PARENT'S INTERNET MONITORING AND COMMUNICATION STRATEGIES

THESIS

Presented to the Graduate Council of
Texas State University-San Marcos
in Partial Fulfillment
of the Requirements

for the Degree

Master of EDUCATION

by

Sally Moody, BHWP

San Marcos, Texas
May 2012

PARENT'S INTERNET MONITORING AND COMMUNICATION STRATEGIES

Committee Members Approved:

_____

Kelly Wilson, Chair

_____

Jeff Housman, Member

_____

Ruben Garza, Member

Approved:

_____

J. Michael Willoughby
Dean of the Graduate College

FAIR USE AND AUTHOR'S PERMISSION STATEMENT

Fair Use

This work is protected by the Copyright Laws of the United States (Public Law 94-53, section 107). Consistent with fair use as defined in the Copyright Laws, brief quotations from this material are allowed with proper acknowledgment. Use of this material for financial gain without the author's express written permission is not allowed.

Duplication Permission

As the copyright holder of this work I, Sally Moody, authorize duplication of this work, in whole or in part, for educational or scholarly purposes only.

ACKNOWLEDGEMENTS

I would like to express my sincere appreciation to Dr. Kelly Wilson for her encouragement and patience during this thesis project and guidance throughout my graduate coursework. I would also like to think Dr. Jeff Housman for having a positive attitude and teaching me how to become a better researcher. Thank you to Dr. Ruben Garza for your insight and revisions to my thesis. Thank you to the Health Education Faculty for teaching me and helping me to become a well-prepared professional. I would also like to thank all of my family and friends for your support of my academic endeavors.

This manuscript was submitted March 28, 2012.

TABLE OF CENTENTS

Page

LIST OF TABLES

LIST OF FIGURES

CHAPTER I

INTRODUCTION

Nearly 93% of adolescents use the Internet (Lenhart, Madden, Macgill, & Smith, 2007). Many parents believe children need the Internet to be successful in school; however, parents are also concerned about children coming across inappropriate materials such as pornography while using the Internet (Wang, Bianchi, & Raley, 2005). Parental behaviors can help reduce children's cyber risks. The focus of this study was parental risk perceptions, outcome expectations, perceived self-efficacy and behaviors in relation to their children's Internet use. Specifically, this study examined monitoring and communication strategies implemented by parents of children 12-17 years old.

The sample included Texas State University-San Marcos Staff, categorized as professional or clerical/secretarial employees who are parents of children 12-17 years old with Internet access in their home. An e-mail invitation was sent to staff's work e-mail address, but the survey was available to complete at their convenience. The Web-based survey was made available through an e-mail invitation via surveymonkey.com. Data were collected and entered into an SPSS data file and results were reported using descriptive quantitative data.

Conceptual Framework

      The Social Cognitive Theory (SCT) describes how personal factors, the

environment, and behavior influence one another (Rimer & Glanz, 2005). The SCT

poses that anticipated consequences influence the motivation for action; thus, adolescents

learn behaviors partly through the way their parents respond to behaviors (Hardy, Carlo,

& Roesch, 2010). Constructs from the SCT, including outcome expectations, risk

perceptions, perceived self-efficacy, and behavior were utilized in this study. Outcome

expectations have been described as beliefs about the likelihood and value of the

consequences of behavioral choices, which included risk perceptions. Perceived self-

efficacy has been described as beliefs about one's personal ability to perform behaviors

which bring desired outcomes (Glanz, Rimer, & Viswanath, 2008).
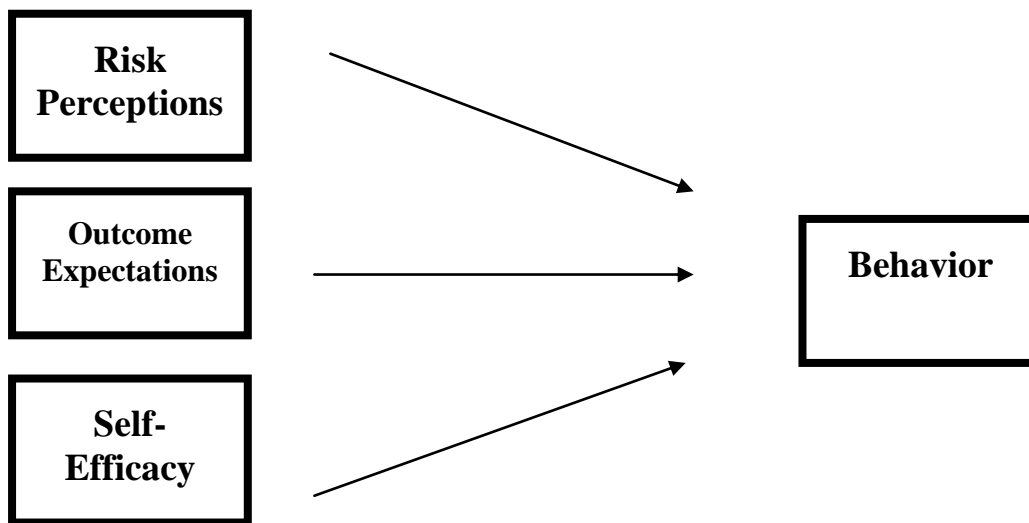
Figure 1. Conceptual Framework

Statement of Purpose

The purpose of this research study was to examine parents' perceptions regarding cyber risk behaviors that might occur during Internet activity and parent' responses to various consequences as a result of those behaviors.

Research Questions

In order to assess parents' risk perceptions, outcome expectations, perceived self-efficacy and behaviors, the following research questions guided this study:

1. What are parents' perceptions of cyber bullying risk for their children during Internet activity?

2. What are parents' outcome expectations for their children regarding Internet activity?

3. What are parents' perceived self-efficacy for monitoring their children's Internet activities?

4. What are parents' perceived self-efficacy for communicating with their children about Internet activities?

5. What methods do parents use to monitor their children's Internet activity?

6. What methods do parents use to communicate the children's Internet activity?

Statement of the Problem

The majority of youth spend time online, and some experience potentially harmful risks when accessing the Internet. According to the Pew Internet and American Life Project (2009), 93% of teenagers ages 12-17 use the Internet. About 32% of online teens have experienced some type of online harassment (Lenhart, 2007).   Cyberbullying

should be considered a serious health issue because it can be related to a variety of health problems among its victims, including depression (Dehue, Bolman, & Vollink, 2008). Approximately 1 in 7 youth have received unwanted sexual solicitation while online, and four percent have experienced aggressive sexual solicitation, where the predator attempted or made contact with the child while offline (Wolak, Mitchell, & Finkelhor, 2006).

Parents are concerned how their children use the Internet and monitor their children's online activity; however, parents and children seldom discuss positive and negative Internet experiences (Liau, Khoo, & Ang, 2005). The majority of parents have rules about how long their children can stay online; however, both parents and teenagers report teens participate in behaviors online they would not want their parents to know about (Lenhart, 2005; Wang, 2005). Although parents may be unaware of all of their child's Internet activity, they are concerned about the potential hazards that these activities may cause (Rosen, Cheever, & Carrier, 2008).

Research suggests children who have computers in their bedrooms are more likely to participate in aggressive messaging with their peers and develop hostile Web sites (Campbell, 2005; Law, Shapka & Olsen, 2010; Mishna, Siani & Solomon 2009). Additionally, children with computers in their bedrooms spend double the time on the Internet than those who do not, regardless of parental monitoring techniques (Eastin, Greenberg, & Hofschire, 2006). Studies have also indicated parents underestimate their own children's bullying behavior and the risk of bullying and are unaware of Internet harassments, such as name calling and gossiping (Dehue, 2008; Mastunaga, 2009).

Significance of the Study

Several studies have shown that parenting style and monitoring plays a role in their children's Internet behavior and is a predictor of minimizing adolescent's aggressive behavior (Huebner, 2003; Rosen, 2008), and that parenting behaviors are a significant predictor of whether or not teenagers send aggressive messages online. While it is important to monitor children's online behavior, studies have shown that children with open communication with parents are less likely to be online bullies. Parents that monitor their children's Internet behavior also establish communication channels with them (Law, 2010), and children who openly communicate with their parents are less likely to be online bullies. Several studies have shown that parenting style and monitoring plays a role in their children's Internet behavior (Huebner, 2003; Rosen, 2008). Parental monitoring has been a predictor of minimizing adolescent's aggressive behavior (Huebner, 2003).

The Social Cognitive Theory (SCT) has been used in other studies to explore parental behaviors. The SCT has been used to examine the relationship between adolescents' social cognitions and parenting practices (Hardy, 2008). Dilorio et al. (2000) investigated the role of outcome expectations and self-efficacy, and parent-child communication about sex; additionally, Dilorio, McCarty, and Denzmore (2006) studied the relationships between outcome expectations, self-efficacy, and father-son communication regarding sex.

While several studies aimed at parent's monitoring and communication techniques, very little research has incorporated constructs of the SCT to examine

parental monitoring and communication strategies related to children's Internet use. The SCT provides an avenue to examine factors related to parents' communication and monitoring behaviors related to their children's Internet behavior.

Assumptions

It was assumed that Texas State University-San Marcos Staff answered questions posed by the researcher in an honest manner and that participants had basic knowledge of cyber risks. It was also assumed that participants would understand key terms provided at the beginning of the survey, and that Texas State University-San Marcos Staff reflect those of other parents not affiliated with the University.

Delimitations and Limitations

This study was delimited to Texas State University-San Marcos staff in the categories of professional and clerical/secretarial. The study was limited to Texas State University-San Marcos staff that voluntarily completed the online survey. Children of the parents were not evaluated in this study. The data was limited to self-reported data collected from participants.

Key Terms

Term	Definition
Cyber risk	potential abusive online behaviors including bullying, stalking, solicitation, and exposure to pornography.
Cyberbullying	the use of information and communication technologies to support deliberate, repeated, and hostile behavior by an individual or group that is intended to harm others.
Sexual predator	a person who is likely to commit sexually oriented offenses.
Sexual picture	nude, partially nude, and/or sexually suggestive photos.
Online	refers to being connected to the Internet.
Monitoring	refers to parents tracking their children's Internet activity.
Communication	refers to dialogue between the parent and child.
Internet activity	refers to risky behaviors on the Internet that may lead to cyber bullying or other consequences.

Sources: Huebner, 2003

Data Collection

The survey instrument was created using a review of the literature. The instrument addressed parental outcome expectations, perceived self-efficacy, risk-perceptions, monitoring behavior, and communication behavior; constructs of the social-cognitive theory. The sample was made up of staff from Texas State University-San Marcos with children 12-17 years old. An e-mail invitation was sent to potential participants asking them to partake in the online survey. Further discussion about data collection can be found in Chapter II, Methodology.

Data Analysis

Data analysis consisted of multiple regressions, factor analysis, correlations, and analysis of variance. Multiple regressions were used to find relationships between the dependent and independent variables (Allison, 1999). Factor Analysis validated scales and determined if items were loading as expected (Garson, 2012). Correlations were used to find relationships between variables (Salkind, 2009). ANOVA was used to find statistical significance between groups (Plonsky, 2012). More in depth discussion about data analysis can be found in Chapter III, Results.

CHAPTER II

METHODOLOGY

Introduction

The purpose of this study was to assess parent's risk perceptions, outcome expectations, perceived self-efficacy, and parental behaviors in relation to their children's Internet use. The Texas State University-San Marcos Institutional Review Board approved this study on October 5, 2011 (IRB # 2011N7082).

Data Collection Techniques

A survey instrument was created to assess risk perceptions, outcome expectations, perceived self-efficacy, and parental behaviors in relation to their children's Internet use. Risk perceptions, outcome expectations, perceived self-efficacy, and behaviors are constructs of the Social Cognitive Theory. Outcome expectations refer to beliefs about the likelihood and value of the consequences of behavioral choices, including risk perceptions. Self-efficacy refers to beliefs about personal ability to perform behaviors that bring desired outcomes (Glanz, 2008). The instrument consisted of 55 questions, using a 5- point Likert scale of "very high, high, similar, low, and very low" for risk perceptions and a 4-point Likert scale of "not true at all, barely true, somewhat true, and very true" for outcome expectations, self-efficacy, and behavior. Conner and Norman (2003) stated outcome expectancy questions should be worded in 'If-then' form and self-

efficacy questions should be stated as confidence statements. Using the above-mentioned ("very high, high, low, and very low" and "not true at all, barely true, somewhat true, and very true") was also recommended. This instrument contained questions regarding monitoring and communication behaviors. According to the literature, setting Internet rules was important, however, it was considered more important to communicate with children, and encourage self-disclosure (Law, 2010). Demographic variables were placed at the end of the instrument. The participants were asked to identify gender, ethnicity, personal Internet use, age, martial status, language spoken at home, and children's age. Children parental ages have been shown to be significant predictors for parents implementing Internet rules and placing monitoring software on home computers (Wang, 2005). The instrument was reviewed for content, reliability, and validity by researchers in the field of health education.

Examples of Survey Items

Construct	Question	Scale
Risk Perception	My children's risk of being a victim of cyber bullying is …compared to the average child of their age and sex.	Very High, High, Similar, Low, Very Low
Outcome Expectations	I am certain I can communicate with my children about not becoming a victim of cyber bullying.	Not True at All, Barely True, Somewhat True, Very True
Perceived Self-efficacy	I am certain I can communicate with my children about not becoming a victim of cyber bullying.	Not True at All, Barely True, Somewhat True, Very True
Parental Behaviors	I check the history on the computer my children use to see what Web sites they may have viewed.	Not True at All, Barely True, Somewhat True, Very True

The instrument was designed to measure selected constructs from the SCT, including risk perceptions, outcome expectations, perceived self-efficacy, and behaviors. Other topics addressed on the instrument were communication and monitoring techniques related to being a victim of and/or being cyberbully, encountering and/or being a sexual predator online, posting and/or viewing sexual pictures online. Behaviors assessed included checking the computer's history, having the computer in an open area, interacting with children while online, enforcing rules, keeping track of time, having parental controls set, and communication. The complete instrument can be found in Appendix A.

Participants

Participants were recruited through the Texas State University-San Marcos e-mail system. Staff members under professional and secretarial/clerical categories were invited to participate in this study. These staff members were invited because the majority of these positions have required qualifications for formal education that is above the 11th grade reading level on the instrument. Two questions were designed to eliminate employees who did not have children aged 12-17 with Internet access in the home. If their answer was "yes," to both questions, they proceeded to complete the survey. If their answer was "no," to either question they were directed to a "thank you" message and did not complete the survey. Therefore, participants in the study were Texas State University- San Marcos Staff who were parents of children 12-17 years old who had access to the Internet at their home. The instrument was distributed during the fall of 2011.

Variables

Measures in this study included risk perceptions, outcome expectations, perceived self-efficacy, and parental behaviors in relation to their children's Internet use. Dependent variables were parental communication and monitoring behaviors and independent variables were parent's risk perceptions, outcome expectations, and perceived self-efficacy.

Procedure

An e-mail invitation was sent to Texas State University- San Marcos Staff, using the Texas State University-San Marcos e-mail System. The e-mail included an invitation to participate in the study and a URL to the electronic survey. The survey was available for completion for a three-week period from November 30, 2011 through December 19, 2011 via surveymonkey.com. Participation was voluntary and participants were only allowed to complete the survey one time. Prior to completing the survey participants agreed to participate in the survey by signing an electronic consent form (consent form can be found in Appendix B). The consent form indicated that responses would be confidential. Time required to complete the survey was approximately eight to ten minutes.

An e-mail reminder was sent to staff members one week after the initial invitation on December 9, 2011, either thanking them for participating or requesting their participation in the study. A final reminder was sent on December 19, 2011 thanking participants for their completion of the survey or requesting again that they participate in the study. Information provided was exported from surveymonkey.com into Statistical

Package for the Social Sciences. Data were stored on a password-protected computer and will be securely deleted and removed from the computer after two years.

Consent Form

Participants had to agree to the terms and conditions of a consent form before they were permitted to complete the survey. The consent form provided the contact information for the principal investigator and the committee chair so participants could inquire about the study results if they desired. It also provided the Institutional Review Board's contact information. Participants were informed that all information provided would be kept confidential. The participants had to indicate that they agreed with the terms and conditions by clicking "agree or disagree" at the end of the consent form. By clicking agree and completing the survey, the participants consented to being a part of the study. A copy of the consent form can be found in Appendix B.

Incentives and Contact Information

Participants had the opportunity to win a 25 dollar gift card by participating in the survey. At the end of the survey, staff members were able to voluntarily enter their contact information in a separate database if they wished to participate in the drawing. All contact information was kept confidential.

Pilot Protocol

A pilot test was conducted to test the survey instruments' reliability and validity and to estimate the length of time required to complete the survey. The pilot test was disseminated to Texas State University-San Marcos Staff and Faculty in the Department of Health in Human Performance that met the subject criteria. These staff members were not eligible to participate in the final study. An e-mail invitation was sent to the staff

inviting them to participate in the study. If the invitation was accepted, participants were presented with a consent form stating that all information would be kept confidential. Participants were required to consent before completing the survey instrument; if participants did not consent they were forwarded to a "thank you" message and were not permitted to finish the survey. The participants completed the survey through surveymonkey.com.

Feedback from pilot study participants indicated that it was difficult to answer some of the risk perception questions, because they felt that their child's risk was neither higher nor lower than their peers; therefore, It was also decided to change the risk perception scale from a 4-point Likert to a 5-point Likert. Thus, the scale changed from "Very High, High, Low, Very Low" to "Very High, High, Similar, Low, and Very Low." Additionally, risk perceptions items were placed at to the end of survey instrument rather than the beginning.

Factor Analysis of Scales

Factor analysis was conducted during the study to determine if outcome expectations monitoring and communication items, perceived self-efficacy monitoring and communication items, risk perceptions monitoring and communication items, and monitoring and communication behavior items were measured as expected. Tables 1 through 7 explain the results of the factor analysis for this study.

Tables 1 and 2 show outcome expectations for communication and monitoring results. Outcome expectations were measured to see if parents believed performing parental behaviors reduced their children's cyber risks. Both outcome expectations for communication and monitoring loaded on one factor. Outcome expectation

communication items ranged from .727 - .848, and outcome expectation monitoring items

ranged from .812-.902

Table 1: Factor Loadings Outcome Expectations for Communication

If I talk with my children about the dangers of Internet activity, then it would reduce their risk of	Factor 1
being a victim of cyberbullying.	.735
being a cyberbully.	.826
encountering sexual predators.	.727
being a sexual predator online.	.845
viewing sexual pictures online.	.730
posting sexual pictures online.	.848

Table 2: Factor Loadings Outcome Expectations for Monitoring

If I monitor my child(ren)'s Internet activity, then it would reduce their risk of	Factor 1
being a victim of cyberbullying.	.812
being a cyberbully.	.887
encountering sexual predators.	.895
being a sexual predator online.	.902
viewing sexual pictures online.	.853
posting sexual pictures online.	

Tables 3 and 4 show factor analysis results for parent's perceived self-efficacy for

communicating with their children about cyber risks items and perceived self-efficacy for

monitoring children's Internet behavior items. Perceived- self-efficacy was measured to

see if parents believed they could carry forth communication and monitoring behaviors.

The analysis showed all items were loading on expected factors. Perceived self-efficacy

communication items ranged from .834-.890, and perceived self-efficacy monitoring

items ranged .859-.914.

Table 3: Factor Loadings Perceived Self-Efficacy for Communication

I am certain I can communicate with my children about how to avoid	Factor 1
being a victim of cyberbullying.	.834
being a cyberbully.	.835
encountering sexual predators.	.890
being a sexual predator online.	.864
viewing sexual pictures online.	.868
posting sexual pictures online	.872

Table 4: Factor Loadings Perceived Self-Efficacy for Monitoring

I am certain I can monitor my child(ren)'s internet activity to help them avoid	Factor 1
being a victim of cyberbullying.	.859
being a cyberbully.	.901
encountering sexual predators.	.908
being a sexual predator online.	.907
viewing sexual pictures online.	.907
posting sexual pictures online.	.914

Parent's communication behaviors loaded on one factor. Table 5 shows factor

analysis results for parent's communication behaviors. The analysis showed

communication behavior items loaded on expected factors. Communication behavior

items ranged .624-.926.

Table 5: Factor Loadings Communication Behaviors

	Factor 1
I communicate with my children about how to avoid sexual predators while active on the Internet.	.624
I communicate with my children about the types of photographs that are appropriate to post on the Internet.	.877
I communicate with my children about the types of photographs that are inappropriate to post on the Internet.	.896
I communicate with my children about the types of photographs that are appropriate to view on the Internet.	.926
I communicate with my children about the types of photographs that are inappropriate to view on the Internet.	.912
I communicate with my children about becoming a victim of cyber bullying	.798

Table 6 shows factor analysis results for parental monitoring behaviors. Parental

monitoring behavior items had two components. Component 1 items loaded at .437 and

higher, with the exception of one item (-.626), and component 2 items loaded at .013 and

higher, with the exception of two items (-.047 and -.738). Checking computer history

and setting parental control components differed greatly from all other items. These

items were removed, because they were not explanatory.

Table 6: Factor Analysis Monitoring Behaviors

	Component 1	Component 2
I have checked the history on the computer my children use to see what internet sites they have viewed within the last month.	-.626	.312
I have the computer my children use at our home in an open area that is visible to me.	.707	.376
I interact with my children while they are active on the internet. (e.g. playing games, researching topics for homework, exploring family vacations, etc.)	.578	.478
I enforce rules about what Web sites my children are allowed to visit.	.747	-.047
I keep track of how much time my children spend on the Internet.	.829	.013
I have parental controls on my computer to monitor my child(ren)'s Internet activity.	.437	-.738

Table 7 shows factor analysis results for risk perception items. The risk

perception items each had two components. The first component explained the items

were measuring risk perceptions. Component 1 ranged from .748- .838. The second

component ranged at .387 and higher and -.173 and below. This suggests parents

recognize that their children are at risk of being victims of cyber risks, but they do not

recognize their children may be at risk for being a perpetrator of cyber risks.

Table 7 Factor Analysis Risk Perceptions		
Compared to average children the same age and sex		
my child(ren)'s risk of being a victim of cyberbullying is…	.760	.387
my child(ren)'s risk of being a cyberbully is…	.815	-.173
my child(ren)'s risk of encountering sexual predators online is…	.748	.458
my child(ren)'s risk of being a sexual predator online is …	.810	-.508
my child(ren)'s risk of viewing sexual pictures online is …	.760	.417
my child(ren)'s risk of posting sexual pictures online is …	.838	-.479

Note. The response scale was Very High, High, Similar, Low, and Very Low

Data Analysis

After data collection was completed date were exported from surveymonkey.com

into SPSS.   After initial data cleaning and factor analysis was conducted, further

statistical analysis was performed to answer research questions. Correlations were

conducted in this study to describe relationships between variables (Lanthier, 2002), and

analysis of variance was used to test statistically significance differences between

outcome variables. (Plonsky, 2012). Multiple regressions were used to investigate the

relationships between dependent and independent variables (Allison, 1999). Further

discussion of data analysis and the results will be examined in Chapter III.

CHAPTER III

RESULTS

Introduction

Parent's monitoring and communication behaviors, perceived self-efficacy, outcome expectations, and risk perceptions regarding their children's Internet use were examined in this pilot study. Dependent variables were parent's monitoring and communication behaviors, and parent's perceived self-efficacy, outcome expectations, and risk perceptions related to monitoring their children's Internet behavior and communication about cyber risks were independent variables.

Descriptive statistics were used to assess the distribution of responses. Correlations helped determine the strength of relationships between variables (Lanthier, 2002), and multiple regression analyses were used to examine collective relationships between independent and dependent variables (Allison, 1999) Analysis of Variance (ANOVA) was used to test variables for statistically significant differences (Plonsky, 2012).

Missing Data

Missing data ($< 1\%$) in this study indicated no clear pattern; therefore, missing data were missing at random (MAR) (Buhi, Goodson, & Neilands, 2008). Missing data were replaced through multiple imputation using NORM multiple imputation software.

Sample Characteristics

Seventy-three respondents were included in the data analysis. Participant ages ranged from 30 to 59 years of age. The majority of respondents (59.4 %) were 40-49, 20.3% were 30-39, and 20.3% were 50-59. The sample was mostly female (82.6 %), and all respondents had at least one child between the ages of 12-17. Fifteen respondents (17.2 %) had a 12 year old, 10 respondents (11.5 %) had a 13 year old, 14 respondents (16.2 %) had a 14 year old, 19 respondents (21.8 %) had a 15 year old, 11 respondents (12.6 %) had a16 year old, and 18 respondents (20.7 %) had a 17 year old. Forty-five respondents (55.6 %) had a male child and 36 respondents (44.4 %) had a female child. The majority of respondents (92.6 %) identified their race as White, 2 respondents (2.9%) were Native American, 1 respondent was Asian (1.5%) and 2 were African American (2.9%) (Table 8).

Table 8. Frequency Distribution of Selected Demographic Characteristics

Variable	N	%
Gender		
Male	12	17.4
Female	57	82.6
Child's Gender		
Male	45	55.6
Female	36	44.4
Current Age		
30-39	14	20.3
40-49	41	59.4
50-59	14	20.3
Child's Age		
12	15	17.2
13	10	11.5
14	14	16.2
15	19	21.8
16	11	12.6
17	18	20.7
Race		
Native American	2	2.9
Asian	1	1.5
African American	2	2.9
White	63	92.6

Descriptive Statistics

Tables 9 through 16 contain descriptive statics for each scales' designated item.

The tables depict the frequencies of responses from the sample of parents. Conbach's

Alpha is also listed.

Outcome expectation items were included to assess if parents believed carrying-

out a behavior would reduce their child's chances of encountering cyber risks. The

majority of parents in this sample strongly believed that if they talked to their children

about the dangers of Internet activity, their cyber risks would be reduced; the results are

listed in Table 9. The majority of the respondents answered "very true" or "somewhat

true" to the items of this scale. The individual item "If I talk with my children about the

dangers of Internet activity, then it would reduce their risk of viewing sexual pictures online," received the highest disagreement on the outcome expectations communication scale. Twenty-four percent (n=17) responded that this was "barely true."

Most parents agreed that monitoring children's Internet activity would reduce cyber risks. Table 10 depicts that 89% of the parents stated it was "very true" or "somewhat true" that monitoring their children's Internet activity would reduce their risk of becoming a victim of cyberbullying. Next, 93% of parents indicated monitoring children's Internet behavior would reduce their risk of becoming a cyberbully. The majority of parents (88% and 90% respectively) also believed that monitoring children's Internet activity would reduce their risk of encountering or becoming a sexual predator online. When asked if monitoring their children's behavior would reduce their risk of viewing a sexual picture online, ninety percent of the parents in this pilot study said it was "very true" or "somewhat true." Ninety-four percent of the parents believed monitoring children's Internet activity would reduce their risk of posting a sexual picture online.

Table 9. Frequency of Outcome Expectation Communication Items

If I talk with my child(ren) about the dangers of Internet activity, then it would reduce their risk of	Not At All True N(%)	Barely True N(%)	Somewhat True N(%)	Very True N(%)	Total N
being a victim of cyberbullying.	5(6.8)	6(8.2)	43 (58.9)	19 (26)	73
being a cyberbully.	3(4.1)	3(4.1)	39 (53.4)	28 (38.4)	73
encountering sexual predators.	3(4.1)	5(6.8)	34 (46.6)	31 (32.5)	73
being a sexual predator online.	6(8.2)	5(6.8)	30 (41.1)	32 (43.8)	73
viewing sexual pictures online.	5(7)	17 (23.9)	30 (42.3)	32 (45.1)	71
posting sexual pictures online.	2(2.7)	7(9.6)	32 (43.8)	32 (43.8)	73
Cronbach's Alpha= .874					

Table 10. Frequency of Outcome Expectation Monitoring Items

If I monitor my child(ren)'s Internet activity, then it would reduce their risk of	Not At All True N(%)	Barely True N(%)	Somewhat True N(%)	Very True N(%)	Total N
being a victim of cyberbullying.	2(2.8)	6(8.3)	29(40.3)	35(48.6)	72
being a cyberbully.	2(2.7)	3(4.1)	28(38.4)	40(54.8)	73
encountering sexual predators.	1(1.4)	8(11.1)	28(38.9)	35(48.6)	72
being a sexual predator online.	1(1.4)	6(8.3)	23(31.9)	42 (58.3)	72
viewing sexual pictures online.	2(2.7)	5(6.8)	31(42.5)	35(47.9)	73
posting sexual pictures online.	1(1.4)	3(4.1)	26(35.6)	43(58.9)	73

Cronbach's Alpha= .932

Perceived self-efficacy items were included to assess parents' confidence in their ability to carry out communication and monitoring behaviors. Table 11 shows the majority of parents are confident in their ability to communicate with their children about cyber risks. When asked "I am certain I can communicate with my child(ren) about how to avoid being a victim of cyberbullying," 50.3% of respondents said "very true" and 46.6% said "somewhat true." Ninety-seven percent (N=70) felt confident in their ability to communicate with their children about how to avoid being a cyberbully. Most parents from this sample also felt very confident they could communicate with their children about how to avoid encountering a sexual predator online (60.3%, N=42). Furthermore, respondents felt confident they could communicate with their children about how to avoid being a sexual predator online with 67.1% responding "very true." The parents were also confident that they could communicate with their children about avoiding both viewing and posting sexual pictures online, with 52.1% and 72.6% responding "very true" respectively.

Table 11. Frequency of Perceived Self-Efficacy Communication Items

I am certain I can communicate with my children about how to avoid	Not At All True N(%)	Barely True N(%)	Somewhat True N(%)	Very True N(%)	Total N
being a victim of cyberbullying.	1(1.4)	1(1.4)	34(46.6)	37(50.7)	73
being a cyberbully.	-	2(2.7)	28(38.9)	42(58.3)	72
encountering sexual predators.	-	2(2.7)	27(37.0)	35(48.6)	72
being a sexual predator online.	1(1.4)	3(4.1)	20(27.4)	49(67.1)	72
viewing sexual pictures online.	-	3(4.1)	32(43.8)	38(52.1)	73
posting sexual pictures online.	-	1(1.4)	19(26.0)	53(72.6)	73

Cronbach's Alpha= .928

The majority of respondents felt confident they could monitor their children's online behavior to help them avoid cyber risks, shown in Table 12. Ninety-seven percent of respondents felt confident they could monitor their children's behavior to help them avoid becoming a victim of cyberbullying as well as how to avoid becoming a cyberbully. The majority of parents believed they could monitor their children to help them avoid encountering sexual predators online, with 50.7% of respondents saying "somewhat true" and 39.7% saying "very true." Most respondents also felt confident they could monitor their children's behavior to help them avoid becoming a sexual predator online, with 46.5% responding "somewhat true" and 47.2% responding "very true." The majority of respondents believed they could monitor their children's behavior to help them avoid viewing and posting sexual pictures online.

Table 12. Frequency of Perceived Self-Efficacy Monitoring Items

I am certain I can monitor my child(ren)'s Internet activity to help them avoid	Not At All True N(%)	Barely True N(%)	Somewhat True N(%)	Very True N(%)	Total N
being a victim of cyberbullying.	1(1.4)	7(9.7)	39(54.2)	25(34.7)	72
being a cyberbully.	-	4(5.6)	37(52.1)	30(42.3)	71
encountering sexual predators.	-	7(9.6)	37(50.7)	29(39.7)	73
being a sexual predator online.	1(1.4)	3(4.2)	33(46.5)	34(46.6)	71
viewing sexual pictures online.	-	7(9.6)	41(56.2)	25(34.2)	73
posting sexual pictures online.	-	3(4.1)	33(45.2)	37(50.7)	73

Cronbach's Alpha= .952

Behavior was included to assess whether or not parents communicated with their children about cyber risks and if parents monitored their children's Internet activity. Table 13 depicts parental communication behaviors with their children about cyber risks. The majority of parents communicated with their children about cyber risks, with the majority of respondents answering "very true" to all communication behavior items. Table 14 shows parental monitoring behaviors. Sixty-eight percent of parents (N=50) responded "very true" when asked if they keep the computer their children use in a visible area. The majority of parents (61.6%, N=45) reported that they interacted with their children on the Internet. Fifty-seven percent of parents (N=42) and 53.4% (N=39) of parents reported enforcing rules about what Web sites their children are allowed to visit and tracking how much time their children are allowed to spend on the Internet respectively.

Table 13. Frequency of Communication Behavior Items

	Not At All True N(%)	Barely True N(%)	Somewhat True N(%)	Very True N(%)	Total N
I communicate with my children about how to avoid sexual predators while active on the Internet.	-	1(1.4)	19(26)	53(72.6)	73
I communicate with my children about the types of photographs that are appropriate to post on the Internet.	1(1.4)	1(1.4)	13(17.8)	58(79.5)	73
I communicate with my children about the types of photographs that are inappropriate to post on the Internet.	1(1.4)	1(1.4)	11(15.1)	60(82.2)	73
I communicate with my children about the types of photographs that are appropriate to view on the Internet.	1(1.4)	1(1.4)	17(23.6)	53(73.6)	73
I communicate with my children about the types of photographs that are inappropriate to view on the Internet.	1(1.4)	-	15(20.5)	57(78.1)	73
I communicate with my children about becoming a victim of cyberbullying.	1 (1.4)	5(6.8)	17(23.3)	50(68.5)	73
Cronbach's Alpha= .914					

Table 14. Frequency of Monitoring Behavior Items

	Not At All True N(%)	Barely True N(%)	Somewhat True N(%)	Very True N(%)	Total N
I have the computer my children use at our home in an open area that is visible to me.	5(6.8)	2(2.7)	16(21.9)	50(68.5)	73
I interact with my children while they are active on the Internet. (e.g. playing games, researching topics for homework, exploring family vacations, etc.)	-	1(1.4)	27(37)	45(61.6)	73
I enforce rules about what Web sites my children are allowed to visit.	1(1.4)	3(4.1)	27(37)	42(57.5)	73
I keep track of how much time my children spend on the Internet.	3(4.1)	6(8.2)	25(34.2)	39(53.4)	73

Cronbach's Alpha= .742

Risk perception items were included to assess whether or not parent's perceived their children's cyber risks as being higher, similar, or lower to their peers. Table 15 reports the frequencies of the risk perception items. Twenty-three percent of the parents felt that their children's risk was low compared to average children the same age and sex. When parents were asked what their children's risk of being a cyberbully was compared to their peers, 41.1% (N=30) replied "very low." Parents in this pilot study felt their children's risk of encountering a sexual predator online was similar (35.6%, N=26) to their peers or low (37%, N=27). The majority of parents felt their children's risk of being a sexual predator online was "very low." Thirty-seven percent of parents felt their children were at similar risk of viewing sexual pictures online, but 60.3% of parents perceived their children's risk was "very low" of posting sexual pictures online compared to their peers.

Table15. Frequency of Risk Perception Items

Compared to average children the same age and sex…	Very High N(%)	High N(%)	Similar N(%)	Low N(%)	Very Low N(%)	Total N
my child(ren)'s risk of being a victim of cyberbullying is…	-	1 (1.4)	5 (6.8)	17 (23.3)	13 (17.8)	73
my child(ren)'s risk of being a cyberbully is…	-	1 (1.4)	13 (17.8)	29 (39.7)	30 (41.1)	73
my child(ren)'s risk of encountering sexual predators online is….	-	1 (1.4)	26 (35.6)	27(37)	19 (26)	73
my child(ren)'s risk of being a sexual predator online is…	-	-	9 (12.3)	22 (30.1)	42 (57.5)	73
my child(ren)'s risk of viewing sexual pictures online is…	-	3 (4.1)	27 (37)	23 (31.5)	20 (27.4)	73
my child(ren)'s risk of posting sexual pictures online is…	-	-	9 (12.3)	20 (27.4)	44 (60.3)	73

Cronbach's Alpha= .876

Correlations

Pearson r correlations analyses were used to determine relationships between variables. There was a positive correlation between outcome expectation communication and outcome expectation monitoring items (r=.548, P<0.01). Thus, parents who felt communicating with their children about Internet dangers would reduce their cyber risks also felt that monitoring Internet behavior would reduce cyber risks. Another positive correlation was found between outcome expectations monitoring and perceived self-efficacy monitoring items (r=.606, P<0.01). This suggests parents who believe monitoring Internet behavior will reduce cyber risks are also confident they can monitor cyber risks. Perceived self-efficacy communication items positively correlated with perceived self-efficacy monitoring items (r=.587, P<0.01), suggesting parents who are confident they can communicate with their children about cyber risks also are confident they can monitor their cyber risks. Monitoring behaviors were positively correlated with self-efficacy monitoring items (r=.376, P<0.01), indicating that parents who are confident they can monitor their children's behavior, carry out the behavior of monitoring their children's Internet activity. Lastly, monitoring behavior and risk perceptions were positively correlated highly significantly (r=.399, P<0.01). This suggests parents who perceive their children to be vulnerable to cyber risks are also monitoring their children's behavior.

Other variables correlated at the 0.05 significance level. Outcome expectation communication items correlated significantly with self-efficacy communication (r=.284, P<0.05), self-efficacy monitoring (r=.296, P<0.05), and monitoring behaviors (r=.254, P<0.05). Another positive correlation occurred between outcome expectation monitoring items and self-efficacy communication items (r=.236, P<0.05). Lastly, self-efficacy

monitoring items positively correlated with communication behaviors (r=.232, P<0.05)

and risk perceptions (r=.272, P<0.05). Correlations results are shown in Table 16.

Table 16. Correlations

	Outcome Expectations Communication	Outcome Expectations Monitoring	Self-Efficacy Communication	Self-Efficacy Monitoring	Communication Behaviors	Monitoring Behaviors	Risk Perceptions
Outcome Expectations Communication	-	.548**	.284*	.296*	.182	.254*	.124
Outcome Expectations Monitoring		-	.236*	.697**	.116	.336**	.099
Self-Efficacy Communication			-	.587**	.230	.138	.220
Self-Efficacy Monitoring				-	.232*	.376**	.272*
Communication Behaviors					-	.197	.120
Monitoring Behaviors						-	.399**

** correlated at .01 significance level

* correlated at .05 significance level

Analysis of Variance

A series of ANOVAs were used to test for predictors among independent and dependent variables. A one way between subjects ANOVA was conducted to compare risk perceptions, outcome expectation communication, and self-efficacy communication behaviors. There was not a significant effect on risk perceptions, outcome expectation communication, and self-efficacy communication with communication behaviors for the three conditions [$F(3,69)=1.776$, $p=.160$], results reported in Table 17. Another one-way between subjects ANOVA was conducted to compare the effect of self-efficacy-monitoring, risk perceptions, and outcome expectations monitoring to monitoring behaviors. There was a significant effect of self-efficacy monitoring, risk perceptions, and outcome expectations monitoring on monitoring behaviors at the $p<0.01$ level for the three conditions [$F(3, 69)= 8.211$, $p=.000$], results reported in Table 18.

Table 17. ANOVA Communication

Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	40.825	3	13.608	1.776	.160[a]
	Residual	528.668	69	7.662		
	Total	569.493	72			

a. Predictors: (Constant), Risk Perceptions, Outcome Expectations Communication, Self-Efficacy Communication

b. Dependent Variable: Communication Behaviors

Table 18. ANOVA Monitoring

Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	88.391	3	29.464	8.211	.000[a]
	Residual	247.609	69	3.589		
	Total	336.000	72			

a. Predictors: (Constant), Self-Efficacy Monitoring , Risk Perceptions, Outcome Expectations Monitoring

b. Dependent Variable: Monitoring Behaviors

There were no significant predictors among age, ethnicity, language, or regular Internet use. The results of the ANOVA showed females are more likely than males to communicate with their children about cyber risks (P=0.034, Eta^2=.134). The results also showed a statistically significant difference in communication behavior by race (P=0.000, Eta^2=.320). Only 2 African Americans completed the survey; therefore, meaningfulness of this finding is questionable.

A comparison of means and interaction effects indicated that the only significant interaction was between monitoring behavior and risk perceptions (P=0.001, Eta^2=0.422). Monitoring behavior and self-efficacy of monitoring may be significant with a larger sample size (P=0.349, Eta^2= 0.417). Shown in Figures 2 & 3.
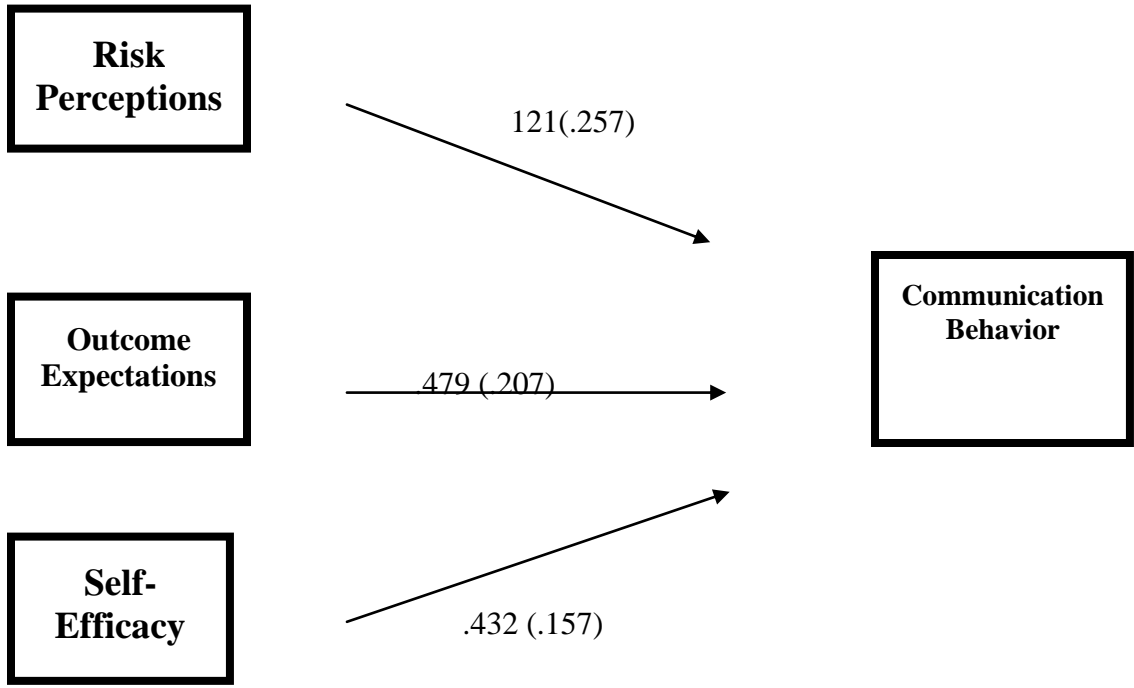
Note: P(Eta^2)
Figure 2: Measurement Model- Communication Behavior
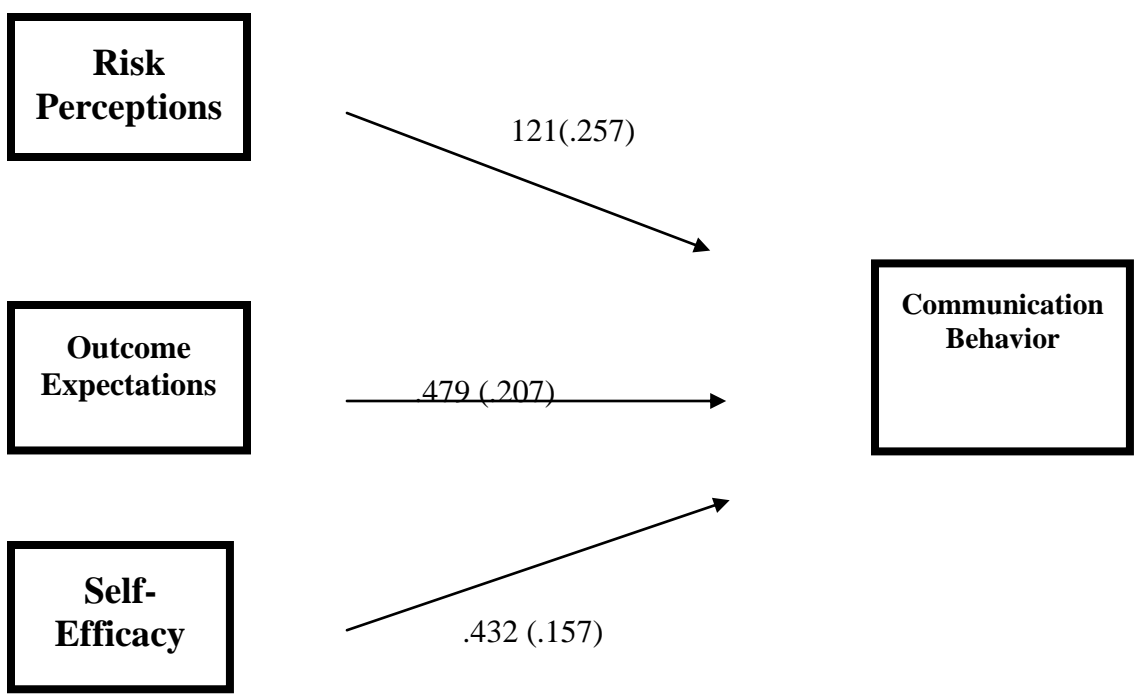
Note: P(Eta^2)
Figure 3: Measurement Model- Monitoring Behavior

Multiple Regression

Multiple regression analyses were conducted to examine relationships between the dependent and independent variables. As shown in Table 19, risk perceptions, outcome expectations communication, and self-efficacy communication accounted for seven percent of the explanatory value of communication behaviors. The variable which was significant in this model was self-efficacy communication (β=.181). In Table 20, self-efficacy monitoring, risk perceptions, and outcome expectations monitoring accounted for 26 percent of the explanatory value of monitoring behaviors. The variable which was the most significant in predicting monitoring behaviors was risk perceptions (β=.335).

Table 19. Multiple Regression Communication Behaviors

Predictors	B	SE	β	p
Outcome Expectations Communication	.092	.091	.123	.315
Self-Efficacy Communication	.173	.118	.181	.148
Risk Perceptions	.050	.091	.065	.587

Note. R^2=.072

Table 20. Multiple Regression Monitoring Behaviors

Predictors	B	SE	β	p
Risk Perceptions	.198	.063	.335	.003
Outcome Expectations Monitoring	.120	.076	.205	.121
Self-Efficacy Monitoring	.103	.087	.160	.239

Note. R^2=.263

CHAPTER IV

MANUSCRIPT: THE FAMILY JOURNAL

Abstract

This pilot study examined parental monitoring behaviors associated with their children's Internet use. Constructs from the Social Cognitive Theory (SCT) were utilized to examine parental behaviors. Seventy-three parents of children 12-17 years old participated in completing the online survey instrument. Results indicated that parental risk perceptions affected parental monitoring behaviors.

Introduction

According to the Pew Internet and American Life Project (2007), 93% of adolescents 12-17 use the Internet. Among these adolescents, 32% have experienced some type of online harassment (Lenhart, Madden, Macgill, & Smith 2007). One in 7 youth has experienced unwanted sexual solicitation and 1 in 3 youth has dealt with exposure to unwanted sexual materials while online (Wolak, Mitchel, & Finklehor, 2006). Twenty percent of teenagers have engaged in cyberbullying behavior (McAfee, 2008). Cyberbullying should be considered a serious health issue, because it is

related to a variety of health problems among its victims, including depression (Dehue, Bolman, & Vollink, 2008). Several studies have noted children who have their computers in a private area, such as a bedroom, are more likely to participate in aggressive messaging with their peers (Campbell, 2005; Law, Shapka, & Olsen, 2010; Mishna, Siani, & Solomon, 2009).

Many parents believe that children need the Internet to be successful in school; however, parents are also concerned about their children coming across inappropriate materials such as pornography while using the Internet (Wang, Bianchi, & Raley, 2005). The majority of parents have rules about how long their children can stay online; however, both parents and teenagers report teens participate in behaviors online they would not want their parents to know about (Lenhart, 2005; Wang, 2005). Parental monitoring involves paying attention to and tracking children's whereabouts. Monitoring has been an integral method of minimizing children's aggressive behaviors (Huebner & Howell, 2003; Law, 2010).

Studies have shown parenting style effects children's online behavior (Eastin, Greenberg, & Hofschire, 2006; Law, 2010). Specifically, parental monitoring and limit setting play a role in how teenagers behave while on the Internet. However, some studies have reported parents do not actively monitor their children's online behavior (Rosen, Cheever, & Carrier, 2008). While parents admit there are dangers on the Internet, they have trouble admitting that these dangers will affect their children (Rosen, 2008). Furthermore, studies have also indicated parents underestimate their own children's bullying behavior and the risk of bullying and are unaware of Internet harassments (Dehue, 2008; Mastunaga, 2009). Research also suggests parental monitoring may be

associated with parental characteristics. According to the literature, mothers may report more Internet monitoring, because they generally spend more time with their children (Wang, 2005).

The Social Cognitive Theory (SCT) can help us to understand parental monitoring behaviors. Constructs of the Social Cognitive Theory have been utilized in previous studies to explain parental and child interactions. The theory describes how personal factors, the environment, and behavior influence one anther (Rimer & Glanz, 2005). In one study, the constructs, outcome expectations and self-efficacy were used to investigate father-son communication about sex-related topics (Dilorio, McCarty, & Denzomore, 2006). In another study, self-efficacy and outcome expectation constructs were used to investigate why some mothers talk to their children about sex and why others do not. This helped determine if parents with more confidence in their ability to talk about sex would do so more frequently, and if parents who felt talking about sex with their children would result in a positive outcome carried out the behavior (Dilorio, et al. 2000).

Although there are several studies which investigate parental monitoring of child Internet behaviors, none of the research uses theoretical constructs to explain the monitoring behavior. This pilot study utilizes constructs from the Social Cognitive Theory to investigate parental monitoring behaviors. As in previous research, this study also utilized the self-efficacy and outcome expectations constructs. Perceived self-efficacy described confidence in the ability to carry out a behavior. Outcome expectations described beliefs about the value and consequences of behavioral choices. This study also included risk-perceptions. Risk perceptions are included in outcome

expectations, but risk perceptions further explain how vulnerable a person feels towards a hazard compared to their peers (Glanz, Rimer, & Viswanath, 2008).

Method

Procedures and Participants

The data were collected in Fall 2011 as a part of a student thesis project. Participants were recruited through the Texas State University-San Marcos e-mail system. An e-mail invitation was sent to professional and secretarial/clerical staff. In order to participate in the study, respondents had to have a child 12-17 years old with Internet access in their home. The online survey was available for completion over three weeks. The survey consisted of 55 items and took about 10 minutes to complete. After the initial invitation was sent, an e-mail reminder was sent the second and third week the survey was open either thanking participants for their response or reminding them to complete the survey. In order to participate in the study respondents had to agree to the terms and conditions outlined in the consent form. Respondents were made aware their answers would be kept confidential and the study was approved by the Texas State University-San Marcos Institutional Review Board. Participants were placed in a drawing for a $25 gift card for completing the survey. After the end of the three-week period, the data was exported from Survey Monkey and imported into the SPSS data system. The data was stored on a password-protected computer and will be securely removed from the computer after two years.

Measures

Four variables were assessed to investigate parental monitoring behaviors of children's Internet activity. The self-efficacy items measured how confident parents were

in their ability to monitor their children's behavior. These items were presented to participants as confidence statements. Answer choices ranged from "not at all true, barely true, somewhat true, very true." Cronbach's Alpha with this sample was .952. Outcome expectation items measured whether or not parents believed monitoring their children's Internet activity would reduce cyber risks. These items were asked in "If-then" form, respondents could answer "Not at all True, Barely True, Somewhat True, Very True." Cronbach's Alpha with this sample was .932. Risk perceptions measured if parent's believed their children's cyber risks were higher, similar, or lower than their peers. The Likert scale for this item ranged from "Very Low, Low, Similar, High, and Very High." Cronbach's Alpha with this sample was .876. Monitoring behavior items measured whether or not parents were tracking their children's Internet activity. For this variable, respondents could choose "Not at all True, Barely True, Somewhat True, Very True." Cronbach's Alpha with this sample was .742.

Each of the variables addressed concerns of the children being a victim of cyber risks and being the perpetrator of cyber risks. This concept was derived from Larry Rosen's (2008) study about parenting style and adolescent Myspace behavior. In his study Rosen asked about the potential problem of viewing or posting sexual pictures. The present study utilizes this concept for each of its cyber risks, including being a victim/being a cyberbully, encountering/being a sexual predator, and posting/viewing sexual pictures.

Results

The respondents' demographic information is shown in Table 21. The parents in this pilot study ranged in age from 30-59 years of age. More females than males

completed the survey with 12 males (17.4 %) and 57 females (82.6 %). All of the

respondents had at least one child 12-17 years old. Forty-five respondents (55.6 %) had a

male child and 36 respondents (44.4 %) had a female child. The majority of respondents

(92.6 %) identified their race as White, 2 respondents (2.9%) were Native American, 1

respondent was Asian (1.5%) and 2 were African American (2.9%).

Table 21. Frequency Distribution of Selected Demographic Characteristics

Variable	N	%
Gender		
Male	12	17.4
Female	57	82.6
Child's Gender		
Male	45	55.6
Female	36	44.4
Current Age		
30-39	14	20.3
40-49	41	59.4
50-59	14	20.3
Child's Age		
12	15	17.2
13	10	11.5
14	14	16.2
15	19	21.8
16	11	12.6
17	18	20.7
Race		
Native American	2	2.9
Asian	1	1.5
African American	2	2.9
White	63	92.6

Tables 22 and 23 show the frequency of responses results. The majority of

parents in this pilot study believed if they monitored their children's Internet activity,

then their cyber risks would be reduced. Eighty-nine percent of respondents reported that

it was "Very True" or "Somewhat True" that monitoring their children's Internet

behavior would reduce their risk of becoming a victim of cyberbullying. Most of the

respondents had high-perceived self-efficacy. The majority of parents felt confident they could monitor their children's Internet behavior to keep them from encountering sexual predators online with 50.7% responding "somewhat true" and 39.7% responding "very true." Parents' risk perceptions varied. The participants recognized their children were at risk for being a victim of cyber risks, but they did not recognize that their children were at risk for being the perpetrator of cyber risks.   The majority of parents reported monitoring their children's Internet behaviors with 68% responding "very true" when asked if the computer their children use is in an open area.

Table 22. Frequency of Responses for Outcome Expectation and Perceived Self-Efficacy Items

Outcome Expectation Monitoring Items

If I monitor my child(ren)'s Internet activity, then it would reduce their risk of	Not At All True N(%)	Barely True N(%)	Somew hat True N(%)	Very True N(%)	Tot al N
being a victim of cyberbullying.	2(2.8)	6(8.3)	29 (40.3)	35 (48.6)	72
being a cyberbully.	2(2.7)	3(4.1)	28 (38.4)	40 (54.8)	73
encountering sexual predators.	1(1.4)	8 (11.1)	28 (38.9)	35 (48.6)	72
being a sexual predator online.	1(1.4)	6(8.3)	23 (31.9)	42 (58.3)	72
viewing sexual pictures online.	2(2.7)	5(6.8)	31 (42.5)	35 (47.9)	73
posting sexual pictures online.	1(1.4)	3(4.1)	26 (35.6)	43 (58.9)	73

Cronbach's Alpha= .932

Perceived Self-Efficacy Monitoring Items

I am certain I can monitor my child(ren)'s Internet activity to help them avoid	Not At All True N(%)	Barely True N(%)	Somew hat True N(%)	Very True N(%)	Tot al N
being a victim of cyberbullying.	1(1.4)	7(9.7)	39 (54.2)	25 (34.7)	72
being a cyberbully.	-	4(5.6)	37 (52.1)	30 (42.3)	71
encountering sexual predators.	-	7(9.6)	37 (50.7)	29 (39.7)	73
being a sexual predator online.	1(1.4)	3(4.2)	33 (46.5)	34 (46.6)	71
viewing sexual pictures online.	-	7(9.6)	41 (56.2)	25 (34.2)	73
posting sexual pictures online.	-	3(4.1)	33 (45.2)	37 (50.7)	73

Cronbach's Alpha= .952

Table 23. Frequency of Responses for Risk Perception and Monitoring Behavior Items

Risk-Perception Items

Compared to average children the same age and sex…	Very High N(%)	High N(%)	Similar N(%)	Low N(%)	Very LowN (%)	Total N
my child(ren)'s risk of being a victim of cyberbullying is…	-	1 (1.4)	5 (6.8)	17 (23.3)	13 (17.8)	73
my child(ren)'s risk of being a cyberbully is…	-	1 (1.4)	13 (17.8)	29 (39.7)	30 (41.1)	73
my child(ren)'s risk of encountering sexual predators online is….	-	1 (1.4)	26 (35.6)	27(37)	19 (26)	73
my child(ren)'s risk of being a sexual predator online is…	-	-	9 (12.3)	22 (30.1)	42 (57.5)	73
my child(ren)'s risk of viewing sexual pictures online is…	-	3 (4.1)	27(37)	23 (31.5)	20 (27.4)	73
my child(ren)'s risk of posting sexual pictures online is…	-	-	9 (12.3)	20 (27.4)	44 (60.3)	73

Cronbach's Alpha= .876

Monitoring Behavior Items

	Not At All True N(%)	Barely True N(%)	Somewhat True N(%)	Very True N(%)	Total N
I have the computer my children use at our home in an open area that is visible to me.	5(6.8)	2(2.7)	16(21.9)	50 (68.5)	73
I interact with my children while they are active on the Internet. (e.g. playing games, researching topics for homework, exploring family vacations, etc.)	-	1(1.4)	27(37)	45 (61.6)	73
I enforce rules about what Web sites my children are allowed to visit.	1(1.4)	3(4.1)	27(37)	42 (57.5)	73
I keep track of how much time my children spend on the Internet.	3(4.1)	6(8.2)	25(34.2)	39 (53.4)	73

Cronbach's Alpha= .742

There was a positive correlation between outcome expectation variables and perceived self-efficacy variables (r=.606, P<0.01). Monitoring behaviors were positively correlated with perceived self-efficacy variables (r=.376, P<0.01). Monitoring behaviors were also positively correlated with risk perceptions (r=.399, P<0.01). There was not a significant relationship between outcome expectation variables and monitoring behavior variables.

A one-way between subjects ANOVA was conducted to compare the effect of self-efficacy, risk perceptions, and outcome expectations to monitoring behaviors. There was a significant effect of self-efficacy, risk perceptions, and outcome expectations on monitoring behaviors at the p<0.01 level for the three conditions [F(3, 69)= 8.211, p=.000]. There was a statistically significant interaction between monitoring behavior and risk perceptions (p=0.001,Eta^2=0.422). There was an interaction between monitoring behaviors and self-efficacy (p=0.349, Eta^2=0.417). Although this interaction was not significant with this sample, it may be significant with a larger sample size.

Multiple regression analyses were conducted to examine the relationship between monitoring behaviors and outcome expectations, perceived self-efficacy, and risk perceptions. As seen in Table 24, outcome expectations, perceived self-efficacy, and risk perceptions accounted for 26% of the explanatory value in monitoring behaviors. Risk perceptions were statistically significant in predicting monitoring behaviors (β=.335, p=.003).

Table 24. Multiple Regression Monitoring Behaviors				
Predictors	B	SE	β	p
Risk Perceptions	.198	.063	.335	.003
Outcome Expectations Monitoring	.120	.076	.205	.121
Self-Efficacy Monitoring	.103	.087	.160	.239
Note. R^2=.263				

Discussion

In this pilot study, we sought to explain parental monitoring behaviors from a social cognitive perspective. Results indicated that self-efficacy and risk perceptions were significantly associated with monitoring behaviors, and that risk perceptions were a significant predictor of monitoring behaviors. Therefore, parents who report they were confident in their ability to monitor their children's Internet behaviors were more likely to report carrying out monitoring behaviors. Parents who reported believing their children were vulnerable to cyber risks were more likely to monitor their children's online behavior.

Our results support findings from previous studies which assessed social cognitive variables and parental behaviors. Self-efficacy and outcome expectations have been linked to behavior. One study revealed self-efficacy and outcome expectations were significantly associated with mother-daughter sex communication (Dilorio et al., 2000). Another study researched self-efficacy and outcome expectations related to fathers and sons talking about sex related topics (Dilorio, 2006). This study did not find outcome expectations were linked to parental behaviors, but it did find self-efficacy was linked with monitoring behaviors (Dilorio, 2006).

This study adds to present research in that it includes the risk perceptions construct of the social cognitive theory. Risk perceptions were statistically significant

predictors in parental monitoring behaviors. When parents felt their children were vulnerable to a potential danger, they were more likely to monitor their behavior, in hopes their child would avoid the risk. Furthermore, the present study adds to research because it was the first to use SCT to investigate Internet-related parental monitoring behaviors.

Limitations

The pilot study was limited in a number of ways. First it was limited to a small population at Texas State University-San Marcos. Potential participants were invited to take part in the study if they were in the staff categories of professional or clerical/secretarial. The majority of people in this category were educated and middle class. The number of respondents was then limited further, because in order participate the respondent had to have a child 12-17 years old with Internet access in the home. This created a lack of diversity among the sample.

The e-mail invitation was sent to the participants' work e-mail address. Participants were informed they could complete the survey on their own time, as the link to the survey instrument would work from any location. Potential respondents may not have felt comfortable completing the survey at work, and even though they could have finished the survey at home, they may not have had the time to do so. The survey was also only available online. It was possible others could easily view the survey on the computer screen while it was being completed; therefore, participants may have felt uncomfortable answering the questions.

Implications

Given the number of children using the Internet who experience some type of online harassments, it is important for parents to oversee their children's Internet behaviors. Children can easily access the Internet in a variety of ways, including, cell-phones, computers, and even video games systems. Parents need to be aware of their children's online behaviors so they can protect them from potential harm. There is a need for this pilot study to be carried out with a larger sample size, which includes a more diverse population. This can help us to better understand why or why not parents monitor their children's Internet behaviors, and which populations need to be targeted for parental Internet monitoring trainings.

Cyber risk trainings need to address the importance of parents understanding their children are at risk of both being a victim of cyber risks and being a perpetrator of cyber risks. Many parents accept their children may be victims, but they deny the possibility their children may be the one who is bullying. These trainings need to be offered to parents in variety of forms. Trainings could be a part of worksite wellness programming that strives to improve the health and safety of all individuals within the home. These trainings could be held during lunch, providing easy access for parents who have to work. Educating parents about how to keep their children safe online can help prevent children from experiencing online harassments and therefore protecting them from possible health risks such as depression.

CHAPTER V

MANUSCRIPT: AMERICAN JOURNAL OF HEALTH STUDIES

Abstract

The purpose of this pilot study was to investigate parental cyber risk communication behaviors using constructs of the Social Cognitive Theory. A survey instrument was developed and piloted. Seventy-three parents of children 12-17 years of age participated in the online survey. Parents with higher perceived self-efficacy were more likely to communicate with their children about cyber risks. In developing cyber safety programs for parents, it is important to help raise their confidence in communicating with their children.

Children ages 12-17 are frequent Internet users. According to the Pew Internet and American Life Project (2005), 66% of all Americans use the Internet. Parents and teenagers use the Internet more often than the average American. Eighty percent of children under18 living at home with parents are Internet users, and 87% of these parents report being regular Internet users (Lenhart, 2005). A more recent study found that 93% of children 12-17 are online (Lenhart, Madden, Macgill, & Smith, 2007). Fifty-five percent of these children utilize social networking sites such as Facebook or Myspace, and 47% of online children have uploaded pictures to where other people can see them. The number of teens online, continues to grow each year, and the intensity in which they

use Internet continues to increase, with 61% of teenagers using the Internet daily, and among these daily users, 34% get online multiple times a day (Lenhart, 2007).

Background

Parents and teenagers agree, teens sometimes do things online they know their parents would not agree with (Lenhart, 2005). One study found that 16% of school-aged children had bullied their peers via the Internet (Dehue, Bolman, & Vollink, 2008). Teenagers encounter numerous cyber risks while online. About 32% of online teens have experienced some type of online harassment (Lenhart, 2007). One in 7 teenagers has experienced unwanted sexual solicitations, 1 in 3has been exposed to unwanted sexual material, and 1 in 11 has experienced harassments while online (Wolak, Mitchell, & Finkelhor, 2006).

Many parents believe children need the Internet to be successful in school; however, parents are also concerned about children coming across inappropriate materials such as pornography while using the Internet (Wang, Bianchi & Raley, 2005). Research has found parents and children with open communication results in the children having a lower chance of getting involved in risky behaviors (Borawski, Ivers-Landis, Lovegreen, & Trapl, 2003). Several studies have shown parenting style plays a role in their children's Internet behavior (Huebner, 2003; Rosen, 2008), and that parenting behaviors are a significant predictor of whether or not teenagers send aggressive messages online. One study discovered children who communicate openly with parents are less likely to be online bullies (Law, 2010).

The Social Cognitive Theory (SCT) describes how personal factors, the environment, and behavior influence one another (Rimer & Glanz, 2005).   The SCT

poses anticipated consequences influence the motivation for action. Thus, adolescents learn behaviors partly through the way their parents respond to behaviors (Hardy, Carlo, & Roesch, 2010). The Social Cognitive Theory (SCT) has been used to explore parent-child interactions. One study used two constructs from SCT (outcome expectations and self-efficacy) to explore why some parents talk to their children about sex and why others do not (Dilorio et al., 2000). In another study, the constructs outcome expectations and self-efficacy were used again to look at father-son communications regarding sex (Dilorio, McCarty, & Denzmore, 2006).

Purpose

Although there is research addressing parental communication and children's Internet behaviors, this research does not use theory to explain why or why not parents are communicating with their children about cyber risks. This pilot study utilizes constructs of the Social Cognitive Theory to examine parent's perceptions regarding cyber risk behaviors that might occur during Internet activity and their responses to their children's behavior.

This pilot study examines interactions between outcome expectations, risk perceptions, perceived self-efficacy and communication behaviors. Outcome expectations describe beliefs about the likelihood and value of the consequences of behavioral choices, which included risk perceptions. Perceived self-efficacy describes beliefs about one's personal ability to perform behaviors that bring desired outcomes (Glanz, Rimer, & Viswanath, 2008).

Methods

A survey instrument was developed using a review of the literature and constructs of the Social Cognitive Theory. Variables of interest were parents perceived self-efficacy, outcome expectations, risk perceptions, and communication behaviors. Conner and Norman (2003), stated that outcome expectancy questions should be worded in 'If-then' form and self-efficacy questions should be stated as confidence statements. Using the above mentioned, ("very high, high, similar, low, and very low") was also recommended. In order to ensure scale validity, factor analysis tests were run.

Table 25.Factor Loadings of Communication Items

Outcome Expectations for Communication

If I talk with my children about the dangers of internet activity, then it would reduce their risk of	Factor 1
being a victim of cyberbullying.	.735
being a cyberbully.	.826
encountering sexual predators.	.727
being a sexual predator online.	.845
viewing sexual pictures online.	.730
posting sexual pictures online.	.848

Cronbach's Alpha= .874

Perceived Self-Efficacy for Communication

I am certain I can communicate with my children about how to avoid	Factor 1
being a victim of cyberbullying.	.834
being a cyberbully.	.835
encountering sexual predators.	.890
being a sexual predator online.	.864
viewing sexual pictures online.	.868
posting sexual pictures online	.872

Cronbach's Alpha= .928

Factor Loadings Communication Behaviors

	Factor 1
I communicate with my children about how to avoid sexual predators while active on the Internet.	.624
I communicate with my children about the types of photographs that are appropriate to post on the Internet.	.877
I communicate with my children about the types of photographs that are inappropriate to post on the Internet.	.896
I communicate with my children about the types of photographs that are appropriate to view on the Internet.	.926
I communicate with my children about the types of photographs that are inappropriate to view on the Internet.	.912
I communicate with my children about becoming a victim of cyber bullying	.798

Cronbach's Alpha= .914

Risk Perceptions

	Component 1	Component 2
Compared to average children the same age and sex		
my child(ren)'s risk of being a victim of cyberbullying is…	.760	.387
my child(ren)'s risk of being a cyberbully is…	.815	-.173
my child(ren)'s risk of encountering sexual predators online is…	.748	.458
my child(ren)'s risk of being a sexual predator online is …	.810	-.508
my child(ren)'s risk of viewing sexual pictures online is …	.760	.417
my child(ren)'s risk of posting sexual pictures online is …	.838	-.479

Cronbach's Alpha= .876

Cyber risks that were included in this study were being a victim of/being a cyberbully, encountering/being a sexual predator, and posting/view sexual pictures online. This concept of assessing the risk of being a victim of cyber risks and being the perpetrator of cyber risks were derived from Larry Rosen's (2008) study about parenting style and adolescent Myspace behavior. In his study he asked about the potential problem of viewing or posting sexual pictures on the Internet. The present study utilizes this concept for all risks.

Participants were recruited at Texas State University-San Marcos via the University Email system. In order to participate in the study, respondents had to have at least one child that was between 12-17 years old. As an incentive, respondents were entered into a drawing and could win a $25 gift card for participating in the study. The online survey was open for a 3-week period in the Fall of 2011. The initial invitation was e-mailed to Texas State University-San Marcos staff in the professional and clerical/secretarial categories. The invitation included a link to the online survey. After the initial invitation was sent, another e-mail was sent each week the survey was open. The follow up e-mails either thanked participants for completing the survey or reminded potential respondents the survey was still open. Participants had to agree to the conditions out lined in a consent form before being allowed to carry forth with the survey. The consent informed participants their responses would be kept confidential and that the Texas State University-San Marcos institutional review board had approved the study. At the conclusion of the 3-week period the data were exported from Survey Monkey into the SPSS data system. The data were stored on a password-protected computer and will be securely deleted after two years.

Results

   Seventy-three respondents were included in this pilot study's data analysis.

Demographic information can be found in Table 26. The age range of participants was

31-59 years old. More females than males responded with 12 males (17.4%) and 57

females (82.6%). All of the respondents had at least 1 child 12-17 years old. Fifteen

respondents (17.2 %) had a 12 year old, 10 respondents (11.5 %) had a 13 year old, 14

respondents (16.2 %) had a 14 year old, 19 respondents (21.8 %) had a 15 year old, 11

respondents (12.6 %) had a16 year old, and 18 respondents (20.7 %) had a 17 year old.

Forty-five respondents (55.6 %) had a male child and 36 respondents (44.4 %) had a

female child. The majority of respondents (92.6 %) identified their race as White, 2

respondents (2.9%) were Native American, 1 respondent was Asian (1.5%) and 2 were

African American (2.9%).

Table 26. Frequency Distribution of Selected Demographic Characteristics

Variable	N	%
Gender		
Male	12	17.4
Female	57	82.6
Child's Gender		
Male	45	55.6
Female	36	44.4
Current Age		
30-39	14	20.3
40-49	41	59.4
50-59	14	20.3
Child's Age		
12	15	17.2
13	10	11.5
14	14	16.2
15	19	21.8
16	11	12.6
17	18	20.7
Race		
Native American	2	2.9
Asian	1	1.5
African American	2	2.9
White	63	92.6

The study found the majority of the parents in this sample believe if they talk to their children about the dangers of Internet activity, their cyber risks would be reduced (outcome expectations). Most parents were also confident in their ability to communicate with their children about cyber risks (self-efficacy). Sixty percent of respondents reported they were confident they could talk with their children about how to avoid encountering a sexual predator online. The risk perception items varied. Parents were more likely to say their children were vulnerable to being a victim of cyber risks, but less likely to feel their children were at risk to being a perpetrator of cyber risks. The majority of parents in this sample reported they do communicate with their children about

cyber risks. Sixty percent responded "Very True" when asked if they talk to their

children about photos that are inappropriate to view on the Internet.

Table 27. Frequency of Responses for Outcome Expectation and Perceived Self-Efficacy Items

Outcome Expectation Communication Items

If I talk with my child(ren) about the dangers of Internet activity, then it would reduce their risk of	Not At All True N(%)	Barely True N(%)	Somewhat True N(%)	Very True N(%)	Total N
being a victim of cyberbullying.	5(6.8)	6(8.2)	43(58.9)	19(26)	73
being a cyberbully.	3(4.1)	3(4.1)	39(53.4)	28(38.4)	73
encountering sexual predators.	3(4.1)	5(6.8)	34(46.6)	31(32.5)	73
being a sexual predator online.	6(8.2)	5(6.8)	30(41.1)	32(43.8)	73
viewing sexual pictures online.	5(7)	17(23.9)	30(42.3)	32(45.1)	71
posting sexual pictures online.	2(2.7)	7(9.6)	32(43.8)	32(43.8)	73

Perceived Self-Efficacy Communication Items

I am certain I can communicate with my children about how to avoid	Not At All True N(%)	Barely True N(%)	Somewhat True N(%)	Very True N(%)	Total N
being a victim of cyberbullying.	1(1.4)	1(1.4)	34(46.6)	37(50.7)	73
being a cyberbully.	-	2(2.7)	28(38.9)	42(58.3)	72
encountering sexual predators.	-	2(2.7)	27(37.0)	35(48.6)	72
being a sexual predator online.	1(1.4)	3(4.1)	20(27.4)	49(67.1)	72
viewing sexual pictures online.	-	3(4.1)	32(43.8)	38(52.1)	73
posting sexual pictures online.	-	1(1.4)	19(26.0)	53(72.6)	73

Table 28. Frequency of Responses for Behavior and Risk Perception Items

Communication Behavior Items

	Not At All True N(%)	Barely True N(%)	Somewhat True N(%)	Very True N(%)	Total N
I communicate with my children about how to avoid sexual predators while active on the Internet.	-	1(1.4)	19(26)	53(72.6)	73
I communicate with my children about the types of photographs that are appropriate to post on the Internet.	1(1.4)	1(1.4)	13(17.8)	58(79.5)	73
I communicate with my children about the types of photographs that are inappropriate to post on the Internet.	1(1.4)	1(1.4)	11(15.1)	60(82.2)	73
I communicate with my children about the types of photographs that are appropriate to view on the Internet.	1(1.4)	1(1.4)	17(23.6)	53(73.6)	73
I communicate with my children about the types of photographs that are inappropriate to view on the Internet.	1(1.4)	-	15(20.5)	57(78.1)	73
I communicate with my children about becoming a victim of cyberbullying.	1 (1.4)	5(6.8)	17(23.3)	50(68.5)	73

Risk Perception Items

Compared to average children the same age and sex…	Very High N(%)	High N(%)	Similar N(%)	Low N(%)	Very Low N(%)	Total N
my child(ren)'s risk of being a victim of cyberbullying is…	-	1(1.4)	5(6.8)	17(23.3)	13 (17.8)	73
my child(ren)'s risk of being a cyberbully is…	-	1(1.4)	13(17.8)	29(39.7)	30 (41.1)	73
my child(ren)'s risk of encountering sexual predators online is….	-	1(1.4)	26(35.6)	27(37)	19 (26)	73
my child(ren)'s risk of being a sexual predator online is…	-	-	9(12.3)	22(30.1)	42 (57.5)	73
my child(ren)'s risk of viewing sexual pictures online is…	-	3(4.1)	27(37)	23(31.5)	20 (27.4)	73
my child(ren)'s risk of posting sexual pictures online is…	-	-	9(12.3)	20(27.4)	44 (60.3)	73

A series of ANOVAs were run to test for predictors among the variables. A one way of between subjects ANOVA was conducted to compare risk perceptions, outcome expectation, and self-efficacy communication to communication behaviors. There was no significant effect on risk perceptions, outcome expectation, and self-efficacy with communication behaviors for the three conditions [$F_{(3,69)}=1.776$, p=.160]. There were no significant predictors among the age of parents. The ANOVA results revealed mothers are more likely than fathers to communicate with their children about cyber risks (P=0.034, Eta^2=.134). The results also showed a statistically significant difference among races when it came to communication behaviors (P=0.000, Eta^2=.320). However, only 2 African Americans completed the survey, therefore, meaningfulness of this finding is questionable.

Multiple regressions were used to test for relationships between the variables. As seen in Table 29, risk perceptions, outcome expectations, and self-efficacy accounted for 7% of the variance. The significant variable in this model was self-efficacy communication (β=.181). Given the small sample size of this pilot study, outcome expectations (β=.092) and risk perceptions (β=.050) may be expected to be more significant with a larger sample size.

Table 29. Multiple Regression Communication Behaviors

Predictors	B	SE	β	p
Outcome Expectations Communication	.092	.091	.123	.315
Self-Efficacy Communication	.173	.118	.181	.148
Risk Perceptions	.050	.091	.065	.587

Note. R^2=.072

Discussion

The Social Cognitive Theory constructs can help to explain parental communication behaviors. Parents who are confident in their ability to talk to their children about cyber risks were more likely to do so. This finding is consistent with other studies, which found parents who are confident in talking to their children about sex are more likely to do so (Dilorio, 2000; Dilorio, 2006). Parents who communicate with their children about cyber risks are also more likely to monitor their children's online activity. Thus, parents who communicate with their children of these risks have a better understanding about how their children spend their time online. Children who communicate with their parents about risks are less likely to partake in cyberbullying behaviors (Law, 2010).

The present study did not find a relationship between outcome expectations and risk perceptions with communication behaviors. This could be due in part to the small sample size. The sample found that parent's beliefs about communicating or not communicating with their children about cyber risks reduced/did not reduce the risks did not predict whether or not they actually carried out the communication behavior. Furthermore in this sample, parental belief of their child's likelihood of experiencing a cyber-risk did not predict if they communicated with their children about the risks.

Conclusions

Self-efficacy has been shown to be an indicator of parental communication behaviors. In developing health education programs to promote cyber safety, it is important to give parents the opportunity to increase self-efficacy in talking to their children about cyber risks.

Given the small sample size of this study, there is a need for more research to be conducted with a larger, more diverse sample. This sample consisted primarily of white, educated females. Future research should include multiple education levels, race, ethnicity, and educational backgrounds. This study found a statistically significant difference in communication behaviors by race, however, given only two African Americans participated; the meaning for this finding is questionable. There is a need for future research to take place in an environment where parents can easily be targeted, such as schools or student activity centers. The present study was limited in the number of respondents, because many potential participants did not have a child 12-17 years old.

The study was limited to a small population at Texas State University- San Marcos. The study was limited to staff in the categories of professional and clerical/secretarial. The study was further limited to people that had a child 12-17 years old with Internet access in the home. This created a lack of diversity in the sample. Participants also might have been unwilling to complete the survey because it was only offered online. The survey was sent to a work e-mail address, and even though it could have been completed on the participants' own time, they may not have taken the time to complete the survey in their home. Future research should allow potential participants to complete the survey immediately, rather than during their free time. Participants may have felt a lack of privacy when answering the questions, as a co-worker could have viewed their screen while they were completing the survey. In future studies, this instrument should also be offered on paper.

FINAL SURVEY INSTRUMENT

Parent's Internet Monitoring and Communication Strategies

Introduction

Thank you for taking the time to complete this survey. In this survey, ***Internet activity***,

refers to risk-behaviors on the Internet that may lead to cyber bullying or other

consequences.

Child and Internet Status/Demographic
        Scale: Yes/No

Do you have children 12-17 years old?

Do your children have access to the Internet at home?

>   **Note for filtering questions: (If participant responds yes, they are eligible to**
>
>   **participate in the survey and taken to the next question; if they respond no,**
>
>   **they will be taken to the "thank you for participating" page.)**

Risk Perception Questions

>   **Scale: Very High, High, Low, Very Low**

Compared to average children the same age and sex…

>   my child(ren)'s risk of being a victim of cyberbullying is…

my child(ren)'s risk of being a cyberbully is…

my child(ren)'s risk of encountering sexual predators online is….

my child(ren)'s risk of being a sexual predator online is … my child(ren)'s risk of viewing sexual pictures online is …

my child(ren)'s risk of posting sexual pictures online is …

Outcome Expectancies Questions (if, then)

Scale: Not True At All, Barely True, Somewhat True, Very True

If I talk with my children about the dangers of Internet activity, then it would reduce their risk of

being a victim of cyberbullying.

being a cyberbully.

encountering sexual predators.

being a sexual predator online.

viewing sexual pictures online.

posting sexual pictures online.

If I monitor my child(ren)'s Internet activity, then it would reduce their risk of

being a victim of cyberbullying.

being a cyberbully.

encountering sexual predators.

being a sexual predator online.

viewing sexual pictures online.

posting sexual pictures online.

Perceived Self Efficacy Questions (confidence statement)

Scale: Not True At All, Barely True, Somewhat True, Very True

I am certain I can communicate with my children about how to avoid

being a victim of cyberbullying.

being a cyberbully.

encountering sexual predators.

being a sexual predator online.

viewing sexual pictures online.

posting sexual pictures online.

I am certain I can monitor my child(ren)'s Internet activity to help them avoid

being a victim of cyberbullying.

being a cyberbully.

encountering sexual predators.

being a sexual predator online.

viewing sexual pictures online.

posting sexual pictures online.

Parental Behaviors Questions

Scale: Not True At All, Barely True, Somewhat True, Very True

I have checked the history on the computer my children use to see what Internet sites they have viewed within the last month. (If yes, skip next question)

I have checked the history on the computer my children use to see what Web sites they have viewed within the last year.

I have the computer my children use at our home in an open area that is visible to me.

I interact with my children while they are active on the Internet. (e.g. playing games, researching topics for homework, exploring family vacations, etc.)

I enforce rules about what Web sites my children are allowed to visit.

I keep track of how much time my children spend on the Internet.

I have parental controls on my computer to monitor my child(ren)'s Internet activity.

I communicate with my children about how to avoid sexual predators while active on the Internet.

I communicate with my children about the types of photographs that are appropriate to post on the Internet.

I communicate with my children about the types of photographs that are inappropriate to post on the Internet.

I communicate with my children about the types of photographs that are appropriate to view on the Internet.

I communicate with my children about the types of photographs that are inappropriate to view on the Internet.

I communicate with my children about becoming a victim of cyber bullying.

Background questions/Demographic

How old are your children? 12 13 14 15 16 17   (Mark all that apply)

What is your children's gender? Male Female (Mark all that apply)

What is your age?

Gender? Male Female

Are you Hispanic or Latino?

      ○ Yes

      ○ No

      ○ What is your race? (You may mark more than one answer): American

         Indian or Alaska Native; Asian; Black or African-American; Native

         Hawaiian or Other Pacific Islander, White)

When you are at home or with your family, what language or languages do you usually

speak? ***(YOU MAY MARK (X) MORE THAN ONE ANSWER)***

☐ English

☐ Spanish

☐

     Chinese language such as Mandarin or Cantonese

     Some other language

Do you use the Internet regularly? Yes/No

Do you have primary custody of your child? Yes No

What percent of the week does your child spend at your house?

     Less than 50%

     50%

     More than 50%

APPENDIX B

CONSENT FORM

IRB Approval Number: 2011N7082

Parent's Internet Monitoring and Communication Strategies

You are invited to participate in a research study that explores parent's concerns regarding their children's Internet use as well as strategies parents use to keep their children safe when using the Internet. This study is being conducted by Sally Moody (contact email: sm1563@txstate.edu), a graduate student in health education.

INFORMATION

We ask that you complete the Parent's Technology Monitoring Strategies and Communication Strategies questionnaire. You were selected as a possible participant because you are currently a staff member at Texas State University- San Marcos. Approximately 920 participants are expected to take part in this study. The electronic survey contains questions about concerns you may have when your children are using the Internet and strategies you may use to help keep your children safe. A sample question is: "If I talk with my children about the dangers of Internet activity, then it would reduce their risk of being a victim of cyber bullying." The survey will take no more than 15 minutes to complete.

BENEFITS

By participating in this survey you will have the opportunity to win a $25 gift card to Starbucks. You will be linked to a separate site to enter your name and contact information. Two gift cards will be raffled for participants who wish to share this information. The survey may make you think about your parental monitoring and communication behaviors. The data will be used to assist researchers in developing a better understanding of parent's concerns regarding their children's Internet use and common monitoring strategies used by parents. Your decision whether or not to

participate will not affect your current or future relations with Texas State University-San Marcos or the researchers conducting this study.

POTENTIAL RISKS

There are no direct risks expected as a result of this study. There is a slight risk related to emotional distress that may arise as a result becoming aware of safety issues adolescents face while using the Internet. At the end of the survey you will be provided with a credible and reliable resource with information regarding Internet safety.

CONFIDENTIALITY and DATA RECORDS

Your name and contact information will only be collected if you wish to enter the drawing for a Starbucks gift card. You do not have to share your contact information to participate in the study and your participation will be kept confidential. Electronic data records will be stored securely on a password-protected computer and are accessible only by the principle investigator and the thesis committee. The data will be stored for approximately two years and then securely removed from the computer.

PARTICIPATION

You must be a parent or legal guardian to a child who is 12-17 years old who has access to the Internet in order to participate in this study. Your participation in this study is voluntary; you may refuse to participate without penalty. You have the right to refuse to answer any of the questions while completing the survey. If you decide to participate in the study, you may withdraw at any time without penalty and without loss of benefits to which you are otherwise entitled. The final data will be available to the participants if they request it from the principle investigator.

CONTACT

If you have any questions at any time about the study or the procedures, you may contact the principle investigator: Sally Moody sm1563@txstate.edu .

This research study has been reviewed by the Institutional Review Board (IRB) – Human Subjects in Research, Texas State University-San Marcos. If you believe you have not been treated according to the descriptions in this form, or your rights as a participant in this research have not been honored during the course of this project, you may contact the IRB Compliance Specialist, Becky Northcut (512) 245-2102; or IRB chair, Dr. Jon Lasser (512) 245-3413 – lasser@txstate.edu.
I have read the consent form and agree to the above terms and conditions.

Agee
Disagree

REFERENCES

Allison, P. (1999). Multiple regression: a primer. Thousand Oaks, CA. Pine Forge Press, Inc..

Borawski, E.A., Inevers-Landis, C.E, Lovegreen, L.D., Trapl, E.S. (2003). Parental monitoring, negotiated unsupervised time, and parental trust: the role of perceived parenting practices in adolescent health risk behaviors. *Journal of Adolescent Health 33* 60-70.

Buhi, E.R., Goodson, P., & Neilands, T.B. (2008). Out of sight: not out of mind: strategies for handling missing data. *American Journal of Health Behavior. 32* (1) 83-92.

Campbell, M.A. (2005). Cyber Bullying: An old problem in a new guise? *Australian Journal of Guidance & Counseling, 15* (1) 68-76.

Conner, M., Norman, P. (2003). Predicting health behavior. Philadelphia, PA. Open University Press.

Dehue, F., Bolman, C., & Vollink, T. (2008). Cyberbullying: youngster's experiences and parental perception. *Cyber Psychology & Behavior 11* 217-223.

Dilorio, C., McCarty, F., & Denzmore, P. (2006). An exploration of social cognitve theory mediators of father-son communication about sex. *Journal of Pediatric Psychology 31* (9) 91-127.

Dilorio, C., Resnicow, K., Dudley, W.N., Thomas, S., Wang, D., & Marter, D. (2000). Social cognitive factors associated with mother-adolescent communication about sex. *Journal of Health Communication 5* 41-51.

Eastin, M.S., Greenberg, B.S., & Hofschire, L. (2006). Parenting the internet. *Journal of Communication 56* 486-504.

Garson, D. (2012, February 2). Factor analysis. Retrieved from http://faculty.chass.ncsu.edu/garson/PA765/factor.htm#concepts

Glanz, K., Rimer, B.K., & Viswanath, K. (2008). Health behavior and health education, theory, research and practice. San Francisco, CA. Jossey-Bass.

Hardy, S.A., Carlo, G., & Roesch, S.C. (2010). Links between adolescents' expected parental reactions and prosocial behavioral tendencies: the mediating role of prosocial values. *Journal Youth Adolescence 39* 84-95.

Huebner, A.J. & Howell, L.W. (2003). Examining the relationship between adolescent sexual risk-raking and perceptions of monitoring, communication, and parenting styles. *Journal of Adolescent Health 33* 71-78.

Lanthier, E. (2002, March 29). Correlation. Retrieved from http://www.nvcc.edu/home/elanthier/methods/correlation.htm

Law, D.M., Shapka, J.D., & Olson, B.F. (2010). To control or not to control? parenting behaviors and adolescent online aggression. *Computers in Human Behavior 26* 1651-1656.

Lenhart, A. (2005). Protecting teens online. *Pew Internet & American Life Project* 1 27.

Lenhart, A., Madden, M., Macgill, A.R., & Smith, A. (2007). Teens and social media. *Pew Internet & American Life Project* 1-44.

Liau, A.K., Khoo, A., & Ang, P.H. (2005). Factors influencing adolescents engagement in risky internet behavior. *Cyber Psychology & Behavior 8* (6) 513-520.

Mastunaga, M. (2009). Parents don't (always) know their children have been bullied: child-parent discrepancy on bullying and family-level profile of communication standards. *Human Communication Research 35* 221-247.

McAfee, H. (October 2008). McAfee, Ic. Research reveals mothers rate cyber dangers as high as drunk driving or experimenting with drugs. Retrieved from http://www.mcafee.com/us/about/news/2008/20081022_095000_x.aspx

Mishna, F., Saini, M., & Solomon, S. (2009). Ongoing and online: children and youth's perceptions of cyber bullying. *Children and Youth Services Review 31* 1222-1228.

Plonsky, M. (2012). Psychological statistics. Retrieved from http://www4.uwsp.edu/psych/stat/

Rimer, B.K. & Glanz, K. (2005). Theories at a glance. *U.S. Department of Health and Human Services* 1-60.

Rosen, L.D., Cheever, N.A., & Carrier, L.M. (2008). The association of parenting style and child age with parental limit setting and adolescent myspace behavior. *Journal of Applied Developmental Psychology 29* 459-471.

Salkind, N.J. (2009). Exploring research. Lawerence, KS. Pearson Education.

Wang, R., Bianchi, S.M., & Raley, S.B. (2005). Teenagers internet use and family
    rules: a research note. *Journal of Marriage and Family (67)* 1249-1258.

Wolak, J., Mitchell, K., & Finkelhor, D. (2006). Online victimization of youth five years
    later. *National Center for Missing & Exploited Children* 1-96.

VITA

Sally Moody was born in Corpus Christi, TX on August 24, 1987, the daughter of Russell Moody and Janet Allen. She graduated from Calallen High School in May 2006. After that, Ms. Moody attended the University of Texas at San Antonio for two years and then transferred to Texas State University-San Marcos. In May 2010 she received the degree of Bachelor of Health and Wellness Promotion. In June 2010 she entered the graduate college at Texas State University-San Marcos. During her graduate work Ms. Moody received the National Gamman of the Year Award. She was employed as a graduate teaching assistant where she taught "Health Education in the Elementary Setting." Ms. Moody is now employed with the San Antonio Food Bank and continues to help others make healthier life choices.

Permanent Address: 228 N. Solms Rd.

New Braunfels, Texas 78132

This thesis was typed by Sally Moody.