

THE IMPACT OF CYBER-BULLYING ON ADOLESCENTS' GEORGIA MILESTONES
SCORES

by

Sy Hudson

Liberty University

A Dissertation Presented in Partial Fulfillment

Of the Requirements for the Degree

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ABSTRACT

This correlational study investigated the relationship of adolescent cyber-victimization to performance on the Georgia Milestone Assessment System (GMAS) competency test.

Technology today allows students to learn how to operate various forms of digital equipment very early, but proper cyber etiquette training is not always included. This study addressed the potential that cyber-victims' may have low performance scores on high stakes tests. A closer look at the predictive relationship between the two is an important step in the process for developing plans to resolve this issue. The participants included 100 randomly-selected Georgia middle school students. After collecting the Cyberbullying and Online Aggression Surveys (COAS) from the selected adolescents, the researcher used a bivariate regression to determine what type of impact cyber victimization has on adolescents' competency test scores measured by the GMAS. The results, conclusion, and recommendations for further research provides others with information that can assist with the development of corrective instructional methods. Corrective instructional methods being those focused on nonaggressive online behavior.

Keywords: GMAS, COAS, cyber-victimization, digital natives, digital technology

Dedication

This is dedicated to my beloved mother who is no longer with us, but her encouragement at the beginning of this doctoral journey will always be in my spirit. To my precious father, there are no words to express how much I admire your work ethic. You have been a true example of what I needed to enter the Doctorate program 16 years post-master's. To my Lord and Savior, thank You for giving me the courage and strength to pursue this Doctorate degree. Thank You Father God for giving me ears to hear Your guiding voice, serenity to accept the things I cannot change, tenacity and wisdom to accomplish this mission.

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Overall, I give honor and glory to my Lord Father God and Savior, Jesus the Christ.

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List of Abbreviations

African American (AA)

American Psychological Association of Zero Tolerance Task Force (APAZTTF)

Common Core Georgia Performance Standards (CCGPS)

Criterion-Referenced Competency Test (CRCT)

Criterion Variable (CV)

Cyberbullying and Online Aggression Survey (COAS)

Depth of Knowledge (DOK)

Diagnostic and Statistical Manual of Mental Disorders (DSM-V)

Elementary and Secondary Act (ESEA)End-of-Grade (EOG)

End of Grade Test (EOGT)

English Language Arts (ELA)

Every Student Succeeds Act (ESSA)

Georgia Department of Education (GaDOE)

Georgia Milestones Assessment System (GMAS)

Georgia Performance Standards (GPS)

Internal Review Board (IRB)

Mobile Phone Problematic Use (MPPU)

National Conference State Legislators (NCSL)

No Child Left Behind Act (NCLB)Predictive Variable (PV)

Statistical Package for Social Sciences (SPSS)

CHAPTER ONE: INTRODUCTION

Overview

Test predictions have been used for many years to determine how well students will perform and accommodate their needs. Chapter One focuses on the predictive relationship of adolescent cyber-victims and their performance on competency tests. A general overview of the history, theories, and problems as they relate to this study are included in this chapter. Overall, the purpose of this research was to assist in determining if there is a predictive relationship between adolescents' competency test scores and their cyber-victimization scores.

Background

There have been many incidents of adolescents' cyberbullying that have captured the attention of many people worldwide. Technology today allows adolescents' aggressiveness to travel much faster and far beyond the confines of the school yard and private homes. It is rapidly becoming more devastating and affecting family members, people in the educational system, legislators, and even judiciary policy makers, many of whom find themselves struggling to gain control over the situation (Way, Hernandez, Rogers, & Hughes, 2013). There are mixed reviews on adolescents' use of technology and the effects it has on their academic performance.

Way et al. (2013) described this misuse as another form of bullying that is rapidly becoming more devastating and affecting more adolescents' academic performance nationwide. More specifically, people within the educational system have been forced to work more diligently with legislators and the judiciary policy makers in hopes of gaining better control over the situation (Way et al., 2013). The reviews regarding adolescents' use/misuse of digital devices have been both positive and negative. For example, Fitzgerald (2015) reported the use of social media has positively affected the performance of adolescents on high stakes tests.

However, Hinduja and Patchin (2011) noted that the misuse of digital devices has created some very hostile and frustrating environments. This study provides students, families, communities, and everyone involved in the education of children with information about the need to develop more safe and effective learning environments.

Historical Overview

Over the years, the etymology of the term *bullying* has evolved and termed *cyberbullying* now that it occurs in digital media (Tartari, 2015). Cyberbullying became more prominent among adolescents as the use of digital technology became more accessible (Tartar, 2015). Today's youth are digital natives who learn to use technology at very young ages, and by the time they reach middle school, texting and chatting on social media sites are their primary methods of communication (Tartari, 2015). It is widely known that technology today is not only used for business but allows the use of various digital devices (i.e., smartphones, computers, tablets) in practically every aspect of an individual's life, including education and leisure. However, many adolescents tend to use these devices leisurely by texting or chatting online via social media sites quite often (Davis & James, 2013). Reportedly, the preference to use online communication offers more privacy than in person or speaking aloud (Davis & James, 2013). However, when students begin to spend numerous hours texting or chatting daily, avenues for online and offline problems are created (Beran, Rinaldi, Bickham, & Rich, 2012). This overuse of technological devices becomes a form of misuse that affords students the opportunity to hide in cyberspace while misusing their devices to lie, cheat, bully, and or harass others. Additionally, the overuse has placed many adolescents at a high risk for internet addiction, yet the increase in online activity has been known to strengthen and widen the social networks of many adolescents (Smahel, Brown, & Blinka, 2012).

Davis and James (2013) found that students who lost their ability to focus on their academic achievement developed high social skills, but the countless hours spent using digital technology led to misuse that resulted in increasing levels of bullying (Mason, 2008). Additionally, offline misuse of electronic devices is increasing as well, and there continues to be harassment and/or threats that are very problematic among adolescents (Baldry, 2004). In addition to misuse inflicting mental anguish, cyber-bullying has reportedly contributed to low academic achievement among many cyber-victims (Carrera-Fernandez, Lameiras-Fernandez, Rodriquez-Castro, & Vallejo-Medina, 2013). Unfortunately, social media misuse has resulted in serious issues among adolescents, affecting society at large and creating the need for parents, guardians, and educators to intervene more often (Ford, 2009). However, when parents, educators, and administrators join forces to develop strategical methods in effort to deal with this problem, adolescents continue to develop their own cyber language. This covert method of communication has been known to hinder adults' abilities to detect unhealthy cyber environments in a timely manner (Brent, 2011).

Delays in assessing the impact cyber-victimization misuse has on students' academic performance can contribute to accountability issues (Sencibaugh & Sencibaugh, 2016). Accountability with the public-school system is primarily based on assessment, and the passing of the No Child Left Behind Act (NCLB) in 2001 required school systems to show that all students are meeting the minimum standards of proficiency for their grade level (Sencibaugh & Sencibaugh, 2016). The lack of accountability or the omission of any student(s) would lead to an inconsistency in the proficiency testing process. Since the NCLB requires 100% student accountability, public schools are required to include all students regardless of which subgroup they may be in (Campbell, 2011). The results of not meeting this mandate are that the school

would be disqualified and labeled as unable to meet yearly progress. Thus, sanctions would be placed on the school with stricter guidelines (U.S. Department of Education, 2017). Schools may not be able to identify the specific causes for every student who struggles with academic achievement, but the development of strategies to strengthen students' deficits is suggested.

Theoretical Background

This study was built on the theoretical foundation of Vygotsky's (1978) social development theory which says that social interaction plays a fundamental role in the process of cognitive development. While working with children, Vygotsky (1978) learned that the mind is naturally social, and he felt that social learning preceded development. His sociocultural theory focuses on society's contributions to the development of an individual and stresses the interaction between people and their culture (Vygotsky, 1978). Sociocultural theorists are known to place emphasis on the individual's cultural practices defining them as routine events that occur in the daily life of one's culture (Miller, 2011). Those routine events are inclusive in classroom activities as well, and as the students develop, their interactions (activities) with one another increase (Miller, 2011). For example, within the classroom culture, the teacher and/or peers assist with each individual's development. Vygotsky (1978) believed that learning awakens numerous internal developmental processes that tend to operate only when the child is interacting with others.

As a child develops, his or her level of interaction with others increases and leads to cognitive growth (Vygotsky, 1978). Vygotsky (1978) explained this cognitive growth by examining a child's actual and potential development levels. In the classroom culture, the teacher and peers aid in the student's potential development levels. In the culture of the home, family, peers, and guardians aid in the child's actual and potential development that awakens

only when interacting with them (Vygotsky 1978). The interaction can have a positive or negative impact on the child, and the increasing number of behavioral changes have been linked to technology use (Way et al., 2013).

Overall, adolescents' online aggression continues to grow; the integration of technology into the education system continues to expand beyond the schoolyard (Hinduja & Patchin, 2015a). The researcher believes that bullying and cyberbullying are relative to Vygotsky's (1978) social cultural theory. Adolescents' online aggression is described as a learned behavior that develops as youths interact with others in both school and family cultures (Vygotsky, 1978). In this study, the researcher applied Vygotsky's (1978) social cultural theory to determine how adolescents' learned behavior may impact their academic performance measured by competency test scores.

Problem Statement

Adolescents have continued to develop clandestine ways to misuse digital technology that have placed many adolescents in the position of becoming potential victims of cyberbullying and online sexual harassment (Tartari, 2015). Some adolescents become victims of Facebook depression as well, which is defined by psychologists as the effect when one spends too much time on social media sites (Blease, 2015; Kross et al., 2013). The researcher focused on the problem with adolescents' online aggression while interacting on such media sites as Facebook, noting that proper cyber etiquette rarely accompanies the use of digital devices when entering such sites. Sometimes it can be very difficult to establish the level of harm victims suffer from cyber-bullying when the injuries are psychological (Shariff & Patchin, 2009). It is also difficult to detect the amount of off-line bullying since most internet conflicts do not typically escalate to a physical conflict (Hinduja & Patchin, 2011). However, Hinduja, and Patchin (2015a) found that

self-harming behaviors (including suicide) resulting from cyber-bullying has increased over the last five years. The number of victims and perpetrators continued to grow, and they suffer in silence, indicating attempts to hide the psychological ramifications (Beran et al., 2012). The gap in literature is that the available research does not focus on how cyber-bullying and cyber-victimization affects academic performance. The problem is, the academic performance of adolescent cyber-victims has been impacted in unknown ways.

Purpose Statement

The purpose of this correlational study was to investigate the relationship between the predictive variable (PV), cyber-victim's measures, and the criterion variable (CV), English Language arts (ELA) competency test scores of 100 eighth grade students at a South Georgia middle school. One of the variables of interest, competency test scores, was defined as the scores of a test designed to measure how well students acquire knowledge and skills. The other variable of interest was generally defined as the use of digital equipment such as cell phones or computers to lie, gossip, or bully others. Since the variables in a correlational study are observed, there were no intervening variables to be statistically controlled.

Significance of the Study

The significance of this study was to provide awareness of the widespread seriousness of cyberbullying and the predictive relationship to adolescents' performance on high stakes tests. Fitzgerald (2015) studied the performance of adolescents on high stakes tests and reported that use of social media had a positive effect on many adolescents' self-esteem and interaction with others. Throughout their studies, Patchin and Hinduja (2016) researched literature that focused on cyber-bullying and cyber-victims that created some very hostile and frustrating environments. Hinduja and Patchin (2010) suggested that the best way to reduce cyber-bullying and the

associated cyber-victimization is to educate parents, educators, and students about this growing issue. Knowledge is a step in a positive direction, but the decision to report inappropriate online behavior and follow the proper online etiquette is still the individual's (victim, observer, perpetrator) responsibility. Scholte, Burk, and Overbeek (2013) believed proper intervention is key to assisting cyber-victims who are at risk for developing social maladjustment. Therefore, it is important to prepare people such as parents and teachers to properly intervene when potential cyber-victims display lower levels of social adjustment (Scholte, et al., 2013). Overall, today's methods for controlling adolescents' use of cell phones and personal computers appear to be weak and/or ineffective as the digital natives continue to discover methods to get around strategically-placed preventive measures. As online aggression continues to become more prominent among adolescents, Patchin and Hinduja (2016) reported that it has become difficult to obtain an accurate number of cyber-victims because many suffer in silence.

Positive findings from this study may potentially provide researchers, practitioners, educators, and students with additional information about the way in which adolescents use their digital equipment. Additionally, the results may highlight more positive uses and preventive measures that will contribute to the academic success of students. The identification of potential victims as well as perpetrators allows for development of assistance that can be tailored to fit the students' needs. The discovery of more educational uses for technology today can be helpful with the development of plans to enhance students' test-taking skills, especially since there has been some positive feedback with the use of digital technology.

Research Question

RQ: Is there a significant predictive relationship between eighth graders' English Language arts scores on the Georgia Milestone Assessment System and their cyberbullying

scores measured by the victimization section of the Cyberbullying and Online Aggression Survey?

Definitions

1. *Bullying* – A conscious, willful, exclusionary, and deliberate hostile activity that is intended to harm and induce fear by threats of further aggression (Willard, 2007).
2. *Competency tests* – Performance-based tests designed to measure how well students acquire knowledge and skills (Georgia Department of Education, 2014).
3. *Computer (tablet, laptop)* – An electronic device used for storing and processing data based on the instructions given by the user (typed or spoken). A tablet (laptop) is a portable computer; a hybrid between a personal digital assistant and a personal computer notebook (Steers, Wickham, & Acitelli, (2014).
4. *Cyberbullying* – Bullying by electronic devices via e-mail, instant messages, text messages, blogs, cell phones, and websites (**Vaillancourt et al., 2008**).
5. *Cyberbullying and Online Aggression Survey (COAS)* – A survey developed to measure bullying, victimization, perpetration and bystander experiences (Hinduja & Patchin, 2015a).
6. *Cyber victimization* – a victim of unwanted bullying, and sexual attention on the internet involving direct personal communication to harass a victim and convey unwelcomed messages about one’s private life and/or sexuality (Tartari, 2015).
7. *Digital native* – A person born or raised during the age of digital technology making them very familiar with computers and the use of the internet at an early age (DeGraff, 2014).
8. *Digital immigrant* – a person born or raised prior to the world-wide use of digital

technology (DeGraff, 2014).

9. *Digital technology (devices)* – Electronic tools, devices, and resources used to generate, store, or process data (Henderson, Selwyn, & Aston, 2017).
10. *Facebook depression* – A type of “social comparison” whereby one makes a comparison, often between friends and “humdrum moments” when viewing the social network; Facebook that has been linked to depressive symptoms (Steers et al., 2014).
11. *Georgia Milestones Assessment System (GMAS)* – A competency test designed to measure how well students acquire knowledge and skills. The Common Core Georgia Performance Standards (CCGPS) for reading, English, language arts, and math and the Georgia Performance Standards (GPS) for science and social studies is included as well (Georgia Department of Education, 2017).
12. *No Child Left Behind (NCLB)* – A federal law that provides funds to assist poor students with improving their academic progress (Campbell, 2011).
13. *Online aggression (aka Electronic harassment or Cyberbullying)* – Bullying that takes place using electronic technology such as: cell phones, computers, tablets, and communication tools like social media sites and text messages (Selkie, Kota, Chan, & Moreno, 2015).
14. *Smartphone* – A cellphone (mobile phone) that performs many of the functions of a computer; usually has a touchscreen (Steers et al., 2014).
15. *Technology misuse* – Using technology in manners that are ineffective, inefficient, or harmful to another (Pascual-Ferrá, 2015).

CHAPTER TWO: LITERATURE REVIEW

Overview

This section reviews literature that covers information about adolescents' use and misuse of digital technology through online aggression and/or cyberbullying as it relates to their academic performance. Related theories are included in the theoretical framework which explores the works of Vygotsky (1978) and Feuerstein. The history of digital technology, theories, cyber-bullies, and cyber-victimization in relation adolescents' academic performance is discussed below. Additionally, the importance of adjusting school policies to address this issue and the gap in literature are explored.

Theoretical Framework

Vygotsky's (1978) social cultural development theory is the primary theoretical framework for this study. The social cultural theory states that the functioning of the human's mind is basically a "mediated" process that consists of activities, concepts, and cultural artifacts (Kozulin, Gindis, Ageyev, & Miller, 2003). During Vygotsky's (1978) work with children, it was discovered that the mind is naturally social, and social interaction plays a fundamental role in the process of cognitive development. This discovery led him to believe that social learning preceded development (Lantolf, Thorne, & Poehner, 2015). Within this theoretical framework, human beings are believed to be the species that uses existing and newly-created artifacts that allow them to monitor and control their behavior (Miller, 2011). In other words, the developmental processes of the human mind tend to take place through participation in cultural and historically-formed settings: interaction with peer groups, home life, and in an institutional context such as the workplace or schools.

In the school setting, learning is believed to be awakened by the internal development processes that are operating only when the student is interacting with others (Vygotsky, 1978). Sociocultural theorists emphasized the point that the cultural practices of individuals are routine events that occur in their daily way of living (Lantolf et al., 2015). Therefore, classroom activities are a part of daily living and appear to be contributing factors to the students' development. Within the classroom culture, the teacher and/or the students' peers assist with the development. Their interactions with the teacher and their peers during classroom activities show an increase during these routine events (Miller, 2011).

Feuerstein, as cited by Poehner and Infante (2017), is another theorist who also studied the interaction and activities among children and adults. The mediated learning experience (MLE) is relative to the social cultural theory with claims that MLE occurs when experienced people such as educators, competent peers, and/or parents intentionally insert themselves between the child and the stimulating source (Poehner & Infante, 2017). That person acts as the mediator, who creates mediated learning in the child by selecting and then interpreting the stimuli for him or her (Lantolf et al., 2015). The mediator must use four forms of intervention. First, the mediator must help individuals identify how they are using their brains when thinking about a problem. Second, the mediator must show reciprocity by having some level of shared interest. Next, the mediation of meaning must be shown; this occurs when the mediator encourages the learner to reflect on how the solution was determined as he or she interprets the significance of learning for the learner. Lastly, transcendence occurs when the learning experience is transferred into a new situation (Lantolf et al., 2015).

Feuerstein's model is like Vygotsky's (1978) scaffolding model whereby the scaffolding is slowly removed to help learners go from being totally supported to a point where a mediator

can direct them (Poehner & Infante, 2017). Overall, Vygotsky's (1978) theory and Feuerstein's theory are relative to this topic of adolescents' online aggression and their academic performance in a very specific manner. Both theorists suggest that the process of youths' cognitive development is through the interaction among others such as peers, teachers, and family members in the school and family environments (Lantolf et al., 2015).

Related Literature

The foundation will be laid regarding the importance of critical elements that need to be considered when researching the predictive relationship between students' online aggression levels and their academic performance. The related literature will include a general overview of the early development of the competency test and the rationale behind the its mandatory use in schools. The beginnings of technology usage among adolescents, the results of incorporating technology in schools, and the identification of cyberbullying are explored. Literature regarding the development of strict guidelines, policies on technology usage in schools, and the potential impact peers, family, and teachers may have on adolescent cyber-victims and cyberbullies are also reviewed in this section.

Georgia Milestones Assessment System (GMAS)

Historical background. One of the first versions of a student competency test was a performance-based test that was developed in 1965 when Lyndon Johnson signed the first Elementary and Secondary Education Act (ESEA; Hodge & Welch, 2016). This competency test focused on improving educational opportunities for poor and low-achieving students as instruments that measure how well students develop knowledge and skills in reading, English/language arts, and mathematics (Hodge & Welch, 2016).

The assessment of students' academic performance and the schools' success has been gauged by standardized tests for over a decade (Borkar & Rajeswari, 2014; Hursh, 2007). This method of assessment became mandatory with the passing of the NCLB. This act stated that all students in grades three through eight must be assessed in areas of math and reading, and it required all student to take the designated high-stakes test(s) annually (Junco, 2015). When mandatory standardized testing increased the standards for students, it closed the achievement gap with accountability, flexibility, and choice (Helou & Rahim, 2014).

Rationale. Measuring cyber-victims and cyber abusers' online aggression and academic performance is key to this study. Consider the importance of selecting and implementing instruments that measure students' online aggression levels and academic performance. Measuring online aggression is not a straightforward process but the Cyberbullying and Online Aggression Survey (COAS) will be used in this study as a gauge to identify online aggression. Online aggression is commonly measured by an inventory of manifest variables (i.e., internet harassment) or global items that cover cyberbullying in general (Kowalski, Limber, & Agatston, 2007). Cyberbullying is part of a general construct that includes traditional bullying where the students are bullied at home or at school (Kowalski & Limber, 2013).

Performance-based standards have been the focus of education reform since the 1980s and requires students to have a minimum level of academic achievement before they can pass to the next level (Sadovnik, O'Day, Bohrnstedt, & Borman, 2013). Competency tests are performance-based tests designed to assess students' academic performance by measuring how well students acquire the knowledge and skills set forth in a specific curriculum (GaDOE, 2017). The GMAS competency test was selected for this study because it meets the Georgia state

content standards that measure students' knowledge in English/language arts, reading comprehension, mathematics, social studies, and science (Chafin et al., 2015).

The GMAS replaced the CRCT beginning with the 2015-2016 school year. It important to note that this change resulted from the revision of the ESSA and the NCLB act in 2013 (GaDOE, 2015). The GaDOE has commissioned The Count, LLC to conduct an independent evaluation of the quality of the alignment among its sets of academic standards and the GMAS (Forte, Towles, Greninger, Buchanan, & Deters, 2017), but there is still a limited amount of literature about the actual implementation, reliability, and validity of this test. The lack of literature and its practically new existence shows the gap in literature and the need to conduct this study to examine schools' policies and guidelines that may affect students' academic performance.

Adolescents and Digital Technology

Historical Development. In the early years of digital technology, personal computers, cell phones, and tablets were not allowed in schools. As time passed, teachers were given personal computers, computer classes were offered, and tablets and cell phones were allowed, causing many schools to adjust the rules of technology usage for faculty, staff, and students (Reid, 2014). Along with the rules for technology usage came rules and regulations regarding misuse. Even though some of the violations had serious consequences, students had been known to misuse their cell phones to cheat, bully, or steal during school hours (i.e., class, study periods, testing). Patchin and Hinduja (2016) described the online aggression as using technology in matters that are ineffective, insufficient, or harmful towards subjects or its users. In this digital era, the term *cyber* has been attached to some of the most common abuses of power including but not limited to: bullying, sexual harassment, racism, homophobia, domestic violence, and child

abuse (Robinson & Ryder, 2014). Cyberbullying also appeared to be partially built on a malicious accusatory-type foundation on another platform (American politics) that abuses power (Robinson & Ryder, 2014). Regardless of one's position or the identifying term one chooses to use, the actions of anyone abusing their power are defined as a form of abuse or bullying (O'Keefe, Clarke-Pearson, & Council on Communications and Media, 2011).

Bullying vs. cyberbullying. Bullying is a repetitive, conscious, and deliberate act of hostility with intent to threaten, harm, or induce fear (Hinduja & Patchin, 2010). Cyberbullying is also known as internet harassment and online aggression, and it is described as the use of electronic devices to bully via e-mail, text messages, blogs, cellphones, and the internet (Hinduja & Patchin, 2010). Be it on or off line, there is a high rate of co-occurrences between traditional bullying and cyberbullying in terms of victims and perpetrators (Raskauskas & Stolz, 2007). Research has shown that the internet provides a broader platform for society's disrespectful prejudices and many digital natives may be imitating what they observe (Lusk, 2010). Adolescents' observations may include behaviors that are known to perpetuate and sustain discriminative, abusive, and hostile behaviors. Nevertheless, bullying in all forms is an antisocial behavior (Duncan, 2010) and the behavior should be dealt with as such. According to Patchin and Hinduja (2016), research on the new technology can still be considered in its infancy stage, but similarities with traditional media has been discovered.

There is a limited amount of research that explores the relationship between students' misuse of technological devices, cyber-victims, and their academic performance. Therefore, a closer view of the available literature associated with this issue has been gathered and highlighted in the following paragraphs. Due to the growing incidents of the use of technology to victimize students, the United States adjusted schools' policies and guidelines to include: (a)

the definition of cyberbullying, (b) identification of cyber-victims and cyber-bullies, (c) assistance and counseling for both victims and bullies, and (d) punishment and disciplines for the cyber-bully (Tate, 2017).

Adolescents use/misuse of technology. As technology continues to expand and new technology is developed, adolescents' use and misuse of technology continue to grow (Helou & Rahim, 2014). The placement of preventive methods for online deception, cruelty, harassment, and cyber-bullying is one step behind today's youth since adolescents have continued to find ways around these methods and transformed school-yard bullying into cyberbullying (Patchin & Hinduja, 2016). Many of today's adolescents, also known as digital natives because they were born in this digital era, have easy access to digital devices and learn to use them at young ages. Children can easily pick up bad cyber habits and see nothing wrong with their actions, if not corrected. According to Helou and Rahim (2014), the effects have become widespread and more devastating for adolescent students inside and outside of educational institutions.

A better understanding of the complexities of cyber-bullying and cyber-victimization was discovered while examining the following reviews. Any medium, from television to the new media (social media, cell phones, iPads), seem to be dominant forces in young people's lives. Television may be the predominant medium for children and adolescents, but new technology is the more popular. One reason is that they are digital natives who are born into this technological age and exposed to digital gadgets more readily than television (Mäntymäki & Reimer, 2014). As young children approach middle school, they develop a "want" for personal ownership of media; therefore, many parents/guardians find it more convenient to purchase a cell phone instead of a television (Letendre & Smith, 2011). The cell phone or tablet is more interactive than the television; it allows the adolescents to develop their communication skills by enabling

communication with their peers via chat, text, or social media sites. Additionally, parents or guardians can check on their children or have them check in with them at certain times without the excuses of not having a quarter or the ability to locate a pay phone (Valkenburg & Peter, 2011). There is no doubt that teens have become active citizens in the world-wide web, and studies have shown a significant increase in the number of teens and tweens who are using the internet (Slater, Tiggemann, Hawkins, & Werchon, 2012). Many adolescents attempt to find a sense of self and community identification by turning to media to develop their identity (Blair & Fletcher, 2011). When using their digital devices, many adolescents develop online relationships. This is due to their interaction with other persons, which reflects their need to learn how to share online patterns of communication with others (Smahel et al., 2012).

Teens are known to spend more time with media than in any other activity besides (maybe) sleeping (Tiggemann & Slater, 2014). Adolescents spend an average of approximately seven and a half hours per day, seven days a week, participating in activities that involve media, including a constant stream of messages covering various topics (Tiggemann & Slater, 2014). Rideout, Foehr, and Roberts (2010) determined that 95% of adolescents use the internet and 80% are users of social media sites such as Twitter and Facebook.

During the adolescent years, technology plays a major role as the young seek to construct their identities (Badaoui, Lebrun, & Bouchet, 2012). Traditional media have played an active role in the lives of many young digital natives by providing messages on how to speak, dress, and act as they grow through adolescence on into adulthood (Burnette, 2016; Halliwell, Easun, & Harcourt, 2011; Hammel, 2008). For example, young females may be hypersexualized, and young boys may be stereotyped in ways that they begin to question their sexual identity (Carrera-Fernandez et al., 2013; Sarracino & Scott, 2008). By the time a child reaches adolescence, ideas

about the culture have been impressed upon them via television, films, music, computer advertisements, and social websites (Collins, Lidinsky, Rusnock, & Torstrick, 2012). The social-emotional levels of school-aged children tend to fluctuate when they come under cyber-attack (cyberbullied). Brown, Demaray, and Secord (2014) maintained that the social-emotional levels of adolescents varied by gender with females suffering more than males.

An overwhelming amount of evidence was found in research showing that young children were influenced by digital media to shape their identity and world (Blair & Fletcher, 2011). The media's message to many of them included portraits of objectification and unrealistic beauty impressions; however, the stereotypical views of females as well as males included aggressive messages on how one should speak, think, and act (Slater et al., 2012). Digital media also influence adolescents' relationships with their peers and relationships play an important role in school (Molly, Gest, & Rulison, 2011). Cliques and/or gangs are formed whereby students are required to meet certain standards to be accepted (Jacob & Yoo, 2010). Sometimes those who are socially unaccepted or not well known in the social media sector develop a low self-esteem (Jacob & Yoo, 2010). Social acceptance is a strong wellness factor among male and female adolescents (Myers, Willse, & Villalba, 2011). Myers et al. (2011) determined that social acceptance is one of the reasons adolescents today are constantly using technology and the digital device becomes somewhat of an appendage.

Cyber-victims. Research on cyberbullying is relatively young, and online aggression continues to be a growing problem among school aged children (Brown et al., 2014). Both cyber-victims and perpetrators vary in age, gender, and ethnic background. Regardless of the category one may be in, there tends to be an overlap between cyber victimization and the traditional bullying (Tsitsika et al., 2015). According to Brown et al. (2014), levels of cyber

victimization among middle school children do not differ by grade or gender, however, they are distinct. Brown et al. (2014) determined that the constructs are related and the relationship between social emotional outcomes and cyber-victimization varied by gender with females suffering more than boys. However, Tsitsika et al. (2015) confirmed that traditional bullying continues to be relative to many negative outcomes for all students regardless of age, gender, race or grade. The victim is dominated by the cyber-bully, but the evidence of dominance is almost always obscured from view (Shariff, 2013).

Beliefs that “children are only pranking” have led some to believe that there is no harm in the bully’s actions (Hinduja & Patchin, 2011). Unfortunately, many adolescent victims have been linked to some very serious issues that not only affect their physical behavior but affect their mental adjustment as well (Brent, 2011). For instance, low self-concept, depression, and suicidal tendencies are just a few of the mental issues that affect adolescent victims of cyberbullying (Lee & Ashton, 2012). Lee and Ashton (2012) found that victims tend to internalize the fear of reporting the incident due to the fear of making the situation worse. The internalization of the problems is a non-suicidal, self-injurious behavior that eventually becomes a predictor for suicidal behavior in both victims and predators (Brent, 2011). Although cyberbullying is not physical, the aftereffects on the victims have become more devastating over the last five years, and physical effects (i.e., cutting, suicide) have become more prominent among adolescents (Hinduja & Patchin, 2010).

Mental issues. Many studies have identified the relationship between mental health, physical health, and cyber bullied victims whereby common elements were found in the definitions of victimization that included an imbalance of power between the bully and the victim (Bauman, Toomey, & Walker, 2013). Even though bullying can be physical or verbal, it

can also be exercised through exclusion (Bedford, Gregg, & Clinton, 2011). Over the last ten years, there has been an increased interest in the relationship between peer victimization and mental health issues (suicide, depression) among adolescents (Messias, Kindrick, & Castro, 2014). In the 2011 CDC Youth Risk Behavior Survey, it was found that any type of bullying, be it cyber or school bullying, correlated with adolescent depression, suicides, and suicidal tendencies. Some studies discovered that increases in youth cyberbullying problems caused mental, physical, and social harm (Chang et al., 2015).

The rising use of technology, the internet, and associated social media sites has exposed adolescents to the online mental health risks of depression and suicide (Chang et al., 2015). The health risks of depression and suicide have increased youths' morbidity and mortality rates (Chen, Ho, & Lwin, 2017). Studies have shown that the exposure to the internet and social network sites was associated with increases in youth cyberbullying problems (Messias et al., 2014). In a comparison of traditional bullying and cyber-bullying, surveys on middle schoolers showed that there was a strong association between depression and cyberbullying (Lenhart, Purcell, Smith, & Zickuhr, 2010). Despite the wide variety of instruments that have been used to diagnosis internet addiction and its association with cyberbullying and mental health, Chang et al. (2015) characterized the behavior as preoccupation, withdrawal, and impaired decision-making. Studies have also associated internet harassment with psychiatric forms of co-morbidity such as depression, loneliness, and low self-esteem (Rice & Fales, 2016). The mental effects of internet addiction were not included in the Diagnostic and Statistical Manual of Mental Disorders (DSM-V) at the time of their study (Chang et al. 2015).

Depressive symptoms have been closely linked to cyberbullying in otherwise healthy youth (Chen et al., 2017). Elevated depression symptoms that were associated with sensitivity to

cyberbullying experiences were found among physically healthy adolescents (Rice & Fales, 2016). Students with disabling illnesses may have significant absenteeism, and networking on social media sites gives them the opportunity to interact with their peers which also represents a potential avenue for cyberbullying (Rice & Fales, 2016). The severity of depression among cyber-victimized adolescents has been associated with the severity of cyberbullying (Chen et al., 2017). Compared to their non-victimized peers, research has shown that cyber-victimized youths reported higher levels of depression, emotional distress, externalized hostility, and suicide (Selkie et al., 2015).

Suicide is known to be a grievous and preventable tragedy that remains among the top causes of deaths among teenagers (Bauman et al., 2013). Even though school bullying had been associated with depression and suicide among adolescents, there had not been any studies using national samples that associated cyberbullying to those outcomes (Messias et al., 2014). The effects of media, specifically the internet, played a major role in the actions of the victims (Hawton, Saunders, & O'Conner, 2012). Nock et al. (2013) estimated that the lifetime prevalence of suicide planning is 4% and suicide attempts is 4.1% among adolescents. More attention is being drawn to the roles the media plays in teen suicides that are precipitated by electronic harassment (Bazelon, 2013). A study conducted by Lenhart et al. (2010) reported that more than 80% of the youths in the United States use social network sites. It was also noted that teens' embracement of social networking and electronic harassment has made suicidal tendencies major issues in their lives and the over-exposure needs to be explored (Lenhart et al., 2010).

Suicide and self-harm preventive methods should include universal measures that focus on the youth and high-risk groups (Litwiller & Brausch, 2013). There has been very little evidence showing the effectiveness of pharmaceutical treatment for psychological issues. For

instance, there is controversy about the effectiveness of antidepressants (Hawton et al., 2012). It is easy to say that an important preventative method would be to restrict the means for suicide, but this is easier said than done. Major challenges arise including getting a better understanding of the factors that contribute to suicide in the young and understanding the underlying effects of the media (Hawton et al., 2012). In addition to gaining a better understanding, identification of successful preventative initiatives and methods should focus on the young and high-risk youth (Litwiller & Brausch, 2013). Lastly, many treatment methods for those who harm themselves and those in desperate need of assistance have been ineffective (Bedford et al., 2011). Ineffective is emphasized because there are too many treatment plans offering little help in the treatment of the young, suicidal, self-harming victims (Bedford et al., 2011).

Cyberbully/online aggressor. In a nationally-representative study of bullying in the U.S., Nansel and colleagues (2001) found that 11% of sixth through tenth graders were “victims only,” 13% were “bullies only,” and 6% were “bully-victims.” For intervention purposes, it is essential to look at internet harassment from the perspective of adolescent cyberbullies, not just the cyber-victims (Kowalaski, Giumetti, Schroeder, & Lattanner, 2014). Cyberbullies reported using drugs and/or alcohol, problems with conduct, and lack of achievement in school during a meta-analysis conducted by Sourander et al. (2010). More specifically, research showed that cyberbullies were associated with perceived difficulties, hyperactivity, conduct problems, low prosocial behavior, frequent smoking, drunkenness, headaches, and feelings of not being safe at school (Sourander et al., 2010). Cyber-victims reported times of fearing for their safety such as when bullied by the same sex, opposite sex, or by an unknown person, which indicated possible trauma caused by the bully (Cénat et al., 2014). Evidence presented in the literature regarding

the incidents and long-term consequences of cyberbullying suggest that this is a serious problem that has detrimental effects on the victims and the bullies (Kowalaski et al., 2014).

Youth who engage in traditional bullying share the same characteristics as the cyberbully, but the characteristics are not necessarily in plain view (Hinduja & Patchin, 2011). Most of the time, the cyberbully will subconsciously hide those innate characteristics and act them out through unacceptable behavior via the internet (Patchin & Hinduja, 2016). Patchin and Hinduja (2016) stated that the cyberbully readily selects the internet (various web sites, chat rooms) because they can easily hide in cyberspace.

A very old belief is that if the bully is ignored, he or she will eventually stop because the behavior is an attention-seeking gimmick. Another common belief is that bullies have low self-esteem, so they bully others to compensate and make themselves feel important. However, the research on cyber-bullying undermines some of the motivations for traditional bullying. For instance, Lee and Ashton (2012) found that perpetrators are known to internalize the fear of suffering the consequences if they are caught, therefore, contributing to the mental anguish of low self-esteem. The cyber-bully may not seek the immediate attention or apparent peer reinforcement that is received from traditional bullying. However, since the perpetrator does not experience the same level of gratification and is unable to judge the impact on the victim, Shariff (2013) noted that cyber-bullies may intensify the attacks in effort to ensure the assaults are felt and that can lead to an escalation of attacks.

Family influences on adolescences' technology usage/misuse. Research has suggested that family influences are just as important as the influence of peers because many of the behaviors adolescents exhibit are learned through their interaction with family (siblings, parents, guardians, etc.). Over the years, technology has provided a fantastic way for the younger

generation to share with family and friends (Eden, Heiman, & Olenik-Shemesh, 2016). On the other side, it opens a door for adolescents to encounter cyberbullying (Hinduja & Patchin, 2010). Working adults may use digital technology throughout the day but do not depend on social communication to the same extent as adolescents (Lee & Ashton, 2012). Many digital natives tend to think that adults have no idea of what they are doing online since the technological gadgets are second nature to them and that many adults have no need to learn past the basics of social media or chat rooms (Kowalski et al., 2014). Since technology continues to be integrated into the average person's daily life, many family members have no time or interest in their children's online activity (Hinduja & Patchin, 2011). The lack of knowledge about the use of the new technology is not always the issue; sometimes it depends upon the family dynamics or their social economic status (O'Keefe et al., 2011). This disconnect can potentially result in family members overlooking possible cyberbullies and/or potential victims within their home (family circle). Family members may also overlook the fact that some adolescent cyberbullies may have been offline bullies and began using digital technology to avenge those who harassed them offline (Eden et al., 2016).

Kowalski et al. (2014) discovered that adolescent students with little to no familial or social support had lower concepts of themselves and were likely to become active participants in online bullying. A study conducted by Chang et al. (2015) associated factors such as low family functioning, family dissatisfaction, poor parent-adolescent relationships, and low parental monitoring of cyber-victimization among adolescents with low self-concepts. Despite the studies that documented the psychosocial factors associated with cyberbullying and internet addiction, there has been little research that examines parental mediation of youth (Gómez-Guadix, Orue, Smith, & Calvete, 2013). Cyber-victims living in families with anyone other than

two biological parents had emotional and peer problems coupled with various physical pains such as headaches or abdominal pains (Sourander et al., 2010). Overall, both cyberbullying and cyber-victimization are associated with psychiatric and psychosomatic problems which indicates a need for new strategies to intervene and prevent cyberbullying (Sourander et al., 2010).

Adults who utilize digital technology and take it upon themselves to keep up to date with the changes are in a good position to be mediators. As mediators, they can understand the importance of assisting and not dictating a child's actions (Lee & Ashton, 2012). This means giving adolescents space to be creative and maintain a healthy social relationship with their peers both on and off line (Lee & Ashton, 2012). Social communication is the central stage in a young person's life in which he or she has the space and time to build self-esteem and gain proper social development (Beran et al., 2012). Educating parents and guardians to become more aware of providing healthy assistance to young children provides positive support for all involved (Beran et al., 2012). Parent and guardian education enables them to recognize problematic relationships children may be having with peers and arms them with knowledge to determine when to intervene (Gómez-Guadix et al., 2013). Being armed with knowledge and education also places parents/guardians in a position to put a stop to situations that bring about sadness, depression, and suicidal ideations before they negatively impact their children's academic performance (Bouchard, 2015).

Digital Technology in Schools

K-12 schools have been introduced to information and communication technology since the late 1990s with the expectation that it will transform education and facilitate students' learning (Pegrum, Oakley, & Faulkner, 2013). The success of integrating technology into the classroom has depended on how students and teachers accept and use it. Studies about the

acceptance of technology have grown rapidly and a variety of theoretical models have attempted to explain the effecting factors of individual acceptance and use (Wang, Hsu, Campbell, Coster, & Longhurst, 2014). Unfortunately, many of these studies paid little to no attention to the users of technology in classrooms. The classroom is where teachers and students use the technology, and this lack of attention could lead to a new kind of digital gap.

The belief that cheating and bullying has transitioned from the school-place to cyberspace was asserted by Young, Tully, and Ramirez (2017). Parents/guardians have attempted to place the responsibility of prevention in the hands of the educational professionals at the schools, while the educators and administrators maintain that it is the family's responsibility to teach preventive measures (Young et al., 2017). Be it tradition bullying or cyberbullying, refusing to tolerate it in form or fashion is a shared responsibility.

According to Medrano, Lopez Rosales, and Gámez-Guadix (2017), technology can easily be the blame for the change in the school's climate, students' lack of interest, and/or failing grades, but the socio-cultural dynamics that shapes students' lives should be considered as well. Instead of blaming or incarcerating children, adults need to be more educationally responsible for their children's offensive online behaviors (Medrano et al., 2017). This is one of the reasons why difficult problems, such as bullying and sexting, need to be addressed in schools as well (Patchin & Hinduja, 2016). According to Bouchard (2015), Shariff (2015) maintained that today's youth need to be engaged in their development as socially responsible digital students, but this requires adults and teachers alike to examine their own biases. The responsible adults should become more aware of the online fun as opposed to the online harm, identify acceptable boundaries for online communication, and know the legal ramifications for expressions of intentional or unintentional harm (McNeal, Kunkle, & Bryan, 2016). This cannot be stressed enough because

there are students who will disregard the consequences of using technology to cheat or bully another. When the difficult problems are addressed, the process can potentially uncover the relationship between the technological issues and the school's climate prior to offering strategical methods for educators and community members to address this issue in their schools (McNeal et al., 2016; Patchin, Schafer, & Hinduja, 2013).

Over the years, much attention has been placed on promoting students' learning and academic success. In the educational system, standardized tests are used as a tool to predict students' academic performance and identify their academic needs (Cohen, Tracy, & Cohen, 2017; Coltrane, 2002; Solórzano, 2008). Practitioners and researchers within the system strive to understand how environments affect students' motivational development and promote their academic involvement (Abeysekera & Dawson, 2015). Wentzel and Muenks (2016) stated that students are motivated in the classroom environment when they interact with their peers or classmates. However, adolescents' misuse of digital devices (bullying, gossiping, etc.) has interfered with the motivation of students and, in some cases, resulted in lowered participation and/or academic performance levels (Wentzel, & Muenks, 2016). Others have focused on the internal motivational processes in an effort to examine how the emotions and belief systems of the students affect their academics and classroom behaviors (Tartari, 2015). Detection of potential negative factors such as social rejection, lack of close friends, and signs of victimization can provide many (i.e., educators, parents, and peers) with a timely opportunity to successfully intervene (Wang & Eccles, 2012).

While many claimed that the studies and theories helped them to better understand students' academic development, the students' motivational areas were filled with other constructs (Skinner, Kindermann, & Furrer, 2009). Some of the constructs included school

motivation, school belonging, and student commitment (Wang & Eccles, 2012). As students grew older, it was found that their motivation and interest in their academic success declined while their interest in digital technology increased (Tartari, 2015). This digital interest led many researchers, practitioners, and educational leaders to develop curricula that included the use of digital technology and school rules to permit students to participate in the “Bring Your Own Device” (BYOD) program (Liao, Cheng, Chang, & Chan, 2017).

A safe learning environment. Establishing a safe learning environment for everyone should be considered when incorporating the use of technology in classrooms. There are many issues relative to the successful use of technology in the classroom. Some of the more notable issues are: (a) the development of dynamic plans; (b) securing necessary annual funding; and (c) decisions concerning hardware, software, and platforms (Thomas, O’Bannon, & Bolton, 2013). These are some of the most obvious issues that need to be considered, but a crucial determinant of whether technology succeeds or fails in the classroom is the teacher who is oftentimes overlooked (Bitner & Bitner, 2002). More attention is paid to selecting the appropriate hardware and software for the classroom, but it is the skill and attitude of the teacher that determine the effectiveness of integrating technology into the curriculum (Thomas et al., 2013). Fullan (2007) is a renowned expert in change theory and believes that education depends on what teachers do and think (Millen & Gable, 2016). Before technology can effect changes in the classroom, teachers must be considered because they are the ones who are ultimately responsible for the classroom. Teachers must allow technology to change their current teaching paradigm and they must learn to effectively use technology (Bitner & Bitner, 2002). This may not be an easy task for some teachers because change can appear to be somewhat threatening and intimidating. One

reason for this is that many teachers lack good models to emulate and who show them how to effectively integrate technology into the curriculum (Thomas et al., 2013).

The use of technology as a teaching and learning tool in the classroom involves both procedural changes in the classroom and use of new or unfamiliar technology (Tindel & Bohlander, 2012). Fear of change, proper training, school climate, motivation, and support are additional concerns that need to be addressed in effort to assist teachers with change (Bitner & Bitner, 2002). The main objective that is crucial to the success of the program is to help educators overcome their anxiety, fears, and concerns (Lederer, 2012).

Learning should be the force that drives the use of technology in schools. The increased access to technology and the continued under-use of it in education make it imperative to understand the barriers educators and students face when integrating technology into the classroom (Blackwell, Lauricella, Wartella, Robb, & Schomburg, 2013). To help students become academically successful, teaching models using technology as a tool in the classroom should be provided (Bitner & Bitner, 2002). While prior research has focused on the barriers teachers encountered, it also suggested that adolescents are indirectly faced with the same or similar barriers (Blackwell et al., 2013).

Healthy and successful learning. A healthy and successful learning environment has been considered when attempting to find solutions to cyber-victimization and cyber-bullying within the online educational environment (Blau & Eshet-Alkalai, 2017). Bedford et al. (2011) noticed that as online education continues to grow in popularity among adolescents, so does the escalation of creative methods of cheating. Most schools with online programs are required to demonstrate similar integrity and rigor as that required by the on-campus programs (Freeman, Simonsen, Briere, & MacSuga-Gage, 2014). Schools are also required to ascertain that the

students enrolled in the school are the ones doing the online class work (Bedford et al., 2011). Some schools are starting to use technology that will monitor the testing environment and verify if the enrolled student is the person taking the test (Blau & Eshet-Alkalai, 2017).

Allowing students to bring their own devices to school increased the level of focus for school administrators to not only monitor the traditional classroom setting but cyber-space as well (Bowers, Sprott, & Taff, 2013). Additionally, school administrators are expected to maintain a safe school environment, increase academic success, and lower the dropout rates (Bowers, 2013). These expectations present several challenges for the teachers and the school administrators. Incidences of cell phones ringing or vibrating creates distractions for the entire class during lectures and/or testing (Campbell, 2006). Many schools have found that students have developed very creative cheating processes with the use of digital technology. Even though it may seem as if the students are one step ahead of the teachers, Blau and Eshet-Alkalai (2017) determined that students' creative cheating process provides educators with new data to develop ways to combat the problem. Sadly, educators and school administrators seem to struggle when it comes to keeping up with the digital natives' schemes (Fang, Mishna, Zhang, Van Wert, & Bogo, 2014).

Digital natives tend to be more knowledgeable than their teachers when it comes to digital technology. Hence, the term "digital immigrant" was coined by Prensky (2001) to describe these types of teachers who were less fortunate. He pointed out that digital natives have been shaped by the digital environment in which they have been raised. Digital natives differ from digital immigrants when the idea of accepting technology and the nature of technology usage becomes the topic for discussion (Prensky, 2001). This difference can potentially create a gap between students and teachers which leads to an unhealthy teaching and learning

environment (Wang et al., 2014). Maintaining a safe cyber environment in the school setting can be somewhat of a problem, especially since research has shown that cyber-bullying usually begins on digital devices used outside of the school campus (Kowalski et al., 2014). Although the harmful online interactions may have occurred outside of the school's perimeter, the personal interaction between bullies and their victims still happens on campus (Scholte et al., 2013). Unlike the traditional classroom setting whereby educators can observe their students' interaction with peers, monitoring cyber interaction amongst students on their personal devices is a bit more challenging and an invasion of privacy (Jacobs, 2010).

Educators and school administrators can create a positive learning environment that will maintain students' attention while utilizing digital technology (Bowers et al., 2013). Although limited to the use of digital devices within the parameters of the school, more schools are becoming proactive in blocking specific sites that are known for frequent incidences of inappropriate use (Hinduja & Patchin, 2011). However, school officials have been unable to block the certain sites on students' personal devices since usage during school hours has been approved (Hinduja & Patchin, 2011). It has been proven to be beneficial for students to use their personal devices (tablets, laptops) because they are more familiar with them and the speed and ease of completing certain tasks increase (Tartari, 2015).

Proper training of technology use. To keep up with the changes of time, teachers should be provided with the proper training and have knowledge of the basics in computer use such as knowledge of standard input and output devices (mouse, printers, and speakers; Lederer, 2012). Personal productivity programs (word processors, PowerPoint, graphics programs, etc.) can be used to spark teachers' interest and motivate them to construct a better teaching model for students (Bitner & Bitner, 2002). Teachers need to be motivated to endure the frustration and

backlash that comes with change (Wlodkowski & Ginsberg, 2017). Motivation can be intrinsic when teachers see the possibilities technology use can offer their students or extrinsic when trainers work closely with administrators to motivate teachers to properly begin the process of change (Wlodkowski & Ginsberg, 2017). Quite often, the extrinsic motivation comes first, and it may be something as simple as the administrator asking the teachers how to meet their needs of adjustment. Either way, the administrator must be prepared with the knowledge of how the change should be made, even if it means offering incentives such as extra pay (Bitner & Bitner, 2002). Ongoing and onsite support should be available to the teachers when they need it in technical and curriculum areas (Wlodkowski & Ginsberg, 2017). For instance, when a problem occurs in class, it can be very difficult, if not impossible, to ignore a classroom full of students and focus on the technological issue. If there is a telephone in the classroom, the teacher can phone for tech-support without leaving the classroom or sending a student on a search mission. The ongoing training provides teachers with knowledge of the new and different hardware and software. Today's students are digital natives, and they can be valuable assets in the classroom (Wlodkowski & Ginsberg, 2017). The use of digital technology to access the internet or certain educational apps in the classroom allows students to be involved in the process which encourages self-confidence and individual self-esteem (Wlodkowski & Ginsberg, 2017).

Even though failure is not well accepted in today's time, a certain amount of failure is inevitable. It makes no difference if computers are used for learning enhancement or personal production, this kind of failure should be viewed as a positive failure since the lessons learned stem from trial and error (Thomas et al., 2013). Therefore, the climate in the classroom should be adjusted in ways that allow teachers to experiment without fear of failure (Engel & Green, 2011). Teachers should be made to feel comfortable with using technology in their classrooms

and not be afraid making mistakes or damaging the computer (Bitner & Bitner, 2002). This type of climate adjustment gives the teacher confidence in maintaining respect from students, peers, and superiors (Bitner & Bitner, 2002). In this case, it seems as if learning to use technology in the classroom can allow teachers and students to join forces in the learning process.

Many students agree with the use of newer mobile devices in the classroom, and many teachers agree with traditional technology use while educational leaders focus on the schools' access to technology and the use of both in the educational setting (Tindell & Bohlander, 2012). While research has shown many students reported the use of technology in classrooms as a positive influence on their learning abilities, educators reported that actual use of technology provided them with new insight into technology integration specifically for improving students' learning environments (Beckman, Bennett, & Lockyer, 2014). On the other hand, the problematic use of mobile devices among adolescents has not been widely studied, but there are a few instruments used for assessing potential cyber-bullies and cyber-victims while categorizing the different types of users or uses (Lopez-Fernandez, Honrubia-Serrano, Freixa-Blanxart, & Gibson, 2014).

Many bullied children believe their schools are hostile environments and the allowance of mobile phone use only adds to the problem (Tindell & Bohlander, 2012). Mobile phone abuse and Mobile Phone Problematic Use (MPPU) are terms used to describe patterns of students' interaction with mobile devices (Lopez-Fernandez et al., 2014). Billieux (2012) stated that MPPU is affecting an increasing number of adolescents and young adults who dedicate a lot of their time and attention to cell phone use. The repetitive use of cell phones to engage in behavior that is counterproductive to one's health has proven to be an emerging problem among adolescents in school (Rosen et al., 2014). According to Billieux (2012), the inability to regulate

the use of the cell phone is a behavior associated with MPPU that results in a few negative consequences in daily life (i.e. symptoms of dependence, social, behavioral, and affective problems). It is still unclear which of the many features on the modern phones are being used most (web surfing, texting, play games, listen to music, watch videos; Güzeller & Cosgunner, 2012). Relatedly, there is an open question about which of the features might be related to addictive behavior (internet harassment, cheating, gossiping, etc.) or whether the technology itself is more addicting (Lopez-Fernandez et al., 2014). Even though there is a rapid increase in relative to the MPPU among adolescents, there is still a need for an in-depth research into the issues relative to or causing addictive use of technology (Rosen et al., 2014).

Even though the American Academy of Pediatrics has recommended guidelines for children under two years old regarding screen time, no such guidelines have been proposed for preteens and adolescents (Rosen et al., 2014). Further research has shown that adolescents and preteens are using a large amount of media, and the more screen time one has, the higher the level of reduced physical activity and decreased health (Strasburger & Hogan, 2013). In short, it has been found that adolescents' frequent use of digital devices impacted them in such a negative way that academic performance levels decreased, and dropout rates increased in certain schools (Schargel & Smink, 2014). The use of technology in schools has its positive and negative impacts, but continued training must be provided for teachers as well as students. The knowledge gained will be needed for jobs but will change before many of today's adolescents enter into the job market (Holfeld & Leadbeater, 2017).

School Policies & Online Aggression

Implementing school policies. Challenges may arise when digital technology is used in the classroom and the need to gain success in terms of the students' performance mainly relies on

successful educational leaders implementing policies and guidelines (Jacobson, Johnson, Ylimaki, & Giles, 2005). It is widely known that principals employ specific practices that lead their schools through successful terms of educational teachings and student performance. However, this is not an easy task for the leaders due to challenges such as cyberbullying that may occur before, during, and after school (Carlsson & Jensen, 2006). The challenges can be verbal, mental, and/or physical for both educational leaders and students. Therefore, leaders must be mindful of governance and school policies within their schools when dealing with cyberbullying and other educational/ non-educational challenges (Klar & Brewer, 2013).

Sometimes, to reform the school and support student learning, successful leadership becomes a matter of trust within the school environment (Tschannen-Moran, 2014). For instance, principals could have their faculty and staff's best interest at heart but fail to deliver instructions in an appropriate manner. In other words, some well-intentioned principals are unable to lead their schools into the kind of productive working environments they imagined or envisioned; a power struggle could ensue, or lack of trust could develop. When these principals fall short of earning the trust of their faculty and staff, their vision often ends in frustration and failure (Tschannen-Moran, 2014). In contrast, research has shown that the leadership practices and beliefs of some principals have influenced student achievement (Klar & Brewer, 2013). Those findings illustrated how successful school leadership can be achieved. Those principals illustrated how to use their leadership skills and school reform efforts to assist in a change for the better in their schools.

Updating policies and guidelines. Although the awareness of the harm bullying may cause is relatively recent, policies and guidelines are constantly updated in an attempt to control this issue (Aboujaoude, Savage, Starcevic, & Salame, 2015). Despite the massive increase in

scientific research, all forms of bullying are still significant problems within schools worldwide (Hinduja & Patchin, 2015b). The nationwide effort to reduce bullying in schools in the U.S. is a part of a larger civil and human rights movement that provides children with many of the same rights as adult citizens (Cornell & Limber, 2015). For example, student victims may feel their schools are hostile environments, but the same adult citizen right (protection from harm in the workplace) is afforded to students (in protection from harm in school; Cascardi, Brown, Iannarone, & Cardona, 2014). Civil rights protection against harassment applies to children in protected classes such as, (a) racial and ethnic minorities, (b) victims of gender harassment, (c) students with disabilities, and (d) religious issues (Cornell & Limber, 2015).

It is widely known that leaders in educational systems want their students to succeed in every aspect of the education. Therefore, revisions are constantly being made on educational policies and acts. On December 10, 2015, President Barak Obama signed the newest version of the Elementary and Secondary Education Act (ESEA), which is now called the Every Student Succeeds Act (ESSA; Hodge & Welch, 2016). This reauthorization of the ESEA also refurbished some key components located in the previous version of the NCLB. Many sided with education reform and believed that ESSA is a more improved version of the “rigidity” of the NCLB, so they pushed more authority and accountability to stakeholders nationwide (Hodge & Welch, 2016). Officials believed their actions would increase the likelihood of every child succeeding. Viewing their belief from a different perspective, it appeared as if the problem was with the implementation of the ESSA thus creating a sense of false-hope for students to succeed. ESSA appeared to offer hope for improvement while at the same time widening the gap for implementation failure (Cochran-Smith & Lytle, 2006). For example, the National Conference of State Legislators (NCSL) argued that NCLB was a shocking example of “one size fits-all”

federal reform while others have found that the variation in the implementation of the NCLB was overwhelming to the national mandate (McDermott & Jensen, 2005; Ryan, 2004). Nevertheless, recent research has shown that implementing NCLB may have been an overwhelming factor in the past, but the actual Act has succeeded in reducing the achievement gap (Sadovnik et al., 2013). The importance of looking at potential causes of achievement gaps and implementation failure can be concluded from many studies regarding this issue. One strategy that is believed to be part of a whole-school approach to reduce bullying is the anti-bullying guidelines and policies many schools are required to follow (Chalmers et al., 2016). As online aggression and school bullying policies and guidelines continue to be developed within education, the effectiveness of many policies remain unclear (Chalmers et al., 2016). Since the development of numerous programs, laws and policies about bullying remain inconsistent, thus, further examination of those involved in the policy construction and the strategies for bullying intervention and prevention is warranted (Cascardi et al., 2014).

For more than a decade, the judicial and legislative activity about bullying has been fragmented. Addressing online aggression and bullying in schools has challenged the judicial and legislative efforts to develop effective preventive methods (Aboujaoude et al., 2015). Some of the main challenges are: (a) how bullying is defined, (b) how bullying is distinguished from other forms of peer aggression (online and in school), and (c) from the concept of harassment, who should be protected (Cornell & Limber, 2015). Even though many scholars have agreed that bullying can be defined by the dominance of the aggressor, many students overlook the power imbalance in their reports (Green, Felix, Sharkey, Furlong, & Kras, 2013). From a moral perspective, adolescents and young children who inflict harm on a weaker victim are usually

blamed for the act and expected to suffer the consequences (Cornell & Limber, 2015). Yet, there are greater concerns about both the impact of bullying on the victim and the developmental path of the one bullying others (Ttofi, Farrington, Lösel, & Loeber, 2011).

Disciplinary Actions & Consequences

The disciplinary policies in $\frac{3}{4}$ of the states in the U.S. encourage school systems to discipline student bullies, but there are many differences in the type of disciplinary consequences that are appropriate (Green et al., 2013). Even though the language in many of the state laws are general about the need for remedial and disciplinary actions in schools, several laws clearly state that age-appropriate disciplinary actions should be used (Sacco, Silbaugh, Corredor, Casey, & Doherty, 2012). There are a few states (i.e. Georgia, Missouri, and Arkansas) that authorize harsh punitive consequences that include transfer to an alternative school, expulsion, or suspension (Sacco, et al., 2012). Zero-tolerance policies that mandate severe punishment should be applied to all violations regardless of the circumstances (American Psychological Association Zero Tolerance Task Force; APAZTTF, 2008). Yet, some states elect to use the zero-tolerance for bullying despite the wide-spread criticisms that it is a failed disciplinary policy (Skiba, 2014). Some educators believe that zero-tolerance means a specified form of misbehavior will not be tolerated and its practice in schools will include some form of harsh punishment regardless of the seriousness of the behavior (Morgan, Salomen, Plotkin, & Cohen, 2014). Whether it is intentional or unintentional, the automatic, severe nature of the punishment distinguishes zero-tolerance from other forms of discipline, but many concerns have been raised (Morgan et al., 2014). The APAZTTF (2008) reported that many critics claim zero-tolerance policies are not supported by scientific evidence. Because of this report and other research analyses of students who bully, automatic school suspension has been rejected due to claims that it does not address

the needs of students who bully. Also, automatic school suspension has had a chilling effect on students reporting abuse (Cornell & Limber, 2015). Regardless of the reports of widespread bullying among the general school population, the potentially negative consequences continue to affect students' academic performance after applying the zero-tolerance rule (Morgan et al., 2014).

Summary

Research has shown that adolescents and children have been involved in bullying for many years and with the use of digital technology, cyberbullying has come to the forefront (Nansel et al., 2001). Vygotsky's (1978) social cultural development theory is used for the theoretical framework in this study because he believes that the social and cultural interaction among youths plays a major role in the development of their higher mental thinking (i.e. reasoning; Kozulin et al., 2003). For instance, adolescents' social interaction with peers or classmates online can potentially lead to online aggression (Hinduja & Patchin, 2015b). (Poehner & Infante, 2017). Online aggression among adolescents has become an ongoing problem and only in the past several years have researchers examined its nature and prevalence (Hinduja & Patchin, 2015a). Vygotsky's (1978) social cultural theory showed that social interaction among naturally social youths is notable during the cognitive development process which led to the belief that social learning preceded development. Therefore, allowing the use of technology in schools where students could interact (social learning) was viewed as beneficial to students' academic learning (Kowalski & Limber, 2013). This act of technology use in schools may have been proven to be beneficial to the learning and teaching environments of students and teachers, but it also provided a way for adolescents to engage in unhealthy online activities (Scholte et al., 2013). Adolescents have continued to misuse cell phones, tablets, and personal

computers by developing ways to harass and bully peers, gossip, cheat, and steal (Kuznekoff & Titsworth, 2013). Considering the amount of literature reviewed for this study, the development of many preventative measures, policies, and guidelines for online aggressive behavior among adolescents have not always been effective.

There have been a considerable number of variations in cyberbullying rates of occurrences reported by cyber-victims and cyber-bullies (Kowalski & Limber, 2013). The negative reports have been one of the prominent factors that have led to some frustratingly hostile teaching and learning environments (Hinduja & Patchin, 2011). Additionally, the lack of control over cyberbullying has led to changes and adjustments to many schools' rules and regulations (Kuznekoff & Titsworth, 2013). Even though cyberbullying has been present in schools for quite a few years, the awareness of the harm that online aggression may cause is recent (Eden et al., 2016). Recent research on cyberbullying has documented evidence that bullying may affect the academic work of all victims (Kowalski & Limber, 2013).

CHAPTER THREE: METHODS

Overview

The researcher used a non-experimental predictive correlational design for this study to assist in determining if adolescent cyber-victims' scores have a predictive relationship with their ELA scores. An in-depth view of the research, including the specific methods and the data analysis selected for this study, follows.

Design

A bivariate regression is the non-experimental correlational design used in this study. This was the most appropriate choice because it allowed the researcher to explore the predictive relationship between the predictive variable (PV) and the criterion variable (CV; Gall, Gall, & Borg, 2007; Warner, 2013). The purpose of this correlational study is to test the hypothesis that relates the cyber-victims' scores (PV) to the competency test scores (CV) of eighth grade students at a South Georgia middle school. The competency test scores from the GMAS are generally defined as the results of a test designed to measure how well students acquire knowledge and skills. The online aggression scores from the COAS are generally defined as the use of digital equipment (cell phones, computers, laptops, tablets) to bully, lie, gossip, cheat, or steal. The researcher matched the participants' corresponding scores from the COAS to the scores from the GMAS scores. According to Gall et al. (2007), the Pearson r determines the strength and the direction of the correlation; once the linear relationship was established, a bivariate regression was used to examine the ability of the predictor variable to predict the criterion variable.

Research Question

RQ: Is there a significantly predictive relationship between eighth graders' English Language arts scores from the Georgia Milestone Assessment System and their cyber-victims' scores measured by the victimization section of the Cyberbullying and Online Aggression Survey?

Hypothesis

H₀: There is no significant predictive relationship between eighth graders' English Language arts scores from the Georgia Milestones Assessment System and their cyber-victims' scores as measured by the victimization section of the Cyberbullying and Online Aggression Survey.

Participants and Setting

The sample size for this study consisted of $N = 100$ participants who were selected from a convenience sample of eighth grade students attending a South Georgia school during the second semester of the 2017-2018 school year. The sample selected from the target population consisted of male and female South Georgia students ranging in age from 14 to 16 who had taken the GMAS test.

Participants

The participants for this study were randomly assigned a number from a convenience sample of eighth graders enrolled in English and/or mathematics during the second semester of the 2017-2018 school year. The second semester was selected because it gave the students enough time to settle into their schedules and provided them with enough time to develop cyber relationships. This was also the week after the eighth graders completed the End of Grade (EOG) competency testing. The target population consisted of male and female, eighth grade

students who had already taken the GMAS test. For the convenience sample of eighth grade demographics (see Table 1). One hundred students were randomly assigned a number from the estimated population of 228 qualified students. The researcher was able to conduct this random assignment sampling procedure by obtaining approval from the school's principal.

Table 1

Surveyed Participants' Demographics

Group	<i>n</i>	Percent
Race		
Caucasian	41	41%
African American	37	37%
Hispanic	18	18%
Asians	1	1%
Other	3	3%
Gender		
Female	72	72%
Male	28	28%

The number of participants sampled was $N = 100$, which exceeds the minimum requirement of a medium effect size. The minimum requirement for a medium effect size, according to Warner (2013), is 66 with a statistical power of 0.7 at the 0.05 alpha level. The sample was obtained from a large middle school within the county. The student participants were selected from all eighth-graders registered in English and mathematics classes. Selecting students from math and English was appropriate for this study because these are mandatory courses that prepare students for the next grade. Lastly, math and English are two of the subjects measured on the GMAS test and they measure students' competency levels. The participants

were selected from a convenient group of eighth graders with (72%) female and (28%) male. The ethnic breakdown of the participants was: (41%) Caucasian, (37%) African American, (18%) Hispanic, (1%) Asian, and (3%) two or more races (see Table 1).

Setting

The setting for this study was a South Georgia middle school located in an industrial area. The total population of the school has a targeted population of 733 adolescent students. The school's demographics are 47% Caucasian, 42% African American, 6% Hispanic, 1% Asian, and 4% other. Upon approval, the researcher provided 228 eighth grade students with both letters of assent and consent via their mandatory classes. (English and math teachers passed them out.) Those interested in participating were instructed to return the signed consent and assent forms by the end of the week. The researcher returned one week later to collect the consent and assent forms from the teachers. The teachers were given a packet of COAS surveys. The students were given an approved time and place (i.e., first period, second period) to take the survey and instructed to place it in a large manila envelope (in teacher's possession) once completed. The researcher returned to the school the following week to collect the envelopes (surveys). The setting was chosen based on convenience to obtain the recommended sample size of 100 participants.

Instrumentation

This section focuses on the type of instruments selected and used in gathering data for this study. One instrument used was the Cyberbullying and Online Aggression Survey (COAS) used to measure cyberbullying. The Georgia Milestone Assessment System (GMAS) was used to measure the academic performance levels of each participant. These instruments were

selected because of their reliability, validity, and relevance to the predictive and criterion variables in this study.

Cyberbullying and Online Aggression Survey (COAS)

The COAS was created by Hinduja and Patchin (2015a), pilot-tested, and then refined in four studies (2003-2007). It was utilized in eight different studies with approximately 20,000 eleven to 18-year-old students in over 90 individual schools from 2007 through 2016 (Hinduja & Patchin, 2015a). Some updates were made in 2016 to reflect the changes in social media (i.e., changed Myspace to Facebook). Even though this instrument measures technological misuse among cyber-bullies, the researcher used this instrument to measure cyber-victimization among the eighth-grade participants. Technological misuse is the use of technology in matters that are ineffective, inefficient, or harmful to another (Pascual-Ferrá, 2015). A description of cyberbullying is at the top of the survey. There are two segments: One focuses on victimization, and the other focuses on offenders but only the victimization scores will be used in this study. All questions address the occurrences within the 30 days just prior to taking the test. The Likert scales for both victimization and offending total scores ranges from 0 to 27 totals (never = 0; once = 1; a few times = 2; many times, = 3) with higher sum values representing more involvement in technology misuse. The responses are summed to produce one score for each individual section (victimization, offending).

Validity for the COAS was established by the purpose of the test, which is a measure of cyber-bullying as online aggression and victimization (Hinduja & Patchin, 2015a). Validity also relies on how well the instrument matches the content standards and how the reported scores inform the researcher about the students' online aggression and victimization.

Reliability is determined by the consistency and stability of scores over time. The Cronbach alpha range for the victimization scale is 0.867-0.935, and the offending scale's Cronbach alpha range is 0.793-0.969 (Hinduja & Patchin, 2015a). The factor analysis for the victimization scale ranges from 0.547-0.910, and the offending scale ranges from 0.537 to 0.968. The inter-item correlations range from .30 to .92 in the victimization scale and .45 to .94 in the offending scale. A letter was sent to one of the developers (Dr. Patchin) and the researcher was granted the use of the latest survey (see Appendix A). He also sent an updated version (2016) with a request for results in effort to update the test statistics.

Georgia Milestones Assessment System (GMAS)

The GMAS is also often referred to as the Georgia Milestone. It is a high stakes comprehensive summative assessment program that covers grades three through high school. It is designed to measure how well students have learned the skills and knowledge outlined in the Georgia Code 20-2-281 (2015). Georgia's standards of content measured in this test for eighth graders are: (a) English Language Arts (ELA) - 53% reading and vocabulary along with 47% writing and language; (b) mathematics - includes 28% geometry, 12% statistics and probability, 20% numbers, expressions, and equations; algebra and functions; (c) science includes 30% structure of matter, 40% energy and its transformation, 30% force and motion; (d) social studies 47% history, 12% geography, 25% government civics, and 16% economics. The GMAS replaced the CRCT in the fall of 2014 and was introduced to the students in the spring 2015.

According to the GaDOE, the State Board of Education must adopt annual measures of students' achievement in specific areas and the students are required to participate in the Georgia Milestones assessment program at the end of each grade. Georgia law further mandates that students' achievement scores from this assessment be used to promote or retain students in

grades three, five, and eight; while fifth and eighth graders' achievement scores in math are considered as well. Those who fail to demonstrate achievement must be remediated and offered a retest prior to promotion to first, sixth, and ninth grades (State Board of Education Rule 160 - 4-.11). This assessment program also provides information that will assist with the improvement of teaching and learning. The results of this program are used to identify students who are failing to grasp the content and provide educators with feedback regarding their instructional practice (GaDOE, 2017). It is believed that school districts can prioritize plans for educational programs once the results identify the strengths and weaknesses of students.

Items on the Georgia Milestones assessments for 8th and 9th grade students are developed with emphasis on depth of knowledge (DOK), which is measured on a scale of one to four (1 to 4). These numbers refer to the level of cognitive demand required for task completion or the DOK (GaDOE, 2017). Even though the higher the level, the more complex the assessment may be, the item may not necessarily be more difficult. The following descriptions show the expectations of the DOK levels. Level-1 (Recall) requires students to list, define, or identify who, what, when, and where. This level of thinking basically asks students to recall trends, facts, and concepts. Level-2 (Basic Reasoning) involves mental processing beyond recall or reproduction of a response. At this level, describing or explaining requires students to go deeper and describe and/or explain "how" or "why." Level-3 (Complex Reasoning) requires students to use evidence and think on a much higher level than one and two. Students are asked to justify their explanation or description through application. Level-4 (Extended Reasoning) requires Level 3's complex reasoning along with planning and investigating. Students are required to apply the concept of understanding then relate the ideas within the content area (higher level of application). Some additional features of the Georgia Milestones assessment test

are: (a) open-ended items in ELA and math; (b) students' response (in writing) to a passage self-read; (c) (criterion-referenced information and norm-referenced items in all areas; and (d) online administration as the primary mode and pencil-paper as a backup (GaDOE, 2017).

Validity for the GMAS was established by the clear indication of the purpose of the test which is a measure of how well students have mastered the state's content standards (O.C.G.A. 20-2-281). Validity also relies on how well the instrument matches the content standards and how the reported scores inform the stakeholders (students, parents, and educators) about the students' performance. Overall, validity is established by the process of the test development (GaDOE, 2017).

Reliability for the GMAS is determined by the degree to which the students' test scores are consistent and stable over time. For instance, a reliable assessment would produce stable scores if eighth graders were to take the same test without fatigue or memory effects. The Cronbach alpha reliability expresses the consistency of test scores and for the 2015-2016 school year, the Cronbach alpha for eighth graders ranged from 0.85 to 0.94 (GaDOE, 2017). A request e-mail was sent to Ms. Lucy (pseudonym) in the county's Department of Education, and she replied with a form that needed to be completed prior to granting permission (see Appendix B).

Procedures

The researcher secured approval from the Internal Review Board (IRB) to ensure moral and ethical procedures are put in place to protect the participants from mistreatment (see Appendix C). Approval from the person in charge of research in the county's Department of Education, the school's principal, as well as assent and consent from participants and their parents respectively, was secured (see Appendices D-F). After gaining approval, confidentiality agreements and informational packets were given to the consenting principal. The researcher's

contact e-mail address and phone number were provided for those who had questions or concerns.

Procedures for the COAS

Consent letters were given to all eighth-grade English and math teachers. Those teachers were instructed to give the consent letters to their students in effort to gain parent/guardian signatures, and assent letters for the students to sign were provided as well. The letters explained the importance of this study and that their consent and participation is greatly needed. The assent forms also gave the students an opportunity to refuse to participate if they were selected. Students with signed consent forms were assigned a number from one to one hundred, which coincided with a number on their survey.

A notice was given to eighth-grade teachers notifying them of the selected participants with the date students would be asked to take the survey. Alternate participants to replace those students who chose to opt out were noted as well. As each student entered the area, he or she was asked to print his or her name on a separate sign-in sheet next to a number that corresponded with the number of the survey. The researcher brought hard copies of the numbered surveys to the classroom. At the top of the survey, there was a place for a number instead of a name, and each student was asked to write the corresponding number in the appropriate space. The researcher verified that the survey number and participant's name corresponded with the sign-in sheet prior to providing further instructions. Once the participant's name and number corresponded, the participant was directed to be seated and answer the questions on the survey. The researcher used the survey on the Survey Monkey website to address all questions or concerns. This was done to avoid misleading the student by pointing to specific answers on their numbered survey. The participants were instructed to continue until all six questions had been

addressed then place the completed survey in the manila envelope. The length of time it took to complete the survey varied from student to student; however, many of the students completed the survey within approximately five to ten minutes. At the end of the processes, the list of student names was destroyed to avoid identification of individual responses.

Procedures for the GMAS

At the end of the school year (spring), students are required to take the Georgia Milestones assessment test, which is given in three sections. Sections one and two allow students up to 70 minutes to complete each section. Section three requires an extended written response, and students are given a maximum of 90 minutes to complete that section. The combined estimated completion time for the 8th grade ELA assessment ranges from 190 to 230 minutes. This estimated time does not include the required time for the test examiners to complete pre-administration and post-administration activities (such as reading and explaining test directions). The school district protocols for the End-of-Grade (EOG) measures require the administration of sections one and two to be conducted on the same day, in one test session. Section three must be administered on a separate day, after those sections have been completed by the student. Upon completion of each section, the tests were graded, scored, and saved in the Georgia school system.

The researcher requested copies of 100 anonymous student participants' archived ELA test scores from the county's educational research department. The director of the county school board suggested the researcher obtain the Georgia Milestones scores for the 2016-2017 school year from the state's archived data. After the archived ELA scores were obtained, the researcher gathered the COAS scores from the schools. All scores were transferred to a spreadsheet which separated the COAS scores from the ELA scores. This allowed the researcher to ensure that the

number of participants corresponded with the number of scores from the COAS and the ELA. As the final part of the data collection procedures, the researcher did a check and recheck of all data to correct any mistakes that may have occurred during the transferring process. Afterwards, the researcher entered the data into the statistical software (SPSS, 2013) to start the analysis process.

Data Analysis

Bivariate regression was used to analyze the surveyed data and determine if eighth grade cyber-victims' scores were predictive of their English Language arts scores. Bivariate regression was an appropriate method for analyzing the data in this study because it allowed the researcher to examine the relationship between the predictor variable and the criterion variable (Warner, 2013). According to Warner (2013), this methodology provides reliable inferential data.

Data screening was conducted utilizing the predictor variable (COAS victimization scores) and the criterion variable (GMAS ELA scores). The researcher reviewed all collected data to ensure there were no mistakes made during the administering process and the transference of data to the SPSS. A simple scatter plot was used to check for extreme outliers (presented in Chapter 4), which are observation points distant from the main cluster of points (Warner, 2013). The researcher checked to make sure there was a linear correlation using the Pearson's r . The following assumptions of the bivariate/linear regression test must hold true for the data to be valid. The first assumption is that of bivariate outliers; the scatterplot was used to determine if there were any extreme outliers. The second assumption is the level of measurement whereby the variables were measured on the ratio level and the observations were independent. The ratio scale has an absolute value of zero and satisfies all four properties of measurement (Warner, 2013). The third is the assumption of normality and the Kolmogorov-

Smirnov was used for this assumption test (Warner, 2013) because there are more than 50 participants in this study. The fourth assumption is linearity. A scatterplot was used to determine if there was a linear relationship between the criterion variable (ELA scores) and the predictor variable (COAS scores). The scatterplot was also used to determine the assumption of bivariate normal distribution whereby the researcher looked for the classic “cigar shape”. This test of statistical significance (bivariate linear regression test) was done to assist the researcher in determining if there is a predictive relationship between the cyber-victims’ scores and their competency test scores. The report included:

- Number of participants (N)
- Descriptive statistics (M , SD)
- Pearson (r , r^2)
- Degrees of freedom (df)
- F value (F)
- Significance level (p)
- B , beta, and $SE B$
- Regression equation
- Power

CHAPTER FOUR: FINDINGS

Overview

In this chapter, a detailed report of the findings is provided, including an in-depth analysis of the data collected from the South Georgia middle school surveys. The results show that there is no indication of a predictive relationship between COAS (victimization) and ELA.

Research Question

RQ: Is there a significant predictive relationship between eighth graders' English Language arts scores on the Georgia Milestone Assessment System and their cyberbullying scores measured by the victimization section of the Cyberbullying and Online Aggression Survey?

Null Hypothesis

H₀: There is no significant predictive relationship between eighth graders' English Language arts scores from the Georgia Milestones Assessment System and their cyber-victims' scores measured by the victimization section of the Cyberbullying and Online Aggression Survey.

Descriptive Statistics

Two hundred consent/assent letters were passed out to potential participants the first 100 to return their signed forms were used in this study. Sixty-six participants are the minimum requirement for a medium effect size with a statistical power of .7 at the .05 alpha level (Gall et al., 2007). In the data tables and figures, the criterion variable (CV) is labeled ELA for the English Language arts scores. The dependent measure (CV) consists of the eighth graders' ELA scores ranging from 401 to 623. See Table 2 for the descriptive statistics. Notice the large difference between the mean and the standard deviation represented by the total number of

participants from both variables (COAS, ELA). The scores are spread out therefore, reflecting significant evidence that the COAS scores have a very small impact on the ELA scores.

Table 2

Descriptive Statistics

	Mean	Std. Deviation	N	Min	Max
COAS	13.690	7.000	100	0	27
ELA	539.250	32.475	100	476	617

Assumption Tests

All data were entered in the SPSS 25 and analyzed. A SPSS generated scatterplot was used to check the assumption of bivariate outliers and the assumption of bivariate normal distribution. A scatter plot between the COAS scores (predictor variable) and the ELA scores (criterion variable) was conducted. No extreme outliers were found therefore, the assumption of bivariate outliers was found tenable. The “cigar shaped” plot also indicates a nearly normal distribution therefore the assumption of bivariate normal distribution has been met (Figure 1).

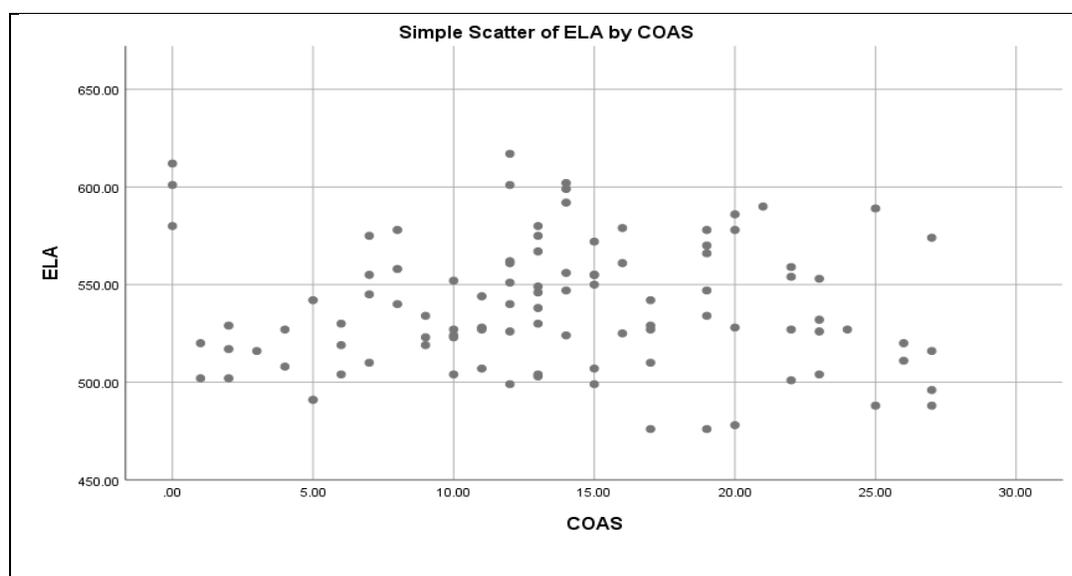


Figure 1. Assumption of Bivariate Outliers & Bivariate Distribution

A scatter plot was generated in the SPSS to test this assumption of linearity. The scatterplot between the predictor variable (COAS scores) and the criterion variable (ELA scores) was used and a “line of fit” was added. The relationship between the criterion variable and the predictor variable was linear therefore, this assumption has been met (see Figure 2).

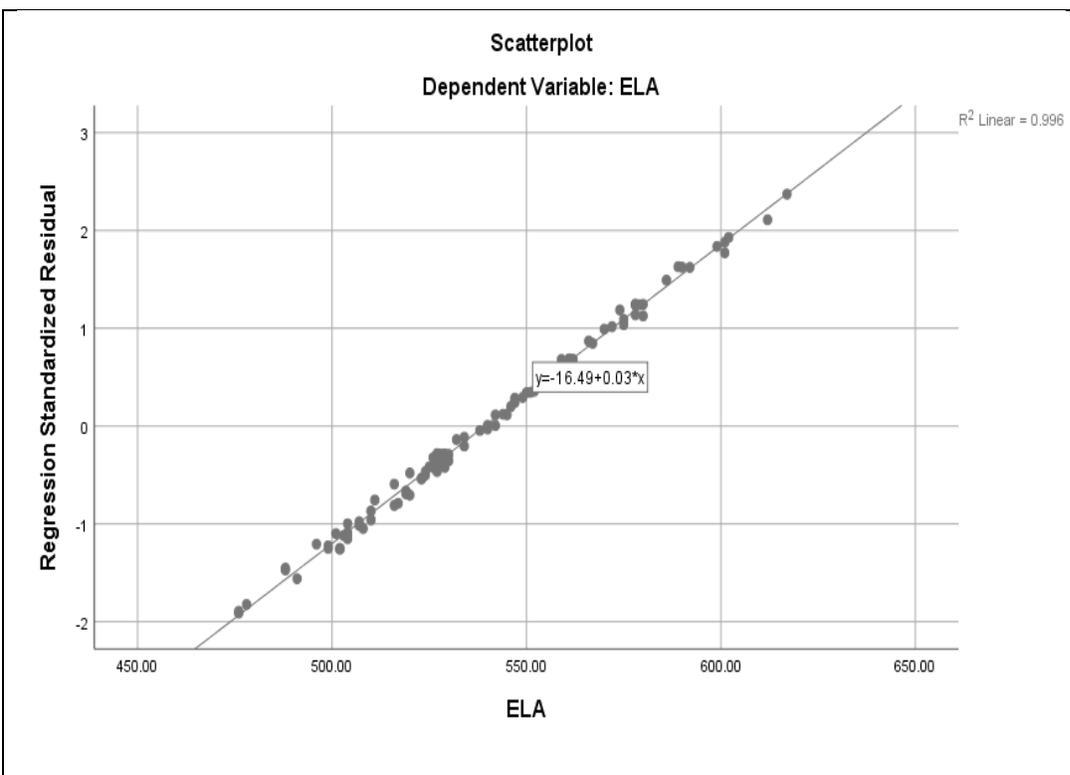


Figure 2. Assumption of Linearity

The assumption of normality was also checked through the SPSS. The Kolmogorov-Smirnov test of normality was used for the 100 participants and indicates the assumption of normality has been met. See Figure 3.

Tests of Normality						
	Kolmogorov-Smirnov ^a			Shapiro-Wilk		
	Statistic	df	Sig.	Statistic	df	Sig.
ELA	.090	100	.047	.979	100	.113
COAS	.064	100	.200*	.976	100	.066
*. This is a lower bound of the true significance.						
a. Lilliefors Significance Correction						

Figure 3. Assumption of Normality

The SPSS was used to check for independence of residuals and homoscedasticity. The data entered from the ELA (regression standardized residual) and the COAS (regression standardized predicted value) were independent of one another and there was no indication that the data obtained from both instruments would have been related (see Figure 4).

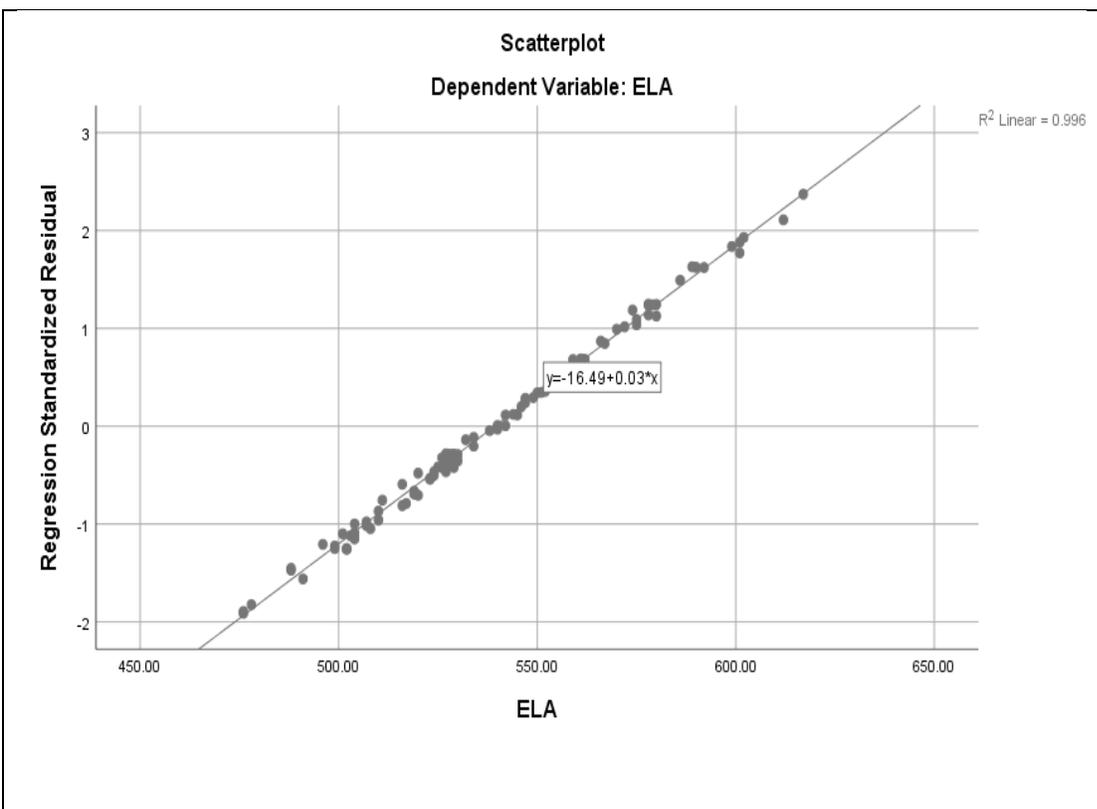


Figure 4. Assumption of Homoscedasticity (Equal Variance)

The assumption of homoscedasticity was tested utilizing the SPSS regression analysis of the scatter plot with the standardized residuals on the y axis and the standardized predictor values on the x axis. Most of the points are on the line but there is some variation. Figure D shows that the distance between the points and the line (moving from left to right) is similar. This indicates homoscedasticity and the assumption of homoscedasticity has been met.

Results

This section includes a detailed review of the data screening process including the

corresponding statistical (Bivariate Regression) used in this study. Additionally, the statistical data and the results of the null hypothesis are provided in detail.

Data Screening

A bivariate data screening was conducted utilizing the criterion variable (ELA scores) and the predictor variable (COAS scores). The screening for these quantitative variables addressed extreme outliers, linearity, normality, and homoscedasticity (Warner, 2013).

The scatterplots were examined to determine if all the assumptions had been met prior to conducting the correlation (Warner, 2013). There were no extreme outliers with the criterion variable or the predictor variable. The linear relationship between the *Y* (criterion variable) and the *X* (predictor variable) was also established utilizing the “line of best fit” (Warner, 2013). The scores on the *Y* (criterion variable) axis and the *X* (predictor variable) axis were normal distance from the line. This indicated normal distribution for the scores on the *Y* (criterion variable) axis and the *X* (predictor variable) axis. The review of the scatterplot also indicated that there were equal variances among the scores and homoscedasticity was established. All the assumptions were met therefore the researcher continued with the correlational analysis of the data.

Null Hypothesis

The null hypothesis states that there is no significant predictive relationship between eighth graders’ ELA scores obtained from the GMAS and their victimization scores obtained from the COAS. In this study, a bivariate regression (non-experimental correlational design) was used to evaluate this null hypothesis. The following assumptions were met therefore, deeming the bivariate regression test valid: no extreme outliers, all variables were measured on the ratio level, observations were independent, normal distribution of scores, and a linear relationship between the criterion and the predictor variable (Gall et al., 2007; Warner, 2013).

The null hypothesis results. A bivariate regression was used to test the null hypothesis at the .05 alpha level. This test assisted the researcher in determining if the eighth graders' COAS scores were significantly predictive of their ELA scores ($N = 100$). The previously conducted analyses displayed no violations in the assumptions of bivariate outliers, linearity, normality, and homoscedasticity (see Figures A through D). The researcher failed to reject the null hypothesis and concluded that there was no significant predictive relationship between eighth graders' COAS scores ($M = 13.690$, $SD = 7.000$) and ELA scores ($M = 539.250$, $SD = 32.475$; see Table 2). In Table 3, $p > .05$, $r = -.064$, $r^2 = 0.004$, indicating a small effect size. Table 4 shows that the COAS scores did not significantly predict the ELA scores with the $df = 98$, $F(1,98) = .397$. Table 5 shows the bivariate correlation coefficients' $B_0 = 543.286$, $B_1 = -.295$, $SE B = 7.184$, therefore the regression equation is: $\hat{y} = 543.286 - .295x$. Table 6 shows the model summary $R = 0.064$, $R^2 = .004$, $adj R^2 = -.006$ which indicates that the predictor variable (COAS) explains a very small percentage of the variability in the criterion variable (ELA scores).

Table 3

Correlations

		ELA	COAS
ELA	Pearson Correlation	1	-.064
	Sig. (2-tailed)		.530
	N	100	100
COAS	Pearson Correlation	-.064	1
	Sig. (2-tailed)	.530	
	N	100	100

Table 4

ANOVA

Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	421.655	1	421.655	.397	.530 ^b
	Residual	103989.095	98	1061.113		
	Total	104410.750	99			

^aDependent Variable: ELA. ^bPredictors: (Constant), COAS

Table 5

Correlation Coefficients

Model		Unstandardized Coefficients		Standardized Coefficients	T	Sig.
		B	Std. Error	Beta		
1	(Constant)	543.286	7.184		75.629	.000
	COAS	-.295	.468	-.064	-.630	.530

^aDependent Variable: ELA

Table 6

Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.064 ^a	.004	-.006	32.57473

^aPredictors: (Constant), COAS. ^bDependent Variable: ELA

The overall conclusion drawn from the bivariate regression's test as it relates to the null hypothesis is that COAS scores are not significantly predictive of ELA scores. Even though there was no significant predictive relationship between COAS and ELA, the test used in this study is robust therefore, the researcher continued with the assumptions testing and data analysis.

CHAPTER FIVE: CONCLUSIONS

Overview

The conclusions discussed in this chapter reexamines the purpose of this study and how the results compare to previous studies. A discussion regarding the theory and literature reviewed during the research process is included in this chapter as well. The limitations and implications of this study are identified. The researcher discusses the importance of studying the relationship between cyberbullying and academic performance among adolescents in the suburbs, as most studies focus on bullying in urban areas. There are also recommendations for future research.

Discussion

The purpose of this correlational study was to examine the potential relationship between eighth grade cyber-victims' scores and the competency test scores. This study was conducted to provide awareness of the seriousness of cyberbullying and the potential impact on victims' academic performance. The data gathered for this study should provide middle school stakeholders with relevant data to assist with the development of cyberbullying prevention programs and more effective programs to meet students' needs.

RQ: Is there a significant predictive relationship between eighth graders' English Language arts scores on the Georgia Milestone Assessment System and their cyberbullying scores measured by the victimization section of the Cyberbullying and Online Aggression Survey?

Null Hypothesis

The null hypothesis is restated as: "There is no significant predictive relationship between eighth graders' English Language arts scores on the Georgia Milestone Assessment System and

their cyberbullying scores measured by the victimization section of the Cyberbullying and Online Aggression Survey.” A bivariate regression was used to test this null hypothesis and the results confirmed that the cyberbullying victimization scores had no impact on the ELA scores. Therefore, the researcher failed to reject the null hypothesis because there was no significant predictive relationship between the two variables.

This study is the first to use the COAS scores to determine if there would be an impact on the ELA scores of eighth graders. The null hypothesis focused on cyberbullied victims and their academic performance. The data analyzed were scores taken from the six-question victimization scale that gauged students’ experience and observation of cyber-victimization (Patchin & Hinduja, 2016). The participants in the South Georgia middle school had 100 surveys completed by 72 females and 28 males. The victimization results had scores ranging from 0 to 27 with no score correlating with students’ ELA scores that ranged from 400 to 650. Overall, the end results showed that adolescent victims’ scores had no significant predictive relationship with their competency test scores.

According to Kinga, Karmen, Eniko, Andrea, and Noemi-Emese (2014), there has not been much data collected in regard to the victimization of adolescent students, due to the lack of reports by observers or the fear of reporting by victims. However, Kinga et al. (2014) found that cyberbullied victims were not as open to experience when compared to cyberbullies. The literature review in this study confirmed these findings, but it also confirmed inconsistencies with other reports regarding cyberbullied students’ academic performance. For instance, the study of adolescents’ performance on high stakes tests and the use of social media was conducted by Fitzgerald (2015), and it was reported in multiple U. S. studies that social media had a “positive” effect on many adolescents’ self-esteem and interaction with others. In contrast,

Patchin and Hinduja (2016) conducted a widely reported study whereby the results showed a “negative” interaction among adolescents that led to frustratingly hostile environments.

Fitzgerald (2015) suggested that the positive effect was due to small classrooms and well-trained teachers, but the same rationale can be applied to this study with different results from both studies. Teachers with over 10 years of experience in a small suburban school participated, and there was neither a negative nor a positive impact on the students.

The driving force behind the theoretical framework supporting this study was Vygotsky’s (1978) social development theory. Vygotsky (1978) believed that social interaction is a vital part of the cognitive process individuals undergo during social development. He discovered that social learning preceded development due to the mind being naturally social. In this digital era, natural socialization is quite common among many adolescent users of digital devices. Unfortunately, natural socialization among adolescent cyberbullies involves the use of digital devices to victimize others and engage in online activities that they may not do in real life situations (Kinga et al., 2014).

According to Fitzgerald (2015), one of the best ways to reduce cyber-bullying and the associated cyber-victimization is through education. Educating students, teachers, and parents about the growing issue of cyberbullying and cyber-victimization has reduced cyber-bullying and led to a stable learning environment (Patchin & Hinduja, 2016). Education appears to play a major role in the reduction of cyber-bullying but creating a safe learning environment is in the hands of the teachers and the students. While incorporating proper online etiquette into the curriculum may be beneficial to all involved, reporting inappropriate online behavior is still the individual’s (victim, observer) responsibility. It has become difficult to obtain an accurate number of cyber-victims because many victims are afraid to report the online aggression and

while many observers (peers) look the other way as cyber-victims continue to suffer in silence (Patchin & Hinduja, 2016). Reporting online aggression can contribute to the development of proper strategies and interventions that may enhance cyber-victims and cyberbullies' social adjustment levels (Scholte et al., 2013).

Implications

There is much to be gained from this study despite the fact that the results indicate that there was no significant predictive relationship between cyber-victimization and ELA test scores. One should consider the results of this study when examining factors that may impact adolescents' performance on competency tests. Many competency tests are mandatory and assists with the determination of a student's readiness to move on to the next grade (Georgia Department of Education, 2017). There are various studies and researched literature that focused on individual subjects of cyberbullying and adolescents' performance on high stakes tests. This study accomplished the goal of contributing to the gap in literature regarding the GMAS competency test and cyber-victimization among adolescents. It extended the research of the GMAS competency test and examined potential impacts on cyber-victims' ELA scores.

The review of relevant literature disclosed many factors regarding the cyberbully who uses electronic devices to prey on unsuspecting victims. Cyberbullying is a very serious and potentially dangerous issue that is an old problem that has gone viral (Aboujaoude et al., 2015). Adolescent cyberbullies, and cyber-victims tend to spend a large amount of time on social media sites. Studies have shown that the more time adolescents spend on the internet, the more likely they are to become cyber-victims (Patchin & Hinduja, 2016). This study assisted to close the gap in literature by suggesting that specific subject areas of the GMAS are not impacted by cyber-bullied victims. However, the awareness of the separate issues of cyber-victims and

adolescents' academic success is contributing factor to the gap in literature. This study gives adolescent cyber-victims a voice that can potentially lead to the development of more effective treatment programs within the education arena. The reader is provided with information regarding the digital world of social media and the reported impact it has on adolescents' self-esteem, suicide, and depression. I agree with findings of Chang et al., (2015) that the reports provide a way to identify potential cyber-victims and/ or cyber-bullies and early detection could lead to the development of effective preventive methods. Additionally, the education of all involved in the academic success of the students can lead to the development of strategies involving the use of digital equipment in more positive ways which can be beneficial to everyone in the educational arena.

This study may be the first to examine the potential impact of adolescent cyber-victimization on the GMAS. As mention previously, the GMAS had only been administered to eighth graders two other times prior to this study being conducted. This end-of-grade test (EOGT) is mandatory in the state of Georgia, and students' academic success levels must be measured to determine if he/she is eligible to pass to the next grade. The generalization of this study across all schools in the suburbs or the entire state of Georgia is impossible, but it expanded on the existing research of the GMAS ELA subject with the hope of finding a relationship with cyber-victimization. The results of this study may not have accomplished the goal of finding a significant relationship, but the overall study contributed to filling in the literature gap regarding cyber-victimization and adolescents' performance in ELA.

Limitations

One of the limitations of this study was the correlational design as the results can only determine relationships and/or predictions not causes and effects (Warner, 2013). Although the

results did not display a statistically significant relationship between cyber-victimization and ELA, one cannot conclude that cyber-victimization *does not cause* adolescent students to earn a specific score in ELA. Therefore, the results of this study cannot be generalized beyond this population.

Another limitation that could impact the results are the samples gathered from the students' surveys. The samples were taken from three eighth grade classrooms within the same school, and that fact may have affected the ability of generalization, which poses a threat to the validity of this study (Gall et al., 2007). The school was in a suburban industrial area of South Georgia, and the questionnaires were given to three English teachers' students. Two of the classrooms were traditional settings and one was a special education class; therefore, the results may have yielded different conclusions if the study had been conducted in a traditional classroom covering a different subject (i.e. math) located in a more urban school.

The limitation of the self-reported data can also potentially impact the validity of the results in this study. Every student participant took the same COAS in a traditional classroom setting, supervised by their English teacher. However, there is the potential for participants to be dishonest (skew the data) any time a self-report survey is used (Hinduja & Patchin, 2015b). To limit the threat of skewed data, specific instructions were given asking everyone to answer each question as honest as possible. All participants had been given the same consent/assent, signed, and returned to the teacher prior to receiving a questionnaire. Once the data collecting process began, the students were reminded not to put any identifying information on the questionnaire to reassure them of their anonymity. They were also given the option to refuse to participate or complete the survey at any time. Fortunately, all 100 participants completed the surveys, and the researcher can presume that the participants answered each question as honestly as possible.

Recommendations for Future Research

Recommendations for future research within the topic of ELA scores or competency tests and cyberbullying victimization are as follows:

1. Gather a larger randomized sample.
2. More schools should be included in future studies.
3. Obtain studies from suburb and urban locations.
4. Gather data from schools other than the state of Georgia.
5. Examine gender, race and/or family social economic status
6. Use a different method (ANOVA: cause & effect).
7. Use an observer-report in addition to a self-report.
8. Use a Qualitative study

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APPENDIX A

Permission Letter

Permission to use your Survey

Patchin, JustinW. <PATCHINJ@UWEC.EDUC>

Thu 23-Mar-17, 09:50

2016_Cyberbullying_Survey_Measures (Hinduja and Patchin).pdf
527 KB

Hello Sy,

See attached. Let us know if you have any questions. All the best with your dissertation.

Justin Patchin

--

Justin W. Patchin, Ph.D.
Co-director, Cyberbullying Research Center
Professor and Program Coordinator of Criminal Justice
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105 Garfield Avenue
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Twitter/IG: @justinpatchin
<http://www.justinpatchin.com>
<http://www.cyberbullying.org/>

APPENDIX B**DISTRICT CONSENT**

Hello [REDACTED]

Per our telephone conversation, please go to the website and complete form, then submit to [REDACTED] prior to the dates listed on the form.

Sincerely,

Human Resource Services
South GA Schools

Disclaimer for South Georgia Schools "The information transmitted is intended only for the person or entity to which it is addressed and may contain confidential and/or privileged material. Any review, retransmission, dissemination or other use of, or taking of any action in reliance upon this information by persons or entities other than the intended recipient is prohibited. If you received this message in error, please contact the sender and delete the material from all computers."

APPENDIX C

IRB Approval

LIBERTY UNIVERSITY.
INSTITUTIONAL REVIEW BOARD

April 27, 2018

Sylvia "Sy" Hudson

IRB Approval 3266.042718: The Impact of Cyberbullying on Adolescents' Georgia Milestones Scores

Dear Sylvia "Sy" Hudson,

We are pleased to inform you that your study has been approved by the Liberty University IRB. This approval is extended to you for one year from the date provided above with your protocol number. If data collection proceeds past one year, or if you make changes in the methodology as it pertains to human subjects, you must submit an appropriate update form to the IRB. The forms for these cases were attached to your approval email.

Thank you for your cooperation with the IRB, and we wish you well with your research project.

Sincerely,

G. Michele Baker, MA, CIP

Administrative Chair of Institutional Research

The Graduate School

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APPENDIX D

School Consent

Conducting Research in ██████ County Principal Approval Form

A school level approval form must be signed by the School Principal of each school involved in the proposed study. Signature requests(s) must be obtained before final approval of the research application is reviewed by the district.

Researcher's Name: Sy Hudson

Project Title: The Impact of Cyberbullying on Adolescents' Georgia Milestones Scores

School: ████████ Middle School **Principal:** ████████

Summary of research study that includes:

1. Brief summary of your research study
2. Statement of the research problem/question
3. Approximate number and description of intended research subjects/participants
4. Data that will be needed and means of collection

1. Brief- Summary of Study

This correlational study investigates the relationship of adolescent cyber-victimization to performance on the Georgia Milestone Assessment System (GMAS) competency test. Technology today allows students to learn how to operate various forms of digital equipment very early, but proper cyber etiquette is not always included. This study will address the potential that cyber-victims ' may have low performance scores on high stakes tests. A closer look at the predictive relationship between the two is an important step in the process for developing plans to resolve this issue. The researcher will use 100 randomly selected adolescent students in the study (as participants). After collecting the Cyberbullying and Online Aggression Surveys (COAS) from the selected adolescents, the researcher will use a bivariate regression to determine what type of impact cyber victimization has on adolescents ' competency test scores measured by the GMAS. A positive or a negative correlation would provide others with information that can assist with the development of corrective instructional methods. Corrective instructional methods being those focused on nonaggressive online behavior.

2. Statement of Problem

The problem is, the academic performance of adolescent cyber-victims has been impacted in unknown ways.

3. Approximate Number of Participants

Approximately 66 - 100 eighth graders who have taken the Georgia Milestones Assessment

4. Data Needed

COAS scores obtained for the participants' Cyberbullying and Online Aggression Survey (FIVE multiple choice questions) GMAS scores obtained from ██████ County School of Education: Contact: ██████

Principal's affirmation: The researcher's application has been reviewed by me, or my designee, and meets all of the following requirements:

- Includes a statement of approval from the program advisor.
- Includes parental consent forms and informed consent documents (for participants), if needed.

3/30/2018

Note to research
completed form with your district application.

applicant: Please submit

████████ County Schools

APPENDIX E

The Liberty University Institutional
Review Board has approved this
document for use from
4/27/2018 to 4/26/2019
Protocol # 3266.042718

PARENT/GUARDIAN CONSENT FORM

The Impact of Cyberbullying Adolescents' Georgia Milestones Scores
Sylvia Hudson
Liberty University
School of Education

Your child is invited to be in a research study regarding the impact of cyber-bullying on their Georgia Milestones' scores. He/she was selected as a possible participant because he/she is an eighth grader attending a [REDACTED] County school and has taken the Georgia Milestones competency test during the 2016-2017 school year. Please read this form and ask any questions you may have before agreeing to allow him or her to be in this study.

Sylvia Hudson, a doctoral candidate in the School of Education at Liberty University, is conducting this study.

Background Information: The purpose of this study is to determine if there is a statistical predictive relationship between cyberbullying victims and their Georgia Milestones scores. Analysis of the data will assist the researcher in determining if there is a relationship between the two and assist in determining if the students' scores are impacted positively, negatively, or not at all by cyberbullying.

Procedures: If you agree and allow your child to be in this study, he/she will be asked to complete an anonymous survey. Estimated time to complete: 10-15 minutes. I will also obtain the Georgia Milestones scores of the participants, but student names will be removed from the scores before they are provided to me.

Risks: The risks involved in this study are minimal, which means they are equal to the risks your child would encounter in everyday life.

Benefits: Participants should not expect to receive a direct benefit from taking part in this study.

Compensation: Your child will not be compensated for participating in this study.

Confidentiality: The records of this study will be kept private. Research records will be stored securely, and only the researcher will have access to the records.

- Data collected will be anonymous.
- Data will be stored on a password locked computer and/or lock file cabinet. Data may be used in future presentations and after three years, all data will be destroyed or deleted.

Voluntary Nature of the Study: Participation in this study is voluntary. Your decision whether or not to allow your child to participate will not affect his or her current or future relations with Liberty University or [REDACTED] Middle School. If you decide to allow your child to participate, he or she

is free to not answer any question or withdraw at any time prior to submitting the survey without affecting those relationships.

How to Withdraw from the Study: If your child chooses to withdraw from the study, your child should inform the teacher that he or she wishes to discontinue participation prior to submitting your study materials. Your child's responses will not be recorded or included in the study.

Contacts and Questions: The researcher conducting this study is Sylvia Hudson. You may ask any questions you have now. If you have questions later, **you are encouraged** to contact her by email at shudson1@liberty.edu or phone at [REDACTED] You may also contact the researcher's faculty chair, Dr. L. W. Nichols, by email at lwnichols@liberty.edu.

If you have any questions or concerns regarding this study and would like to talk to someone other than the researcher, **you are encouraged** to contact the Institutional Review Board, 1971 University Blvd, Green Hall 1887, Lynchburg, VA 24515 or email at irb@liberty.edu.

Please notify the researcher if you would like a copy of this information for your records.

Statement of Consent: I have read and understood the above information. I have asked questions and have received answers. I consent to allow my child to participate in the study.

Signature of Parent

Date

Signature of Investigator

Date

The Liberty University Institutional Review Board has approved this document for use from 4/27/2018 to 4/26/2019 Protocol # 3266.042718

APPENDIX F

The Liberty University Institutional
Review Board has approved this
document for use from 4/27/2018 to
4/26/2019 Protocol # 3266.042718

ASSENT OF CHILD TO PARTICIPATE IN A RESEARCH STUDY

What is the name of the study and who is doing the study?

Study Name: The Impact of Cyberbullying on Adolescents' Georgia Milestones Scores

Researcher: Sylvia Hudson

Why are we doing this study?

I am interested in studying how cyberbullying victims perform on their competency tests.

Why are we asking you to be in this study?

You are being asked to be in this research study because you will be entering high school next year and I would like to see how you perform on your competency test before you take on the challenges of being a freshman in high school.

If you agree, what will happen?

If you are in this study, you will be asked to do the following things:

1. Your teacher will give you a survey with six multiple choice questions to complete.
2. It should take 10-15 minutes to complete
3. Return the survey to your teacher.

Do you have to be in this study?

No, you do not have to be in this study. If you want to be in this study, then tell the researcher. If you don't want to, it's OK to say no. The researcher will not be angry. You can say yes now and change your mind later. It's up to you.

Do you have any questions?

You can ask questions any time. You can ask now. You can ask later. You can talk to the researcher.

If you do not understand something, please ask the researcher to explain it to you again.

Signing your name below means that you want to be in the study.

Signature of Child

Date

Researcher: Sylvia Hudson shudson1@liberty.edu or phone: [REDACTED]

Chair: Dr. L. W. Nichols lw nichols@liberty.edu

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