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Faith Maturity Effects on Sexual Decision-Making

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FAITH MATURITY EFFECTS ON SEXUAL DECISION-MAKING

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A thesis

Presented to

The School of Graduate Studies

Department of Higher Education and Student Development

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Upland, Indiana

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In Partial Fulfillment

of the Requirements for the Degree

Master of Arts in Higher Education and Student Development

_____

by

Isaac S. Bryan

May 2013

CERTIFICATE OF APPROVAL
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MASTER'S THESIS
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This is to certify that the Thesis of

Isaac S. Bryan

entitled

Faith Maturity Effects on Sexual Decision-Making

has been approved by the Examining Committee for the thesis requirement for the

Master of Arts degree
in Higher Education and Student Development

May 2013

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Abstract

Research has shown a strong connection between faith/religiosity/spirituality and sexuality – the more religious or spiritual a student is, the less sexually permissive he or she is. While this connection is confirmed in different studies, there are still nuances to be explored, such as the connection of sexual decision-making – the precursor to sexual behavior. This research looks to confirm that the factors impacting the decision to initiate or abstain from sex are also connected to faith maturity. Quantitative data was collected using the Faith Maturity Scale and Sexual Decision-Making scale from male undergraduate students living at a residential, private, Christian institution. Results showed a small, but significant correlation between the two scales, suggesting that faith maturity does account for a portion of the variation in sexual decision-making and self-efficacy regarding decision-making.

Acknowledgements

*"There, but for the **grace** of God go I" – John Bradford*

It is by the grace of God that I have been privileged to pursue this master's degree. To him be the glory and the praise, for He has supplied me with the strength and wisdom. I rejoice in my weaknesses for then I am reminded of the strength of my LORD.

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Chapter 1

Introduction

Sexual Behaviors and Attitudes Among College Students

Typical college life, displayed through the media, highlights scenes of raging

parties with unlimited alcohol and passionate, romantic relationships featuring risky

sexual behavior. However, the current millennial generation, comprised of high school

graduates from 2001 to the present, see themselves as more conservative than their

parents with regard to behavior, sexuality, and attitude (York, 2010). Yet, statistics prove

otherwise, specifically regarding sexuality. Earle et al. (2007) report that between 78 to

94 percent of college females and 83 to 86 percent of college males engage in premarital

sexual intercourse. These researchers further report that college females average 4.4 to

5.2 sexual partners and college males average 5.4 to 6.6 partners. Risky sexual behavior

is often defined as sexual activity with multiple partners or sexual intercourse without

contraceptives. The outcomes of these behaviors are sexually transmitted diseases and

unintended pregnancies, both of which are increasing on college campuses (Lynch,

Mowrey, Nesbitt, & O'Neill, 2004; Paul, McManus, & Hayes, 2000).

The *hook-up culture,* a culture embracing low commitment relationships with

varying levels of sexual activity, continues to gain popularity among undergraduate

students (Fielder & Carey, 2010). Bradshaw, Kahn, and Saville (2010) report a steady

prevalence of romantic relationships but with a simultaneous increase in hook-ups with both genders demonstrating twice the amount of hook-ups compared to first dates.

Unfortunately, misconceptions of peers' sexual activity are widespread. Research supports a trend in which students overestimate their peers' levels of sexual behavior (Scholly, Katz, Gascoigne, & Holck, 2005). For instance, students perceived that 72 percent of their peers had two to four sexual partners within a year, when in reality only 18 percent of their peers fit this assumption (Lynch et al., 2004). These misconceptions, in turn, influence students' sexual behavior (Scholly et al., 2005), even on evangelical college campuses. York (2010) found students on evangelical campuses who estimated few (0-10%) of their peers to be sexually active, did not engage in sexual intercourse themselves. Whereas the students with high estimates (80-100%) had high response rates (80-100%) of sexual intercourse, pornography use, and oral sex.

College students' own misconceptions may be negatively impacting them during a crucial developmental time. According Lefkowtiz, Gillen, and Shearer (2004), college has become a time when traditional students form a significant part of their sexual identity. Whether students identify themselves as heterosexual, homosexual, or bisexual, college students generally tend to exhibit a pattern of movement from confusion to acceptance to synthesis during their college years (Cass, 1979; D'Augelli, 1994a; Evans et al., 2010; Fassinger, 1996).

Sexuality on Evangelical Campuses

Sexual behaviors and attitudes on evangelical campuses are demonstrated much differently than those found on secular campuses. The majority of students on evangelical campuses strive for purity and chastity, and sex is seen as the ultimate wrongdoing

(Freitas, 2008). These same students claim, "dating is always risky, because sexual temptation is inevitable" (Freitas, p. 179). Because of these beliefs many researchers have found religiosity and spirituality to be positively correlated with conservative sexual behaviors and attitudes (Beckwith & Morrow 2005; Breslford, Luquis, & Murray-Swank, 2011; Burris, Smith, & Carlson, 2009; Earle et al., 2007; Lefkowitz et al., 2004; Murray-Swank et al., 2005). These conservative behaviors and attitudes, however, do not make these students exempt from wrestling with sexual issues. Women at evangelical institutions may face the unique pressure of feeling like they must find a spouse for life (Freitas, 2010). Male students at Christian universities are increasingly involved in compulsive and addictive sexual behavior, such as masturbation and use of pornography (Kwee, Dominguez, & Ferrell, 2007). The sexual addictions distressing some male students may stem from the uncertainty of sexuality's place in their lives.

Higher Education's Response to Student Sexuality

Generally, colleges and universities attempt to develop students' views on issues of sexuality, particularly sexual identity (Lynch et al., 2004; Scholly, Katz, Gascoigne, & Holck, 2005). Because the college years often involve increased risk-taking and testing limits, educators recognize the importance of sex education during this period (Oswalt, 2010). A focus on merely reducing risky sexual behavior and related outcomes may not be enough since statistics measuring these behaviors and attitudes continue to rise. Oswalt (2010) reasons that "much of the education and related research does not consider the important precursor – the decision to engage in a sexual behavior" (p. 217). Her research focuses on examining the sexual decision-making process, specifically what students are hoping to gain from sexual behaviors and why they are engaging in them.

She identifies this as the initial and most crucial step in framing an understanding of college students' sexuality.

Sexual Decision-Making and Spirituality

While the correlation between spirituality and sexuality has been studied frequently, to date, there have been few large research studies that have measured college students' Sexual Decision-Making (SDM) process (Christopher & Cate, 1984; Oswalt, 2010). Little is known about this process and its connection to spirituality. To further understand the role spirituality plays in sexuality, a relationship should be established between the SDM process and spirituality. Examining SDM will continue to help frame the cognitive process students use to initiate sexual behavior. It may also assist in identifying and expelling misconceptions students have regarding sexual issues.

Studying the relationship between SDM and spirituality can uncover whether or not the factors or reasons influencing a student's sexual decisions alter when spiritual maturity changes. On evangelical campuses, a study on sexuality is limited if it does not account for the spiritual development students are also experiencing (Holcomb & Nonneman, 2004). Students at these institutions wish to develop healthy understandings of sexuality and to experience congruence between their sexual activity and their faith (Kwee et al., 2007). The examination may be even more beneficial for males on these campuses due to the prevalence of sexual addictions and their discomfort reconciling sexual feeling with their beliefs (Kwee et al.). If educators and professionals possessed knowledge regarding male motivations for engaging in sexual behaviors as well as influences impacting their decisions, they would be better able to help males resolve the

confusion regarding their sexual feelings. In light of this discussion, the research questions guiding the present study were:

- What is the relationship between the sexual decision-making process and faith maturity in college males?

- What factors rank as most influential in the sexual decision-making process for college males at a faith-based institution?

- Do the factors involved in the sexual decision-making process alter as the school year progresses?

Chapter 2

Literature Review

College Student Sexuality

College is a time of significant sexual identity development for traditionally-aged

students (Lefkowtiz, Gillen, & Shearer, 2004). As aforementioned, students generally

tend to move from sexual confusion to acceptance to synthesis during their college years

(Cass, 1979; D'Augelli, 1994a; Fassinger, 1996; Worthington, 2002, as citied in Evans et

al., 2010). Presently, the college years are a time when students develop habits in sexual

behaviors, opinions of sexual attitudes, and determine factors for sexual decision-making.

In light of this, student sexuality is an increasing concern for higher education

administrators, student affairs professionals, and even health specialists (Lynch et al.,

2004; Scholly et al., 2005). Dialogue surrounding this topic focuses not just on behavior,

but also attitudes. Considering both areas allows an understanding of the connections

between physical actions, cognitive thought, and emotions.

Conversations about sexual behaviors and attitudes may be present everywhere

but usually not with educators. Even if education does exist, it does not always translate

into safer sex practices among students. Weis, Rabinowitz, and Ruckstuhl (1992) report

"that there may be little or no change in sexual behavior as a result of sex education

courses" (p. 44). Most of the reported changes because of sexual education are attitudinal

involving a higher tolerance of masturbation, homosexuality, gender, and contraception

(Feigenbaum Weinstein, & Rosen, 1995). Attitudes on abortion and premarital, oral, and casual sex, on the other hand, have been shown not to change as a result of a sex educational course (Feigenbaum et al., 1995; Weis et al., 1992). Debate over who is responsible for this dialogue remains unsettled. Especially in light of the fact that most students have already had their first sexual intercourse encounter prior to attending college.

   Sexual behavior. Currently, college student sexual behavior is marked by a rise of the "hook-up" culture (Paul, McManus, & Hayes, 2000; Rodberg, 1999). "In recent years, 'hooking up' appears to be as popular, if not more popular, than the traditional date" (Bradshaw, Kahn, & Saville, 2010, p. 661). These hook-ups have been defined as sexual encounters sometimes including sexual intercourse and usually occurring between strangers or casual acquaintances (Bradshaw et al.). The thrills behind these hook-ups are their anonymity and spontaneity. Hook-ups, however, usually tend to benefit males more than females, since females tend to desire psychological intimacy while males tend to desire physical intimacy (Bradshaw et al., 2010; Freitas, 2008; Townsend & Wasserman, 2011).

   Sexual attitudes. The sexual behavior of college students reflects their sexual attitudes. Many researchers have looked for ways to study students' sexual attitudes (Beckwith & Morrow, 2005; Brelsford, Luquis, & Murray-Swank, 2011; Lastoria, 2010; Townsend & Wasserman, 2011). These attitudes are usually measured by a participant's agreement or disagreement with particular statements regarding sexual behavior (e.g., pre-marital sex is wrong, or the only requirement for pre-marital sex is mutual consent) or issues regarding sexuality (e.g., "I think that increased sexual freedom undermines the

American family," or "Movies today are too sexually explicit"). When measuring sexual attitudes, many researchers have used the Sexual Attitudes Scale (SAS) developed by Hendrick, Hendrick, and Reich (2006) in 1987. The SAS divides sexual attitudes into four main components: permissiveness (one's acceptance of casual sex and desire for purely physical gratification), birth control (the level of responsibility associated with using birth control), communion (what sex communicates to the partner), and instrumentality (the purpose of sex).

Exploring students' sexual attitudes exposes the psychological and social reasoning for their sexual behavior. There are varying factors that impact students' sexual attitudes. Research supports the following as factors contributing to a student's beliefs and attitudes regarding sexuality: purpose of life (e.g., spirituality and religiosity) exposure to sexual content, and moral teaching (e.g., parents, peer pressure, and societal norms) (Beckwith & Morrow, 2005).

Sexual decision-making. Aside from sexual behavior and sexual attitudes, a few studies have looked at sexual decision-making. Sexual decision-making (SDM) is defined as "the process through which an individual either consciously or unconsciously decides whether to engage in a given sexual activity" (Oswalt, 2003, p. 4). Researchers believe that studying this process uncovers why and how students make sexual decisions – what they are hoping to get from sexual behavior, and what thought process, if any, they are applying. Oswalt wrote "research studies often examine preventive behaviors without considering an important precursor – the decision to engage in sexual activity. Little effort has been extended into understanding [this process]" (p. 3). According to Christopher and Cate (1984), "simply examining the incidence of [sexual activity]

provides an incomplete picture of what actually happens. Each act is a result of an ongoing interactional process that involves decision-making by both people" (p. 363). SDM is divided into varying components: concern for risk, circumstantial components, sense of future, social norms and pressure, relational concerns and developmental stage, and physical gratification (Oswalt, 2010). All of these components play a significant role in the overall decision-making process.

Concern for risk. An individual's concern for risk relates to the overall feeling of fear of the negative outcomes of risky sexual behavior. Concern for risk is the amount of fear weighed against the desired outcome of sexual activity. The fear is associated with unintended pregnancies or sexual-transmitted diseases (STDs). In a 1995 study, researchers found the fear of pregnancy to be a negative deterrent for sexual activity (Levinson, Jaccard, & Beamer). Leigh (1989) supported Levinson, Jaccard, and Beamer's work, and also adding the fear of contracting an STD or HIV as deterrents.

Circumstantial components. Each sexual situation involves unique elements which can influence SDM. These elements could include the use of alcohol (Murstein & Tuerkheimer, 1998) or preplanned interactions or special occasions (i.e., special dates or events) (Christopher & Cate, 1984). Circumstantial components also include the presence or absence of others.

Sense of future. One's sense of future refers to the priority or place sexual activity holds within his or her desired future. If students believe sexual behavior may interfere with their desired future, they may choose to abstain from it. Future educational goals have been cited by researchers as a reason students may abstain from sexual intercourse (Marchi & Guendelman, 1995; Paul, Fitzjohn, Herbison, & Dickson, 2000;

Young, Denny, & Spear, 1999). College students may be waiting for the "right time" to initiate or engage in certain sexual behaviors (Oswalt, 2003). Some students reason that waiting to engage in sexual intercourse provides a better opportunity to experience a life consisting of love, marriage, and children (Jackson & Livingston, 1996).

Social norms and pressure. The perception of peer sexuality is a significant influence in student sexual behavior (Lynch et al., 2004; Page, Hammermeister, & Scanlan, 2000; York, 2010). In light of the misperceived norms regarding student alcohol consumption, researchers sought to evaluate whether these were also present in sexual behavior. Lynch et al. (2004) reported that students tended to overestimate the sexual activity of their peers. The actual percentages accounting the number of times students had engaged in sexual behavior were far lower than what students perceived them to be among their peers. The same was true regarding the number of sexual partners a student had had in the past year. Page et al. (2000) reported that males are 11 times more likely to engage in sexual intercourse when they estimate 75 percent or more of their peers are sexually active. Males also report an obligation or pressure to participate in sex more than females (Christopher & Cate, 1984).

Relational concerns and developmental stage. In addition to the pressure and obligation to engage in sexual behavior felt by college students, relational concerns and developmental stage also play a significant role in SDM. Students may choose sexual activity to obtain relational benefits such as love or commitment. Relational concerns often look different between males and females. Generally, men tend to seek sexual pleasure, whereas, females are interested in love or committed relationships (Browning et al., 2000; Fenigstein & Preston, 2007; Oswalt, 2010).

Developmental stage refers to the maturity or longevity of a romantic relationship. As maturity and longevity increase in a relationship, more meaning or purpose is prescribed by an individual. College-age students tend to be exploratory in their sexuality, but as age increases these exploratory desires turn more toward forming intimate relationships (Mannino, 1999).

Physical gratification. Physical gratification as a factor in SDM refers to the arousal or desire for pleasure gained from sexual activity. According to Hill and Preston (1996), physical pleasure is the most critical factor in the SDM process, particularly for males. Oswalt's study of SDM found similar results as well. This gratification can be measured by one's own desire for sexual arousal, desire for partner's arousal, or the attractiveness of one's partner (Oswalt, 2003).

Examining these different components illustrates that the understanding of sexual behavior is incomplete (Christopher & Cate ,1984). Oswalt (2003) believes "a greater understanding of the sexual decision-making process could assist in the development of programs to prevent negative health consequences" (p. 3). From a student development standpoint, an understanding of the SDM process could assist in the sexual identity development of students as well as providing sexual education that is not merely focused on preventative measures.

College Student Spirituality, Religiosity, and Faith

Introduction. The college campus has become a place where students, faculty, and staff all bring a range of worldviews representing different spiritual and religious dimensions (Bryant, 2010). Yet the realm of higher education continues to emphasize test scores, credits, and degrees, neglecting the inner development of beliefs, emotional

maturity, moral development, and spirituality. Astin, Astin, and Lindholm (2011) believe spirituality to be "fundamental to students' lives" and view the big questions (Who am I? Do I have mission and purpose? What sort of world do I want to help create?) as preoccupying to students as "essentially spiritual questions" (p. 1).

In their study of how colleges can enhance the spiritual lives of students, Astin et al. (2011) reported 71% of incoming freshmen indicated that finding purpose was essential or very important in their reasoning to attend college. Additionally, 73% agreed their campus should encourage personal expressions of spirituality. Because of this, a gap exists between the spiritual, religious, and faith development that students are desiring and that which is being provided by higher education.

Spiritual, religious, and faith development. Prior to entering college, 80% of students reported attending a religious service the year prior to their freshmen year. More than three-quarters stated they believed in God and 69% reported praying (Astin et al., 2011). Research prior to 1990 indicated that development of students' religious identity declined during their college experiences. Many faith communities make the informal assumption that traditionally-aged college students will leave the faith community, returning either when they become parents or view themselves as adults (Parks, 1986). However, in recent research, Pascarella and Terenzini (2005) found that rather than being rejected, faith is refined, reinterpreted, and internalized in a personal manner during this period. In a longitudinal study with a large sample, Lee (2002a) found that nearly 40 percent of students reported an increase in their religious convictions during their college years (as citied in Pascarella & Terenzini, 2005).

Fowler (1996) defined such spiritual development as "meaning making," a process that is universal and generic, but a unique human capacity. His theory drew from several different influences including Piaget, Kant, and Erikson. Fowler's faith development occurs in seven stages (0. Undifferentiated; 1.Intuitive-projective; 2.Mythic-literal; 3. Synthetic-conventional; 4. Individual-reflective; 5.Conjunctive; 6.Universalizing). Individuals transition from one stage to another when changes occur in their understanding of faith. Additionally, the development of one's faith is characterized by "beliefs, values, and meanings that give coherence and direction to persons' lives" and "a sense of relatedness to a larger frame of reference" (Fowler, 1996, p. 56). Originally developed in 1981, Fowler's stages of faith development stand as one of the most viable theories regarding this development (Holcomb & Nonneman, 2004). The "model constitutes an interpretative framework from which to organize and understand the complex strands of spiritual development" (Holcomb & Nonneman, p. 97).

Both Astin et al. (2011) and Parks (2000) described this development as a journey or quest, suggesting that the development comes out of experiences. In her theory of spiritual development illustrated in Table 1, Parks used a model which encompassed and traced three discrete stands of development (form of cognition/knowing, form of community, and form of dependence) along the development of faith.

Table 1

Parks' Faith Development Model.

	Adolescent (Conventional)	*Young Adult*	*Adult*	*Mature Adult*
Form of Cognition	Authority-determined; Unqualified relavatism	Probing Commitment (Ideological)	Tested Commitment (Explicit)	Convictional commitment (Paradoxical)
Form of Dependence	Dependent/Counter-dependent	Fragile inner-dependent	Confident inner-dependent	Inter-dependent
Form of Community	"Those like us" Diffuse Conventional	Ideological compatible groupings (mentoring)	Self-selected class or group	Open to those genuinely "other"
Forms of Faith	Egypt God as parent	Wilderness the far country	Spirit within	Promised Land many members, one body

In her model, individuals develop from adolescent faith to mature adult faith in light of their development through cognition, community, and dependence. This development is particularly fostered through mentoring communities such as higher education, religious faith communities, family, and the workplace. Such communities help individuals in the search for meaning, purpose, and faith.

Spirituality defined. In order to understand the faith development experienced by college students, one needs to distinguish spirituality and religiosity, each consisting of separate factors and components. Astin et al., (2011) defined spirituality as an inner, subjective life that involves the affective experiences and defines values and beliefs to create meaning and purpose. They divided their measures into five different categories: spiritual quest, equanimity, ethic of caring, charitable involvement, ecumenical world. Beckwith and Morrow (2005) offer their definition as "pertaining to one's search (i.e., a process) in attempt to discover that which is sacred" (p. 359). With different variations of definitions, researchers have developed different methods of measuring spirituality.

Brelsford et al., (2011) assessed spirituality by intrapersonal focus on spirituality, feelings

of connections with God, as well as experiences described as divine. Other views placed

an emphasis on one's sense of fundamental unity and desire for a bond that is holistic and

interconnected (Burris, Smith, & Carlson, 2009).

     Religiosity defined. Definitions of religiosity tend to be more concrete, focusing

on objective measures such as religious affiliation, church attendance, and participation

in religious activities. Astin et al. (2011) defined religiosity through the following factors:

religious commitment, engagement, level conservatism, skepticism, and struggle. Some

researchers saw a significant correlation between spirituality and religiosity, describing

spirituality as a focus on the search or process in finding what is sacred and religiosity as

the means in the process (Beckwith & Morrow, 2005). On the other hand, Murray,

Ciarrocchi, and Murray-Swank (2007) described religiosity as being "associated with

higher levels of authoritarianism, religious orthodoxy, intrinsic religiousness, parental

religious attendance, self-righteousness, and church attendance" (p. 223). Ideally, there is

significant overlap between the two. However some religious communities or individuals

have separated themselves from the issues of spirituality and turned their focus more on

beliefs, rituals, and practices associated with a religious institution rather than the

spiritual search for meaning and purpose (Love, 2001). For the purpose of the present

study, spirituality, religiosity, and faith are used interchangeably due to the language used

within the sample.

     Spirituality at Christian institutions. Research on spirituality and religiosity is

quite broad on Christian campuses, with religiosity focusing on association with Christian

religious institutions and practices, and spirituality focusing on the process of knowing or

understanding God. While attempting to define spiritual growth, particularly in the Christian religion, Gallagher and Newton (2009) qualitatively researched four different denominations (Presbyterian, Conservative Baptist, Eastern Orthodox, and Emergent) to represent the diversity within Christianity. Their findings showed that spiritual growth is best cultivated when strong congregational commitments are present. While some commitments for spiritual growth differed between denominations, most of the participants responded that spiritual growth is mostly individual, is different for everyone, requires community, and is mainly focused on knowing God or becoming more like him. Gallagher and Newton also assessed the means by which this growth occurs. According to their findings, the process is somewhat ambiguous but requires "personal and emotional resources of the community [to] support a sense of personal growth and well-being" (p. 232).

On Christian campuses, many students defined spirituality by three specific measures: relationship with God, submission to God's will, and Christlikeness (Birkholz, 1997). Relationship with God entails the level of closeness experienced by an individual. This closeness is determined by time spent with God, reading God's word, meditating on His word, and the comfort level one feels in approaching God. Submission to God's will, on the other hand, is viewed as the degree to which one is "willing to relinquish his or her personal will, agenda, or plan and substitute their perception of God's will, agenda, or plan" (p. 27). The term Christlikeness refers to the level that one is living a life similar to that of Christ (i.e., obedience to God, humbleness, loving others).

Many students who desire to nurture their Christian faith while in college attend institutions within the Council for Christian Colleges and Universities (CCCU). The

council is comprised of more than one hundred affiliate institutions. The mission of the CCCU is "to advance the cause of Christ-centered higher education and to help [member] institutions transform lives by faithfully relating scholarship and service to biblical truth" ("About CCCU," n.d.). Additionally, membership within the organization requires a general education curriculum and majors in the humanities, social sciences, and natural sciences all with a faith-centered focus. Students who decide to attend CCCU institutions typically do so because they desire for their spirituality and faith to be developed (Holcomb & Nonneman, 2004).

Due to the student desires for growth as well as the commitment of these institutions to provide such support, member institutions must systematically assess their effectiveness in providing spiritual development. Holcomb and Nonneman (2004) applied Fowler's Faith Development Theory (1996) in their assessment of the spiritual development of college students using both cross-sectional and longitudinal research. Their study found that most college freshmen entered into CCCU institutions at either stage two (mythical-literal) or stage three (synthetic-conventional). Additionally, the majority of graduating seniors were functioning between stage three and stage four (individual-reflective) or above.

Using 600 qualitative interviews at Christian colleges, Holcomb and Nonneman (2004) discovered three main crises (being around people who think differently or having beliefs challenged, multicultural exposure, and a variety of emotional challenges) that emerged as factors impacting faith development. Crises offer themselves as profound opportunities for spiritual growth and development (Hall, 1986, as cited in Holcomb & Nonneman). "Therefore one goal of the Christian liberal arts institution should be to

discover how to create a suitable campus 'greenhouse' climate that provides the appropriate balance of support and challenge to individual students" (Holcomb & Nonneman, 2004, p. 102).

According to Ma (2003), Christian institutions have done their part in aiding spiritual development. In her study, "Christian College Experience and Student Spirituality," Ma discovered that nearly 70 percent of students reported that their Christian college experiences very significantly or significantly contributed to their spiritual progress. Birkholz (1997) adds that this development at Christian institutions is most heavily influenced by interactions with faculty and staff. "More often than not, when asked what about the college influenced their spiritual lives, seniors' first response was faculty and staff. Students named college personnel, professors, and staff members, both most frequently and usually first" (p. 35). Research supports the contention that faculty and staff play a significant role in students' spiritual and religious growth. One example would be Parks's (2000) mentoring communities. According to Astin et al. (2011), "Students whose professors encourage them to explore questions of meaning and purpose are inclined to show larger-than-average increases in their inclinations toward spiritual questing between their freshmen and junior years" (p. 37).

Spiritual/religious/faith maturity. To gain a broader perspective of Christian spiritual and religious development, Atler (1989) studied religious maturity based upon a Christian's "experience of an ongoing relationship with God" (p. 153). This relationship is categorized as a Christian's personal, inner experience in which divinely initiated interactions affect their values and attitudes. Using her phenomenological theory, Atler constructed a three stage (Beginning, Intermediate, and Advanced) model describing the

process of Christian religious development. In this model, development occurs through

the facilitation of an individual's interaction with God. Using this model, Alter developed

the Christian Experience Inventory (CEI) to explore whether Christian maturity can be

quantified. The inventory includes five different sub-scales: growth in faith, trust in God,

cost of faith, concern for others, and justification by faith. According to Atler's (1989)

research, higher scores on the CEI do correlate with higher levels of Christian maturity.

Benson, Donahue, and Erickson (1993) conducted similar research, however their

scale measured an individual's development of faith through eight core dimensions listed

below:

1. Trusts in God's saving grace and believes firmly in the humanity and
   divinity of Jesus;

2. Experiences a sense of personal well-being, security, and peace;

3. Integrates faith and life, seeing work, family, social relationships, and
   political choices as a part of one's religious life;

4. Seeks spiritual growth through study, reflection, prayer, and discussion
   with others;

5. Seeks to be a part of a community of believers in which people give
   witness to their faith and support and nourish one another;

6. Holds life-affirming values, including commitment to racial and gender
   equality, affirmation of cultural and religious diversity, and a personal
   sense of responsibility toward the welfare of others;

7. Advocates social and global change to bring about greater social justice;
   and

8. Serves humanity consistently and passionately through acts of love and justice (p. 6)

These dimensions evaluate faith maturity and minimize economic, educational, ethnic/racial, and denominational effects. Through the eight core dimensions, the researchers developed the Faith Maturity Scale (FMS) using a total of 38 items to measure a participant's overall as well as vertical (person to God) and horizontal (person to person) religiosity.

Student Sexuality and Spirituality

In light of the importance of both student sexuality and spirituality, many researchers have sought a connection between the two. Research shows that individuals are heavily engaged in identity exploration between the ages of 18 to 25, the traditional college student age range (Arnett, 2000). During this identity growth, faith and sexuality may be the most impressionable areas of development for individuals (Arnett 1992, as cited in Lefkowitz et al., 2004; CDC, 2000). Although much of the research in this area has focused primarily on the connection between sexuality and religiosity, rather than spirituality, they indicate a negative relationship between premarital sexual activity and religiosity (Beckwith & Morrow 2005; Breslford et al., 2011; Burris, Smith, & Carlson, 2009; Earle et al., 2007; Lefkowitz et al., 2004; Murray-Swank et al., 2005). In other words, as religious maturity increases, sexual behavior as well as sexual attitudes become more conservative. The students who report themselves as religiously mature, are less likely to engage in risky sexual behavior.

While the correlation between sexuality and religiosity has proved to be fairly strong in multiple studies, both areas of development are complex to understand as well

as to measure. Both require self-reported data and request personal information that individuals may not want to disclose to researchers. Additionally, research on religiosity typically examines church attendance, religious affiliation, and level of importance placed on religion. Murray et al. (2007) wrote, "These indices do not tap the broader dimensions of what traditionally constitutes spirituality and transcendence, especially in relation to sexual attitudes, sexual beliefs, and sexual practices" (p. 224). For this reason, studies have focused predominantly on the relationship between spirituality and sexuality.

In her book, *Sex and the Soul: Juggling Sexuality, Spirituality, Romance, and Religion on America's College Campus*, Freitas (2008) explored how college students reconcile their spiritual longings and sexual desires. In her qualitative research, Freitas not only discovered the domination of the hook-up culture on college campuses but also the lack of connection that students make between sex and religion. Even at traditional Catholic schools, students were practicing the same behavior and attitudes as students at public institutions. The majority of students at both Catholic schools and public schools considered themselves to be "spiritual, but not religious." Many of the students even admitted their lack of comfort with casual sex and desire for religious conversations. However, it was only at evangelical institutions that Freitas found religion to be an important factor in students' decisions whether or not to engage in sex.

Is Freitas's research accurate? Do students' sexual behaviors and attitudes at evangelical schools differ from those found on secular campuses? Lastoria (2010) collected data from 19 institutions within the Association for Christians in Student Development. His findings revealed that only 21.5 percent of students at these intuitions

reported having sexual intercourse. This number falls far below the national average that reports 78 to 94 percent of college women and 83 to 86 percent of college men engage in premarital sexual intercourse (Earle et al., 2007). Attitudes regarding permissiveness were also \ more conservative at evangelical colleges. Student responses indicated that 85.1 percent believed sexual intercourse should not occur before marriage. Furthermore, if students were sexually permissive, their responses noted that sexual behavior should require emotional commitment or love (Lastoria).

In a 2002 study, Bassett et al. asked students at Christian colleges abstained from premarital sexual intercourse. Students rated faith and values to hold the most weight in their reasons for abstaining from sex. Individual factors with the highest weight were "given God's perspective on sex/marriage and it is best for us to wait."

However, as found on secular campuses, male sexuality also tends to differ from female sexuality on the Christian campus. In Lastoria's (2010) research, male student sexual behavior, attitudes, and permissiveness, while still more conservative than their counterparts at secular institutions, were higher than females'. It is not uncommon for these male students to struggle with addictive sexual behavior. Nearly 60 percent of male students at evangelical institutions who meet with counselors were doing so because of issues with sexual addiction, particularly masturbation and pornography (Kwee, Dominquez, & Ferrell, 2007). Additionally, Kwee et al. wrote, "[evangelical male students] are unsure about the place of sexuality in their lives and experience tension and discomfort with their sexual feelings because of their value system and religious beliefs" (p. 3).

While research exists to explain why students at evangelical institutions abstain from sexual intercourse, there still remains a need to understand what motivates those who do initiate or engage in sexual activity. In Lastoria's (2010) findings, 53.1 percent of males reported breast fondling, 43.3 percent fondling of genitals, 31.3 percent experience oral sex, and 19.6 percent have sexual intercourse. These students may be receiving the spiritual development they are seeking at these institutions, but in light of these statistics, it would seem that they may not be receiving direction in understanding the place of sexuality in their lives. Examining the Sexual Decision-Making (SDM) process may provide a proper framework for further understanding student sexuality, particularly among males. "Understanding why and how individuals make sexual decisions – what they are hoping to get from sex and what thought process, if any, they apply – is an initial crucial step" (Oswalt, 2010, p. 217) in directing students toward a deeper understanding of sexuality.

Summary. It is not just the health specialists today that are concerned about the issues regarding student sexuality. Higher education administrators and student affairs professionals recognize this concern as well as the significant part of the students' sexual identity that is formed while at college. With estimates of premarital sexual intercourse as high as 94 percent for college females and 86 percent for college males, their concern is justified. However, the response to these concerns may not be enough, particularly with the sexual education that is provided, since there is little to no change in sexual behavior as a result of sex education courses (Weis et al., 1992). Oswalt (2010) attempted to focus on the potential roots of the matter – Sexual Decision-Making (SDM). Understanding the "process through which an individual either consciously or unconsciously decides

whether to engage in a given sexual activity" (Oswalt, 2003, p. 4) may lead to more effective sexual education and programming in higher education.

Like sexuality, religiosity, spirituality, and faith remain areas of development in which most students progress during college. More than two-thirds of incoming students acknowledge their desire to find purpose and meaning as an important reason in attending college (Astin et al., 2011). Almost three-quarters of students desire their campus to encourage personal expressions of spirituality. Theorists Fowler (1996), Parks (2000), and Astin et al. (2011) all recognize that strong faith development in traditionally-aged students. Student development professionals must have a deep understanding of this development because most students recognize faculty and staff as significant influences in their faith development (Astin et al., 2011; Birkholz, 1997; Parks 2000).

Chapter 3

Methodology

Procedures

The researcher of the present study partnered with the Residence Life department

at a small, evangelical, liberal arts institution in the Midwest to collect data during the

department's annual distribution of the Residence Life Satisfaction Survey. The

satisfaction survey was administered online in late November, the week prior to students

leaving for Thanksgiving break. Each floor/wing of males was required to have a meeting

at which time the satisfaction survey was administered. In the meeting, the Residence

Assistant read the consent form of the Faith Maturity and Sexual Decision-Making

Survey. Students were emailed a link to the online survey to take during their floor/wing

meeting or at their own convenience. The survey remained open for two weeks. Each

survey measured both sexual decision-making (59-item questionnaire) and spiritual

maturity (38-item questionnaire). Neither names nor identification numbers of

participants were recorded to ensure both confidentiality and anonymity.

Participants

The study was emailed to 689 students. All participants live in on-campus

housing at the residential college. The sample included males, 18 and older who live in

all-male or co-education residence halls. Of the 689 students, 253 complete the survey—a

response rate of 36.7 percent. Academic status was the only demographic collected for

the study. The distribution of this demographic is reported in the results section. All respondents were required to agree to the consent form on the first page of the survey before answering any items.

Measures

The Sexual Decision-Making (SDM) scale (Oswalt, 2004) was developed to measure the motivations behind students' decisions to initiate and engage in sexual activity. The SDM evaluated what individuals are anticipating to receive from their involvement in sexual behavior. The scale evaluates eleven factors, however only eight of the factors were chosen for this study: (1) concern for risk, (2) sense of future, (3) social norms and pressure, (4) relational concerns, (5) developmental stage, (6) physical gratification, (7) self-efficacy regarding communication, (8) self-efficacy regarding decision-making. The participants were asked to respond using a 5-point Likert scale, 1 indicating a strong disagreement and 5 indicating strong agreement. Higher scores indicate a lower level of sexual permissiveness and higher likeliness not to engage in risky sexual behavior.

The instrumentation was selected for its strong reliability and ability to measure SDM over several different factors. Additionally, the SDM is the most recent instrument designed to assess SDM. Cronbach's *alphas* range from .76 (developmental stage) to .94 (physical gratification). The reliability for each sub-scale and the total scale for this study are listed in Appendix B. The content validity was subsequently reviewed by three other sexual decisions researchers (Owsalt, 2004).

In addition to the SDM scale, the Faith Maturity Scale (FMS) (Benson, Donahue, & Erickson, 1993) was used to measure students' perceptions of their ongoing

relationship with God. The FMS measures one's Christian faith maturity through eight

different core dimensions: (1) trusts and believes, (2) experiences the fruits of faith, (3)

integrates faith and life, (4) seeks spiritual growth, (5) experiences and nurtures faith in

community, (6) holds life-affirming values, (7) advocates social change, and (8) acts and

serves. The development of the scale intended to capture three distinct religious stages:

vertical (love of God), horizontal (love of others) and integrated (love of both God and

others). Sub-scales one, two, and four measure for vertical religiousness, while six, seven,

and eight account for horizontal religiousness. The reliability of the scale proves to be

strong with Cronbach's *alphas* across various diversities including age (.84-.90), gender

(.84-.90), and denomination (.87-.89). The reliability scores of this measure are found in

Appendix B. Face validity was affirmed by the analyses of three expert panels (seminary

scholars, denominational experts, and clergy) (Benson et al.).

Items within the scale are scored on a 7-point Likert scale with 1 point being

never true to 7 points being *always true.* The 38 items are divided into the eight sub-

scales with five questions using reverse scoring. Higher scores report a higher level of

faith maturity—an integration of both vertical and horizontal religiousness.

The instruments demonstrate strong reliability and validity. The SDM instrument

assessed the participants' motivations for sexual activity over various factors. Results will

report which factors are more important than others when deciding to initiate sexual

activity. In addition, the sub-scales self-efficacy regarding decision-making and provide

insight to the participants' confidence in making healthy, consistent sexual decisions and

their perceived ability to communicate the decisions with a partner. Bivariate correlations

for the two scales were performed to analyze the overall connected between faith

maturity and SDM.

Chapter 4

Results

Univariate Analysis

Frequencies. The only demographic information reported in the study was the

education level of participants, as reported in Table 2. The study had a response rate of

36.7 percent from the 689 individuals who were invited to participate. The 253 completed

responses included 80 (31.6%) freshmen, 72 (28.5%) sophomores, 58 (22.9%) juniors,

and 43 (17.0%) seniors. Of the 689 participants, 546 (79.2%) live in all-male residence

halls, while 143 (20.8%) live in co-educational halls.

Table 2

Education Level Frequency Distribution.

Variable	Freq.	%	Cum. %
Education Level			
Freshmen	80	31.6	31.6
Sophomore	72	28.5	60.1
Junior	58	22.9	83.0
Senior	43	17.0	100.0
Total	253	100.0	
Missing	0	0.0	

Descriptive statistics. There are eight sub-scales for each scale within the study.

Table 3 reports the means and standard deviations of these sub-scales. The eight Sexual

Decision-Making (SDM) sub-scales means are determined by sets of questions in which

participants responded from 1 to 5, with 1 signifying Strongly Disagree and 5 indicating

Strongly Agree. The Total Sexual Decision-Making scale is the summation of these sub-

scales. The totals for sexual decision-making ranged from 170.0 to 284.0 out of a

possible 290.0.

The mean scores of the Faith Maturity sub-scales were determined by sets of four

to six questions. These sub-scales utilized a 7-point Likert scale, with 1 being Never True

and 7 being Always True. The TOTAL Faith Maturity Scale (FMS) is the summation of

all sub-scales ranging from 89.0 to 222.0 out of a possible 231.0.

Table 3

Descriptive Statistics for SDM & FMS Sub-Scales.

Variable	Min.	Max.	Mean	σ
Sexual Decision-Making Scales				
Concern for Risk	4.00	20.00	16.07	3.89
Sense of Future	7.00	30.00	26.64	3.37
Social Norms and Pressure	10.0	50.0	38.46	8.20
Relational Concerns	8.0	40.0	30.57	8.46
Developmental Stages	9.0	45.0	37.37	5.51
Physical Gratification	9.0	45.0	24.31	8.99
Self-Efficacy Regarding Communication	6.0	30.0	22.88	4.76
Self-Efficacy Regarding Decision-Making	6.0	30.0	22.61	4.86
TOTAL Sexual Decision-Making	170.0	284.0	218.91	20.62
Faith Maturity Scales				
Trusts and Believes	4.00	28.00	22.25	3.84
Experiences Fruits of Faith	9.00	34.00	22.87	4.68
Integrates Faith and Life	11.61	35.00	26.38	4.01
Seeks Spiritual Growth	8.00	28.00	20.35	3.90
SssQQ1 Experiences and Nurtures Faith in Community	8.00	28.00	20.42	4.17
Holds Life-Affirming Values	5.00	21.00	13.10	3.33
Advocates Social Change	3.00	21.00	12.87	3.20
Acts and Serves	7.00	35.00	19.16	4.57
TOTAL Faith Maturity Scale	89.00	222.00	157.42	20.93

Note. $n = 253$

Bivariate Analysis

One way ANOVA. A one way analysis of variance was conducted to determine if a difference between means existed for the Sexual Decision-Making Scale and the Faith Maturity Scale on academic level. In other words, does a participant's academic level have an impact on either their faith maturity or sexual permissiveness? Table 4 reports this summary. Neither SDM nor FMS showed a difference in mean when comparing academic level. In other words, academic level did not factor into participants' faith maturity or sexual decision-making.

Table 4

ANOVA Summary of FMS and SDM on Academic Level

Scale		df	Mean Square	F	Sig.
Sexual Decision-Making Scale	Between Groups	3	313.116	.736	.531
	Within Groups	249	425.498		
	Total	252			
Faith Maturity Scale	Between Groups	3	584.510	1.340	.262
	Within Groups	249	436.346		
	Total	252			

Correlations. Bivariate correlations were conducted to determine which factor (Concern for Risk, Sense of Future, Social Norms and Pressure, Relational Concerns, Developmental Stage, or Physical Gratification) was the most significant in the sexual decision-making process. The correlations between each sub-scale as well as the total Sexual Decision-Making scale are presented in Table 5. It is important to remember higher scores on the sub-scales and overall scale measure a conservative approach to sexual decision-making.

The sub-scale reporting the strongest correlation to the overall scale was Social Norms and Pressures ($r = .551$). This indicates participants who were least likely to give in to social norms and pressures of sexual activity were the most likely to score higher on the SDM. Relational concerns ($r = .289$) ranked as the least influential factor in the sexual decision-making process. It was hypothesized Physical Gratification would hold the strongest correlation, however, its strength ($r = .370$) was not as great as Social Norms and Pressures. In addition, participants who rated themselves with higher self-efficacy regarding decision-making ($r = .585$) and higher self-efficacy in communication ($r = .437$) were more likely to score higher on the SDM.

The strong, negative correlation ($r = -.483$) between physical gratification and relational concerns should also be noted. This indicates that as the participant and his partner's affection and desire increase for each other, physical arousal played a more significant role in his sexual decision-making. Likewise, the greater importance placed on romantic relationships (Developmental Stage) also increased the importance of physical gratification in sexual decision-making.

Correlations were also calculated between Faith Maturity sub-scales and Sexual Decision-Making sub-scales. As hypothesized, there was a correlation between the overall scales. While the correlation was positive and significant at the $p<.001$ level, the strength ($r = .234$) was not as strong as expected. Self-Efficacy Regarding Decision-Making also significantly correlated with the FMS ($p<.001$, $r = .267$), however, Self-Efficacy Regarding Communication did not correlate ($r = .098$) with FMS. Additionally, the only SDM sub-scale that held a significant correlation with the overall FMS was Sense of Future ($p<.001$, $r = .212$).

Table 5

Sexual Decision-Making Sub-Scale Correlations.

Sexual Decision-Making Sub-scales	1	2	3	4	5	6	7	8	Total SDM Scale
1. Concern for Risk	--								
2. Sense of Future	.336**	--							
3. Social Norms and Pressure	-.130*	.174**	--						
4. Relational Concerns	.192**	.132*	-.301**	--					
5. Developmental Stage	.120	.197**	-.053	.344**	--				
6. Physical Gratification	-.056	.069	.463**	-.483**	-.284**	--			
7. Self-Efficacy Regarding Communication	.031	.104	.034	.306**	.515**	-.254**	--		
8. Self-Efficacy Regarding Decision-Making	.110	.172**	.328**	-.049	.080	.350**	.069	--	
Total SDM Scale	.312**	.497**	.551**	.289**	.456**	.370**	.437**	.585**	--

Note. n = 253
   **. Correlation is significant at the 0.01 level (2-tailed)
   *. Correlation is significant at the 0.05 level (2-tailed)

Multivariate Analysis

Linear regression. Linear regressions were conducted to analyze the

independent variables' (Trusts and Believes, Experiences the Fruits of Faith, Integrates

Faith and Life, Seeks Spiritual Growth, Experiences and Nurtures Faith in Community,

Holds Life-Affirming Values, Advocates Social Change, and Acts and Serves) prediction

on Sexual Decision-Making, Self-Efficacy Regarding Communication, and Self-Efficacy

Regarding Decision-Making. The summary of these regression models are found in

Table 6. Additionally, the unstandardized and standardized coefficients between each predictor and the dependent variable are presented in Table 6.

The Faith Maturity sub-scales do predict variation in the Total Sexual Decision-Making (R^2=.112, R^2_{adj}=.083, F= 3.847, p<.001). While the model is very significant, the sub-scales only predict 11.2 percent of the variance. Therefore, there is an effect on sexual decision-making, but its effect is limited. The same can be said for Self-Efficacy Decision-Making (R^2=.121, R^2_{adj}=.092, F= 4.193, p<.001). The model is significant and predicts 12.1 percent of the variance; thus a participant's self-efficacy on sexual decision-making as well as his overall sexual decision-making are partially predicted by his faith.

The variance found on Self-Efficacy Regarding Communication was very minimal (R^2=.035). With low variance and no significance at the p<.01 level, there is little to no effect on communication. In other words, while Faith Maturity may predict his overall sexual decision-making and his confidence in his ability to make consistent, healthy sexual decisions, it does not predict his ability to communicate expectations and sexual-related issues with his partner. However, this may be a result of participants not having a partner with whom to communicate.

Table 6

Linear Regression Summaries on Faith Maturity Sub-Scales

Variable	R	F	*Sig.*
TOTAL Sexual Decision-Making	.335	3.847	.000
Self-Efficacy Regarding Communication	.118	1.117	.352
Self-Efficacy Regarding Decision-Making	.348	4.193	.000

The standardized and unstandardized coefficients in Table 7 report the amount of change in the dependent variable caused by the independent variable. In the TOTAL

Sexual Decision-Making model, only Experiences the Fruits of Faith (B=.725, β=.165, t=2.379) reports significance at the p<.05 level. Therefore, of all the sub-scales within Faith Maturity, Experiences the Fruits of Faith has the strongest effect on predicting TOTAL Sexual Decision-Making. The participant who experiences "fruit," which is defined as freedom, meaning and purpose, and self-acceptance and security, is likely to have a less permissive approach to sexual decision-making. This may be the most significant set of results since the regression is included.

Likewise, the regression model for Self-Efficacy Regarding Decision-Making also reports significance for the sub-scale Experiences the Fruits of Faith. The significance and beta weight, however, are much stronger within this model (B=.237, β=.228, t=3.0308, p<.001). This is the most significant p value and highest beta weight within the regression models. In addition to Experiences the Fruits of Faith, Holds Life Affirming Values was also significant (B=.281, β=.193, t=2.442, p<.05). Those holding values of racial and gender equality, religious diversity, and a sense of responsibility for the welfare of other are less likely to be sexually permissive in terms of sexual decision-making. The regression model considering Self-Efficacy Regarding Communication did not hold overall significance. Therefore, no sub-scales were found to be significant in changing the dependent variable.

Table 7

Coefficient Table for Linear Regressions Run on FMS Sub-Scales

Variable	B	Std. Error	β	Sig.
TOTAL Sexual Decision-Making				
(Constant)	169.883	10.827		.000
Trusts and Believes	.588	.456	.110	.199
Experiences the Fruits of Faith	.725	.305	.165	.018
Integrates Faith and Life	.748	.549	.146	.174
Seeks Spiritual Growth	.107	.510	.020	.834
Experiences and Nurtures Faith in Community	-.010	.552	-.002	.985
Holds Life Affirming	.754	.491	.122	.126
Advocates Social Change	.385	.533	.060	.471
Acts and Serves	-.896	.431	-.199	.039
Self-Efficacy Regarding Communication				
(Constant)	19.104	2.608		.000
Trusts and Believes	.045	.110	.037	.679
Experiences the Fruits of Faith	.091	.073	.089	.217
Integrates Faith and Life	-.043	.132	-.036	.744
Seeks Spiritual Growth	.036	.123	.030	.767
Experiences and Nurtures Faith in Community	.109	.133	.095	.415
Holds Life Affirming	.124	.118	.087	.294
Advocates Social Change	-.111	.128	-.075	.388
Acts and Serves	-.069	.104	-.067	.505
Self-Efficacy Regarding Decision-Making				
(Constant)	9.535	2.543		.000
Trusts and Believes	.195	.107	.154	.070
Experiences the Fruits of Faith	.237	.072	.228	.001
Integrates Faith and Life	.049	.129	.040	.704
Seeks Spiritual Growth	-.088	.120	-.070	.465
Experiences and Nurtures Faith in Community	.003	.130	.002	.983
Holds Life Affirming	.281	.115	.193	.015
Advocates Social Change	.095	.125	.063	.448
Acts and Serves	-.060	.101	-.056	.556

Summary

The first research question—What is the relationship between the sexual decision-making process and faith maturity in college males?—was answered through determining the correlation of the SDM scale and the FMS. As hypothesized, there was a positive relationship between the two scales. As a participant's faith maturity increases, his sexual decision-making process becomes more conservative. The second research question—What factors rank as most influential in sexual decision-making for college males at a faith-based institution?—was answered by examining the correlations of each factor with the overall SDM scale. While it was hypothesized Physical Gratification would be the most influential factor, as was found in the pilot study, Social Norms and Pressure proved to be the most influential. The final research question—Do the factors involved in the sexual decision-making process alter as academic level progresses?—required the use of a one way analysis of variance. The analysis revealed no difference between the scores on the SDM as academic level changed. In addition, there was no difference in the FMS scores.

Chapter 5

Discussion

Faith Maturity and Sexual Decision-Making

The purpose of the present study was first to examine the relationship, if any, between faith maturity and sexual decision-making. Prior research confirms an existing relationship between spirituality and less permissive sexual behavior (Beckwith & Morrow 2005; Breslford et al., 2011; Burris et al., 2009; Earle et al., 2007; Lefkowitz et al., 2004; Murray-Swank et al., 2005), but no connection has been established regarding the precursor of sexual activity—sexual decision-making. This precursor, as measured by this study, determined Concern for Risk, Sense of Future, Social Norms and Pressures, Developmental Stage, and Physical Gratification as factors for initiating or abstaining from sexual behavior. Spirituality was measured using the Faith Maturity Scale, a measure that explores how much or how little a participant's faith is integrated into life, relationships, values, and behavior.

It was hypothesized that there would be a strong relationship between the two scales. Surprisingly, the study only found a moderately positive relationship. In addition, when examining regression models, only a small portion of variance was caused by faith maturity on sexual decision-making. Only one of the sub-scales significantly impacted the participant's Sexual Decision-Making total score. Since several other studies have established a connection, the researcher assumed a stronger relationship between the two

scales, however, the strength (*r*=.234) was on the lower end of significance. While this correlation is slight, it confirms the existing relationship between spirituality and sexuality found in other studies. (Beckwith & Morrow 2005; Breslford et al., 2011; Burris et al., 2009; Earle et al., 2007; Lefkowitz et al., 2004; Murray-Swank et al., 2005)

Sexual Decision-Making

  Factors. Though all six Sexual Decision-Making factors were significantly and strongly correlated with the overall scale, Social Norms and Pressure was the most significant. Thus, the cultural climate plays a significant role in a male's decision to initiate or abstain from sexual activity. This is not surprising since all participants live on a Christian, residential college campus. In light of this strong correlation, there is reason to believe that college climates where healthy and conservative sexual behaviors are promoted may see less permissive sexual decision-making. Relational Concerns ranked as the least influential factor in sexual decision-making. For males, the affection felt for or from their partner was less likely to affect their decision-making than social pressures felt from their peers. The negative correlation between Relational Concern and Physical Gratification also reveals the lack of importance placed on affection felt for or from the participants' partners.

  Self-efficacy regarding decision-making. To clarify, this sub-scale measures the participants' perceived ability to make healthy and value-consistent sexual decisions. As hypothesized, males with a higher level of self-efficacy make less permissive sexual decisions and demonstrate stronger faith maturity. One would assume this to be the case for individuals reporting a high level of confidence in their ability to initiate or abstain from sexual activity. This sub-scale also revealed the highest variance with the Faith

Maturity Sub-scales, confirming its correlation to an individual's faith and spirituality.

Thus, it can be inferred that male students who report a higher level of faith maturity are

more likely to make sexual decisions consistent with values associated with their faith. In

addition, the sub-scale Experiences the Fruits of Faith held the greatest beta weight of all

FMS sub-scales. This affirms the importance of male students experiencing purpose,

freedom, and self-acceptance, since many students at faith-based institutions experience

tension between sexuality and religious beliefs (Kwee et al., 2007).

Self-efficacy regarding communication. Unlike Self-Efficacy Regarding

Decision-Making, this sub-scale was not correlated with Faith Maturity nor did it share

any variance with any FMS sub-scales. Thus according to these findings, an individual's

faith maturity does not affect his ability to communicate expectations or past history of

sexual behavior. This lack of correlation may be due to the lack of partners with whom to

communicate these issues. More research in this area is needed to understand the

correlation between SDM communication and faith maturity. Investigating the nuances of

the correlations between the two might impact the 33 percent divorce rate among married

Christians ("New Marriage and Divorce Statistics Released," 2008).

Faith Maturity Scale

Similarly to Sexual Decision-Making, all the Faith Maturity Sub-scales were

significantly correlated with the overall scale. The strongest of the sub-scales, Integrates

Faith and Life, reveals the more students see work, family, and social relationships as

part of their religious life, the more mature they are in their faith. Furthermore, this sub-

scale also held the strongest correlation with the SDM scale. Thus, the importance of

connecting students' faith with matters such as work, family, and other life circumstances should be noted.

Limitations

      Sample population and survey administration. The sample population (N=253) limited the study first by its size. A larger sample might have produced stronger correlations between the SDM and FMS. In addition, the sample was taken from a population of students attending a Christian liberal arts university located in the Midwest. There is good reason to suspect that students from this population present a distribution issue when measuring both sexuality and spirituality. It is reasonable to believe the students from this population, who chose to study at a Christian campus, will likely have similar perspectives and attitudes regarding these two issues. Since data was collected only in the residence halls, the academic year distribution was skewed with an underrepresentation of upperclassmen. Additionally, the data was collected during residence hall meetings led by student leaders. It is unknown how the surveys were introduced and portrayed to the participants. The surveys were also completed in the residence halls' common areas, raising concern that some students may have felt a pressure to respond in a certain way.

      Faith Maturity Scale. A potential ceiling effect may have occurred, particularly with the Faith Maturity Scale. As with many spirituality scales, participants are limited to a defined level of spirituality, and it becomes difficult to distinguish higher levels and scores. This is particularly noticeable when examining the distribution of means. One would expect this population to be skewed toward a higher level of faith maturity since a statement of faith is required to attend the institution.

As with any self-reporting scale, the FMS is limited to the respondent's analysis of self. It is not unlikely that some students perceive themselves to hold a higher level of faith maturity than they actually do. Conversely, students may perceive themselves at a lower level of faith maturity. Faith maturity may not hold the same meaning to all participants, creating an even greater limitation when measuring it.

Sexual Decision-Making Scale. Several questions examined the respondent's attitude and behavior prior to and after engaging in sexual activity. It is not unlikely a large majority of respondents have not engaged in sexual intercourse, creating hypothetical responses rather than actual attitudes or behaviors being reported. In addition, the scale only measured six factors for initiating or abstaining from sexual activity. There is reason to believe there are other factors impacting sexual decision-making that are not accounted for in this scale.

Implications

Practitioners. The strong impact social norms and cultural pressures have, particularly on sexuality, is an area higher education practitioners should intentionally address. As described in York's (2010) research, students who are more aware of the social norms and pressures to be sexually active are more likely to be sexually active. It is important for practitioners to debunk the myths regarding sexual activity present on their campus. The professionals who take the time to study and analyze student culture as it pertains to sexuality will most likely also take the time to address these myths. Moreover, for an issue like sexuality, which is closely linked to and impacted by many other important issues (gender, values and beliefs, family, etc.), it is crucial for students to

make decisions based on personal beliefs and convictions rather than social norms and pressures.

The lack of change in sexual decision-making scores from an academic level could be of concern for practitioners. This may confirm that sexual attitudes and behaviors are being established at an earlier age. In light of this, practitioners would do well addressing the issue of sexuality both in and out of the classroom so these issues could be further developed at an older age rather than during adolescence. However, it may be comforting to see students' level of permissiveness is not changing during their college experience.

If higher education professionals choose to address issues of sexuality through programming and conversations, they demonstrate the posture that sexuality is an issue appropriate for discussion rather than one that is taboo one or "off-limits." The negative correlation between Physical Gratification and Sexual Decision-Making Regarding Communication displays the lack of communication on sexual issues by individuals who are more sexually permissive. Students may reap notable benefits from seeing higher education professionals shed light on a topic which often remains in the dark. If higher education professionals allow sexuality to be taboo in their institution, the rate (77.6 percent) at which students learn about sexuality from their peers and media may only increase (York, 2010). When programming is planned, it should cover issues diverse in nature in order to address the complexity of issues of surrounding sexuality. The investment in this type of education and programming will help the institution form and hopefully apply a more complete and effective list of best-practices.

Christian higher education. Like sexual decision-making levels, the lack of increase in faith maturity according to academic level also raises some concern. One would hope to see an increase in faith maturity of students who attend CCCU institutions. However, academic level did not impact the level of faith maturity. This issue should be further addressed using pre- and post-test measures to more accurately assess this development. Christian higher education would benefit from development of a tool to better assess this maturity.

In light of the correlation confirmed between sexuality and spirituality, Christian higher education practitioners should help students foster an understanding of this connection since many, particularly males, are uncertain about the connection (Kwee, Dominquez, & Ferrell, 2007). For many students who may begin families soon after graduation, college may be the last significant environment in which to establish a better understanding of this relationship beforehand. York (2010) reports 37.3 percent of students at Christian institutions report receiving information regarding sex from professors/teachers. If this percentage were to rise, it may decrease the uncertainties many of these male students have.

Additionally, the strong correlation between Self-Efficacy Regarding Decision-Making and Experiences the Fruits of Faith gives reason to believe the students whose faith liberates them from guilt and shame allows for healthy and consistent sexual decision-making. For students struggling with sexual addiction, the source may be linked to lack of self-acceptance and personal security. Both of these issues should be addressed in Christian higher education. The programming and educational experiences that are

formed in a grace-filled and accepting atmosphere may reap better results and decrease students' sexual addictions.

It is important that professionals and practitioners do not assume that students at Christian institutions are immune from an awareness of social norms and pressures regarding sexual behavior. The research in this study supports the York's (2010) claims that students, even at Christian institutions who have high estimates of peer sexual activity, are more likely to be more sexually active. Christian institutions, like secular, need to take measures toward debunking the cultural myths regarding sexual behavior and its prevalence on college campuses.

Research. Further research on broader populations should be done regarding both faith maturity and sexual decision-making. The diversity of gender, faith, sexual orientation, age, and race would eliminate bias in the population distribution and perhaps help develop a stronger connection between the interactions of the two. As stated earlier, the SDM scale is limited to the amount of factors for which it accounts. Research exploring other potential factors determining sexual activity could produce deeper understanding of sexual decision-making. A ranking system may provide more accurate data depicting the most important factors when initiating or abstaining from sexual activity. If a measure included demographics on sexual behavior, correlations could be made between sexual behavior and decision-making. In addition, it would be advantageous for a scale to be created which measures both of the scales simultaneously, rather than separately.

As stated earlier, there is a need for further development regarding what faith maturity actually means and describes. While the FMS is a quality assessment for this, all

the nuances of faith maturity are not captured in the 38-item questionnaire. The FMS measures eight core dimensions of the Christian faith, which leaves less than five questions for each of the core dimensions. A longer scale would be able to measure the strengths and weaknesses of a respondent's faith according to the core dimensions. Particularly for Christian higher education, the need for a quality faith maturity measure to provide accurate assessment of the campus's spiritual programming and education is great. A scale that includes both the quantitative and qualitative data for Christian faith could help explore these nuances. Moreover, the connection between sexual behavior and social norms and pressures should be further researched to develop methods for approaching this matter on college campuses.

Conclusion

The current study highlights the connection between Christian faith and sexuality among students at a faith-based college. While the study was limited by sample distribution and diversity, its scales, and administration, there are significant findings. The results bear implications for higher education professionals, the realm of Christian higher education, and the broader field of higher education research. In summary, both secular and religious institutions need to be aware of issues affected by sexuality and the benefits from addressing those issues instead of allowing them to continue to be taboo topics among professionals and students.

References

Arnett, J. J. (2000). Emerging adulthood: A theory of development from the late teens through the twenties. *American Psychologist, 55*, 469-480.

Astin, A. W., Astin, H. S., & Lindholm, J. A. (2011). *Cultivating the spirit: How college can enhance students' inner lives*. San Francisco, CA: Jossey-Bass.

Atler, M. G. (1986). A phenomenology of Christian religious maturity. *Pastoral Psychology*, *34*, 151-160.

Atler, M. G. (1989). An empirical study of Christian religious maturity: Its implications for parish ministry. *Pastoral Psychology*, *37*, 153-160.

Bassett, R. L., Mowat, G., Ferriter, T., Perry, M., Hutchinson, E., Campbell, J., & Santiago, P. (2002). Why do Christian college students abstain from premarital sexual intercourse? *Journal of Psychology and Christianity*, *21*, 121-132.

Beckwith, H. D., & Morrow, J. (2005). Sexual attitudes of college students: The impact of religiosity and spirituality. *College Student Journal*, *39*, 357-366.

Benson, P. L., Donahue, M. J., & Erickson, J. A. (1993). The faith maturity scale: Conceptualization, measurement, and empirical validation. *Research in the Social Scientific Study of Religion, 5*, 1-26.

Birkholz, D. M. (1997). Walking with God: Students' stories of spiritual growth at a small Christian college. *Journal of Research on Christian Education, 6*(1), 21-47.

Bradshaw, C., Kahn, A. S., & Saville, B. K. (2010). To hook up or date: Which gender benefits? *Sex Roles, 62*, 661-669.

Brelsford, G. M., Luquis, R., & Murray-Swank, N. A. (2011). College students' permissive sexual attitudes: Links to religiousness and spirituality. *International Journal for the Psychology of Religion*, *21*(2), 127-136.

Browning, J. R., Hatfield, E., Kessler, D., & Levine, T. (2000). Sexual motives, gender, and sexual behavior. *Archives of Sexual Behavior*, *29*, 135-153.

Bryant, A. (2011). The impact of campus context, college encounters, and religious/spiritual struggle on ecumenical worldview development. *Research in Higher Education*, *52*, 441-459.

Burris, J. L., Smith, G. T., & Carlson, C. R. (2009). Relations among religiousness, spirituality, and sexual practices. *Journal of Sex Research*, *46*, 282-289.

Centers for Disease Control and Prevention. (2000). *Health, United States.* Hyattsville, MD: National Center for Health Statistics.

Christopher, F., & Cate, R. M. (1984). Factors involved in premarital sexual decision-making. *Journal of Sex Research*, *20*, 363-376.

Earle, J. R., Perricone, P. J., Davidson, Sr., J., Moore, N. B., Harris, C. T., & Cotten, S. R. (2007). Premarital sexual attitudes and behavior at a religiously-affiliated university: Two decades of change. *Sexuality & Culture*, *11*(2), 39-61.

Evans, N. J., Forney, D. S., Guido, F. M., Patton, L. D., & Renn, K. A. (2010). *Student development in college: Theory, research, and practice.* San Francisco, CA: Jossey-Bass.

Feigenbaum, R., Weinstein, E., & Rosen, E. (1995). College students' sexual attitudes and behaviors: Implications for sexuality education. *Journal of American College Health*, *44*(3), 112-118.

Fenigstein, A., & Preston, M. (2007). The desired number of sexual partners as a function of gender, sexual risks, and the meaning of "ideal." *Journal of Sex Research*, *44*, 89-95.

Fowler, J. W. (2001). Faith development theory and the postmodern challenges. *The International Journal for the Psychology of Religion, 11*, 159-172.

Freitas, D. (2008). *Sex and the soul: America's college students speak out about hookups, romance, and religion on campus*. New York, NY: Oxford University Press.

Gallagher, S. K., & Newton, C. (2009). Defining spiritual growth: Congregations, community, and connectedness. *Sociology of Religion*, *70*, 232-261.

Hendrick, C., Hendrick, S. S., & Reich, D. A. (2006). The brief sexual attitudes scale. *Journal of Sex Research*, *43*(1), 76-86.

Holcomb, G. L., & Nonneman, A. J. (2004, Summer). Faithful change: Exploring and assessing faith development in Christian liberal arts undergraduates. *New Directions for Institutional Research*, *122*, 93-103.

Kwee, A., Dominguez, A., & Ferrell, D. (2007). Sexual addiction and Christian college men: Conceptual, assessment, and treatment challenges. *Journal of Psychology and Christianity*, *26*(1), 3-13.

Lastoria, M. (2010). *Sexuality, religiosity, behaviors, attitudes: A look at religiosity, sexual attitudes and behaviors of Christian college students*. Houghton, NY: ACSD Research Series.

Leigh, B. C. (1989). Reasons for having and avoiding sex: Gender, sexual orientation, and relationship to sexual behavior. *The Journal of Sex Research*, *26*, 199-209.

Lefkowitz, E. S., Gillen, M. M., Shearer, C. L., & Boone, T. L. (2004). Religiosity, sexual behaviors, and sexual attitudes during emerging adulthood. *Journal of Sex Research*, *41*, 150-159.

Levinson, R. A., Jaccard, J., & Beamer, L. (1995). Older adolescents' engagement in casual sex: Impact of risk perception and psychosocial motivations. *Journal of Youth and Adolescence*, *24*, 349-364.

Love, P. G. (2001). Spirituality and student development: Theoretical connections. *New Directions for Student Services*, (95), 7-16.

Lynch, J. F., Mowrey, R. J., Nesbitt, G. M., & O'Neill, D. F. (2004). Risky business: Misperceived norms of sexual behavior among college students. *NASPA Journal, 42*, 21-35.

Ma, S. Y. (2003). The Christian college experience and the development of spirituality among students. *Christian Higher Education*, *2*, 321-339.

Mannino, J. D. (1999). *Sexually speaking*. New York, NY: McGraw Hill.

Marchi, K., & Guendelman, S. (1995). Gender differences in the sexual behavior of Latino adolescents: An exploratory study in a public high school in the San Francisco Bay area. *International Quarterly of Community Health Education*, *15*, 209-226.

McMillen, E. K., Helm, H. R., & McBride, D. C. (2011). Religious orientation and sexual attitudes and behaviors. *Journal of Research on Christian Education*, *20*, 195-206.

Murray, K. M., Ciarrocchi, J. W., & Murray-Swank, N. A. (2007). Spirituality, religiosity, shame and guilt as predictors of sexual attitudes and experiences. *Journal of Psychology & Theology*, *35*, 222-234.

Murray-Swank, N. A., Pargament, K. I., & Mahoney, A. (2005). At the crossroads of sexuality and spirituality: The sanctification of sex by college students. *International Journal for the Psychology of Religion*, *15*, 199-219.

Murstein, B., & Tuerkheimer, A. (1998). Gender differences in love, sex and motivation for sex. *Psychological Reports*, *82*, 435-450.

Oswalt, S. B. (2003) *A model of sexual decision-making in college students*. (Unpublished doctoral dissertation). University of Georgia, Athens, GA.

Oswalt, S. B. (2010). Beyond risk: Examining college students' sexual decision-making. *American Journal of Sexuality Education*, *5*, 217-239.

Page, R., Hammermeister, J., & Scanlan, A. (2000). Everybody's doing it: Misperceptions of college students' sexual activity. *American Journal of Health Behavior*, *24*(5), 387-395.

Parks, S. D. (1986). *The critical years: The young adult search for a faith to live by*. San Francisco, CA: Harper & Row.

Parks, S. D. (2000). *Big questions, worthy dreams: Mentoring young adults in their search for meaning, purpose, and faith*. San Francisco, CA: Jossey-Bass.

Pascarella, E. T., & Terenzini, P. T. (2005). *How college affects students* (2nd ed.). San Francisco, CA: Jossey-Bass.

Paul, C., Fitzjohn, J., Herbison, P., & Dickson, N. (2000). The determinants of sexual intercourse before age 16. *Journal of Adolescent Health*, *27*, 136-147.

Paul, E. L., McManus, B., & Hayes, A. (2000). "Hookups": Characteristics and correlates of college students' spontaneous and anonymous sexual experiences. *Journal of Sex Research*, *37*, 76-88.

Scholly, K., Katz, A. R., Gascoigne, J., & Holck, P. S. (2005). Using social norms theory to explain perceptions and sexual health behaviors of undergraduate college students: An exploratory study. *Journal of American College Health*, *53*, 159-166.

The Barna Group - New Marriage and Divorce Statistics Released. (2008, March 31). *The Barna Group - Barna Update*. Retrieved from http://www.barna.org/family-kids-articles/42-new-marriage-and-divorce-statistics-released?q=divorce+rate

Townsend, J., & Wasserman, T. H. (2011). Sexual hookups among college students: Sex differences in emotional reactions. *Archives of Sexual Behavior*, *40*, 1173-1181.

Weis, D. L., Rabinowitz, B., & Ruckstuhl, M. F. (1992). Individual changes in sexual attitudes and behavior within college-level human sexuality courses. *Journal of Sex Research*, *29*(1), 43-59.

York, T. T. (2010). Millennial sex habits: The sexual attitudes and behaviors of unmarried undergraduate men at a small, private, Christian institution. *Growth: The Journal of the Association for Christians in Student Development, 1*(9), 2-17.

Young, M., Denny, G., & Spear, C. (1999). Area specific self-esteem and adolescent sexual behavior. *American Journal of Health Studies*, *15*, 181-189.

Appendix A: Instruments

A Model of Faith Maturity Scale

For the following please indicate, on a scale of 1 to 7, how true are each of these statements for you. Mark one answer for each. Be as honest as possible, describing how true it really is and not how true you would like it to be. Choose from these responses: 1 = never true; 2 = rarely true; 3 = true once in a while; 4 = sometimes true; 5 = often true; 6 = almost always true; 7 = always true.

1. I am concerned that our nation is not doing enough to help the poor.   1 2 3 4 5 6 7
2. I know that Jesus Christ is the Son of God and died on a cross and rose again.   1 2 3 4 5 6 7
3. My faith shapes how I think and act each and every day.   1 2 3 4 5 6 7
4. I help others with their religious questions and struggles.   1 2 3 4 5 6 7
5. I tend to be critical of other people. (R)   1 2 3 4 5 6 7
6. In my free time, I help people who have problems or needs.   1 2 3 4 5 6 7
7. My faith helps me know right from wrong.   1 2 3 4 5 6 7
8. I do things to help protect the environment   1 2 3 4 5 6 7
9. I devote time to reading and studying the Bible.   1 2 3 4 5 6 7
10. I have a hard time accepting myself. (R)   1 2 3 4 5 6 7
11. Every day I see evidence that God is active in the world.   1 2 3 4 5 6 7
12. I take excellent care of my physical health.   1 2 3 4 5 6 7
13. I am active in efforts to promote social justice.   1 2 3 4 5 6 7
14. I seek out opportunities to help me grow spiritually.   1 2 3 4 5 6 7
15. I take time for periods of prayer or meditation.   1 2 3 4 5 6 7
16. I am active in efforts to promote world peace.   1 2 3 4 5 6 7
17. I accept people whose religious beliefs are different from mine.   1 2 3 4 5 6 7
18. I feel a deep sense of responsibility for reducing pain and suffering in the world.   1 2 3 4 5 6 7
19. As I grow older, my understanding of God changes.   1 2 3 4 5 6 7
20. I feel overwhelmed by all the responsibilities and obligations I have.   1 2 3 4 5 6 7
21. I give significant portions of time and money to help other people.   1 2 3 4 5 6 7
22. I speak out for equality for women and minorities.   1 2 3 4 5 6 7
23. I feel God's presence in my relationships with other people.   1 2 3 4 5 6 7
24. My life is filled with meaning and purpose.   1 2 3 4 5 6 7
25. I do not understand how a loving God can allow so much pain and suffering in the world. (R)   1 2 3 4 5 6 7
26. I believe that I must obey God's rules and commandments in order to be saved. (R)   1 2 3 4 5 6 7
27. I am confident that I can overcome any problem or crisis no matter how serious.   1 2 3 4 5 6 7
28. I care a great deal about reducing poverty in the United States and throughout the world.   1 2 3 4 5 6 7
29. I try to apply my faith to political and social issues.   1 2 3 4 5 6 7
30. My life is committed to Jesus Christ.   1 2 3 4 5 6 7
31. I talk with other people about my faith.   1 2 3 4 5 6 7
32. My life is filled with stress and anxiety.   1 2 3 4 5 6 7
33. I go out of my way to show love to people I meet.   1 2 3 4 5 6 7
34. I have a real sense that God is guiding me.   1 2 3 4 5 6 7
35. I do not want the churches of this nation getting involved in political issues. (R)   1 2 3 4 5 6 7
36. I like to worship and pray with others.
37. I am spiritually moved by the beauty of God's creation.   1 2 3 4 5 6 7
38. I think Christians must be about the business of creating international understanding and harmony.   1 2 3 4 5 6 7

A Model of Sexual Decision-Making in College Students Questionnaire

For the following, please indicate on a scale of 1 to 5 if you **strongly disagree** or **strongly agree** with the statement.

	SD				SA
1. I think about the risk of pregnancy before engaging in sexual activity.	1	2	3	4	5
2. Possible pregnancy impacts my decisions to engage in sex.	1	2	3	4	5
3. I think about the risk of disease (including HIV) before engaging in sexual activity.	1	2	3	4	5
4. Possible disease contraction (including HIV) impacts my decisions to engage in sex.	1	2	3	4	5
5. I believe I should abstain from sex because there are many things I want to accomplish in the next few years.	1	2	3	4	5

	SD				SA
6. I believe I should abstain from sex because I worry that I won't get to do everything I want to in life.	1	2	3	4	5
7. I believe I should abstain from sex until I am in a committed relationship.	1	2	3	4	5
8. I believe I should abstain from sex on the first date.	1	2	3	4	5
9. I believe I should abstain from sex with someone I just met.	1	2	3	4	5
10. I believe I should abstain from sex with someone I hardly know.	1	2	3	4	5

	SD				SA
11. I believe I should abstain from sex in the context of a one-night stand.	1	2	3	4	5
12. My feelings of obligation to engage in sexual activity with my partner impact my sexual decisions.	1	2	3	4	5
13. My partner's feelings of obligation to engage in sexual activity with me impact my sexual decisions.	1	2	3	4	5
14. The pressure I put on my partner to engage in sexual activity impacts my sexual decisions.	1	2	3	4	5
15. My partner's pressure on me to engage in sexual activity impacts my sexual decisions.	1	2	3	4	5

	SD				SA
16. The number of my friends engaging in sexual activity impacts my sexual decisions.	1	2	3	4	5
17. The number of my partner's friends engaging in sexual activity impacts my sexual decisions.	1	2	3	4	5
18. If I am not engaging in sexual activity, then I am not "cool."	1	2	3	4	5
19. I think my friends will ridicule me if I don't engage in sexual activity.	1	2	3	4	5
20. I think my friends will think less of me if I don't engage in sexual activity.	1	2	3	4	5

	SD				SA
21. I think my friends will make fun of me if I don't engage in sexual activity.	1	2	3	4	5
22. My liking for my partner impacts my sexual decisions.	1	2	3	4	5
23. My partner's liking for me impacts my sexual decisions.	1	2	3	4	5
24. My love for my partner impacts my sexual decisions.	1	2	3	4	5
25. My partner's love for me impacts my sexual decisions.					

	SD				SA
26. My awareness of my partner's feelings impacts my sexual decisions.	1	2	3	4	5
27. My partner's awareness of my feelings impacts my sexual decisions.	1	2	3	4	5
28. The possibility of eventual marriage or commitment impacts my sexual decisions.	1	2	3	4	5

	SD				SA
29. The degree of commitment between my partner and I impacts my sexual decisions.	1	2	3	4	5
30. In my romantic relationships, I try to share my most intimate thoughts and feelings.	1	2	3	4	5

	SD				SA
31. In my romantic relationships, I try to take care of my girl/boyfriend(s).	1	2	3	4	5
32. In my romantic relationships, I try to be with those who make my life more comfortable and stable.	1	2	3	4	5
33. In my romantic relationships, I try to be with people with whom I might fall in love.	1	2	3	4	5
34. In my romantic relationships, I try to consider my partner(s) my best friend(s).	1	2	3	4	5
35. In my romantic relationships, I try to spend a substantial amount of time with my girl/boyfriend(s).	1	2	3	4	5

	SD				SA
36. In my romantic relationships, I try to consistently date someone.	1	2	3	4	5
37. In my romantic relationships, I try to focus on possible future plans with my girl/boyfriend(s).	1	2	3	4	5
38. In my romantic relationships, I try to be with those who I can count on.	1	2	3	4	5
39. My physical arousal immediately prior to sexual activity impacts my sexual decisions.	1	2	3	4	5
40. My partner's physical arousal immediately prior to sexual activity impacts my sexual decisions.	1	2	3	4	5

	SD				SA
41. My physical arousal during time spent with partner that day impacts my sexual decisions.	1	2	3	4	5
42. My partner's physical arousal during time spent with me that day impacts my sexual decisions.	1	2	3	4	5
43. My receptivity to partner's sexual advances impacts my sexual decisions.	1	2	3	4	5
44. My partner's receptivity to my sexual advances impacts my sexual decisions.	1	2	3	4	5
45. My arousal prior to seeing my partner impacts my sexual decisions.	1	2	3	4	5

	SD				SA
46. My partner's arousal prior to seeing me impacts my sexual decisions.	1	2	3	4	5
47. The physical attractiveness of my partner impacts my sexual decisions.	1	2	3	4	5
48. I am able to talk to my partner about sexual issues.	1	2	3	4	5
49. I am able to talk to my partner about alternatives to high-risk sexual activity.	1	2	3	4	5
50. I am able to talk to my partner about intimacy without sexual activity.	1	2	3	4	5

	SA				SD
51. I am able to talk to my partner about our past sexual histories/experiences.	1	2	3	4	5
52. I am able to talk to my partner about past sexual behaviors.	1	2	3	4	5
53. I am able to talk to my partner about how sex might influence our relationship.	1	2	3	4	5
54. It is difficult for me to follow through with healthy sexual decisions.	1	2	3	4	5
55. I am able to make sexual decisions that are consistent with my values.	1	2	3	4	5

	SA				SD
56. I am able to make healthy sexual decisions.	1	2	3	4	5
57. I am confident in my sexual decision-making.	1	2	3	4	5
58. It is difficult for me to make good sexual decisions.	1	2	3	4	5
59. I am able to make sexual decisions that I won't regret later.	1	2	3	4	5

Appendix B: Reliability

Variable	N	α
Sexual Decision-Making Scales		
Concern for Risk	4	.893
Sense of Future	6	.741
Social Norms and Pressure	10	.879
Relational Concerns	8	.952
Developmental Stages	9	.863
Physical Gratification	9	.957
Self-Efficacy Regarding Communication	6	.908
Self-Efficacy Regarding Decision-Making	6	.844
TOTAL Sexual Decision-Making	58	.858
Faith Maturity Scales		
Trusts and Believes	4	.703
Experiences Fruits of Faith	5	.650
Integrates Faith and Life	5	.657
Seeks Spiritual Growth	4	.779
Experiences and Nurtures Faith in Community	4	.797
Holds Life-Affirming Values	3	.610
Advocates Social Change	3	.646
Acts and Serves	5	.700
TOTAL Faith Maturity Scale	33	.891

Note. Questions 5 of SDM scale was removed due to typo error. Questions 5, 12, 26, 35, and 38 were removed from FMS due to reliability issues.