

**THE IMPACT OF SERVICE DELIVERY MODELS ON NON-DISABLED PEERS
INTENT TO INCLUDE THEIR PEERS WITH DISABILITIES**

by

MICHAEL CAMPBELL
B.S. Florida State University, 1993
M.S.W. Florida State University, 1994

A dissertation submitted in partial fulfillment of the requirements
for the degree of Doctor of Philosophy in Public Affairs
in the College of Health and Public Affairs
at the University of Central Florida
Orlando, Florida

Summer Term
2007

Major Professor: Eileen Abel

© 2007 Michael Campbell

ABSTRACT

In much the same way as the racial integration movement, advocates for students with disabilities (SWD) have cultivated an active and vocal lobby seeking to establish and then implement legal mandates to integrate classrooms in the hope that social acceptance would follow. Through federal mandates such as the Individuals with Disabilities Education Act (IDEA), conceptually initiated in 1975 and revised in 2004 as the Individuals with Disabilities Education Improvement Act (IDEIA) along with Section 504 of the Rehabilitation Act of 1973, these students have a voice to cry out for access to the experiences of work, conversation and play with their peers. This study explores the impact that classroom efforts to offer “inclusion” have on their nondisabled peers’ intent to include their fellow SWD in their lives as students.

Using survey research methods and guided by the Theory of Planned Behavior (Aizen, 1985), 593 responses were obtained from a convenience sample of 936 third, fourth and fifth grade students educated in 52 classrooms spread across 6 different schools in two counties (Seminole and Orange) in Central Florida. Survey results were also collected from the students’ parents and their teachers and used to add a richer depth to the data analysis.

The data was compiled and analyzed using mean comparison tests (T test and One & Two way ANOVA tests) and a multinomial logistic regression equation. SPSS 13.0 was used to compute the impact that independent variables (*integration and interaction*) had on the dependent variable (*intent to include*). The results suggest that the integration of SWD had a significant impact on nondisabled peers; yet efforts to promote peer interaction seemed to have a mixed result.

Additionally, the students' gender (*female*), the students' prior exposure to SWD and a positive teacher attitude toward people with disabilities also had a significant impact on the response of students' intent to include SWD. The results of this analysis are presented along with a discussion of these findings in relation to public policy initiatives to promote the social inclusion of community members. Limitations and recommendations for future research are also indicated.

ACKNOWLEDGMENTS

We can only be said to be alive in those moments when our hearts are conscious of our treasures. *Thornton Wilder*

In keeping with this time honored tradition, I write this section to thank the good people for whom, without their assistance, guidance, patience and support, this manuscript would not have been possible. My deepest thanks and gratitude is reserved for my wife, **Shelley Campbell**, who tirelessly cared for our two beautiful children, **Megan** and **Mitchell**, as I remained at the task of reading and writing until the early hours. As my true companion, I owe her all my thanks and admiration for “putting up with all this mess”.

Next, I indirectly thank all of the faculty in the COHPA PhD program and directly thank each member of my committee for their unending assistance and constant encouragement. Often the road to completion seemed winding and unending but they each took turns to light the way and guide me through to the end. Specifically, I share my genuine appreciation for the unremitting support my chair, **Dr. Eileen Abel**, offered to me from the time I began this program until the final days of this dissertation. I could not have imagined a better champion for my success nor could I have found a better advocate for the values of social work, which I hold so dear.

I also wish to personally thank the **faculty educators, parents** and **students** in the 52 elementary classrooms in central Florida for their participation in this project. Additionally, I wish to thank the administration in Seminole and Orange counties for their encouragement. I also send my thanks to the staff with the Florida Inclusion Network, especially **Vikki Barnett**, for

their help in guiding my initial proposal concept and directing me to key contacts in the education community.

This research project was aided by the financial support from the **FAHS Beck Fund** for Research and Experimentation. The FAHS Beck Fund for Research and Experimentation remains a renowned advocate for research efforts that contribute to a greater understanding of social problems affecting individuals, families and local communities. They generously supported this research agenda and as a “financially challenged” graduate student, I appreciate their kindness.

Finally, I thank my family, friends and co-workers, specifically my parents, **Scott** and **Kathy Campbell**, who made time to poke and prod me along this journey. Collectively, your gentle and not so gentle nudges let me know that I was never fully alone in this journey and I look forward to the time when I can return the nudging favor. Thank you all for giving me the treasures of your of time, expertise, direction and compassionate ears. I trust you too share in the pride I take from this accomplishment, as I could not have done this without each and every one of you.

GRAZIE

TABLE OF CONTENTS

LIST OF FIGURES	xi
LIST OF TABLES	xii
LIST OF ABBREVIATIONS/ACRONYMS	xiv
CHAPTER ONE INTRODUCTION.....	1
Problem Statement.....	1
CHAPTER TWO THEORETICAL FRAMEWORK.....	6
Theoretical Framework.....	6
Descriptive Theory.....	8
Labeling Theory.....	8
Reintegrative Shame Theory.....	10
Self-Fulfilling Prophecy.....	13
Pygmalion Effect	13
Galatea Effect.....	15
Explanatory Theory	17
Theory of Reasoned Action	17
Theory of Planned Behavior	18
Discussion of Theoretical Framework	22
CHAPTER THREE LITERATURE REVIEW	25
Continuum of Services.....	26
Stakeholders.....	30
Parents.....	31

Educators.....	32
Students.....	33
Service Delivery Models.....	35
Classroom Level Intervention.....	35
Student Level Intervention.....	36
Peer Education	37
Peer Support.....	38
Inclusion.....	41
CHAPTER FOUR METHODOLOGY.....	44
Study Variables.....	44
Research Questions / Hypothesis.....	48
Specific Procedures.....	49
Analytic Design	51
Analysis of Variance (ANOVA).....	51
Multinomial Logistic Regression (MLR)	51
Research Sample.....	52
Data Collection	54
Instrumentation	56
Attitudes.....	56
Normative Beliefs	57
Perceived Behavioral Control.....	58
Control Variable of Adult Attitude Scale	60
Pilot Study.....	60

Treatment of the Data	61
Anticipated Findings.....	61
CHAPTER FIVE RESULTS.....	63
Descriptive Data.....	63
ANOVA Data:	70
Results for H1a (<i>Integration</i>).....	71
Results for H2a (<i>Interaction</i>).....	73
Results for H3a (<i>Interaction Effect</i>).....	75
Regression Data	80
Results for H4a to H8a.....	84
Initial MLR Model.....	84
Revised MLR Model.....	89
Result Summary.....	93
CHAPTER SIX DISCUSSION	94
Implications.....	95
ANOVA Data:	95
Regression Data	96
Implications for Public Policy	100
Healthcare	102
Poverty	103
Street Gang Involvement	105
Education	107
Relationship of Results to Theory.....	108

Implications for Future Research.....	109
Limitations	111
Summary and Conclusion.....	114
APPENDIX A VERBAL CONSENT FOR TEACHERS	115
APPENDIX B TEACHERS AND PARENTS ATTITUDE SURVEY	117
APPENDIX C CONSENT FORMS	119
APPENDIX D STUDENT SURVEY QUESTIONAIRES	122
REFERENCES	127

LIST OF FIGURES

Figure 1. Theory of Reasoned Action; Aizen & Fishbein (1980).....	18
Figure 2. Theory of Planned Behavior.....	19
Figure 3- Conceptual Model	50
Figure 4- Histogram for the Dependent variable (<i>Intent to Include</i>).....	68

LIST OF TABLES

Table 1- Proposed Multidimensional Theoretical Measurement of PBC;.....	21
Table 2- Definitions of Study Variables – Dependent Variables	45
Table 3- Definitions of Study Variables – Independent Variables	46
Table 4- Definitions of Study Variables – Control Variables.....	47
Table 5- Demographic Distribution Reported by the Students.....	65
Table 6- Distribution of Contextual School Variables	66
Table 7– Descriptive Data for Independent Sample T test.....	66
Table 8– T test Comparing “Missing” Group and the Fully Completed” Groups.....	67
Table 9– Independent Variable (<i>Integration and Interaction</i>) Descriptive Statistics.....	67
Table 10– Dependent Variable (<i>Intent to Include</i>) Descriptive Statistics	68
Table 11– Correlation Coefficients for the Dependent Variable (<i>Intent to Include</i>).....	69
Table 12- Levine Test of Equality of Error Variances for H1a	71
Table 13– Multiple Comparisons Output for H1a	72
Table 14– Descriptive Data for H1a	72
Table 15- Levine Test of Equality of Error Variances for H2a	73
Table 16– Multiple Comparisons Output for H2a	74
Table 17– Descriptive Data for H2a	75
Table 18- Levine Test of Equality of Error Variances for H3a	76
Table 19– Descriptive Output for H3a.....	76
Table 20– Test of Between-Subjects Effects for H3a.....	77
Table 21– Multiple Comparisons Output for H3a	79

Table 22– Variables Explored Through Multinomial Logistic Regression.....	82
Table 23- Model Fitting Output for the Initial Model	85
Table 24- Parameter Estimates for the Initial Model.....	86
Table 25- Likelihood Ratio Tests for the Initial Model.....	87
Table 26- Pseudo R-Square for the Initial Model.....	89
Table 27- Model Fitting Output for the Revised Model.....	90
Table 28- Parameter Estimates for the Revised Model	91
Table 29- Likelihood Ratio Tests for the Revised Model.....	92
Table 30- Pseudo R-Square for the Revised Model.....	92
Table 31- Parameter Estimates for Interaction in the Initial Model	98

LIST OF ABBREVIATIONS/ACRONYMS

A	Attitude Toward The Behavior
DOE	Department Of Education
FAPE	Free And Appropriate Public Education
IDEA	Individuals With Disabilities Education Act
IDEIA	Individuals with Disabilities Education Improvement Act
IEP	Individualized Education Plan
LRE	Least Restrictive Environment
MLR	Multinomial Logistic Regression
NB	Normative Beliefs
PBC	Perceived Behavioral Control
PWD	Person With Disabilities
SCC	Self-Contained Classroom
SN	Subjective Norm
SWD	Student With Disabilities
TPB	Theory Of Planned Behavior
TRA	Theory Of Reasoned Action

CHAPTER ONE INTRODUCTION

In the early hours of August 27, 1957 there was a palpable tension brewing in the homes of millions of families in the United States. It was a tension that typically builds through the summer, except in 1957, things were destined to be different. For most children, the first day of school brings hopes of new and old friendship, which create nervous energies in the souls of anxious and excited children. The nine African American children who entered Little Rock Arkansas's Central High School in 1957 were escorted by armed guards and illegally armed with the power to integrate through the 1954 Supreme Court ruling in Brown vs. the Board of Education (Beals, 1994). Despite a federal mandate to integrate schools, a swelling undercurrent of public opinion had lead to a crescendo of social, emotional and physical tensions.

Now more than forty years after the racial integration of American schools, the anxieties of the first days of school melt into the rigors of the day as students engage their teachers and peers in their work, conversation and play. These aspects of daily interactions serve as life's curriculum, which molds a student's sense of himself or herself. The classroom offers a wealth of experience through the diversity of its students; yet this year some students, despite the lessons learned through the turmoil of Brown vs. the Board of Education, remain excluded from these experiences not on the issue of race but on the basis of their disability.

Problem Statement

In much the same way that racial integration was achieved, advocates for students with disabilities have cultivated an active and vocal lobby in government which sought to establish legal mandates to integrate classrooms in the hope that social acceptance would follow. Through

federal mandates such as the Individuals with Disabilities Education Act (IDEA), conceptually initiated in 1975 and revised in 2004 as the Individuals with Disabilities Education Improvement Act (IDEIA) along with Section 504 of the Rehabilitation Act of 1973, these students have a voice to cry out for access to the experiences of work, conversation and play with their peers. The IDEIA outlines the rights of all children (with or without disabilities) to access “free and appropriate public education (FAPE)” in the “least restrictive and most inclusive environment possible (LRE)”.

Special education departments are designed to offer specialized services, which are uniquely tailored to the needs of each child. Current practices in special education offer a continuum of four venues for their education (Halverson & Neary, 2001). SWD are educated either *at home*, (by the family or with teachers who come into their homes) in a *special school*, (which services only children with disabilities) in a regular education school (in a *self-contained classroom* in that school) or in an *inclusion model* within the mainstream of students. Florida Statutes indicate that the continuum of education should provide supplementary consultation, resource rooms, special classes, special day schools as well as hospital/homebound instruction (Section 230.22(2)(4) F.S.).

The implementation of these various learning venues varies widely from state to state. The determination of least restrictive environments (LRE) is formulated by a combined process involving the school systems and the families of SWD through an Individualized Education Plan (IEP) that is tailored to each student and their needs.

The IDEIA does not offer guides as to how each state should implement the FAPE and LRE provisions but the implication and wording of the IDEIA promote and call for the inclusion of all students in an appropriate “continuum of services” (Halverson & Neary, 2001). Inclusion

builds on the therapeutic benefit of educating disabled and non-disabled students in the same environment to allow the child with disabilities an opportunity to see and experience the behavioral, social and academic characteristics of other children, in the belief that this interaction will foster growth and change (McGregor & Vogelsberg, 2000). As described in the onset of this section, three of the four venues currently in practice through special education offer a segregated education to its students.

The state of Florida has experienced a rapid rise in the numbers of children with disabilities seeking a public education. In 2004, the Department of Education (DOE) reported that 400,001 students from 3 to 21 years of age were currently being served under the IDEIA. In the fiscal year of 2006, the DOE received 11.1 billion dollars, nearly 20% of the state 56 billion dollar education budget, in grant funds to support special education programs. The combination of increases in students served and the high levels of cost for special education have forced the DOE to implement creative responses to meet this challenge.

Thirty years after the enactment of the IDEIA, many children with disabilities go without the FAPE and LRE promised them by the IDEIA. According to the Department of Education statistics (www.ed.gov), the national average for inclusion (the percentage of children with disabilities being educated in a general education classroom at least 80% of the day) is only 49% and some areas such as Washington D.C. (at < 3% inclusion) the rates of inclusion are much lower, demonstrating a significant need for policy and practice synthesis (Batchelder, Kinney & Reardon, 2005).

Any study of the needs of students enrolled in special education must look at the contextual issues that come together to create opportunities and barriers to service delivery to SWD. Specifically, two prominent theories converge in the issue of special education and offer a

glimpse into the reasons behind enacting the IDEIA legislation. Labeling theory, with contributions from Tannenbaum, Becker, and Braithewaite, presents the notion that the system of assigning labels for the ease of organizational categorization has negative unintended consequences for the individuals labeled (Kenney, 2002; Lester, 1994; Chen, 2002; Ashforth & Humphrey, 1997).

Another prominent theory offers some directionality to the potentially adverse effects of labels, specifically for children in the education system. Self-fulfilling prophecy indicates that preconceived beliefs can have a significant impact on the outcome of an event (Madon, Guyll, Spoth & Willard, 2004). A self-fulfilling prophecy is essentially an erroneous belief that leads to its own fulfillment (Merton, 1948).

In their classic 1968 experiment, entitled the *Pygmalion in the Classroom*, Rosenthal and Jacobson successfully tested the impact of a self-fulfilling prophecy using the tenants of labeling theory as its core (Smith, Osborne, Crim, & Rhu, 1986). Rosenthal (2002) recounts that the researchers' randomly assigned labels such as "high achiever" and "low achiever" to two separate groups. Each group represented 20% of the class. They indicated that the labels were assigned as a product of a new IQ test. At the end of the school year, the researchers returned to retest the children. Their experiment illustrated that teachers unintentionally found that the children's end of the year achievement was exactly what they were told it would be. As self-fulfilling prophecy indicates, this experiment offers empirical proof that labeling, holding all other variables constant, could have a profound impact on the outcomes of individuals (Rosenthal & Jacobson, 1968).

Armed with the knowledge that labels, specifically in the arena of education, can cause negative unintended consequences, the federal government designed legislation in an attempt to

mitigate these effects on SWD. In this way, the IDEIA was crafted to assist the various stakeholders (teachers, parents, school administration, SWD and their peers) involved in the education of SWD to form service delivery models that promote the most inclusive environment possible. According to the organizational theory literature (Scott, 2003), complex systems, like the inclusion model espoused by the IDEIA, are built on the notion of interconnected stakeholders. In other words, if inclusion works or fails it does so because of the collective efforts of educators, parents, and students (both with and without disabilities) and not because of any one member of the system.

An effort to empirically measure the “success” of the inclusion policy lies in the manner in which the researcher frames the question; as “success” can be defined in different ways depending upon the stakeholder who responds to the question. This study will attempt to empirically test the impact that the policy and philosophy of inclusion, as directed by the IDEIA, has upon a critical aspect of the education of SWD, the intent of non-disabled peers’ to include SWD. This study seeks to answer the research question: *Does the level of service delivery have an impact on non-disabled peers’ intent to include their peers with disabilities?* If the policy of inclusion is effective, the peers involved in “inclusive” classrooms should express higher levels of intent to include SWD than peers who are not in “inclusive” models of service delivery.

CHAPTER TWO THEORETICAL FRAMEWORK

This chapter will offer both the theoretical framework for this study as well as the literature review of inclusion to support this study's purpose. A synthesis of these two components will offer a clear rationale for the importance of conducting this experiment.

Theoretical Framework

Social Work and Education practice, like many allied social sciences, derives its strength from theoretically informed practice. Nash, Munford and Odonoghue (2005) describe a cybernetic loop whereby theory informs practice, which fuels theory and so on. Keen and O'Donoghue (2005) discuss the importance for clinical practitioners to integrate their practice with theory in an effort to achieve a "conceptual framework" for their practice. In this way, the practitioner integrates their practice design and their theoretical knowledge of the problem to guide their practice design.

Social science research also calls for an integration of theory and practice (Wan, 2002). In blending the theoretical frameworks with research design, research benefits from "not reinventing the wheel" while also reflecting back an element of theory testing, which promotes the process of theory enhancement.

Theory, by definition, "is a set of interrelated constructs, definitions, and propositions that present a systematic view of phenomena by specifying relations among variables, with the purpose of explaining and predicting the phenomena" (Kerlinger, 1986, p. 9)." In explaining and predicting a phenomenon, theory serves as a valuable and powerful tool to guide thinking as well

as future action in relation to the phenomena. Pragmatically, theory can serve as a guiding force in both academic and public policy settings.

In academics, researchers take advantage of the power of theory to drive research designs (Gliner & Morgan, 2000). Theory serves as the guiding force behind hypothesis generation and can serve as a framework for testing the hypothesized relationships. In the public policy arena, the role of theory is to inform and guide practice (Wan, 2002; Martin, 2002). Informed and guided practice can lead to evidence based approaches, which support or refute current practices. The goal of evidenced based practice is to use the power of theoretically grounded research to empirically explore public policy decisions and to validate their effectiveness (Wan, 2002).

As Kerlinger (1986) suggests, the essence of theory is to critically explore the issues related to a phenomena and then to provide a means of exploring and predicting that phenomena. As is often the case, the complexity of a given phenomena requires a careful crafting of multiple theories to adequately “paint a picture” which best explores and predicts the phenomena (Nash, Mungfor & O’Donoghue, 2005). The critical element to this blending process is to ensure that the integrity of each theoretical component remains intact while the interconnected constructs are illuminated and interwoven into a new set of interrelated constructs (Kline, 2005).

This chapter will look to craft a combined theoretical framework to guide the study of the impact of service delivery models on non-disabled peers’ intentions to include peers with disabilities in their work. The inclusion of children with disabilities in general education has been a topic of research and public policy since the inception of the IDEIA in 1975. In crafting a melded theoretical framework, this chapter will draw on theories from criminal justice, education and various social sciences in an effort to *describe and explain* what factors were involved in formulation of the policy of inclusion at both the organization as well as the individual levels.

Labeling theory, self fulfilling prophecy theory and complex adaptive systems theory will be utilized to conceptualize the policy of inclusion. Finally, the *explanatory theories* of theory of reasoned action and the theory of planned behavior will be presented as a means of empirically testing the policy of inclusion. Ultimately, this theoretical framework will be combined and discussed in the context of this studies research questions.

Descriptive Theory

Labeling Theory

With roots dating back to Tannenbaum and his studies of social deviance in 1938, labeling theory, initiated in the field of criminology, builds on the notion that the system of assigning labels for the ease of organizational categorization has negative unintended consequences for the individuals labeled (Kenney, 2002, Lester, 1994, Chen, 2002, Ashforth, B.E., Humphrey, R.H., 1997). According to Tannenbaum, “The process of making a criminal . . . is a process of tagging, defining, identifying, segregating, describing, and emphasizing (p. 20)” their label. Labeling theory is predicated on the notion of social control, which, as Wilson (1977, p. 6) describes, should be seen as a collective response to nonconformity, which includes both the social perception of and the social reaction to rule breaking. “It includes the formal and informal ways society has developed to help ensure conformity to social norms (Chen, 2002, p. 46).” One way in which society structures norms is to create labels. Labels form an arbitrary anchor by which perception and reaction can be judged (Chen, 2002). As is the case in the criminal justice, healthcare, public administration, social work and education fields; labels serve the function of signaling overt messages as well as covert and often value laden messages (Chen, 2002, Downs & Robertson, 1997).

Labeling theory, as described in the criminal justice context, explores how labeling “criminals” serves to create artificial boundaries which separate offender from non-offender (Li & Moore, 2001). This separation fuels added division and thus compounds the potential for future separation with repeated crimes (Ray & Downs, 1986). Labeling theorists posited that labels form the strings of social control which, when woven, together create a “cast net” that, when cast too wide, runs the risk of poorly separating the offender from the non-offender (Palamara, Cullen & Gersten, 1986). Ashforth and Humphrey (1997, p. 47-48) succinctly presents four key themes which bolster labeling theory.

1. Labeling is inherently arbitrary.
2. Labeling causes social objects to lose their individuality.
3. Labeling causes social objects to assume the affective tone of the category.
4. Labels tend to become reified as objective and normative accounts of social reality.

Critics argue that labeling theory, as initially posited, is difficult to empirically study and thus difficult to prove (Ashforth & Humphrey, 1997; Meade, 1974). Given the vast content covered and the plethora of confounding variables, only a few studies have been conducted to test this theory. Using longitudinal data in an effort to minimize the confounding effects of history and maturation threats, Palamara, Cullen, and Gersten (1986), Ray and Downs (1986), Kaplan and Johnson (1991) and Downs and Robertson (1997) each conducted studies of labeling theory and found support for its tenants. Downs and Robertson (1997), in their study of drug use in adolescents, found that “... a more deviant self-label at baseline predicted greater drug use at follow-up (p. 136)”. Li and Moore (2001) present the position that “... once an individual becomes aware of his or her stigmatized label, his or her self-perceptions are affected (p. 3).”

Labeling theory has identified that internal awareness; external perceptions and social structures can have a dramatic effect on outcomes (Kaplan & Johnson, 1991). In this view, the

law of the state serves as a social structure, which operates as vehicle for social control (Kenney, 2002). Labeling theorists, such as Howard Becker who in his 1963 book *Outsiders: Studies in the Sociology of Deviance*, argued that since the nature of law is man made and therefore arbitrary that it is not the harm that makes an act "criminal", but the label that is given to the act that makes it criminal (Chen, 2002). This arbitrary notion of criminality could lead to, as Becker (1963) and other labeling theorist contend, a system that is lower-class biased in it labeling of crime (Smith, Osborne, Crim, & Rhu, 1986; Ashforth & Humphrey, 1997). Ashforth and Humphrey (1997) identify that this notion of inequity is key to exploring the potential untoward effects of labels.

Recent public policy initiatives have progressed from Becker's notion of racial and lower-class bias to consider the issue of racial profiling and the potential issues that these labels have in the ever widening net of social control. As Gabbidon (2003) indicates, labeling and profiling on the basis of color existed "long before the labeling perspective was first being conceptualized in the classic work of Tannenbaum... (p. 347)". (I used the "Find / Replace" feature to address this issue. In his study of the impact of race on shoplifting arrests, Gabbidon found that race (specifically African Americans) was the primary characteristic of false arrest. His analysis supports the main tenant of labeling theory that pernicious effects occur by the overt and covert meaning of the labels that institutions assign to people.

Reintegrative Shame Theory

Another prominent theorist in area of labeling has introduced the concept of shaming as a tool of social control. In 1989, John Braithwaite, in *Crime, Shame and Reintegration*, presents the theory of reintegrative shame theory, which posits that there are two forms of shaming,

reintegrative (to bring the offender back into society) and disintegrative (to shun and marginalize the offender for good from society), which play out in the context of labeling and social control (Chen, 2002). Through the use of social ceremonies, Braithwaite argues that societies can construct opportunities / ceremonies to use shame to certify or decertify the label of criminal. Disintegrative ceremonies would serve to marginalize the offender to reinforce their societal position of being external to the greater community. Braithwaite (1989) wrote:

The first step to productive theorizing about crime is to think about the contention that labeling offenders makes things worse. The contention is both right and wrong. The theory of reintegrative shaming is an attempt to specify when it is right and when wrong. The distinction is between shaming that leads to stigmatization—to out casting, to confirmation of a deviant master status—versus shaming that is reintegrative, that shames while maintaining bonds of respect or love that sharply terminates disapproval with forgiveness, instead of amplifying deviance by progressively casting the deviant out. (p. 12-13).

As labeling theory indicates this isolation breeds disengagement and could perpetuate the cycle of criminality. On the other hand, reintegrative ceremonies would serve to bring the offender back into the community, thus deemphasizing the label of criminal to create an inclusive bridge to involve and engage the criminal in the society.

As the literature indicates, Braithwaite's reintegrative shame theory generally comments about the organizational factors, which contribute to the relative, impact of labels and specifically as they are applied to at risk populations. Shame theory has been utilized to better explore the impact of labeling on populations with delinquency issues (Hay, 2001; Chen, 2002), mental illness issues (Scheff, 1984; Lester, 1994) as well as individuals with disabilities (Kagan, 1990; Smith, Osborne, Crim, & Rhu, 1986; Li & Moore, 2001). Lester (1994) applied this theoretical approach to the study of suicidal patients. His study found support for the impact of labeling theory as he examined the impact of labeling on the behaviors of institutionalized

mentally ill. When explored through the lens of reintegrative shame, the concept of inclusion can also be explored to assess the ways in which educational organizations use shame, either overt or covert, to institutionalize social control. Clearly, as Becker (1963) presents, the label of disabled is constructed around a set of man-made criteria.

The central theme of labeling theory, as Smith, Osborne, Crim, and Rhu (1986) indicate, is that "...labeling is not a quality intrinsic to an act or set of acts but is a socially constructed, discrediting definition (p. 195)." As is the case with judicially approved law, these labels of disability serve to categorize individuals for the ease of the institution. This categorization, or tracking, creates separation, which institutionalizes marginalization. Lotz and Lee (1999) present that tracking is discriminatory because it is often "...based more on an individual's class and race than on ability; moreover, the tracking decision, once made, is virtually irreversible (p. 202)."

Labeling theory establishes a theoretical prediction of the outcome of classifying an individual as deviant. In the context of this paper, a disability is not seen as an abnormal behavior but moreover disability is a deviation from what "ought to be" or from what is normally expected (Li and Moore, 2001). Labeling theory is clear that this process of classification engenders disengagement and factionalism (Kagan, 1990; Smith, Osborne, Crim, and Rhu, 1986) which serves to not only to oppose the IDEIA mandate but arguably weakens the collective community.

According to Braithwaite (1989), the organizational decision to reintegrate or disintegrate plays a significant role in the way the intended or unintended shame of marginalization is actualized. Clearly a case can be forged that the federal mandate of the IDEIA calls for a reintegrative approach. There appears to be a clear disconnect between this policy expectation

and current practice. Reintegrative processes, such as classroom inclusion by which the child with disabilities is brought back into society, serve to foster Braithwaite's notion of "maintaining bonds of respect." On the other hand, disintegrative ceremonies such as self contained classrooms, which segregated students with disabilities into classes with similarly students with disabilities and center schools, which only service children with disabilities, indicate the organizational position to stigmatize and outcast the student with disabilities for the good of the non-disabled children in that school community (Kagan, 1990).

Self-Fulfilling Prophecy

Grimes (2005) chronicles that the roman poet Ovid, created the character Pygmalion in the tenth book of his *Metamorphosis*. Pygmalion, a sculptor by trade, crafted out of ivory a beautiful rendering of a woman (Galatea). This sculpture symbolized perfection and Pygmalion fell in love with Galatea. Pygmalion then prayed to the Greek god Venus to make Galatea into a real woman, which, as the story plays out, she did. This story, repeated in numerous literary works, serves as the basis for the premise of a self-fulfilling prophecy in which the subject's desire / belief is made real.

Pygmalion Effect

As a theory, self-fulfilling prophecy indicates that preconceived beliefs can have a significant impact on the outcome of an event (Madon, Guyll, Spoth & Willard, 2004). A self-fulfilling prophecy is essentially an erroneous belief that leads to its own fulfillment (Merton, 1948). In their classic 1968 experiment, entitled the *Pygmalion in the Classroom*, Rosenthal and Jacobson successfully tested the impact of a self-fulfilling prophecy using the tenants of labeling

theory as its core (Smith, Osborne, Crim, & Rhu, 1986). Rosenthal (2002) recounts that the researchers' randomly assigned labels such as "high achiever" and "low achiever" to two separate groups. Each group represented 20% of the class. They indicated that the labels were assigned as a product of a new IQ test. At the end of the school year, the researchers returned to retest the children. Their experiment illustrated that teachers unintentionally found that the children's end of the year achievement was exactly what they were told it would be. As self-fulfilling prophecy indicates, this experiment offers empirical proof that labeling, holding all other variables constant, has a profound impact on the outcomes of individuals (Rosenthal & Jacobson, 1968).

The impact of the self-fulfilling prophecy, since replicated in numerous studies (Logan & Rose, 2005; Rosenthal, 2002), has several key aspects. Grimes (2005, p. 2) has summarized that the Pygmalion effect contains four key principles: 1. We form certain expectations of people or events, 2. We communicate those expectations with various cues, 3. People tend to respond to these cues by adjusting their behaviors to match and 4. The result is that the original expectation becomes true.

These principles serve as a map, which identifies key markers on the journey towards a self-fulfilling prophecy. Current literature looks to explore how this journey is taken by an individual and by a group. In their study of pain pre-surgical expectation and post surgical pain experience, Logan and Rose (2005) found a high correlation to support a self-fulfilling prophecy of pain. On an individual level, one's perceptions of an end state play a significant role in one's end state. At the group level, Edwards, (2001) explores how the Federal Bureau of Investigations was involved in a self-fulfilling prophecy of escalating commitment in their attempt to respond to an organizational crisis.

Galatea Effect

A similar phenomenon has been noticed and well documented in the business sector and management field (Eden, 1990). As a corollary to the Pygmalion effect, which is focused on the effect one's preconceived notion of others, management practices have become increasingly attentive to the Galatea effect which is focused on the impact one's self perception has on their own performance (McNatt & Judge, 2004). In their conformational study of the impact of self efficacy on volunteerism, Eden & Kinnar (1991) found support for the Galatea effect as they confirmed that there was a "...boost in performance caused by raising workers self expectations (p. 770)."

When applied in concert, the Pygmalion effect and the Galatea effect can produce a significant impact in outcome and performance (Chen & Klimoski, 2003). Building on the Eden's prior research, Chen and Klimoski were able to study and support the notion that organization structure, which promotes a clear message of expectation to its participants, will realize the impact of self-fulfilling prophecy in the form of performance. In the context of this paper, this theoretical position indicates that if teachers and students have a common expectation of performance (inclusive behavior) then the students will act out the expected performance indicator. In other words, if the teacher and the peers mutually expect one another to be accepting of another student who has a disability, then that student is more likely to feel and be accepted.

Self-fulfilling Prophecy is not without its detractors. In a mixed review, Madon, Guyll and Spoth (2004) found that children had a stronger impact on self-fulfilling prophecy than adults. In their study, parents and children were each measured in pre-testing situations regarding their expectations of warmth (bonding) and hostility with their family member. The

set was observed during a dyadic videotape intervention to assess actual hostility and warmth exhibited by the parent child set. Their path analysis indicates that the child's erroneous preconceived beliefs regarding hostility manifest into more hostile interactions. The fact that there was no relationship with erroneous preconceived beliefs regarding warmth behaviors from child to mother along with the lack of relationship on either hostile or warmth behaviors from mother to child may indicate the power of negative thought or may cast doubt on the validity of the impact of the self-fulfilling prophecy.

The Galatea effect is predicated upon self-report which has been notoriously implicated as a problematic method of data collection (Logan & Rose, 2005; Jussim, et.al. 2005). A key point of dissension to the self-fulfilling prophecy is the notion that "...the mind typically reflects rather than produces social reality (Jussim, et.al. 2005, p. 85)." This serves as a pivotal issue, which would nullify Merton's (1948) original thought that an erroneous belief leads to (or produces) its own fulfillment. Jussim, et.al. (2005) offer numerous meta-analytic studies which they present as disproving the impact of Self-fulfilling Prophecy. On the other hand, Rosenthal (2002) presents numerous meta-analytic studies in support of their original position. The ongoing debate over the self-fulfilling prophecy is likely.

Gliner and Morgan (2000) indicate that the focus of scientific inquiry, in support of a positivist approach, is to forward novel ideas in such a way as to allow for testing and replication in the pursuit of knowledge. In the context of this study, descriptive theories, such as Labeling theory and Self-fulfilling prophecy theory, offer clear indications that educational labels, such as disabilities, have potentially negative unintended consequences. The policy of inclusion, as addressed in the IDEIA, encourages structural changes, such as integrated and inclusive classroom settings, which could serve to mitigate the unintended consequences of labeling. If

this is the case, then following Gliner and Morgan's suggestion, a testable means of exploring this policy is essential to gaining in knowledge about the impact of inclusion. The next set of theories, the Theory of Reasoned Action and the Theory of Planned Behavior, offer a testable means of empirically evaluating the policy of inclusion.

Explanatory Theory

Theory of Reasoned Action

Any discussion of Aizen's (1989) Theory of Planned Behavior must begin with its predecessor, Fishbein and Aizen's Theory Reasoned Action presented in (1980). Prior to these theories, the social sciences, dating back to the late 1800's, studied the relationship between attitudes and behaviors. At that time, theories revolved around the notion that "...attitudes could explain human actions" (Aizen & Fishbein, 1980, p. 13). It was becoming clear, to Aizen & Fishbein, that there was a mediating variable, which stood between one's attitudes and one's actions. They postulated that the mediating variable that was most predictive of behavior was one's intent to act out the behavior. Operating under two key assumptions (Greenslade & White, 2005), first that human beings are rational and make systematic use of the information available to them and secondly that people consider the implications of their actions before they decide to engage or not engage in certain behaviors, Aizen & Fishbein (1980) fostered a new theory, the theory of reasoned action, regarding the relationship between attitudes and behavior.

Conceptually, the theory of reasoned action (Trost, Saunders & Ward, 2002) derives the intent to act as a component of two determinant constructs: one's attitude about the action and ones perception of normative views of the action (See figure 1). Attitude has been defined as

how one thinks and feels about conducting the action (Wu & Chen, 2005). Normative beliefs or subjective norms (Aizen, 1988), are identified as the respondents' perceptions of how they feel others view their commission or omission of the act (Millar & Shevlin, 2003). Essentially, subjective norms reflect the perceived social pressure to perform or not perform an activity. When combined, these two determinants drive the subjects' intent to act and the higher the intent to act then the higher the likelihood one will manifest the action (Greenslade & White, 2005).

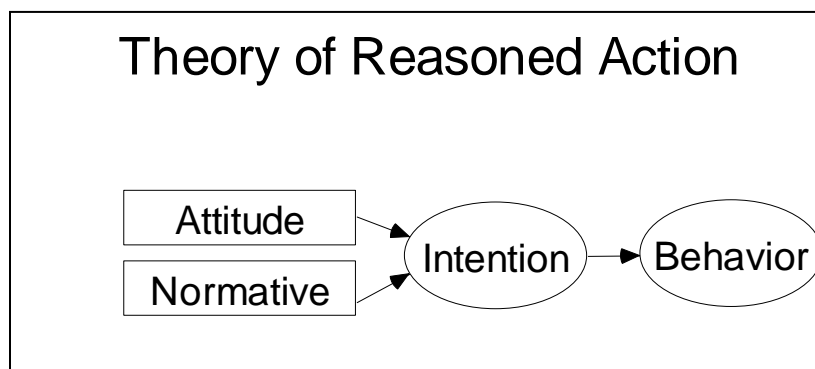


Figure 1. Theory of Reasoned Action; Aizen & Fishbein (1980)

The introduction of the construct of intent brought about a fundamental shift in the study of human behavior that placed a greater emphasis on the impact of external perceptions, via normative forces, on the intent to act and then the action itself.

Theory of Planned Behavior

In 1985, Aizen revisited the model as it became increasingly clear that a key variable was not included. Azjen (1988) postulated that, beyond the impact of attitude and normative influences, control beliefs, which are the beliefs one has that they have access and ability to carry out the behavior, must be considered in the prediction of behavior.

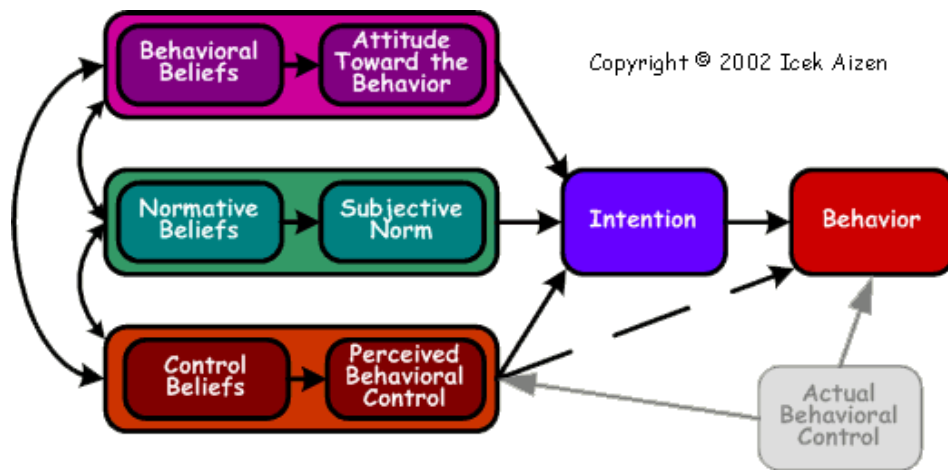


Figure 2. Theory of Planned Behavior

Found online at: <http://people.umass.edu/aizen/tpb.diag.htm>

Aizen (1991) argued that control beliefs could have an indirect affect on behavior via intentions as well as presenting a direct effect on behavior, or both. The revised theory, the theory of planned behavior (TPB), remains a viable and robust theoretical framework for numerous studies in the social sciences (Greenslade & White, 2005; Davis, Johnson, Cribbs, & Saunders, 2002).

Aizen's inclusion of the determinant perceived behavioral control has raised a great deal of debate (Kraft, Rise, Sutton & Roysamb, 2005). Much of the debate centers around the definition and measurement of the concept, not its relevance and inclusion in the model (Payne, Jones, & Harris, 2005; Greenslade, & White, 2005; Giles, McClenahan, Cairns & Mallet, 2004; Millar & Shevlin, 2003). The definitional issue is that perceived behavioral control is argued to be synonymous with Bandura's (1986) construct of self-efficacy (Terry & O'Leary, 1995; Giles, McClenahan, Cairns & Mallet, 2004) and that the notion of self-efficacy may be the most important determinant of one's intent to act (Armitage & Conner, 2001). This lead, as Kraft,

Rise, Sutton and Roysamb (2005) point out, to Aizen (2002) amending that perceived behavioral control was a combination of self-efficacy and controllability.

On one hand this appears to have ended the definitional issue of personal behavior control and on the other it has opened up a new debate on the dimensionality of the construct. Two constructs in the theory of planned behavior, attitude towards the behavior and perceived behavioral control, have fallen into debates that they represent multidimensional constructs and not the uni-dimensional constructs originally presented (Payne, Jones, & Harris, 2005; Aizen & Timko, 1986; Chan & Fishbein, 1993). Wan (2002) maintains that multidimensional latent constructs are unobservable and therefore must be subdivided into component indicators to serve as proxy measurements of the unobservable construct. The debate rages on as to what indicators truly represent Aizen's original theoretical constructs.

The determinant of attitude toward the behavior has been argued to contain two key constructs (Payne, Jones, & Harris, 2005). The first construct is an affective attitude, which reflects the enjoyment or pleasure associated with performance of the behavior. The second construct is the cognitive attitude that reflects one's perceived benefit from performing the behavior (Aizen & Timko, 1986; Chan & Fishbein, 1993).

Perceived behavioral control as a determinant in the theory of planned behavior, is also argued to be a reflection of multiple constructs (Kraft, Rise, Sutton and Roysamb, 2005; Trafimow, Sheeran, Conner, & Finlay, 2002). These multiple constructs address potential structural as well as reliability and validity issues when considered for model revision (Povey, Conner, Sparks, James, & Shepherd, 2000, Greenslade & White, 2005).

In most studies employing the theory of planned behavior, Kraft, Rise, Sutton and Roysamb (2005) indicate that, the measurement of perceived behavioral control (PBC) follows

Aizen and Maddens' (1986) initial uni-dimensional construct. Defining the construct in this way offers a straightforward definition of PBC, as 'a person's belief as to how easy or difficult performance of the behavior is likely to be'.

Numerous studies have indicated that the construct of PCB is not one concept but represents an amalgam of indicators that measure PCB. Table one offers a multi-dimensional representation of the construct, which Kraft, Rise, Sutton and Roysamb (2005) offer in their study of the dimensionality of perceived behavioral control.

Table 1- Proposed Multidimensional Theoretical Measurement of PBC;
(Kraft, Rise, Sutton & Roysamb, 2005)

<u>Concept</u>	<u>Definition</u>
PD	Perceived difficulty of the behavior
CON	How confident the actor is that they can perform the behavior (if they wanted to)
PC	Perceived control over behavioral performance
LOC	What appears to us to be a locus of control of the behavior

The decision to offer perceived behavior control as a unitary or multi-dimensional construct continues to be tested in ongoing studies. As result of the confounding nature of perceived behavior control, some researchers have decided to use the theory of reasoned action as opposed to theory of planned behavior. Millar & Shevlin (2003) opted to use the theory of reasoned action "... augmented by the addition of a 'past behavior' variable, as an explanatory model of career exploratory behavior in school pupils (p. 40)" and thus avoiding the pitfall of measuring PBC all together.

Despite the controversy, Aizen's TPB holds an important place in the current study of human behavior. With recent studies ranging from Wu & Chen's (2005) study of on-line tax compliance to Jones, Courneya, Fairey, and Mackey's (2005) study exploring the research question "Does the theory of planned behavior mediate the effects of an oncologist's recommendation to exercise in newly diagnosed breast cancer survivors?", it appears the theory of planned behavior has far reaching potential in addressing numerous social and public policy issues.

Discussion of Theoretical Framework

In the context of this study, the TPB will be implemented to empirically examine the policy of inclusion. The policy of including individuals with disabilities follows closely with the policies of racial integration in the late 1950's. In both instances, structural and organizational changes were introduced through federal mandate (Supreme Court Ruling: Brown vs. Board of Education, IDEIA, IDEIA, and Section 504 in the Rehabilitation Act) in an effort to increase integration and overtime reduce social tension and isolation and increase social intent to include. TPB offers empirical measurement of the subject's intent to act and therefore offers a plausible vehicle for an empirical test of the policy of inclusion.

Conceptually, several distinct yet interrelated theories offer *descriptive* guidance to this study. Labeling theories offer the position that the process of assigning labels for the ease of organizational categorization has negative unintended consequences for the individuals labeled (Kenney, 2002; Lester, 1994; Chen, 2002; Ashforth & Humphrey, 1997). When applied to the education system and the labels it applies to children with varying disabilities, this theory serves

as a reminder that labels serve to ostracize and marginalize children with disabilities as “them” and not “us”.

In the school of labeling theories, Braithewaite’s theory of shaming offers an insightful component to the impact of a label. Shame is used for social control and to remind the stakeholders of deviance (Hay, 2001). In this study, deviance is not seen as an abnormal behavior but moreover disability is a deviation from what is normally expected (Li & Moore, 2001). Reintegrative shame theory sheds light on the ways in which shame can be used to further division or bridge the gap of differences. As stated earlier, the IDEIA calls for a “reintegrative” process by which the child with disabilities is included or brought back into society, yet there appears to be a disconnect between this policy expectation and current practice. The use of disintegrative ceremonies such as home schooling, self-contained schools and self-contained classrooms, indicates that the educational system, at times, tends to stigmatize and outcast students with disabilities (Kagan, 1990). In contrast, this study looks to assess the effect reintegrative ceremonies such as full inclusion, partial inclusion, and peer education have on the intentions of non-disabled children to include children with disabilities.

Self-fulfilling prophecy theory, with roots in the evaluation of labeled children in the classroom, offers a significant insight into the directionality of labeling theories (Smith, Osborne, Crim, & Rhu, 1986). With numerous empirical studies of the Pygmalion effect and the Galatea effect, it is clear that once these disability labels are applied they will affect the outcome of the child’s school experience (Logan & Rose, 2005; Rosenthal, 2002). When public policy, such as full inclusion, partial inclusion, and peer education, serves as a means of correcting misconceived negative opinions, there is a potential to channel the power of self-fulfilling prophecy theory to accomplish policy objectives.

Once the historical and descriptive elements of the policy of inclusion are clearly identified, this study then moves on to identify a theoretically informed means of testing the impact of this policy. This task will be accomplished through the use of the final theoretical component, Aizen's Theory of Planned Behavior (TPB). Though some aspects of the theory are hotly debated, TPB offers a good fit to the empirical study inclusion. Specifically, the theory brings a higher level of analysis to the issue of behavior by looking beyond the earlier notion that attitudes alone could explain actions (Aizen & Fishbein, 1980).

Labeling theories and the self fulfilling prophecy theories address key elements which impact the development of perceptions and attitudes. They lend considerable insight into the systemic structures, which perpetuate and could arguably aid in the removal of damaging stereotypes attributed to disability labels. TPB indicates that intent to act is closely aligned with acting. In this way, a person's intent to include a person with a disability serves as a validation of the impact of the policy of inclusion.

CHAPTER THREE LITERATURE REVIEW

The focus of this literature review is to illuminate the “policy of inclusion” through the vast body of literature on the topic. The education literature is steeped in best practice studies, which explore key elements of inclusion with the aim of providing an evidence-based approach to public education.

The specialization of public education, in the form of a dual system division of general education and special education, began at the turn of the century nineteenth (Rocheleau, 2003). Prior to this time, children were educated in “one room” schoolhouses that demanded that children of different ages and abilities work with each other to promote the education and social goals of learning. The specialization of education built on the strength of efficiency modeling (Cuban, 1996). Prior to these efficiency concerns, the “one room” classroom was centered more on group progress and less on individual progress (Rocheleau, 2003). Arguably, this inclusive practice assured that all students were included despite their age or ability and serves as the historical foundation of the ongoing controversial inclusive education movement for students with disabilities (SWD).

Movement towards inclusion is an ongoing and highly relevant movement in current public education efforts (Halverson and Neary, 2001). Astuto, Clark, Read, McGree & Fernandez (1994) report that this educational movement persists despite continuous declines in education budgets compounded by a seemingly continuous increase in the diversity of needs found in their student bodies. In light of the movement towards more inclusive classroom settings, Astuto, et. al. (1994) indicates that the struggle for equity of access and excellence of service remains one of the most challenging issues for today’s educators and policy makers.

Currently, public education has turned to a specialized “continuum of services” in which students receive their education in settings that are tailored to their individual needs (McGregor & Vogelsberg, 2000). Two primary divisions exist in education (Halvorsen & Neary, 2001). One category falls into general education, in which the majority of students are served. The other category is special education or as the state of Florida classifies it, Exceptional Student Education (ESE), which is designed to service the students who fall outside the bounds of general education. These students, many of whom have specific Individualized Education Plans (IEP) to clarify their particular area of need, find their education through out a diverse continuum of educational services.

Continuum of Services

This study looks at specialization in the context of a continuum, which is tailored to address the needs of students with and without disabilities. When seen as a progression of academic and behavioral interventions, Reschly (2005) argues for at least four levels. On one end is general education while special education is at the other. In between these two levels, Reschly argues for additional interventions, which address small groups and individual level needs. This concept of a multi-tiered continuum is hotly debated. In the context of SWD, Cuban (1996) framed the debate in terms to two axes. He indicates that the movement to educate SWD can take on the form of either *incremental change* (in the form of a continuum) or *fundamental change* (in the form of an educational restructuring). The latter would serve to make full inclusion the rule and not the exception where as the continuum places inclusion in the context of many other tiers of service delivery options. McGregor & Vogelsberg (2000) echo this sentiment as they argue for a delivery of (ESE) supports “...to all students with disabilities in a

manner that begins with the assumption of regular class placement... (p.7)". This would serve as a fundamental restructuring of the current educational system.

In the discussion of classroom inclusion, Lipsky and Gardner (1996) offer a concise definition of inclusion. They indicate that:

Inclusion is the provision of services to (SWD), including those with severe impairments, in the neighborhood school, in age-appropriate general education classes, with the necessary support services and supplemental aids (for the child and the teacher) both to assure the child's success – academic, behavioral and social – and to prepare the child to participate as a full and contributing member of society (p.763).

In its April 2005 brief entitled Inclusion, the state of Florida adopts the National Center on Educational Restructuring and Inclusion (NCERI) 1995 definition of inclusion as justification for its continuum.

Providing to all students, including those with significant disabilities, equitable opportunities to receive effective educational services, with the needed supplementary aids and support services, in age appropriate classrooms in their neighborhood schools, in order to prepare students for productive lives as full members of society. (p.99)

Noticeably missing the NCERI definition is the concept of an "age appropriate general education setting" as described by Lipsky and Gardner. Following the direction of their definition, educational reform would resemble a radical departure from current practice and would most closely resemble the fundamental changes indicated by Cuban and McGregor & Vogelsberg.

Bateman (2005) takes the opportunity to map the historical transition of the continuum in the context of a theatrical play. She identifies that much of the past drama will be subsumed in the drama to come. She argues that the policy of inclusion is a process, which is ever evolving as time and technology push the boundaries of educating SWD. She argues that the current No Child Left Behind initiative of the current administration as another act in the play in which the

movement towards inclusion comes full circle to again embrace specialized education in segregated classrooms.

The concept of a “continuum” offers an incremental change approach to the education of SWD. A continuum offers the prospect of a range of acceptable services. Florida Statute states that a “continuum of alternative exceptional education placements shall be available.” (Section 230.22(2)(1)F.S.). Kauffman, Landrum, Mock, Sayeski, and Sayeski (2005) offer a clear synopsis of the argument to maintain the dual system of general education and special education.

They present:

Teaching all children well requires that they be grouped homogeneously for instruction. Instruction must not be secondary to placement in special education. The ideology of full inclusion works against good instruction in some cases. The ultimate test of special education should be whether a particular student is receiving good instruction that matches his or her needs, not the student's placement (p.2).

On the other hand, Dixson (2005) presents an argument that this practice of a homogeneously dual system serves not only to segregate but to stand in opposition to the “melting pot” concept which served to frame the development of the United States. She argues that the underlying reason for choosing between a dual system or an inclusive system is... “a philosophical one, having to do with what it means to be human and to belong in a civilized society (p.33).”

An inclusive school places a high value on belonging, acceptance and support in the provision of educational needs (Stainback & Stainback, 1990). In this way, school practices that foster communities of support and that ensure that all services necessary to meet goals are provided could arguably be considered an inclusive school practices in the context of a continuum. Detractors argue that this notion of a continuum and least restrictive environment (LRE) is inherently and ethically flawed.

Lipsky (2005) offers a historical review of the journey along the continuum and asks the age-old question, “Are we there yet?” Her analysis of thirty years of efforts toward inclusion demonstrates some progress on the issue of free and appropriate public education (FAPE) access, achievement of quality academic practices, as well as behavioral and social outcomes yet when it comes to providing a “unitary inclusive education system” she states clearly that the system has a long way to go. Taylor (1988) offered a compelling attack of the LRE provision. He traced the origins of the LRE provision through legal and professional writings and defines the principle of LRE in this way:

Services for people with developmental disabilities should be designed according to a range of program options varying in terms of restrictiveness, normalization, independence and integration with a presumption in favor of environments that are least restrictive and most normalized, independent and integrated (p.17).

To refute the LRE policy position, Taylor compiles a list of seven philosophical and ethical arguments that challenge the legitimacy of a policy based upon LRE (p. 17-20).

1. The LRE principle legitimates restrictive environments.
2. The LRE principle confuses segregation and integration on the one hand with intensity of services on the other.
3. The LRE principle is based on a “readiness model.”
4. The LRE principle supports the primacy of professional decision-making.
5. The LRE principle sanctions infringements on people’s rights.
6. The LRE principle implies that people must move as they develop and change.
7. The LRE principle directs attention to physical settings rather than to the services and the people needed to be integrated into the community.

Taylor provides an extensive defense of each of these positions. Preceding Taylor’s critique of LRE, Turnbull (1981, p.17) argued that the LRE provision does not address service provision as an issue of *whether* SWD should be restricted but to *what extent* they should be restricted. Bruininks and Larkin (1985, p. 12) similarly argued that the LRE serves as normalization of the “maximum feasible integration” and not the maximum of integration.

Despite the controversy, many states follow the wording of the IDEIA in crafting their states “continuum of services”. In support of this position, the IDEIA does not specifically use the word “inclusion” and it is this omission that serves as the legal basis for the creation and implementation of the continuum. The state of Florida defines its continuum through the Florida Statutes.

“Special classes, separate schooling, or other removal of exceptional education students from regular classes shall occur only when the nature or severity of the handicap cannot be satisfactorily accommodated with supplementary aids and services in the regular classroom.” (Section 230.22(2) (2) F.S.)

The state of Florida indicates that it is the goal of this continuum to find the most appropriate regular classroom placement, which would foster academic, behavioral and social development. To this end, McGregor & Vogelsberg (2000) indicate that the best practices of education for SWD serve to connect students to knowledge and help them to think creatively in their problem solving. The learner-centered practices indicated in the study by Kohn (1996) facilitate social and academic development. In this article, numerous characteristics are presented to promote a learner-centered environment. These characteristics, ranging from the comfort of chairs set around tables rather than desks in straight line to the respectful, empathetic and genuine tone of the educators’ voice, which can instill a classroom culture of support and integration for SWD.

Stakeholders

The state of Florida and the IDEIA present the notion of a continuum as a means of meeting the needs of all students on the basis of individual need. This concept is presented in intentionally vague language, which allows each school district to refine their services to the specific needs of each SWD through the vehicle of an Individualized Education Plan (IEP). This

IEP serves as a working contract or blueprint, which outlines the stakeholders' tasks in providing FAPE.

The literature is well defined in terms of which parties constitute the primary stakeholders in the education of SWD (McGregor & Vogelsberg, 2000). Specifically, *families*, *educators* (teachers and administrators), and *students* (both with and without disabilities) make up a clear network of actors who each play a vital role in the implementation and maintenance of an IEP. These actors have varying influence on the implementation of an IEP.

Parents

Since its official inception 1975, the IDEA and its "policy of inclusion" has drawn a significant amount of attention in the literature. In exploring the stakeholders' position on inclusion over time, the literature paints a mixed view of the policy. One stakeholder group, which offers significant insight into inclusion, are the parents of the children involved. Parents of children with and without disabilities have reported strong feelings on the issue. Lindsay and Dockrell (2004) explored this issue with parents of children with specific speech and language difficulties in the United Kingdom. Using a mixed-methods approach (standardized self report surveys and interviews) they collected data on 66 parents who either had children attending special schools (n=21) or children attending mainstream classroom experiences (n= 45).

Their study found significant differences between the two groups of parents. Specifically, parents of students in mainstreamed classes reported higher levels of concern regarding their child's placement as well as feelings of being poorly informed about choices of placement in relation to the amount of support that children in a mainstream education receive. This study offers clear warnings that the movement toward a system of total inclusive schooling might

remove the right of choice from parents who seek special education for their children. Despite these seemingly negative reviews, Lindsay and Dockrell (2004) indicate that the majority of parents whose children were mainstreamed wanted their children to continue in mainstream classrooms as long as adequate supports can be assured. A study conducted by Peck, Staub, Gallucci, and Schwartz (2004) explored the issue of inclusion with 389 parents of the non-disabled children who were placed in inclusion class with children with severe disabilities. The study found that the overwhelming majority of parents reported that their children benefited from the experience. The minority of negative views cited the reduction in educator time with non-disabled students as teachers “had to” attend to SWD, as the chief source of negative perception.

In the mid 1980’s, several researchers concluded that these two groups of parents, though different in their personal stake in inclusion, had report similarly high levels of support for inclusion (Reichert, Lynch, Anderson, Svobodny, DiCola & Mercury, 1989; Turnbull & Winton, 1983; Turnbull, Winton, Blacher & Salkind, 1982). More recently, Ryndak, Downing, Morrison & Williams (1996) found that parents of severely children with severe disabilities held high levels of optimism about the benefits of inclusion and similar results were found with parents of mildly children with mild disabilities in a study conducted by Lowenbraun, Madge and Affleck (1990).

Educators

Educators play a crucial role in the daily administration of inclusive practices. In 1996, Sruggs and Mastropieri explored the concept of inclusion through a synthesis of the research dating back to 1958. Their review indicates that nearly two-thirds of educators (n=10,560) surveyed over this time indicate that they are favorably disposed to the notion of inclusion.

Giangreco and Broer expressed similar findings in the 2005 study in which quantitative data from school personnel and parents (n=737) that support the education of students with a full range of disabilities.

This view was supported by Villa, Thousand, Meyers & Nevin (1996) when they explored the issue of inclusion with educators and administrators who had experience with inclusive practices (n=680). Another study of educators, conducted by Hamre-Nietupski, Hendrickson, Nietupski & Shokohi-Yekta (1994) in Florida, Iowa and Nebraska, indicates that educators felt clearly that the adults involved in education have a duty to facilitate the connection between students with and without disability.

Boscardin (2005) explored the issue of inclusion with the administrators in school systems. This article discussed two ways in which administrators facilitated the development, adoption, use, and evaluation of evidence-based educational interventions within secondary schools. Boscardin states that on one hand, administrators could transform from a “manager” to an “instructional leader”. On the other hand, administrators could offer leadership in the form of “strategies for improving the instructional practices of teachers and the educational outcomes of students with disabilities (p.21)”. This article offers a clear “how to” representation of how the system could attempt to address the educational reformation issue from the top down.

Students

The policy of inclusion is based on the IDEIA that promotes the notion that a diverse mixture of students (with and without disability) will yield benefits for all students through increased exposure and experience (Halvorsen & Neary, 2001). The perspectives of students involved serves as a key element to evaluate and monitor the impact of inclusion. Early studies

of preschool children in integrated settings indicate that physical integration and adult intervention lead to high levels of interaction between students with and without disability (Ballard, Corman, Gottlieb & Kaufman, 1978). York, Vandercook, Macdonald, Heise-Neff & Caughey (1992) found similar results in their exploration into middle and high school children. Their study found that ongoing contact with like aged peers resulted in typically developing children indicating positive attitudes towards their peers with a disability.

Pudlas (2004) took an interesting look at the issue of student stakeholder perceptions of inclusion. His study looked at students with and without disabilities in both public and private school setting and their perceptions of inclusion. Through survey methodology, he explored a sample of 86 students (n=44 with n=42 without disabilities) drawn from public (n=63) private (n=23) schools and found that the majority of students expressed positive perceptions of inclusion across the group variation and the school setting of public versus private.

Using Aizen's Theory of Planned Behavior, Roberts and Smith (1999) studied the intent of non-disabled peers to interact with their peers with disabilities. Their study of children (n=188), aged eight to twelve, looked to quantitatively assess the impact of inclusion on students without disabilities. Their results indicate that the children who indicated high positive attitudes towards children with disabilities were highly correlated with actual efforts by those students to interact with their peers with disabilities.

In a qualitative study, Crowley (1993) interviewed six students with behavioral disabilities educated in a regular education setting. These students indicated that the educators' attempts to involve them in the classroom culture served to engender a sense of inclusion. There is also evidence that students with disabilities have expressed that these efforts to create an integrated culture are not always successful. As a result, some studies have indicated that

children with disabilities would rather remain in segregated settings than risk the potential discomfort of rejection and ridicule at the hands of their non-disabled peers (Jenkins, Heinen, 1989; Tymitz-Wolf, 1984).

Service Delivery Models

Despite the potential negative impacts of a policy of inclusion, the education system is pushing towards increasing efforts at integration on the basis of disability. There is an extensive body of educational literature on the topic of creating changes to support the individualized needs of its students. These changes ranged from educator level changes and structural classroom level designs to address classmate composition with regard to the mix of students with and without disabilities (McGregor & Vogelsberg, 2000; Choate, 1993; Edwards, 1980). These changes mark a move from the old system, of solely segregating children on the basis of their disability, to the new system which identifies the individual students' strengths and weaknesses in an effort to form a plan to meet their specific needs (Halvorsen & Neary, 2001).

Classroom Level Intervention

In an effort to bridge to the new system of individualized education, three models have been addressed in the literature as best practice efforts to promote a successful transition from the perspective of educators. Friend (1988) writes about the *consulting teacher model* which pairs general education teachers and special education teachers in a mentor relationship to facilitate knowledge exchange. In response to this "expert" model, Idol, Nevin & Paolucci-Whitcomb (1994) write about the *collaborative consultation model*, which presents a more equitable relationship to exchange information between the general educator and the special

educator. Taking this relationship one step farther, Pugach and Wesson (1995) present the *co-teaching model*, which stresses the “implementation of jointly planned approaches (McGregor & Vogelsberg, 2000, p. 43)”. This model stresses the need for both planning and implementation of education from both disciplines.

In the context of inclusive classrooms, Janney and Snell (1996) utilized qualitative methods to study elementary educators and their strategies for promoting interactions with their students (with and without disability). Their research indicates that successful practices for improved interaction stem from the creation of new rules regarding helping, reinforcing the notion that students are more similar than different, ensuring the age appropriateness of activity and by knowing when to give students space to process their environment. Offering co-teaching models can promote the implementation and planning of research guided principles such as these.

The changes to educator styles and changes to classroom composition encompass the concept of service delivery models (Schnorr, 1990), which constitute the incremental changes found on the continuum. The concept of a continuum, as previously discussed, is left intentionally nonspecific to allow for individualized interpretation to match need with service. The next section of this literature review will look to explore some of the service delivery models and how they have demonstrated empirical effectiveness.

Student Level Intervention

Specifically, this study will look at three services along this continuum, which have been demonstrated through the literature to have an impact on the various stakeholders involved in inclusion. The literature discusses *peer education programs* (which serve to educate children

with and without disabilities in an effort to build awareness of similarity and difference as well as instill knowledge about skills needed to improve social interactions), *peer support programs* (in which typically developing children are provided with formalized processes to promote interaction with children with disabilities for specified periods of the school time) and *inclusion* (in which children with disabilities are physically placed in the same general education classroom as their typically developing children for specified periods of time) as models along the continuum. This study looks to explore how these service delivery models impact the typically developing peers as just one of the stakeholders in the inclusion system.

Peer Education

Pearl (2004) offers a vivid picture of a cooperative learning experience in which SWD served as the instructors for nondisabled fourth grade peers. She outlines a program, which was designed to reduce the knowledge gap about the meaning of ESE programs and to lessen the stigma that these labels caused. Specifically she outlines that the intervention goals of the "SLD, What's That?" workshop were:

1. To develop self-awareness and self-advocacy skills in students with SLD.
2. To increase awareness, knowledge, and understanding of SLD.
3. To increase positive peer perceptions of students with SLD.

Pearl found that this peer education model served to educate both students with and without disabilities. Another example of the power of peer education can be found in Salend (2005) study in which he traces the experiences of teachers (Ms. Miller and Ms. Tarik) who use technology to educate their students (both with and without disabilities) about individual differences. This article offers positive support for the benefits of peer education while it also

provides guidelines, strategies, and resources for using technology to teach students about individual differences related to disabilities.

Peer education programs have been used in numerous settings to improve the system of educational service delivery. Brady, Shores, Gunter McEvoy, Fox and White (1984) studied the impact of teaching peers without disabilities the skills they would need for social initiation and interaction with children with disabilities. Their positive results serve as a further validation of the modality. Similar results were found when Gresham (1981) studied students with disabilities and the impact of a program which taught social skills. These two studies illustrate a form of instruction, which allows both sets of students to interact more effectively with each other. This effective interaction is one of the goals of a policy of inclusion.

Fisher, Pumpian and Sax (1998) looked at the impact of a peer education program on the attitudes of high school aged peers of SWD. Their study (n=1413) compared students from an inclusive high school and a traditional high school to compare their attitudes toward peers with disabilities. Their survey methodology revealed that contact with SWD had a profoundly positive effect on their responses. In addition, a study by Trent (1993) found that students involved in a disability awareness campaign were more knowledgeable about SWD than peers who were not involved in the training. Clearly education alone is not sufficient to meet the goals of the policy of inclusion (Hannah & Midlarsky, 1983) but this service does serve as a progressive movement along the controversial continuum.

Peer Support

One way to augment the impact of the continuum is to partner classroom integration efforts with interventions that facilitate the interaction of students with and without disabilities.

The interventions offer a means of supportive peer involvement through cooperative learning and group projects. Barnitt, DiVincent, Frick and Ramsey-Wood (2005) indicate that the function of a peer support program is to "...match students with disabilities with peers who assist them during instructional and noninstructional activities (p.7)."

Recent studies into the effectiveness of peer support programs offers a positive view of their contribution to the continuum of services for SWD. D'Allura (2002) conducted a longitudinal study of preschool students (n=13) involved in a peer support program. Her study found that the program improved the manner and frequency in which students' with visual impairments related to their environment. Barnitt, DiVincent, Frick and Ramsey-Wood (2005) and Hardin and Hardin (2002) offer clear accounts for the potential benefits to all parties involved in a peer support program. Specifically, they indicate that SWD received extra attention and feedback to aid in their learning while their peers receive the opportunity to learn through diversity and exposure.

Kamps, Kravits, Gonzalez Lopez, Kemmerer, Potucek, and Harrell (1998) conducted a five-year study of students with (n=38) and without disabilities (n=203) involved in a peer support program. Their study indicated that SWD generally reflected positive comments regarding learning activities as well as improved social interaction and play skills. Similarly, their peers reflected positively that they gained "personal interest and general satisfaction" through participation in the program.

Johnson and Johnson (1981) found that cooperative learning scenarios, such as peer support programs, served as a positive experience for increasing peer interaction. Strong empirical support for the impact of peer modeling and peer tutoring has been demonstrated in several studies (Haring, 1991; Damon, 1984). Kishi and Meyer (1994) used a mixed methods

approach of survey (n=183) and interview (n=93) to study the impact of peer support programs on high school student over time. Their study indicates that the programs yielded positive attitudes, high levels of ongoing contact and more support for full community participation as a result of early social contact with SWD.

Voeltz's validation of the "Special Friends" program of supported social play between students with and without disabilities provided a key contribution to the study of inclusion in the early eighties. Her studies in 1980 and 1982 produced confirmation that students with and without disabilities benefit from inclusion models, which also provide interaction interventions such as peer supports. Voeltz (1980) initially studied four groups of non-disabled children in elementary education. They were divided into a group of children with *no exposure* to children with disabilities, a group of students with *one month* of inclusion exposure to children with severe disabilities, a group of students with *one year* of inclusion exposure to children with severe disabilities and finally a random sample of an intervention group of *reverse mainstreamed* children involved in the peer support program entitled "Special Friends" (n=2,626). She concluded that contact with student lead to higher levels of accepting attitudes towards peers.

In 1982, she expanded on this study with a longitudinal assessment of the "Special Friends" program, which offered contact between typically developing peers and students with severe disabilities. In this study she again found that students with exposure to SWD had higher attitudes of acceptance. Similar studies of peer support programs such as peer tutoring (Jakuupcak, 1993) and "peer buddies" (Villa & Thousand, 1992) support Voeltz's findings that this service delivery model holds strong promise in coupling integration efforts with interaction effort in the move towards inclusion.

Inclusion

Inclusion models serve as the most discussed service delivery model identified in this study. Integrated placement may increase attitudes of acceptance, but the literature also indicates that placement alone does not yield an increase in interaction between these two groups of peers (Brinker & Thorpe, 1986; Fryxell & Kennedy, 1995; Kennedy, Shulka & Fryxell, 1997). Adult interventions, described extensively in Halvorsen and Neary (2001) and Jolly, Text and Spooner (1993), provide numerous strategies for educators and peers to promote interaction which can lead to increases in behavioral, social and academic growth.

Empirical studies of inclusion help to clarify its relative impact on students. Using the vehicle of the IEP, Hunt, Farron-Davis, Beckstead, Curtis and Goetz (1994) employed a content analysis and found that students in inclusive settings had higher quality IEP's than comparable students served in self-contained classrooms. In addition, they reported that these same students experienced more favorable outcomes in the context of level of engagement, involvement in integrated activities, affect and social interactions in their inclusive classroom setting.

In a program evaluation, Schwartz, Sandall, McBride, and Boulware (2004) outline the impact of the inclusive school program, Project DATA (Developmentally Appropriate Treatment for Autism). In their analysis of the programs impact, the authors employed a pre-post test measurement model indicated positive reports of preschool children with autism (n=48) in terms of their progress in academic, social and behavioral measures.

Children without disabilities also prosper from an inclusive setting with SWD. Much to the disagreement of numerous inclusion detractors, studies by Hollywood, Salisbury, Rainforth and Palombaro (1995) and McDonnell, Thorson, Mcquivey and Kiefer-Odonnell (1997) refuted the notion that inclusion models serve as a system which siphons time away from the non-

disabled child as the educators' time and resources are spent increasingly on SWD. With time equally allocated to student with and without disabilities, students in each group demonstrated consistent gains in their academic goals (Dugan, Kamps, Leonard, Watkins, Reinberger & Stackhaus, 1995; Hunt et al. 1994).

Students without disabilities also report nonacademic benefits from inclusion models. Using survey research methods, Kishi and Meyers (1994) found that these students indicated improvements in self-concept, social learning and a reduction of the fear of human differences. These authors found that these gains persisted far beyond the time these students spent in an inclusive classroom setting.

One of the issues that currently creep into any discussion of inclusion is the intensity of the intervention. In the state of Florida, inclusion is seen on a range from full to partial inclusion. This distinction is made on the basis of the number of minutes a child spend in a regular education classroom. Specifically, the state of Florida defines inclusion as either *full inclusion* (the SWD spends 79% or more of their day in a general education classroom (GEC)) or *partial inclusion* (the SWD spends 78% or less of their day in a GEC).

According to the Florida DOE and its state performance plan, there are numerous indicators with measurable and rigorous targets, which are intended to drive the education system in pursuit of its goals. One clear goal indicated is the drive to increase the rates of full inclusion by increasing the state percentage of students with I.E.P.'s from a baseline of 49.8% in 2004-2005 to 52.8% in 2005-2006 and to 61.8% in 2010-2011 (Florida DOE). These figures offer a clear set of performance indicators to guide this states plan to integrate its SWD.

The presence of SWD in a general education classroom provides an experience that carries over to many facets of a diverse life outside of the classroom. Qualitative interviews

conducted by York and Tunidor (1995) indicated that the peers without disabilities demonstrated desires to extend their interactions with SWD far beyond the scope asked of them by their educators. This concept of equality and fairness in acceptance was found to exist even in children as young as five years old. In their study of kindergarten students, Evans, Salisbry, Palombaro and Goldberg (1994) found that the social justice concepts of equal treatment and integration that these students espoused were likely due in large part to their exposure to diversity.

The debate over inclusion policy involves a multifaceted issue of administration, implementation philosophy and ethics, which has polarized the educational community. In discussion of the movement towards inclusion, Pugach (1995) encapsulates the debate this way:

Without question, more does have to change if inclusion is the goal, and the changes required are greater, and more fundamental, than ever before. So while debates over the appropriateness of inclusion as special education policy continuous to be rancorous, these are not really debates about the merits of inclusion as a basic philosophy or ethical stance. Rather, they are debates over the degree of optimism various stakeholders have regarding the capacity for the educational system – which includes special and general education alike – to recreate itself with inclusion as a basic premise and achievement as a tangible goal (p 212-213).

As a result of this debate, ongoing research should focus on the various stakeholders to assess their levels of “optimism” as states proceed with their plans for inclusion. It is the goal of this study to add to this expansive body of literature by exploring the views of non-disabled peers and their intentions to include their peers with disabilities. This intention to include, serving as a proxy for actual inclusive behavior, offers one way in which research designs can assess the effectiveness of the policy of inclusion.

CHAPTER FOUR METHODOLOGY

The proposed methodology for this study will employ an exploratory analysis of the perceptions of non-disabled fourth and fifth grade students as they consider their relationship to peers with disabilities. These perceptions will be assessed across four levels of a continuum of service delivery models as discussed in the literature. The *unit of analysis* for this study will be the individual students and their reported perceptions.

The literature on elementary education offers several key constructs. The literature identified three key stakeholders (families, educators and students) in the implementation of inclusive education (McGregor & Vogelsberg, 2000). In addition, it outlines that a continuum of educational options (Halverson & Neary, 2001) must be available to educate students with disabilities (SWD). The continuum is not clearly defined in the state of Florida. As a result, this study will use the guidance of literature, which offers three specific interventions along four levels of service delivery options. These variations serve as specific service delivery models to aid in the education of SWD, and will frame the levels of the intervention for this study.

Study Variables

This study will be conducted as a cross sectional view of four service delivery models along the continuum from the perspective of non-disabled students, which comprise a key stakeholder in the process of inclusion. An extensive literature review, presented in Chapter 2, offers a clear direction for the dependent and independent variables included in this study. As such, the study dependent variable of *intent to include* (Table 2) will be assessed in relation to the impact of the independent variable the various *levels of service delivery* and *the complexity of*

that intervention (Table 3). The literature was less robust in the description of contextual variables which impact inclusion. Drawing on the education literature about what impacts students learning and socialization in the classroom (Halvorsen & Neary, 2001; Villa & Thousand, 1992), a list of contextual variables was identified and adapted to this study. To that end, control variables (Table 4), such as *stakeholder perceptions* (teacher and parent attitudes towards individuals with disabilities), *individual characteristics* (gender, age, grade level and a students' prior experience with individuals with disabilities) and *school level characteristics* (such as racial demographics and the percentage of economically disadvantaged students) will also be factored into the model.

Table 2- Definitions of Study Variables – Dependent Variables

Variable	Description	Type	Values	Units
DEPENDENT VARIABLES				
Attitudes (A)	How one thinks / feels about an issue. (Ten Items)	Interval	1-4 Range from 4 to 40	YES! -1 yes- 2 no- 3 NO! - 4
Normative Beliefs (NB)	How one thinks / feels that those important to them think / feel about an issue. (Four Items)	Interval	1-5 Range from 4 to 20	In my group- 1 Another group- 2 In no group – 3 Outside of Class – 4 At Home - 5
Perceived Control Beliefs (PCB)	How one thinks / feels about their level of control over their involvement / participation in an issue. (Ten Items)	Interval	1-4 Range from 4 to 40	HARD! - 1 hard- 2 easy- 3 EASY! - 4
Intent to Include	Combined scores of A, NB and PCB	Interval	Range from 12 -100	N/A

Table 3- Definitions of Study Variables – Independent Variables

Variable	Description	Type	Values	Units
INDEPENDENT VARIABLES				Coded
Full Inclusion	SWD are placed in regular education classrooms for nearly 80% of their school day.	Interval	1-5	1
Partial Inclusion	SWD are placed in regular education classrooms for less than 80% of their school day.	Interval	1-5	2
Peer Education	A group of non-disabled children who receive disability awareness training.	Interval	1-5	3
No Intervention (Control Group)	There is no effort to address inclusion with the non-disabled children.	Interval	1-5	4
Interaction	The use of a structured educational intervention designed to promote peer interaction with SWD	Interval	1-5	Number of minutes spent on this education intervention

Table 4- Definitions of Study Variables – Control Variables

Variable	Description	Type	Values	Units
CONTROL VARIABLES				
Teacher Perceptions	Teacher’s attitude towards individuals with disabilities (Ten Items)	Interval	-3 to +3 Range from -30 to +30	+3: I agree very much TO -3: I disagree very much
Parent Perceptions	Parent’s attitude towards individuals with disabilities (Ten Items)	Interval	-3 to +3 Range from -30 to +30	+3: I agree very much TO -3: I disagree very much
Age	Students self reported age	Ratio	0 to 11	Years of age as reported
Gender	Students self reported gender	Nominal	1 or 2	Male- 1 Female- 2
Race	Students self reported race	Nominal	1 - 5	Caucasian – 1 African American – 2 Hispanic- 3 Asian American – 4 Other not identified - 5
Grade level	Students self reported grade level	Ratio	3 to 5	Grade level as reported
Prior Experience	Students’ prior experience with individuals with disabilities	Nominal	1 or 2	Yes- 1 No- 2
Economic Indicator	% of students in the school defined as “Economically Disadvantaged”	Ratio	Percent	Secondary data collected from Florida DOE
Racial Mix	School reported racial demographic	Ratio	Percent	Secondary data collected from Florida DOE
Gender Mix	School reported gender demographic	Ratio	Percent	Secondary data collected from Florida DOE
% SWD	% of students in the school defined as disabled	Ratio	Percent	Secondary data collected from Florida DOE

Research Questions / Hypothesis

RQ1: Does the level of service delivery impact a nondisabled child's intent to include their peers with disabilities? (H1a, H2a & H3a)

The literature, presented in Chapter 2, indicates clear positive connections between the dependent variable (intent to include) and the independent variables (full and or partial inclusion promoted by integration, interaction and a combination of these two). The following three hypothesis operationalize these relationships in the context of this study.

H1a: Children in integrated models of service delivery (*full inclusion & partial inclusion*) will express higher levels of intent to include their peers with disability than children with no inclusive interventions

H2a: Children in models of service delivery with an education intervention that promotes interaction with SWD will express higher levels of intent to include their peers with disability than children with no inclusive interventions.

H3a: Children in models of service delivery with a combination of an education intervention that promotes interaction with SWD in the context of an integrated model of service delivery (*full inclusion or partial inclusion*) will express higher levels of intent to include their peers with disability than children with no inclusive interventions.

RQ2: What factors / covariates lend significantly to an MLR model regarding a student's intent to include another SWD? (H4a, H5a, H6a, H7a & H8a)

The literature, presented in Chapter 2, indicates clear positive connections between the dependent variable (intent to include) and the independent variables (inclusion promoted by integration, interaction and a combination of these two) but few studies reference the impact of contextual variables in their studies. Most of the literature is focused on the direct impact of inclusion on the attitudes or behaviors of one or more of the key stakeholders (teachers, parents and students), yet few offer much direction as to the impact that student level, community level and school level contextual variables play in a students intent to include. This study seeks to explore these aspects of the MLR model and hopefully add to this apparent gap in the literature.

H4a: The independent variable (*Integration*) will have a positive impact on students reported level of intent to include.

H5a: The independent variable (*Interaction*) will have a positive impact on students reported level of intent to include.

- H6a: The student level control variables (*Gender, Grade, Race & External Exposure*) will have an impact on students reported level of intent to include.
- H7a: The community level control variables (*Teachers Attitude & Parents Attitude*) will have an impact on students reported level of intent to include.
- H8a: The school level control variables (*% of SWD & % of Economically Disadvantaged*) will have an impact on students reported level of intent to include.

Using survey methodology, this study looks to capture these students' perceptions in the attempt to add knowledge to the area of student stakeholders in the discussion of the education systems policy of inclusion. This study builds on the prior studies done of peers' perceptions while filling the gap in adding to this knowledge through a comparative analysis of students' perceptions across a continuum of service delivery models.

Specific Procedures

This study begins with the generation of a theoretical framework to guide in empirically testable hypothesis. Once this framework is explored and presented, a thorough literature review is presented to operationalize the studies variables as well as to parcel out prior empirical research into the topic. The next step in the process is to construct a means of collecting data for the purpose of exploring the relationships between the variables. As this study will utilize survey methods to collect data, multiple survey instruments will be constructed to collect the data from teachers, parents and students. The type of data collected will drive the level of analysis available.

This study will look to collect interval and ratio level data, which can be analyzed by an analysis of variance (ANOVA) as well as through regression techniques. These analytical techniques will allow for empirical testing of between group (ANOVA) differences as well as

tests of relative contribution of model factors through regression. The results of these analyses can be used to inform current policy decisions and their relative effectiveness along the educational continuum.

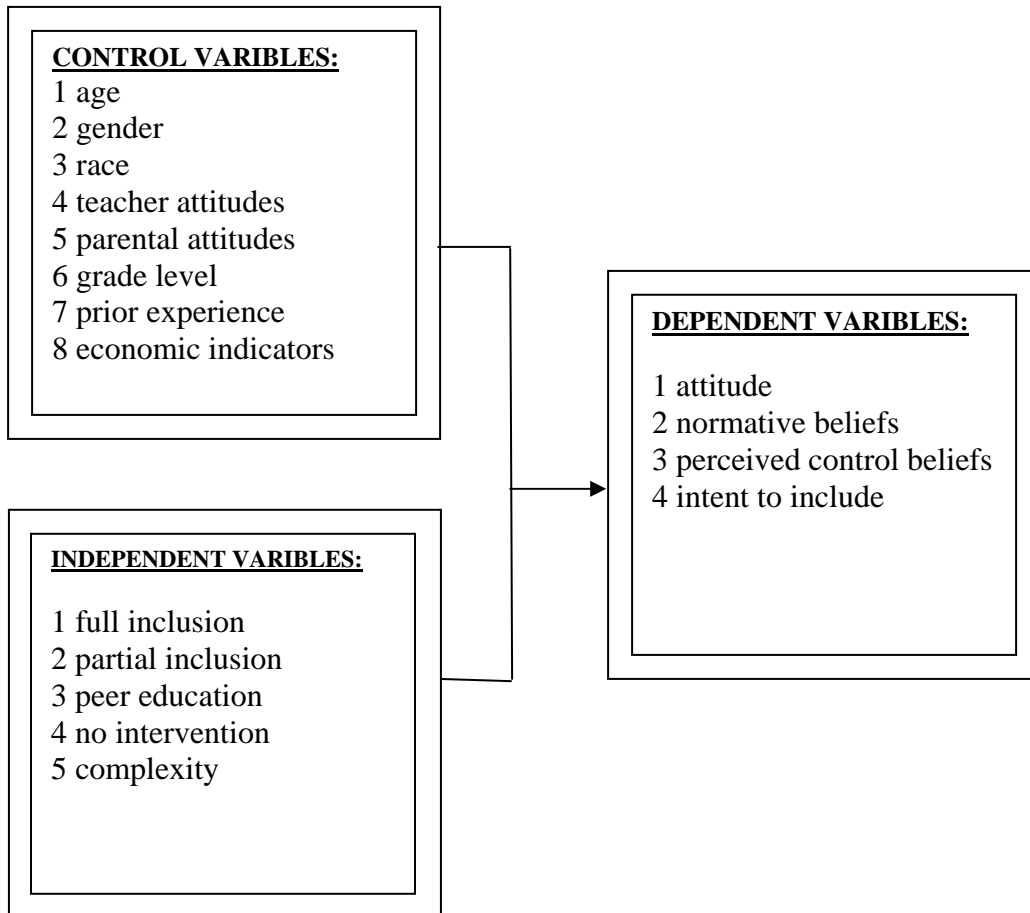


Figure 3- Conceptual Model

Impact of service delivery models on non-disabled peers intent to include peers with disabilities

Analytic Design

Analysis of Variance (ANOVA)

ANOVA will be employed to assess the impact that the independent variables (service delivery models) have on the on the dependent variable (intent to include). The unit of analysis in this study is the individual. The ANOVA was chosen because we are comparing multiple mean scores. Several assumptions must be met to initiate this test. First, our study uses a continuous dependent variable (intent to include). Second, our sample is drawn randomly from the population with observations, which are independent of one another. Third, the normality of the sample must be confirmed. We will use the spread / level plot to verify this assumption. Finally the homogeneity of variance must be confirmed. We will use the Levenne test to assure this assumption. The ANOVA, spread / level plot and the Levenne test will all be conducted using SPSS.

Multinomial Logistic Regression (MLR)

Logistic regression will be employed in this study to predict a dichotomized and discrete outcome (Guar & Guar, 2006; Hosmer & Lemeshow, 1989). In other words, this study looks to use logistic regression to explore the possibilities: what factors positively or negatively impact a students likelihood to intend to include their peers with disabilities? Hosmer and Lemeshow (1989) indicate that the goal of logistic regression, as with any model-building statistical process, is to "...find the best fitting and most parsimonious, yet biologically reasonable model to describe the relationship between and outcome (dependent or response variable) and a set of independent (predictor or explanatory) variables (p. 1)." What differentiates logistic regression

from the linear regression model is the dichotomous nature of the dependent variable. Beyond this point, these two regression functions are largely the same (Landau & Everitt, 2004; Hosmer & Lemeshow, 1989).

Logistic regression computes the log odds for a specified outcome. In other words, it explores the odds of the dependent variable occurring by exploring the ratio of the “probability of it happening and not happening as $P/1-P$, where P is the probability of an event (Guar & Guar, 2006; p.121).” In this study, we explore the probability that a child will be positively inclined to “intend to include” a SWD. Hosmer and Lemeshow (1989) point out that logistic regression allows for the assessment of binary outcomes, such a yes or no (Binar Logistic Regression) as well as multiple outcomes along these axis (Multinomial or Polynomial Logistic Regression).

One key difference between logistic and multiple regression, as indicated by Guar and Guar (2006), is that the R Square values are not exact with logistic regression. Therefore, this study will use the approximations of this statistic, Cox and Snell R square and or Nagelkerke R square, to add explanatory power to the relationship between independent and dependent variable relationships. As this study will utilize SPSS for statistical analysis, SPSS calculates a Chi Square value, based on log-likelihood values, to assess model fit (Guar & Guar, 2006).

Research Sample

This study will target non-disabled third, fourth and fifth grade students across four levels of service delivery. The service delivery models chosen for this study mirror the current literature for best practices and represent three distinctly different interventions. Specifically, this study will look at three services along this continuum, which have been demonstrated through the literature to have an impact on the various stakeholders involved in inclusion.

The literature discusses *inclusion* (sometimes referred to as mainstreaming) in which children with disabilities are physical placed in the same general education classroom as their typically developing children for specified periods of time (Schwartz et. al., 2004; Jolly, Text & Spooner, 1993), and *peer education programs* which serve to educate children with and without disabilities in an effort to build awareness of similarity and difference as well as instill knowledge about skills needed to improve social interactions (Pearl, 2004; Salend, 2005) as models along the continuum.

Stemming from these interventions or services, this study parcels out four levels along the continuum for study. Inclusion, clearly defined by the state of Florida, comprises two levels of service delivery. Inclusion is defined by the state of Florida as either *full inclusion* (the SWD spends 79% or more of their day in a general education classroom (GEC)) or *partial inclusion* (the SWD spends 78% or less of their day in a GEC). The third level (peer education) will provide for the intervention of peer support but does not have an accompanied integration intervention such as inclusion. The final group will consist of fourth and fifth grade classes who been offered none of these services. This study looks to explore how these four service delivery models impact the typically developing peers' perceptions and their intent to include their peers with disabilities.

In order to determine the appropriate size of the sample frame, this study will conduct a power analysis with a goal of achieving a minimum power of .80. The power of analysis is the probability of correctly rejecting a false null hypothesis (type II error). Essentially, power indicates the ability of a study to say, "there's an effect" when there is an effect and power reflects a probability between 0 and 1. The effect size of the treatment, the level of error that you are willing to tolerate, and sample size influence a studies power. A greater effect size should be

detected with less power. A larger sample size should provide a study with more power. Utilizing an online power calculator (<http://www.danielsoper.com/statcalc/calc01.aspx>), a power analysis was conducted to validate the studies expected power. Assuming an alpha level of .05, an anticipated effect size of .35, and 4 predictors, which correspond with the four levels of service delivery, it was determined that a sample of 150 students would support a desired power level of .80.

The sampling frame for this study will include elementary school classrooms (from the third, fourth or fifth grades) across four service delivery models in two counties in Florida (Orange and Seminole counties). The sample frame for this study is a *convenience sample* and as such, the researcher will make every reasonable effort to create a robust and diversified sample of schools. Following Dillman's (2000) multiple contact protocol and citing prior research done in this area (Roberts & Smith, 1999), it is expected that this study should attain a 50% response rate, therefore this study will invite 300 students to participate in an effort to achieve a potential n of 150. The survey will be delivered to the teachers for disbursement. A note will be sent out to families to introduce the study prior to survey distribution, to advise them that the survey is being distributed and a reminder note will be sent out one week after survey distribution. A decision as to whether deletion or imputation will be employed in cases of missing data will be made when the scope of missing data is assessed.

Data Collection

Upon selection, the researcher will contact the school principal and then the schoolteacher to solicit support for data collection. Once school level support is received, survey

packets, approved by the Institutional Review Board, will be distributed to the teacher, parents and the children in the selected class.

Data will be collected through a paper and pencil survey for the teachers, parents and the students. Following the tailored design method sponsored by Dillman (2000), a survey was constructed for teachers and a written survey packet was constructed for the parents and students. Each survey includes specific directions, consent forms and survey items to address the specific variables identified.

The standardized instruments included in this study have been utilized to reduce confusion, increase replicability and reliability of results. They have been organized to allow the teacher to distribute the parent / student survey with minimal instruction required. The researcher will personally contact each teacher to confirm receipt of the parent / student survey and to gather teacher perception and classroom level data regarding the service delivery models as well as the intensity of the interventions.

The student packets include detailed instructions for how they complete their own survey. Upon completion of the parent consent and survey, the children's surveys were placed in the provided envelopes and returned to the teacher in the classroom. In classrooms, all returned surveys were completed by the students in a group format.

The researcher provided an in-class incentive (a decorative pencil for the students and a movie rental coupon and microwavable popcorn for the participating teacher) to boost the data response rate. After one week from survey disbursement, the teacher sent home a reminder, provided by the researcher, to encourage responses from non-responders and thank those who have submitted responses.

Instrumentation

Icek Aizen's (1985) Theory of Planned Behavior (TPB) offers three distinct constructs (Attitudes, Normative Beliefs and Perceived Control Beliefs) which compromise and individuals intent to act. In this theory, one's intent to act is believed to be closely related to one's actual actions. This study will use modified questions from three established scales as subscales of a combined instrument, which is intended to test the Theory of Planned Behavior in the context of the policy of inclusion. The items used in this study were drawn from standardized measures and effort was made to incorporate "person first" language to the questions in an effort to build in the strengths perspective which reinforces that an individual is not defined by their characteristics or labels.

Attitudes

The Acceptance Scale (A-Scale), designed Luanna M. Voletz in 1980, was modified and used to assess non-disabled children's attitudes towards peers with disabilities. Voletz used this scale in her groundbreaking study of inclusion practices in the state of Hawaii in the early 1980's. According to Antonack and Livneh (1988), the A-Scale is offered in three versions (Lower Elementary for grades 1-2 & Versions A & B for Upper Elementary for grades 3 to 6). The Upper Elementary versions of the A-Scale consist of 34 items, which consists of veridicality items, general friendship items, and acceptance items.

This study will utilize form A as the attitude subscale for instrumentation (See Appendix). Antonack and Livneh (1988) indicate that Voletz published these scales with test-retest reliability measures of +.68. The measure also had a split-half reliability estimate of +.82 with an alpha coefficient of +.77. The authors' indicate that four groups of non-disabled

children, a group of children with *no exposure* to children with disabilities, a group of students with *one month* of inclusion exposure to children with severe disabilities, a group of students with *one year* of inclusion exposure to children with severe disabilities and finally a random sample of an intervention group of *reverse mainstreamed* children in the “Special Friends” group were used to validate this measurement tool. The children in the reverse mainstreamed group demonstrated the highest positive scores. A correlation of + .46 between A-Scale scores and attendance in the “Special Friends” group was presented by Voletz (1982) as predictive validity of the scale.

Normative Beliefs

Aizen (1985) indicates that normative beliefs center around how the respondent feels that the “people who mean the most” would feel about the issue at hand. On his website dedicated to TPB (<http://people.umass.edu/aizen/tpb.html>), Aizen indicates that these “people who mean the most” might be one’s family, friends, employer or educator. Building on these suggestions, this study will blend Aizen’s operationalization of “normative” individuals with a strategic selection of vignettes presented in the Peer Attitudes Towards the Handicapped Scale (PATHS) designed by Bagley and Greene in 1984.

The PATHS scale is a 30-vignette instrument designed to assess non-disabled children’s attitudes toward children with physical, behavioral and learning disabilities (Bagley & Greene, 1984). These vignettes offer a brief overview of a fictional child with varying disabilities and the respondent is asked to indicate with a five point scale (1-In My Group, 2-In Another Group, 3-In no Group, 4-Outside of Class and 5-At Home) where they feel the fictional student should work. This instrument will use four vignettes that resemble students with children with physical,

behavioral, language and learning disabilities and ask how the student feels the people who mean the most (their best friend, parents, classmates and their teacher respectively) would want them to respond (See Appendix).

The PATHS scale was published with split half-reliability totals of + .89 (Odd-Even) and + .85 (First-Second). Bagley and Greene (1984) also report that empirical validity of the measure was established by correlating the subscales with the total score. All of the subscales were statistically significant ($p > .001$) in their correlation to the total (range .41 to .88). Though these measures are reflective of only the administration of the instrument in its entirety, these measures indicate that these vignettes serve the purpose of exploring the construct of attitudes towards peers with disabilities and therefore are argued to support their use in measuring the students' perception of normative factors that influence their perception of attitudes. Reliability measure will be obtained through an analysis of the pilot testing data and face and content validity of this measure will be finalized by a careful review by an expert panel in field of childhood education.

Perceived Behavioral Control

Aizen amended his Theory of Planned Behavior to add the construct of Perceived Behavioral Control (PBC) in 1985. Several authors, including Aizen, have concluded that this construct is analogous to Albert Bandura's concept of self-efficacy. This study will thus utilize a standardized measure for self-efficacy to examine explore Aizen's PBC construct. Specifically, this study will use a modification of the Children's Self-Efficacy for Peer Interaction Scale (CSPI) developed by Wheeler and Ladd in 1981.

The CSPI is a 22-item questionnaire, which assesses a student's perception of their ability to influence others (feelings / actions) in socially acceptable ways (Wheeler & Ladd, 1981). The scale also places these items, as Bandura (1977) indicates, in the context of situations, which will predictably challenge the students' sense of self-efficacy in the face of choices with increasing levels of risk. Ten of the items depict conflict situation while twelve items depict non-conflict situations.

Wheeler and Ladd report that the CSPI had Cronbach's alpha coefficient measures for internal consistency of + .85 (total measure), + .85 (conflict items) and + .73 (non-conflict items). The correlation between conflict and non-conflict items was + .46, which indicates that these are two distinct but related constructs. The test-retest reliability measures were observed as + .90 for boys and + .80 for females. Wheeler and Ladd indicate that the validity measures for CSPT were obtained through positive correlations with the "gold standard" measures of social self-efficacy in the Piers-Harris Children's Self-Concept Scale, the Teacher Rating of Social Efficacy, the Play Nominations Sociometric measure and the Peer Rating of Social Influence scales.

The final subscale of measurement will be obtained by an interview of the teachers selected in the sample. This interview was constructed using Dillman's (2000) Universal Design and as such will be administered via phone, e-mail or face-to-face interview. The focus of this questionnaire is to confirm the level of service delivery and to qualify the intensity of the intervention in that classroom.

Control Variable of Adult Attitude Scale

The Attitude Toward Disabled Persons Scale (ATDP) is the most widely used scale to measure one's attitude toward people with disabilities (Antonack & Livneh, 1988). Originally designed in 1960 (Test O) by Yucker, Block and Campbell, the ATDP was modified in 1962 to create two equivalent 30 item forms (Test A & B) which authors argue offers uni-dimensional assessment of a generalized attitude toward physically disabled individuals.

This study will utilize a modified version of the ATDP form B as the attitude subscale for measuring the attitude of adults (teachers and parents) as a control variable. Antonack and Livneh (1988) indicate that form B has achieved test-retest reliability measures of $+ .73$ and $+ .83$ and split-half reliability estimates of $+ .72$ and $+ .87$. The authors indicate that face, content, construct and criterion validity were obtained through rigorous exploration. Specifically, the authors' cite an extensive review of literature followed by an expert panel of reviewers commented and applied data reduction techniques to achieve face and content validation. Criterion and construct validity was achieved by correlating scores and scales with demographic and personality measures (Antonack & Livneh, 1988). The results of this correlation yielded no relationship between age and acceptance / rejection of an individual with disabilities. They did find that females tended to be more accepting than males. Education level, low levels of aggression and hostility, self insight, positive self-concept, ego strength and low anxiety levels were also found to be positively correlated with positive acceptance scores.

Pilot Study

A pilot study of the proposed instrument was administered to students and teachers to test the use of the instruments and evaluate the process of data collection. The use of a pilot test is a

vital tool in the process, as it allows for feedback on the complete instrument and survey process prior to full-scale data collection. It served to improve the studies feasibility and execution especially with a study intended to collect survey data from three unique sources (teacher, parents and students).

Treatment of the Data

Once the surveys were completed, the subjects will place their surveys in the pre-addressed and pre-coded envelope and were returned to the researcher (Dillman, 2000). The researcher then coded the data and the data was entered into a spreadsheet and cleaned for analysis.

The computerized data will be analyzed using SPSS 13.0 and the appropriate table and analysis information is summarized and presented in the results section. The remaining chapters of this text will summarize the conclusions and discussion points based on the data analysis. The final sections of the study will outline the study limitations and delimitations as well as areas for future research on the issue of inclusion and its application to broader public policy issues along the lines of Least Restrictive Environment (LRE) and the impact of social exclusion.

Anticipated Findings

Through the use of the Theory of Planned Behavior, this study will test for hypotheses concerning the impact of service delivery models on the intent of non-students with disabilities to include their peers with disabilities. It is expected that students in inclusive service delivery models (inclusion and peer education) will report higher levels of intent to include than their counterparts in non-inclusive classroom setting. Additionally, a regression model will be

presented to explore the relative contributions of various factors in education to examine their impact on a student's intent to include SWD. The knowledge attained from this study can be directly used to help educators and policy makers to best meet the needs of the wide variety of student educated in Florida's public school system and can indirectly serve to inform the broader study of socially inclusive interventions across the human spectrum.

CHAPTER FIVE RESULTS

The focus of this study is to explore the impact of policy initiatives, which seek to mitigate the impact of social exclusion. Specifically, this study seeks to analyze the impact of various inclusive modalities on the intent of nondisabled students to include their peers with disabilities. The results presented in this chapter reflect the analysis of survey data collected from three key stakeholders in the education process: teachers, students and parents.

These results will be presented in three main areas. The first, descriptive data will identify the sample variation. The second area of results offered will present an analysis of between group differences through the use of one way and two-way ANOVA tests. This section will address the first research question presented in chapter three. The final area of results will present the findings of the logistic regression function, which is performed to explore the relative contributions of the various modalities in relation to their impact on a student's intent to include another SWD. This data addresses the second research question presented in chapter three. Quantitative analysis was conducted by using SPSS 13.0.

Descriptive Data

This study began in January of 2007, with a convenience sample of 936 third, fourth and fifth grade students whose teachers, students and parents volunteered to take part in survey research. These heterogeneous classes were located in 52 classrooms from Orange (n= 31) and Seminole (n= 21) counties. Quantitative data was obtained through survey research from all three stakeholders (*teachers, parents and students*). A written interview was obtained from each

of the teachers (n= 46) from March to April 2007 and a written survey booklet was administered to the parents and students from March to May 2007.

The sample frame of parent and student survey booklets (n= 936) led to a sample of 593 completed surveys. This produced a response rate of 63.4%. The response rate was evenly distributed across the fourth and fifth grades and reduced in the third grade as reflected in the table 5 below. The reduced rate of response for third grade classes is largely explained by the increased “burden” placed on third grade teachers as they were required to read the survey items out load in a group format as the instruments advised this practice with the third grade students.

This response rate tracks closely with the response rate obtain in similar prior research (69%) conducted by Roberts and Smith (1999). Table 5 also presents the distribution of student responses by gender, race and age. Secondary data for the school year 2005-2006 was obtained from the Florida Department of Education (D.O.E., 2007) through the School Public Accountability Records submitted in accordance with No Child Left Behind. This data is presented in table 6, which offers a distribution of contextual variables for the six schools included in this study. Also included in table 6 are the school specific sample frames,, samples collected and resulting response rates to add clarity to the distribution of responses by school.

Table 5- Demographic Distribution Reported by the Students

Grade Level		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Third Grade	61	10.29	10.29	10.29
	Fourth Grade	270	45.53	45.53	55.82
	Fifth Grade	262	44.18	44.18	100
Student reported age					
Valid	8 y/o	17	2.87	2.87	2.87
	9 y/o	128	21.59	21.59	24.45
	10 y/o	255	43.00	43.00	67.45
	11 y/o	178	30.02	30.02	97.47
	12 y/o	13	2.19	2.19	99.66
	13 y/o	2	0.34	0.34	100
Student reported race					
Valid	Caucasian	346	58.35	58.35	58.35
	African American	53	8.94	8.94	67.28
	Hispanic	91	15.35	15.35	82.63
	Asian	23	3.88	3.88	86.51
	Other	80	13.49	13.49	100
	Total	593	100	100	
Student reported gender					
Valid	Male	275	46.37	46.37	46.37
	Female	318	53.63	53.63	100
	Total	593	100	100	

Table 6- Distribution of Contextual School Variables

School	% SWD	% Economic Disadvantage	% Non-white	% Female	# Surveys Given*	# Surveys Returned	Response Rate
Sunrise	14.6	7.7	26.7	48.8	198	145	73%
Dommerich	15.2	14.2	18.6	50.6	180	141	78%
Brookshire	27	27.3	32.1	44.8	72	45	63%
Dream Lk.	24.2	51	64.5	46.7	108	43	40%
Idyllwilde	16.6	49.2	51.9	48.7	270	156	58%
Stenstrom	12.6	19.4	31.1	49.7	108	63	58%
TOTAL					936	593	63%

* Estimated at an average of 18 per class

There was no missing data presented in the 46 teacher surveys. There were 52 parent / student booklets which were returned with at least one missing item. To address this concern, an independent sample T test was conducted to assess if there was a fundamental difference between the 52 surveys with missing values and the 541 fully completed surveys. The descriptive statistics for this test, reflected in table 7, and the results of this T test, reflected in table 8, indicate a statistically insignificant value ($F = .034$; $p = .854$) confirming that there is no difference between these groups. Therefore, it was concluded that it was safe to include these surveys with their missing values imputed by mode replacement. The process of mode replacement was chosen because of the categorical nature of the data missing from these items.

Table 7– Descriptive Data for Independent Sample T test

Group Statistics					
	Missing Data Imputed	N	Mean	Std. Deviation	Std. Error Mean
Intent to Include SWD	Missing Data was Imputed with mode	52	79.02	10.191	1.413
	Missing Data WAS NOT Imputed with mode	541	78.62	9.800	.421

Table 8– T test Comparing “Missing” Group and the Fully Completed” Groups

Independent Samples Test										
		Levene's Test for Equality of Variance		t-test for Equality of Means						
		F	Sig.	t	df	Sig. (2-tailed)	Mean Difference	Std. Error Difference	95% Confidence Interval of the Difference	
									Lower	Upper
Intent to Include	Equal variance assumed	.034	.854	.276	591	.782	.394	1.428	-2.410	3.199
	Equal variance not assumed			.267	60.423	.790	.394	1.475	-2.555	3.344

Table 9 reflects the descriptive data for the independent variables (*integration and interaction*). Table 10 and the histogram, in figure 4, confirms the normally distributed data for the dependent variable (*intent to include*).

Table 9– Independent Variable (*Integration and Interaction*) Descriptive Statistics

Integration - blend of students					
		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Full Integration (>79 minutes)	232	39.12	39.12	39.12
	Partial Integration (<79 minutes)	280	47.22	47.22	86.34
	Peer Interaction Education	39	6.58	6.58	92.92
	No Integration / Interaction Educ	42	7.08	7.08	100
Interaction - education in minutes					
Valid	No time spent on this in this class	187	31.53	31.53	31.53
	1 - 30 minutes per week	139	23.44	23.44	54.97
	31- 60 minutes per week	104	17.54	17.54	72.51
	61- 90 minutes per week	30	5.06	5.06	77.57
	91 PLUS minutes per week	133	22.43	22.43	100

Table 10– Dependent Variable (*Intent to Include*) Descriptive Statistics

Descriptives		Statistic	Std. Error	
Intent to Include SWD	Mean	78.66	.404	
	95% Confidence Interval for Mean	Lower Bound	77.87	
		Upper Bound	79.45	
	5% Trimmed Mean	78.81		
	Median	79.00		
	Variance	96.556		
	Std. Deviation	9.826		
	Minimum	48		
	Maximum	100		
	Range	52		
	Interquartile Range	14		
	Skewness	-.224	.100	
	Kurtosis	-.335	.200	

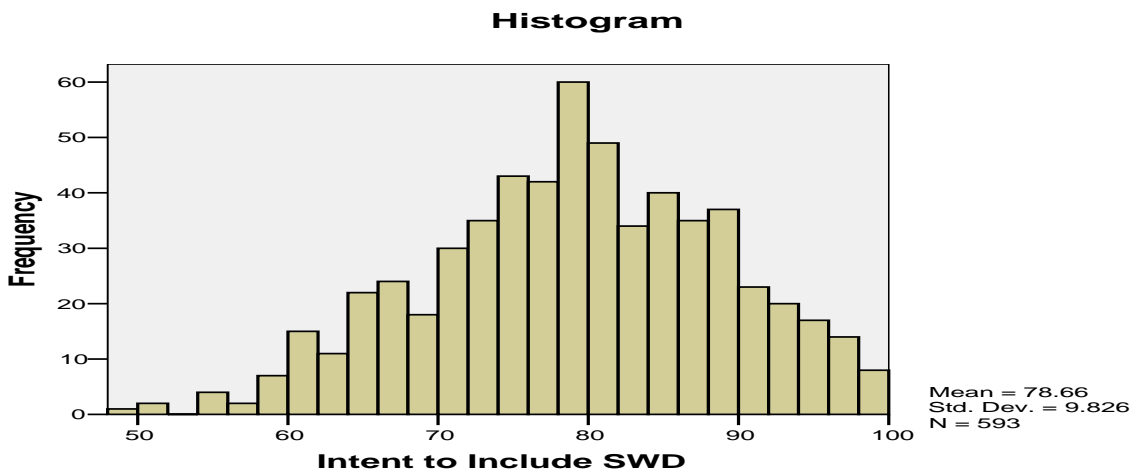


Figure 4- Histogram for the Dependent variable (*Intent to Include*)

The next table (11) presents the Pearson correlation coefficient for each scale component for dependent variable (*Attitude, Normative Beliefs, and Perceived Control Beliefs*) as well as the combined scale (*Intent to include*). The “r” statistic measures the degree of association between two variables and varies from +1 through 0 to -1. An “r” of +1 denotes a strong positive association between two variables (a one unit positive change in X correlates with a one unit positive change in Y), an “r” of -1 demonstrates a strong negative association between two

variables (a one unit positive change in X correlates with a one unit negative change in Y), and an “r” of 0 means there is no correlation between two variables. Table 11 confirms that the theoretically indicated constructs (*Attitude, Normative Beliefs, Perceived Control Beliefs*), as identified in the Theory of Planned Behavior, are positively correlated with on another and as such are positively correlated with a students intent to include SWD.

Table 11– Correlation Coefficients for the Dependent Variable (*Intent to Include*)

		Correlations			
		Student Attitude scale total	Normative Beliefs scale total	Percieved Control Beliefs scale total	Intent to Include SWD
Student Attitude scale total	Pearson Correlation		**	**	**
	N	593			
Normative Beliefs scale total	Pearson Correlation	.327**		**	**
	Sig. (2-tailed)	.000			
	N	593	593		
Percieved Control Beliefs scale total	Pearson Correlation	.465**	.235**		**
	Sig. (2-tailed)	.000	.000		
	N	593	593	593	
Intent to Include SWD	Pearson Correlation	.806**	.591**	.828**	
	Sig. (2-tailed)	.000	.000	.000	
	N	593	593	593	593

** . Correlation is significant at the 0.01 level (2-tailed).

ANOVA Data:

As presented earlier, one way and two way Analysis of Variance (ANOVA) tests were employed to empirically assess the impact that the independent variables (*integration and interaction*) have on the on the dependent variable (*intent to include*). The one-way ANOVA tests are used to test the main effect that the independent variables have on the dependent variable and the two-way ANOVA is run to assess the possible interaction effect of these independent variables. The ANOVA test was chosen because we are comparing multiple mean scores. The unit of analysis in this study is the individual. This statistical test is being conducted to explore the following research question.

RQ1: Does the level of service delivery impact a nondisabled child's intent to include their peers with disabilities?

The ANOVA is a robust test, which is forgiving of violation of some of its assumptions. The ANOVA test first assesses the homogeneity of variances between groups. Specifically, the Levene's test for homogeneity of variances will be employed to examine if the variance in scores for each group are statistically similar or dissimilar. If the Levene test reveals a significance values (Sig.) greater than .05 then it is assumed that the groups have not violated the assumption of homogeneity of variance.

Once the homogeneity of variance is confirmed, the researcher can then proceed to explore the "between group and within group sum of squares values (p. 190)..." which identify if there is a statistically significant difference between the groups mean scores (Pallant, 2001). Once it is determined that there is a statistically significant difference between group mean scores, the researcher can then explore which groups are different by examining the post hoc

analysis. The post hoc test chosen for this study is the Tukey HSD, which is examined through the SPSS output of multiple comparisons. This output explores which groups are similar and which groups are dissimilar by identifying an asterisk (*) to the right of the two or more groups, which are significantly dissimilar at the .05 level.

Results for H1a (*Integration*)

H1a: Children in integrated models of service delivery (full inclusion & partial inclusion) will express higher levels of intent to include their peers with disability than children with no inclusive interventions.

This ANOVA test was run to explore the first hypothesis (H1a) and the output, reflected in table 12, confirms that the data does not violate the assumption of homogeneity of variance as illustrated in the Levene statistic (2.487), which is slightly above the significance level of .05 (.06).

Table 12- Levine Test of Equality of Error Variances for H1a

Test of Homogeneity of Variances			
Intent to Include SWD			
Levene Statistic	df1	df2	Sig.
2.487	3	589	.060

Once the test confirms that the homogeneity of variance is not violated the effort then turns to the exploration of mean difference through the multiple comparisons output, reflected in table 13. This output reflects that the first two groups (*Full Inclusion* and *Partial Inclusion*) are statistically the same as one another but they are statistically dissimilar to the mean scores, reflected in the descriptive statistics output in table 14, of the other two groups (*Peer Education and the Control group*).

Table 13– Multiple Comparisons Output for H1a

Multiple Comparisons

Dependent Variable: Intent to Include SWD
Tukey HSD

(I) Integration - blend of students	(J) Integration - blend of students	Mean Difference (I-J)	Std. Error	Sig.	95% Confidence Interval	
					Lower Bound	Upper Bound
Full Integration (> or = 79 % of the day)	Partial Integration (<79 % of the day)	1.754	.841	.159	-.41	3.92
	Peer Interaction Education	7.552*	1.640	.000	3.33	11.78
	No Integration / Interaction Educ	9.106*	1.589	.000	5.01	13.20
Partial Integration (<79 % of the day)	Full Integration (> or = 79 % of the day)	-1.754	.841	.159	-3.92	.41
	Peer Interaction Education	5.798*	1.620	.002	1.63	9.97
	No Integration / Interaction Educ	7.351*	1.568	.000	3.31	11.39
Peer Interaction Education	Full Integration (> or = 79 % of the day)	-7.552*	1.640	.000	-11.78	-3.33
	Partial Integration (<79 % of the day)	-5.798*	1.620	.002	-9.97	-1.63
	No Integration / Interaction Educ	1.553	2.107	.882	-3.88	6.98
No Integration / Interaction Educ	Full Integration (> or = 79 % of the day)	-9.106*	1.589	.000	-13.20	-5.01
	Partial Integration (<79 % of the day)	-7.351*	1.568	.000	-11.39	-3.31
	Peer Interaction Education	-1.553	2.107	.882	-6.98	3.88

*. The mean difference is significant at the .05 level.

Table 14– Descriptive Data for H1a

Descriptives

Intent to Include SWD

	N	Mean	Std. Deviation	Std. Error	95% Confidence Interval for Mean			
					Lower Bound	Upper Bound	Minimum	Maximum
Full Integration (> = 79 % of the day)	232	80.63	9.360	.614	79.42	81.84	50	99
Partial Integration (<79 % of the day)	280	78.88	9.760	.583	77.73	80.02	48	100
Peer Interaction Education	39	73.08	10.717	1.716	69.60	76.55	55	96
No Integration / Interaction Educ	42	71.52	6.474	.999	69.51	73.54	60	85
Total	593	78.66	9.826	.404	77.87	79.45	48	100

Results for H2a (Interaction)

H2a: Children in models of service delivery with an education intervention that promotes interaction with SWD (full inclusion, partial inclusion or peer education) will express higher levels of intent to include their peers with disability than children with no inclusive interventions.

This ANOVA test was run to explore the second hypothesis (H2a) and the output, reflected in table 15, confirms that the data does not violate the assumption of homogeneity of variance illustrated in the Levene statistic (.240), which is well above the significance level of .05 (.916).

Table 15- Levine Test of Equality of Error Variances for H2a

Test of Homogeneity of Variances			
Intent to Include SWD			
Levene Statistic	df1	df2	Sig.
.240	4	588	.916

Once the test confirms that the homogeneity of variance is not violated then the effort turns to the exploration of mean difference through the multiple comparisons output, reflected in table 16. This output reflects that the only statistically significant difference in these group mean scores, reflected in the descriptive statistics table 17, is between the second group (*1-30 minutes per class*) and the final group (*91 PLUS minutes per week*).

Table 16– Multiple Comparisons Output for H2a

Multiple Comparisons

Dependent Variable: Intent to Include SWD

Tukey HSD

(I) Interaction - educat in minutes	(J) Interaction - education in minutes	Mean Difference (I-J)	Std. Error	Sig.	95% Confidence Interval	
					Lower Bound	Upper Bound
No time spent on this i this class	1 - 30 minutes per we	-2.747	1.095	.090	-5.74	.25
	31- 60 minutes per we	-.370	1.196	.998	-3.64	2.90
	61- 90 minutes per we	-.198	1.923	1.000	-5.46	5.06
	91 PLUS minutes per week	.718	1.109	.967	-2.32	3.75
1 - 30 minutes per we	No time spent on this i this class	2.747	1.095	.090	-.25	5.74
	31- 60 minutes per we	2.378	1.268	.332	-1.09	5.85
	61- 90 minutes per we	2.549	1.968	.694	-2.84	7.93
	91 PLUS minutes per week	3.465*	1.186	.030	.22	6.71
31- 60 minutes per we	No time spent on this i this class	.370	1.196	.998	-2.90	3.64
	1 - 30 minutes per we	-2.378	1.268	.332	-5.85	1.09
	61- 90 minutes per we	.171	2.026	1.000	-5.37	5.72
	91 PLUS minutes per week	1.088	1.280	.915	-2.41	4.59
61- 90 minutes per we	No time spent on this i this class	.198	1.923	1.000	-5.06	5.46
	1 - 30 minutes per we	-2.549	1.968	.694	-7.93	2.84
	31- 60 minutes per we	-.171	2.026	1.000	-5.72	5.37
	91 PLUS minutes per week	.917	1.976	.990	-4.49	6.32
91 PLUS minutes per week	No time spent on this i this class	-.718	1.109	.967	-3.75	2.32
	1 - 30 minutes per we	-3.465*	1.186	.030	-6.71	-.22
	31- 60 minutes per we	-1.088	1.280	.915	-4.59	2.41
	61- 90 minutes per we	-.917	1.976	.990	-6.32	4.49

*. The mean difference is significant at the .05 level.

Table 17– Descriptive Data for H2a

Descriptives								
Intent to Include SWD								
	N	Mean	Std. Deviation	Std. Error	95% Confidence Interval for Mean		Minimum	Maximum
					Lower Bound	Upper Bound		
No time spent on this i this class	187	78.10	9.427	.689	76.74	79.46	50	99
1 - 30 minutes per wee	139	80.85	9.620	.816	79.24	82.46	59	99
31- 60 minutes per we	104	78.47	10.237	1.004	76.48	80.46	55	100
61- 90 minutes per we	30	78.30	9.571	1.747	74.73	81.87	57	95
91 PLUS minutes per week	133	77.38	10.099	.876	75.65	79.12	48	99
Total	593	78.66	9.826	.404	77.87	79.45	48	100

Results for H3a (*Interaction Effect*)

H3a: Children in models of service delivery with a combination of an education intervention that promotes interaction with SWD in the context of an integrated model of service delivery (*full inclusion, partial inclusion*) will express higher levels of intent to include their peers with disability than children with no inclusive interventions.

This two-way ANOVA test, run to explore the third hypothesis (H3a), offers similar output to the one-way ANOVA, with several key distinctions. The main output is read from the tests of between-subjects effects table (table 20), which offers information on the main effects, effect size, interaction effects, post-hoc tests and multiple comparisons. This test also uses the Levene statistic and table 18 confirms that the data does not violate the assumption of homogeneity of variance, which is illustrated in the Levene statistic (1.003) and the significance level above .05 (.432). The mean scores for these variables tested in this two-way ANOVA are reflected in descriptive data output presented in table 19.

Table 18- Levine Test of Equality of Error Variances for H3a

Levene's Test of Equality of Error Variances ^a

Dependent Variable: Intent to Include SWD

F	df1	df2	Sig.
1.003	8	584	.432

Tests the null hypothesis that the error variance of the dependent variable is equal across groups.

a. Design: Intercept+ANOVAIntegration+recoded_interaction+ANOVAIntegration * recoded_interaction

Table 19– Descriptive Output for H3a

Descriptive Statistics

Dependent Variable: Intent to Include SWD

Integration - blend of students	Interaction- condensed	Mean	Std. Deviation	N
Full Integration (> or = to 79 % of the day)	No time spent on this in this class	80.71	9.218	95
	1 - 60 minutes per week	82.91	8.544	64
	61or more minutes per week	78.53	9.857	73
	Total	80.63	9.360	232
Partial Integration (<79 % of the day)	No time spent on this in this class	78.68	9.417	50
	1 - 60 minutes per week	79.94	9.502	163
	61or more minutes per week	76.43	10.312	67
	Total	78.88	9.760	280
Peer Interaction Education	1 - 60 minutes per week	66.44	8.944	16
	61or more minutes per week	77.70	9.460	23
	Total	73.08	10.717	39
No Integration / Interaction Educ	No time spent on this in this class	71.52	6.474	42
	Total	71.52	6.474	42
Total	No time spent on this in this class	78.10	9.427	187
	1 - 60 minutes per week	79.83	9.938	243
	61or more minutes per week	77.55	9.981	163
	Total	78.66	9.826	593

Once the test confirms that the homogeneity of variance is not violated, then the effort turns to the exploration of the main / interaction effects, effect size, post-hoc tests and multiple comparisons mean difference through the between-subjects effects reflected in table 20.

Table 20– Test of Between-Subjects Effects for H3a

Tests of Between-Subjects Effects								
Dependent Variable: Intent to Include SWD								
Source	Type III Sum of Squares	df	Mean Square	F	Sig.	Partial Eta Squared	Noncent. Parameter	Observed Power ^f
Corrected Model	6701.844 ^b	8	837.730	9.696	.000	.117	77.565	1.000
Intercept	306353.383	1	306353.383	20906.14	.000	.973	20906.144	1.000
ANOVAIntegration	4724.869	3	1574.956	18.228	.000	.086	54.684	1.000
recoded_interactio	80.194	2	40.097	.464	.629	.002	.928	.126
ANOVAIntegration recoded_interactio	1950.825	3	650.275	7.526	.000	.037	22.578	.987
Error	50459.347	584	86.403					
Total	726227.000	593						
Corrected Total	57161.191	592						

a. Computed using alpha = .05

b. R Squared = .117 (Adjusted R Squared = .105)

A main effect for an independent variable is reflected in value less than .05 in the significance column (Sig.). In this test, there is a significant main effect for Integration (F= 18.228; p= .001 level) but not for Interaction (F= .464; p= .629). The two-way ANOVA also provides information about the interaction effect of independent variables (*integration*interaction*). The output presented in table 19 indicates that the combination of integration and interaction produced a statistically significant value (F=7.526; p= .001).

According to Pallant (2001) the effect size, reflected in the Eta Squared column, which can range from 0 to 1, indicates the “proportion of variance of the dependent variable that is explained by the independent variable (p. 175)”. Using the guidance of Cohen’s (1988) criteria,

the Eta squared value can be interpreted as a small effect size (0 to .01), a moderate effect size (.02 to .06) and a large effect size (.14 or more).

This output reflects that the Eta Squared value for *Integration* (.086) and the interaction of *integration* and *interaction* (.037) indicates a moderately strong proportion of variance, which provides some practical relevance with regard to the interactive impact of both “interventions” on the student’s intent to include SWD. In other words, this data suggests that integration efforts are significant and combining integration with an interaction promoting educational intervention also has a significant impact on a student’s intent to include SWD. Finally, the two-way ANOVA test uses the post-hoc tests (Tukey HSD) to explore which groups are different from one another. As with the output from H1a, this output, reflected in table 21, indicates that the first two groups (*Full Inclusion and Partial Inclusion*) are statistically the same as one another but they are statistically dissimilar to the mean scores of the other two groups (*Peer Education and the Control group*).

Table 21– Multiple Comparisons Output for H3a

Multiple Comparisons

Dependent Variable: Intent to Include SWD

Tukey HSD

(I) Integration - blend of students	(J) Integration - blend of students	Mean Difference (I-J)	Std. Error	Sig.	95% Confidence Interval	
					Lower Bound	Upper Bound
Full Integration (> or = to 79 % of the day)	Partial Integration (<79 % of the day)	1.75	.825	.146	-.37	3.88
	Peer Interaction Education	7.55*	1.609	.000	3.41	11.70
	No Integration / Interaction Educ	9.11*	1.559	.000	5.09	13.12
Partial Integration (<79 % of the day)	Full Integration (>79 minutes)	-1.75	.825	.146	-3.88	.37
	Peer Interaction Education	5.80*	1.589	.002	1.70	9.89
	No Integration / Interaction Educ	7.35*	1.538	.000	3.39	11.31
Peer Interaction Education	Full Integration (>79 minutes)	-7.55*	1.609	.000	-11.70	-3.41
	Partial Integration (<79 % of the day)	-5.80*	1.589	.002	-9.89	-1.70
	No Integration / Interaction Educ	1.55	2.067	.876	-3.77	6.88
No Integration / Interaction Educ	Full Integration (>79 minutes)	-9.11*	1.559	.000	-13.12	-5.09
	Partial Integration (<79 % of the day)	-7.35*	1.538	.000	-11.31	-3.39
	Peer Interaction Education	-1.55	2.067	.876	-6.88	3.77

Based on observed means.

*. The mean difference is significant at the .05 level.

Regression Data

As described earlier, this study will construct a logistic regression model using independent variables (*integration* and *interaction*) to explain and predict the dependent variable (*intent to include*). Additionally, control variables (*Student, Community* and *School level control variables*) will be incorporated to control for external influences and improve the explanatory power of the regression equation. This statistical test is being conducted to explore the following research question and hypothesis.

RQ2: What factors / covariates lend significantly to an MLR model regarding a student's intent to include another SWD?

This study looks to use logistic regression to explore the possibilities: what factors lead to a higher probability that a child will be more likely to express intent to include SWD? Hosmer and Lemeshow (1989) indicate that the goal of logistic regression, as with any model-building statistical process, is to "...find the best fitting and most parsimonious, yet biologically reasonable model to describe the relationship between and outcome (dependent or response variable) and a set of independent (predictor or explanatory) variables (p. 1)."

To accomplish this task, this study uses a theoretically informed framework to identify predictor variables and control variables that may have some bearing on a child's intent to include a peer with a disability. These variables, depicted in table 22, will be incorporated into a logistic regression model and assessed for their statistically significant impact on the dependent variable. Statistically insignificant variables will be removed from the initial model to create the most parsimonious revised model. The last level of each variable will be used as the referent level for the proceeding MLR. For example, the variable *Gender* will be presented for *Male* as

Gender 1 which indicates that *Male* is being compared to the last referent level *Female*. Likewise, the data for the variable *Grade* is presented as Grade 1 (*Third grade*) and Grade 2 (*Fourth Grade*) and these levels are presented in relation to the last referent level (*Fifth Grade*.) This process is repeated for each variable included in the equation and table 22 offers the graphical views of each of these variables, descriptive information about each and the levels used in this analysis.

Table 22– Variables Explored Through Multinomial Logistic Regression

Variable	Description	Type	Values	Units
Dependent Variables				Coded
Intent to Include	Student reported Intent to Include SWD; categorized into four discrete groups	Ordinal	No Intent to Include Low Level Intent to Include High Level Intent to Include	0 1 2
Independent Variables				Coded
Inclusion	Was an SWD on the class roster	Nominal	NO YES	0 1
Integration	Did the teacher offer an educational intervention promoting interaction with SWD	Nominal	NO YES	0 1
Student Level Controls				Coded
Grade	Student reported grade level	Nominal	Third Fourth Fifth	3 4 5
Race	Student reported race	Nominal	Caucasian African American Hispanic Asian American Other	1 2 3 4 5
Gender	Student reported gender	Nominal	Male Female	1 2
External Exposure	Student reported exposure to SWD in their “home” life	Nominal	NO YES	0 1
Community Level Controls				Coded
Teachers Attitude About PWD	Teachers self reported attitude towards people with disabilities (PWD)	Interval	10 item scale ranging from a low of 10 to a high of 60	10 to 60
Parents Attitude about PWD	Teachers self reported attitude towards (PWD)	Interval	10 item scale ranging from a low of 10 to a high of 60	10 to 60
School Level Controls				Coded
% of SWD in the school	Reported % of SWD for the school	Interval	Secondary data	%
% of Students with Econ Disadvantage	Reported % of students in the category of economic disadvantage	Interval	Secondary data	%

Logistic regression computes the log odds for a specified outcome. In other words, it explores the odds of the dependent variable occurring by exploring the ratio of the “probability of it happening and not happening as $P/1-P$, where P is the probability of an event (Guar & Guar, 2006; p.121).” In this study, we explore the impact that independent and control variables have on the probability that a child will express a positively or negatively inclined level of “intent to include” a SWD. This odds ratio is presented in the SPSS output labeled parameter estimates (Exp(B)) and will be explored in relation to their impact on a four leveled (*low negative, low positive, moderate positive* and *high positive*) dependent variable (*intent to include*). Hosmer and Lemeshow (1989) identify this statistical process as Polynomial or Polytomous or Multinomial Logistic Regression (MLR).

The -2 log likelihood statistic produces a Chi Square value that evaluates the significance of the entire model when compared to the null (Guar & Guar, 2006). A p value less than .05 indicates that the model has a statistically significant ability to offer more predictive information than the null. Once confirmed as significantly different, pseudo R Square values can be explored to assess an approximation of R Square values (Guar & Guar, 2006). SPSS offers Cox and Snell and or Nagelkerke pseudo-R square outputs, which add explanatory power to the relationship between independent and dependent variable relationships.

Additionally, SPSS also produces several additional pieces of output information, which help to interpret the results of a Multinomial Logistic Regression (MLR) model. The Likelihood Ratio Test offers an “aggregated” indication of the relative contribution of the various variables explored in the model. This output is interpreted using the p value of the Chi square statistic for each of the variables. A p value less than .05 indicates that the variable has a statistically

significant impact on the dependent variable and thus should be retained in the model; where as insignificant variables can be eliminated.

Results for H4a to H8a

H4a: The independent variable (*Integration*) will have a positive impact on students reported level of intent to include.

H5a: The independent variable (*Interaction*) will have a positive impact on students reported level of intent to include.

H6a: The student level control variables (*Gender, Grade, Race & External Exposure*) will have a positive impact on students reported level of intent to include.

H7a: The community level control variables (*Teachers Attitude & Parents Attitude*) will have a positive impact on students reported level of intent to include.

H8a: The school level control variables (*% of SWD & % of Economically Disadvantaged*) will have a positive impact on students reported level of intent to include.

Initial MLR Model

The initial model, inclusive of all of the variables identified in table 22, was run using the MLR analysis with SPSS 13.0 software. This model produced several output tables. The first output table (23) explores the model fitting information for the initial model. This table indicates that the initial model is statistically significant from the null (Chi Square= 110.332; p= .001) and therefore warrants further exploration.

Table 23- Model Fitting Output for the Initial Model

Model Fitting Information				
Model	Model Fitting Criteria	Likelihood Ratio Tests		
	-2 Log Likelihood	Chi-Square	df	Sig.
Intercept Only	1450.698			
Final	1340.367	110.332	42	.000

In table 24 and table 25, output data is presented to offer information about the relative contributions of these variables to the model. Table 24 presents the impact of each level of these variables and table 25 explores the aggregated impact of each variable and table. A brief review of this output is provided in the paragraph after these tables.

Table 24- Parameter Estimates for the Initial Model

Level of Intent	B	Std. Error	Wald	df	Sig.	95% C.I. for Exp(B)		
						Exp(B)	Lower	Upper
LOW LEVEL (66-77)								
Intercept	-1.921	1.652	1.351	1	0.245			
Teachers Attitude About PWD	0.079	0.034	5.548	1	0.019	1.083	1.013	1.156
% of SWD in the school	-0.032	0.050	0.412	1	0.521	0.968	0.877	1.069
% of Students with Econ Disadvantage	-0.013	0.012	1.180	1	0.277	0.987	0.963	1.011
Parents Attitude about PWD	0.032	0.025	1.614	1	0.204	1.033	0.983	1.086
[Integration_Binary=0]	-0.541	0.417	1.680	1	0.195	0.582	0.257	1.319
[Integration_Binary=1]	0.000			0				
[Gender=1]	-0.377	0.306	1.517	1	0.218	0.686	0.377	1.249
[Gender=2]	0.000			0				
[External_Exposure_Binary=0]	-0.641	0.321	3.993	1	0.046	0.527	0.281	0.988
[External_Exposure_Binary=1]	0.000			0				
[Interaction_Binary=0]	0.562	0.361	2.431	1	0.119	1.755	0.865	3.559
[Interaction_Binary=1]	0.000			0				
[Grade=3]	-0.850	0.598	2.018	1	0.155	0.427	0.132	1.381
[Grade=4]	-0.271	0.353	0.586	1	0.444	0.763	0.382	1.525
[Grade=5]	0.000			0				
[Race=1]	0.256	0.418	0.377	1	0.539	1.292	0.570	2.930
[Race=2]	0.860	0.670	1.649	1	0.199	2.362	0.636	8.776
[Race=3]	1.404	0.647	4.705	1	0.030	4.070	1.145	14.466
[Race=4]	0.554	0.899	0.380	1	0.537	1.741	0.299	10.134
[Race=5]	0.000			0				
MODERATE LEVEL (78-89)								
Level of Intent	B	Std. Error	Wald	df	Sig.	Exp(B)	Lower	Upper
Intercept	-0.019	1.623	0.000	1	0.991			
Teachers Attitude About PWD	0.043	0.033	1.679	1	0.195	1.043	0.978	1.113
% of SWD in the school	-0.060	0.050	1.439	1	0.230	0.942	0.854	1.039
% of Students with Econ Disadvantage	-0.007	0.012	0.356	1	0.551	0.993	0.969	1.017
Parents Attitude about PWD	-0.019	1.623	0.000	1	0.991	1.053	1.002	1.106
[Integration_Binary=0]	-1.973	0.452	19.026	1	0.000	0.139	0.057	0.337
[Integration_Binary=1]	0.000			0				
[Gender=1]	-0.975	0.303	10.388	1	0.001	0.377	0.208	0.682
[Gender=2]	0.000			0				
[External_Exposure_Binary=0]	-0.793	0.318	6.226	1	0.013	0.453	0.243	0.844
[External_Exposure_Binary=1]	0.000			0				
[Interaction_Binary=0]	0.637	0.363	3.084	1	0.079	1.890	0.929	3.848
[Interaction_Binary=1]	0.000			0				
[Grade=3]	-0.454	0.555	0.669	1	0.413	0.635	0.214	1.885
[Grade=4]	-0.426	0.354	1.444	1	0.230	0.653	0.326	1.308
[Grade=5]	0.000			0				
[Race=1]	0.153	0.411	0.138	1	0.710	1.165	0.520	2.609
[Race=2]	0.432	0.669	0.417	1	0.518	1.541	0.415	5.720
[Race=3]	1.155	0.642	3.240	1	0.072	3.174	0.902	11.162
[Race=4]	0.767	0.888	0.746	1	0.388	2.154	0.378	12.291

Level of Intent	B	Std. Error	Wald	df	Sig.	95% C.I. for Exp(B)		
						Exp(B)	Lower	Upper
HIGH LEVEL (90-105)								
Intercept	-3.353	1.883	3.171	1	0.075			
Teachers Attitude About PWD	0.093	0.036	6.508	1	0.011	1.097	1.022	1.178
% of SWD in the school	-0.063	0.056	1.258	1	0.262	0.939	0.841	1.048
% of Students with Econ Disadvantage	0.008	0.014	0.364	1	0.546	1.008	0.981	1.037
Parents Attitude about PWD	0.066	0.030	4.834	1	0.028	1.068	1.007	1.133
[Integration_Binary=0]	-2.798	0.823	11.561	1	0.001	0.061	0.012	0.306
[Integration_Binary=1]	0.000			0				
[Gender=1]	-0.810	0.360	5.055	1	0.025	0.445	0.219	0.901
[Gender=2]	0.000			0				
[External_Exposure_Binary=0]	-1.142	0.372	9.451	1	0.002	0.319	0.154	0.661
[External_Exposure_Binary=1]	0.000			0				
[Interaction_Binary=0]	0.192	0.441	0.190	1	0.663	1.212	0.511	2.875
[Interaction_Binary=1]	0.000			0				
[Grade=3]	-0.797	0.673	1.402	1	0.236	0.451	0.121	1.685
[Grade=4]	-0.591	0.420	1.978	1	0.160	0.554	0.243	1.262
[Grade=5]	0.000			0				
[Race=1]	0.007	0.497	0.000	1	0.990	1.007	0.380	2.666
[Race=2]	-0.128	0.802	0.026	1	0.873	0.879	0.183	4.237
[Race=3]	0.899	0.725	1.537	1	0.215	2.457	0.593	10.180
[Race=4]	0.579	1.060	0.299	1	0.585	1.785	0.223	14.261
[Race=5]	0.000			0				

Table 25- Likelihood Ratio Tests for the Initial Model

Likelihood Ratio Tests				
Effect	Model Fitting Criteria	Likelihood Ratio Tests		
	-2 Log Likelihood of Reduced Model	Chi-Square	df	Sig.
Intercept	1340.367 ^a	.000	0	.
Teachers Attitude About PWD	1351.556	11.190	3	.011
% of SWD in the school	1342.436	2.070	3	.558
% of Students with Econ Disadvantage	1345.480	5.113	3	.164
Parents Attitude about PWD	1346.483	6.117	3	.106
Integration_Binary	1377.066	36.700	3	.000
Gender	1355.733	15.366	3	.002
External_Exposure_Binary	1350.695	10.328	3	.016
Interaction_Binary	1344.885	4.518	3	.211
Grade	1345.029	4.662	6	.588
Race	1349.904	9.538	12	.656

The chi-square statistic is the difference in -2 log-likelihoods between the final model and a reduced model. The reduced model is formed by omitting an effect from the final model. The null hypothesis is that all parameters of that effect are 0.

- a. This reduced model is equivalent to the final model because omitting the effect does not increase the degrees of freedom.

The parameter estimates, presented in table 24, offer a graphic, if not confusing, output for the MLR for the initial model. Landau and Everitt (2004) explain that in this SPSS output, the “B” column represents the estimated log odds ratio; the “Sig.” column represents the p-value for testing whether the variable is significantly associated with intent to include and the “Exp(B)” column represents the odds ratio. In exploring these values, we find that for children who expressed a low level of intent to include, there were three variables significantly associated. The most significant variable (*Teachers Attitude*) had an odds ratio of 1.083 ($p=.019$), which indicates that this variable increased the odds of this level of intent to include by 1.1 (or 10%). The next significant variable (*Race=3; Hispanic*) had an odds ratio of 4.070 ($p=.030$), which indicates that this variable increased the odds of a student reporting this level of intent to include by 4.1 (or 310%). The final significant variable (*External Exposure*) had an odds ratio of .527 ($p=.046$), which indicates that this variable decreased the odds of this level of intent to include by .47 (or 13%).

The remaining two levels of intent to include (*Moderate level* and *High Level*) each had four and five statistically significant variables associated with their respective levels of intent to include. Each of these levels was highly associated with variables Parents Attitudes, Integration, Gender and External Exposure. The moderate level of intent to include was also significantly associated with Teachers attitudes. The interpretation of each variables statistical significance and odds ratio can be interpreted as was done with the lowest level of intent to include. Each of these variables used the last level presented in each variable, in other words the lowest level of intent to include (*No Intent to Include*) is used as the referent group for the dependent variable.

The Likelihood Ratio Tests output (Table 25) offers information on the relative impact that each variable has on the initial MLR model. Clearly, the variables Teachers Attitude (Chi-

Square= 11.190; p= .011), Integration (Chi-Square= 36.70; p= .001), Gender (Chi-Square= 15.366; p= .002) and External Exposure (Chi-Square= 10.328; p= .016) are all statistically significant and should be retained for the revised model.

Table 26 is presented to explore the pseudo R squared statistic. As identified earlier, this table reflects the approximation of the R squared statistic and is interpreted to identify the models ability to explain the variance in the dependent variable. Using the Nagelkerke statistic, this initial model produced a pseudo R square value of .185. In other words, this initial model was able to explain 18.5% of the variance found in the dependent variable. Several variables, which were theoretically indicated in the initial model, were found to be statistically insignificant in their impact on the dependent variable (*intent to include*). Several revised models were conducted to remove statistically insignificant variables. The remaining variables constitute the revised and final and most parsimonious model.

Table 26- Pseudo R-Square for the Initial Model

Pseudo R-Square	
Cox and Snell	.170
Nagelkerke	.185
McFadden	.075

Revised MLR Model

The revised model was conducted by removing all of the statistically insignificant variables and is presented as an alternative model. The first output table (27) explores the model fitting information for this revised model. This table indicates that the revised model is

statistically significant from the null (Chi Square= 81.578; p= .001) and therefore warrants further exploration.

Table 27- Model Fitting Output for the Revised Model

Model Fitting Information				
Model	Model Fitting Criteria	Likelihood Ratio Tests		
	-2 Log Likelihood	Chi-Square	df	Sig.
Intercept Only	638.316			
Final	556.738	81.578	12	.000

In table 28 and table 29, output data is presented to offer information about the relative contributions of these variables to the model. Table 28 presents the impact of each level of these variables and table 29 confirms that the aggregated impact of each variable remains statistically significant. In exploring these values, we find that for children who expressed a low level of intent to include, there were two variables significantly associated. The most significant variable (*Teachers Attitude*) had an odds ratio of 1.081 (p= .014), while the other variable (*External Exposure*) had an odds ratio of .534 (p= .045). The moderate level of intent to include had a statistically significant association with all of the variables except Teachers Attitude and all of the variables were statistically significant in their association with a high level of intent to include SWD.

Table 28- Parameter Estimates for the Revised Model

		Parameter Estimates					5% Confidence Interval for Exp(B)		
Levels of Intent		B	Std. Error	Wald	df	Sig.	Exp(B)	Lower Bound	Upper Bound
Low Level of Intent Include (66-77)	Intercept	-1.140	1.205	.894	1	.344			
	Teachers Attitude About PWD	.078	.032	6.071	1	.014	1.081	1.016	1.151
	[Integration_Binary=1]	-.225	.335	.451	1	.502	.799	.414	1.539
	[Integration_Binary=2]	0 ^b	.	.	0	.	.	.	.
	[Gender=1]	-.329	.298	1.219	1	.270	.720	.401	1.291
	[Gender=2]	0 ^b	.	.	0	.	.	.	.
	[External_Exposure_Binary=0]	-.627	.313	4.025	1	.045	.534	.289	.986
[External_Exposure_Binary=1]	0 ^b	.	.	0	.	.	.	.
Moderate Level of Intent to Include (78-89)	Intercept	1.239	1.169	1.123	1	.289			
	Teachers Attitude About PWD	.037	.031	1.425	1	.233	1.038	.976	1.103
	[Integration_Binary=1]	-1.699	.379	20.118	1	.000	.183	.087	.384
	[Integration_Binary=2]	0 ^b	.	.	0	.	.	.	.
	[Gender=1]	-.933	.295	10.005	1	.002	.393	.221	.701
	[Gender=2]	0 ^b	.	.	0	.	.	.	.
	[External_Exposure_Binary=0]	-.749	.309	5.853	1	.016	.473	.258	.868
[External_Exposure_Binary=1]	0 ^b	.	.	0	.	.	.	.
High Level of Intent Include (90-105)	Intercept	-1.510	1.312	1.325	1	.250			
	Teachers Attitude About PWD	.083	.034	5.946	1	.015	1.087	1.016	1.162
	[Integration_Binary=1]	-2.651	.777	11.654	1	.001	.071	.015	.323
	[Integration_Binary=2]	0 ^b	.	.	0	.	.	.	.
	[Gender=1]	-.759	.352	4.638	1	.031	.468	.235	.934
	[Gender=2]	0 ^b	.	.	0	.	.	.	.
	[External_Exposure_Binary=0]	-1.121	.363	9.539	1	.002	.326	.160	.664
[External_Exposure_Binary=1]	0 ^b	.	.	0	.	.	.	.

a. The reference category is: No Intent (< or = to 65).

b. This parameter is set to zero because it is redundant.

Table 29- Likelihood Ratio Tests for the Revised Model

Likelihood Ratio Tests				
Effect	Model Fitting Criteria	Likelihood Ratio Tests		
	-2 Log Likelihood of Reduced Model	Chi-Square	df	Sig.
Intercept	556.738 ^a	.000	0	.
Teachers Attitude About PWD	568.855	12.117	3	.007
Integration_Binary	600.384	43.645	3	.000
Gender	571.960	15.222	3	.002
External_Exposure_Binary	567.006	10.268	3	.016

The chi-square statistic is the difference in -2 log-likelihoods between the final model and a reduced model. The reduced model is formed by omitting an effect from the final model. The null hypothesis is that all parameters of that effect are 0.

- a. This reduced model is equivalent to the final model because omitting the effect does not increase the degrees of freedom.

Table 30 is presented to explore the pseudo R squared statistic. Using the Nagelkerke statistic, this initial model produced a pseudo R square value of .140. In other words, this initial model was able to explain 14% of the variance found in the dependent variable. This output reflects the most parsimonious model fit for the data presented.

Table 30- Pseudo R-Square for the Revised Model

Pseudo R-Square	
Cox and Snell	.129
Nagelkerke	.140
McFadden	.055

Result Summary

In closing, this chapter described survey data from three stakeholders (teachers, students and parents) and the subsequent analysis explores their views related to inclusion. The data analysis provides insight into the impact of various inclusion modalities on the perceptions of the various stakeholders. The questions, which guided this study, were: 1. Does the level of service delivery impact a nondisabled child's intent to include their peers with disabilities? 2. What Factors / covariates lend significantly to an MLR model regarding a student's intent to include another SWD? The final chapter will address these two questions and will explore various insights presented in the analysis, as well as contributions this study may bring to efforts to address policy of social inclusion versus social exclusion. Additionally, this final chapter will offer possible future research needs based on the findings of this study or information that this study was unable to find.

CHAPTER SIX DISCUSSION

The data collected in this study offer several key findings, presented in this chapter, relating to the specific research questions and hypothesis proposed. Beyond the specific information sought for this study, some interesting trends emerged. Of the 593 students who returned surveys, 89% of children (n= 528) reported at least a low level of positive intent to include SWD. This finding seems to support the basic premise of the policy of inclusion in that overwhelmingly, children are willing to embrace SWD despite their various differences.

Surprisingly, the attitude of the adults in these students' lives (*parents* and *teachers*) did not hold consistent with the student's reported agreement with inclusion. Only 70% of parents (n= 415) reported at least a low level of acceptance of people with disabilities while surprisingly only 50% of the teacher (n= 22) reported at least a low level of acceptance for people with disabilities. Many more teachers were neutral on the issue (18%; n= 8) than were parents (7%; n= 44) and this may suggest that teachers have more flexibility on this issue. This point is reinforced by the presence of high level of positive (1%; n= 7) and negative (2.4%; n= 14) acceptance scores reported by parents and there were none of these extreme scores presented by teachers. Despite the variation between teachers and parents, the trend appears clear that the students report overwhelmingly higher positive agreement with inclusion of SWD than their adult care givers. This may serve to reinforce the use of inclusion strategies in the classroom, which take advantage of the children's willingness to accept their peers with disabilities.

Implications

This study presents several targeted research questions and accompanying hypothesis to explore the impact of service delivery models in the classroom and their impact on nondisabled student's intent to include their peers with disabilities. These research questions and accompanying hypothesis will be presented and discussed in this section of the paper.

ANOVA Data:

RQ1: Does the level of service delivery impact a nondisabled child's intent to include their peers with disabilities?

H1a: Children in integrated models of service delivery (*full inclusion & partial inclusion*) will express higher levels of intent to include their peers with disability than children with no inclusive interventions.

This hypothesis explores the impact of one of the independent variables (*integration*) on the dependent variable (*intent to include*). The data, presented in table 13, suggests that inclusion, whether partial (less than 79 percent of the time) or full-time (79 percent or more of the school day), is statistically significant in its impact on a student's intent to include SWD. This finding serves to support the use of inclusion as a tool to promote the integration of SWD and thus allows this researcher to retain this hypothesis.

H2a: Children in models of service delivery with an education intervention that promotes interaction with SWD will express higher levels of intent to include their peers with disability than children with no inclusive interventions.

This hypothesis explores the impact of one of the independent variables (*interaction*) on the dependent variable (*intent to include*). The data, presented in table 16, suggests that educational interventions designed to promote interaction with SWD, offered mixed results in relation to its impact on a student's intent to include SWD. The data suggests that there is a

difference between the group that was offered the lowest level of education (*between 1 and 30 minutes a week*) and the highest level of education (*91 PLUS minutes per week*). This finding may indicate that this is the optimal time frame to provide this intervention and that beyond 30 minute there is marginal or detrimental return. At any rate, this data suggests that this hypothesis cannot be retained in favor of the null.

H3a: Children in models of service delivery with a combination of an education intervention that promotes interaction with SWD in the context of an integrated model of service delivery (*full inclusion or partial inclusion*) will express higher levels of intent to include their peers with disability than children with no inclusive interventions.

This hypothesis explores the interaction impact of both of the independent variables (*integration and interaction*) on the dependent variable (*intent to include*). Whereas the first two hypothesis explored the main effect of the independent variables, this hypothesis explores the impact they have when combined. The data, presented in table 20, again affirms that inclusion has a statistically significant main effect and that the education intervention does not. This table also suggests that the interaction of these two variables does present significant impact on a student's intent to include SWD. This finding serves to indicate that the education intervention alone may not be significant but when paired with inclusion it serves as a powerful tool to promote nondisabled students intent to include SWD and thus allows this researcher to retain this hypothesis.

Regression Data

RQ2: What factors / covariates lend significantly to an MLR model regarding a student's intent to include another SWD?

A Multinomial Logistic Regression (MLR) model was presented to explore the hypothesized relationships for research question two. An effort was made to follow the stepwise progression of building and initial model, exploring the relationships of these variables and then revising the initial model (Hosmer & Lemeshow; 1989). The initial model explored the interactions of several key variables, presented in table 22, and their relative impact on a students reported intent to include SWD. An alternative and more parsimonious model was revised from this initial model.

H4a: The independent variable (*Integration*) will have a positive impact on students reported level of intent to include.

H5a: The independent variable (*Interaction*) will have a positive impact on students reported level of intent to include.

The results of both the initial and revised models confirm that the variable *Integration* has significant impact on student's intent to include SWD, but do not support the statistical significance of *Integration* in the model (Indicated in table 25). This finding serves to indicate that serves as a powerful tool to promote nondisabled students intent to include SWD and thus allows this researcher to retain this hypothesis (H4a).

These two variables have a positive impact on the dependent variable but the confident interval for *Interaction*, reflected in table 31, crosses the number one and is therefore statistically insignificant. In other words, though the odds ratio indicates that *Interaction* has a dramatic impact of, on average, a 62% increase in the likelihood that a child will respond with a positive level of intent to include; there is also the statistical possibility that the child might not, as indicated in the lower bound confidence intervals related in table 31. As a result, this hypothesis (H5a) cannot be retained.

Table 31- Parameter Estimates for Interaction in the Initial Model

Level of Intent	B	Std. Error	Wald	df	Sig.	95% C.I. for Exp(B)		
						Exp(B)	Lower	Upper
<i>Low</i>	0.562	0.361	2.431	1	0.119	1.755	0.865	3.559
<i>Moderate</i>	0.637	0.363	3.084	1	0.079	1.890	0.929	3.848
<i>High</i>	0.192	0.441	0.190	1	0.663	1.212	0.511	2.875

Another finding of note is the apparent curvilinear relationship between the variables *Interaction* and *Intent to Include*. As related in the output in table 16, Integration seems to have a statistically significant relationship between the second level (1 to 31 minutes; mean score of 80.85) and the fifth level (91 plus minutes; mean score of 77.38); but there is statistically no difference between the other levels in the analysis. The results offer a confusing picture of the impact of *Interaction*. Arguably, this data indicates that intervention to promote interaction might best be presented in shorter timeframes and this interpretation runs consistent with the developmental aptitude of the students surveyed. Further research is required to explore this data discrepancy.

H6b: The student level control variables (*Gender, Grade, Race & External Exposure*) will have a positive impact on students reported level of intent to include.

This hypothesis explores the impact of the student level control variables (*Gender, Grade, Race & External Exposure*) on the dependent variable (*intent to include*). The data, presented in table 25, indicates that a student’s *gender* and their *external exposure* to individuals with disabilities in their home setting were statistical significance in the initial model. The data presented in table 29 confirms that student’s *gender* and their *external exposure* to individuals with disabilities in their home setting remained significant in their impact on a student’s intent to include SWD. Despite these findings, this data suggests that this hypothesis (H6a) cannot be

retained in favor of the null since a student's *grade* and *race* was not statistically significant in the model.

H7b: The community level control variables (*Teachers Attitude & Parents Attitude*) will have a positive impact on students reported level of intent to include.

This hypothesis explores the impact of the community level control variables (*Teachers Attitude & Parents Attitude*) on the dependent variable (*intent to include*). The data, presented in table 25, indicates that a *teacher's attitude* is the only community level control variable that has statistical significance in the initial model. The data presented in table 29 confirms that *teacher's attitude* remains significant in its impact on a student's intent to include SWD. Specifically, the data suggests that as a *teacher's attitude* towards PWD increases in a positive direction, so too does the students intent to include SWD. Despite this finding, this data suggests that this hypothesis (H7a) cannot be retained in favor of the null since *parental attitude* was not statistically significant in the model.

H8b: The school level control variables (*% of SWD & % of Economically Disadvantaged*) will have a positive impact on students reported level of intent to include.

This hypothesis explores the impact school level control variables (*% of SWD & % of Economically Disadvantaged*) on the dependent variable (*intent to include*). The data, presented in table 25, indicates that both school level control variables were insignificant in the model and as such this hypothesis cannot be retained in favor of the. This finding might offer some suggestions for policy makers in those efforts made to promote inclusion to a seemingly accepting group of students does not meet any particular challenges towards implementation on the basis of economic disadvantage. Also, there does not seem to be a "critical mass" influence based on the percentage of SWD that attend the school. According to these data, children seem to

express positive levels of intent to include SWD despite the influence of these socioeconomic differences. Future research might explore the impact of these school level variables (% of SWD & % of Economically Disadvantaged) to assess if there is a potential impact, at the individual student level, as indicated in other public policy literature.

Implications for Public Policy

Classroom inclusion serves as a microcosm of a larger public policy issue regarding the social inclusion or social exclusion of individuals on the basis of classification. A comprehensive effort at public policy analysis will explore the policies impact on three key outcomes: effectiveness, efficiency and equity (Dye, 2002). In practice, policy analysis efforts largely center on issues of effectiveness (*does the policy work*) and efficiency (*how well does the policy work*) while the issues of equity (*how “fairly” does this policy treat those involved*) trail in a distant third. In the context of this study, equity issues of classroom inclusion take the role of prime importance.

Ethical frameworks, including Mills construct of utilitarianism and Rawls concept of social justice, can serve to guide policy makers on the issue of equity (Guttman, 1995). Rawls, arguably the most important modern day American philosopher, presents that a civil society is governed by a Social Contract. He argued that individuals theoretically enter into this contract from an “original position” with a “veil of ignorance”. These assumptions ensure that individuals contract with each other in a way that they enter into this contract to best represent the needs of the collective society and not solely for individual gain (Rawls, 1971). He used the concept of a social contract to frame his belief in two guiding principles. The first, the Liberty Principle, indicates that all people have the undeniable right to freedom and the second; the Difference

Principle (*also known as the MaxiMin principle*) directs that society should act in a way that gives the maximum benefit to those with the least resources.

Rawlsian redistribution of resources frames social / moral obligations which ensure that one never violate the Liberty Principle or Difference Principle. Rawls views “Justice as Fairness” and in this context, the policy of classroom inclusion would grant the maximum benefit to those with the least resource despite differences in gender, ethnicity and ability or disability (Wishon & Geringer, 2005; Guttman, 1995). In other words, children with limited resources have a right to expect the maximum benefits available through inclusion in an effort to maintain Rawls principles of liberty and difference.

Now more than fifty years after the racial integration of American schools, some students, despite the lessons learned through the turmoil of Brown vs. the Board of Education, remain excluded from these experiences not on the issue of race but on the basis of their disability. Recent debates on this issue arose over the educational benefits of diversity in college classrooms. Specifically, the policy decision sought to use race as a variable in higher education admissions decision. This policy decision was aimed at offering students the right to access an integrated education through inclusion and not merely on the co-existence of racial difference in the same setting (Gurin, Nagda, & Lopez, 2004). Inductively, micro-level policy analysis of social inclusion in the classroom, serves to feed macro-level study of social inclusion and social exclusion in a variety of settings.

Social exclusion has been presented as a “...multi dimensional concept, which involves economic, political, cultural and other special aspects of disadvantage and deprivation, all of which have a role in excluding individuals and groups from participation in society (Kamerma, 2005).” As such, practices of social exclusion offer complex public policy dilemmas, which

often involve innovative policy solutions. Efforts to promote classroom inclusion and integration, which have progressed from the domain of gender to race and then on to disability, offer clear examples of public policy initiatives that endeavor to promote the notion of equity and social justice amongst children. Interventions geared to improve social inclusion and mitigate social exclusion have progressed beyond the classroom and into nearly all aspects of public policy including the domains of healthcare (*healthcare administration*), poverty (*social work*), “street gang” involvement (*criminal justice*) and education (*public administration*) (Buchanan, 2005). The remainder of this section will explore these impacts.

Healthcare

In the context of service provision for elderly individuals who experience vision impairment, Percival and Hanson (2005) offer that socially inclusive policy initiatives work to remove or minimize the impact of physical, procedural or social barriers that prevent equitable access to care and services. Using survey data from four hundred individuals over 55 years of age who were experiencing sight loss, they identified that policy efforts supporting the use of a coordinated and collaborative social service delivery system served to reduce individuals experience of social exclusion. Specifically, they purport that the policy efforts of the Association of Directors of Social Services, which embraced an early detection of needs combined with proactive and holistic assessments, promoted peer support groups and resource centers to involved participants in care. This involvement was joined by psychological support, access to information and social contact, which reinforced the notion of social inclusion for this elderly population.

As with services for vision, healthcare offers a unique opportunity to assess the impact of policy initiatives, which redress socially exclusive practices. Weiss and Ramakrishna (2006) offer that social exclusion in healthcare would encompass "...a social process or related personal experience characterized by exclusion, rejection, blame, or devaluation that result from experience or reasonable anticipation of an adverse social judgment about a person or group identified with a particular health problem (p. 536)." Dating back to biblical references, disease processes, such as leprosy and its modern day equivalents of AIDS and HIV, carry with them a stigma of prejudice that empowers acts of social exclusion.

A recent study reviewed 214 qualitative interviews with 52 HIV-positive individuals who were active illegal drug users. They conducted an analysis using stigma and fear of disclosure as stress predictors to "...explain working tensions between efforts to develop social relationships on the one hand, and attempts to safeguard health through adherence on the other (Ware, Wyatt, & Tugenberg, 2006, p. 904)." They found that stigma (a socially excluding process) fueled marginalization which in turn lead in large part to a sense of loneliness and a desire to be included. Public policy initiatives, such as disease specific peer support groups, access to information and education, open communication and social marketing (to enhance compassion and reduce blame), could be effectively used to promote efforts of social inclusion in this population (Weiss and Ramakrishna, 2006).

Poverty

A classic marker for social exclusion has been the division of groups of people on the basis of class. Financial strata often define the practice of classism. Rawls indicates that poverty is a function of a societal failure to maintain the principle of difference. In the United Kingdom,

the Social Exclusion Unit (1999) indicates, “Social exclusion happens when people or places suffer from a series of problems such as unemployment, discrimination, poor skills, low incomes, poor housing, high crime, ill health and family breakdown.”

Often this process is defined as the cycle of poverty which Kangas and Palme (2000) point out can lead to a series of events, which serve to support and maintain the status of poverty for most individuals. In their multinational study, Kangas and Palme found mixed results when exploring the impact of various policy efforts to thwart poverty. As a positive impact, they found that “family-related poverty is lowest in countries that have combined cash benefits with public child-care services that facilitate parent’s participation in the labor market (p.335).” This research tends to support the position that redistributive justice policy efforts aimed at bolstering need with a financial subsidy combined with social inclusion efforts to bring the individual back into the labor market tend to serve the best outcomes for the individual and the community at large.

In an interesting social experiment, Beest and Williams (2006) explored how much people would be willing to give up social inclusion in exchange for financial gain. In an alternative version of the “pay to play” scenario, the researchers used a socially engaged game of “cyberball” to test how important it was for participants to receive socially included play or to receive cash rewards or cash penalties. To their surprise, even with a contrived situation with manipulated outcomes, Beest and Williams found that participants reported that they “...felt worse when given no positive attention than when given punitive attention (p. 918).” Clearly this is not an experiment regarding public policy, but this study indicates that people thrive on social inclusion arguably more than they do with financial reward or punishment. This study

could be used to inform policy makers on the importance of policy efforts that promote social inclusion and thus support efforts embracing social justice.

Street Gang Involvement

The role and function of gangs serves as an outlet for adolescents in search of social inclusion and acceptance. Adolescence has long been studied as a developmental stage where young adults strive to “find themselves” through their academic, social and familial interactions (Kroger, 2000). Gangs and gang involvement offers its members a sense of community and family which are attractive to an adolescent seeking inclusion (Wilson, 2000). The adolescent’s effort to identify “who they are” is characterized by numerous theorists as an emotionally and physically draining task (Hill, Howell, Hawkins, & Battin-Pearson, 1999). Erik Erikson’s developmental theory looks at human development from birth to death in the context of several life conflicts or stages. His work is a basic concept in the field of social work and psychology (Kroger, 2000).

The period of adolescence is hallmarked by uncoordinated behavioral and social movements which are an external reflection of the inner chaos caused by puberty and the bodies physical growth and development (Piquero, 2001). The ultimate goal of the life stage is to develop a sense of personal identity and Erikson indicates that this process has an individually defined start point, length of duration and end point. His theory points to issues which can assist the adolescent to successfully navigate this time and road blocks which hinder and delay development. Erik Erickson, whose work continues to influence current thinking, is known for his description of the psychosocial stages of human development (Kroger, 2000). His theory states that the adolescent psychosocial stage is characterized by the conflict of “identity versus

role confusion”. At this stage, adolescents are in search of an identity that will lead them to adulthood. Adolescents make a strong effort to answer the question "Who am I?" Erickson's stages are developed in a sequential order with successive attainment of stages as the basis for movement on to the next stage. If the child overcomes earlier conflicts they are prepared to search for identity.

In the context of criminal justice research, Terrie Moffitt has developed a developmental theory which addresses adolescents and their identity formation from the perspective of delinquent behavior as a mode of individuation (Piquero, 2001). Moffitt's developmental theory looks at delinquent behavior as a means for the adolescent to identify themselves to their peers and their family (Moffitt, Harrington, & Milne, 2002). Moffitt's developmental theory states that most teenagers are likely to commit antisocial acts as a way to build social status and to reinforce their transition to adulthood by acting out adult oriented behaviors. This theory states that these acting out behaviors are a norm of all adolescent development (Donker, Van der Laan, & Verhulst 2003). Moffitt divides adolescents into two distinct subgroups. The “adolescent-limited offenders” become involved in these behaviors only temporarily while the “life-course-persistent offenders” develop chronic patterns of antisocial behavior (Moffitt, Harrington, & Milne, 2002). This later group is more susceptible to the influences of gang recruitment (Hill, Howell, Hawkins, & Battin-Pearson, 1999).

The field of criminal justice has used control theory to explain gang involvement by “suggesting that entry into deviant peer groups is a function of a lack of social control experienced by youth (Hill, Howell, Hawkins, & Battin-Pearson, 1999) .” When coupled with developmental theory, the literature offered by the criminal justice discipline adds considerable depth to the impact of social inclusion on the adolescent population through the lens of gang

involvement. Public policy initiatives that serve to promote healthy alternatives to street gang involvement serve to support a healthy synergy of policies promoting social inclusion.

Education

In contrast to Rawls focus on social justice, the utilitarian perspective, sponsored by philosophers such as Mill and Bentham, argues that the worth of an action is measured by its overall contribution. Operating from a utilitarian perspective, policy efforts, which demonstrate cost savings or more adept use of scarce public resources, offer policy options with easily commodified public gain. These policy changes are easily marketed and thus easily adopted. On the contrary, policy changes which aim to better issues of equity and fairness often come with little tangible financial return and are therefore more difficult to commodify in terms of “net contribution”. The struggle between the utilitarian view of policy change and the Rawlsian “right” of social justice offers a clear line for a policy battle.

In this context, public policy options which are aimed to promote the inclusion of children of different gender, different race and different ability levels may not offer the most effective or the most efficient means of education. If one frames the question in the context of “how best (efficiency and effectiveness) to educate the children” then one may look more favorably at the policy options of segregated schooling. In segregated schooling, educators maximize the use of resources by ensuring a more homogenous mix of students. This mix will promote efficiencies of adaptive equipment, trained staff, student language and culture, which serves to streamline the education process.

As seen in much of the organizational literature of the industrial revolution, processes that routinize functions become more efficient and with continued process improvements these

efficient practices can yield more effective outcomes (Scott, 2003). If this were so, then operating from a utilitarian perspective one may ask, “Why would these practices not apply to the education of children?” Rawls would argue that the answer lies in an equally important though often overlooked issue regarding the equity or fairness of the practice. Rawls might present that the question should arguably shift from solely an issue of effectiveness and efficiency to ask the additional question, “Is segregated education fair?” On a broader basis, the policy question could be raised to asked, “Is social exclusion fair?”

The risks of social exclusion have been well documented through the public policy literature. Specifically, the literature indicates that efforts to promote social inclusion in the areas of healthcare provision, poverty assistance, alternatives to street gang involvement and classroom inclusion, serve as a backdrop for the Rawlsian position of social justice and equity. Classroom inclusion for SWD stands as one specific area of interest in the larger question about the impact social exclusion has on society. As a microcosm for the larger society, the classroom serves as an excellent opportunity to explore the impact of social inclusion on the stakeholders involved. This study is presented to add to this body of knowledge and could also serve to support the larger effort to promote social justice through policies of social inclusion.

Relationship of Results to Theory

This study is designed to build on the existing knowledge regarding the impact of inclusion on the various stakeholders in the education continuum. Additionally, this study adds to the overall body of knowledge relating to social inclusion and the untoward effects of social exclusion. Finally, this study continues to build on the prior knowledge related to the Theory of

Planned Behavior (TPB) and its ability to predict the intention of individuals to behave in certain situations.

As stated earlier, Azjen (1988) postulated, through the TPB, that personal attitude, normative influences and perceived control beliefs combine to drive one's intent to act. In the context of this study, self-reported survey data is used to define the individual student's intent to include their peers with disabilities. Prior research (Roberts & Smith, 1999) has linked the outcome of TPB survey methodology to the inclusive behavior. In other words, their research indicates that a student's positive disposition to intent to include was closely correlated with their actual inclusive behavior.

This study presents data, which moves beyond this positive correlation. By applying the continuum of service delivery models to this equation, this study looks to broaden the use of TPB's predictive power in relation to classroom inclusion. The data suggests that high correlation values, presented in table 11, of the constructs indicated by the TPB (*Attitude, Normative Beliefs and Perceived Behavioral Control*) offer compelling support for the application of TPB in this setting. Given the controversial nature of its inclusion in the model, these correlation values also make a strong comment on how important the Perceived Behavioral Control (.828) construct has on the theory.

Implications for Future Research

The purpose of research is to add to a body of knowledge by applying a systematic set of rules to the collection of data. The interpretation of this data should fuel a cybernetic loop whereby research initiates from theory, which informs practice, which fuels theory and so on (Nash, Munford & Odonoghue, 2005). This study stems from the a theoretical framework and

seeks to test TPB, but stops short of fully informing the reader of the causal impact of one's intent to include others as there is no measure for how the children involved in this study actually behaved. Exploring the predictive value of TPB in the context of classroom inclusion would enhance future research in this area.

The focus of this study was to provide objective quantified data to explore the impact of inclusive efforts (service delivery models) on the intent of students to include their peers with disabilities. In an effort to differentiate quantitative research from qualitative research, Yegidis and Weinbach (2006) offer several advantages of quantitative research methods, which include careful measurement, representative samples, the possibility of increased control of other variables through randomization, standardized data collection methods and data interpretation through statistical analysis. Given these relative advantages, quantitative methods serve an important role in informing the acquisition of knowledge.

Despite these advantages, many researchers have come to appreciate the depth of knowledge obtained through the addition of another layer of qualitative data to compliment the finding of quantitative data. Yegidis and Weinbach (2006) point out that qualitative data can help one with understanding participant's experience from his or her perspective. In the context of this study, qualitative data could help to better understand the perceptions of the various students and thus provide a more robust view of student relationships inside the classroom. Future research in this area could benefit from this additional aspect of mixed method, combined quantitative and qualitative, knowledge.

The complexity of analytic design is limited not by the creativeness of the researcher but by the limits of the data itself. As the complexity of the data rises, so to does the power of the statistics used to interpret the results. This study seeks to extract meaning from categorical and

ordinal levels of data. To that end, using an ANOVA along with logistic regression offers a robust form of analysis although more robust measures remain available.

Specifically, interval and ratio levels of data could call for multiple regression functions as well as hierarchical regression. In a similar way, future research could benefit from the use of Confirmatory Factor Analysis (CFA) and multi-variate regression in the assessment of a Covariance Structural Model (CSM). Confirmatory Factor Analysis (CFA) is used to explain the variation and covariation of a set of observed variables (indicators) as a function of an unobserved (latent) variable (Wan, 2002). In this way CFA is used as an analytical technique, which explores the relationship between a latent variable and *several*, theoretically derived, indicators (Kline, 2005).

These relationships are graphically constructed as a measurement model. In using multiple indicators of measurement, CFA "... tends to reduce the effect of measurement error (as opposed to a single measurement indicator) on the accuracy of the results." (Kline, 2005, p.165) Multi-variate regression would then analyze a Covariance Structural Model (CSM) to explore and hopefully explain the relationships between the variables identified in the equation (Exogenous variables and Latent constructs with validated measurement models using CFA). In this way, higher levels of data would be used to offer a more powerful comment on the impact that various service delivery models has on students intend to include SWD.

Limitations

Aside from the basic limitations of quasi-experimental research (the absence of randomization in sample design), some study-specific limitations also exist. The primary limitation of this study lies in the lack of variation within the sample of schools included. This

study presents an exploratory methodology with a convenience sample. A stratified random sample would have improved the variability of school representation and thus allowed for a richer interpretation of the data.

Another limitation found with this study is that the sample was only taken of two counties in the Central Florida area. This issue casts a shadow over the generalizability (external validity) of the studies findings. Beyond a stratification of within county schools, the sample frame would have been strengthened by a larger sample, which was more representative of expanded counties. This sampling frame would have allowed for some increase power in discussion of the statewide school systems impact through service delivery models.

A key characteristic of experimental research designs versus quasi-experimental designs can be found in the manipulation of the independent variable. In the classic experimental design, the sample frame is randomized (both randomly selected and randomly assigned) and while the predictor variable(s) (independent variables) are controlled by the researcher. In this study, neither randomization nor researcher manipulated predictors were employed. The absence of these factors reduces the explanatory power of the research design.

An effort was made to collect data from various stakeholders through survey methodologies. These instruments were obtained largely from previously validated measures, which improves the study reliability and validity, however, this study employed modifications to these instruments and is limited by this attenuation. Future research in the area of classroom inclusion would benefit from a validation of these newly constructed measures or a return to the original instrumentation. It is also unclear, though theoretically indicated, what impact the combination of these instruments has on one another. There is the possibility that the items have some spillover effect on one another that could challenge the reliability of the data.

As previously stated, this study seeks to extract meaning from categorical and ordinal levels of data. Though the use of ANOVA and logistic regression are appropriate for this level of data, a more vigorous effort using higher levels of data (interval or ratio) could offer more explanatory power for future studies in this arena. In this study, the choice to use scales, which offered ordinal level data, was done by design. Beyond the relative advantages of higher levels of data, research designs, which seek to gain knowledge about seemingly controversial topics such as the inclusion of SWD, also run the risk of gathering high quantities of neutral data resulting from social desirability biases. In other words, offering this option allows the respondent to avoid answering the question all together by choosing the middle option in the scale. This obvious tradeoff must be considered in future research, which seeks to explore data related to potentially controversial topics.

Finally, descriptive statistics, presented in table 9, identifies that the survey data taken for this study largely reflects the responses of children involved in classrooms where some form of inclusion was taking place ($n= 512$) as opposed to those where no inclusion was involved ($n= 81$). This indicates two potential biases to the results of this data. The first and most obvious bias could come from the relatively small group of student who were experiencing no inclusion. In a small group such as this, a small fraction of this group's response could have a pronounced impact on the mean score. Secondly, and possibly less observable is the fact that this data may not reflect an accurate picture of the state of elementary schools. It may reflect a bias of the type of school that elected to participate in this study. As previously discussed, inclusion is a highly sensitive matter for school administrators and a convenience sample, as collected for this study, may offer an over inflated score of student intent to include as this sample is likely to include schools whose administrators feel they are "doing a good job with inclusion".

Summary and Conclusion

Despite the apparent limitations, this study offers a methodological process by which one can investigate the dynamic process of social inclusion through the microcosm of the elementary classroom. The application of the Theory of Planned Behavior provided a framework to explore the intentions of students to include their peers with disabilities. Prior research on the impact of inclusion is extensive, but literature on the impact of service delivery models on student's intent to include their peers with disabilities is less robust. This study serves to fill this gap in the literature.

The data suggests that several key constructs held significant in a model designed to predict the intent of a nondisabled student to include another SWD. Beyond the finding of the MLR model, the finding that inclusion (*partial* or *full*) lead to significantly higher levels of intent to include serves to bolster the belief that exposure to people of difference has a statistical and practical impact which support the further implementation of the policy of inclusion. This finding adds to the literature on public policy efforts that attempt to mitigate social exclusion and can be used to promote continue research agendas aimed at bridging this equity gap.

APPENDIX A VERBAL CONSENT FOR TEACHERS

The appendix section offers a sample of the instruments used in this study to collect data from the teachers, parents and students. These instruments have been included along with the augmented IRB forms used to secure consent from the participants.

Verbal Consent

(Telephone survey of educators)

Hi, my name is Mike Campbell. I am a second year PhD student at the University of Central Florida and we are doing a survey regarding the education of children with disabilities. The survey is really short and only takes about 5 minutes. I can only interview people who are 18 years of age or older. Are you at least 18?

(If yes, continue)

INTERVIEWER – Let me stress that your participation in this survey is completely voluntary and confidential. Do you have any questions you want to ask about the survey? Your classroom was chosen to participate in this survey because of the classroom setting in which you teach. You will not be identified by name in any document we produce. We are interviewing approximately 20 teachers in the central Florida area and your answers will be combined with everyone else's. You have the right to refuse to answer any question you want. You may also terminate the interview at any time.

INTERVIEWER – (If participant asks for more info) This survey will add information to help study the impact of classroom settings on student's perceptions of peers with disabilities. This is why we are doing the survey.

INTERVIEWER – start with the questions approved by IRB.

APPENDIX B TEACHERS AND PARENTS ATTITUDE SURVEY

Directions for the Teachers and Parents Attitude Survey:

Mark each statement in the box in the left margin according to how much you agree or disagree with it. Please mark every one. **Write:** +1 +2 +3 or -1 -2 -3

KEY

+3: I agree very much
+2: I agree pretty much
+1: I agree a little

-3: I disagree very much
-2: I disagree pretty much
-1: I disagree a little

1. _____ People with disabilities are usually friendly.
2. _____ People with disabilities can have a normal life.
3. _____ Very few people with disabilities are ashamed of their disabilities.
4. _____ People with disabilities do not become upset any more than normal people.
5. _____ People with disabilities do not worry anymore than anyone else.
6. _____ People with severe disabilities are harder to get along with than are those with minor disabilities.
7. _____ Most people with disabilities get discouraged easily.
8. _____ Most people with disabilities do not feel sorry for themselves.
9. _____ People with disabilities are not as self confident as physically normal persons.
10. _____ Most people with disabilities do not need special attention.

APPENDIX C CONSENT FORMS

March 6, 2007

Dear Parent/Guardian:

Your child's class has been selected to participate in a study that is being conducted for dissertation research through the University of Central Florida, College of Health and Public Affairs. Your child's identifying information has not been shared in any way with the researcher at this time. Your child was chosen because he/she meets the criteria for this study and you, as parent, are being offered the opportunity to have your child participate.

The research project involves an analysis of children's perceptions of students with disabilities. The researcher wants to document and write about how different classroom settings impact children's perceptions of students with disabilities. This information can be used to help educators best meet the needs of their wide variety of students educated in Florida's public schools. Your child will likely also feel good about assisting with this important research.

With your consent, you will be completing the accompanying survey and your child will be completing their survey in their class. The survey results will be collected and examined by a doctoral candidate (Mike Campbell) at the University of Central Florida. The surveys, once completed, will be placed in the self-addressed stamped envelope included in this packet and your child's survey information will also be placed in a sealed envelope in school. Once received, the survey information will be entered into the computer and will be destroyed soon after the research process is complete.

Your name, your child's name, the names of his/her teachers, and the name of your child's school will be kept confidential and will not be used in any report, analysis, or publication. The only identifying information that will be recorded will be descriptive information about your child's classroom. All identifying information will be replaced with alternate names or codes. You or your child will be allowed the right to refuse to answer any questions that might be uncomfortable, and you or your child may stop participating in this research at any time. Please complete the enclosed parental consent form and survey and seal and return it to your child's classroom teacher as your consent for your child's participation in this study.

You may contact me at 407-398-2981 or email at micampbe@nemours.org or my professor, Dr. Eileen Abel at 407-823-3967 or by email at eabel@mail.ucf.edu, for any questions you have regarding the research procedures. Research at the University of Central Florida involving human participants is carried out under the oversight of the Institutional Review Board (IRB). Questions or concerns about research participants' rights may be directed to the UCF IRB office, University of Central Florida, Office of Research & Commercialization, 12201 Research Parkway, Suite 501, Orlando, FL 32826-3246. The hours of operation are 8:00 am until 5:00 pm, Monday through Friday except on University of Central Florida official holidays. The telephone number for UCF's IRB office is (407) 823-2901 and/or 407-882-2276.

Thank you in advance for your participation in this study.

Sincerely,

Mike Campbell, LCSW;
Doctoral Candidate, University of Central Florida

APPENDIX D STUDENT SURVEY QUESTIONNAIRES

Student Survey

Thank you for taking time to fill out this survey. Your answers on these questions will be very helpful in teaching us how students in your classroom feel about each other. Everyone has their own feelings and no feelings are right or wrong so we ask that you answer the questions honestly and as best you can.

You will not have to give your name on these answers but we would like to know a little bit about you. Here are a few questions to get started.

Circle the correct answer: What **grade** are you in?

3rd

4th

5th

Circle: How many years **old are you?**

7

8

9

10

11

Circle: Which racial category best describes you? **Caucasian**

African American

Hispanic

Asian American

Other

Circle the correct answer: Are you a **BOY** or a **GIRL?**

BOY

GIRL

Circle the correct answer: **OUTSIDE OF SCHOOL,**

do you have any friends or family members

who **have a disability?**

YES

NO

NOT SURE

Directions: Circle the response to each statement provided according to how much you agree or disagree with it.

KEY

1.) **YES!**

2.) yes

3.) no

4.) **NO!**

1. My school should try to figure out a way for kids in wheelchairs to go on field trips with us.

YES!

yes

no

NO!

2. If I found out that someone I played with had mental retardation, I would still keep playing with them.

YES!

yes

no

NO!

3. I don't want a kid from the special ed class to sit next to me on the bus or on a field trip.

YES!

yes

no

NO!

4. I would like my class to go to go to camp on the same week that a kid with a handicap was there.

YES!

yes

no

NO!

5. I'm not friends with any of the kids who use wheelchairs.

YES!

yes

no

NO!

6. I think I could be good friends with a student in special ed classes.

YES!

yes

no

NO!

7. I wish I could make friends with a student who has a disability.

YES!

yes

no

NO!

8. I have played on the playground with a student who has mental retardation.

YES!

yes

no

NO!

9. Children with disabilities can come into my room at school for activities.

YES!

yes

no

NO!

10. If someone told me about a new TV show about kids with disabilities, I would watch it if I could.

YES!

yes

no

NO!

Please read the student descriptions that follow. Read about the student and decide how you feel about him / her. Then circle the place where he or she should work.

1. Work with me *in My Group*
2. Work *in Another Group* (with someone else)
3. Work *in No Group* (with no other students)
4. Work *Outside of Class* (in another class or room)
5. Stay *at Home* (an not come to school)

1. Stephen does not speak English as his primary language and cannot follow directions very well, and his teacher must tell him at least three what to do; even then Stephen might still not know what to do. He is unable to do his work and is failing all of his subjects.

My **teacher** thinks that I should say that the student should work:

In My Group	In Another Group	In No Group	Outside of Class	At Home
5	4	3	2	1

2. John has great student but has difficulty seeing. He is partially blind and unable to read from the blackboard. He is only able to read books with very large print. John wears a patch over his bad eye.

My **parents** think that I should say that the student should work:

In My Group	In Another Group	In No Group	Outside of Class	At Home
5	4	3	2	1

3. Ryan has problems with math. He uses his fingers for adding numbers and does not remember his facts. He never finishes his math assignments.

My **close friends** think that I should say that the student should work:

In My Group	In Another Group	In No Group	Outside of Class	At Home
5	4	3	2	1

4. Kathy always interrupts her class by calling out, teasing and demanding the teacher's attention. She is always getting out of her seat and going to the teacher's desk, and falls off her seat.

My **classmates** think that I should say that the student should work:

In My Group	In Another Group	In No Group	Outside of Class	At Home
5	4	3	2	1

Circle the response to each statement according to how difficult you think it would be to perform the task.

1.) **HARD!**

2.) hard

3.) easy

4.) **EASY!**

1. Kids in a special ed class sit together at lunch. Asking if you can sit with them is _____ for you.

HARD!

hard

easy

EASY!

2. A kid cuts in front of a classmate with a disability. Telling the kid not to cut in is _____ for you.

HARD!

hard

easy

EASY!

3. Some kids are making fun of a classmate with a disability. Telling them to stop is _____ for you.

HARD!

hard

easy

EASY!

4. Some kids need more people to be on their teams. Inviting a kid with a disability to be on your team is _____ for you.

HARD!

hard

easy

EASY!

5. A classmate with mental retardation has to carry some things home after school. Asking if you can help is _____ for you.

HARD!

hard

easy

EASY!

6. Your class is going on a trip and everyone needs a partner. Asking someone with a disability to be your partner is _____ for you.

HARD!

hard

easy

EASY!

7. A kid does not like your friend who walks with crutches. Telling the kid to be nice to your friend is _____ for you.

HARD!

hard

easy

EASY!

8. A kid is yelling at a classmate with a disability. Telling the kid to stop is _____ for you.

HARD!

hard

easy

EASY!

9. Some kids are teasing a classmate who is in a wheelchair. Telling them to stop is _____ for you.

HARD!

hard

easy

EASY!

10. You want to start a game. Asking a kid who can't see well to play the game is _____ for you.

HARD!

hard

easy

EASY!

REFERENCES

- Ajzen, I. 1985. From intentions to actions: A theory of planned behavior. In Kuhl & Beckman (Eds.), *Action-control: From cognition to behavior* (pp. 11–39). Heidelberg: Springer.
- Ajzen, I. 1988. *Attitudes, personality, and behavior*. Chicago: Dorsey.
- Ajzen, I. 1991. The theory of planned behavior. *Organizational Behavior and Human Decision Processes*, 50, p. 179–211.
- Ajzen, I. 2002. Perceived behavioral control, self-efficacy, locus of control, and the theory of planned behavior. *Journal of Applied Social Psychology*, 32, p. 665–683.
- Ajzen, I. & Fishbein, M. 1977. Attitude-behavior relations: A theoretical analysis and review of empirical research. *Psychological Bulletin*, 84, p. 888–918.
- Ajzen, I. & Fishbein, M. 1980. *Understanding attitudes and predicting social behavior*. Englewood Cliffs, NJ: Prentice Hall.
- Ajzen, I., & Madden, T. J. 1986. Prediction of goal directed behavior: Attitudes, intentions, and perceived behavioral control. *Journal of Experimental Social Psychology*, 22, p. 453–474.
- Ajzen, I., & Timko, C. 1986. Correspondence between health attitudes and behavior. *Basic and Applied Social Psychology*, 7, 259–276.
- Antonak, R. & Livneh, H. 1988. *The measurement of attitudes towards people with disabilities*. Springfield, Illinois: Charles C. Thomas.
- Armitage, C.J. & Conner, M. 2001 Social cognitive determinants of blood donation. *Journal of Applied Social Psychology*. 31, p. 1431–1457.
- Austo, T.A., Clark, D.L., Read, A., McGree, K. & Fernandez, L.D.P. 1994) . *Roots of reform: Challenging the assumption that control change in education*. Bloomington, IN: Phi Delta Kappan Foundation.
- Ashforth, B.E. & Humphrey, R.H. 1997. The Ubiquity and Potency of Labeling in Organizations. *Organization Science*. 8(1), p. 43-59.
- Bandura, A. 1986. *Social foundations of thought and action: A social cognitive theory*. Englewood Cliffs, NJ: Prentice-Hall.

- Ballard, M., Corman, L., Gottlieb, J. & Kaufman, M.J. 1978. Improving social status of mainstreamed retarded children. *Journal of Education Psychology*, 69, p. 605-611.
- Bagley, M.T. & Geene, J.F., 1984. *Peers attitudes toward the handicapped scale (PATHS)*. Austin, Texas: PRO-ED.
- Barnitt, V., DiVincent, J., Frick, L. and Ramsey-Wood, L. (2005) *The power of peers: A guide to developing a peer support program for students with disabilities*. Resource Manual from the Florida Department of Education.
- Batemnan, B. 2005. The play's the thing. *Learning Disability Quarterly*, 28, p. 92-96.
- Batchelder, H., Kinney, M. & Reardon, R. 2005. Examining the Impact of State and National Percentages of General Education Involvement, and Poverty on Graduation Rates for Students with Disabilities. Working Paper at the University of Central Florida.
- Beals, M.P. 1994. *Warriors Don't Cry*. New York, NY: Pocket Books.
- Becker, Howard. 1963. *Outsiders: Studies in the Sociology of Deviance*. Glencoe: Illinois The Free Press.
- Beest, I. & Williams, K. 2006. When Inclusion Costs and Ostracism Pays, Ostracism Still Hurts. *Journal of Personality and Social Psychology* . 91(5), p. 918–928
- Brady, M.P., Shores, R., Gunter, P., McEvoy, M.A., Fox, J.J. & White, C. 1984. Generalization of an adolescent's social interaction behavior via multiple peers in a classroom setting. *Journal of the Association for Persons with Severe Handicaps*, 9, p. 278-286.
- Boscardin, M.L. 2005. The administrative role in transforming secondary schools to support inclusive evidence-based practices. *American Secondary Education* 33(3), p. 21-34.
- Braithwaite, J. (1989). *Crime, Shame and Reintegration*. Cambridge, UK: Cambridge University Press.
- Brinker, R.P. & Thorpe, M.E. 1986. Features of integrated educational ecologies that predict social behavior among severely mentally retarded and non-retarded students. *American Journal of Mental Deficiency*, 91, 150-159.
- Bruininks, R.H. & Larkin, K. 1985. *Living and Learning in the least restrictive environment*. Baltimore, MD: Paul H. Brookes.
- Chan, D. K., & Fishbein, M. (1993). Determinants of college women's intentions to partners to use condoms. *Journal of Applied Social Psychology*, 23, 1455–1470.

- Chen, X., 2002. Social Control in China: Applications of the Labeling Theory and the Reintegrative Shaming Theory. *International Journal of Offender Therapy and Comparative Criminology*, 46(1), p. 45-63.
- Chen, G. & Klimoski, R. 2003. The Impact of Expectations on Newcomer Performance in Teams as Mediated by Work Characteristics, Social Exchanges and Empowerment. *Academy of Management Journal*. 46(5). p. 591–607.
- Choate, J.S. (Ed.) 1993. *Successful Mainstreaming: Proven ways to detect and correct special needs*. Boston: Allyn & Bacon.
- Cohen, J. 1988. *Statistical power analysis for the behavioral sciences*. Hillsdale, NJ: Erlbaum.
- Crowley, E. 1993. A qualitative analysis of mainstreamed behaviorally disordered aggressive adolescents' perceptions of helpful and unhelpful teacher attitudes and behaviors. *Exceptionality*, 4 (3), p. 131-15.
- Cuban, L. 1996. Myths about changing schools and the case of special education. *Remedial and Special Education*, 17(2), p. 75-82.
- Damon, W. 1984. Peer education: The untapped potential. *Journal of Applied Developmental Psychology*. 5. p. 331-343.
- D'Allura, T. 2002. Enhancing the social interaction skills of preschoolers with visual impairments. *Journal of Visual Impairment & Blindness*, p. 576-586.
- Diekmann, K.A., Tenbrunsel, A.E & Galinsky, A.D. 2003. From Self-Prediction to Self-Defeat: Behavioral Forecasting, Self-Fulfilling Prophecies, and the Effect of Competitive Expectations. *Journal of Personality and Social Psychology*. 85(4). p. 672–683.
- Dillman, D.A. (2000). *Mail and Internet Surveys: The Tailored design method*. New York: Wiley.
- Dixon, S. 2005. Inclusion – Not segregation or integration is where a student with special needs belongs. *Journal of Educational Thought*, 39 (1), p.33-53.
- Downs, W.R. & Robertson, J.F., 1997. Control Theory, Labeling Theory, and the Delivery of Services for Drug Abuse to Adolescents. *Adolescence*, 32. p. 125-144.
- Dugan, E., Kamps, D., Leonard, B., Watkins, N., Reinberger, A., & Stackhaus, J. 1995. Effects of cooperative learning groups during social studies for students with autism and fourth-grade peers. *Journal of Applied Behavioral Analysis*, 28, p. 175-188.

- Dye, T. R. 2002. Understanding Public Policy. Upper Saddle River, New Jersey: Prentice Hall.
- Eden, D. 1990. *Pygmalion in management: Productivity as a self-fulfilling prophecy*. Lexington, MA: Lexington Books.
- Eden, D. & Kinnar, J. 1991. Modeling Galatea: Boosting Self-Efficacy to increase Volunteering. *Journal of Applied Psychology*. 76(6). p.770-780.
- Edwards, J. C. 2001. Self-Fulfilling Prophecy and Escalating Commitment: Fuel for the Waco Fire. *The Journal of Applied Behavioral Science*.37(3). p. 343-360.
- Fisher, D. 1999. According to Their Peers: Inclusion as High School Students See It. *Mental Retardation*, 37(6), p. 458-67.
- Fisher, D., Pumpian, I. & Sax, C. 1998. High school students attitudes about and recommendations for their peers with significant disabilities. *JASH*. 23, p. 272-282.
- Florida Department of Education (D.O.E), 2007. found online on 1/17/2007 at: <http://doewebprd.doe.state.fl.us/eds/nclbspar/main0506.cfm>
- Friend, M. 1988. Putting consultation in context: Historical and contemporary perspectives. *Remedial and Special Education*, 9(6), p. 7-13.
- Fryxell, D. & Kennedy, C.H. 1995. Placement along the continuum of services and its students' social relationships. *Journal of the Association for Persons with Severe Handicaps*, 20, p. 259-269.
- Gabbidon, S. L. 2003. Racial Profiling by Store Clerks and Security Personnel in Retail Establishments. *Journal of Contemporary Criminal Justice*, 19(3). p. 345-364.
- Giangreco, M.F. & Broer, S.M. 2005. Questionable utilization of paraprofessionals in inclusive schools: Are we addressing symptoms or causes? *Focus on Autism and other Developmental Disabilities*, 20(1), p. 10-26.
- Giles, M., McClenahan, C., Cairns, E. & Mallet, J. 2004. An application of the Theory of Planned Behaviour to blood donation: the importance of self-efficacy. *Health Education Research*, 19 (4) p. 380-391.
- Gliner, J. A., & Morgan, G. A. (2000). *Research methods in applied settings: An integrated approach to design and analysis*. Mahwah, NJ.

- Greenslade, J.H. & White, K.M. 2005. The Prediction of Above-Average Participation in Volunteerism: A Test of the Theory of Planned Behavior and the Volunteers Functions Inventory in Older Australian Adults. *The Journal of Social Psychology*. 145(2). p. 155–172.
- Gresham, F.M. 1981. Social Skills training with handicapped children: A review. *Review of Educational Research*, 51(1), p. 139-176
- Grimes, C. 2005. The Self-Fulfilling Prophecy: Better Performance by Perception. Found online at www.accel-team.com on 11/20/2005.
- Guar, A.S. and Guar, S.S. 2006. Statistical Methods for Practice and Research: A Guide to Data Analysis Using SPSS. Thousand Oaks, California: Response Books.
- Gurin, P., Nagda, B.A. & Lopez, G.E. 2004. The Benefits of Diversity in Education for Democratic Citizenship. *Journal of Social Issues*, 60 (1): 17--34
- Guttman, A. 1995. Civic Education and Social Diversity. *Ethics*. 105, p. 557-579.
- Halvorsen, A. & Neary, T. 2001. *Building inclusive schools: Tools and strategies for success*. Needham Heights, MA: Allyn & Bacon.
- Hamre-Nietupski, S., Hendrickson, J., Nietupski, J. & Shokohi-Yekta, M. 1994. Regular educators' perceptions of facilitating friendships of students with moderate, severe or profound disabilities with non-disabled peers. *Educational and Training in Mental Retardation*, 29(2), p. 102-117.
- Hannah, M.E & Midlarsky, E. 1983. Describing the recipients of rehabilitation services: Which way is best? Paper presented at the Annual Convention of the American Psychological Association, Anaheim, CA.
- Hardin, B.& Hardin, M. 2002. Into the mainstream: Practical strategies for teaching in inclusive environments. *The Clearing House*, 75(4), p. 175-180.
- Haring, T.G. 1991. Social Relationships in L.H. Meyer & C.A. Peck (Eds.) *Critical issues in the lives of people with disabilities* (P. 195-217). Baltimore. MD: Paul H. Brookes.
- Hay, C. 2001. An Exploratory Test of Braithwaite's Reintegrative Shaming Theory. *Journal of Research in Crime and Delinquency*. 38(2). p. 132-153.
- Hollywood, T.M., Salisbury, C.L., Rainforth, B. & Palombaro, M.M. 1995. Use of instructional time in classrooms serving students with and without severe disabilities. *Exceptional Children*, 61(3), p. 242-253.

- Hosmer, D.W. and Lemeshow, S. 1989. Applied Logistic Regression. New York, New York: Wiley InterScience.
- Hunt, P., Farron-Davis, F., Beckstead, S., Curtis, D., & Goetz, L. 1994. Evaluating the effects of placement of students with severe disabilities in general education versus special classes. *Journal of the Association for Persons with Severe Handicaps*, 19(3), p. 200-214.
- Idol, L., Nevin, A. & Paolucci-Whitcomb, P. 1994. *Collaborative Consultation* (second edition). Austin, TX: Pro-ed.
- Jakuupcak, J. 1993. Innovative classroom programs for full inclusion. In J.W. Putnam (Ed.) *Cooperative Learning and Strategies for Inclusion* (p. 163-180). Baltimore, MD: Paul H. Brookes.
- Janney, R.E. & Snell, M.E. 1996. How teachers use peer interactions to include students with moderate and severe disabilities in the elementary general education classes. *JASH*. 21. 2, p. 72-80.
- Jenkins, J.R. & Heinen, A. 1989. Students' preferences for service delivery: Pull out, in-class, or integrated models. *Exceptional Students*, 55(6), p. 516-523.
- Johnson, D.W. & Johnson, R.T. 1981. The integration of the handicapped into the regular classroom: Effects of cooperative and individualistic instruction. *Contemporary Educational Psychology*, 6, p. 344-353.
- Jolly, A.C., Test, D.W. & Spooner, F. 1993. Using badges to increase initiations of children with severe disabilities in a play setting. *Journal of Association for Persons with Severe Handicaps*, 18(1), p. 46-51.
- Jones, L.W., Courneya, K.S., Fairey, A.S. & Mackey J. R. 2005. Does the theory of planned behavior mediate the effects of an oncologist's recommendation to exercise in newly diagnosed breast cancer survivors? Results from a randomized controlled trial. *Health Psychology* . 24(2). p. 189-197.
- Jussim, L., Harber, K. D., Crawford, J. T., Cain, T. R. & Cohen, F. 2005. Social Reality Makes the Social Mind Self-fulfilling Prophecy, Stereotypes, Bias, and Accuracy. *Interaction Studies*, 6(1), p. 85-102.
- Kagan, D.M. 1990. How Schools Alienate Students at Risk: A Model for Examining Proximal Classroom Variables. *Educational Psychologist*, 25(2), p. 105-125.
- Kamerman, S. (2005). Child policy glossary. New York: www.childpolicyintl.org/glossary.htm

- Kamps, D.M., Kravits, T., Gonzalez Lopez, A., Kemmerer, K., Potucek, J. & Harrell, L.G. 1998. What do the peers think? Social validity of peer-mediated programs. *Education and Treatment of Children*, 21(2), p. 107-34.
- Kangas, O. & Palme, J. 2000. Does Social Policy Matter? Poverty Cycles in OECD Countries. *International Journal of Health Services*. 30(2), p. 335-352.
- Kaplan, H. M., & Johnson, R. J. 1991. Negative social sanctions and juvenile delinquency: Effects of labeling in a model of deviant behavior. *Social Science Quarterly*, 72, 98-122.
- Kauffman, J.M., Landrum, T.J., Mock, D.R., Sayeski, B. & Sayeski, K.L. 2005. Diverse Knowledge and Skills Require a Diversity of Instructional Groups. *Remedial and Special Education*, 26(1), p. 2-6.
- Kennedy, C.H., Shulka, S. & Fryxell, D. 1997. Comparing the effects of educational placement on the social relationships of intermediate school students with severe disabilities. *Exceptional Children*, 64(1), p. 31-48.
- Kenney, J.S. 2002. Victims of Crime and Labeling Theory: A Parallel Process? *Deviant Behavior: An Interdisciplinary Journal*, 23. p. 235-265.
- Kerlinger, F. 1986. *Foundations of Behavioral Research* (3rd ed.). New York: Holt, Rinehart & Winston.
- Kishi, G.S. & Meyers, L.H. 1994. What children report and remember: A six-year follow-up on the social contact between peers with and without disabilities. *Journal of Association for Persons with Severe Handicaps*, 19(4), p. 277-289.
- Kline, R.B., 2005. *Principles and Practice of Structural Equation Modeling*. (second edition). N.Y.: The Guilford Press.
- Kohn, A. 1996. What to look for in a classroom. *Educational Leadership*, 54(1), p. 54-55.
- Kraft, P., Rise, J., Sutton, S. & Roysamb, E. 2005. Perceived difficulty in the theory of planned behavior: Perceived behavioral control or affective attitude? *British Journal of Social Psychology*. 44. p. 479-496
- Landau, S. & Everitt, B.S. 2004. A Handbook of Statistical Analyses Using SPSS. Boca Raton, Florida: Chapman and Hall / CRC.
- Lester, D. 1994. Challenges in Preventing Suicide. *Death Studies*. 18. p. 623-635.
- Li, L. & Moore, D. 2001. Disability and Illicit Drug Use: an Application of Labeling Theory. *Deviant Behavior: An Interdisciplinary Journal*, 22. p. 1-21.

- Lindsay, G. & Dockrell, J.E. 2004. Whose job is it? Parents' concerns about the needs of their children with language problems. *The Journal of Special Education*, 37(4), p. 225-235.
- Lipsky, D.K. 2005 Are we there yet? *Learning Disabilities Quarterly*, 28, p. 156-160.
- Logan, D.E.& Rose, J.B. 2005. Is Postoperative Pain a Self-Fulfilling Prophecy? Expectancy Effects on Postoperative Pain and Patient-Controlled Analgesia Use Among Adolescent Surgical Patients. *Journal of Pediatric Psychology*, 30(2) pp. 187-196.
- Lotz, R. & Lee, L. 1999. Sociability, School Experience and Delinquency. *Youth and Society*, 31(2). p. 199-223.
- Lowenbraun, S., Madge, S., & Affleck, J. 1990. Parental satisfaction with integrated class placements of special education and general education students. *Remedial and Special Education*, 11(4), p. 37-40.
- Madon, S. Guyll, M. & Spoth, R. L. 2004. The Self-Fulfilling Prophecy as an Intrafamily Dynamic. *Journal of Family Psychology*, 18(3). p. 459-469.
- Madon, S. Guyll, M., Spoth, R. L. & Willard, J. 2004. Self-Fulfilling Prophecies The Synergistic Accumulative Effect of Parents' Beliefs on Children's Drinking Behavior. *Psychological Science*. 12. p. 837-846.
- Magiati, I., Dockrell, J.E. & Logotheti, A.E. 2002. Young children's understanding of disabilities: The influence of development, context, and cognition. *Applied Developmental Psychology*, 23, p. 409-430.
- Martin, L. 2002. Comparing the Performance of Multiple Human Service Providers Using Data Envelopment Analysis. *Administration in Social Work* 26 (4). p. 45-60.
- Mcdonnell, J., Thorson, N., Mcquivey, C. & Kiefer-Odonnell, R. 1997. Academic engaged time of students with low-incidence disabilities in general education classes. *Mental Retardation*, 35(1), p. 18-26.
- McGregor, G. & Vogelsberg, R.T. 2000. *Inclusive schooling practices: Pedagogical and Research foundations*. Baltimore. MD: Paul H. Brookes.
- McNatt, D.B. & Judge, T.A. 2004. Boundary Conditions of the Galatea Effect: A Field Experiment and Constructive Replication. *Academy of Management Journal*. 47(4). p. 550-565.
- Meade, A.C. 1974. The Labeling Approach to Delinquency: State of the Theory as a Function of Method. *Social Forces*. 53(1). p. 83-92.

- Merton, R. K. 1948. The self-fulfilling prophecy. *Antioch Review*. 8. 193–210.
- Millar, R. & Shevlin, M. 2003. Predicting career information-seeking behavior of school pupils using the theory of planned behavior. *Journal of Vocational Behavior* 62. p. 26–42
- Nash, M., Munford, R. & O'Donoghue (Eds). 2005. *Social Work Theories in Action*. London: Jessica Kingsley.
- National Center on Educational Restructuring and Inclusion. (1995). *National Study of Inclusive Education*. New York: City University of New York.
- Palamara, F., Cullen, F. J., & Gersten, J. C. 1986. The effect of police and mental health intervention on juvenile deviance: Specifying contingencies in the impact of formal reaction. *Journal of Health and Social Behavior*, 27, 90-105.
- Payne, N., Jones, F., & Harris, P.R. 2005. The Impact of Job Strain on the Predictive Validity of the Theory of Planned Behaviour: An Investigation of Exercise and Healthy Eating. *British Journal of Health Psychology*. 10, p. 115–131.
- Pearl, C. 2004. Fourth graders with learning disabilities invite their peers into the resource room. *Exceptional Children*, p. 45-52.
- Peck, C.A., Staub, D., Gallucci, C. & Schwartz, I. 2004. Parent perceptions of the impact of inclusion on their non-disabled child. *Research and Practice for Persons with Severe Disabilities*, 9(2), p. 135-143.
- Percival, J., & Hanson, J. 2005. I'm Like a Tree Million Miles from the Water's Edge: Social Care and Inclusion of Older People with visual Impairment. *British Journal of Social Work*. 35,,: 189-205.
- Povey, R., Conner, M., Sparks, P., James, R., & Shepherd, R. 2000. Application of the theory of planned behaviour to two dietary behaviours: Roles of perceived control and self-efficacy. *British Journal of Health Psychology*, 5, 121–139.
- Pudlas, K.A. 2004. Inclusive education: Will they know we are Christians? *Journal of Research on Christian Education*, 13(1), p. 61-79.
- Pugach, M. 1995. On the failure of imagination in inclusive schooling. *The Journal of Special Education*, 29(2), p. 212-223.
- Pugach, M. & Wesson, C. 1995. Teachers' and students' views of team teaching of general education and learning-disabled student in two fifth-grade classes. *The Elementary School Journal*, 95, 279-295.

- Rawls, John. 1971. Political Liberalism. Harvard, MA: Harvard University Press
- Rawls, John. 1998. A Theory of Justice. Harvard, MA: Harvard University Press
- Ray, M. C. & Downs, W. R. 1986. An empirical test of labeling theory using longitudinal data. *Journal of Research in Crime and Delinquency*, 23, 169-194.
- Reichart, D.C., Lynch, E.C., Anderson, B.C., Svobodny, L.A., DiCola, J.M. & Mercury, M.G. 1989. Parental perspectives on integrated preschool opportunities for children with handicaps and children without handicaps. *Journal of Early Intervention*, 13(1), p. 6-13.
- Reschly, D.J. 2005. Learning disabilities identification: Primary intervention, secondary intervention, and then what? *Journal of Learning Disabilities*, 38(6), p. 510-515.
- Roberts, C.M. & Smith, P.R. 1999. Attitudes and behavior of children toward peers with disabilities. *International Journal of Disability, Development and Education*, 46(1), p. 35-51.
- Rocheleau, P. 2003. *The one-room schoolhouse*. New York, NY: Universe.
- Rosenthal, R. 2002. Covert Communications in Classrooms, Clinics, Courtrooms, and Cubicles. *American Psychologist*, 57: 839–849.
- Rosenthal, R., & Jacobson, L. (1968). *Pygmalion in the Classroom: Teacher Expectation and Pupils' Intellectual Development*. New York: Holt, Rinehart, & Winston.
- Ryndak, D.L, Downing, J.E., Morrison, A.P. & Williams, L.J. 1996. Parents perceptions of educational settings and services for children with moderate or severe disabilities. *Remedial and Special Education*, 17(2), p. 106-118.
- Salend, S.J. 2005. Using Technology to Teach About Individual Differences Related to Disabilities. *Exceptional Children*, 38(2), p. 32-38.
- Scheff, T. 1984. *Being Mentally Ill: A Sociological Theory* (Second Edition), New York: Aldine.
- Schnorr, R.F. 1990. "Peter? He comes and goes...": First graders' perspectives on a part-time mainstream student. *JASH*, 15(4), p. 231-240.
- Schwartz, I. S., Sandall, S.R., McBride, B.J. & Boulware, G.L. 2004. Project DATA (Developmentally Appropriate Treatment for Autism): An inclusive school-based approach to educating young children with autism. *Topics in Early Childhood Special Education*, 24(3), p. 156-68.

- Scott, W.R. 2003. *Organizations: Rational, natural and open systems* (fifth edition). Prentice Hall, Upper Saddle River, New Jersey.
- Smith, R.W., Osborne L., Crim, D. & Rhu A. 1986. Labeling Theory as Applied to Learning Disabilities: Survey Findings and Policy Implications. *Journal of Learning Disabilities*. 19(4). p. 195-203.
- Sruggs, T.E., & Mastropieri, M.A. 1996. Teacher perceptions of mainstreaming / inclusion, 1958-1995: A research synthesis. *Exceptional Children*, 63(1), p. 59-74.
- Stainback, W. & Stainback, S. 1990. *Support networks for inclusive schooling: Interdependent integrated education*. Baltimore: Paul H. Brookes.
- Tannenbaum, F. 1938. *Crime and the Community*. Boston. Ginn.
- Taylor, S.J. 1988. Caught in the continuum: A critical Analysis of the principle of least restrictive environment. *JASH*, 1988, 13(1), p. 41-53.
- Terry, D. J., & O'Leary, J. 1995. The theory of planned behavior: The effects of perceived behavioral control and self-efficacy. *British Journal of Social Psychology*, 34, 199–220.
- Trafimow, D., Sheeran, P., Conner, M., & Finlay, K. A. 2002. Evidence that perceived behavioral control is a multidimensional construct: Perceived control and perceived difficulty. *British Journal of Social Psychology*, 1, p. 101–121.
- Trent, L.M. 1993. Changing student attitudes about disabilities. *Principal*, 73. p. 32-34.
- Trost, S.G., Saunders, R. & Ward, D.S. 2002. Determinants of Physical Activity in Middle School Children. *American Journal of Health Behavior*. 26(2). p. 95-102.
- Turnbull, R.. with Ellis, J.W., Boggs, E.M., Brookes, P.O. and Biklen, D.P. (Eds.).1981. *Least restrictive alternatives: Principles and practices*. Washington, DC: American Association of Mental Deficiency.
- Turnbull, A.P., & Winton, P. 1983. A comparison of specialized and mainstreamed preschools from the perspectives of parents of handicapped children. *Journal of Pediatric Psychology*, 8(1), p. 57-71.
- Turnbull, A.P., Winton, P., Blacher, J. & Salkind, N. 1982. Mainstreaming in the kindergarten classroom: Perspectives of handicapped and non-handicapped children. *Journal of Division for Early Childhood*, 6, p. 14-20.

- Tymitz-Wolf, B. 1984. An analysis of EMR children's worries about mainstreaming. *Educational and Training in Mental Retardation*, 19, p. 157-167.
- Udvari-Solner, A. 1995. *A process for adapting curriculum in inclusive classrooms*. In R.A. Villa & J. Thousand (Eds.) *Creating and Inclusive School* (p. 110-124). Alexandria, VA: Association of Supervision and Curriculum Development.
- Villa, R. & Thousand, J. 1992. *Student collaboration: An essential for curriculum delivery in the 21st century*. In S. Stainback, W. Stainback & M. Forest (Eds.), *Educating all students in the mainstream of regular education*. (p. 59-68). Paul H. Brookes. Baltimore. MD.
- Villa, R., Thousand, J., Meyers, H. & Nevin, A. 1996. Teacher and administrator perceptions of heterogeneous education. *Exceptional Children*, 63(1), p. 29-45.
- Voeltz, L. 1980. Children's attitudes toward handicapped peers. *American Journal of Mental Deficiency*, 84(5), p. 455-464.
- Voeltz, L. 1982. Effects of structured interactions with severely handicapped peers on children's attitudes. *American Journal of Mental Deficiency*. 86. 380-390.
- Voeltz, L.M. 1988. In R Antonak & H. Livneh (Eds.), *The measurement of attitudes towards people with disabilities*. Springfield, Illinois: Charles C. Thomas.
- Wan, T.T.H., 2002. *Evidence-Based Health Care Management: Multivariate Modeling Approaches*. Boston: Kluwer Academic Publishers.
- Ware, N.C., Wyatt, M.A. & Tugenberg, T. 2006. Social Relationships, Stigma and Adherence to Antiretroviral Therapy for HIV/AIDS. *AIDS Care*, 18(8): 904_910.
- Weiss, M.G. & Ramakrishna, J.L. 2006. Stigma Interventions and Research for International Health. *www.thelancet.com*. 367: 536-38.
- Wilson, A. (1977). *Deviance and social control in Chinese society: An introductory essay*. In A.Wilson, S. Greenblatt, & S.Wilson (Eds.), *Deviance and social control in Chinese society* (pp. 1-13). New York: Praeger.
- Wheeler, V.A. & Ladd, G.W. (1982). Assessment of children's self efficacy for social interactions with peers. *Developmental Psychology*, 18, p. 795-805.
- Wu, I.L. & Chen, J.L. 2005. An extension of Trust and TAM model with TPB in the initial adoption of on-line tax: An empirical study. *International Journal of Human-Computer Studies*. 62. p. 784-808.
- Yegidis, B. L. & Weinbach, R. W. 2006. *Research Methods for Social Workers: Fifth Edition*. Boston: Allyn and Bacon.

- York, J. & Tunidor, H. 1995. Issues raised in the name of inclusion: Perspectives of educators, parents and students. *Journal of the association for Persons with Severe Handicaps*, 20, p. 31-44.
- York, J., Vandercook, T., Macdonald, C., Heise-Neff, C. & Caughey, E. 1992. Feedback about integrating middle-school students with severe disabilities in general education classes. *Exceptional Children*, 58, p. 244-258.
- Yucker, H.E. & Block, J.R. 1988. In R Antonak & H. Livneh (Eds.), *The measurement of attitudes towards people with disabilities*. Springfield, Illinois: Charles C. Thomas.