated to determine its success. Researchers such as Hushman and Marley (2015), Winnaar et al. (2015), and Fernández-Díaz et al. (2017) have called on educational policy makers to examine instructional curricula and programs designed to improve self-efficacy beliefs in students. Such recommendations indicate a current need to evaluate conventional instructional practice that may increase efficacy beliefs in middle-school students.

Alternatively, the problem could be interpreted another way. Great deliberation occurred with my committee chair very early on in this project over the definition of this study's problem. On the one hand, the issue of low self-efficacy among middle school students compounds another problem for the need to evaluate self-efficacy curricula for middle school students. If I defined the problem as low self-efficacy among middle school students, then the design of the study could have been very different. For instance, exploring the "experienced outcomes" of the ASM program would require adopting a qualitative phenomenological study, which would make it necessary to interview student participants.

Using a different conceptual framework might also serve as an alternative approach to this study's evaluation study. Nodding's (2015) theory of education argues that curricula should address students' "full range of talents and interest" (p. 232). Noddings' model might align with the objectives of ASM but another theoretical framework may produce very different conclusion. Kohn (2008) theorizes that a learner's perspective predicts outcomes. What determines the value or worth of a lesson is not what a lesson is intended to teach but what a child experiences. Instead of using Bandura's behaviorist model, a sociocultural model might have provided different insights into the value or worth of ASM.

Scholarship, Project Development and Evaluation, and Leadership and Change

Through the process of research and the development of the project, I gained a better understanding of how to interpret and compose scholarly writing. I also experienced deeper insight on my topic of self-efficacy and outcome evaluations through my extensive research of current research and classical theories. The program evaluation book by Worthen et al. (1996) acted as my authoritative text on different types of evaluations. The program evaluation followed the Karahan et al. (2015) model and was instrumental in guiding the evaluation of ASM. These scholars made suggestions for data collection, analysis, and overall design of the outcome-based evaluation. Both sources added to the depth of the overall findings.

Additionally, I increased my knowledge and skillset in the collection and analysis of qualitative data. Receiving guidance from my first and second chair, and reviewing the literature on best practices for conducting and coding interview data was essential to my

personal learning and self-growth as a scholar practitioner. The data collected provided insight into components of the ASM program that worked well according to the teacher-mentor and adult-caregivers.

      The most significant contribution to my personal growth in project development occurred in the selection of an appropriate evaluation design and method for sharing the findings of the study with primary stakeholders, including the teacher-mentor and adult-caregivers. I decided on a mixed-method, outcome-based evaluation. The purpose was to determine whether ASM successfully improved students' self-efficacy, as well as the potential benefits and drawbacks of program participation. The study's findings, communicated through a program evaluation report (Worthen, Sanders, & Fitzpatrick, 1996), allowed me to easily convey the results of the data analysis and offer recommendations for program improvements. I tailored the program evaluation report succinctly to my target audience, from more than 100 pages of information relevant to study's problem, data collection methods, and data analysis. This is significant because information not effectively communicated to the targeted audiences' would make this project a futile effort.

      The greatest challenge in this study was the analysis of both qualitative and quantitative data sets. Reading about various methods to effectively organize, analyze, and interpret data (Merriam, 2009) using a mixed-method approach did help prepare me somewhat. However, the experience was still very much a frustrating one, mostly due to my lack of experience. Also, although I have a background with analyzing statistical datasets, I struggled with manually calculating self-efficacy scores from the Children's

Hope Scale, a survey that uses a Likert scale. As a result of this experience, I have a

greater appreciation for statistical data analysis software programs like STATA and

SPSS. This evaluation study took me very much outside of my comfort zone as a

quantitative analyst by training. I have a new found appreciation and respect for

qualitative data analysis and the issues surrounding controlling for researcher bias.

Adhering to evaluation standards and ensuring the robustness of the study's findings

through addressing reliability and validity concerns during in the collection, coding, and

analysis of qualitative data has pushed me to the next level professionally.

Since recently transitioning into talent development, my passion for improving

the way students learn has enlarged. My natural curiosity to challenge the status quo by

asking "Does this really work?" paired with tools for assessing whether programs work

has allowed me to take on a leadership role within my organization. In the last year, this

evaluation has compelled me to actively seek out partnerships with local schools in my

community to provide job shadowing opportunities for students. Such partnerships have

afforded students the opportunity to see the application of the theory learnt in class. It is

also intended to increase awareness of our company and build connections with potential

future hires, either with students who attend or via word of mouth following

presentations. This job shadow project partnership between the local college in Nova

Scotia and company employees will also allow for staff development. Describing day to

day tasks to students requires the same skillset when employees train newer staff hires. I

now have a greater platform for effecting change in my community. Due to my

experience with program evaluations, I am being charged with leading such efforts.

Leadership development will continue to be an ongoing process, as it requires that I continuously seek out opportunities to remain abreast of current research and best practice.

Reflection on Importance of the Work

The overall work has sharpened and shaped me as a scholar, project developer, and practitioner for social change. This experience widened my research skills, especially when writing the literature review. My committee challenged me to become more deliberate in my search for appropriate sources and to understand its impact of my project study. I learnt to evaluate the purpose of different sources such as primary versus secondary sources, peer-reviewed scholarly articles versus popular sources (Worthen, Sanders, & Fitzpatrick, 1996). Because my learning curve was very high for my first literature review, the second was more manageable.

My increased awareness of program evaluations and research designs have led me on a wonderful journey of becoming a skilled scholar practitioner. Since ASM was never evaluated, the opportunity to assess the program as my project was present. Becoming confident in using an outcome-based evaluation to determine whether program objectives were being achieved (Worthen, Sanders, & Fitzpatrick, 1996) from the perspective of primary stakeholders came as a result of many hours spent studying journal articles, books, and other popular sources. For example, using a mixed approach added more depth and developed my interviewing and data analysis skills, as well as my design of a credible data collection instrument. I believe the skills developed will be beneficial for future program evaluation efforts. Moreover, the main goal of this study was to provide

the program designer with an assessment of the value of ASM in increasing self-efficacy in students as well as the strengths and weakness of program participation (Worthen, Sanders, & Fitzpatrick, 1996). Through this process, I learnt more about best practice for using data to drive decisions. The exposure received equipped me for becoming a change agent in my community.

Implications, Applications, and Directions for Future Research

The findings from this project is important because it provides evidence that ASM achieves one of its major goals of fostering a higher sense of self-efficacy in children registered for the 2018 winter session. However, the study's findings have the potential to impact social change beyond the program level. The program evaluation not only provided information to the program designer, who can affect change through implementing recommendations and make changes to the self-efficacy curriculum, but also for the students directly affected by program activities (Worthen, Sanders, & Fitzpatrick, 1996). Because the evaluation study reflects the value of ASM to the primary stakeholders, such as adult-caregivers and teacher-mentor, their opinions and beliefs contributed to the reliability and significance of the recommendations offered for improvements.

Social change achieved through the formal appraisal of the ASM curriculum could provide useful information to future curriculum writers and instruction developers seeking to provide targeted interventions for increasing self-efficacy among middle-school students. The findings from this project study may empower future curriculum writers and school leaders to (a) provide unique learning experiences that increases self-

efficacy in middle schoolers; (b) make informed data driven decisions with regard to policies and procedures impacting students with low self-efficacy; (c) use data to maintain self-efficacy curricula; and (d) initiate a process for the formal evaluation of programs from the perspective of primary stakeholders. This program evaluation could also add value to other non-academic programs seeking to target middle schoolers struggling with similar self-efficacy concerns. Therefore, this study has the potential to impact social change on an even larger scale than first anticipated at the beginning of the program evaluation.

The need for a systematic and ongoing program evaluation at ASM led to this project study. If future research is conducted, both formative and summative measures should inform the findings. The formative evaluation will provide evidence of whether newly developed activities are applicable, feasible and suitable (Worthen, Sanders, & Fitzpatrick, 1996) or the existing program or certain activities needs modification. Evaluations can inform leadership decisions to ensure that students experience maximum benefits from program participation. In addition, using a mixed-method approach that includes the perspective of major stakeholders will help the evaluator understand their experiences with the program. Then, the summative evaluation will determine whether the program is meeting its intended goals. Therefore, the findings from the formative evaluation would help the evaluator better understand the findings from the summative evaluation and vice versa.

The findings from this study will also add to the literature on outcome-based evaluations of program intending to increase self-efficacy beliefs in middle school

students. The findings provided evidence of how to determine whether innovative curricula such as those found at ASM in fact achieves its intended goals. The findings can help school leaders make decisions about developing programs to increase self-efficacy beliefs in middle schoolers, in areas where such programs do not currently exist.

Conclusion

This project study evaluated the outcomes of ASM in order to provide the program's designer and adult-caregivers of children who participate in the program with evidence concerning whether stated goals are successfully achieved. The statistical comparison of mean scores did not show remarkable differences, but the findings reveal an upward shift in the distribution of mean and median self-efficacy scores after 10-weeks of program participation. The analysis of qualitative interview data supported quantitative findings which indicate that children who are more reserved at the start of the Winter 2018 session experienced the largest increase in self-efficacy beliefs. Although the program did not have any drawbacks to student participants, stakeholders believed that program cost limits its access by students from lower socioeconomic backgrounds and a lack of resources to correctly identify additional teacher-mentors exists.

Based on the findings, recommendations made to the designer of ASM responded to some of the concerns raised during the evaluation study. The program evaluation report will be presented to stakeholders to demonstrate how the findings can benefit students and the program (Worthen, Sanders, & Fitzpatrick, 1996). The presentation of findings may also compel secondary stakeholders to investigate the possible value of this program in other settings, such as the public school system.

The study's findings are limited to one after-school program; however, the potential to impact the educational community is far reaching. Similar programs like ASM across the province may be encouraged to develop systematic evaluations and continue the research efforts initiated by this project study. School leaders should take into account the drawbacks identified in this study when considering traditional and innovative self-efficacy curricula for middle school students. The experience gained from this program evaluation was invaluable making me into a scholar, skills developed as a doctoral student at Walden University.

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https://doi.org/10.1016/j.lindif.2012.07.010

Appendix A: Program Evaluation Report

An outcome based evaluation of the After-School Mentorship Program and Self-Efficacy

Beliefs in Middle-School Students

The following report summarizes the findings and recommendations from the outcome-based evaluation of the After School Program (ASM) and self-efficacy beliefs in middle school students. This evaluation report will provide school leaders with the findings from the outcome-based evaluation, allowing education professionals to draw some conclusion regarding the value of ASM in raising self-efficacy beliefs in middle-school children. An ASM program in eastern Canada claims to provide an innovative curriculum for increasing self-efficacy beliefs in middle-school students (James, personal communication, May 31, 2016). ASM provides students in third to seventh grade with opportunities to develop a stronger sense of self-efficacy (nondisclosed Canadian mentorship program, 2016). However, the problem was that this program had never been formally evaluated for its intended outcome of raising self-efficacy beliefs in students. The ASM program aims to increase students' belief to achieve personal goals (academic and non-academic) via relationship building exercises, public speaking training, and character education (nondisclosed Canadian mentorship program, 2016).

Low self-efficacy among middle-school students is a meaningful topic in the educational discipline (Lee et al., 2014; Lofgran et al., 2015; Madjar & Chohat 2016). Despite curriculum development designed to improve students' self-efficacy (Nova Scotia Education and Early Childhood Development, 2013) a survey of more than 19,000 educational stakeholders in Nova Scotia (Nova Scotia Education and Early Childhood

Development, 2015) revealed that most middle-school students are still perceived to have low self-efficacy. Primary stakeholders, including policy makers and school officials, must work to provide a suitable curriculum for supporting self-efficacy beliefs in children. One practical shortcoming, however, is the lack of formal evaluations of curricula that aim to improve self-efficacy. The evaluation of the ASM self-efficacy curriculum helped to determine its success in strengthening students' self-efficacy beliefs, along with the possible benefits and drawbacks of program participation.

The following evaluation questions guided the appraisal of the ASM program (a) What are participants' mean, mode, and median self-efficacy scores before and after 10 weeks of participation in the ASM program using the Children's Hope Scale?; (b) From the perspective of the lead teacher what changes in students' self-efficacy, if any, are apparent?; (c) From the perspective of adult-caregivers what changes in children's self-efficacy, if any, are apparent?

The findings from this study can be used to understand the perceived significance of the ASM program for improving self-efficacy of middle-school children and inform the policy recommendations for the project study. Evaluation findings suggest that students do experience some benefits from participating in the ASM program. Policy implications include the need to fund student participants who are not privileged financially but need the program, resources to correctly identify qualified staff, and the continuous evaluation of ASM using both a formative and summative approach.

Overview of Quantitative Evaluation Findings

An outcome-based evaluation, which assesses how well a program meets its main

Table 1.

Analysis of Pre-Post Mean Scores for the CHS

Items	Mean Scores (Pre)	Mean Scores (Post)
1) Doing pretty well	4.3	4.6
2) Many ways to get to the things in life	3.8	4.6
3) Doing just as well as other kids my age	4.2	4.9
4) Can solve problems	3.9	4.5
5) My past will help me in my future	3.7	4.5
6) If other quit, can solve problem	4.8	4.6

objectives, is most fitting when considering whether ASM is successfully motivating increased self-efficacy in students. By allowing students to set and achieve goals based on individual interests and facilitating the internalization and integration of externally motivated tasks through relationship building exercises, public speaking training, and character education, the ASM program aims to increase students' self-efficacy. Participants in this outcome-based evaluation included primary stakeholders: seven adult-caregivers and the program's designer, who is also the lead teacher. Table 1 shows a further breakdown of the pre-post mean scores of the Children's Hope Scale (CHS). Interview data with adult-caregivers and the program's designer were triangulated with quantitative pre and post descriptive statistics on the self-efficacy scores of 10 middle-grade students program participation. The ASM program routinely collects self-efficacy data as part of its process using the Children's Hope Scale. Using the results of this mixed methods evaluation, a series of recommendations were developed.

The Children's Hope Scale consists of six questions and uses a six-point scale (1=*None of the time* to 6 = *All of the time*). Students' responded to each item from a six-option Likert scale ranging from: "None of the time" to "All of the time." Six (maximum score) represents high self-efficacy beliefs and one (minimum score) represents low self-efficacy beliefs. Sample questions included "My past has prepared me for future success," "I energetically pursue my goals," "There are lots of ways around any problem," and "I can think of many ways to get the things in life that are most important to me" (Snyder, et al., 1997, p. 419). Data analyzed revealed the perceived self-efficacy scores of ten children in grades 4-8 registered for the winter 2018 session before and after 10-weeks of program participation. Analysis revealed that total scores for the pretest data were skewed.

Almost 33% of all students chose all six items with " 5= Most of the time". Additionally, approximately 13% of all students chose all six items with "6=All of the time." The average total score of all students (n = 10) was 4.1 before the start of the program, which is very near the median of 4 (A lot of the time). The evidence suggested that there were similarities in how students' felt about their personal self-efficacy beliefs at the start of the program. The pretest self-efficacy score that occurred most often was 5 (Most of the time). After program participation, students' average total score was 4.617. Posttest data showed that total scores were skewed. Almost 30% of all students chose all six items with " 5= Most of the time".

In addition, approximately 28% of all students chose all six items with "6=All of the time" and the average total score of all students (n = 10) was 4.617 after the 10-week

program, which is very near the median of 5 (Most of the time). The evidence suggested that there were similarities in how students' felt about personal self-efficacy beliefs at the start and the end of the program. The posttest CHS score that occurred most often was 5 (Most of the time). Overall, the higher the score, the higher student's belief that he or she can set and achieve goals.

A score greater than 5 (Most of the time) is considered high (Snyder, et al., 1997) and indicates that children have high self-efficacy. If the total score is less than 3 (Some of the time), it is considered low (Snyder, et al., 1997) and indicates that children's self-efficacy is low. Statistical comparison of mean scores before and after program participation did not show remarkable differences. However, there was an upward shift in the distribution of mean and median self-efficacy scores after 10-weeks of program participation. Quantitative analysis supported qualitative findings. Data analysis of interview data revealed that children who are more reserved at the start of the program experience the largest increase in self-efficacy beliefs.

Based on the descriptive statistics only, no conclusion can be drawn about the changes in students self-efficacy before and after 10-weeks of participation. Although overall self-efficacy scores did not reflect a significant increase, qualitative analysis of the interview data from adult-caregivers and the lead teacher indicated that there were positive program outcomes that may led to increased self-efficacy beliefs.

Overview of Qualitative Evaluation Findings

The qualitative findings from adult-caregivers are consistent with children's self-efficacy scores using the Children's Hope Scale. Many of the adult-caregivers felt their

child's self-confidence to reach for and achieve goals was mostly high before program participation. However, after program participation, adult-caregivers believed children's sense of self-efficacy grew stronger.

Key strengths

The lead teacher and adult-caregivers felt that the program provided students with opportunities to increase self-efficacy beliefs. Analysis of qualitative survey data suggested that program activities created opportunities for (a) modeling appropriate standards; (b) mastery transformation that allow students to succeed (e.g., public speaking training); (c) quality feedback that helped children realize high goals; and (d) addressing negative emotions such as fear of failure.

"She now corrects herself after realizing that she made a negative pronouncement … [she] turns it around to a positive" (Parent 5)

Other strengths that emerged related to (a) the deep learning that stems from natural curiosity; (b) intrinsic motivation to pursue passions and awaken a new zeal for learning; (c) becoming even more self-disciplined in setting and achieving personal goals; (d) building caring relationships with the lead teacher and each other; and (e) being in a safe environment to be oneself. The cost attached to this privately offered program limits its availability to children from lower socioeconomic backgrounds however the program may have positive effects on other children.

"…she has really opened up… and not as anxious about meeting new people…" (Parent 3)

She became "more assertive and outgoing… willing to try new experiences and give it her best" (Parent 4)

Areas for Growth

Despite the success of the ASM program in improving students' sense of self-efficacy, interview data with the lead teacher and adult-caregivers revealed some concerns about the cost attached to this privately offered program. One parent felt that the cost was a bit high, but was willing to make the financial sacrifice to help her daughter receive the best educational experience possible. The teacher-mentor felt that the cost limits its availability to children from lower socioeconomic backgrounds.

"as the sole owner, there is a lot of pressure that comes with sales and running a business in Eastern Canada, in addition to curriculum development and instructional design.

Another major drawback according to the lead teacher is the program's sustainability. Because the program is owned and operated as a sole trader, the teacher-mentor, who is also the program designer, is responsible for all aspects. Responsibilities include marketing and sales promotion, accounting and business taxes, curriculum development and program planning, event organizing, and one-on-one mentoring. James noted that as the sole owner, there is a lot of pressure that comes with sales and running a business in Eastern Canada, in addition to curriculum development and instructional design. Although the designer of ASM has no formal business education background, a seven year mini career in sales and marketing as a director of a not-for -profit organization has added personal value. The leader wears many hats, which carries a major risk for program continuity if the lead teacher is unable to

Learning to "let go a little of the reigns" and accept "hired help" is becoming more necessary to allow more time for program planning

conduct day to day activities. It is not a sustainable model for the longrun.

The problem of program continuity was further investigated during the follow-up interview, and it was discovered that the greatest factor impeding the lead teacher from hiring additional staff is the lack of resources for correctly identifying key persons who understand the vision and will prove to be a good fit for the program. According to James, with the correct support, opportunities for professional development will spark new creative ideas. James went on to explain,

> There is no divide between adult and child when it comes to lifestyle choices, who you are as an individual, and what's healthy. Future staff must be sincere, and should not be a different person at home than with the kids. This is what ASM embodies…and it is a heavy responsibility, which cannot be done if it's not one's heart (personal communication, January 25, 2018)

The findings from this project study may empower future curriculum writers and school leaders to (a) provide unique learning experiences that increases self-efficacy in middle schoolers, (b) make informed data driven decisions with regard to policies and procedures impacting students with low self-efficacy, (c) use data to maintain self-efficacy curricula, and (d) initiate a process for the formal evaluation of programs from the perspective of primary stakeholders.

"We need programs like this in our schools." (Parent 2)

Overview of Recommendations

Several recommendations resulted from the program evaluation. Recommendations include: implementing ASM as part of a school-based curriculum to

increase program availability to children, incorporate peer-on-peer mentoring,
implement ongoing evaluation of ASM, and allow children to self-enroll in ASM for as
long as they require.

**Implement ASM as part of a school-based curriculum to increase program
availability to children.** The evaluation study revealed ASMs curriculum and
instructional design as beneficial to improving self-efficacy; however, program costs
limit its availability to children from lower socioeconomic backgrounds. Policy makers
may wish to consider the possibility of using ASM as a model curriculum in a school-
based setting. In one case study, Soni (2015) explored the educational role of a school-
based adult learning mentor in emotionally supporting, motivating, managing, and
challenging middle school students who experience barriers to learning such as low self-
efficacy. Soni's findings from (a) focus group discussions with six learning mentors, (b)
16 written attendance scripts and content supervision sessions with 10 mentors, and (c)
qualitative and quantitative data from questionnaires, suggested that mentoring
encourages the educative sharing of ideas and best practice (education function) that is
child-centered and provided solution-focused help (supportive function) for students.

Program sustainability through peer-on-peer mentoring. At the moment, the
lead teacher-mentor, who is also the designer of the program, operates the entire ASM
program solely. Adult support is crucial when attempting to increase or strengthen self-
efficacy in children. Fruiht and Wray-Lake (2013) noted that adult teacher-mentors with
higher education training have experience in navigating the educational system and are
capable of transmitting a unique set of academic skills and resources to mentees.

However, peer-on-peer mentoring cannot be ruled out as a possible continuation strategy for the longevity of ASM. Although a teacher-mentor offers student learners comprehensive guidance through opportunities for empowerment (Fitzpatrick, 2013), peer-on-peer feedback may also have a positive impact on the self-efficacy of other students. Peer mentoring is a possible aspect the ASM program may wish to consider in the long-run. Strapp et al. (2014) suggested that giving positive feedback is an important aspect of peer-on-peer mentoring, as it highlights how children might maintain high self-efficacy. Uçar & Sungur, (2017) added that children with a strong sense of self-efficacy tend to motivate themselves to achieve goals, and this can have rippling effects in contributing to higher self-efficacy during peer interactions. Although adult support is crucial when attempting to increase or strengthen self-efficacy in children, there is need to consider the possible role of a peer mentor in providing positive feedback to support self-efficacy in a collaborative environment.

Implement a continuous evaluation system that includes program stakeholders. Investing time and resources in training the teacher-mentor on how to effectively use quantitative and qualitative data from primary stakeholders to drive program decisions is crucial. Innovative programs such as ASM, which has an intended outcome of improving self-efficacy beliefs in middle-school students, should be evaluated in a continuous manner to determine its success. Evaluation studies can also provide cues for program improvement. I suggest using both a quantitative and qualitative approach to data analysis.

Statistical analysis of the data from the Children's Hope Scale will be more informative given a larger dataset. This is only possible if survey data is collected in an ongoing manner. The qualitative stakeholder feedback on program offering is also critical to the ongoing evaluation process. Monk et al. (2014) used a mixed approach to assessing EnvironMentors, a program that paired high school students with university student mentors to provide informal environmental science education. To determine whether the program's goals were met, the authors collected data from student surveys, a focus group session with mentors during the first year, and written open-ended feedback from students and mentors during the second year. The study conducted by Monk et al. (2014) provides alternative examples of data collection methods that may be useful for measuring the experienced outcomes of ASM. Participants who completed EnvironMentors were found to be (a) more knowledgeable on environmental science and were enrolling in secondary institutions; (b) more interested in environmental science education as a result of their exposure to new experiences, and (c) more skilled at sharing their knowledge with other students. In this study, the program delivered by university mentors positively affected high school mentees.

To meet the challenge of measuring program success, the teacher-mentor should continue assessing the program regularly. However, considering that this additional workload is time consuming, the designer of the program may want to consider hiring an external evaluator. Should I be invited to be a apart of the implementation of any recommendation such as future evaluation initiatives, I will accept the mandate. The

funding costs, time, and resources necessary to execute additional responsibilities

must be borne by the program.

Allow children to self-enroll in ASM for as long as they require. Allowing

students to self-enroll for ASM gives them voice and choice in their own learning. The

current system is limited to 10-weeks. Students should be able to register for ASM based

their need for increasing their personal sense of self-efficacy. Specific procedures would

need to be established to govern this process, but the idea is to provide students the

opportunity to practice making healthy choices. According to King and Howard (2016),

students tend to be positively motivated when teachers provide them with the ability to

choose their learning goals. Moreover, Hu, and Zhang (2017) confirmed the importance

of allowing students choice in contributing to the development of activities when building

self-efficacy. Furthermore, Aho et al. (2015) found mentor-guided self-directed learning

effective in helping children achieve personal goals. Informal learning environments,

such as after-school programs, may provide positive intrinsic motivation to improve

students' self-efficacy beliefs.

Summary

The research literature indicates that self-efficacy among middle-schoolers is a

meaningful topic in the education discipline (Lee et al., 2014; Lofgran et al., 2015;

Madjar & Chohat 2016), and the evaluation curricula that aim to improve self-efficacy is

needed. This outcome-based program evaluation investigated whether ASM works to

increase students' self-efficacy as well as the perceived benefits and drawbacks from

program participation. The findings showed the patterns, relationships, and themes supported by the data.

Using a mixed methods approach to data analysis, the quantitative results were inconclusive; as children on average had high levels of self-efficacy prior to and after program participation. The statistical comparison of scores show an upward shift in the distribution of mean and median self-efficacy scores after 10-weeks of program participation. Qualitative findings indicate that adult-caregivers felt that children's self-efficacy increased after program participation as a result of mastery experience gained through public speaking training, modeled expectation standards, ongoing quality feedback, and helping children manage negative emotions such as anxiety or fear of failure through positive self-efficacy talks. One aspect of program experiences that fell outside of *a priori* expectations included the role of caring relationships between students and the teacher-mentor, adult-caregivers, their community, and each other.

Also, the data show that the close and caring relationships formed among the teacher-mentor, students, adult-caregivers, and their community is special to the ASM program. Martinez et al. (2017) found that the caring relationship between students and teachers facilitated increased academic self-efficacy. Experiences are reinforced at home due to the strong relationship network, bringing about positive change in children's day to day life. After program participation, adult-caregivers felt like children's sense of self-efficacy increased as a result of the experiences at ASM.

Adult-caregivers reported that the teacher-mentor's role in raising children's self-efficacy was larger than first anticipated. The lead teacher held ASM kids to higher

standards and was not afraid to provide constructive feedback that challenged kids to

be better. Adult-caregivers felt the children's experiences allowed them to think outside

the box. The teacher-mentor motivated students to accomplish higher goals, pushing kids

outside of their comfort zones of "personal interests" to include externally motivated

tasks through self-discipline. Adult-caregivers felt ASM was successful in helping to

support children's self-confidence to pursue passions and awaken a zeal for learning

(self-efficacy). The adult-caregivers reported no drawbacks to children as a result of

program participation. One area worth considering is making such as program available

to all kids. Adult-caregivers felt the price attached to the privately offered program limits

accessibility to children from lower socioeconomic backgrounds.

The mixed-method outcome-based program evaluation investigated whether ASM

works to increase students' self-efficacy. Although the quantitative findings were

inconclusive, qualitative findings indicated that the program did have positive outcomes

for participants. Policy recommendations include implementing ASM as part of a school-

based curriculum to increase program availability to children, incorporate peer-on-peer

mentoring, implement an ongoing evaluation of ASM, and allow children to self-enroll in

ASM for as long as they require. The findings from this program evaluation may

empower future curriculum writers and school leaders to provide unique learning

experiences that increases self-efficacy in middle schoolers, make informed data-driven

decisions with regard to policies and procedures impacting students with low self-

efficacy, use data to maintain self-efficacy curricula, and initiate a process for the formal

evaluation of programs from the perspective of primary stakeholders.

Appendix B: Children's Hope Scale

Directions: The six sentences below describe how children think about themselves and how they do things in general. Read each sentence carefully. For each sentence, please think about how you are in most situations. Place a check (✓) in the (O) circle above "None of the time," if this describes you. Or, if you are this way "All of the time," check this circle. Please answer every question by putting a check in one of the circles. There are no right and wrong answers.

1. *I think I am doing pretty well.*

O	O	O	O	O	O
None of the time	A little of the time	Some of the time	A lot of the time	Most of the time	All of the time

2. *I can think of many ways to get the things in life that are most important to me.*

O	O	O	O	O	O
None of the time	A little of the time	Some of the time	A lot of the time	Most of the time	All of the time

3. *I am doing just as well as other kids my age.*

O	O	O	O	O	O
None of the time	A little of the time	Some of the time	A lot of the time	Most of the time	All of the time

4. *When I have a problem, I can come up with lots of ways to solve it.*

O	O	O	O	O	O
None of the time	A little of the time	Some of the time	A lot of the time	Most of the time	All of the time

5. *I think the things I have done in the past will help me in the future.*

O	O	O	O	O	O
None of the time	A little of the time	Some of the time	A lot of the time	Most of the time	All of the time

6. *Even when others want to quit, I know that I can find ways to solve the problem.*

O	O	O	O	O	O
None of the time	A little of the time	Some of the time	A lot of the time	Most of the time	All of the time

Notes: When administered to children, this scale is not labeled "The Children's Hope Scale," but is called "Questions About Your Goals." The total Children's Hope Scale score is achieved by adding the responses to the six items, with "None of the time" = 1; "A little of the time" = 2; "Some of the time" = 3; "A lot of the time" = 4; "Most of the time" = 5; and, "All of the time" = 6. The three odd-numbered items tap agency, and the three even-numbered items tap pathways.

Snyder, C. R., Hoza, Pelham, W. E., Rapoff, M., Ware, L., Danovsky, M., Stahl, K. J. (1997). The development and validation of the children's hope scale. *Journal of Pediatric Psychology*, *22*(3), 399-421. http://doi.org/10.1093/jpepsy/22.3.399

Subject: Permission for use of the Children's Hope Scale

305 Fraser Hall, Graduate Training Program in Clinical Psychology,

Department of Psychology, The University of Kansas,

Lawrence, Kansas 66045-2462

My name is Atia Mark and I am a doctoral student at Walden University, specializing in Curriculum, Instruction, and Assessment. I am working on my dissertation study, an outcome-based evaluation of a private, after-school mentoring program for middle-school students, chaired by Dr. Steve Wells and Dr. Gloria Jacobs. I would like your permission to reproduce the Children's Hope Scale in my evaluation research study as a pre- post-measure of student's self-efficacy before and after program completion. I acknowledge that:

- I will use the Children's Hope Sale for research purposes only and will not sell or use it with any compensated or curriculum development activities

- I will include copyright statement on all copies of the instrument

- I will make my research study available on completion upon request

If these terms are acceptable, please indicate by signing a copy of this letter and returning it to me via email at atia.mark@waldenu.edu or atiadmark@gmail.com

Sincerely,
Atia Mark,
Ed.D Candidate
Expected Date of Completion: September 2019

Appendix C: The Children's Hope Scale Scoring Sheet

| Item | Tally of Actual Responses | | | | | | Score |
	None of the time	A little of the time	Some of the time	A lot of the time	Most of the time	All of the time	
1	1	2	3	4	5	6	A
2	1	2	3	4	5	6	B
3	1	2	3	4	5	6	C
4	1	2	3	4	5	6	D
5	1	2	3	4	5	6	E
6	1	2	3	4	5	6	F
	Sum of A-F						G
	Mean Score						H
	Median Score						I
	Mode Score						J

Appendix D: Informational Questionnaire

The purpose of this questionnaire is to get a sense for your willingness to participate in a study that evaluates the value of the ████████████ to your family.

Confidentiality: I will not reveal your identity at any point of this study. Please see the attached confidentiality agreement.

1. Are you willing share your experience at ██████ Yes___ No____ (If not, do not proceed. Kindly return this form in a sealed envelope to the locked box at the program's site)
2. What is your name: _____
3. What is your age: _____
4. What is your gender: Male____ Female____
5. How many children do you care for:_____
6. What is your occupation:_____
7. Ethnic background - Optional (Caucasian, African, Hispanic, Asian, Native):_____
8. Highest level of education: _____
9. How many kids are enrolled in █████?:_____
10. What grade was (were) your son (s)/daughter (s) in last year: _____
11. What grade is (are) your son (s) and/daughter(s) currently in: _____
12. Please provide your preferred method of communication:

Phone (Cell/Landline, please circle) _____

Email Address:_____

Mailing Address: _____

Kindly return this form in a sealed envelope to the locked box at the program's site within 5 days of receipt

Appendix E: Coding for Interview Data

Theme	Codes	Definition
Mastery Experience	Success, good grades, Failure, Interest in activities, hardworking, studying, hard-work, projects, home-work, self-discipline, failure, achieving goals, curiosity, passion for learning	When an individual experience success during certain tasks. Success leads to stronger self-efficacy. (Bandura, 2006; Gillen-O'Neel, Huynh, & Fuligni, 2013) Xu, 2013).
Vicarious Experience	Role model, friends, teacher-mentor, observe, family, God, friendships	Reports of learning from others that proves student perception of ability to achieve increases (Bandura, 2006; Goddard et al., 2015; Soni, 2015; Strapp et al.,2014)
Verbal persuasion	Family, love, quality feedback, mentoring, safe environment	Reports of feedback from others that improves students' self-efficacy (Bandura, 2006; Tas et al., 2014).
Physiological	Scared, embarrassing, nervous, excited, avoidance, reactions before, after or after completing tasks, self-efficacy talks, self-conscious	Reports of negative emotional states influences perception of ability to achieve goals (Bandura, 2006, Xu, 2013).
Other/ Falls outside of *a priori* expectations	Love language, caring relationships, friendships	Positive reports that do not reflect the four sources of self-efficacy as defined by Bandura (Bandura, 2006,Chapman & Campbell, 2016, Martinez et al., 2017).