PSYCHOSOCIAL DETERMINANTS OF USING ONLINE SOCIAL NETWORKS:

AN APPLICATION OF THE THEORY OF PLANNED BEHAVIOR

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Dedication

I would like to dedicate this work to my family, friends, and teachers whose roles often overlap. Amongst those are my parents, Jack and Mary Jane Mace and my sister Kenzie (Kit) who have always given me their unconditional love and support, may my love and support always be unconditional to you. Finally, I want to dedicate this to JD, who will never be forgotten. Forever young, forever loved.

Acknowledgements

Psychosocial Determinants of Using Online Social Networks

The use of online social networking continues to increase among Americans, yet there is little research related to understanding of the behavior using online social networks. This study aimed to understand the underlying beliefs, evaluations, attitudes, norms, and perceptions behind the intention to log onto online social networks. The Theory of Planned Behavior was applied to the behavioral intention to log onto Facebook once a day for the next three months (n = 269). Regression analysis predicting intention from global constructs of the Theory of Planned Behavior yielded a multiple correlation of 0.62 with   attitude (β = 0.32, p < 0.01), subjective norm (β = 0.41, p < 0.01), and perceived behavioral control (β = 0.08, ns). Salient consequences related to stronger intention to log onto Facebook once a day for the next three months included the behavioral beliefs of staying in touch, increasing social network, and sharing interests with others. Salient referents that were significantly correlated with intention to log onto Facebook once a day for the next three months included friends, other students, boyfriend/girlfriend/spouse, family, professors, and future employers. Implications for understanding the intention behind the use of online social networks will be discussed in regards to the salient referents and consequences of logging onto Facebook once a day for the next three months.

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I.   INTRODUCTION

Statement of the Problem

The concept of social networking has been a part of human culture from ancient history to modern times. Social networks are the connections that individuals share through a variety of relationships. Social network theorists state that virtually all people are interdependent with other people through individual or group social networks. The degrees of involvement in each network vary and relationships are not necessarily symmetrical between the two entities connected through a network (Blackshaw & Long, 2005). However, networking remains a core activity of human behavior. As humans have advanced technologically, so have the methods in which people create and maintain social ties and networks. Technologies such as cellular phones, the Internet, and computers allow humans to have instant access to individuals and groups in their social circles by creating networks online through virtual wireless technology.

The use of online social networks has increased rapidly since the first mainstream online social network was developed in 1997. Sites such as MySpace and Facebook both boast having over 100 million users per site and recently Facebook has ousted Myspace as the leader in joining members becoming the world's most popular site (Hargittai, 2007). According to the International Telecommunications Union over 74 percent of Americans use the Internet at least once every thirty days, increasing the likelihood that a person is able to access online social networks (Telecommunications Union, 2005). The Pew Research Center for People and Press recently conducted a survey on American online social network use. It is estimated that 22 percent of the

American public in general is participating in these online social networks. Amongst those 18-29 year old the rate of use is 67 percent and amongst those 30-39 year old it is 21 percent, and only 6 percent of those whom are over 40 use online social networking sites (Kohut, 2008).

The current literature available on the use of online social networks is limited. Research that is available has not provided adequate understanding of psychosocial factors determining the use of online social networks. Most research has focused on defining and describing online social networks and who engages in them rather than looking at the use of online social networks as a behavior. Secondly research has not been able to conclude whether virtual networks are comparable to "real" social networks. Lastly there is not a sufficient amount of research on the effect of online social networking to determine whether or not the behavior is positive or negative socially or in relation to health. This study aims to look at online social networking as a behavior driven by motivations that can be understood through predicting user intention by application of the Theory of Planned Behavior.

Research Questions

1) Can the use of online social networks, specifically Facebook be predicted by the constructs of the Theory of Planned Behavior?

2) What global constructs are predictors of intention to log onto Facebook at least once a day for the next three months?

3) What salient consequences, circumstances, and referents are associated with the intention to log onto Facebook at least once a day for the next three months?

Purpose of the Study

The purpose of this study was to identify the psychosocial determinants significantly associated with individuals using online social networks. Psychosocial determinants used in this study were derived from the theoretical constructs of the Theory of Planned Behavior: behavioral intention, attitude toward action, subjective norm, and perceived behavioral control (Ajzen, 1991: Eggleston, 2007). The primary objective of this study was to understand the intention behind the behavior: I will log onto Facebook once a day for the next three months. The Theory of Planned Behavior asserts that interventions can be created once relationships are established between the theoretical constructs and behavior. However, there is currently not enough information about the effects of using online social networks to know what, if any, interventions may be appropriate.

Significance of the Study

There are significant gaps in the literature concerning the use of online social networks. The few studies that have been conducted focus on defining social networks and document the emergence of technology in communication. Early studies about the social aspects of using the Internet have also attempted to predict the impacts of technology and human interface. Research on the subject matter has yet to conclude the positive or negative impacts of engaging in this behavior. A comprehensive understanding of the reasons why people use online social networking sites will be essential to understanding the behavior. The Theory of Planned Behavior has been used to predict intention to perform a given behavior (Ajzen, 1991). This study was designed

to determine the association of the behavior of using online social networks with constructs of the Theory of Planned Behavior. To date there are no other studies that apply this theory to this particular type of behavior for the purpose of understanding the motivations and intentions of users engaging with online social networks. The results of this study add to the scientific body of literature in understanding online social network use.

Delimitations of the Study

The study was delimited to a homogenous population. The study population consisted mainly of Caucasians, females, 18-24 years of age, and who were currently enrolled in a four-year college or university. The results of this study may not be generalizable to other demographic populations. Nonetheless, the Theory of Planned Behavior assumes that some social demographic differences are not necessarily independent of the psychosocial determinants of behavior (Ajzen, 1991).

Assumptions of the Study

Behavioral intention is a good predictor of behavior. The Theory of Planned Behavior assumes that an individual's intention to perform a behavior is strongly related to the individual actually performing the behavior (Ajzen, 1991; Albarracin, Johnson, et al. 2001).

Limitations of the Study

The study was limited to the understanding of the behavior and does not measure health outcomes or provide any behavioral interventions. The study was confined to defining the motivations behind online social network use through the constructs of the

Theory of Planned Behavior. The study was also limited to the population of students

enrolled at a large midwestern public university and all of the data were self-reported.

Definitions

The following terms are defined to clarify their use in the study:

Social Network. When a computer connects people or an organization, it is a social

network (Wellman, et al., 2006)

Social Network Site. A social networking site is a web-based service that allows

individuals or groups to 1) construct a public or semi-public profile within a bounded

system; 2) articulate a list of other users with whom they share a connection; and. 3) view

and traverse their list of connections and those made by others within the system. The

nature and nomenclature of these connections may vary by site (Boyd & Ellison, 2007)

Internet. A network of computers that allow for the transmission of data for multiple

purposes through a common set of protocols according to a global address system (Wood

& Smith, 2005)

Behavior. Behavior is also the transmission of intention or perceived behavioral control

into action (Godin & Kok, 1996)

Behavioral Intention. A measure of the intention to act based on a combination on

attitude, subjective norms, and perceived behavioral control (Godin & Kok, 1996)

Theoretical Construct. Is defined as a systematic arrangement of ideas based on a

specific theory or theories (Eggleston & Middlestadt, 2009).

Attitude toward Act. Attitude is defined as a set of beliefs related to the action of

performing behavior with respect to the outcomes of behavior (Eggleston, 2009). Overall

evaluation of the behavior (Ajzen, 1991).

<u>Subjective Norm.</u> Belief about whether most people approve or disapprove of the behavior (Ajzen, 1991).

<u>Perceived Behavioral Control.</u> Overall measure of perceived control over the behavior (Ajzen, 1991).

<u>Facebooking</u>. The act of logging into or using Facebook.

<u>Facebook</u> A social networking web-based service that according to its website "Facebook gives people the power to share and makes the world more open and connected. Millions of people use Facebook everyday to keep up with friends, upload an unlimited number of photos, share links and videos, and learn more about the people they meet." (Joinson, 2008).

II. Literature Review

Synopsis of the Literature

The following chapter will examine and discuss the body of current scientific literature: The history of online social networking, the history of Facebook, and the Theory of Planned Behavior. The first section will review the history and definition of online social networking. The second section will discuss the current use and trends of Facebook. The last section examines the Theory of Planned Behavior and its applications to various health behaviors and how it can be applied to online social networking.

Online Social Networking

Social networking sites are web-based communities that allow people or groups to connect and share information through the Internet. Some definitions include the presence of machines and humans, implying that humans are connecting to machines, and then to people, while other definitions conclude that the humans are connecting through

machines (Wellman et al 1996). Users (humans that engage in social network activity) create a public, or semi-public profile on a system or program that is contained by the server or manager of the site. These websites also allow members to create a list of people or groups with whom they can define as their social network through adding friends, joining groups, and reviewing their list of connections (Boyd & Ellison, 2007). Users are able to search through the profiles of their "network", share information, send and receive messages, and display what the user wants other users to see in their profile. So far research in this area has focused primarily on determining the definition of a social networking site, and what sites should be included in this category. Many studies focus on social network definitions and make several hypotheses about how these social networking sites will effect communication, culture, and societies. What is not clear is how these sites affect individual behaviors and how behaviors affect these sites (other than the fact that people are using these site at increasingly rapid rates). More specifically, the exponential rise of increased participation of online social networks daily, the exact frequency of participation fluctuates constantly and the general consensus is that participation is in the millions worldwide (Wellman et al, 2006).

History

Social networking sites were originally developed to create networks for business associates to maintain a high level of efficient communication. Similar to the Internet, which started as an initiative for military and business communication, networking has moved into the private sector of human life. Millions of Americans have Internet access

in their homes and current trends suggest that these numbers will increase as younger populations are associated with higher use (Kohut, 2008).

The first online social network was a site called SixDegrees.com that combined messaging, profiles, and information display and exchange. This site was considered to be unsuccessful because it did not advertise or spread rapidly enough by word of mouth (Boyd, 2006; Boyd & Ellison, 2007). The site that emerged in 1997 was said in one study to be "ahead of its time" and that is why it was not successful. After SixDegrees.com, several social networking sites appeared online and were better prepared to attract members than SixDegrees.com. Friendster, ICQ, and Tribe are examples of popular social networking sites that appeared online in the 2000's. MySpace membership was surpassed by the membership of Facebook in the summer of 2009 as the most popular site, meaning that Facebook currently has the most members of any social networking sites. MySpace began in 2003 and was thought to be like most other social networking sites, and seen as a fad, but MySpace has proven itself as a mega power in social networking. MySpace gained much of its popularity from the local California musicians and musical groups began using the site as a networking base to share information about concerts and share music online (Boyd, 2006).

The history is brief and incomplete because of the nature of this topic; these sites began as a sub-cultural phenomenon in 1997, and only in the past few years have been recognized as mainstream. It is not clear if these sites will only be around until some new technology rises. What is clear is that millions of people continue to register for and use these sites and that there is not enough research on the reasons why people engage in the behavior.

Facebook

Facebook is a social networking site that started in 2004 by a Harvard college student, Mark Zuckerberg. It was originally a network that was only available to students with a Harvard e-mail address. Eventually Facebook became open to all college students with a valid university e-mail address. Then in 2006 Facebook became open to the public in general of age thirteen or above, but still maintained an emphasis on high school and college students (Joinson, 2008). As of December 2008, there were over 150 million active users, people who have logged on more than once in the last thirty days. As of September 2009, there were over 300 million active users (CNN, 2009).

Research on social networking sites is limited, Facebook research is also limited. The research is still in its infancy as it has mainly focused on determining who is participating on these sites and asking the general questions about what this new phenomenon means for the world of communication. There have been a few studies that have acknowledged online social networking's (with a reference to Facebook) ability to create social capital and have assessed the sense of network and community. One study found that those with low self-esteem and low life satisfaction experience the greatest benefits from online social networking including networks such as Facebook because it raises the level of both of those areas (Ellison et al, 2007).

A study by Joinson attempted to determine reasons why people may use sites like Facebook. The question of the study was about the "uses and gratifications" of using Facebook. The study determined that "keeping in touch" was the main reason why people use Facebook. However, the study did not employ a theory as a means to test the motivations behind the behavior and rather simply seemed to ask a person what they

liked about the sites. Studies like this have attempted to determine what it is about the sites that motivate a person to perform the behavior. Characteristics of the individual, beliefs, evaluations of behavior, and the motivating factors of the individuals were not identified.

Another study by Hargitti attempted to determine characteristics about an individual that would motivate uses of online social networks. Race, gender, ethnicity, and parental educational background were all tested as motivating factors in the use of online social networks. The findings of the study concluded that racial or ethnic identity may be associated with the social networking site that an individual may choose to join and use. This study was able to replicate the demographic that had been previously found in other studies to be the largest group of social network users, mostly Caucasian females who are under the age of forty (Hargitti, 2008).

These studies have begun to examine the demographics involved in using online social networks. Studies have also begun to question the affect that these sites can have on social capital and networks. The trends suggest that these sites will continue to develop and evolve. Applications and uses of these sites may also change. More research is needed on this rapidly changing and very present part of modern society.

Theory of Planned Behavior

The Theory of Planned Behavior was developed to address the limitations of the Theory of Reasoned Action. Ajzen and Fishbein initially created the Theory of Reasoned Action to predict behavior from the intention of the individual. The Theory of Reasoned Action initially only looked at attitudes and social referents as predicting intention. According to the theory intention is the primary factor that predicts actual behavior, the

stronger the intention the more likely the behavior will actually be performed (Ajzen, 1991). The theory failed to account for circumstances surrounding the behavior that may limit the individual's circumstances that could allow or prohibit the behavior. That is why a measure for perceived behavioral control was created in addition to the constructs (attitude, subjective norm) of the Theory of Reasoned Action to create the Theory of Planned Behavior. Like the Theory of Reasoned Action, the Theory of Planned Behavior also places intention as the closest predictor of behavior. The global constructs of the theory are used to predict intention.

The global constructs of the Theory of Planned Behavior are attitude, subjective norm, and perceived behavioral control. Each global construct has a belief measure and an evaluation of outcome measure. Attitude is defined as the belief and evaluation to which degree a particular behavior is positive or negative. Measures for the belief component determine how likely the behavior will lead to the stated outcome. Evaluations of outcome measure how good (positive) or bad (negative) the behavior is.

Subjective norm is the measure of how important each referent is in determining behavior in addition to how motivated a person is to comply with what they believe each referent thinks they should do. A referent is any person who has significance such as a proximal relative or it could be an authority figure such as medical professionals or legal enforcement. The belief component is whether the person believes that the referent thinks that they should perform a particular behavior. The evaluation is how willing or motivated a person is to comply with the defined referent.

Perceived behavioral control is the measure of perceived ability to perform a behavior along with their evaluation of the behavior. The control belief considers how

strongly a person agrees or disagrees that they would be able to perform a behavior based on circumstantial factors. Circumstantial factors vary based on particular behaviors and settings. The evaluation components determine which factors make it easy or difficult to perform the behavior (Ajzen, 1991).

The Theory of Planned Behavior was applied to this study by taking the basic constructs from the theory and adapting the specific measures for each behavior to which it was applied. Making the theory applicable to various behaviors consisted of elicitation by means of open-ended interviews that collected salient responses. Following the constructs of the theory there were open-ended questions surveying the positive and negative aspects of the behavior, factors that make the behavior more easy or difficult, and those individuals who may most influence the decision to engage or not engage in the behavior. From these open ended responses quantitative measures were developed in the language of the responses to create a closed ended survey that followed the constructs of the theory. Likert type scales were created to quantitatively measure intention, attitude, subjective norm, and perceived behavioral control (Eggleston, 2009).

The Theory of Planned Behavior has been applied to various health behaviors in order to predict intention for the purpose of understanding the underlying causes of behavior to create more effective behavioral health interventions. The Theory of Planned Behavior has been used to explain and create interventions for more traditional health behaviors such as exercise, smoking and condom use. It has also been used to try to predict intention and motivations for behaviors not traditionally categorized as health behaviors such as hunting and selecting modes of transportation.

A study by Godin & Kok reviewed over fifty studies from 1980 until 1996 with applications of the Theory of Planned Behavior. The conclusion of the study was that the theory was very effective and useful in predicting health behaviors, though the efficacy of the theory varies depending on the behavior to which it is applied. Perceived behavioral control was found to be as significant as attitude at predicting intention. Subjective norm was found to have the least significance in predicting intention and behavior in a review of all of the studies (Godin & Kok, 1996).

III. Methods

Purpose

The purpose of this study was to identify the psychosocial determinants associated with logging on to Facebook once a day for a period of three months. The Theory of Planned Behavior supplied the constructs for measuring the psychosocial determinants. The constructs of the theory include behavioral intention, attitude toward action, subjective norm, and perceived behavioral control (Ajzen, 1991). The Theory of Planned Behavior assumes that once a relationship between the constructs and the behavior is established an intervention based on those relationships can be created.

Overview

The behavior examined for this study was logging into Facebook once a day for the next three months. Participants were recruited through a large Midwestern public university. The data collection instrument was a self-reported 126-item survey. The survey was modeled after a study conducted by Eggleston on the application of the Theory of Planned Behavior (2009). Measures for the study were elicited from a pilot

study conducted on attitude, subjective norm, perceived behavioral control, and behavioral intention. Statistical analysis of the data included Pearson correlation and multiple linear regression.

Selection of Participants

Participation was voluntary and required subjects to be at the age of eighteen or older. Participants were recruited from classrooms on the university campus. Students were not required to have a Facebook account or be a user of online social networks.

Research Design

The study design was quantitative, descriptive, cross-sectional, correlational, and non-experimental as there was no random assignment, causation was not inferred. Also, data were collected from a certain point in time. Participants were recruited via convenience sampling. The purpose of this study was to describe and understand relationships between an individual's intention to use Facebook and the constructs of the Theory of Planned Behavior. The study was submitted to the site university's IRB and received human subject approval from the Human Subjects Committee. Each participant was provided with a study information sheet along with each survey instrument that was distributed.

Sample Size

Previous studies applying the Theory of Planned Behavior conclude that a study sample size must have over 100 participants in order to assure reliable statistical analysis procedures (for multiple regression). This is specifically important in the analysis of meaningful beta weights, correlation coefficients, and regression analysis (Harris, 2001).

Procedures

Participants were recruited at Indiana University – Bloomington in the School of Health, Physical Education, and Recreation (HPER). Instructors of HPER classes were contacted to invite their classes to participate in the study. All of the instructors who agreed to participate were given the opportunity to participate. The researcher provided the instructors with a script approved by the Human Subjects Committee to read to their students to explain the study and voluntary participation. The students were then given the first 20 minutes of class to complete a survey. The instructors placed all completed surveys into a large envelope provided by the researcher. The envelopes were then sealed and returned directly to the researcher.

Measures

This study was modeled after previous research that had applied to the Theory of Planned Behavior. The quantitative measures were based on a pilot study that was conducted to elicit salient consequences, referents, and circumstances about the use of Facebook. A previous quantitative instrument that applied the Theory of Planned Behavior was modified using the most frequent salient responses from the pilot study of the use of online social networks.

The following measures were all formatted based on a previous study that this study was designed to model. Behavioral intention was measured through agreement with the statement of *I will log onto Facebook once a day for the next three months* on a seven point scale ranging from extremely disagree to extremely agree. The measure for attitude toward action consisted of five seven-point semantic differential scales *logging onto Facebook once a day for the next three months is...* good or bad, favorable or

unfavorable, sweet or sour, strong or weak, and active or passive. The mean of these items were calculated to produce the overall measure of attitude.

Subjective norm was measures through agreement with two of the following statements. The first statement deals with important referents to the respondents *Most people important to me think I should log onto Facebook once a day for the next three months.* The second statement focuses on referents that are similar to the respondent *Most people like me think I should log onto Facebook once a day for the next three months.* The calculated mean of these items provided an overall measure for subjective norm.

The overall measure for perceived behavioral control was based on two items based on a seven-point Likert scale. *Logging onto Facebook once a day for the next three months is up to me/not up to me. Logging onto Facebook once a day for the next three months is under my control/not under my control.* The mean of these two items produced the overall measure of perceived behavioral control.

The measures for the underlying salient beliefs, referents, and circumstance for all of the global constructs were provided from the responses of a pilot study conducted in 2007 with over 30 university students. Salient responses from the pilot study were selected for the survey instrument based on a frequency analysis. There were eight salient outcome belief responses for attitude toward the act; will allow me to stay in touch, will allow me to increase my network, will allow me to share interests, will allow unwanted viewers to view my profile, will allow me to share information, will allow me to flirt, will decrease my safety, will decrease my privacy. Each salient consequence was analyzed in two parts, first to assess the belief about the behavior and secondly to assess the

evaluation of the outcome of the behavior. For example the behavioral component has a statement *Logging onto Facebook will allow me to flirt* with responses on a seven point scale from extremely unlikely to extremely likely followed. Then the evaluation of the outcome had a statement *Flirting is* followed with the seven-point with responses ranging from extremely bad to extremely good.

Subjective norm measures also had a two-part structure: normative beliefs and motivation to comply with referents. Salient referents identified in the pilot study included: boyfriend/girlfriend/spouse, family, friends, other students, future employer, and professors. Normative belief was measured a seven-point Likert scale of agreement with the statement of what a referent believes regarding behavior. For example, *My professor thinks I should log onto Facebook at least once a day for the next three months* responses ranged from extremely disagree to extremely agree. An example of motivation to comply was measured through agreement with the statement *I am motivated do what my professor (or other salient referent) thinks I should do* with the responses ranging from extremely disagree to extremely agree.

Perceived behavioral control measures consisted of measuring the control beliefs and the perceived power. Salient circumstances for the control beliefs and the perceived power were identified from the pilot study and include: having time, ease of use, computer skills, accessibility of Facebook, level of privacy, and level of security. An example of a measure for control beliefs was agreement with the statement *The privacy of Facebook allows me to log onto Facebook at lease once a day for the next three months* on a seven-point scale ranging from extremely disagree to extremely agree. The measures for perceived power examined how easy or difficult the behavior is due to

perform related to a specific circumstance. This was measured on a seven-point Likert scale ranging from extremely difficult to extremely easy: *The privacy of Facebook makes using Facebook easy/difficult.*

Demographic information was also collected to identify social factors that may be associated with the use of online social networks. Variables related to the individuals included age, gender, race, education level, and relationship status were all collected. Variables related to the behavior of using online social networks included years of involvement, frequency of use, years of involvement while in college, and other sites used.

Data Analysis

Null Hypothesis 1

$H01\ r = 0$

Psychosocial determinants are not correlated with intention to log onto Facebook once a day for the next three months.

The null hypothesis was tested through a multiple regression and correlation analysis. Table one illustrates the variables for prediction, predicted factors, and the statistical methods used. Behavior was predicted through measures of intention. Intention was predicted through multiple correlation scores with attitude toward the act, subjective norm, and perceived behavioral control. Attitude toward action was determined through behavioral beliefs, evaluation of outcomes, and the cross products of each behavioral belief with its corresponding evaluation of outcome. Subjective norm was determined through normative beliefs, motivation to comply, and the cross products of each normative belief with its corresponding motivation to comply with the referent.

Perceived behavioral control was determined by control beliefs, perceived power, and the cross products of each control belief with its perceived power of the circumstance.

The multiple regression models that were used came from previous studies that applied the Theory of Planned Behavior. Multiple regression analysis provided an explanation of the relationship of each construct with the intention to perform the behavior. Beta weights were analyzed to determine the significance of each predictor (Ajzen, 1991).

IV. ARTICLE 1 Psychosocial Determinants of Facebooking

Abstract

Objective: The purpose of this study was to predict college students' intention to log onto online social networking sites through the application of the Theory of Planned Behavior. **Participants and Methods:** Undergraduate university students (N=269) completed a written survey measuring psychosocial determinants (from The Theory of Planned Behavior) of using Facebook. **Results:** The global constructs of The Theory of Planned Behavior were able to explain 38% of the variance for intention to log Facebook. Subjective norm (Beta = .41, p < .01) was found to be the most significant predictor of intention followed by attitude towards action (Beta = 0.32, p < .01), while perceived behavioral control was not a significant predictor of intention to use Facebook. Salient beliefs that were significantly (p < 0.05) related to an individual's intention to use Facebook included the benefits of staying in touch, increasing social network, and sharing interests. Individuals with stronger intentions to use Facebook were strongly influenced (p < .05) by all salient referents (spouse/significant other, friends, family, professors, employers, other college students). **Conclusions:** The Theory of Planned Behavior can be applied to behaviors such as using online social networks because it is able to significantly explain the variance of college students' intention to use Facebook.

Keywords: College Students, Facebook, Online Social Networking, The Theory of Planned Behavior.

<u>Introduction</u>

The use of online social networks among U.S. college students has rapidly increased since the introduction of mainstream online social networks in 1997.[1] Currently, there is little theoretical literature contributing to the understanding of the motivations behind the intention to use online social networks.

As the awareness of online social networks presence grows in mainstream culture in the U.S., a need for understanding underlying psychosocial determinants becomes pertinent. In 1998 many individuals in the United States did not have access to the Internet, and now the internet is commonly used by 74.1% of US citizens[2]. People are using social network sites daily to communicate and maintain relationships with other people. Current literature has not identified all determinants of using social network websites. Many studies have focused on the acceptance of technology without focusing on the behavioral factors of the individuals.[3]

The Theory of Planned Behavior offers specific information through the breakdown of the main determinants such as attitudes, subjective norms, and perceived behavioral control in to sub-categories that go even deeper into the influences behind the behaviors.[3, 4] This methodology allows scientists to understand the proximal causes of the intention to use social networking sites. Current research has broadly approached why individuals use websites such as Facebook and this study hypothesizes that certain factors can be identified that are related to use of sites such as facebook.com.

To date, social scientists have been able to define and describe what social networking websites are and who typically uses them.[6] Much of the emphasis of research in the field of technology is the effect that technology has on individuals and

societies. The focus has been on the characteristics of the technology. This study aims to determine what it is about the individual or society that influences their use of this type of technology.[3, 7]

Facebook is a newer social network, which means even less is known about it, though assumptions have probably been made that it is similar to other social networking sites. Social networking sites continue to gain popularity in mainstream popular culture.[5] As of 2009, it is estimated that over 300 million people use Facebook as a social networking utility.[8]

Further clarification is needed about what is going on right now in the area of social networking, and because Facebook is the largest social networking website in the world and Facebook is most popular among young adults and teens including college students.[9] The premise of this study is to identify information on the determinants influencing intention to use Facebook.

The focus of this project was to understand the psychosocial determinants of why college students use facebook.com. Facebook.com is the one of the fastest growing online social networking websites, but has some criticisms.[10] This study was conducted to learn more about the reasons that people are participating in online social networks.

Methods

Participants and Procedures:

Participants were ($n = 269$) undergraduate students at a large Midwestern public university. Participants were predominantly female (78 percent) and most were between the ages of 18-24. Participation was voluntary and required subjects to be at least

eighteen years of age or older. Participants were recruited from classrooms on the campus of the university. Students were not required to have a Facebook account or be a user of online social networks. Researchers visited university classrooms and recruited college students to participate in this study. Participants completed the survey immediately after agreeing to participate in the survey and were not given any compensation for participation. The study received approval from the Indiana University Institutional Review Board.

Measures:

Behavioral intention was measured through agreement with the statement of I will log onto Facebook once a day for the next three months on a seven point scale ranging from extremely disagree to extremely agree. The measure for attitude toward action consisted of five seven-point semantic differential scales logging onto Facebook once a day for the next three months is… good or bad, favorable or unfavorable, sweet or sour, strong or weak, and active or passive. The mean of these items were calculated to produce the overall measure of attitude.

Subjective norm was measures through agreement with two of the following statements. The first statement deals with important referents to the respondents Most people important to me think I should log onto Facebook once a day for the next three months. The second statement focuses on referents that are similar to the respondent Most people like me think I should log onto Facebook once a day for the next three months. The calculated mean of these items provided an overall measure for subjective norm.

The overall measure for perceived behavioral control was based on two items based on a seven-point Likert scale. Logging onto Facebook once a day for the next three months is up to me/not up to me. Logging onto Facebook once a day for the next three months is under my control/not under my control. The mean of these two items produced the overall measure of perceived behavioral control.

The measures for the underlying salient beliefs, referents, and circumstance for all of the global constructs were provided from the responses of a pilot study conducted in 2007 with over 30 university students. Salient responses from the pilot study were selected for the survey instrument based on a frequency analysis. There were eight salient outcome belief responses for attitude toward the act; will allow me to stay in touch, will allow me to increase my network, will allow me to share interests, will allow unwanted viewers to view my profile, will allow me to share information, will allow me to flirt, will decrease my safety, will decrease my privacy. Each salient consequence was analyzed in two parts, first to assess the belief about the behavior and secondly to assess the evaluation of the outcome of the behavior. For example the behavioral component has a statement Logging onto Facebook will allow me to flirt with responses on a seven point scale from extremely unlikely to extremely likely followed. Then the evaluation of the outcome had a statement Flirting is followed with the seven-point with responses ranging from extremely bad to extremely good.

Subjective norm measures also had a two-part structure: normative beliefs and motivation to comply with referents. Salient referents identified in the pilot study included: boyfriend/girlfriend/spouse, family, friends, other students, future employer, and professors. Normative belief was measured a seven-point Likert scale of agreement

with the statement of what a referent believes regarding behavior. For example, My professor thinks I should log onto Facebook at least once a day for the next three months responses ranged from extremely disagree to extremely agree. An example of motivation to comply was measured through agreement with the statement I am motivated do what my professor (or other salient referent) thinks I should do with the responses ranging from extremely disagree to extremely agree.

Perceived behavioral control measures consisted of measuring the control beliefs and the perceived power. Salient circumstances for the control beliefs and the perceived power were identified from the pilot study and include: having time, ease of use, computer skills, accessibility of Facebook, level of privacy, and level of security. An example of a measure for control beliefs was agreement with the statement The privacy of Facebook allows me to log onto Facebook at lease once a day for the next three months on a seven-point scale ranging from extremely disagree to extremely agree. The measures for perceived power examined how easy or difficult the behavior is due to perform related to a specific circumstance. This was measured on a seven-point Likert scale ranging from extremely difficult to extremely easy: The privacy of Facebook makes using Facebook easy/difficult.

Intention

Behavioral intention was measured by calculating the mean of two scores from Likert scale items addressing intention to use Facebook. The first statement was *I will log onto Facebook once a day for the next three months(*extremely disagree to extremely agree)and the second statement was Logging into Facebook once a day is… (not likely at all to very likely) .

Attitude Toward Act

Attitude was defined as a set of beliefs related to the action of performing behavior with respect to the outcomes of behavior.[11] It served an overall evaluation of the behavior.[4] The measure for attitude toward action consisted of five seven-point semantic differential scales *logging onto Facebook once a day for the next three months is...* good or bad, favorable or unfavorable, sweet or sour, strong or weak, and active or passive. The mean of these items were calculated to produce the overall measure of attitude and the Cronbach's alpha was .91 for the five measures of attitude.

Subjective Norm

Subjective norm is a belief about whether most people approve or disapprove of the behavior.[4, 12] Subjective norm was measured through agreement with two of the following statements. An example of an item that measures subjective norm is the following statement that addresses important referents to the respondents *Most people important to me think I should log onto Facebook once a day for the next three months. A second example is the* statement focuses on referents that are similar to the respondent *Most people like me think I should log onto Facebook once a day for the next three months.* The calculated mean of these items provided an overall measure for subjective norm.

Perceived Behavioral Control

The overall measure of perceived behavioral control was the overall control over the behavior[4, 13]. The overall measure for perceived behavioral control was based on two items based on a seven-point Likert scale. *Logging onto Facebook once a day for the next three months is up to me/not up to me. Logging onto Facebook once a day for the next three months is under my control/not under my control.* The mean of these two items produced the overall measure of perceived behavioral control.

Analysis:

Data was analyzed using SPSS 17.0. Primary analysis involved descriptive analysis of the correlations among salient factors with global constructs of the Theory of Planned Behavior and Intention. Second, a regression model was developed to predict intention to use Facebook based upon the three global constructs of attitude toward action, subjective norm, and perceived behavioral control.

Results:

The results in Table 1 found that the global constructs were able to predict a significant amount of variance of intention to use Facebook daily. The multiple correlation was .62 when the intention was predicted from the three global constructs: attitude, subjective norm, and perceived behavioral control. A significant multiple correlation indicates that these constructs account for 38.2% of explained variance in intention to use Facebook daily. Significant predictors of intention ($p < .01$) included

attitude (Beta = .32) and subjective norm (Beta = .41) while perceived behavioral control did not have a significant standardized regression weight.

Table 2 presents the results for the underlying beliefs of the attitude towards logging onto Facebook once a day for the next three months. The sum of the behavioral cross products was significantly related to attitude and intention. Four of the salient consequences had a statistically significant correlation between the cross product and intention. For two of these (will increase my network and will allow me to share interests), the relationship appears to be due to the belief component. This means that those who intend to log onto Facebook are more likely to believe that logging on will increase their network and will allow them to share interests than non-intenders. For one of the consequences (will allow me to stay in touch), the relationship is due to both the belief and the evaluation component. This means that intenders were more likely than non-intenders to believe that logging on would help them stay in touch. For the consequence (will allow me to flirt) the relationship to intention was only significantly related to the evaluation of the behavior (whether it was good or bad). Furthermore, the stronger the intention the more the participants evaluated staying in touch as a good thing

Table 3 shows the relationship of intention with normative beliefs, motivation to comply, and the cross products of normative beliefs with motivation to comply. There were six individual normative cross-products and all cross products were significantly correlated to intention. The belief component explains to what degree that each referent approves or disapproves of the participant using Facebook and was significantly

correlated to intention for all salient referents identified. Motivation to comply was only significant for the referent, other students. This means that individuals with stronger levels of intention to use Facebook believed that most people (friends, other students, family, boy/girlfriend/spouse, family, professors, future employers) supported them using Facebook. The evaluation component; motivation to comply was only significant for other students, meaning that intenders were likely to use Facebook because they wanted to do what other students thought (motivated to comply with the wishes of referents) they should do.

Table 4 presents the results for the perceived behavioral control For four of the salient circumstances, there was a statistically significant correlation between intention and the cross product. These were; the accessibility of Facebook, my computer skills, the level of privacy, and don't have time.   For accessibility the control belief seemed to explain the relationship of intention to the cross product. For the others perceived power, or the evaluation of the behavior was likely to explain the relationship of intention to the cross product. People who intend to use Facebook believe that the accessibility will allow them to log on at least once a day. Also the intenders evaluated that the factors of their computer skills, not having time, and the level of privacy would make it easier to use the site. The items in the table marked n/a denotes a measure for which the wording was determined to unclear and therefore were unusable for data analysis.

Conclusions:

The primary purpose of this study was to understand the underlying behavioral beliefs related to intention of those who use online social networks by applying the

Theory of Planned Behavior. Demographic findings of those who engage in online social networks were consistent with prior studies of college students.

Overall the Theory of Planned Behavior was found to be an appropriate theory to use to understand the intention to use online social networking sites such as Facebook. Contrary to most research using the TPB[14], subjective norm was the most significant factor in predicting intention to use online social networks. Normative beliefs for all seven salient referents were related to intention. What the participant perceived the referent beliefs about what the subject should do was an important factor in determining intention. It was also important for the subject to comply with the perceived beliefs of two identified referents, peers such as friends and other students were the most significant referents for intention to use the sites. These groups would also be most likely to also be engaging in these sites. Users are also concerned with what parents, professors, and employers think about their use of these sites. Many college campuses have begun to circulate media to their students about carefully portraying their identities on these sites as employers may be doing informal background checks through their online social network profiles.

Further study should be conducted to expand the current limitations of the group defined in this study Currently knowledge of social networking sites is limited to those main groups such as college students known to make up the majority of users. Trends in use for other groups should be monitored to determine the different motivations for use amongst a more diverse group of people. Particularly interesting studies could expand

upon age group, ethnic minority groups, and the difference in use between sexes in terms of explaining motivations to use or not use these sites.

Future studies determining positive or negative health consequences may use this theoretical understanding to create health interventions based on further findings on the effects of using such social networking capabilities. Social psychology has proven the importance of staying in touch with one's social network as an important element to maintaining health. Furthermore numerous studies have outlined the relationship between loneliness and negative mental health statuses.[6] Also further studies should determine why certain social networking sites succeed and why others fail. This could assist social theorists determine what it is about these networks that encourage or discourage use and which elements of such sites have positive or negative impacts on the health and or social behavior.

This study implies that there are factors that can be determined to cause use of online social networks. Surrounding research on social and mental health seem to view being connected in a social network as a positive health correlation (staying in touch, sharing interests, sharing information, etc. Further study should be conducted to determine the relationship of online social networking to mental and social health to determine the positive or negative health impacts. This study is useful in creating future social and mental health interventions that would target college aged students.

APPENDIX A

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APPENDIX B

Table 1

Predicting Intention to Log onto Facebook every day for the Next Three Months

Global construct	r	Beta	R
Attitude toward act	.50**	.32**	
Subjective norm	.54**	.41**	
Perceived behavioral control	.11	.08	
** p < 0.01			.62**

Table 2

Correlation of Attitude toward the Act and Intention with Behavioral Beliefs,

Evaluations, and the Behavioral Cross-products

Salient consequence	Cross-product		Behavioral belief		Evaluation	
	AA[a]	IN[b]	AA	IN	AA	IN
Will allow me to stay in touch	.41**	.61**	.38**	.61**	.21**	.26**
Will increase my network	.24**	.31**	.31**	.41**	.06	.07
Will allow me to share interests	.22**	.27**	.33**	.40**	.11	.11
Will allow unwanted views to see profile	.13*	.05	-.15	-.09	.06	.05
Will decrease my safety	.11	.04	.14*	.05	.11	.17*
Will Allow me to share information	.09	.09	.33**	.36**	.07	.05
Will decrease my privacy	.03	-.05	.14*	-.02	.11	.13*
Will allow me to flirt	.14*	.16*	.10	.10	.23**	.14**
Sum of behavioral cross-products	.34**	.36**				

* $p < 0.05$

** $p < 0.01$

[a] Attitude toward action   [b] Intention

Table 3

Correlation of Subjective Norm and Intention with Normative Beliefs, Motivation to

Comply, and the Normative Cross-products

Salient referent	Cross-product		Normative belief		Motivation to comply	
	SN[a]	IN[b]	SN	IN	SN	IN
Friends	.72**	.47**	.72**	.46**	.19**	.10
Other students	.63**	.36**	.65**	.40**	.26**	.17**
Boy/girlfriend Spouse	.57**	.39**	.62**	.38**	.03	-.08
Family	.53**	.38**	.55**	.40**	.09	.04
Professor	.48**	.31**	.52**	.32**	.04	-.01
Future Employer	.37**	.22**	.39**	.23**	.04	.01
Sum of normative cross-products	.71**	.45**				

** $p < 0.01$

[a] Subjective Norm. [b] Intention.

Table 4

Correlation of Perceived Behavioral Control and Intention with Control Beliefs,

Perceived Power, and the Control Cross-products

Salient circumstance	Cross-product		Control belief		Perceived power	
	PBC[a]	IN[b]	PBC	IN	PBC	IN
The ease of use	n/a	n/a	.20**	.30**	n/a	n/a
The accessibility of Facebook	.21**	.26**	.21*	.39**	.21**	.18**
My computer skills	.16**	.15*	-.14*	-.08	.23**	.24**
The level of privacy	.16**	.22**	.11	.29**	.21**	.33**
I don't have time	.11	.37**	.08	.48**	.11	.59**
Level of security	n/a	n/a	.11	.19*	n/a	n/a
Sum of Control Cross Products	.26**	.37**				

* p < 0.05

** p < 0.01

[a] Perceived Behavioral

Control. [b] Intention.

APPENDIX C

Survey Instrument

Psychosocial Determinants of Facebooking

Instructions: Please complete the following items to the best of your ability. You have the option to respond to all, some, or none of the following.

1. Age: _____   Gender: ☐ Male   ☐ Female

2. Race   ☐ Caucasian   ☐ African-American   ☐ Hispanic   ☐ Asian-American

 (✔only one)   ☐ Native American   ☐ Other_____

3. Level of education completed   ☐ Freshman   ☐ Sophomore   ☐ Junior   ☐

Senior

4**.** In a relationship?   ☐ Yes   ☐ No

5. How long have you used facebook?   _____ years total   _____ at IU

only

How often do you log into facebook?   _____ times per day

How many days per week do you log into facebook?   _____ days/week

Your involvement in facebook is: *(✔only one)*

☐ Minimal   ☐ Average   ☐ Above Average   ☐ Is a major part of my life

What other online communities do you use: *(✔all that apply)*

☐ MySpace   ☐ Live Journal   ☐ eharmony.com   ☐ Other_____

☐ Second Life   ☐ Sims   ☐ Match.com   ☐ None

What is facebook?

_____

The following questions ask you to respond on a 7 point scale. Please place an **X** on where you feel best describes your response to the statement listed below about using facebook daily for the next 3 months:	Extremely in Disagreement	Quite in Disagreement	Slightly in Disagreement	Neither	Slightly in Agreement	Quite in Agreement	Extremely in Agreement
I will log into facebook.com at least once a day for the next three months.							
Most people who are important to me think I should log into facebook.com at least once each day.							
My boyfriend/girlfriend/spouse thinks that I should log into facebook.com at least once each day.							
My family thinks that I should log into facebook.com at least once each day							
My professors/instructors think that I should log into facebook.com at least once each day.							
My future employer thinks that I should log into facebook.com at least once each day							
Other Indiana University students think that I should log into facebook.com at least once each day							
My friends think that I should log into facebook.com at least once each day							
I don't have the time in my schedule to log into facebook.com at least once each day.							
The accessibility of Facebook allows me to log into facebook.com at least once each day.							
The ease of using Facebook allows me to log into facebook.com at least once each day.							
The privacy of Facebook makes it easy to log into facebook.com at least once each day.							
My computer skills prevent me from logging into facebook.com at least once each day.							

The security features of Facebook prevent me from logging into facebook.com at least once each day.							

In the last 7 days, which days have you done the following? *(Check all that apply)*	7 days ago	6 days ago	5 days ago	4 days ago	3 days ago	2 days ago	yesterday
Logged Into Facebook							
Edited Your Facebook Profile							

The following questions ask you to respond on a 7 point scale. Please place an **X** on where you feel best describes your response to the statement listed below about logging into facebook.com at least once a day.	Extremely Unlikely	Quite Unlikely	Slightly Unlikely	Neither	Slightly Likely	Quite Likely	Extremely Likely
Logging into facebook.com at least once each day is							
Most people like me think I should log into facebook.com at least once each day.							
Logging into facebook.com at least once each day will make me **feel like I am staying in touch.**							
Logging into facebook.com at least once each day will **increase my network**							
Logging into facebook.com at least once each day will make me **allow me to flirt more.**							
Logging into facebook.com at least once each day will allow me to **share interests with others**.							
Logging into facebook.com at least once each day will allow me to **share information with others.**							
Logging into facebook.com at least once each day will **decrease my personal safety.**							

Logging into facebook.com at least once each day will **decrease my privacy**.							
Logging into facebook.com at least once each day will **allow unwanted viewers to see my profile**.							

The following questions ask you to respond on a 7 point scale. Please place an **X** on where you feel best describes your response to the statement listed below:	Extremely Bad	Quite Bad	Slightly Bad	Neither	Slightly Good	Quite Good	Extremely Good
Sharing Information is?							
Staying in touch is?							
Increasing my network is?							
Flirting online is?							
Sharing interests is?							
Personal safety is?							
Privacy is?							
Unwanted viewers looking at my profile is?							

The following questions ask you to respond on a 7 point scale. Please place an **X** on where you feel best describes your response to the statement logging into facebook.com at least once a day	Extremely Difficult	Quite Difficult	Slightly Difficult	Neither	Slightly Easier	Quite Easier	Extremely Easier
Having time in my schedule to log into facebook.com at least once each day is							
My level of computer skills makes logging into facebook.com at least once each day							
The accessibility of Facebook makes using the network at least once each day							

The level of privacy makes logging into facebook.com at least once each day						
The format/layout makes logging into facebook.com at least once each day						

The following questions will ask you respond on a seven point scale. Please place an X on where you feel best describes your response to the statement listed below:

Logging into facebook.com at least once a day is

Up to you_____:_____:_____:_____:_____:_____:_____Not up to you

Under your control_____:_____:_____:_____:_____:_____:_____Not under your control.

How confident are you that you can log into facebook.com at least once a day?

Not at all Confident_____:_____:_____:_____:_____:_____:_____Completely Confident

The following questions ask you respond on a 7 point scale. Please place an X on where you feel best describes your response to the statement listed below:

Logging into facebook.com at least once a day is:

Bad_____:_____:_____:_____:_____:_____:_____Good

   Extremely   Quite   Slightly   Neither   Slightly   Quite   Extremely

Unfavorable_____:_____:_____:_____:_____:_____:_____Favorable

   Extremely   Quite   Slightly   Neither   Slightly   Quite   Extremely

Sour_____:_____:_____:_____:_____:_____:_____ Sweet

   Extremely   Quite   Slightly   Neither   Slightly   Quite   Extremely

Passive _____:_____:_____:_____:_____:_____:_____Active

    Extremely   Quite   Slightly   Neither   Slightly   Quite   Extremely

Weak_____:_____:_____:_____:_____:_____:_____ Strong

    Extremely   Quite   Slightly   Neither   Slightly   Quite   Extremely

Below are five statements that you may agree or disagree with. Using the 1 - 7 scale below, indicate your agreement with each item by placing the appropriate number to the right. Please be open and honest in your responding: 7 - Strongly agree, 6 – Agree, 5 - Slightly agree, 4 - Neither agree nor disagree, 3 - Slightly disagree, 2 – Disagree, 1 - Strongly disagree	**RATING 1-7**
In most ways my life is close to my ideal.	
The conditions of my life are excellent.	
I am satisfied with my life.	
So far I have gotten the important things I want in life.	
If I could live my life over, I would change almost nothing.	

Please answer the following from
1 (strongly disagree) to 4 (strongly agree)

1. On the whole, I am satisfied with myself.

2. I take a positive attitude toward myself.

3. I can handle the "ups" and "downs" in life quite well.

4. In my relationships to others, I act self-confidently.

5. I think that nobody really understands me.

6. I have the impression that co-workers and employers treat me like an outsider.

7. I have the impression that behind my back employers and co-workers talk dismissively about me.

8.   I have the impression that many co-workers tend to avoid contact with me.

9.   I certainly fell useless at times.

10.   Oftentimes, I feel unhappy.

Please answer the following from

NEVER	RARELY	SOMETIMES	ALWAYS
1	2	3	4

1. How often do you feel that you are "in tune" with the people around you?

2. How often do you feel that you lack companionship?

3. How often do you feel that there is no one you can turn to?

4. How often do you feel alone?

5. How often do you feel part of a group of friends?

6. How often do you feel that you have a lot in common with the people around you?

7. How often do you feel that you are no longer close to anyone?

8. How often do you feel that your interests and ideas are not shared by those around you?

9. How often do you feel outgoing and friendly?

10. How often do you feel close to people?

11. How often do you feel left out?

12. How often do you feel that your relationships with others are not meaningful?

13. How often do you feel that no one really knows you well?

14. How often do you feel isolated from others?

15. How often do you feel you can find companionship when you want it?

16. How often do you feel that there are people who really understand you?

17. How often do you feel shy?

18. How often do you feel that people are around you but not with you?

19. How often do you feel that there are people you can talk to?

20. How often do you feel that there are people you can turn to?

The following questions ask you to respond on a 7 point scale. Please place an **X** on where you feel best describes your response to the statement listed below:	Not at all	Not Quite	Slightly Not	Neither	Slightly	Quite Much	Very Much
I am motivated to do what **my family** thinks I should do.							
I am motivated to do what **my spouse/boyfriend/girlfriend** other thinks I should do.							
I am motivated to do what **my professors/instructors** think I should do.							
I am motivated to do what **my future employer** thinks I should do.							
I am motivated to do what **other college students** think I should do.							
I am motivated to do what **my friends** think I should do.							

Please provide contact information for a follow up questionnaire. The follow up

questionnaire will take less than five minutes to complete. The purpose of the follow up

is to get feedback about your facebook in about 2 months. This will provide information

on what motivates individuals to use facebook.

Name_____

Email_____

Thank you for completing this survey.

APPENDIX D

Curriculum Vitae

Curriculum Vitae
Casey Mace, MPH

Current:
Accepted offer to work towards PhD in Medical Anthropology at the University of Auckland in Auckland, New Zealand Beginning January 2010

Spring Semester 2009:

Candidate of MPH upon completion of Masters Thesis
Completed MPH coursework and passed qualifying examination
Thesis "Predicting Intentional Use of Online Social Networks: An Application of the Theory of Planned Behavior"

Case Manager Coordinator for Monroe County Long Term Recovery Committee, United Way
Oversee and carry out case management for the committee, disaster recovery Spring Storms 2008

Fall Semester 2008:
Second year Masters in Public Health student, Research Track
Indiana University Department Applied Health Sciences

Graduate Assistant Lecturer HPER H350 CAM Complementary and Alternative Medicine
Indiana University Department Applied Health Sciences

Summer and Spring Semester 2008:

Intern at Hilltop Garden and Nature Center
Youth Gardening Camp Counselor Supervisor
Gardening Education Program Evaluation Planner and Executor of Program Assessment
Project Manager for Restructuring of Hilltop's position at IU and Community Outreach Coordinator

Assistant Instructor for HPER F347 Middle Childhood through Adolescent Development
Indiana University Department Applied Health Sciences

Volunteer Graduate Research Assistant to PhD Candidate Brandon Eggleston
"Psychosocial Determinants of Yoga" and "Psychosocial Determinants of Facebooking"
Indiana University Department Applied Health Sciences

Formal Education:

(2007-Present) Masters of Public Health Research Track Student, Indiana University-Bloomington Department Applied Health Sciences
(2003-2007) Bachelor of Arts, Integrative Health Awareness and Promotion, Indiana University- Bloomington College of Arts and Sciences, Individualized Major Program

Professional Experience:

(2008) Assistant Instructor for HPER F347 Middle Childhood through Adolescent Development
Indiana University Department Applied Health Sciences

(2007) Guest Lecturer for HPER H263 Personal Health taught by Brandon Eggleston on the topics of Massage Therapy and Herbal Supplements

(2006-2007) Guest Lecturer for HPER H350 CAM: Complimentary and Alternative Medicine taught by Dr. Alice Lindeman on the topics of Massage Therapy and Reiki: A Japanese Healing Method

(2006-2008) Clinic Supervisor for Massage School Associates of Integrative Health, Bloomington Indiana

Volunteer Work:

(2007-2008) Girls Inc. Bloomington, Indiana - Girls Basketball Coach Volunteer

(2007) Bloomington Department of Parks and Recreation- Community Outings Volunteer

(2006) Bloomington Hospitality House – Volunteer for Resident Activities Department

Curriculum Recently Taken:

2007-2008 Fall Semester First Year:

HPER C589 Models and Theories in Health Behavior
HPER C591 Public Health Statistics
HPER C501 Assessment and Planning in Public Health
HPER C505 Public Health Foundations & Leadership

2007-2008 Spring Semester First Year:

HPER C611 Epidemiology
HPER C510 Organization and Administration in Public Health Programs
HPER T590 Introduction to Research in HPER
HPER H594 Health Program Evaluation

Summer 2008

HPER C640 Research in Public Health
HPER C641 Reading in Public Health

2008-2009 Fall Semester Second Year:

HPER C512 Environmental Health Science
HPER C644 Field Experience in Public Health
REL R672 Religion, Ethics, and Medicine

2008-2009 Spring Semester Second Year:

ANTH 645 Seminar Medical Anthropology
HPER C650 MPH Culminating Experience
HPER H599 Thesis

Summer 2009

ANTH 200 Bio-anthropology
ANTH 303 Social and Cultural Anthropology