Underperforming Academic Scholars Rostered in the Pipeline to Prison or Nowhere on a Lifeline!

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ABSTRACT

This study examined the extent to which one of the Department of Education's (DOE) Coordinated Early Intervening Services (CEIS) affects academically struggling general education students from various elementary, middle, and high schools in Equliebeh School District. This study utilized quantitative techniques to examine whether CEIS participation impacted KDG–12 scholars' academic growth, behavioral indicators, and demographic group representation in eligibility for Individual Education Plans (IEPs). It employed a causal-comparative design, grounded in a positivist paradigm, and examined how English Language Arts (ELA) and Math scores, absences, suspensions, and school mobility affected the academic performance of 395 scholars over a 24–27-month period. The findings from this study provided valuable insights into the role of demographics in the eligibility for and enrollment in the CEIS program. Ethnicity played a significant role in a student's likelihood of enrolling in the program, as indicated by all p-values < 0.001. Grounded in Bandura's Self-Efficacy Theory, the study examined how scholars' motivation, resilience, and perceived ability to succeed may have influenced CEIS outcomes, particularly among ethnic groups that are overrepresented in program enrollment. Furthermore, the study highlighted disparities among diverse racial and ethnic groups, thus aligning with the tenets of academic inequities. These disproportions underscore the urgency of addressing structural and systemic barriers that perpetuate educational inequities before, during, and after intervention. The findings emphasize the importance of fidelity monitoring, culturally responsive pedagogy, and trauma-informed support to ensure CEIS aligns with its federally mandated equity objectives.

1. Introduction

According to the Department of Education (DOE), Local Education Agencies (LEAs) are expected to work closely with their Student Information System (SIS) and Individualized Education Program (IEP) to determine the best way to track the status of students who receive CEIS services throughout their enrollment. The program's intended results can be adversely affected if effective progress monitoring systems are not aligned with students' performance

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and if the program is not implemented with fidelity. This present study examined how CEIS implementation in the Equliebeh School District aligned with or deviated from these federal expectations.

Therefore, states must report the number of children who receive CEIS and are consequently determined to be IDEA-eligible no later than two years after receiving early intervening services. According to Valencia (2010), biased grading rubrics and ineffective disciplinary practices permeate educational institutions throughout the United States, forcing students into special education programs due to what is labeled as cognitive or behavioral disorders, also referred to as soft disabilities.

Historically, public education has been marked by inequitable patterns of student identification, discipline, and access to support services. Black and Hispanic/Latino scholars, in particular, have been disproportionately referred to special education due to subjective interpretations of behavior, cultural misunderstandings, and implicit bias embedded in school systems. As early as the 1970s, this overrepresentation prompted widespread concern, prompting advocacy and legal review. The landmark case *Larry P. v. Riles* (1979), for example, restricted the use of culturally biased IQ tests to identify Black students for special education in California. Similarly*, Diana v. State Board of Education* (1970) emphasized the importance of linguistic and cultural considerations in educational placement decisions. These cases underscored the urgent need for structural reform in referral and identification processes.

These advocacy efforts and court rulings culminated in key federal legislation aimed at addressing disproportionality in special education and exclusionary discipline. The 2004 reauthorization of the Individuals with Disabilities Education Act (IDEA) required Local Education Agencies (LEAs) to monitor significant disproportionality in the identification, placement, and disciplinary actions of students with disabilities. To address disparities before they result in misclassification or special education placement, the Individuals with Disabilities Education Act (IDEA) also allows districts to voluntarily implement CEIS for students who are not yet identified under IDEA but need additional academic and behavioral support. IDEA authorizes LEAs to use up to 15% of Part B funds for voluntary CEIS and requires annual state reporting of CEIS usage and subsequent special education placement within two years. Similarly, the No Child Left Behind (NCLB) Act of 2001 mandated disaggregated subgroup reporting and accountability, pressing schools to examine achievement and access disparities across race, language, and income lines.

Recent literature supports these concerns. For example, Barbadoro (2017) examined the social-emotional effects of disparate discipline and its contribution to academic disengagement among students of color. The education system, although well-intended, leverages high-school dropouts' misfortune through failed systemic bias practices, ultimately propelling scholars into crimes and potentially prison. Failing grades, an outcome of behavioral referrals, absenteeism, and socioeconomic factors, are the most critical factors associated with teaching and learning success (Huffman et al., 2000). In contrast to their successful peers who meet grade-level expectations, some scholars have argued that suspended and expelled students are more likely to become academic underperformers, ultimately being retained, when compared to their peers who meet and/or exceed grade-level expectations. This praxis results in low self-esteem, feelings of exclusion, and ultimately hopelessness among struggling scholars, ultimately triggering high school dropout and leading to involvement in the juvenile justice system.

Misunderstood discipline disparities lead to unfavorable outcomes for the most vulnerable students, with traumatic and lifelong consequences, such as poverty, prolonged educational disengagement, low cognitive skills, and thus, an inability to engage in civic life. As a result, some scholars involuntarily forfeit opportunities to become productive citizens who interpret

and respect the laws of their communities and participate actively in the democratic process. Moreover, these disadvantages significantly contribute to a generational catastrophe, leaving descendants at the bottom of the totem pole. First, there is no significant evidence suggesting that excluding children from daily instruction—instead of teaching and harnessing social-emotional skills, which empower scholars' agency and consequently combat current infringements—improves behavior. Furthermore, social-emotional skills significantly influence student agency development by enabling scholars to reflect, understand, and manage their emotions, thereby building self-confidence, navigating social situations effectively, and actively taking a leadership role in their learning process. For instance, certain characteristics, such as self-awareness, relational skills, self-management, and social awareness — encompassing empathy and collaboration — enable scholars to take ownership of their education and make informed decisions about their learning journey, thereby becoming active agents in their academic and social development. Educators MUST shift from authoritative instructors to learning facilitators who guide and support scholars in this process.

Second, negative or adverse grade reports, as well as one-size-fits-all non-tiered informal and formal assessment planning and results, primarily affect the social-emotional development and learning capacity of underperforming scholars in various ways. This praxis creates social inequity in learning communities, thus sowing bias or false perceptions through cultural misunderstandings camouflaged by what teachers sometimes call "insubordination," which refers to scholars' disengagement due to a lack of interest in their learning environments, be they in school cafeterias, gymnasiums, study halls, media centers, school playgrounds or classrooms.

Third, when scholars challenge authorities and classroom norms due to their inability to engage in classroom activities, they are removed from learning environments in the name of disciplinary conduct, "disrespect," or "rudeness." This results in missed classwork, i.e., instruction, which leads to failing grades and, thus, lower self-esteem and, in many cases, a feeling of hopelessness. One famous slogan that echoes throughout many classrooms is, "They are disrespectful or not paying attention in class," a far cry from the truth. Ultimately, these scholars are labeled as "classroom violators," initiating a cycle of in-school and out-of-school discipline referrals. Disillusioned, scholars skip classes, wander the hallways, and learning evolves into the new mantra: "absenteeism," becoming a decisive factor in their learning cycles. Under the IDEA mandates, these "troubled" scholars are often targeted for IEPs based on a flawed, non-holistic screening scheme, also known as an Initial IEP Meeting, triggered by underperformance of state standards.

Accordingly, by governmental design and policy initiatives, these identifiers unintentionally contribute and become crucial byproducts of the current education reform systems. For example, failing grades and exclusion from peer groups are congruent with evaluative practices that erode scholars' self-confidence, exacerbate some teachers' arrogance, and foster involuntary insubordination behavioral patterns, consequently sidelining specific groups of scholars. Although well-intentioned, these casualties of academic organizational circumstances inflicted by aloof top-down policymakers continue to bypass the root causes due to a lack of understanding of the whole child. The study was informed by Bandura's Self-Efficacy Theory, which emphasizes that a scholar's belief in their ability to succeed shapes motivation, persistence, and academic performance.

Therefore, the demand for preventative, interventive, and social-emotional development monitoring systems—such as the Multi-Tiered Systems of Support (MTSS) facilitated by SEL personnel (i.e., a dedicated school psychologist and case manager, coupled with a shared social worker rooted in efficacious virtues)—is an inevitable necessity that is consistently overlooked

and bypassed during the annual school year budget planning. This specialized team must become doorkeepers to minimize the significant disproportionality of ethnic groups with Individual Education Plans, who are often academic patients trapped in an undiagnostic educational institution without a prognosis. Ready or not, undoubtedly, these underperforming scholars are destined to become the gatekeepers of the next generation—the cornerstone of any vital society.

To combat these traditional academic schemata, personalized pedagogical approaches with a laser focus on the whole child are initial protocol interrupters, strengthened by dedicated SEL staff's expertise to provide trauma-informed and social-emotional intervention strategies. Unexcused absences, in-and out-of-school suspension, linear grading patterns, disciplinary practices, and a lack of social-emotional support are informed mainly by economics (Barbadoro, 2017).

CEIS and similar intervention services have begun to be implemented in urban schools across the United States through federal mandates outside the special education sphere, offering a glimmer of hope for the next generation while holding school systems accountable. Therefore, developing precursor and tailored evaluative systems to determine whether a scholar's academic performance is influenced by any of the above-mentioned factors—or by second-language acquisition, eroded by socio-economic conditions—is crucial to correctly identify whether a struggling English Language scholar requires English-language services (ESOL, ESL/Bilingual), or support through general education-based cognitive, behavioral and/or social emotional classifications. Similarly, when an underperforming General Education Scholar is not meeting state standards, the correct evaluation/diagnosis and intervention must be administered to ensure academic success.

In response to these systemic failures, this study is grounded in Bandura's Self-Efficacy Theory, which underscores the pivotal role of a scholar's belief in their ability to influence outcomes, particularly within learning environments shaped by structural inequities. Without urgent and sustained intervention, the ongoing misidentification, exclusion, and disengagement of underperforming general education scholars will continue to erode the promise of CEIS and jeopardize the academic trajectory of future generations.

2. Purpose of the Study

In this causal-comparative quantitative study, the researcher examined the extent to which one of the Department of Education's (DOE) Voluntary (CEIS) affects academically struggling general education scholars from various elementary, middle, and high schools in the Equliebeh School District. Approximately 1,400 students were initially identified as being at academic and behavioral risk in the district and could ultimately be targeted for individualized education plans (IEPs). However, only 395 students had the required data points.

The study evaluated the relationship between CEIS participation and (a) achievement in English Language Arts and Mathematics, (b) behavior-related indicators including suspensions and absences, and (c) disproportionality in special education referrals based on race and ethnicity. The Equliebeh School District's official records and reports provided proof by sharing students' identification and the established CEIS identification procedures, including the number of students first labeled as being at academic and behavioral risk.

The Department of Education (DOE) aims to provide additional academic and behavioral support for targeted populations struggling academically, thereby enabling them to succeed in general education classrooms rather than defaulting to special education programming. IDEA regulation (34 C.F.R. §300.226) requires schools to report to the state on the number of students

who received CEIS and those who subsequently received special education and related services under Part B. This reporting requirement is particularly important for LEAs that use Part B funds for the CEIS program.

3. Research Methods and Data Source

This study employed a quantitative, causal-comparative research design to investigate whether participation in CEIS produced measurable academic and behavioral outcomes for underperforming general education scholars. Following Vogt's (2014) framework on variable analysis, the study was situated within a positivist paradigm. This design is particularly well-suited for analyzing equity-centered interventions in real-world school settings where random assignment is not feasible (Nickow et al., 2020). Archival numerical data from the district's Student Information System (SIS) were used to assess whether CEIS had an impact on seven tracked indicators over a 24– to 27-month period. These included English Language Arts (ELA) and Math scale scores, excused and unexcused absences, in-school and out-of-school suspensions, and enrollment mobility. Scholars who lacked complete pre- and post-intervention data or who exited the district during the mid-intervention period were excluded to ensure statistical validity and control for attrition bias. The final analytic sample consisted of 395 scholars, drawn from an original roster of approximately 1,400. Statistical analysis using IBM SPSS (Version 28) included paired-sample t-tests for academic growth and factorial ANOVAs to examine differences by subgroup characteristics. An alpha level of .05 was used to determine statistical significance.

- RQ1. Are there discernible patterns in achievement, behavioral, and demographic variables for students in general education participating in the CEIS program services?
- RQ2. Are there statistically significant differences in students' academic growth in CEIS before and after participating in the program?

Following Vogt's (2014) framework on variable analysis, archival numerical data were obtained from the district's Student Information System (SIS). The seven indicators analyzed over the 24–27-month intervention period included ELA and Math scale scores, excused and unexcused absences, in-school and out-of-school suspensions, and enrollment mobility. The final analytic sample consisted of 395 scholars, drawn from an original roster of approximately 1,400 students who met CEIS eligibility criteria. Data were retrieved through a formal request to the Local Education Agency (LEA), and all entries were anonymized before analysis. All identifying information was removed during the preprocessing stage. Although student IDs serve as unique identifiers for each data point, they were scrambled and not linked to the students' actual IDs within the school system.

Statistical procedures using IBM SPSS (Version 28) included paired-sample t-tests to assess academic growth in English Language Arts and Mathematics as well as factorial ANOVAs to explore subgroup differences by gender, ethnicity, discipline, attendance, and mobility. Paired-sample t-tests were chosen to evaluate change over time in student outcomes, while factorial ANOVA allowed for the examination of interaction effects across demographic and behavioral variables, supporting the study's equity-focused analysis of disproportionality. The data were securely stored on an encrypted drive managed by the district and remained inaccessible to unauthorized third parties, thus maintaining participant confidentiality and anonymity throughout the study.

To maintain the integrity of participant confidentiality, no data were disclosed to unauthorized third parties. Moreover, the researcher was unable to identify or re-identify individual participants. A G*Power analysis confirmed that a minimum sample size of approximately 200

would be sufficient for individual statistical analyses, thus affirming the adequacy and statistical power of the final sample of 395 scholars.

The targeted population of interest was general education underperforming scholars who participated in the Equliebeh County School District's CEIS programming. They were eligible based on the U.S. Department of Education's (DOE) parameters and district-defined eligibility protocols, intended to support early intervention prior to special education referral. The inclusion criteria were (a) being a student, (b) currently enrolled in the district and state of interest, and (c) enrolled in CEIS based on these detailed criteria. These criteria align with federal CEIS implementation guidelines, which emphasize early academic and behavioral interventions for students who have not yet been classified for special education but require additional support.

These analyses were conceptually grounded in Bandura's Self-Efficacy Theory, which posits that students' academic performance is shaped in part by their belief in their ability to succeed, particularly when appropriate supports are in place. This theoretical lens was employed to examine the relationship between early intervention services and student outcomes among underperforming scholars in general education.

3.1. Model 1: Association Between Demographics and CEIS Participation (Chi-Square Test)

To examine whether participation in the CEIS program was associated with student demographic characteristics, the following model was specified:

χ^2 (CEIS Participation$_i$) = f (Ethnicity$_i$, Gender$_i$)

- Dependent Variable:
  - *Participation$_i$*: Binary outcome (1 = Enrolled in CEIS, 0 = Not enrolled)
- Independent Variables:
  - *Ethnicity$_i$*: Categorical (e.g., Hispanic, Non-Hispanic)
  - *Gender$_i$*: Categorical (e.g., Male, Female, Other)

A chi-square test of independence was used to determine whether the distribution of CEIS participation differed significantly across demographic categories.

3.2. Model 2: Academic Performance Before and After CEIS (Paired-Sample T-Test)

To evaluate the effect of CEIS participation on academic performance in Math and English Language Arts (ELA), paired-sample t-tests were conducted for repeated measures over time:

$$\Delta Score_{math} = Math_{post} - Math_{pre}$$
$$\Delta Score_{ela} = ELA_{post} - ELA_{pre}$$

- Dependent Variables:
  - *Math$_{pre}$* and *Math$_{post}$*: Continuous scores before and after CEIS
  - *ELA$_{pre}$* and *ELA$_{post}$*: Continuous scores before and after CEIS

These differences were tested for statistical significance to evaluate the impact of the intervention on academic growth.

3.3. Model 3: Predictors of Academic Growth (MANOVA and Factorial ANOVA)

To determine the influence of demographic and behavioral variables on academic growth, a multivariate and factorial analysis was conducted:

$[\Delta Math_i, \Delta ELA_i] = f(Gender_i, Ethnicity_i, Mobility_i, Suspension_i, Absences_i)$

- **Dependent Variables**:
    - *$\Delta Math_i$*: Change in Math scores
    - *ΔELA_i*: Change in ELA scores

- **Independent Variables**:
    - *$Gender_i$*: Categorical
    - *$Ethnicity_i$*: Categorical
    - *$Mobility_i$*: Number of school changes
    - *$Suspension_i$*: In- and Out-of-school suspension days
    - *$Absences_i$*: Excused and Unexcused Absence Categories

MANOVA was first used to examine multivariate effects, followed by factorial ANOVAs to determine specific contributions of predictors to each academic outcome.

4. Results

Descriptive statistics and bivariate analysis were used to examine the patterns in achievement, behavioral, and demographic variables. Moreover, the difference mean was used to analyze achievement before and after the CEIS program, using multivariate ANOVA with a chi-square test for independence.

Demographics and CEIS Participation

Table 1. Summary of participation in the CEIS program

| School Year | Ethnicity | Participation in the CEIS program | | Pearson Chi-Square | Asymptotic Significance (2-sided) |
		No	Yes		
2016	Asian	0.00%	100.00%	117.87	<0.001
	African American	4.50%	95.50%		
	Hispanic	1.30%	98.70%		
	Multi-Racial	12.50%	87.50%		
	Caucasian	66.70%	33.30%		
2017	Asian		100.00%	70.16	<0.001
	African American	10.40%	89.60%		
	Hispanic	1.50%	98.50%		
	Multi-Racial	14.30%	85.70%		
	Caucasian	83.30%	16.70%		
2018	Asian		100.00%	56.82	<0.001
	African American	15.30%	84.30%		
	Hispanic	10.30%	89.70%		
	Multi-Racial	40.00%	60.00%		
	Caucasian	100.00%			

2019	Asian	0.00%	100.00%	36.35	<0.001
	African American	16.80%	83.20%		
	Hispanic	11.80%	88.20%		
	Multi-Racial	0.00%	100.00%		
	Caucasian	90.00%	10.00%		

Table 1 presents data on participation in the CEIS program over four academic years, spanning various ethnicities. It includes the percentage of participants from each ethnic group, the Pearson chi-Square statistic, and its associated asymptotic significance (two-sided p-value). Participation rates varied significantly across the four school years. In 2016, Asian scholars participated at a rate of 100%, while Caucasians participated at a rate of 33.3%. This suggested that Asian scholars met CEIS eligibility criteria differently from other general education groups. In contrast, African American students had higher involvement rates than Caucasian students in all four years, indicating that they were more likely to participate due to academic and behavioral challenges. Although less represented than African American scholars, Hispanic scholars participated at a moderate rate. Multiracial scholars exhibited fluctuating participation rates, with a notable peak in 2018. The observed ethnic group differences were statistically significant, as indicated by the Chi-Square statistic and a p-value less than 0.001, suggesting that ethnicity was associated with CEIS eligibility.

Table 1. Participation in the CEIS program by gender

Participation in the CEIS program				
Gender	**No**			**Yes**
Female	10.40%	89.40%	Pearson Chi-Square	Asymptotic Significance (2-sided)
Male	12.80%	87.20%	3.95	0.14

Table 2 presents data on participation in the CEIS program by gender. The data are presented in terms of the percentage of students who participated in and did not participate in the program for each gender, along with the Pearson Chi-Square statistic and its associated asymptotic significance. The results indicated a slight difference in participation rates by gender. In this dataset, 89.4% of females participated in the CEIS program, while 87.2% of males participated. The chi-square statistic of 3.95 was relatively low, and the associated p-value of 0.139 was greater than the typical significance level of 0.05. This suggested that the difference in gender participation rates was not statistically significant within this dataset. Based on this data, no substantial evidence indicated that gender significantly determines a student's likelihood to participate in the CEIS program.

Table 2. Participation of all students in the CEIS program over the study period

Participation in the CEIS program				
School-Year	**No**	**Yes**	**Pearson Chi-Square**	**Asymptotic Significance (2-sided)**
2016	6.30%	93.70%	41.18	<.001
2017	11.10%	88.90%		
2018	17.60%	82.10%		
2019	18.50%	81.50%		

Table 3 shows CEIS (Coordinated Early Intervening Services) participation by school year. For each school year, the Pearson Chi-Square statistic and the corresponding two-sided p-value (asymptotic significance) are presented, along with the percentage of students who participated in the program. CEIS program participation trended across four school years. The program

achieved a participation rate of 93.7% in 2016; however, its participation rate dropped to 88.9%, 82.1%, and 81.5% in 2017, 2018, and 2019, respectively. In 2016, the Chi-Square statistic was 41.18, with a p-value of <.001, indicating a significant difference in participation compared to subsequent years. This revealed notable shifts in CEIS participation rates following the 2016 baseline year.
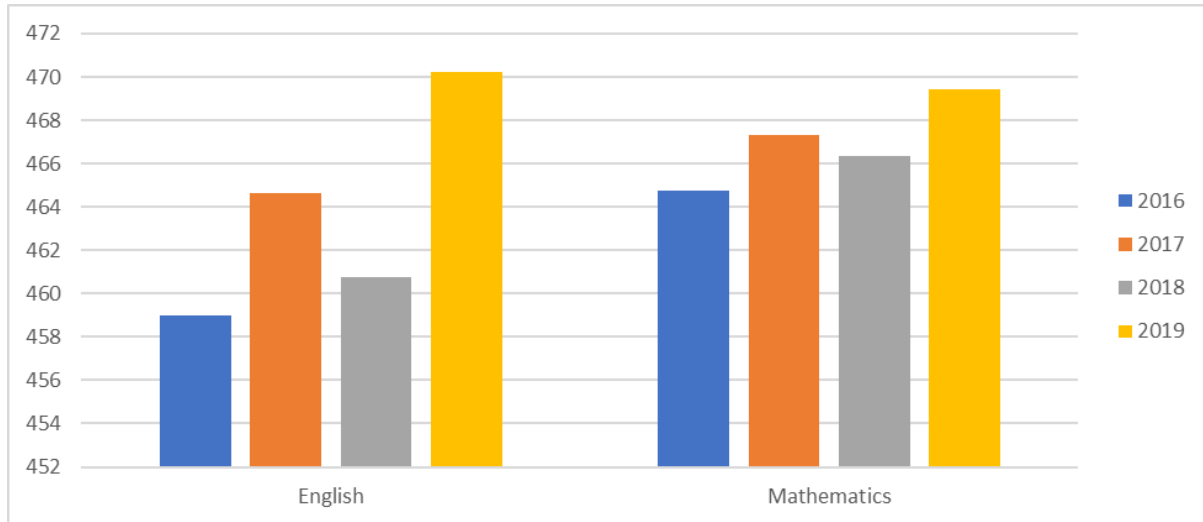

Figure 1. Achievement in English Language Arts and Math over the four school years

Regarding gender, female scholars had a mean achievement score of 467 with a standard deviation of 40, while male scholars had a slightly lower mean score of 464 with a standard deviation of 43. Moreover, the data showed fluctuations in mean scores across different school years, ranging from a low of 462 in the 2015-2016 school year to a high of 470 in the 2018-2019 school year. The average achievement in the 2016-2017 school year was 466, with a standard deviation of 42, while the 2017-2018 school year had an achievement score of 464. When examining different subjects, it was evident that mathematics scores had a slightly higher mean of 466 compared to English Language Arts scores, which had a mean of 463. However, both subjects exhibited variations in scores, with English Language Arts having a higher standard deviation of 46 and mathematics a lower one of 37.
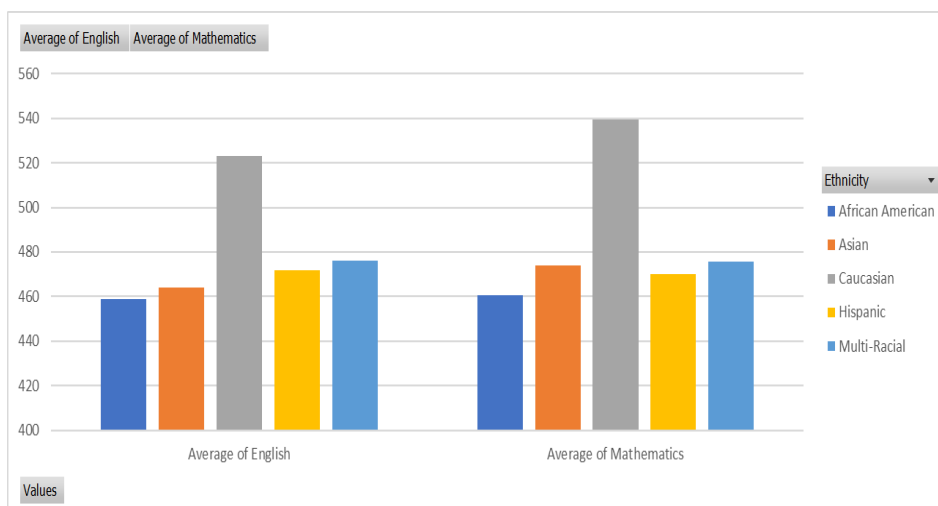

Figure 2. Average English Language Arts and Mathematics Achievement Scores by Ethnicity

Differences in students' academic growth in CEIS before and after participating in the program

Table 3. Paired sample correlations

	Paired Samples Correlations	Correlation	*p*
Pair 1	Pre-Program & post-program	0.60	<0.001

The paired sample correlation coefficient between "Pre-Program" and "Post-Program" is 0.603, with a significance level less than 0.001. This positive correlation suggested a significant relationship between the two sets of measurements.

Table 5. MANOVA Statistics

Multivariate Tests						
Effect		**Value**	**F**	**Hypothesis df**	**Error df**	***p***
Intercept	Pillai's Trace	0.92	2131.82	2	383	0
	Wilks' Lambda	0.08	2131.82	2	383	0
	Hotelling's Trace	11.13	2131.82	2	383	0
	Roy's Largest Root	11.13	2131.82	2	383	0
Gender	Pillai's Trace	0.04	7.27	2	383	0.001
	Wilks' Lambda	0.96	7.27	2	383	0.001
	Hotelling's Trace	0.04	7.27	2	383	0.001
	Roy's Largest Root	0.04	7.27	2	383	0.001
Ethnicity	Pillai's Trace	0.15	7.77	8	768	0
	Wilks' Lambda	0.85	8.07	8	766	0
	Hotelling's Trace	0.18	8.38	8	764	0
	Roy's Largest Root	0.17	16.70	4	384	0
Unexcused Absences	Pillai's Trace	0.04	7.64	2	383	0.001
	Wilks' Lambda	0.96	7.64	2	383	0.001
	Hotelling's Trace	0.04	7.64	2	383	0.001
	Roy's Largest Root	0.04	7.64	2	383	0.001
Excused Absences	Pillai's Trace	0.003	.53	2	383	0.59
	Wilks' Lambda	0.99	.53	2	383	0.59
	Hotelling's Trace	0.003	.53	2	383	0.59
	Roy's Largest Root	0.003	.53	2	383	0.59
In School Suspensions	Pillai's Trace	0.006	1.15	2	383	0.32
	Wilks' Lambda	0.99	1.15	2	383	0.32
	Hotelling's Trace	0.006	1.15	2	383	0.32
	Roy's Largest Root	0.006	1.15	2	383	0.32
Out of School Suspension	Pillai's Trace	0.02	4.63	2	383	0.01
	Wilks' Lambda	0.98	4.63	2	383	0.01
	Hotelling's Trace	0.02	4.63	2	383	0.01
	Roy's Largest Root	0.02	4.63	2	383	0.01
Enrolment Mobility	Pillai's Trace	0.01	1.43	2	383	0.24
	Wilks' Lambda	0.99	1.43	2	383	0.24
	Hotelling's Trace	0.01	1.43	2	383	0.24
	Roy's Largest Root	0.01	1.43	2	383	0.24

The paired samples test results showed there was no statistically significant difference between the "Pre-Program" and "Post-Program" scores among participants. The mean difference

between the two sets of scores was −0.36, suggesting a slight decline in scores on average after the program. This difference was not statistically significant ($p = .91$).

Multivariate analysis of variance (MANOVA) results, as presented in *Table 5*, examined various independent variables, including gender, ethnicity, unexcused absences, excused absences, in-school suspensions, out-of-school suspensions, and enrollment mobility, to determine their impact on academic growth. The MANOVA generated several multivariate statistics—*Pillai's Trace*, *Wilks' Lambda*, *Hotelling's Trace*, and *Roy's Largest Root*. Wilks' Lambda was selected as the primary measure of interest. The results revealed a statistically significant multivariate effect.

A series of factorial ANOVA was subsequently conducted. The ANOVA results showed that both gender and ethnicity had statistically significant effects on academic outcomes ($p < .001$). Unexcused absences, in-school suspensions, and out-of-school suspensions also demonstrated significant effects on academic growth, as indicated by their low p-values. In contrast, excused absences ($p = .59$) and enrollment mobility ($p = .24$) did not have statistically significant effects.

These findings reinforce the influence of discipline-related variables and demographic factors on student outcomes, while also suggesting that administrative factors such as excused absences or mobility may be less predictive of academic growth within CEIS frameworks.

Table 6. Factorial ANOVA Table

Tests of Between-Subjects Effects

Source	Dependent Variable	Type III Sum of Squares	df	Mean Square	F	Sig.
Corrected Model	Achievement-English	117046.54a	10	11704.65	7.35	<.001
	Achievement-Mathematics	125700.50b	10	12570.05	12.76	<.001
Intercept	Achievement-English	3959357	1	3959357	2487.10	<.001
	Achievement-Mathematics	4031253	1	4031253	4093.20	<.001
Gender	Achievement-English	11862.7	1	11862.7	7.45	0.01
	Achievement-Mathematics	186.56	1	186.56	0.19	0.66
Ethnicity	Achievement-English	44723.50	4	11180.90	7.02	<.001
	Achievement-Mathematics	65676.28	4	16419.07	16.67	<0.001
Unexcused Absences	Achievement-English	17451.65	1	17451.65	10.96	0.001
	Achievement-Mathematics	13343.11	1	13343.11	13.55	<.001
Excused Absences	Achievement-English	1371.26	1	1371.26	0.86	0.35
	Achievement-Mathematics	43.422	1	43.42	0.04	0.83
In School Suspensions	Achievement-English	1210.97	1	1210.97	0.76	0.38
	Achievement-Mathematics	2269.11	1	2269.11	2.30	0.13
Out-of-School Suspension	Achievement-English	12016.31	1	12016.31	7.55	0.01

	Achievement-Mathematics	7327.41	1	7327.41	7.44	0.01
Enrolment Mobility	Achievement-English	3688.25	1	3688.25	2.32	0.13
	Achievement-Mathematics	120.49	1	120.49	0.12	0.73
Error	Achievement-English	611311.90	384	1591.96		
	Achievement-Mathematics	378188.70	384	984.87		
Total	Achievement-English	85779234	395			
	Achievement-Mathematics	86527029	395			
Corrected Total	Achievement-English	728358.40	394			
	Achievement-Mathematics	503889.20	394			

a R Squared = .161 (Adjusted R Squared = .139)
b R Squared = .249 (Adjusted R Squared = .230)

Table 6 presents the outcomes of a factorial analysis of variance (ANOVA), which investigated the effects of several independent variables on achievement scores in English language arts (ELA) and mathematics. The corrected model results indicated that the overall model was statistically significant for both reading and mathematics, suggesting that at least one of the independent variables had a significant impact on student achievement. In ELA, the model produced an *F*-value of 7.35, while in mathematics, the model yielded an even more substantial *F*-value of 12.76, both with $p < .001$. Further examination of the independent variables provided insights into their specific effects.

Gender significantly influenced ELA achievement ($p = .007$), but not mathematics ($p = .664$). Ethnicity had a significant impact on achievement in both ELA and mathematics ($p < .001$ for both). Unexcused absences also significantly affected student achievement in both ELA ($p = .001$) and mathematics ($p < .001$). In contrast, excused absences, in-school suspensions (ISS), and enrollment mobility did not have statistically significant effects in either subject. However, out-of-school suspension (OSS) had a significant influence on achievement in both English Language Arts (ELA) ($p = .006$) and mathematics ($p = .007$). These results underscore the predictive strength of gender, ethnicity, unexcused absences, and OSS in shaping student achievement in both content areas, while suggesting that excused absences, ISS, and mobility may be less consequential within the CEIS context.

5. Discussion and Implications

This section explores discernible patterns in achievement, behavioral, and demographic variables among general education scholars participating in the CEIS program. Disproportionality in CEIS access has been extensively documented in the literature (National Centers for Learning Disabilities, 2020; Chey, 2016). However, empirical evidence remains limited on how participation varies by race/ethnicity, gender, and behavior. Despite several studies examining the overrepresentation of subgroups in special education, few address how early intervention frameworks, such as CEIS, may either exacerbate or mitigate patterns of disproportionality (Valencia, 2010). To better understand eligibility pathway patterns, this study analyzed behavioral and demographic differences among CEIS participants in the Equliebeh School District. The analysis focused on key variables, including race/ethnicity,

gender, and disciplinary history, to assess how access to CEIS may reflect or reinforce broader patterns of disproportionality.

According to the research findings, Asian, African American, and Hispanic scholars outnumbered Caucasians in CEIS enrollment. Asian scholars comprised 100% of the participants in previous years, while only 10% of Caucasians participated in 2019. CEIS enrolment rates were not significantly associated with gender; therefore, race and ethnicity are prioritized in scholar referrals and admissions. Discipline referrals, unexcused absences, and out-of-school suspensions regularly led to CEIS eligibility.

In this discussion, the study examined the CEIS implementation framework established under federal policy, designed by the Department of Education (DOE), to address the disproportionality or overrepresentation in referrals among underperforming or struggling general education minoritized groups who predominantly meet the failure criterion and ultimately become scheduled for Individualized Education Programs (IEPs). The goal was to establish a supportive system for academic and behavioral underperformers, while also attempting to bridge the gap between scholars who meet and ***do not meet*** state standards.

Equliebeh CEIS, like many other school districts with similar demographics, has a disproportionate number of Asian and African American scholars identified as strugglers, which could be due to cultural challenges like language acquisition and/or limited academic support. Unexcused absences and school suspensions are also crucial determinants of scholars' failure. Duxbury and Haynie (2020) examined how exclusionary discipline practices can marginalize and/or exclude students, thereby limiting their educational opportunities. This study confirms that scholars with several unexcused absences and disciplinary charges were more likely to be eligible for CEIS regardless of the underlying causes or contexts.

Scholars' attendance encompasses not just physical presence, but mental, psychological, and cognitive engagement, rooted in self-efficacy "I can" belief system. This belief — characterized by emotional readiness and motivation to learn — is the first step in wrestling with a lesson unit for 45 minutes. Nevertheless, it is crucial to scholars' academic mastery in school. Despite some scholars' lower economic strata, most trauma-free scholars are socially and emotionally prepared to combat cognitive challenges, unlike some of their struggling academic peers, who are overwhelmed by social and emotional roller coasters beyond their control, including exposure to alcoholism, substance abuse, or instability at home. These scholars are often emotionally traumatized and enveloped by such constraints that thwart their academic perseverance and capacity for cognitive complexity.

An evaluation of CEIS eligibility criteria should clarify whether the program functions as a preventative intervention or a reactive designation for already marginalized scholars. In its current form, demographic and behavioral factors—particularly race and discipline referrals—appear to drive CEIS enrollment decisions. This raises concerns about systemic bias, as CEIS may be enrolling scholars based on unintentional exclusionary practices rather than their actual, holistic academic needs.

The research indicates that the successful adoption of CEIS requires adherence to all federally outlined components, as defined by the U.S. (DOE) and reflected in this study's framework. These indicators include the early identification of at-risk scholars, the implementation of evidence-based academic and behavioral interventions, targeted professional development for staff, the use of data-driven decision-making protocols, and the coordination of services across general and special education.

Factors such as culturally responsive instruction, English language development, restorative discipline practices, social-emotional learning, and student agency play critical roles in the

academic trajectory of underperforming scholars. When these supports are absent or inconsistently applied, scholars are more likely to experience academic failure, which can lead to CEIS placement and, ultimately, referral for special education eligibility through Individualized Education Programs (IEPs).

Although the academic impact of CEIS is uncertain due to the limited research on its effectiveness and ability to minimize incorrect special education placements (Adams et al., 2013), data-driven instruction, SMART goal setting with milestone check-ins, and a holistic instructional focus can improve program success when fully implemented. Unfortunately, CEIS did not impact Math and ELA achievement due to its limited implementation, according to paired-sample t-tests. A correlation of 0.603 indicated moderate agreement between early and late assessment scores. Most significantly, race and gender differences in ELA, unexcused absences, and out-of-school suspensions negatively affected academic growth.

Persistent disproportionality in special education referrals, particularly among African American and Hispanic scholars, has prompted increased scrutiny of early intervention programs such as Coordinated Early Intervening Services (CEIS). Established under the IDEA (2004) and guided by federal mandates (U.S. Department of Education, 2006), CEIS was designed to reduce inappropriate referrals by providing academic and behavioral support prior to special education placement. While the theoretical framework for CEIS is well-established, empirical evidence on its academic effectiveness remains limited. Studies such as Budge (2017) highlight the long-term benefits of early intervention, emphasizing the importance of sustained duration, implementation fidelity, and comprehensive student support. Scheer (2021) reinforces this perspective by cautioning that when fidelity is lacking—due to unqualified personnel, weak progress monitoring, or the absence of evidence-based tools—intervention outcomes are often compromised, particularly in high-need urban districts. Similarly, Zarafshan et al. (2019) highlight inconsistencies in how districts allocate CEIS funding, with many defaulting to procedural compliance rather than pursuing meaningful systemic reform.

Bandura's self-efficacy theory (1977, 1991) emphasizes that a scholar's belief in their ability to succeed directly influences motivation, resilience, and academic performance, particularly among those who have experienced repeated failures. When interventions lack consistency, cultural responsiveness, or relational trust, scholars may internalize a sense of helplessness, thereby diminishing their potential for academic recovery. Sergiovanni's (1993) theory of school community reinforces this view by highlighting the role of shared leadership, moral commitment, and trust-based collaboration in sustaining reform. Despite federal expectations that CEIS be grounded in scientifically validated practices and equity principles, recent findings continue to reveal implementation gaps (Chey, 2016; National Center for Education Statistics, 2019). This study contributes to the limited research on CEIS academic outcomes by investigating the relationship between fidelity, equity, and scholar growth over a four-year intervention period in a large urban district. It applies how implementation fidelity, demographic disproportionality, and scholar self-efficacy interact to influence measurable academic and behavioral outcomes under CEIS.

5.1. Subgroup Findings and Interpretations

Disaggregated data further supports the centrality of self-efficacy in academic outcomes. Among African American scholars, ELA scores improved marginally from 461.4 to 463.0 (Δ = +1.6), while Math increased from 462.1 to 463.8 (Δ = +1.7). Hispanic scholars saw similar modest gains: ELA rose from 463.2 to 464.9 (Δ = +1.7), and Math from 464.5 to 465.0 (Δ = +0.5). In contrast, Asian and Caucasian scholars showed no change in ELA scores, holding steady at 467.2 and 465.4, respectively. Math scores slightly increased for Asian scholars (Δ =

+0.9). Math data for Caucasian scholars was not reported in this study. These data points suggest that without comprehensive interventions that promote internal belief systems and sustained engagement, CEIS may produce only incremental academic shifts. Bandura's theory helps explain these patterns: where scholars did not experience relationally consistent, culturally affirming, or emotionally responsive instruction, their motivation and perceived ability to succeed likely remained constrained—limiting the impact of CEIS on their academic growth. When access to intervention is filtered through disciplinary history and demographic profiles—as observed in this study—scholars may internalize exclusionary messages that erode academic confidence, rather than build it.

The disaggregated findings presented in this study must be interpreted within a broader sociopolitical and historical context. While CEIS was designed as a preventative intervention to address disproportionality, the persistence of minimal academic growth and racially patterned referral trends suggests deeper systemic failures. As Ladson-Billings (2006) explains, educational inequities stem not from isolated performance gaps but from a longstanding "education debt" owed to historically marginalized communities. Similarly, Apple (2004) argues that educational systems often perpetuate dominant power structures, utilizing policy and procedural compliance as tools of control rather than liberation. The patterns observed in this study—where behavioral referrals and exclusionary criteria drive CEIS access—reflect not only fidelity breakdowns, but also the influence of federal policy frameworks that emphasize standardization over equity. Lee et al. (2008) caution that reforms like No Child Left Behind have institutionalized accountability models that often fail to serve underperforming scholars meaningfully. Anyon (1980) further reminds us that schools mirror broader class-based social hierarchies, reinforcing limited access to rigorous learning opportunities for scholars from low-income backgrounds. In this light, the limited impact of CEIS cannot be divorced from the systemic barriers that shape eligibility, engagement, and implementation fidelity across schools.

6. Conclusion

Results from the analysis and evaluation of CEIS implementation illuminate significant implications for school and district leaders responsible for implementing CEIS with fidelity. Across two of the three research questions, results revealed that while CEIS was designed to provide proactive academic and behavioral support to general education scholars at risk of referral to special education, its skeletal implementation in the Equliebeh School District fell far short of both federal expectations and the district's moral and professional obligations. Of the eleven foundational components outlined for effective CEIS delivery, only three were evidenced in district records—a profound breach of fidelity and a striking indication of systemic negligence rather than isolated oversight. Despite the program's intent to interrupt disproportionality and strengthen early intervention, the absence of structural fidelity rendered its academic and behavioral impact minimal. As Noguera (2003) asserts, the failure to address institutional barriers is not merely a matter of policy design but a reflection of leadership choices that sustain inequity. In this light, the implementation gaps documented in this inquiry expose not only a lack of compliance but a deeper breach in the moral contract educational leaders uphold to ensure access, responsiveness, and dignity for every scholar served.

Under RQ1, patterns in CEIS enrollment revealed a concentration of scholars with behavioral flags, including absenteeism, suspensions, and school mobility. Although such factors are relevant, CEIS was never intended to function as a reactive disciplinary triage strategy—a system driven by behavioral red flags rather than instructional need. Instead, it was designed as a proactive, evidence-based support system focused on early academic and behavioral

intervention. RQ2 and RQ3 further demonstrated that the academic gains in English Language Arts (ELA) and Mathematics were not statistically significant, and no substantial subgroup differences emerged based on ethnicity, gender, or other demographic markers. This suggests that CEIS implementation was neither personalized nor adaptive to the nuanced needs of its diverse cohort—a departure from its federally defined purpose.

6.1.   Root Causes, Instructional Misalignment, and Scholar Experience

Beyond structural shortcomings in CEIS implementation, this study highlights a deeper issue: scholars flagged for chronic absenteeism, repeated suspensions, and high mobility were often already disengaged from instruction long before behavioral concerns surfaced. These outward indicators of "risk" are frequently symptoms—not causes—of academic frustration, poor instructional fit, and a systemic failure to address scholars' cognitive and emotional needs. As Noguera (2003) asserts, the failure to address institutional barriers is not merely a matter of policy design but a reflection of leadership choices that sustain inequity. When scholars consistently encounter learning environments where they feel lost, unsupported, or misunderstood, their self-efficacy diminishes and attendance suffers. Instructional misalignment—particularly for scholars performing below grade level—erodes motivation and contributes to the very outcomes CEIS is intended to prevent. Hammond (2015) affirms that without culturally responsive, cognitively demanding instruction that builds trust and relevance, historically marginalized scholars are likely to internalize academic failure and disengage. These findings underscore the urgent need to reposition CEIS not as a reactive behavioral triage, but as a proactive instructional access strategy grounded in belonging, scaffolding, and scholar voice.

Despite the preventative intent of the CEIS model, the district failed to track, document, or implement several foundational CEIS elements as outlined by the DOE. These gaps were not peripheral—they reflected a systemic breakdown in the infrastructure necessary to stem the tide of significant disproportionality in the enrollment of subgroups in special education, as intended by CEIS. As Barbadoro (2017) contends, fidelity to intervention models hinges not just on implementation, but on leadership structures that prioritize coherence and continuity. Specifically, there was no evidence that the district operationalized:

- Scientifically based academic instruction, including literacy and behavioral interventions;

- Adaptive instructional software to support individualized learning;

- Educational and behavioral evaluations, services, and social-emotional supports;

- Ongoing professional development tailored to CEIS delivery; and

- Fidelity protocols, including service dosage, progress monitoring, and goal setting.

Only three archival data points (e.g., test scores, suspensions, and attendance) were available, highlighting the skeletal nature of the program implementation and the lack of alignment with federal CEIS expectations. This gap between policy and practice reflects an urgent need for system-level accountability. It also calls for a leadership agenda rooted in coherence, capacity-building, and sustained fidelity. Such an agenda must also prioritize the academic growth of underperforming students through a holistic lens.

As Noguera (2003) asserts, the failure to address institutional barriers is not merely a matter of policy design but a reflection of leadership choices that sustain inequity. In this light, the

implementation gaps documented in this inquiry expose not only a lack of compliance but a deeper breach in the moral contract educational leaders uphold to ensure access, responsiveness, and dignity for every scholar served.

District leaders must embrace CEIS not merely as a compliance tool, but as a Whole-Child prevention before intervention strategy. Doing so requires investment in trauma-informed practices, culturally responsive instruction, and wraparound services that address scholars' academic, social-emotional, and behavioral realities. CEIS must be embedded within a robust Multi-Tiered Systems of Support (MTSS), where SMART goals, interdisciplinary teams, and data-driven progress monitoring tools are grounded in the parent's compact to ensure consistent delivery and measurable impact.

Equity in intervention can only be achieved through intentional fidelity, structured leadership, and a moral commitment to serve every scholar holistically—academically, psychologically, and emotionally—rooted in empathy. Data systems must guide not only diagnoses but also instructional alignment and progress monitoring. Without such a shift, CEIS will continue to operate as a symbolic gesture rather than a transformative tool for educational justice.

6.2.   Family Engagement, Accountability, and Shared Leadership

To truly transform CEIS from a compliance-driven mandate into a catalyst for educational justice, school and district leaders must cultivate authentic partnerships with families. The Parent Compact—outlined under ESSA Title I—should not be viewed as a bureaucratic formality but as a co-authored commitment to mutual accountability. When families are engaged as equal stakeholders in setting SMART goals, co-monitoring progress, and voicing barriers to access, the interventions become culturally responsive and community-anchored. As this study reveals, systemic failure is not inevitable—it is preventable when leaders prioritize trust, transparency, and relational fidelity. The future of CEIS depends not only on policy revision but on leadership that is bold enough to dismantle the inequities it once ignored.

When schools create transparent two-way communication channels with families, they cultivate shared self-efficacy—where scholars, educators, and parents all believe in their capacity to effect change (Bandura, 1977). As Sergiovanni (1992) argues, sustainable reform is not driven by mandates, but by moral leadership that fosters stewardship, trust, and a shared commitment to the common good.

References

Adams, R. C., Tapia, C., Council on Children with Disabilities, Murphy, N. A., Norwood Jr, K. W., Adams, R. C., Burke, R.T., Friedman, S.L., Houtrow, A.J., Kalichman, M.A. & Wiley, S. E. (2013). Early intervention, IDEA Part C services, and the medical home: Collaboration for best practice and outcomes. *Pediatrics,* 132(4), e1073–e1088. https://doi.org/10.1542/peds.2013-2305

Apple, M. W. (2004). *Ideology and curriculum* (3rd ed.). Routledge.

Anyon, J. (2005). *What "counts" as educational policy?* Notes toward a new paradigm. *Harvard Educational Review, 75*(1), 65–88. https://doi.org/10.17763/haer.75.1.b516511108666616

Bandura, A. (1977). Self-efficacy: Toward a unifying theory of behavioral change. *Psychological Review,* 84(2), 191–215. https://doi.org/10.1037/0033-295X.84.2.191

Barbadoro, A. (2017). *The socio-emotional impact of disparate student discipline: An examination of racial bias and out-of-school suspensions*. CUNY Academic Works. Retrieved from https://academicworks.cuny.edu/gc_etds/2071

Chey, A. (2016). *The over-representation of Hispanics in Special Education Programs in New Jersey* [Master's thesis, Rowan University]. ProQuest Dissertations and Theses Global. Retrieved from https://rdw.rowan.edu/etd/1518/

Duxbury, S. W. & Haynie, D. L. (2020). School suspension and social selection: Labeling, network change, and adolescent academic achievement. *Social Science Research, 85*, 102365. https://doi.org/10.1016/j.ssresearch.2019.102365

Hammond, Z. (2015). *Culturally responsive teaching and the brain: Promoting authentic engagement and rigor among culturally and linguistically diverse students*. Corwin Press.

Huffman, L. C., Mehlinger, S. L., & Kerivan, A. S. (2000). *Off to a good start: Research on the risk factors for early school problems and selected federal policies affecting children's social and emotional development and readiness for school.* http://files.eric.ed.gov/fulltext/ED476378.pdf

Ladson-Billings, G. (2006). From the achievement gap to the education debt: Understanding achievement in U.S. schools. Educational Researcher*, 35*(7), 3–12. https://doi.org/10.3102/0013189X035007003

Lee, J., Grigg, W., & Donahue, P. (2008). *The nation's report card: Mathematics 2007* (NCES 2007–494). National Center for Education Statistics. Retrieved from https://nces.ed.gov/nationsreportcard/pubs/main2007/2007494.asp

Muro, A., Soler, J., Cebolla, À., and Cladellas, R. (2018). A positive psychological intervention for failing students: Does it improve academic achievement and motivation? A pilot study. *Learning and Motivation,* vol. 63, 126–132. https://doi.org/10.1016/j.lmot.2018.05.003

National Center for Learning Disabilities. (2020). *Significant disproportionality in special education: Current trends and actions for impact.* https://ncld.org/wp-content/uploads/2023/07/2020-NCLD-Disproportionality_Trends-and-Actions-for-Impact_FINAL-1.pdf

Nickow, A., Oreopoulos, P., & Quan, V. (2020). *The impressive effects of tutoring on PreK–12 learning: A systematic review and meta-analysis of the experimental evidence*. National Bureau of Economic Research Working Paper No. 27476 https://www.nber.org/papers/w27476

Noguera, P. (2003). *City schools and the American dream: Reclaiming the promise of public education.* Teachers College Press.

Sergiovanni, T. (1992). Moral leadership: *Getting to the heart of school improvement*. Jossey-Bass.

Valencia, R. R. (2010). *Dismantling contemporary deficit thinking: Educational thought and practice*. Routledge.

Vogt, W. P., Vogt, E. R., Gardner, D. C. & Haeffele, L. M. (2014). *Selecting the Right Analyses for Your Data: Quantitative, Qualitative, and Mixed Methods*. Guilford Publications.