

THE RELATIONSHIP BETWEEN SOCIAL-EMOTIONAL LEARNING SKILLS AND PEER PERCEPTION OF LEADERSHIP IN A SAMPLE OF UNDERSERVED MIDDLE SCHOOL YOUTHS

Angela Weiyi Wang, Maurice J. Elias, Edward Selby, and Simon Daniel

Rutgers, The State University of New Jersey

This study evaluated the relationship between social-emotional learning (SEL) and peer perceptions of youth leadership in a group of 203 students (38.9% Hispanic; 28.6% Black; 21.2% White; 10.3% Asian; 1.0% Others) in Grades 6th–8th from two diverse urban middle schools in New Jersey. Results indicated that SEL had a significant and positive impact on peer-nominated student leadership. Additionally, gender moderated the relationship between SEL and leadership, such that SEL had a stronger positive effect for female students than it did for male students on leadership nominations in spring 2016, but not fall 2015. Moreover, SEL had a stronger positive effect on leadership for nonnative English-speaking students than it did for native English speakers for both timepoints. These findings, their implications for theory and practice, study limitations, and future directions were explored.

Keywords: social-emotional learning, peer-nominated student leadership, urban middle school, gender, language

Adolescent Leadership and Development

Dating back to at least the times of Plato, human societies have witnessed numerous scholarly attempts to define the concept of leadership (Takala, 1998). In recent decades,

our understanding has evolved to move away from an individual perspective and toward an interpersonal lens that argues leadership exists in the context of a network of relationships and is dependent on the perceptions of the persons involved in those relationships in a larger

• **Correspondence concerning this article should be addressed to:** Angela Weiyi Wang, aww39@scarletmail.rutgers.edu

Journal of Character Education, Volume 18(2), 2022, pp. 47–68
Copyright © 2022 Information Age Publishing, Inc.

ISSN 1543-1223
All rights of reproduction in any form reserved.

social context (Bolman & Deal, 2017; Gardner, 2011). In other words, both leaders and followers contribute to leadership functions and shape the leader-follower relationship and larger cultural context shapes leadership development and the impact of given leaders. There has been an increasing contemporary interest in investigating the essential attributes, functions, and contexts that distinguish effective leaders from others (Joullié & Spillane, 2015). Yet, the development of leadership behaviors, particularly in diverse ecological contexts, has rarely been empirically examined and remains an elusive concept.

In addition to the obscurity of leadership development as a field, even less is known about leadership development in adolescents. Despite the wide recognition of the need for adolescent leadership development research that merits global attention, literature in this field continues to focus on adult leadership almost exclusively (Karagianni & Montgomery, 2016; Rehm, 2014). For instance, Bass and Bass (2008) conducted an exhaustive compilation and cataloging of more than five thousand leadership studies, and none of the studies looked at adolescent leadership. One attempt to decipher developmental aspects of youth leadership development has been the Fullerton Longitudinal Study, which has found adolescents with greater academic intrinsic motivation were more likely to be leaders (Gottfried et al., 2006; Gottfried et al., 2011). However, no empirical studies that have focused on the nature and importance of peer perceptions of student leadership. Taken together, with the scarcity of empirically supported youth leadership development theories, for the purpose of this study, we have adapted a comprehensive working definition of leadership that MacNeil (2006) proposed in her article on youth leadership development:

Leadership is a relational process combining ability (knowledge, skills, and talents) with authority (voice, influence, and decision-making power) to positively influence and impact diverse individuals, organizations, and communities. (p. 29)

This encompassing definition considers the contextual nature of leadership, shaped by the relationships within various leadership contexts, and allows room to bring diversity into the conversation as a crucial moderator for leaders. Furthermore, in the context of this leadership definition, leadership abilities could be considered as an array of multifaceted, multicomponent and innovative competencies, versus as a fixed personality trait (Karagianni & Montgomery, 2018). Compatible with Lev Vygotsky's "zone of proximal development," this definition of youth leadership underscores the interactional and relationship-based nature of truly effective leadership (Kress, 2006).

Although there has been literature that have focused on the foundational importance of student leadership (e.g., Czerniawski & Kidd, 2011; Komives et al., 2011; Mitra, 2007; Shankman et al., 2015; Whitehead, 2009), there are relatively few empirical studies that have focused on the nature and importance of student leadership. Thus, the current empirical study adapts this conceptualization of youth leadership as a malleable process susceptible to positive change when developed by means of appropriate interventions (Steele & Day, 2018).

Adolescent Social-Emotional and Character Development (SECD) Competencies

Adolescence is one of the most emotionally stressful developmental stage (Dahl et al., 2018). This period involves rapid physical, psychological, cognitive, social, and emotional transformations that prepare youths to take on novel responsibilities, challenges, fears, attitudes, and behaviors (Conderman & Pedersen, 2005). Furthermore, adolescents are more at risk for academic failure, internalizing disorders, suicide, juvenile delinquency, and other behavioral problems compared to youths of any other age cohort (Blackorby & Wagner, 1996; Conderman & Pedersen, 2005). On the other hand, the adolescence stage offers a dynamic developmental window to stimulate

adolescents' strengths, thereby boosting positive life outcomes. Hence, interventions that cultivate protective factors in adolescents' attitudes, skills, and relationships may yield extensive impacts on adolescents' aptitude to transcend their circumstances, overcome adversity, and successfully transition into adulthood (Morton & Montgomery, 2013).

In recent years, social-emotional learning (SEL) has been advanced to conceptualize youth interpersonal skill development, including leadership skills. The Collaborative for Academic, Social, and Emotional Learning (CASEL) is an international, scientific organization comprised of researchers, policymakers, educators, and practitioners dedicated to making evidence-based SEL an integral part of education from preschool through high school. CASEL defines SEL as the delivery and acquisition of essential skills and competencies to students, including self- and social-awareness, self-management, responsible decision-making, and relationship skills (Durlak et al., 2011; Ogden et al., 2016). SEL skills are best built and internalized when delivered in the contexts in which they are going to be applied (Elias, et al, 2014). Elias et al. (2014) has advocated for a learning pedagogy that bridges SEL and character development that motivates students "not only know the right ways to behave, but also to possess and use the skills to enact desired behaviors effectively" (p. 37). This definition explicitly recognizes teaching SEL behavioral skills (i.e., enact desired behaviors effectively) and cultivating positive virtues and character (i.e., having a prosocial mindset) must be integrated and synergized to enact long lasting positive change especially in the context of adversity, systematic oppression, trauma, and inequity that portrays many urban, minority environments (Hatchimonji, et al., 2017).

Adolescent SEL and Leadership

In the era of globalization, leadership for change is among one of the many important areas of literacy that is not taught in traditional

classroom settings. As literature has suggested, the fundamental skills of successful leadership include the ability of self-reflection, deciphering environmental cues, communication, decision-making, and building trust and empathy with followers, all of which are constructs of SEL competencies (Issah, 2018; Watkins et al., 2017). In addition, research defining SEL as emotional intelligence has suggested that the highest performing adult leaders have significantly higher emotional competence than their counterparts (Kerr et al., 2006).

Relatedly, current thinking about 21st-century schools and civic involvement recognizes social-emotional competencies and character education as a groundwork of constructive democratic participation and engaged citizenship (Wilczenski & Coomey, 2007). Emotion recognition, situation analysis, problem solving, and decision making are fundamental to augmenting discerning judgment and other leadership qualities (Elias, 2009). Social-emotional skills, in the context of positive character, are essential to nurturing emerging young leaders to participate effectively in a global and highly politicized world where their performances are challenged in the numerous and multifaceted roles that contemporary leadership demands.

Peer Perception of Ethical Leadership

Leadership does not always enable positive outcomes despite a penchant to examine the subject in aspirational terms (Reed, 2012). Leadership skills are neutral in nature and could take in the form of both a positive or a negative force that could catalyze both actions of evil and good. For instance, while peer pressure among adolescents has gained significant attention, the impact of positive peer leadership in school has barely been explored in diverse samples. Steinberg and Monahan (2007) contested that one's sensitivity to peer influence could be represented by an inverted U-shaped curve, with age 14 being the peak level of susceptibility.

Only recently have studies offered promising results on positive the influence of peers. For instance, one study of students (ages 11–13) in a small rural/suburban town in the United States found students' adaptive achievement motivation could be boosted by their perception of being valued and respected by classmates (Vollet et al., 2017). In addition, studies have shown that positive peer relations predict student academic performance and school enjoyment (Kiuru et al., 2020; Ryan, 2001). No studies, however, have examined how students elected as positive peer role models may improve social and emotional outcomes among schoolmates in settings populated primarily by low-income people of color in the United States. Further, influential leaders who carry a noble purpose may aspire to accelerate the advancement of humanity, whereas those with an ignoble purpose aim to exacerbate its destruction (Damon et al., 2003; Hatchimonji et al., 2017). There is an increase in the recognition of the role and importance of leadership for moving organizations and societies forward in a positive direction (Avolio & Gardner, 2005; Rhee & Sigler, 2015).

Considering the distinction between ethical and unethical leadership, this study operationalizes the peer perception of leadership in six facets capturing the intersections of SEL and qualities in being an ethical (i.e., intention; compassion) and effective (i.e., impact on others) leader. In addition, the following facets encompass three meta-categories of leadership: relations-oriented behaviors (i.e., being compassionate; being able to forgive), task-oriented behaviors (i.e., communication skills; problem solving skills) and change-oriented behaviors (i.e., making the community better; Kacmar et al., 2011; Yukl et al., 2002). The six ethical leadership facets include: (1) being generally perceived as a good leader, (2) making the community better, (3) being compassionate, (4) communication skills, (5) problem-solving skills, (6) being able to forgive. Since no prior studies have explored the relationship between SEL and youth leadership in school settings, this study addresses

this gap, with the expectation that peer nominations for leadership would be positively associated with students' SEL.

Gender, SEL, and Leadership

Given the long history of gender socialization in Western societies, it is not surprising to find that studies have consistently found females outperformed males in various assessments related to SEL skills. For instance, a study assessed gender differences of children and adolescents on positive SEL competencies with a cross-informant system involving caregivers, teachers, and students. Results demonstrated that female students were consistently rated as having significantly higher total scores of SEL competencies by all raters (Akos & Galassi, 2004). Another study showed that girls outperformed boys in both behavioral self-regulation and teacher-rated classroom self-regulatory assessments (Matthews et al., 2009). Hence, literature has consistently pointed to gender differences in SEL competency, where females outperformed males.

Despite extensive research on adult leadership, very little is known about leadership from the perspective of adolescent gender. This scarcity is especially glaring in how female youth construct leadership meanings and the spaces in which they identify themselves and others as leaders (Bettis & Adams, 2005). A study found that girls are more likely to identify themselves and others as informal leaders versus formal leaders. The former were those who do not fill a formal role but were widely recognized as leaders among their peers and the latter are individuals who are either appointed or elected to a designated position of leadership (Bettis & Adams, 2005). In this same study, when asked to describe when and where they or others demonstrated leadership qualities, most students gave examples of informal leadership scenarios that took place in between their classrooms and lives, such as in the hallway on the playgrounds. An example included "taking care of people" when teachers were not available. Thus, it is important to

explore how students perceive of leadership differently in their male versus female peers.

To conclude, previous research suggests male and female are evaluated differently and often influenced by gender stereotypes while females often score lower than men on traditional behaviors related with leadership but outrun their male counterparts on relational based skills operationalized by SEL (Rosch et al., 2014). Based on these findings, this study, in part, investigates how gender moderated the relationship between SEL and peer evaluation of leadership effectiveness.

Language, SEL, and Leadership

According to the 2015–16 report of the National Clearinghouse for English Language Acquisition, 41 counties in the United States identify more than 30% of their total students were nonnative language (L2) speakers and are predicted to be the fastest growing population of the United States K–12 population (Hernandez et al., 2008; NCELA, 2019). In addition to coping with the normative developmental changes and related stresses, the youth of immigrant families also tend to endure second language anxiety, putting them at higher risks for developing internalizing disorders (Teimouri et al., 2019). Some studies suggest that various environmental stressors unique to L2 speakers can negatively impact L2 speakers such as acculturation anxiety, trauma and upheaval associated with immigration, being bullied, and discrimination leading to varying degree of internalizing and externalizing problems (Adams & Richie, 2017; Niehaus & Adelson, 2014). However, a targeted search of the literature identified 14 peer-reviewed studies published from 2000 to 2011 suggest that L2 speakers have at least equal (if not better) SEL outcomes compared to native English speakers (Halle et al., 2014).

The moderating effect of language in the context of leadership skills is likewise equivocal. Literature indicates that being an L2 speaker may be taxing to students who are facing situations to self-advocate in a leadership

role, often requiring individuals to establish connections in communication through observation, imitation, and execution (Lieven & Tomasello, 2008). These leadership skills are highly reliant on social learning abilities and may become particularly strenuous to second language students. L2 speakers tends to be affected by various external and internal factors such as lack of exposure to communicative contexts, and learners' anxiety about L2 use (Jeong et al., 2016). This is especially salient in contexts where language is imperative in generating an immediate response, such as situations of leadership in school settings. In contrast, other studies posit that language does not play a significant role in leadership. A 17-country empirical study showed that language choice (native or English) did not affect managerial reactions to specific leadership scenario-based situations (Zander et al., 2011). Although no consensus has been reached regarding the impact of language on leadership, more literature seems to suggest that there are more challenges than opportunities that may jeopardize the chances of L2 youths being recognized and perceived as leaders in various contexts, including school settings.

THE CURRENT STUDY

The current study was part of a larger 3-year project that included the implementation of an SECD intervention in six urban middle schools in New Jersey. The intervention, called MOSAIC (“Mastering Our Skills and Inspiring Character”) aims to help middle school students (6th–8th grade) develop positive purpose, SEL skills, and inspiration to become their “best selves” to make contributions to their school, the community, and the wider world. MOSAIC includes a 3-year curriculum that guides middle school students to find their positive purpose by supporting character inspiration and SEL skill mastery in daily 15-minute lessons sequenced around monthly themes. Because data for this study were cross-sectional and collected without any experimental

manipulations, it is important to note that there can be no inference made on causality or the direction of the effects.

Research Questions and Hypotheses

The limited literature on the topic of youth leadership points to the need to better understand the relationship of student engagement in leadership, the parameters of youth leadership, and the possible indicators of leadership qualities among children. The project aimed to answer six research questions.

Research Question 1. How do the proposed leadership facets (peer perceptions of being a good leader, making the community better, being compassionate, communication skills, problem solving skills, being able to forgive) relate to each other and do they form a single leadership construct?

Hypothesis 1. The proposed leadership facets (peer perceptions of being a good Leader, making the community better, being compassionate, communication skills, problem solving skills, being able to forgive) all correlate with one another and can be treated as a single construct.

Research Question 2. How are social-emotional learning (SEL) skills, gender and English language proficiency related to peer perceptions of leadership attributes?

Hypothesis 2a. Students with higher social-emotional learning skills would be more likely to be nominated as a good leader compared to students with lower social-emotional learning skills.

Hypothesis 2b. Male students would be more likely to be nominated as a good leader than female students.

Hypothesis 2c. Native English-speaking (L1) students would be more likely to be nominated as a good leader compared to nonnative English-speaking (L2) students.

Research Question 3. Are improvements in peer nominated leadership related to improvements in SEL, from fall 2015 to spring 2016?

Hypothesis 3a. Students who improve more on SEL from fall 2015 to spring 2016 would improve more on their peer nominated leadership from fall 2015 to spring 2016.

Research Question 4. Does gender moderate the relationship between SEL and leadership?

Hypothesis 4a. The relationship between SEL and leadership is moderated by gender such that the relationship is stronger for male students compared to female students in fall 2015.

Hypothesis 4b. The relationship between SEL and leadership is moderated by gender such that the relationship is stronger for male students compared to female students in spring 2016.

Hypothesis 4c. The relationship between changes in SEL and changes in leadership is moderated by gender such that the relationship is stronger for male students compared to female students.

Research Question 5. Does language moderate the relationship between SEL and leadership?

Hypothesis 5a. The relationship between SEL and leadership is moderated by language such that the relationship is stronger for nonnative English language (L2) speakers compared native language (L1) speakers in fall 2015.

Hypothesis 5b. The relationship between SEL and leadership is moderated by language such that the relationship is stronger for nonnative English language (L2) speakers compared native language speakers (L1) in spring 2016.

Hypothesis 5c. The relationship between changes in SEL and changes in leadership is moderated by language such that the relationship is stronger for nonnative English language (L2) speakers compared native language (L1) speakers.

METHODS

Sample Definition

This study focused on three (of six) schools participating in MOSAIC that had the highest level of systematic and consistent implementation of the student assessment over time, based on consultant ratings in a prior study (Linsky, 2020). There were 817 sixth- to eighth-grade students in the original sample, including students registered for both fall 2015 and spring 2016, in the three schools in this study according to demographic data given by the district. Ultimately, students were included in this study only if their data included more than 75% of the teacher rating of social-emotional learning (DESSA) at both fall 2015 and spring 2016. Students were removed from the study if they did not have both time points of the teacher ratings of SEL completed ($n = 603$). There were no missing data for the leadership nomination survey at either time points as students who did not receive any nomination would be given “0” nominations. After removing participants meeting the above exclusion criteria, only 11 participants from School C remained. Because of this small n , these students were also removed from the final study sample.

Students in the selected analysis sample ($n = 203$) were not significantly different than unselected students in the study schools during fall 2015 and spring 2016 in regard to gender, age, or eligibility for free/reduced lunch. The students selected for the study analysis were less likely to identify as Black and more likely to identify as Hispanic and White compared to students not selected for the sample ($\chi^2(6) = 24.08, p < .01$). Additionally, students in the analysis sample were more likely to identify as

nonnative English speakers compared to the unselected students ($\chi^2(1) = 42.46, p < .01$).

The final sample consisted of 203 Grade 6th–8th students from two diverse urban middle schools in New Jersey. Participants self-identified their race and ethnicity (38.9% Hispanic; 28.6% Black; 21.2% White; 10.3% Asian; 1.0% Others). Demographics of the selected analysis sample ($n = 203$) can be found in Table 1.

Procedures

In fall 2015 and spring 2016, students were consented to participate in the study through a passive consent process approved by the school board and the research institution’s institutional review board. Students were also provided an opportunity to decline participation through an “opt out” assent process.

Student self-report batteries were given twice (fall and spring) during each intervention year. In fall 2015, surveys were administered electronically through the web-based system, Qualtrics. In response to school feedback, in spring 2016, student assessments changed from web-based survey to paper-pencil scantron survey. MOSAIC teachers completed the Devereux Student Strengths Assessment-mini (DESSA-mini) at both time points using a Qualtrics survey during scheduled prep time as determined by individual school administrators (estimated survey completion time of one minute/student).

Measures

Demographics. Student demographics, including race/ethnicity, grade level, free/reduced lunch status, age, and gender were collected from the district’s student database.

Youth Leadership. All students were administered the Youth Leadership Survey (YLS; SECD lab) to assess students’ perceptions of youth leadership. The YLS is a self-report nomination survey that asked students to nominate as many students they would like on six qualities that are proposed to be

TABLE 1
Demographic Characteristics of Selected Analysis Sample by School, Fall 2015

	<i>A</i>	<i>B</i>	<i>Total</i>
Female identified <i>n</i> (%)	84 (51.2)	19 (48.7)	103
Male identified <i>n</i> (%)	80 (48.8)	20 (51.3)	100
American Indian <i>n</i> (%)	1 (0.6)	0 (0)	1
Asian <i>n</i> (%)	19 (11.6)	2 (5.1)	21
Black <i>n</i> (%)	40 (24.4)	18 (46.2)	58
Hispanic <i>n</i> (%)	71 (43.3)	8 (20.5)	79
Multiracial <i>n</i> (%)	0 (0)	1 (2.6)	1
White <i>n</i> (%)	33 (20.1)	10 (25.6)	43
Native <i>n</i> (%)	60 (36.6)	27 (69.2)	87
Nonnative <i>n</i> (%)	104 (63.4)	12 (30.8)	116
Total selected analysis sample <i>n</i> (%)	164 (81.2)	39 (19.3)	202

related to leadership. In addition to overall perception of who students consider to be a good leader among their peers, five facets of leadership were examined: making the community better, being compassionate, communication skills, problem solving skills, being able to forgive. For example, students are asked to answer, “Who, in your whole school, communicates well with others.” The YLS nomination strategy stemmed from social network analysis and is designed to capture the “indegree centrality” which represents the literal count of the number of nominations an individual received. This methodology has been shown to reliably measure direct relationship influence (Borgatti, 2005).

Social-Emotional Competencies. The Devereux Student Strengths Assessment-mini-Survey (DESSA-mini; LeBuffe et al., 2009), form A, is an 8-item teacher-report measure that assesses students’ social-emotional strengths and resilience (i.e., positive behaviors). All homeroom teachers were administered the DESSA-mini to rate each student on their frequency of demonstrating specific positive behaviors during the past 4 weeks on a 5-point Likert scale (1 = *never* to 5 = *very frequently*). These items are aligned with CASEL’s five SEL competencies frame-

work: (a) self-awareness, (b) social awareness, (c) self-management, (d) relationship skills, (e) goal-directed behavior, (f) personal responsibility, (g) decision making, and (h) optimistic thinking. Examples of items include: “Accept responsibility for what she/he did?” and “Contribute to group efforts?” The DESSA-mini is a validated universal screening and progress-monitoring tool for kindergarten–8th grade students’ social-emotional competence and has very good internal consistency reliability (fall 2015 = $\alpha = .974$; spring 2016, $\alpha = .983$).

Data Analyses

For each research question and associated hypotheses, we will describe the data analysis approach in presenting the results in the next section. We will conduct a series of Pearson and Spearman correlations to test the associations of variables of interest across time. Additionally, we will apply a series of independent sample *t* tests to examine if there are any differences in SEL and peer perceptions of leadership across genders and languages. Lastly, the moderating effect of gender and language respectively on the relationship between SEL

and leadership will be tested using hierarchical regressions.

PRELIMINARY RESULTS

Descriptive Statistics. Means, standard deviation, minimum and maximum scores of all major continuous variables are presented in Table 2.

Data Transformation. To eliminate differences between schools for overall number of leadership nominations, two transformations were made. First, the proportion of nominations each student received was used, rather than their raw number of nominations. This eliminated the effect of differences between schools where more nominations were given out than in other schools. Second, each student's proportion of nominations was multiplied by the proportion of students in the sample that came from their school. This eliminated the effect of school size.

Normality. Upon examining the centered leadership subscales for normality, skewness was very high for most variables. This was not surprising, since most students received zero or one nomination and very few received more than ten nominations. Similarly, the kurtosis values were high for most variables, indicating that at both time points the distribution were heavy tailed for most facets. Skewness and kurtosis values were generally not problems for the predictor variables except for spring 2016 DESSA, which was negatively skewed.

Research has shown overpowered sample sizes tend to inflate the significant tests of normality (McCrum-Gardner, 2010); for this reason, normality transformations were not conducted. However, because of these potential violations of the assumption of normality, analyses were conducted using both parametric and nonparametric statistics.

RESULTS

Research Question 1

Research Question 1 was regarding how the proposed leadership facets relate to each other. We hypothesized that the proposed leadership facets (peer perceptions of being a good Leader, making the community better, being compassionate, communication skills, problem solving skills, being able to forgive) all correlate with one another and can be treated as a single construct. Both Pearson and Spearman correlations were conducted for this analysis. Pearson correlation analyses were run between each of the separate leadership facets. Results indicated that there was a significant positive association between all the proposed leadership facets (peer perceptions of being a good leader, making the community better, being compassionate, communication skills, problem solving skills, being able to forgive), ranging from .565–.794 for fall 2015 (see Table 3) and .541–.819 for spring 2016 (see Table 4). In addition, Spearman correlations

TABLE 2
Descriptive Statistics of Leadership Nominations and DESSA Scores by Time Point

<i>Item</i>	<i>Mean</i>	<i>SD</i>	<i>Minimum</i>	<i>Maximum</i>
Fall 2015				
Leadership Nominations	3.12	2.74	0	15.33
DESSA	2.88	0.89	0.22	4.0
Spring 2016				
Leadership nominations	2.83	2.52	0	13.17
DESSA	2.99	0.89	0	4.0

TABLE 3
Pearson's Correlations for Youth Leadership Survey Items (Fall 2015)

<i>Variable</i>	<i>1</i>	<i>2</i>	<i>3</i>	<i>4</i>	<i>5</i>	<i>6</i>
1. Good leader	—					
2. Community	.79**	—				
3. Compassionate	.78**	.75**	—			
4. Communication	.76**	.72**	.79**	—		
5. Problem solver	.78**	.71**	.76**	.79**	—	
6. Forgiveness	.57**	.60**	.67**	.67**	.65**	—

Note: ** $p < .01$.

TABLE 4
Spearman's Correlations for Youth Leadership Survey Items (Fall 2015)

<i>Variable</i>	<i>1</i>	<i>2</i>	<i>3</i>	<i>4</i>	<i>5</i>	<i>6</i>
1. Good leader	—					
2. Community	.73**	—				
3. Compassionate	.75**	.69**	—			
4. Communication	.72**	.67**	.75**	—		
5. Problem solver	.68**	.66**	.68**	.70**	—	
6. Forgiveness	.58**	.62**	.66**	.62**	.62**	—

Note: ** $p < .01$.

generated similar results, ranging from .582–.752 for fall 2015 (see Table 5) and .506–.736 for spring 2016 (see Table 6). Given the high correlations, for both fall 2015 and spring 2016, Cronbach's alpha was run to test whether the subscales of leadership could be combined into single overall leadership scores for each time point (fall 2015, $\alpha = .938$ and for spring 2016, $\alpha = .92$). However, it is important to note that because factor analyses were not conducted, and invariance was not established, this overall perception of leadership score is to be interpreted with caution. Limitations of this will be further discussed in the discussion section.

Research Question 2

Research Question 2 was regarding how Social-Emotional Learning (SEL) skills, gen-

der and English language proficiency related to peer perceptions of leadership attributes. Before examining Research Question 2, we ran a set of correlations on all continuous variables for fall 2015 (see Table 7), spring 2016 (see Table 8) and change scores from fall 2015 to spring 2016 (see Table 9).

First, we hypothesized that students with higher SEL skills would be more likely to be nominated as a good leader compared to students with lower SEL skills. Results of both Pearson and the Spearman correlations indicated that there were significant positive associations between students' SEL skills and leadership nominations for fall 2015, ($r(201) = .347, p < .001$; $r_s(201) = .329, p < .001$). Similarly, results of both Pearson and the Spearman correlations indicated that there were significant positive associations between students' SEL skills and leadership nomina-

TABLE 5
Pearson's Correlations for Youth Leadership Survey Items (Spring 2016)

<i>Variable</i>	<i>1</i>	<i>2</i>	<i>3</i>	<i>4</i>	<i>5</i>	<i>6</i>
1. Good leader	—					
2. Community	.78**	—				
3. Compassionate	.62**	.64**	—			
4. Communication	.65**	.58**	.72**	—		
5. Problem solver	.82**	.77**	.75**	.69**	—	
6. Forgiveness	.54**	.54**	.68**	.57**	.62**	—

Note: ** $p < .01$.

TABLE 6
Spearman's Correlations for Youth Leadership Survey Items (Spring 2016)

<i>Variable</i>	<i>1</i>	<i>2</i>	<i>3</i>	<i>4</i>	<i>5</i>	<i>6</i>
1. Good leader	—					
2. Community	.64**	—				
3. Compassionate	.55**	.63**	—			
4. Communication	.61**	.59**	.66**	—		
5. Problem solver	.74**	.66**	.64**	.69**	—	
6. Forgiveness	.53**	.52**	.58**	.54**	.51**	—

Note: ** $p < .01$.

TABLE 7
Pearson (Lower Left) and Spearman (Upper Right) Correlations
Between Leadership Nominations and DESSA Scores for Fall 2015

	<i>Leadership Nominations</i>	<i>DESSA</i>
Leadership nominations	—	.329**
DESSA	.347**	—

Note: ** $p < .01$.

TABLE 8
Pearson (Lower Left) and Spearman (Upper Right) Correlations
Between Leadership Nominations and DESSA Scores for Spring 2016

	<i>Leadership Nominations</i>	<i>DESSA</i>
Leadership nominations	—	.372**
DESSA	.375**	—

Note: * $p < .05$. ** $p < .01$.

TABLE 9
Pearson (Lower Left) and Spearman (Upper Right) Correlations
Between Leadership Nominations and DESSA Scores Across Time Points

	<i>Leadership Nominations</i>	<i>DESSA</i>
Leadership Nominations	0.718**	.197**
DESSA	.153*	0.618**

Note: * $p < .05$. ** $p < .01$.

tions for spring 2016, ($r(201) = .375, p < .001$; $r_s(201) = .372, p < .001$). Results demonstrated that students with higher SEL skills would be more likely to be nominated as a good leader compared to students with lower SEL skills.

Second, we hypothesized that male students would be more likely to be nominated as a good leader than female students. Next, we ran an independent t-test which showed that there was a significant difference in leadership nominations for fall 2015 between male students ($M = .0120, SD = 0.01$) and female students ($M = 0.0229, SD = .02$); $t(171.39) = -5.019, p < .001$, where female students scored higher than male students. Similarly, a Mann-Whitney u test showed that fall 2015 leadership nominations were higher for females ($Mdn = .0177$) than males ($Mdn = .0087$) $U = 3,170.5, p < .001$. In addition, there was a significant leadership nominations difference in the scores for male students for spring 2016 ($M = .0116, SD = .01$) and female students ($M = .0241, SD = .02$); $t(158.90) = -5.592, p < .001$, where female students scored higher than male students. Similarly, a Mann-Whitney U test showed that spring 2016 leadership nominations were higher for females ($Mdn = .0190$) than males ($Mdn = .0085$) $U = 2,967.0, p < .001$. This was the opposite of what was hypothesized.

Lastly, we hypothesized that L1 students would be more likely to be nominated as a good leader compared to L2 students. Similar analyses were run to address hypothesis 2c. There was a significant leadership nominations difference in the scores for L1 students in fall 2015 ($M = .014, SD = 0.014$) and L2 students

($M = 0.020, SD = 0.017$); $t(200.17) = 2.91, p < .01$. A Mann-Whitney U test showed that fall 2015 leadership nominations were higher for L2 students ($Mdn = .015$) than L1 students ($Mdn = .009$) $U = 3,866.5, p < .01$. Similarly, there was a significant leadership nominations difference in the scores for L1 students for spring 2016 ($M = .013, SD = .012$) and L2 students ($M = .021, SD = .019$); $t(195.66) = 3.66, p < .05$. A Mann-Whitney u test showed that spring 2016 leadership nominations were higher for L2 students ($Mdn = .015$) than L1 students ($Mdn = .011$) $U = 3,958.5, p < .001$. This was contrary to the hypothesis.

Research Question 3

Research question 3 was regarding if improvements in peer nominated leadership is related to improvements in SEL, from fall 2015 to spring 2016. To answer Research Question 3, we created residualized difference scores for leadership and SEL to represent the difference between the fall 2015 scores and spring 2016 scores, to avoid the issues related to simple difference scores. For each variable, we ran a regression using the fall 2015 scores to predict the spring 2016 scores and generated unstandardized residual scores for each student. We applied these residual difference scores as the outcome variable in the following analyses.

We hypothesized that students who improved more on SEL from fall 2015 to spring 2016 would improve more on their peer nominated leadership from fall 2015 to spring 2016. To answer this question, we ran a cor-

relation between the SEL and leadership nominations difference scores. Results of both Pearson and the Spearman correlations indicated that there were significant improvements in peer nominated leadership related to improvements in SEL from fall 2015 to spring 2016 ($r(201) = .153, p < .05$; $r_s(201) = .197, p < .01$).

Research Question 4

Research Question 4 was regarding the moderating effect of gender on the relationship between SEL and leadership. First, we ran three independent sample t-tests to see if there are any differences in SEL across genders. Results showed that there was a significant difference in SEL for fall 2015 between male students ($M = 2.6512, SD = 0.92$) and female students ($M = 3.1037, SD = .81$); $t(201) = -3.726, p < .001$, where female students scored higher than male students. Similarly, results indicated that there was a significant difference in SEL for fall 2015 between male students ($M = 2.6824, SD = .94$) and female students ($M = 3.2902, SD = .73$); $t(201) = -5.161, p < .001$, where female students scored higher than male students. Lastly, results demonstrated that there was a significant difference in SEL change scores from fall 2015 to spring 2016 between male students ($M = -.1670, SD = .72$) and female students ($M = .1620, SD = .65$); $t(201) = -3.43, p < .005$, where female students scored higher than male students.

The moderating effect of gender on the relationship between SEL and leadership were tested using hierarchical regressions. We hypothesized that the relationship between SEL and leadership are moderated by gender such that the relationship is stronger for male students compared to female students in fall 2015. This was tested by an interaction term of gender and SEL for fall 2015, the interaction was not significant ($b = .001, p = .81$), though there were main effects for gender ($b = .008, p < .001$) and for SEL ($b = .005, p < .001$), presented in Figure 1.

Next, we hypothesized that the relationship between SEL and leadership are moderated by gender such that the relationship is stronger for male students compared to female students in spring 2016. This was tested by an interaction term of gender and SEL for spring 2016, the interaction was significant ($b = .008, p < .01$). Additionally, there were main effects for gender ($b = .008, p < .001$) and for SEL ($b = .006, p < .001$). SEL had a stronger positive effect for female students than for male students on leadership nominations in spring 2016, shown in Figure 2.

Lastly, we hypothesized that the relationship between changes in SEL and changes in leadership are moderated by gender such that the relationship is stronger for male students compared to female students. As shown in Figure 3, no significant interaction effects were found.

Research Question 5

Research Question 5 was regarding if language moderates the relationship between SEL and leadership and by examining the interaction term of language and SEL. First, I ran three independent sample t-tests to see if there are any differences in SEL across L1 and L2 students. Results showed that there was not a significant difference in SEL for fall 2015 between L1 students and L2 students. However, results indicated that there was a significant difference in SEL for fall 2015 between L1 students ($M = -2.7537, SD = .92$) and L2 students ($M = 3.1686, SD = .83$); $t(201) = 3.368, p < .005$, where L2 students scored higher than L1 students. Lastly, results demonstrated that there was a significant difference in SEL change scores from fall 2015 to spring 2016 between L1 students ($M = -.1725, SD = .74$) and L2 students ($M = .1294, SD = .65$); $t(201) = 3.103, p < .005$, where L2 students scored higher than L1 students.

The moderating effects of language on the relationship between SEL and leadership were tested using hierarchical regressions. First, we

FIGURE 1

The moderating effect of gender on the relationship between SEL and leadership for fall 2015. Low DESSA was defined as one *SD* below the mean while high DESSA was defined as one *SD* above the mean.

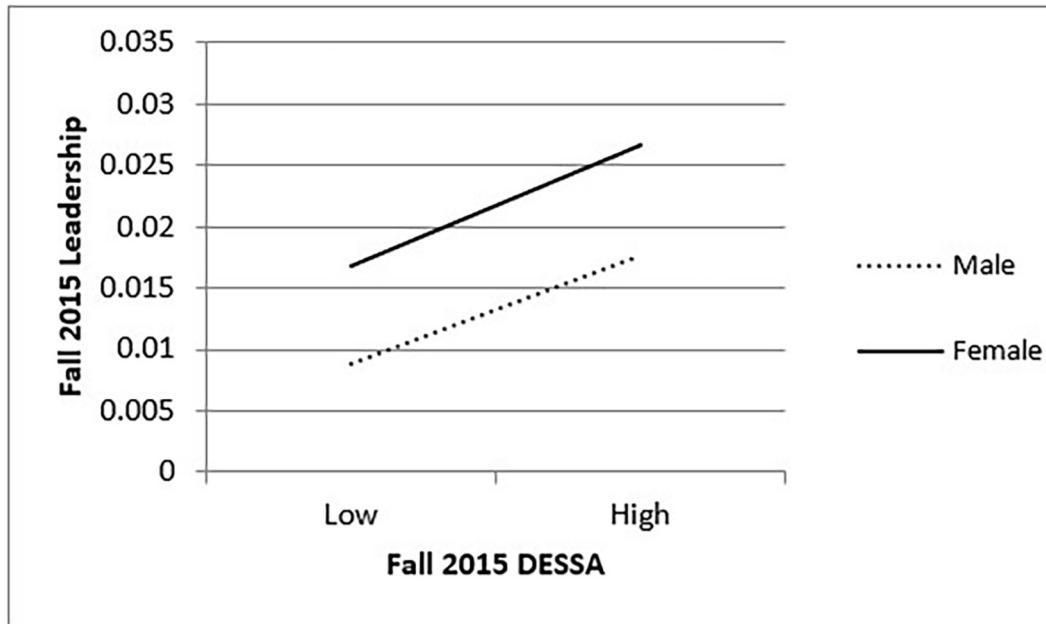


FIGURE 2

The moderating effect of gender on the relationship between SEL and leadership for Spring 2016. Low DESSA was defined as one *SD* below the mean while high DESSA was defined as one *SD* above the mean.

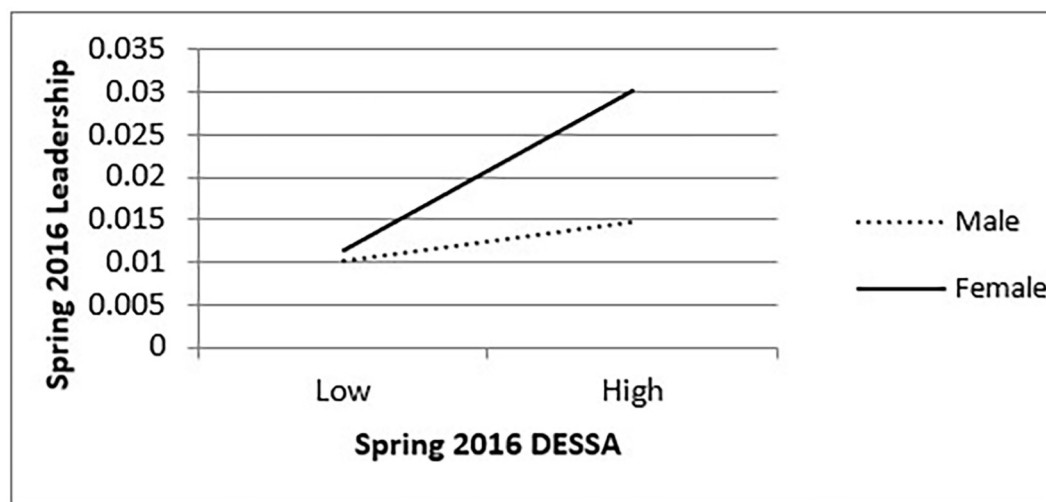
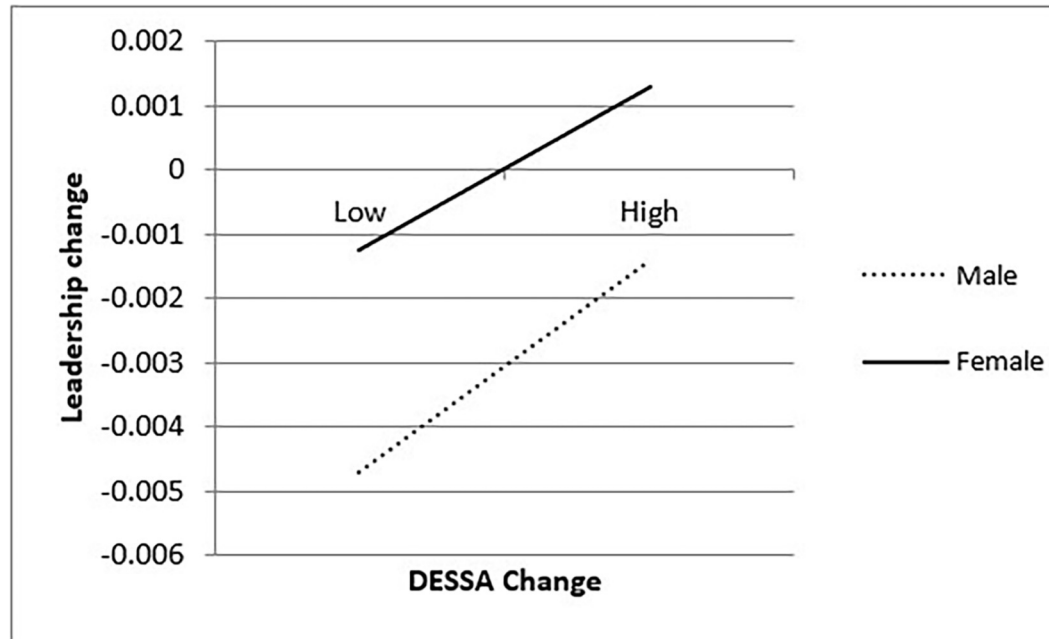


FIGURE 3

The moderating effect of gender on the relationship between SEL and leadership change scores. Low DESSA was defined as one *SD* below the mean while high DESSA was defined as one *SD* above the mean.



hypothesized that the relationship between SEL and leadership are moderated by language such that the relationship is stronger for L1 students compared to L2 students in fall 2015, the interaction was significant ($b = -.005, p < .05$). In addition, there were main effects for language ($b = -.005, p < .05$) and for SEL ($b = .006, p < .001$), presented in Figure 4. The figure plotted the relationship between SEL and leadership for L2 students compared to L1 students (Aiken & West, 1991) and showed that the line for L2 students is steeper than that for L1 students. This suggested that SEL had a stronger positive effect on leadership for L2 students than it did for L1 students in spring 2015.

Next, we hypothesized that the relationship between SEL and leadership are moderated by language such that the relationship is stronger for L2 speakers compared to L1 speakers in spring 2016. This interaction term was margin-

ally significant ($b = -.005, p = .05$). In addition, there were main effects for language ($b = -.006, p < .05$) and for SEL ($b = .007, p < .001$), presented in Figure 5, suggesting that improvements in SEL had a stronger positive effect in gains in leadership for L2 students than it did for L1 in spring 2016.

Lastly, we hypothesized that the relationship between changes in SEL and changes in leadership are moderated by language such that the relationship is stronger for L2 students compared to L1 students. The interaction was not significant for the residualized difference scores for SEL and leadership ($b = .001, p = .67$). No main effects were found for language ($b = -.002, p = .15$) or for SEL ($b = .002, p = .31$). Visual presentations of the interaction demonstrating the pattern of effect in L1 students versus L2 students are presented in Figure 6.

FIGURE 4

The moderating effect of language on the relationship between SEL and leadership for fall 2015. Low DESSA was defined as one *SD* below the mean while high DESSA was defined as one *SD* above the mean.

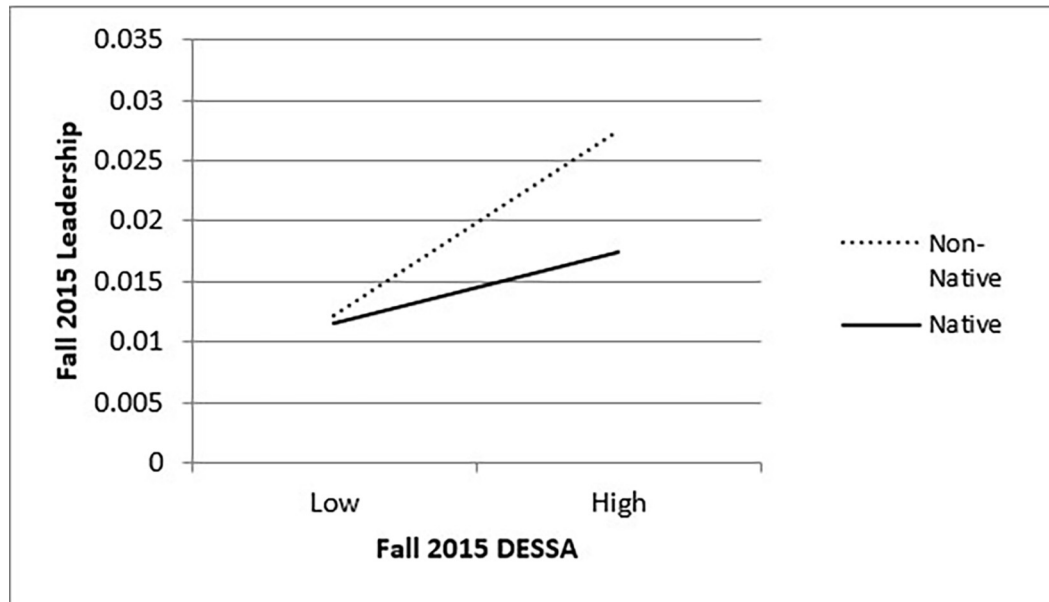
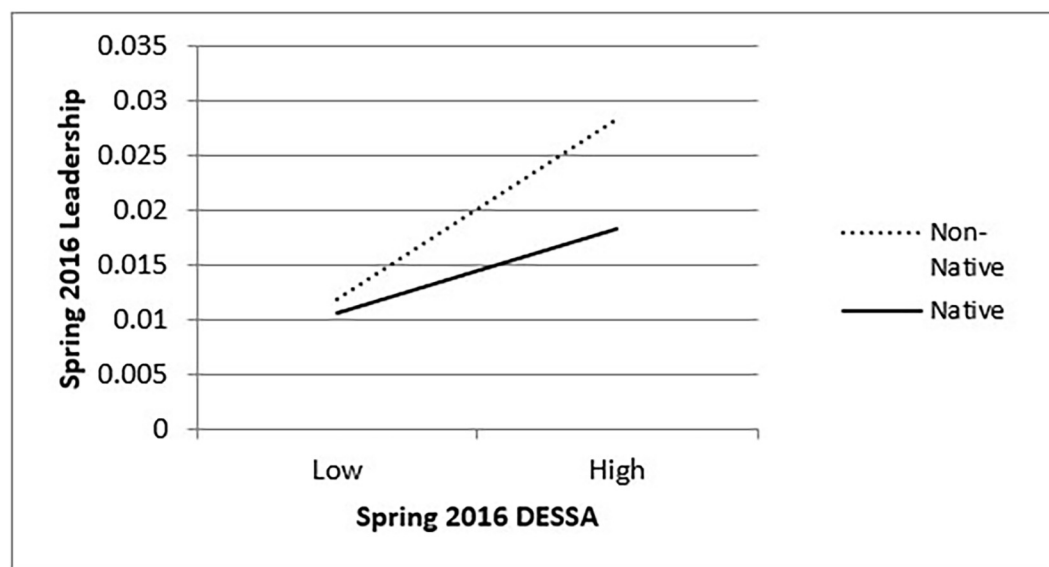


FIGURE 5

The moderating effect of language on the relationship between SEL and leadership for spring 2016. Low DESSA was defined as one *SD* below the mean while high DESSA was defined as one *SD* above the mean.



DISCUSSION

The primary goal of the current study was to address several gaps in the youth leadership development literature by quantitatively assessing the role of SEL in peer perceived ethical leadership nominations in the context of urban middle schools. Findings from these analyses help to illuminate the relationship of (peer-nominated) student leadership facets and (teacher-rated) student social-emotional learning. Results demonstrated that SEL was positively related to leadership. Additional analysis investigated how gender and language status influenced the relationship between the variables of interest. The results supported some but not all of the hypotheses proposed. These findings, their implications, study limitations, and future directions are explored in this section.

SEL and Leadership

Results indicated that there was a significant positive association at both time points between all the proposed ethical leadership facets (peer perceptions of being a good leader, making the community better, being compassionate, being able to communicate well, being able to solve problems effectively, being able to forgive). Findings demonstrated that at both time points, students with higher SEL skills were more likely to be nominated as a good leader compared to students with lower SEL skills. In addition, there was a significant improvement in peer nominated leadership related to improvements in SEL from fall 2015 to spring 2016. This finding aligns with the adult leadership literature which suggests that the highest performing adult leaders have significantly higher emotional competence than their counterparts (Rosete & Ciarrochi, 2005). However, it is important to note that correlation was used as the statistic model in this analysis; thus, a causal direction could not be determined. It is possible that higher SEL is leading to leadership nominations or that the leadership nominations are increasing stu-

dents' SEL. Either is a possibility or there might be a third variable causing changes in both SEL and leadership nominations.

Gender, SEL, and Leadership

One of the objectives of the present work was to explore gender differences on SEL and leadership. Consistent with previous literature, results demonstrated that female students were rated as having significantly higher teacher rated SEL at all timepoints. Furthermore, this resembled past studies showing that gender differences in positive emotions were especially evident in middle childhood and adolescence (Chaplin & Aldao, 2013). This sample of students are within the age range that this difference is most pronounced.

As for how male and female leaders are perceived differently as leaders by their peers, results showed that female students were more likely to be nominated as effective leaders than male students for both timepoints. This was surprising since most of the adult leadership literature suggest that due to an implicit masculine bias in societal perceptions of leadership, equally qualified female leaders were rated to be less effective and less preferred over male leaders (Rhee & Sigler, 2015). However, a small number of studies mentioned in the introduction countered these general findings and support the results of the current study (e.g., Bettis & Adams, 2005).

Additionally, this study investigated whether the relationship between SEL and peer-perceived leadership nominations is different for male and female students. My analyses showed that SEL had a stronger positive effect for female students than it does for male students on leadership nominations in spring 2016, but not fall 2015. Female students who were high in SEL were particularly seen as good leaders, compared to their female counterparts who were low in SEL. This finding did not hold for male students. One explanation for this could be that students all had lessons on leadership through the MOSAIC curriculum which might have reduced the gender bias; in

other words, by spring 2016, students were more likely to know what to look for in leadership constructs, versus following implicit masculine biased impressions.

Language, SEL, and Leadership

Another objective of the present study was to explore the difference between non-native English language (L2) speakers compared native language (L1) speakers on SEL and ethical leadership. Results in the current study demonstrated that L2 students were rated as having significantly higher teacher-rated SEL at all timepoints. This is partly supported by some past research that suggested social-emotional outcomes for young L2 learners have at least equal (if not better) social-emotional outcomes compared to native English speakers (Halle et al., 2014). However, contextual and individual characteristics are important factors for illuminating the unique influence of L2 status on social-emotional outcomes. Some may argue that the challenging experiences of L2 students have led to higher cultural intelligence that builds on emotional intelligence concepts and allows them to connect with people with similarities and adapt to different environments. Other studies have proposed that other sociodemographic variables are related to foreign language anxiety that may then influence SEL skills. This includes age, education level, number of languages known, age of acquisition, context of acquisition, and frequency of use (Dewaele et al., 2008).

Additionally, this study investigated whether the relationship between SEL and peer perceived leadership nominations is different for L1 and L2 students. Unexpectedly, leadership nominations were higher for non-native English-speaking students than native English-speaking students. This was consistent with only a few studies on language and adult leadership. A 17-countries empirical study that assessed the role of language on specific leadership scenario-based situations demonstrated that language choice (native or English) did not affect the response to studied

leadership scenarios. Instead, cultural and situational context predicted leadership decisions and reactions (Zander et al., 2011). Nevertheless, there has been a lack of youth literature on language and leadership and even the adult research results have been mixed in whether language plays a role in leadership effectiveness and perceptions. Because of this gap in research, no consensus could be reached regarding the impact of language on leadership.

Lastly, additional analyses investigated if the relationship between SEL and leadership is moderated by language. As predicted, SEL had a stronger positive effect on leadership for non-native students than it did for native students in both time points. However, the relationship between changes in SEL and changes in leadership was not moderated by language.

Study Limitations

The present study has several limitations. The DESSA mini survey may reflect reporting biases such as reference bias and unconscious bias in expectations and/or assessment of performance. Furthermore, it would be key to include multiple informants outside of the classroom context such as parents and other stakeholders in a student's life to increase the representativeness of assessing a students' SEL skills and leadership abilities in various contexts. In addition, the leadership survey administered was not created as an assessment to evaluate leadership qualities but rather to examine students' perceptions of youth leadership. Relatedly, it is possible that peer perceptions of youth leadership occur in additional ways that have not been captured in the leadership survey from the current study. Lastly, it is important to note that this overall perception of leadership score is to be interpreted with caution as factor analyses were not conducted, and invariance was not established. To justify the use of such a single leadership score, future research should validate the measurement model by conducting multivariate statistical

procedures such as confirmatory factor analysis and exploratory factor analysis.

Implications and Future Directions

Schools play a formative role in fostering healthy adolescents by cultivating not only their cognitive development but also their social and emotional development. An integral part of this is the way schools provide leadership opportunities for their populations. The current study is the first study that explored SEL, and peer-nominated leadership in the context of gender and language for middle school students, the findings from the current study have important implications for academics and practitioners.

From a research perspective, future studies could explore other mediators that could better explain the relationship between SEL and peer perceptions of leadership. For instance, problem solving, and communication skills were shown to have the highest correlation with peer perceptions of good leadership. Thus, it might be worthwhile to further explore problem solving and communication skills as potential mediators of SEL and peer perceptions leadership and/or that they might be the third variable causing changes in both social emotional learning and leadership nominations.

Additionally, the reasoning behind why the effects of SEL on leadership differ by gender and language warrants further research. Future research could look at interpersonal and intrapersonal aspects of SEL and leadership separately and how gender and language might moderate these relationships. In addition, another study could look at how gender and language might differentially moderate the relationship between SEL and the three meta-categories of leadership: relations-oriented behaviors (i.e., being compassionate; being able to forgive), task-oriented behaviors (i.e., communication skills; problem solving skills) and change-oriented behaviors (i.e., making the community better; Kacmar et al., 2011; Yukl et al., 2002).

From the practitioner's perspective, the fact that teacher perceptions of SEL consistently and positively predict peer perceptions of leadership is a very intriguing finding. At a minimum, it suggests that leadership development should be an explicit aspect of SEL interventions. It also suggests that a special focus of SEL programs could be to nurture a cadre of particularly effective, SEL-skilled student leaders (e.g., Hatchimonji et al., 2017). Additionally, future studies could look at longitudinal data to examine the evidence for persistence and fade-out programmatic effects in nurturing impactful leadership skills that can transcend into adulthood (Bailey et al., 2020).

Both female and non-native speaking students are unrepresented populations in top leadership positions due to varying barriers and socialization expectations. However, this study seems to suggest within this limited sample, when these underrepresented groups are offered appropriate opportunities and resources (e.g., SEL and leadership development resources), they tend to benefit from them equally if not more than their more represented counterparts. This calls for the need of a better understanding of how the social identities of our young leaders (i.e., race, ethnicity, gender, language, minority status) may interact to influence the exercise of effective leadership that is much needed for the future of our country.

Acknowledgments: This research was supported by the John Templeton Foundation, entitled, Enhancing Student Purpose with the Middle School Ambassador Collaborative Action-Research Study (ID #56203). We would like to express our gratitude toward the students, staff, and teachers at our study schools, who took the time and effort to complete the surveys used in this study. We would also like to acknowledge members of the Rutgers Social-Emotional and Character Development Lab, who helped to clean the study data.

REFERENCES

- Adams, S. R., & Richie, C. (2017). Social emotional learning and English language learners: A review of the literature. *Intesol Journal*, 14(1), Article 1. <https://journals.iupui.edu/index.php/intesol/article/view/21625>
- Akos, P., & Galassi, J. P. (2004). Gender and race as variables in psychosocial adjustment to middle and high school. *The Journal of Educational Research*, 98(2), 102–108. <https://www.tandfonline.com/doi/abs/10.3200/JOER.98.2.102-108>
- Avolio, B. J., & Gardner, W. L. (2005). Authentic leadership development: Getting to the root of positive forms of leadership. *The Leadership Quarterly*, 16(3), 315–338. <https://doi.org/10.1016/j.leaqua.2005.03.001>
- Elias, M. J. (2009). Social-emotional and character development and academics as a dual focus of educational policy. *Educational Policy - Educational Policy*, 23, 831–846.
- Elias, M. J., Kranzler, A., Parker, S. J., Kash, V. M., & Weissberg, R. P. (2014). The complementary perspectives of social and emotional learning, moral education, and character education. In L. Nucci, D. Narvaez, & T. Krettenauer (Eds.), *Handbook of moral and character education* (2nd ed., pp. 272–289). Taylor & Francis.
- Bailey, D. H., Duncan, G. J., Cunha, F., Foorman, B. R., & Yeager, D. S. (2020). Persistence and fade-out of educational-intervention effects: Mechanisms and potential solutions. *Psychological Science in The Public Interest*, 21(2), 55–97.
- Bass, B. M., & Bass, R. (2008). *The Bass handbook of leadership: Theory, research, and managerial applications* (4th ed.). Free Press.
- Bettis, P. J., & Adams, N. G. (2005). *Geographies of girlhood: Identities in-between*. Routledge.
- Blackorby, J., & Wagner, M. (1996). Longitudinal postschool outcomes of youth with disabilities: Findings from the national longitudinal transition study. *Exceptional Children*, 62(5), 399–413. <https://doi.org/10.1177/001440299606200502>
- Borgatti, S. P. (2005). Centrality and network flow. *Social Networks*, 27(1), 55–71. <https://doi.org/10.1016/j.socnet.2004.11.008>
- Chaplin, T. M., & Aldao, A. (2013). Gender differences in emotion expression in children: A meta-analytic review. *Psychological Bulletin*, 139(4), 735–765. <https://doi.org/10.1037/a0030737>
- Conderman, G., & Pedersen, T. (2005). Promoting positive special education practices. *NASSP Bulletin*, 89(644), 90–98. <https://doi.org/10.1177/019263650508964406>
- Czerniawski, G., & Kidd, W. (2011). *Student voice handbook: Bridging the academic/practitioner divide*. Emerald.
- Dahl, R. E., Allen, N. B., Wilbrecht, L., & Suleiman, A. B. (2018). Importance of investing in adolescence from a developmental science perspective. *Nature*, 554(7693), 441–450. <https://doi.org/10.1038/nature25770>
- Damon, W., Mariano, J., & Cotton, B. K. (2003). The development of purpose during adolescence. *Applied Developmental Science*, 7, 119–128.
- Dewaele, J.-M., Petrides, K. V., & Furnham, A. (2008). Effects of trait emotional intelligence and sociobiographical variables on communicative anxiety and foreign language anxiety among adult multilinguals: A review and empirical investigation. *Language Learning*, 58(4), 911–960.
- Durlak, J. A., Weissberg, R. P., Dymnicki, A. B., Taylor, R. D., & Schellinger, K. B. (2011). The impact of enhancing students' social and emotional learning: A meta-analysis of school-based universal interventions. *Child Development*, 82(1), 405–432.
- Gardner, H. E. (2011). *Leading minds: An anatomy of leadership*. Basic Books.
- Gottfried, A. E., Gottfried, A. W., Reichard, R. J., Guerin, D. W., Oliver, P. H., & Riggio, R. E. (2011). Motivational roots of leadership: A longitudinal study from childhood through adulthood. *The Leadership Quarterly*, 22(3), 510–519. <https://doi.org/10.1016/j.leaqua.2011.04.008>
- Gottfried, A. W., Gottfried, A. E., & Guerin, D. W. (2006). The Fullerton Longitudinal Study: A long-term investigation of intellectual and motivational giftedness. *Journal for the Education of the Gifted*, 29(4), 430–450. <https://doi.org/10.4219/jeg-2006-244>
- Hatchimonji, D. R., Linsky, A. V., & Elias, M. J. (2017). Cultivating noble purpose in urban middle schools: A missing piece in school transformation. *Education*, 138(2), 162–178.
- Hernandez, D. J., Denton, N. A., & Macartney, S. E. (2008). Children in immigrant families: Looking to America's future. *Social Policy Report*, 22(3), 1–24. <https://doi.org/10.1002/j.2379-3988.2008.tb00056.x>

- Issah, M. (2018). Change leadership: The role of emotional intelligence. *SAGE open*, 8(3), 2158244018800910. <https://doi.org/10.1177/2158244018800910>
- Jeong, H., Sugiura, M., Suzuki, W., Sassa, Y., Hashizume, H., & Kawashima, R. (2016). Neural correlates of second-language communication and the effect of language anxiety. *Neuropsychologia*, 84, e2–e12. <https://doi.org/10.1016/j.neuropsychologia.2016.02.012>
- Joullié, J.-E., & Spillane, R. (2015). *Philosophy of leadership: The power of authority*. Springer.
- Kacmar, K. M., Bachrach, D. G., Harris, K. J., & Zivnuska, S. (2011). Fostering good citizenship through ethical leadership: Exploring the moderating role of gender and organizational politics. *Journal of Applied Psychology*, 96(3), 633–642. <https://doi.org/10.1037/a0021872>
- Karagianni, D., & Montgomery, A. J. (2018). Developing leadership skills among adolescents and young adults: A review of leadership programmes. *International Journal of Adolescence and Youth*, 23(1), 86–98.
- Kerr, R., Garvin, J., Heaton, N., & Boyle, E. (2006). Emotional intelligence and leadership effectiveness. *Leadership & Organization Development Journal*, 27(4), 265–279. <https://doi.org/10.1108/01437730610666028>
- Kiuru, N., Wang, M.-T., Salmela-Aro, K., Kannas, L., Ahonen, T., & Hirvonen, R. (2020). Associations between adolescents' interpersonal relationships, school well-being, and academic achievement during educational transitions. *Journal of Youth and Adolescence*, 49(5), 1057–1072. <https://doi.org/10.1007/s10964-019-01184-y>
- Komives, S. R., Dugan, J. P., Owen, J. E., Slack, C., & Wagner, W. (2011). *The handbook for student leadership development* (2nd ed.). Jossey-Bass, an Imprint of Wiley.
- Lieven, E., & Tomasello, M. (2008). Children's first language acquisition from a usage-based perspective. In P. Robinson & N. C. Ellis (Eds.), *Handbook of cognitive linguistics and second language acquisition* (pp. 168–196). Routledge/Taylor & Francis Group.
- Linsky, A. C. (2020). *The effect of program implementation quality on the social-emotional learning and negative mental health of urban middle school students in the mosaic intervention*. Rutgers University.
- MacNeil, C. A. (2006). Bridging generations: Applying “adult” leadership theories to youth leadership development. *New Directions for Youth Development*, 2006(109), 27–43.
- McCrum-Gardner, E. (2010). Sample size and power calculations made simple. *International Journal of Therapy and Rehabilitation*, 17(1), 10–14. <https://doi.org/10.12968/ijtr.2010.17.1.45988>
- Mitra, D. (2007). Student voice in school reform: From listening to leadership. In D. Thiessen & A. Cook-Sather (Eds.), *International handbook of student experience in elementary and secondary school* (pp. 727–744). Springer Netherlands. https://doi.org/10.1007/1-4020-3367-2_29
- Naglieri, J. A., LeBuffe, P., & Shapiro, V. B. (2011). Universal screening for social-emotional competencies: A study of the reliability and validity of the DESSA-mini. *Psychology in the Schools*, 48(7), 660–671. <https://doi.org/10.1002/pits.20586>
- Niehaus, K., & Adelson, J. L. (2014). School support, parental involvement, and academic and social-emotional outcomes for English language learners. *American Educational Research Journal*, 51(4), 810–844.
- Ogden, C. L., Carroll, M. D., Lawman, H. G., Fryar, C. D., Kruszon-Moran, D., Kit, B. K., & Flegal, K. M. (2016). Trends in obesity prevalence among children and adolescents in the United States, 1988–1994 through 2013–2014. *JAMA*, 315(21), 2292. <https://doi.org/10.1001/jama.2016.6361>
- Reed, G. E. (2012). Leading questions: Leadership, ethics, and administrative evil. *Leadership*, 8(2), 187–198.
- Rehm, C. J. (2014). An evidence-based practitioner's model for adolescent leadership development. *Journal of Leadership Education*, 13(3), 83–97.
- Rhee, K. S., & Sigler, T. H. (2015). Untangling the relationship between gender and leadership. *Gender in Management: An International Journal*, 30(2), 109–134. <https://doi.org/10.1108/GM-09-2013-0114>
- Rosete, D., & Ciarrochi, J. (2005). Emotional intelligence and its relationship to workplace performance outcomes of leadership effectiveness. *Leadership & Organization Development Journal*, 26(5), 388–399. <https://doi.org/10.1108/01437730510607871>
- Shankman, M. L., Allen, S. J., & Haber-Curran, P. (2015). *Emotionally intelligent leadership: A guide for students*. John Wiley & Sons.

- Steele, A. R., & Day, D. V. (2018). The role of self-attention in leader development. *Journal of Leadership Studies*, 12(2), 17–32.
- Steinberg, L., & Monahan, K. C. (2007). Age differences in resistance to peer influence. *Developmental Psychology*, 43(6), 1531–1543. <https://doi.org/10.1037/0012-1649.43.6.1531>
- Teimouri, Y., Goetze, J., & Plonsky, L. (2019). Second language anxiety and achievement: A meta-analysis—Erratum. *Studies in Second Language Acquisition*, 41(2), 489–489.
- Vollet, J. W., Kindermann, T. A., & Skinner, E. A. (2017). In peer matters, teachers matter: Peer group influences on students' engagement depend on teacher involvement. *Journal of Educational Psychology*, 109(5), 635–652. <https://doi.org/10.1037/edu0000172>
- Watkins, D., Earnhardt, M., Pittenger, L., Roberts, R., Rietsema, K., & Cosman-Ross, J. (2017). Thriving in complexity: A framework for leadership education. *Journal of Leadership Education*, 16(4), 148–163. <https://doi.org/10.12806/v16/i4/t4>
- Whitehead, G. (2009). Adolescent leadership development: Building a case for an authenticity framework. *Educational Management Administration & Leadership*, 37(6), 847–872. <https://doi.org/10.1177/1741143209345441>
- Whitlock, J. L. (2006). Youth perceptions of life at school: Contextual correlates of school connectedness in adolescence. *Applied Developmental Science*, 10, 13–29.
- Wilczenski, F. L., & Coomey, S. M. (2007). *A practical guide to service learning: Strategies for positive development in schools*. Springer.
- Zander, L., Mockaitis, A. I., & Harzing, A.-W. (2011). Standardization and contextualization: A study of language and leadership across 17 countries. *Journal of World Business*, 46(3), 296–304.
- Zulch, B. (2014). Leadership communication in project management. *Procedia - Social and Behavioral Sciences*, 119, 172–181. <https://doi.org/10.1016/j.sbspro.2014.03.021>