

University of Texas Rio Grande Valley

ScholarWorks @ UTRGV

Theses and Dissertations

12-2023

Comparing Socioeconomic Status to Educational Diagnosis of Serious Emotional Disturbances: A Linear Analysis of Texas Data

Cristina Rangel

The University of Texas Rio Grande Valley

Follow this and additional works at: <https://scholarworks.utrgv.edu/etd>



Part of the [Curriculum and Instruction Commons](#)

Recommended Citation

Rangel, Cristina, "Comparing Socioeconomic Status to Educational Diagnosis of Serious Emotional Disturbances: A Linear Analysis of Texas Data" (2023). *Theses and Dissertations*. 1434.

<https://scholarworks.utrgv.edu/etd/1434>

This Dissertation is brought to you for free and open access by ScholarWorks @ UTRGV. It has been accepted for inclusion in Theses and Dissertations by an authorized administrator of ScholarWorks @ UTRGV. For more information, please contact justin.white@utrgv.edu, william.flores01@utrgv.edu.

COMPARING SOCIOECONOMIC STATUS TO EDUCATIONAL DIAGNOSIS
OF SERIOUS EMOTIONAL DISTURBANCES:
A LINEAR ANALYSIS OF TEXAS DATA

A Dissertation
by
CRISTINA RANGEL

Submitted in Partial Fulfillment of the
Requirements for the Degree of
DOCTOR OF EDUCATION

Major Subject: CURRICULUM AND INSTRUCTION

The University of Texas Rio Grande Valley

December 2023

COMPARING SOCIOECONOMIC STATUS TO EDUCATIONAL DIAGNOSIS
OF SERIOUS EMOTIONAL DISTURBANCES:
A LINEAR ANALYSIS OF TEXAS DATA

A Dissertation
by
CRISTINA RANGEL

COMMITTEE MEMBERS

Dr. John Lowdermilk
Chair of Committee

Dr. Paul Sale
Committee Member

Dr. Ralph Carlson
Committee Member

December 2023

Copyright 2023 Cristina Rangel

All Rights Reserved

ABSTRACT

Rangel, Cristina Comparing Socioeconomic Status to Educational Diagnosis of Serious Emotional Disturbances: A Linear Analysis of Texas Data. Doctor of Education (Ed.D.), December 2023, 34, pp., 0 tables, 3 figures, references, 33 titles.

This dissertation was prepared to determine if a correlation existed between a student's poverty level and an educational diagnosis of serious emotional disturbance. I hypothesize that students at or under the United States' definition of poverty are more likely to exhibit signs and symptoms of a serious emotional disturbance and therefore be diagnosed and placed in special education. Both federal data (i.e., poverty levels) and Texas data (i.e., dx of SED) were compared to determine correlation and directionality. TEA combines districts into 20 regions. Special education placement data is publicly available on State databases. Federal poverty levels are available through the Internet by state and then by state counties. County level information was aggregated and then an average was calculated. The results were imported into the Statistical Package for Social Science (SPSS) and a linear regression analysis was run. The results are delineated in this dissertation.

DEDICATION

For years, I have spent my life being a mother, daughter, sister, aunt and friend. And through these roles, I have laughed and cried; I have loved and lost; and I have fallen and risen all for the love of my family. However, it seems that we spend our lifetime living for others. And in living for others, I learned that I also need to live for myself. I want to be seen as more than just a mother or daughter. I want to be seen as an individual. I want to have my own identity. While it has only been the last year or so that I have started living for myself, it has been one of the most rewarding roles I have had.

With this said, I want to share the words of Snoop Dog that changed my life.

Last but not least, I wanna thank me

I wanna thank me for believing in me

I wanna thank me for doing all this hard work

I wanna thank me for having no days off

I wanna thank me for, for never quitting

I wanna thank me for always being a giver

And tryna give more than I receive

I wanna thank me for tryna do more right than wrong

I wanna thank me for just being me at all times

ACKNOWLEDGMENTS

It is with great honor that I take this time to thank those that played a huge role in my academic and professional journey. First, I want to thank Dr. Fielding for seeing in me what I couldn't see in myself. Without her words of encouragement, I would've never pursued a masters in special education. Second, I would like to thank Dr. Lowdermilk for always challenging me academically and professionally. Thank you for guiding me through my masters and doctoral programs. Without your unwavering support, I know that I would not be where I am today. To Dr. Paul Sale, whose simple actions such as sending emails with words of encouragement or to offer his support, made more of an impact than he could imagine. Thank you, Dr. Ralph Carlson, for always sharing your wisdom without hesitation. His passion and love for education is sincerely contagious.

I would also like to thank my family and friends who pushed me when I wanted to give up. To my daughters, who eyes of adoration motivated me to be the best version of myself. I want to thank the colleagues I have made throughout my career that have in one way or another made an impact on my life. Lastly, I want to thank myself for putting in all the hard work.

TABLE OF CONTENTS	Page
ABSTRACT.....	iii
DEDICATION.....	iv
ACKNOWLEDGMENTS	v
TABLE OF CONTENTS.....	vi
LIST OF FIGURES	viii
CHAPTER I. INTRODUCTION.....	1
Statement of the Problem.....	4
Purpose of the Study	5
Research Question	6
Significance of the Study	7
Limitations and Delimitations and Assumptions	7
Definitions of Terms	8
Summary	10
CHAPTER II. REVIEW OF LITERATURE	11
Background on Emotional Disorders.....	11

Characteristics	12
Specific Emotional Disturbances	13
Poverty and Adverse Childhood Experiences.....	17
The Link Between Poverty and Special Education Placement	17
Consequences of Poverty-Related Special Education Placement.....	18
CHAPTER III. METHODOLOGY	21
Research Design.....	21
Research Question, Hypotheses, and Null Hypotheses	21
Databases Utilized	22
Data Analysis	22
Data Analysis Procedures	23
Summary	23
CHAPTER IV. RESEARCH FINDINGS AND RESULTS.....	24
Addressing the Research Question	24
Research Question	26
Summary	27
CHAPTER V. DISCUSSION, IMPLICATIONS, AND RECOMMENDATIONS	28
Discussion	28
Implications and Recommendations	29
Limitations and Recommendations.....	30
REFERENCES	31
BIOGRAPHICAL SKETCH	34

LIST OF FIGURES

	Page
Figure 1: State of Texas Poverty Levels	4
Figure 2: Example of Simple Linear Regression	24
Figure 3: Map of Texas Regional Educational Service Centers	26

CHAPTER I

INTRODUCTION

Calvin, of Calvin and Hobbes (Watterson, 1994), escapes the plight of his Mom and Dad and his teacher by escaping into a vivid fantasy world of aliens, monsters, and transmorgaphying machines. When reality becomes overwhelming, Calvin jumps into his cardboard box, better known as the “Great and Wonderful Transmorgaphying Machine,” and becomes a speckle of dust that can float around instead of dealing with his mom’s insistence that he clean his room. Fantasy and internal dialogue are part of everyone’s experience (Lowdermilk et al., 2020). Students diagnosed with severe emotional disturbances (SED) often use fantasy as a form of escapism (Piethiewicz et al., 2018). These “coping” behaviors are often defined as extensive book reading, watching films, or gaming and are often characteristics of people in high poverty areas (Somer et al., 2017). Socioeconomic status (SES) is a potent environmental determinant of health and therefore may also be a determinant of educational health. With this in mind, I examined the possible corollaries between SES and placement of students diagnosed with SED in special education.

The Education for All Handicapped Children of 1975 (P.L. 94-142), later renamed the Individuals with Disabilities Education Act (IDEA), requires all public schools to admit and educate students with disabilities. IDEA holds educational institutions accountable and helps

create opportunities for students with federally identified disabilities in their transition to post-secondary education and/or the workplace (Gibbons et al., 2015). IDEA has been reauthorized by Congress five times including the last reauthorization on December 3, 2004 (IDEA, 2022).

IDEA identifies 13 areas of educational diagnosis (Jones, Dohrn, & Dunn, 2004):

1. Autism;
2. Deaf-Blindness;
3. Serious Emotional Disturbance;
4. Hearing Impairment;
5. Intellectual Disability;
6. Multiple Disabilities;
7. Orthopedic Impairment;
8. Other Health Impairment;
9. Specific Learning Disabilities;
10. Speech or Language Impairment;
11. Traumatic Brain Injury; or
12. Visual Impairment, including Blindness.

Only one-third to one-half of US children and adolescents with serious emotional disturbance (SED) receive appropriate services (Kataoka et al., 2002; Leaf et al., 1996).

Researchers and policymakers frequently state that school staff have the potential to reduce gaps in treatment access because they can identify and provide referrals for youth who might not otherwise be identified for special education. However, the circumstances underlying referral decisions made by school staff remain poorly understood and can be quite complex. For example, there is variation across schools in how students who require services are identified,

staff perceptions of which students can be served effectively “in-house,” and in the nature of staff relationships with community providers (Weist et al., 2012).

Unidentified and unmet need for services is particularly problematic for youth with serious emotional disturbance (Merikangas et al., 2011). SED is defined by the Substance Abuse and Mental Health Services Administration (SAMHSA, 2023) as “a diagnosable mental, behavioral, or emotional disorder of sufficient duration to meet diagnostic criteria specified within the (DSM-V TR) that resulted in functional impairment which substantially interferes with or limits the child’s role or functioning in family, school, or community activities”.

Results from a national evaluation of CMHI-funded SOC communities indicated that school staff were consistently one of the primary sources of referrals to SOC services in their communities (Samuels, 2015). Furthermore, youth enrolled in SOC services had high rates of school failure, absenteeism, and suspension, indicating the substantial consequences of SED for youth in school (Anderson, 2011). In general, these studies suggested that school staff were most likely to refer youth with emotional and behavioral disorders for mental health services if they also presented with academic problems (Bradshaw et al., 2008). However, in the case of referrals to SOC, it is unclear whether decisions about children with the most complex mental health needs are specifically driven by their deficits in school functioning or if they are guided more generally by the severity of disorders.

Poverty has been tied to outcomes that are sometimes risk factors for disability such as exposure to environmental toxins (e.g., lead) and low birth weight (Samuels, 2015). These have been quantified as the adverse childhood experiences (ACE) and include the following (Child Trends, 2013):

1. Economic Hardship;
2. Divorce or separation of a Parent;
3. Death of a Parent;
4. Parent served Time in Jail;
5. Witnessing Adult Domestic Violence;
6. Victim or Witness to Neighborhood Violence;
7. Living with Someone who was Mentally Ill or Suicidal;
8. Living with Someone with an Alcohol or Drug Problem; or
9. Being Treated or Judged Unfairly due to Race/Ethnicity

This quantitative dissertation examined the correlation of ACE factor (i.e., poverty) to the placement of students in special education for a serious emotional disturbance (SED).

Statement of the Problem

In the United States, the Federal poverty level is defined by comparing a person's or family's income to a set poverty threshold or minimum amount of income needed to cover basic needs (Institute for Research on Poverty, 2023). For the State of Texas, the federal poverty levels are listed below:

Number of people in your household (include yourself)	100% of Poverty Guidelines Yearly Income	100% of Poverty Guidelines Monthly Income	100% of Poverty Guidelines Weekly Income
1	\$14,580	\$1,215	\$280
2	\$19,720	\$1,643	\$379
3	\$24,860	\$2,071	\$478
4	\$30,000	\$2,500	\$577
5	\$35,140	\$2,928	\$676
6	\$40,280	\$3,357	\$775
7	\$45,420	\$3,785	\$873
8	\$50,560	\$4,213	\$972
More than 8	Add \$5,140 for each additional person	Add \$428 for each additional person	Add \$99 for each additional person

Figure 1: State of Texas Poverty Levels

According to the Texas Health and Human Services Commission (n.d.), there are an estimated 500,000 of 28,933,638 people diagnosed with a SED in Texas. Of that number, 250,000 are children. Comparing the number of Texas students serviced under SED utilizing Texas Education Agency Databases and federal database for State poverty levels, delineated a correlation between poverty and SED diagnosis in Texas.

Purpose of the Study

Utilizing a linear regression method, the author of this dissertation determined if a correlation existed between low SES and placement of students with SED in special education. By attempting to determine the above, it is hoped that SES levels can be used to help predict the placement of students with SED in special education.

IDEA defines emotional disturbance as follows: "...a condition exhibiting one or more of the following characteristics over a long period of time and to a marked degree that adversely affects a child's educational performance:

1. An inability to learn that cannot be explained by intellectual, sensory, or health factors.
2. An inability to build or maintain satisfactory interpersonal relationships with peers and teachers.
3. Inappropriate types of behavior or feelings under normal circumstances.
4. A general pervasive mood of unhappiness or depression.
5. A tendency to develop physical symptoms or fears associated with personal or school problems.

As defined by IDEA, emotional disturbance includes schizophrenia but does not apply to children who are socially maladjusted, unless it is determined that they have an emotional disturbance. While there is a significant "human cost" around SED, there is also the economic cost. The cost of supporting students with SED is estimated to be around 3.3 billion per year. The research correlates to SED and may increase the public's ability to identify and help negate contributing factors of SED before children are exposed.

Research Question

The following question guided the collection, analysis, and interpretation of data in this dissertation:

RQ: Is there a relationship between SED and SES?

Hypotheses

To discover the answer to the above research questions, the following hypothesis were established from the research question:

H₀: There is a relationship between SED and SES?

H_a: There is no relationship between SED and SES.

Significance of the Study

While significant research has been done around interventions for students with SED (e.g., REBT, CBT, PBIS), there is a paucity of research on adverse childhood experiences (ACE) that may contribute to a child developing a SED. Therefore, by examining the level of a state in regard to the number one suspected ACE contributor to later diagnosis of SED, the results can determine if a correlation exists and in what direction variables correlate. This can be used to further increase the body of knowledge and, hopefully, lead to more studies and interventions at the pre-morbid point.

Limitations and Delimitations and Assumptions

Limitations

This study was limited to the data that has been collected by the State of Texas and made available on public Internet databases. Also, this dissertation was limited to a snapshot of a moment in time of SED diagnosis and poverty levels.

Delimitations

Delimitations of this dissertation were: Collecting data from only one state (i.e., the State of Texas) and using one category under IDEA instead of all 13 categories.

Assumptions

Assumptions that were made during the study included poverty levels, for people under 18 years old, listed for each Texas Region were children currently enrolled in a public school and data collected represented a true and accurate account of students.

Definitions of Terms

For the purpose of the study, specific terms are gathered and defined by sources for theoretical constructs within the study.

Disability refers to any condition of the body or mind impairment that makes it more difficult for the person with the condition to do certain activities and interact with the world around them (CDC, 2023).

Free Appropriate Public Education (FAPE) may comprise education in regular classes, education in regular classes with the use of related aids and services, or special education and related services in separate classrooms for all or portions of the school day (ed.gov, n.d.).

The Individuals with Disabilities Education Act (IDEA) is a law that makes available a free appropriate public education to eligible children with disabilities throughout the nation and ensures special education and related services to those children (ed.gov, n.d.).

Pre-morbid refers to occurring or existing before the occurrence of physical disease or emotional illness (NIH.gov, n.d.).

Poverty refers to a person or family's income to a set poverty threshold or minimum amount of income needed to cover basic needs. People whose income falls under their threshold are considered poor (Institute for Research on Poverty, 2023).

Serious Emotional Disorder is a condition exhibiting one or more of the following characteristics over a long period of time and to a marked degree that adversely affects a child's academic performance:

- a. an inability to learn that cannot be explained by intellectual, sensory, or health factors;
- b. an inability to build or maintain satisfactory interpersonal relationships with peers and teachers, inappropriate types of behavior or feelings under normal circumstances, a general pervasive mood of unhappiness or depression;
- c. a tendency to develop physical symptoms or fears;
- d. associated with personal or school problems;
- e. includes schizophrenia, but does not apply to children; and
- f. that are socially maladjusted, unless it is determined that they have an emotional disorder (IDEA, 2022).

Special Education means specially designed instruction, at no cost to the parents, to meet the unique needs of a child with a disability, including instruction conducted in the classroom, in the home, in hospitals and institutions, and in other settings; and instruction in physical education. Special education includes each of the following, if the services otherwise meet the requirements of paragraph (a) of this section—

- i. Speech-language pathology services, or any other related service, if the service is considered special education rather than a related service under State standards;
- ii. Travel training; and
- iii. Vocational education (ed.gov, 2023).

Summary

The upcoming chapters outline the process followed while conducting this dissertation. These chapters include a deep analysis of the relevant literature in the area, a detailed description of the research process, the findings, implications, and recommendations.

CHAPTER II

REVIEW OF LITERATURE

Special educators define the term “negative effect” as reflections of the child’ s contemporary culture and society (Jenks, 1996). One point addressed herein is how the field of special education defines the negative effects of emotional disorders. Also included in this review of literature chapter is a discussion of historical and current research, on poverty. In addition, a section delineating background information on the field of emotional disorders is included.

Background on Emotional Disorders

A variety of terms are used to describe students with an emotional disorder: emotionally disturbed, socially maladjusted, psychologically disordered, emotionally handicapped, or even psychotic if their behavior is extremely abnormal or bizarre (Jenks, 1996; Kauffman, 1992). These individuals are also referred to as exceptional children with emotional disorders.

The term exceptional child is a relatively new entry into the educational lexicon. Originating in the 1950s, the term exceptional children was adopted in the late 1980s by the National Mental Health and Special Education Coalition, a group formed in 1987 to foster collaboration among various professional and advocacy organizations (Forness et al., 1992). The authors also wrote that three primary factors contributed to the development of children with emotional disorders: (a) an adverse early rearing environment, (b) social rejection

by peers, and (c) modeling of antisocial behavior by external sources (e.g., peers, parents, television programming). Other researchers (Wahler & Dumas, 1986) agreed with Samuel's assertions related to the development of children with an emotional disorder. According to Dumas and Wahler some of the behaviors children with emotional disorders exhibited were recognized as abnormal in nearly every cultural group and social strata. Muteness, serious self-injury, coprophagia, and murder were examples of disorders that were seldom or never considered culture-specific or acceptable (Kauffman, 1992).

Characteristics

As evident in IDEA's definition, emotional disturbances can affect an individual in areas beyond the emotional. Depending on the specific mental disorder involved, a person's physical, social, or cognitive skills may also be affected. The National Alliance on Mental Illness (NAMI, 2023) puts this very well:

Mental illnesses are medical conditions that disrupt a person's thinking, feeling, mood, ability to relate to others and daily functioning. Just as diabetes is a disorder of the pancreas, mental illnesses are medical conditions that often result in a diminished capacity for coping with the ordinary demands of life.

Some of the characteristics and behaviors seen in children who have an emotional disturbance include: (a) Hyperactivity (short attention span, impulsiveness); (b) aggression or self-injurious behavior (acting out, fighting); (c) withdrawal (not interacting socially with others, excessive fear or anxiety); (d) immaturity (inappropriate crying, temper tantrums, poor coping skills); and (e) learning difficulties (academically performing below grade level).

Children with the most serious emotional disturbances may exhibit distorted thinking, excessive anxiety, bizarre motor acts, and abnormal mood swings. Many children who do not have emotional disturbance may display some of these same behaviors at various times during their development. However, when children have an emotional disturbance, these behaviors continue over long periods of time. These behavioral signals indicate that they are not coping with their environment or peers.

No one knows the actual cause or causes of emotional disturbance, although several factors—heredity, brain disorder, diet, stress, and family functioning—have been suggested and vigorously researched. A great deal of research goes on every day, but to date, researchers have not found that any of these factors are the direct cause of behavioral or emotional problems. According to NAMI (n.d.), mental illnesses can affect persons of any age, race, religion, or income. Further, mental illnesses are not the result of personal weakness, lack of character, or poor upbringing, and thus they are treatable. Most people diagnosed with a serious mental illness can experience relief from their symptoms by actively participating in an individual treatment plan.

According to the CDC (Centers for Disease Control and Prevention), approximately 8.3 million children (14.5%) aged 4–17 years have parents who have talked with a health care provider or school staff about the child’s emotional or behavioral difficulties. Nearly 2.9 million children in the United States have been prescribed medication for these difficulties.

Specific Emotional Disturbances

As we mentioned, emotional disturbance is a commonly used umbrella term for a number of different mental disorders. Some of the most common of these as follows

Anxiety Disorders

All People experience anxiety from time to time, but for many, including children, anxiety can be excessive, persistent, seemingly uncontrollable, and overwhelming. An irrational fear of everyday situations may be involved. This high level of anxiety is a definite warning sign that a person may have an anxiety disorder.

As with the term emotional disturbance, “anxiety disorder” is an umbrella term that refers to several distinct disabilities that share the core characteristic of irrational fear: generalized anxiety disorder (GAD), obsessive-compulsive disorder (OCD), panic disorder, posttraumatic stress disorder (PTSD), social anxiety disorder (also called social phobia), and specific phobias. According to the Anxiety Disorders Association of America (2023), anxiety disorders are the most common psychiatric illnesses affecting children and adults. They are also highly treatable. Unfortunately, only about a third of those affected receive treatment (Anxiety Disorders Association of America, 2023).

Bipolar Disorder

Also known as manic-depressive illness, bipolar disorder is a serious medical condition that causes dramatic mood swings from overly “high” and/or irritable to sad and hopeless, and then back again, often with periods of normal mood in between. Severe changes in energy and behavior go along with these changes in mood. For most people with bipolar disorder, these mood swings and related symptoms can be stabilized over time using an approach that combines medication and psychosocial treatment (Anxiety Disorders Association of America, 2023).

Conduct Disorder

Conduct disorder refers to a group of behavioral and emotional problems in youngsters. Children and adolescents with this disorder have great difficulty following rules and behaving in a socially acceptable way. This may include some of the following behaviors: (a) Aggression to people and animals; (b) destruction of property; (c) deceitfulness, lying, or stealing; and (d) truancy or other serious violations of rules.

Although conduct disorder is one of the most difficult behavior disorders to treat, young people often benefit from a range of services that include: (a) Training for parents on how to handle child or adolescent behavior; (b) family therapy; (c) training in problem-solving skills for children or adolescents; and (d) community-based services that focus on the young person within the context of family and community influences (Anxiety Disorders Association of America, 2023).

Eating Disorders

Eating disorders are characterized by extremes in eating behavior—either too much or too little—or feelings of extreme distress or concern about body weight or shape. Females are much more likely than males to develop an eating disorder (Anxiety Disorders Association of America, 2023).

Anorexia Nervosa and Bulimia Nervosa

Anorexia Nervosa and Bulimia Nervosa are the two most common types of eating disorders. Anorexia nervosa is characterized by self-starvation and dramatic loss of weight. Bulimia nervosa involves a cycle of binge eating, then self-induced vomiting or purging. Both of these disorders are potentially life threatening (Anxiety Disorders Association of America, 2023).

Binge Eating

Binge eating is also considered an eating disorder. It's characterized by eating excessive amounts of food, while feeling unable to control how much or what is eaten. Unlike with bulimia, people who binge eat usually do not purge afterward by vomiting or using laxatives (National Eating Disorders Association).

According to the National Eating Disorders Association (2023), the most effective and long-lasting treatment for an eating disorder is some form of psychotherapy or counseling, coupled with careful attention to medical and nutritional needs. Some medications have been shown to be helpful. Ideally, whatever treatment is offered should be tailored to the individual, and this may vary according to both the severity of the disorder and the patient's individual problems, needs, and strengths (National Eating Disorders Association).

Obsessive-Compulsive Disorder

Often referred to as OCD, obsessive-compulsive disorder is considered an anxiety disorder. OCD is characterized by recurrent, unwanted thoughts (i.e., obsessions) or repetitive behaviors (i.e., compulsions). Repetitive behaviors (e.g., hand washing, counting, checking, cleaning) are often performed with the hope of preventing obsessive thoughts or making them go away. Performing these so-called rituals, however, provides only temporary relief, and not performing them markedly increases anxiety (Anxiety Disorders Association of America, 2023).

A large body of scientific evidence suggests that OCD results from a chemical imbalance in the brain. Treatment for most people with OCD should include one or more of the following: (a) Therapist trained in behavior therapy; (b) cognitive behavior therapy (CBT); and (c) medication - usually an antidepressant (Anxiety Disorders Association of America, 2023).

Psychotic Disorders

A psychotic disorder is another umbrella term used to refer to severe mental disorders that cause abnormal thinking and perceptions. Two of the main symptoms are delusions and hallucinations. Delusions are false beliefs, such as thinking that someone is plotting against you. Hallucinations are false perceptions, such as hearing, seeing, or feeling something that is not there. Schizophrenia is one type of psychotic disorder. There are others as well. Treatment for psychotic disorders will differ from person to person, depending on the specific disorder involved. Most are treated with a combination of medications and psychotherapy (a type of counseling) (Anxiety Disorders Association of America, 2023).

Poverty and Adverse Childhood Experiences

Poverty is a pervasive issue worldwide, affecting millions of families and children across the globe. The impact of poverty on education is profound, especially for children with disabilities. Research indicates a strong correlation between poverty and the placement of children in special education programs. This section delves into the complex relationship between poverty and special education placement, exploring various factors and their consequences on the educational outcomes of children in poverty-stricken environments (Institute for Research on Poverty, 1970).

The Link Between Poverty and Special Education Placement

Limited Access to Resources

Families living in poverty often lack access to quality healthcare, nutrition, and early childhood education programs. This limited access can result in developmental delays and learning disabilities, leading to a higher likelihood of placement in special education classes (Institute for Research on Poverty, 1970).

Socioeconomic Stressors

Poverty is associated with numerous stressors such as unstable housing, food insecurity, and exposure to violence. These stressors can impact a child's cognitive development and exacerbate behavioral issues, making them more susceptible to special education placement (Institute for Research on Poverty, 1970).

Inadequate School Funding

Schools located in impoverished areas often suffer from inadequate funding. Limited resources can hinder the implementation of the early intervention programs and support services, making it challenging to identify and address learning disabilities promptly (Institute for Research on Poverty, 1970).

Lack of Parental Involvement

Parents from low-income backgrounds may have limited time and resources to engage actively in their child's education. Limited parental involvement can hinder early identification of learning disabilities, leading to delayed or inappropriate special education placement (Institute for Research on Poverty, 1970).

Consequences of Poverty-Related Special Education Placement

Academic Disparities

Children from impoverished backgrounds placed in special education programs may face academic disparities. Limited access to educational resources and support can hinder their academic progress, perpetuating the cycle of poverty (Institute for Research on Poverty, 1970).

Stigmatization and low Expectations

Children placed in special education classes due to poverty-related factors may face stigmatization from their peers and educators. Additionally, educators might have lower expectations for these students, impacting their self-esteem and long-term educational goals (Institute for Research on Poverty, 1970).

Limited Opportunities

Limited access to quality education can restrict future opportunities for children living in poverty. Without adequate educational support, these children are less likely to pursue higher education or secure well-paying jobs, reinforcing the cycle of poverty in their lives and communities (Institute for Research on Poverty, 1970).

The relationship between poverty and special education placement is intricate and multifaceted. Addressing this issue requires a comprehensive approach involving policymakers, educators, and communities. By investing in early childhood education, providing adequate resources to schools in impoverished areas, and promoting parental involvement, society can mitigate the impact of poverty on special education placement. Additionally, fostering awareness and understanding among educators can help create inclusive learning environments where all children, regardless of their socioeconomic background, can thrive academically and socially. By breaking the cycle of poverty, we can empower future generations, ensuring that every child has an equal opportunity to succeed in life.

The mental health of individuals is shaped by the social, environmental, and economic conditions, in which they are born, grow, work, and age (Cooper & Stewart, 2015). Poverty and deprivation are key determinants of children's social and behavioral development and adult mental health (Bromley & Cunningham-Burley, 2010), individuals living in the most deprived

areas report higher levels of mental ill health and lower levels of well-being than those living in the most affluent areas (Cooper & Stewart, 2015). In 2018 for example, 23% of men and 26% of women living in very low SES areas reported levels of mental distress indicative of a possible psychiatric disorder, compared with 12% and 16% of men and women living in the least deprived areas (Cheong et al., 2019). There is also a clear relationship between low SES and suicide, with suicides three times more likely in very low SES areas (Cheong et al., 2019).

CHAPTER III

METHODOLOGY

In this chapter, the following chapters are discussed. They include research design, research question, null hypotheses, databases utilized, and data analysis.

Research Design

This study utilized a simple, linear regression model where the independent variable was poverty, and the dependent variable was the educational diagnosis and placement of students in special education for serious emotional disturbance (SED).

Research Question, Hypotheses, and Null Hypotheses

Research Question

The following question guided the collection, analysis, and interpretation of data in this dissertation:

RQ: Is there a relationship between SED and SES?

Hypotheses

To discover the answer to the above research questions, the following hypothesis were established from the research question.

H₀: There is a relationship between SED and SES?

H_a: There is no relationship between SED and SES.

Databases Utilized

SED data (2023) related to the student population between 3 and 21 years of age, and placed in special education under the diagnosis of SED in the State of Texas, were retrieved from the Texas Education Agency Databases. Data on poverty levels in the State of Texas were retrieved from a federal database.

Data Analysis

The data were obtained from the following databases:

1. https://rptsvr1.tea.texas.gov/cgi/sas/broker?_service=marykay&_program=adhoc._std_driver1.sas&RptClass=SpecEd&_debug=0&SchoolYr=23&report=StateRegion&format=html
2. https://rptsvr1.tea.texas.gov/cgi/sas/broker?_service=marykay&_program=adhoc._std_driver1.sas&RptClass=SpecEd&_debug=0&SchoolYr=23&report=StateDistrict&format=html
3. <https://www.welfareinfo.org/poverty-rate/texas/compare-counties/>

Because all data for this dissertation were obtained from publicly available databases that did not contain any personal identifying markers and the data were historical and previously collected; thus, Institutional Review Board (IRB.) was not required. The above SED data were disaggregated based on Texas Education Agency's breakdown of public schools. The breakdown consisted of 20 separate, regions comprising the sum total of public schools in the State of Texas. This data were compared to the poverty levels of students diagnosed with SED and currently

placed in special education services. The simple linear analysis was computed using the latest version of the Statistics for Social Sciences (SPSS) program. The null hypothesis was tested at 0.05 alpha level for significance.

Data Analysis Procedures

The data was obtained from the following federal and state databases: SED data (2023) related to the student population between 3 and 21 years of age, and placed in special education under the diagnosis of SED in the State of Texas, was retrieved from the Texas Education Agency Databases. Data on poverty levels in the State of Texas was retrieved from the federal database.

The above data was converted into averages for the 20 regional services centers in the State of Texas, and then exported into the Statistical Package for Social Science (SPSS) for analysis. The method of statistical analysis was a simple linear regression analysis. The method of statistical analysis utilized was simple linear regression analysis. The null hypothesis was tested with the F distribution at the 0.05 level of significance.

Summary

This chapter provided the blueprint of the study. First, the questions and null hypotheses were delineated. This study used existing federal and state publicly available, historical databases to gather data. The review of data was conducted utilizing simple linear regression analysis. All data was analyzed using the Statistics for the Social Sciences SSPS program. The results of this study will be thoroughly explained in the following chapter.

.

CHAPTER IV

RESEARCH FINDINGS AND RESULTS

The purpose of this study was to delineate a connection between students' poverty levels and their educational diagnosis and placement in special education under the umbrella of serious emotional disorders. Specifically, a linear regression model was used to determine if a correlation exists between students' SES and placement in special education under SED. This chapter summarizes the research results derived from the linear regression analysis.

This chapter comprises two sections. The first section of the chapter consists of delineated results of the linear regression analysis and a descriptive analysis of said results. The second section is the compilation of the results.

Addressing the Research Question

Linear Regression analysis is used to create a model that describes the relationship between a dependent variable and one or more independent variables. Depending on whether there are one or more independent variables, a distinction is made between simple and multiple linear regression analysis. Using the example below of a simple linear regression, time is being used to determine the amount of money made.

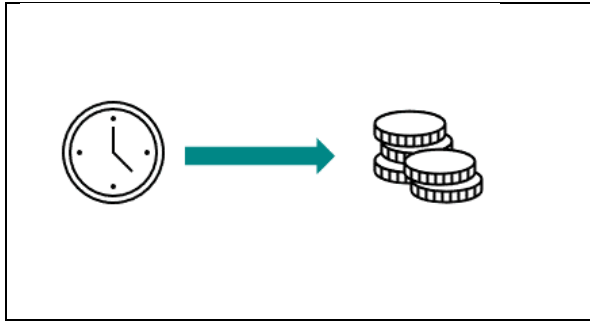


Figure 2: Example of Simple Linear Regression

In the case of a simple linear regression, the aim is to examine the influence of an independent variable on one dependent variable. In linear regression, an important prerequisite is that the measurement scale of the dependent variable is metric, and a normal distribution exists. For this present study, the independent variable was the poverty levels of students 18 years old and younger living in the State of Texas. The dependent variable was Texas, public school students presenting with an educational diagnosis of serious emotional disturbances and placed in special education. These numbers were normalized by first grouping both variables into predefined Regional Service Centers (n=20) and then averaging both variables. The averages were calculated using poverty rates of individual counties and existing averages of students placed in special education under the umbrella of SED. The numbers from Texas' Counties were taken from existing databases and then averaged based on the counties located in each of the specific Texas Regional Service Centers. See below for a list and location of each service center.

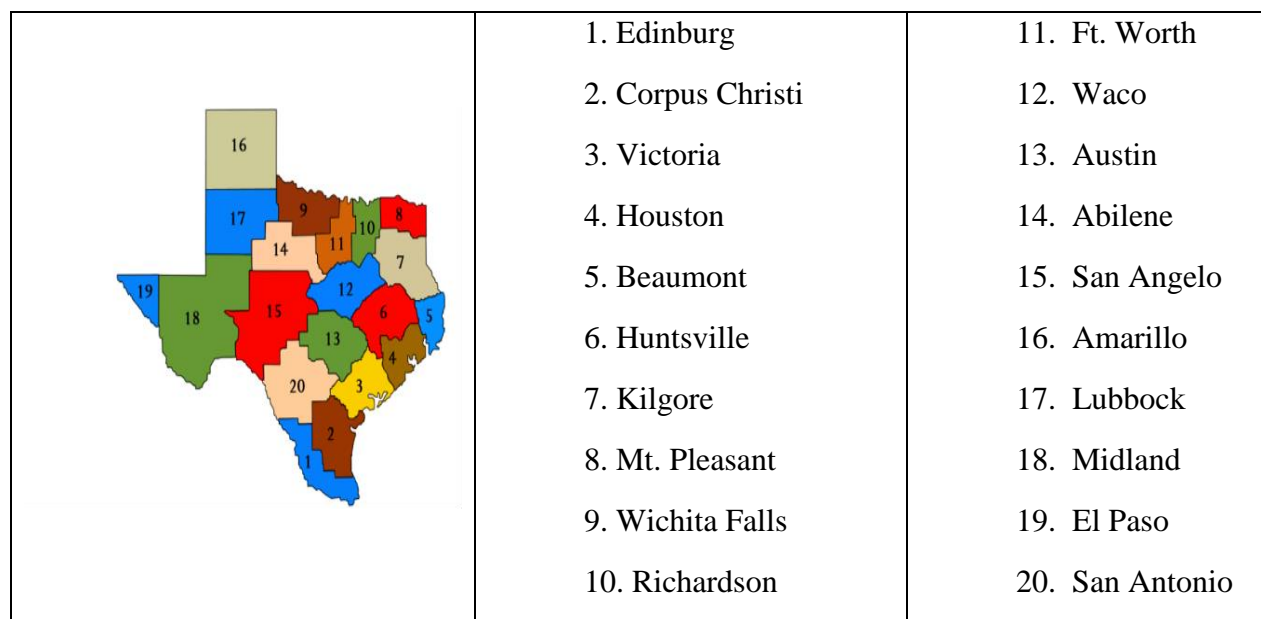


Figure 3: Map of Texas Regional Educational Service Centers

Research Question

The following question guided the collection, analysis, and interpretation of data in this dissertation:

RQ: Is there a relationship between SED and SES?

Hypotheses

To discover the answer to the above research questions, the following hypothesis was established from the research question:

H_0 : There is a relationship between SED and SES?

H_a : There is no relationship between SED and SES.

The null hypothesis for the present study related to correlation of SES to SED was tested with an F distribution at the 0.05 level of significance. The obtained data for the present study rejected the null hypothesis. The obtained linear regression coefficient [R] between SED and

SES was 0.87, $df = 1, 18$, $F = 55.30$, $P < 0.05$, $P < 0.01$, $P < 0.001$. The effect size was addressed through the linear regression coefficient squared 0.75 with an adjusted R squared of 0.74. Thus, 75% of the variance in SED was accounted for or explained by SES.

Summary

This study used linear regression analysis to reject the null hypotheses. This analysis demonstrated a positive correlation between the independent variable (ie., SES) and the dependent variable (I.e., SED). Additionally, 75% of the variance in SED is accounted for or explained by SES. A deeper discussion of the results and their implications follows in Chapter 5.

CHAPTER V

DISCUSSION, IMPLICATIONS, AND RECOMMENDATIONS

Discussion

Within the United States, the special education framework is the educational diagnosis of serious emotional disturbances (SED). This diagnosis is specific for students in the K-12th grade schools who have behaviors interfering with daily life (SAMSHA, 2023). These behaviors manifest as either “acting out” or “acting in” which make it difficult for students to learn in a general education classroom.

Unidentified and unmet need for services is particularly problematic for youth with serious emotional disturbance (Merikangas et al., 2011). SED is defined by the Substance Abuse and Mental Health Services Administration (SAMHSA, 2023) as “a diagnosable mental, behavioral, or emotional disorder of sufficient duration to meet diagnostic criteria specified within the (DSM-V TR), that result in functional impairment which substantially interferes with or limits the child’s role or functioning in family, school, or community activities.” Additionally, previous research has alluded to a positive correlation between poverty levels and SED. This study examined data from the State of Texas utilizing online, publicly available federal and state

historical databases that delineated SES and SED placement levels for the State of Texas. This data was categorized using Texas Regional Service Centers to aggregate data into the 20 service centers and then converted each data point into a percentage. Once completed, the 20 data points were exported into SPSS where linear regression analysis was applied. The results indicated that 75% of the variance in SED was accounted for or explained by SES at a 0.05 alpha level. This led to the rejection of the null hypothesis.

Implications and Recommendations

Based on the rejection of the null hypotheses, the results of this present study delineate a strong probability that students living at or below the federal poverty level are at a higher risk for presenting with signs/symptoms of a serious emotional disturbance. This educational diagnosis typically leads to placement in special education. The above is important for a number of factors:

1. School districts with higher levels of poverty should plan to make appropriate resources available to teach students diagnosed with SED;
2. Policymakers should consider increasing special education resources to areas with higher levels of poverty;
3. Individual school districts should provide appropriate support to faculty and staff related to providing appropriate education to students living in higher poverty levels;
4. Assessment professionals should consider poverty levels when diagnosing SED in students; and

5. Researchers should conduct further confirmatory studies to determine if the present results are found in other states and at the U.S. level.

Limitations and Recommendations

A notable limitation has been identified in this investigation. This present study examined data from a specific moment in time using data from only one state. The results are limited to that data and that moment. Researchers should consider conducting replication studies to determine if the present results are consistent across both time and in other states. Additionally, while this study utilized percentages based on regional service centers in Texas; for a deeper analysis, it is recommended that future researchers examine individual school districts.

REFERENCES

- Anderson, L. (2011). A learning resource for developing effective mentorship in practice. *Nursing Standard*, 25(51), 48–56. <https://doi.org/10.7748/ns.25.51.48.s49>.
- Bradshaw, C. P., Koth, C. W., Bevans, K. B., Ialongo, N., & Leaf, P. J. (2008). The impact of school-wide positive behavioral interventions and supports (PBIS) on the Organizational Health of elementary schools. *School Psychology Quarterly*, 23(4), 462–473. <https://doi.org/10.1037/a0012883>.
- Bromley, C., & Cunningham-Burley, S. (2010). Growing up in Scotland: Health Inequalities in the early years. Scottish Government.
- Centers for Disease Control and Prevention. (n.d.). Centers for Disease Control and Prevention. <https://www.cdc.gov/>.
- Cheong, M., Yammarino, F. J., Dionne, S. D., Spain, S. M., & Tsai, C.-Y. (2019). A review of the effectiveness of empowering leadership. *The Leadership Quarterly*, 30(1), 34–58. <https://doi.org/10.1016/j.leaqua.2018.08.005>.
- Cooper, K., & Stewart, K. (2020). Does household income affect children’s outcomes? A systematic review of the evidence. *Child Indicators Research*, 14(3), 981–1005. <https://doi.org/10.1007/s12187-020-09782-0>.
- Diagnostic and statistical manual of mental disorders: DSM-5-TR. (2022). . American Psychiatric Association Publishing.

- Forness, S. R., Youpa, D., Hanna, G. L., Cantwell, D. P., & Swanson, J. M. (1992). Classroom instructional characteristics in attention deficit hyperactivity disorder: Comparison of pure and mixed subgroups. *Behavioral Disorders*, 17(2), 115–125. <https://doi.org/10.1177/019874299201700201>.
- Gibbons, M.M., Cihak, D.F., Mynatt, B.S., & Wilhoit, B.E. (2015). Faculty and Student Attitudes toward Postsecondary Education for Students with Intellectual Disabilities and Autism. *The Journal of Postsecondary Education and Disability*, 28, 149-162.
- Individuals with Disabilities Education Act (IDEA). (2022, November 7). <https://sites.ed.gov/idea/about-idea/>.
- Individuals with disabilities education act (IDEA). Individuals with Disabilities Education Act. (2023, October 17). <http://idea.ed.gov/>.
- Institute for Research on Poverty. INSTITUTE FOR RESEARCH ON POVERTY. (1970, November 2). <https://www.irp.wisc.edu/>.
- Lowdermilk, J., Ramos Jr, N., Pecina, J., Rangel, C., & Nevarez, N. Students with Emotional Disorders and Their Television Viewing Habits: A Case Study. *National Social Science Journal*, 51(2), 49-56.
- Jenks, C. (1996). *Childhood*. Routledge.
- Jones, V. F., Dunn, C., & Dohrn, E. A. (2004). Creating effective programs for students with emotional and behavior disorders: Interdisciplinary approaches for adding meaning and hope to behavior change interventions. Pearson/Allyn and Bacon.
- Kataoka, S. H., Zhang, L., & Wells, K. B. (2002). Unmet need for mental health care among U.S. children: Variation by ethnicity and insurance status. *American Journal of Psychiatry*, 159(9), 1548–1555. <https://doi.org/10.1176/appi.ajp.159.9.1548>.
- Kauffman, S. A. (1992). Origins of order in evolution: Self-organization and selection. *Understanding Origins*, 153–181. <https://doi.org/10.1007/978-94-015-8054-08>.
- Merikangas, K. R., He, J., Burstein, M., Swendsen, J., Avenevoli, S., Case, B., Georgiades, K., Heaton, L., Swanson, S., & Olfson, M. (2011). Service utilization for Lifetime Mental Disorders in U.S. adolescents: Results of the national comorbidity survey–adolescent supplement (NCS-A). *Journal of the American Academy of Child & Adolescent Psychiatry*, 50(1), 32–45. <https://doi.org/10.1016/j.jaac.2010.10.006>.
- National Alliance on Mental Illness. NAMI. (n.d.). <https://www.nami.org/Home>.

- National Eating Disorders Association. (n.d.). <https://www.nationaleatingdisorders.org/>.
- National Institutes of Health. (n.d.). <http://nih.edu>.
- Pietkiewicz, I. J., Nęcki, S., Bańbura, A., & Tomalski, R. (2018b). Maladaptive daydreaming as a new form of behavioral addiction. *Journal of Behavioral Addictions*, 7(3), 838–843. <https://doi.org/10.1556/2006.7.2018.95>.
- Samuels, P. (2015) Statistical Methods: 15 Critical Appraisal. Birmingham City University, Birmingham.
- Somer, E., Soffer-Dudek, N., Ross, C. A., & Halpern, N. (2017a). Maladaptive daydreaming: Proposed diagnostic criteria and their assessment with a structured clinical interview. *Psychology of Consciousness: Theory, Research, and Practice*, 4(2), 176–189. <https://doi.org/10.1037/cns0000114>.
- State of Texas. (n.d.). Welcome to Texas.gov. Texas.gov. <https://www.texas.gov/>.
- Substance Abuse and Mental Health Services Administration. SAMHSA. (2023). <https://www.samhsa.gov/blog/year/2023>.
- Texas Education Agency. (2019, November 21). Reports and Data. <https://tea.texas.gov/reports-and-data>
- Texas Health and Human Services. (n.d.). <https://www.hhs.texas.gov/>.
- U.S. Department of Education. (n.d.). <https://www.ed.gov/>.
- U.S. Department of Health and Human Services. (2023, October 24). Health information. National Institutes of Health. <https://www.nih.gov/Health-information>.
- Wahler, R. G., & Dumas, J. E. (1986). Maintenance factors in coercive mother-child interactions: The compliance and predictability hypotheses. *Journal of Applied Behavior Analysis*, 19(1), 13–22. <https://doi.org/10.1901/jaba.1986.19-13>.
- Watterson, B. (1994). Calvin and Hobbes.
- Weist, M. D., Mellin, E. A., Chambers, K. L., Lever, N. A., Haber, D., & Blaber, C. (2012). Challenges to collaboration in school mental health and strategies for overcoming them. *Journal of School Health*, 82(2), 97–105. <https://doi.org/10.1111/j.1746-1561.2011.00672.x>.

BIOGRAPHICAL SKETCH

Cristina Rangel received a Bachelor of Science in the Spring of 2004 with a major in Psychology and a minor in Sociology from the University of Texas Pan American. In 2005, Cristina enrolled in a teacher certification program with Region One Education Service Center and began her career as a special education teacher. In a short time, her love for special education soon turned into passion. By 2008, Cristina received a Masters in Education with a concentration in special education and a specialization in leadership from the University of Texas Pan American. In the first 5 years of teaching, Cristina had served in several leadership roles such as department head (4 years), instructional cadre leader, 504 coordinator, and CIP leader (campus improvement leader). In 2010, proceeded to enroll in a principal certification program and gained her principal certificate. In her pursuit for professional growth, Cristina began teaching as an adjunct professor in 2013 for the department of Human Services and Human Development at the University of Texas Rio Grande Valley. Thirteen years into her career (2018), Cristina decided to continue her love for education when she earned a spot on the PROJECT PLEASE program and received her Doctoral Degree in December 2023 from the University of Texas Rio Grande Valley in Curriculum and Instruction with a cognate area in Special Education. Today, she continues to serve as a teacher and advocate for students with disabilities.

Personal Email Address: crangel32@yahoo.com