TOWARD AN UNDERSTANDING OF HOW RELIGION AFFECTS THE TIMING
OF SEXUAL DEBUTS: A TEST OF SMITH’S FRAMEWORK

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by

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Abstract

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This study uses a portion of Smith’s (2003) framework on how religious
participation impacts teen outcomes to examine religious participation’s relationship
to the timing of adolescents’ first sexual intercourse. Smith (2003) proposes that
religious participation creates its impact primarily through nine intervening religious
mechanisms or factors. Two sets of models are considered using data from Wave I of
the National Study of Youth and Religion. The first set considers how religious
participation relates to the presence of three of Smith’s (2003) factors, and the second
looks at how these factors the timing of adolescents’ coital debuts. The religious
participation measures, especially co-participation of teens and their parents, increase
the levels of the factors that are directly related to forestalling sexual debuts. The
direct effects of religious participation on the age at sexual debut become statistically
insignificant in the presence of Smith’s (2003) factors, supporting the idea that
considering only religion’s direct effects is a myopic view of how religion work.
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CHAPTER 1
INTRODUCTION AND REVIEW OF THE LITERATURE

Sociologists studying adolescents have often discovered positive associations between religion and a variety of adolescent outcomes. From increased academic achievement (Muller & Ellison 2001; Regnerus 2000) to heightened levels of community service involvement (Youniss, McLellan & Yates 1999), religion has been shown to significantly affect many aspects of teen life. What is less clear is why religion has these effects. Studies finding positive religious effects typically zero in on one adolescent outcome and are not specifically interested in explaining religion’s positive association. Some variant of social control (Hirschi 1969) or attachment theories (Harlow 1958) are often offered as explanations of religion’s positive associations; Wallace & Williams (1997) articulate a full model of religion operating through social control to impact teen outcomes (discussed below).

Undoubtedly, these theories speak some truth about how religion affects teen outcomes. However, such explanations suffer from several shortcomings. First, there is nothing specifically religious about them. Whatever measure is used to represent religion is typically net of all other direct affects that are not considered “religious.” This creates statistical competition and a false dichotomy between “secular” and “sacred” within models (Regnerus 2003). Secondly, they lack theoretical explanations of relationships found between religion and a singular outcome. Additionally, studies
linking religion and teens outcomes offer theory aimed at one particular outcome and are therefore not transferable to other, often very different, teen outcomes. This study is concerned with taking a general theoretical framework of how religious participation affects teens’ outcomes (Smith 2003), and adapting it to offer an explanation how religious participation is associated with the timing of teen sexual debuts. Using Smith’s (2003) general framework and the National Study of Youth and Religion¹, this study posits that parental and teen religious participation is linked through religion-specific mechanisms of network closure, moral directives, and extra-community links to delay the first time a person has sex.

Failure to understand the juncture of religion and the timing of adolescent sexual debuts stems from an antecedent simplistic view of religion in many studies citing positive religious associations with adolescent sexual behaviors. Day (1992), Durant & Sanders (1989), and Murry (1994) among others use religious attendance as a sole religious variable among a host of other factors linked to first intercourse. Rostosky, Wilcox, Comer-Wright, & Randall (2004) note that over half of the longitudinally based studies of religion and teen sexual behavior use single measures of religious participation and affiliation, while the other half do little better by using a combined measure partially representing two measures of adolescent or parental religiosity. Sociologists of religion have long emphasized that religion is a multidimensional concept (Glock & Stark 1970; Gorsuch 1984). Facets of religion

¹ The National Survey of Youth and Religion was generously funded by the Lilly Endowment Inc. of Indianapolis, IN, and is the property of the National Study of Youth and Religion www.youthandreligion.org under the direction of its principal investigator, Dr. Christian Smith, of the Department of Sociology at the University of North Carolina at Chapel Hill, and is used with permission.
such as beliefs, religious salience, participation, tradition, and private religious rituals are typically correlated but quite distinct from each other.

Despite the majority of studies suggesting linking religion and sexual behavior by adopting social control or attachment theories to explain religion’s effects (Wilcox, Rostosky, Randall & Comer Wright 2001), these measures are incapable of confirming or falsifying a control theory of the mechanisms by which religion affects the timing of sexual debuts. These singular measures of religion do injustice to the multidimensional nature of both religion (Glock and Stark 1970; Gorsuch 1984) and social control theory (Hirschi 1969). Such methodological omissions in conceptualizing religiosity illustrate a lack of theoretical rigor and coherency in understanding religion and how it affects the lives of adolescents.

Understanding the relationship between religiosity and adolescent outcomes is not only hampered by borrowed and untested theories and simplistic measures of religion. These reductionistic tendencies trickle down to the way researchers have historically constructed statistical models. In Regnerus’s (2003) discussion on the relationship between religion and adolescent delinquency, he cites three research tendencies that complicate and obscure the relationship. They are: “1) creating statistical competition between religious and secular social controls when in fact they are typically are interrelated; 2) overlooking the possibility of change during such a fluid phase of the life course; and 3) neglecting the intergenerational socialization of religious and moral behavior, thereby missing key direct and indirect effects of religion on delinquency (Regnerus 2003: 190-91).”
For example, Ku, Sonenstein, & Pleck (1993) use both frequency of attendance and religious affiliation to generate event history models of age at first sex, a design similar to the present study. However, Ku et al. (1993) enter religious attendance and affiliation simultaneously with measures of family structure and parental strictness, two areas that religion is likely associated with. Bingham et al. (1990), Collins & Robinson (1986), and Crockett et al. (1996) among others also place religious measures side by side in their analyses of the timing of first intercourse. Regnerus’s (2003) observations, though directed toward delinquent behaviors, I believe point to the limited overall understanding currently available of how religious participation affects all of adolescent outcomes including sexual debut timing.

Smith (2003) addresses such reductionistic thinking about religions’ effects on the process of laying out his theoretical framework. Embedded in Smith’s (2003) theory is the notion that there is something distinctly religious about the factors he enumerates. Also, explanations offered of adolescent religious effects on sexual debuts are often untested, atheoretical and targeted only toward one specific outcome. Even when an ecological theoretical framework is cited, often singular and uni-level measure of religion is offered in analyses of religion and adolescent outcomes. Religion is a multidimensional, multilevel entity and requires a coherent, larger theoretical framework to investigate and explain its various effects.

In this paper, I offer a discussion and a specific test of Smith’s (2003) broader theory of religion and adolescent outcomes. The basic framework of Smith’s (2003) theory is straightforward. Religion influences teen outcomes through nine “distinct
but connected and potentially reinforcing factors (Smith 2003: 19).” These factors are found in substantive areas outside of sociology of religion, but again, Smith maintains these are distinct due to their religious origins. As Regerus (2007) notes regarding Smith’s (2003) mechanisms:

"Several of the nine factors Smith presents concern mechanisms (or means) of influence, wherein something 'secular' provides the actual pathway by which religion influences the outcome under consideration. Others refer to unmitigated influences from the religious elements themselves (moral order, spiritual experiences). That is, sometimes religious teenagers do something - or don't do something - because of their faith commitments, not out of a desire to conform, obey parents, or please friends.... Such interdependence presents researchers with interpretive difficulties, especially when survey research uses only standard measures of religiosity like church attendance. Even so, its still helpful to think of these factors as analytically distinct influences."

The nine religious factors are listed here under three larger conceptual categories:

I. **MORAL ORDER**: Moral Directives, Spiritual Experiences, Role Models

II. **LEARNED COMPETENCIES**: Communication/Leadership Skills, Coping Skills, Cultural Capital

III. **SOCIAL AND ORGANIZATIONAL TIES**: Social Capital, Network Closure, Extracommunity Links (Smith 2003)

It is well enough to posit that Smith’s (2003) factors help religion to influence the timing of first intercourse. But how do they make their impact? Regnerus (2003a) gives an overview of Wallace and Williams’s (1997) and Smith’s (2003) theory of how religion impacts adolescent outcomes. These two theories are presented by Regnerus (2003a) as the two main strains of how religion is understood to impact teen outcomes. According to Wallace and Williams (1997), family is the only primary
socialization influence, with religion as a separate, secondary socialization institution alongside other secondary socialization influences such as peers and school (see Figure 1 below). Religion works indirectly through the mechanisms of social control and social support (Wallace and Williams 1997; Regnerus 2003a). For Smith, religion itself provides a substantive cultural tradition promoting normative ideas of what is “good and bad, right and wrong, higher and lower, worthy and unworthy, (and) just and unjust (Smith 2003: 20) (see Figure 2 below).” These normative ideas of right and wrong are considered apart from individuals’ preferences, decisions and desires (Smith 2003), and can therefore operate directly and independently of Wallace and Williams’s socialization mechanisms of social control and social support (Wallace and Williams 1997).

A central difference between the two theories above could be described in terms of the classic dichotomy of individual - Smith 2003 - and group - Wallace & Williams 1997 - effects of religion. That distinction, however, is misleading and unhelpful, particularly in the case of these two theories. Bjarnason et al. (2005) (more helpfully) characterizes the conflict of individual vs. group level religious factors as being between religious beliefs (individual level) and religious community (group level) approaches. However, the crux of the difference between these two theories does not even lie in the distinction between religious beliefs and religious community approaches. It is more fundamentally a question of religion being an essentially unique type of institution capable of creating a distinct substantive cultural tradition, in addition to a model of human personhood that views human action as neither fully determined nor totally autonomous. Smith’s factors are distinctly
religious because religion is a distinct and unique set of relationships, beliefs, and practices. Smith’s theory places beliefs as an element that serves as a causal mechanism alongside of social control and social support, while Wallace and Williams (1997) equate religion with other socialization sources and characterize beliefs as resulting from social control and support.

Pearce and Axinn (1998) suggest that the relationship between religious community and religious belief factors is a reciprocal one. Religious community involvement shapes beliefs and individual practices and beliefs strengthen commitment to involvement in a religious community. In terms of how the religious community and religious belief variables work to statistically affect adolescent the timing of sexual initiation, Rostosky et al. (2003) found that religion affects coital debut directly and indirectly; directly through religious service attendance and indirectly through abstinence attitudes associated with religious participation. Smith (2003) theorizes that religious attendance is antecedent to the nine factors by which religion influences adolescent outcomes. This is logical (the factors are likely a product of exposure to some religious context) and agrees with prior research utilizing religious community involvement approaches (most popularly social control theory), but includes individual and group levels measures as factors to mediate between standard attendance measures and adolescent outcomes. This framework allows a means to understand that religion is still operating across the span of adolescence, even when church service attendance tends to drop in later adolescence (Lytch 2004).
Regnerus (2007 in press), in his more comprehensive look at the relationship between religion and adolescent sexual activity, has developed a typology of religious influence including six types of relationships between religion and sexual behavior. Of the six types, Regnerus (2007) indicates that “Instrumental” and “Invisible” religion are the most prevalent among adolescents. Regerus defines these two terms in the following ways:

1. Instrumental religion: “Religion may influence the actor’s behavior, but the influence is essentially pragmatic; that is, the actor employs largely secular reasoning for avoiding the undesirable consequences of behaviors.”

2. Invisible religion: “Religion influences the actor’s behavior, but the actor is not aware of it and may even deny religion’s relevance.” (Regnerus 2007:119)

These relationship types, though untested here due to relying on quantitative data, are useful for framing thinking about how religion and sexuality are linked up in adolescents’ lives. However unpopular it may be to use religious scripts to articulate reasons for withholding from sex, religious teens still do wait longer to have sex. Regardless of whether or not they articulate the relationship between religion and sex in specifically religious terms, religious teens may be unconsciously translating religious scripts into language popularly promulgated by public health and social service agencies (Regnerus 2007). I suspect that many religious groups and congregations are currently doing this translation work for their teens, such that religious teens may not know how to articulate religious reasons for their religion’s proscriptions on sex before marriage. Unfortunately, data of this kind is hard to come by.
Smith’s theory excludes other religious dimensions, or includes them as a function of religious participation. The theory’s purpose is to clearly explain how religious participation affects teen outcomes, but does not include a serious discussion of religious traditions, religious history, or religious salience discussed elsewhere in religion literature. The salience of religious identity to teenagers is not necessarily to be inferred from levels of religious participation, as teenagers are often forced to attend religious services, particularly in their early teenage years. Johnston, Bachman, and O’Malley (1999) found that religious attendance dropped dramatically between 13-15 year-olds and 16-18 year olds, while reports of religious importance remained fairly consistent (Whitehead, Wilcox & Rostosky, 2001). Religious traditions vary in their moral teachings and moral requirements for their congregants. Abstinence is almost universally encouraged among popular religions, but the

![Wallace and Williams Model (1997)](image)

Figure 1: Wallace and Williams Model (1997)
The centrality of abstinence to identifying with a religious tradition certainly varies. Dimensions such as religious tradition and religious salience must be considered in an extensive examination of religion’s effects, however theorizing religious participation’s impacts is an important first step. This study integrates a measure of religious tradition as a control variable in its analyses, but adequate explanations of how other religion dimension affect teen outcomes are unfortunately outside the scope of this paper.

Several of Smith’s (2003) nine factors have pre-existing referents in the sociological literature on the timing of teen’s first sexual activity. I am using three of the factors for my analyses here (extra-community links, network closure, and moral...
directives) to analyze the usefulness of Smith’s (2003) theory. The inclusion of religious extra-community links as potentially illustrating religion’s affect on teen sexual behavior can be seen in Bearman and Bruckner’s (2001) discussion of adolescent virginity pledges. Adolescents take pledges to remain abstinent until marriage; this initiative was sponsored created by the Southern Baptist church. These pledges prove successful in delaying first intercourse when there are support groups in place for adolescents to re-affirm the content of the pledge they have made.

Network closure is a measure of community integration or disintegration; Brewster, Billy, & Grady (1993) illustrate that community disintegration leads to earlier sexual debuts among adolescents. Conversely, Browning, Leventhal, & Brooks-Gunn (2004) report that neighborhood collective efficacy can delay sexual activity. Cooksey et al. (1996) indicate that religious parents are more likely to disapprove of premarital sex than non-religious parents, and perceived parental disapproval of premarital sex delays the initiation of sex (Jaccard, Dittus & Gordon 1996; Dittus & Jaccard 2000; Fingerson 2005). These detached findings of these studies find common residence in Smith’s (2003) theory, corresponding to broader, well-defined concepts in a more expansive, coherent theoretical framework of how religion affects adolescent outcomes.

1.1 Importance of Parental Religiosity

Two recent major studies of adolescent religiosity (Lytch 2004; Smith & Denton 2005) underline the overall importance of parents to the religious lives of adolescents. According to Smith and Denton (2005), parents’ church attendance and
the importance they place on religion are associated with teens’ attendance and claimed importance of religion in their lives. Also, the affective quality of the parent-teen relationship as reported by the teenager affects teens’ religiosity. Teens with warm relationships with religious parents are more likely to be religious than those whose parents seems more distant or that don’t understand them (Smith and Denton 2005). Lytch (2004) indicates that parental church attendance and parenting styles are associated with levels of teen attendance.

Parents’ religiosity affects adolescent choices and outcomes through the connected nature of the parent-child relationship. Elder’s (1998) “linked lives approach” emphasizes that interpersonal connections through life course transitions accentuate or redirect behavioral tendencies (Regnerus 2003). This basic idea makes the parent-child connection the logical starting point to examine how religion affects adolescent attitudes and behaviors. A connection to parents exists due to the involuntary and permanent nature of the relationship (Knoester 2003; Umberson 1992). Pearce and Haynie (2001) and Regnerus (2003) note that children of more religious parents commit fewer delinquent acts. Adolescents who possessed different religious affiliations from their parents or disagreed with their parents on the importance of religion committed more delinquent acts (Pearce and Haynie 2001). While adolescent sexual practices are not considered in either Regnerus’s or Pearce and Haynie’s study of delinquent behavior, similar effects are anticipated. Religious traits and behaviors of parents wield noticeable influence on their children’s behavior (Regnerus, 2001). The factors associated with adolescent delinquency are essentially the same as those associated with early sexual debuts. The nature and extent of the
parent-child connection will help explain how much parent religiosity affects adolescent sexual practices.

Adolescent sex research has identified a host of factors associated with adolescent sexual debuts and the number of their sexual partners. The following list is not exhaustive but includes those items that may be affected by parents’ religiosity and parent-child connection. Parenting styles are a predictor of adolescent sexual activity (Miller, McCoy, Olson & Wallace 1986). Feelings of parental closeness and perceived parental disapproval of premarital sex delay initiation of sex (Resnick et al 1997; Jaccard, Dittus & Gordon 1996; Dittus & Jaccard 2000; Whitbeck, Simons & Kao 1994). Adolescent religious involvement also leads to delayed sexual initiation (Thornton & Camburn 1989; Murry 1994; Cooksey et al 1996; Mott et al 1996). Characteristics of peer networks and communities are closely related to teen sexual practices (Brewster, Billy & Grady 1993). Self-esteem is also linked to the timing of sexual debuts (Day 1992).

Religion and connection to religiously involved parents have been associated with all the above factors. Parenting styles associated with delaying sexual initiation are also associated with more conservative religious groups (Lytch 2004). Parental affection and warmth are associated with parental religious involvement as well as parental closeness (Clydesdale 1997; Barkowski & Xu 2000; Wilcox 2002). Religious parents are more likely to disapprove of premarital sex than non-religious parents (Cooksey et al 1996). Similarly, religious parents are also more likely to be perceived as disapproving of premarital sex (Dittus & Jaccard 2000).
1.2 Hypotheses

The following hypotheses are premised on several points from the preceding discussion. Firstly, parents matter a great deal in predicting the efficacy of religion in teens’ lives, and religious effects are partially a function of parents’ religiosity. Secondly, religious participation works through mediating variables that appear to be non-religious in addition to having a direct effect. Third, individual and group level variables must be considered in examining religion’s effects on teens.

**Hypothesis One:** Higher frequency of participation of parents and teens will increase the presence of three of Smith’s (2003) factors: extra-community links, network closure, and moral directives.

**Hypotheses Two:** Teens that attend services with their parents are associated with increased effects of religious participation over teens and parents that attend separately.

**Hypotheses Three:** Higher levels of the variables representing Smith’s (2003) factors of extra-community links, network closure, and moral directives are associated with delays in first sexual intercourse.
CHAPTER 2

METHODS

2.1 Data and Overview of Methods

Apparent from the above hypotheses and Smith’s (2003) theory is that multiple models or path models are required for a serious test of religious participation’s effect on sexual debuts. Hypothesis One will be tested in a set of ordered logit and binary logit models, and Hypotheses Three will be tested through the use of survival analysis models. Hypothesis Two will be tested in both the logit and survival analysis models. The first wave of the National Study of Youth and Religion (NSYR) will be used for the subsequent analysis.

The National Survey of Youth and Religion (NSYR) is a nationally representative telephone survey of 3,290 U.S. English and Spanish speaking teenagers between the ages of 13 and 17, and of their parents. The NSYR also includes 80 oversampled Jewish households, bringing the total number of completed NSYR cases to 3,370. The NSYR was conducted from July, 2002 to April, 2003 by researchers at the University of North Carolina at Chapel Hill using a random-digit-dial (RDD) telephone survey method, employing a sample of randomly generated telephone numbers representative of all household telephones in the 50 United States. The national survey sample was arranged in replicates based on the proportion of
working household telephone exchanges nationwide. Eligible households included at least one teenager between the ages of 13-17 living in the household for at least six months of the year. In order to randomize responses within households, and so to help attain representativeness of age and gender, interviewers asked to conduct the survey with the teenager in the household who had the most recent birthday. The 80 Jewish oversample cases are omitted from this analysis (Smith and Denton 2003). The overall response rate for the first wave was 81%. See Tables 1-3 below for selected summary statistics of the NSYR data.

**TABLE 1**

**SUMMARY OF AGE OF SEXUAL DEBUTS IN THE NSYR**

<table>
<thead>
<tr>
<th>Age</th>
<th>Total number having first sex at this age</th>
<th>Cumulative percentage of sample that had first sex</th>
</tr>
</thead>
<tbody>
<tr>
<td>11</td>
<td>12</td>
<td>0.37%</td>
</tr>
<tr>
<td>12</td>
<td>35</td>
<td>1.07%</td>
</tr>
<tr>
<td>13</td>
<td>99</td>
<td>4.44%</td>
</tr>
<tr>
<td>14</td>
<td>140</td>
<td>8.69%</td>
</tr>
<tr>
<td>15</td>
<td>188</td>
<td>14.41%</td>
</tr>
<tr>
<td>16</td>
<td>170</td>
<td>19.57%</td>
</tr>
<tr>
<td>17</td>
<td>50</td>
<td>21.09%</td>
</tr>
</tbody>
</table>
# TABLE 2

**SUMMARY OF THE AGE DISTRIBUTION**

<table>
<thead>
<tr>
<th>Age</th>
<th>Number</th>
<th>Percent of Sample</th>
</tr>
</thead>
<tbody>
<tr>
<td>13</td>
<td>629</td>
<td>19.12%</td>
</tr>
<tr>
<td>14</td>
<td>643</td>
<td>19.55%</td>
</tr>
<tr>
<td>15</td>
<td>699</td>
<td>21.25%</td>
</tr>
<tr>
<td>16</td>
<td>661</td>
<td>20.10%</td>
</tr>
<tr>
<td>17</td>
<td>658</td>
<td>19.98%</td>
</tr>
</tbody>
</table>

# TABLE 3

**SUMMARY OF RESPONDENTS’ RELIGIOUS TRADITIONS**

<table>
<thead>
<tr>
<th>Tradition Name</th>
<th>Number</th>
<th>Percent of Sample</th>
</tr>
</thead>
<tbody>
<tr>
<td>Conservative Protestant</td>
<td>1043</td>
<td>31.7</td>
</tr>
<tr>
<td>Mainline Protestant</td>
<td>345</td>
<td>10.52</td>
</tr>
<tr>
<td>Black Protestant</td>
<td>400</td>
<td>12.16</td>
</tr>
<tr>
<td>Catholic</td>
<td>816</td>
<td>24.8</td>
</tr>
<tr>
<td>Jewish</td>
<td>49</td>
<td>1.49</td>
</tr>
<tr>
<td>Latter-Day Saints</td>
<td>72</td>
<td>2.19</td>
</tr>
<tr>
<td>Not Religious</td>
<td>402</td>
<td>12.22</td>
</tr>
<tr>
<td>Other Religion</td>
<td>88</td>
<td>2.67</td>
</tr>
<tr>
<td>Indeterminate</td>
<td>74</td>
<td>2.25</td>
</tr>
</tbody>
</table>
2.2 Religious Measures

A look at the correlation matrix of religious variables below (see Table 4 below) indicates that to include only one or two religious variables disregards potentially important information about religion’s effects. To know that someone attends religious services does indicate whether that individual uses religious principles in cognitive decision making processes, and it assumes that all religious traditions are equal. Omitting information about religious tradition is particularly ill-advised, as various religious traditions place more emphasis on sexual purity to identify with a tradition and a local community of co-religionists. It is quite possible to conceive that young adolescents, in particular, might be required to attend religious services but their churches do not emphasize sexual purity as part of their religious identity.

Adolescents are at a stage in the life course where their parents still wield a good deal of influence over them, despite teens’ denial of this situation (Smith and Denton 2005). In recognition of this fact, religious service attendance variables offer a measure combining parental and teen attendance as well as measures indicating that only the parent(s) attend or that only the teen attends services. All three variables are dichotomous measures, where a value of one represents that either both teens and parent(s), parent(s) only, or teens only attend services two to three times a month or more, with zero indicating attendance only monthly to not at all. A full discussion of this participation variable follows below.
TABLE 4

CORRELATION MATRIX OF RELIGIOUS VARIABLES

<table>
<thead>
<tr>
<th></th>
<th>How frequently do you attend youth services?</th>
<th>How often do you pray when you're alone?</th>
<th>How often do you read the Bible?</th>
<th>Faith is important in shaping how I make major decisions</th>
<th>Faith is important in shaping how I live daily life</th>
<th>Faith is important in shaping how I make major decisions</th>
</tr>
</thead>
<tbody>
<tr>
<td>How frequently do you attend youth services?</td>
<td>1.00</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Faith is important in shaping how I live daily life</td>
<td>0.21</td>
<td>1.00</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Faith is important in shaping how I make major decisions</td>
<td>0.21</td>
<td>0.70</td>
<td>1.00</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>How often do you pray when you're alone?</td>
<td>0.00</td>
<td>0.02</td>
<td>0.02</td>
<td>1.00</td>
<td></td>
<td></td>
</tr>
<tr>
<td>How often do you read the Bible?</td>
<td>0.26</td>
<td>0.39</td>
<td>0.36</td>
<td>0.01</td>
<td>1.00</td>
<td></td>
</tr>
</tbody>
</table>

Religious tradition is a concept that presents a more generic depiction of the beliefs and practices than congregants experience in their own religious communities. Traditions transcend denominations and individual congregations, but do describe with some consistency the content of the beliefs and practices service attendees are exposed to in local communities. For instance, many Protestant churches are united not only in their Protestantism, but in a variant that stresses the Bible as ultimate source of authority as well as personal evangelism. These are the generic content of religious traditions, and the similarities within and dissimilarities across religions warrant the distinction of different religious traditions.

The NSYR offers a constructed religious tradition variable based on the methodology of Steensland, Park, Regnerus, Robinson, Wilcox and Woodberry
Respondents were asked for very specific questions regarding their religious background, with very specific attention paid to the denominations Protestants reported involvement with. These denominations have been categorized by Steensland et al. (2000) as either mainline, conservative, or black Protestant based on constellations of theological and organizational factors that make these denomination similar to their congregants. Those respondents that simply identified themselves as “Just Christian” or “Just Protestant” were evaluated on the content of responses concerning theological beliefs, and categorized into a mainline or conservative tradition accordingly. Jewish and Catholic respondents were noted as such, while other well-known but smaller religious groups (Muslims, Jehovah’s Witnesses, etc.) were placed in the “Other Religion” category, not due to similarity but due to the small proportion of the sample that they comprise.

2.3 Measures of Smith’s (2003) Factors

The present analyses focus on three of Smith’s (2003) nine factors: moral directives, network closure, and extracommunity links. All of these have proven significant in recent studies on the timing of teen sexual debuts (Jaccard, Dittus & Gordon 1996; Dittus & Jaccard 2000; Bearman and Bruckner 2001; Brewster, Billy, & Grady 1993). These factors are themselves broad categories that are irreducible to single measures. The measures chosen to represent the factors here are based on their relevance to the dependent variable, teen sexual behavior.
According to Smith’s (2003a & b) research notes, network closure consists of measures of supervision and how well parents are connected to their teen’s friends and their teen’s friends’ parents. The NSYR survey asked of youth how many afternoons and evenings a week they spent without adult supervision as well as asking how many evenings a week teens ate with at least one of their parents. Due to high levels of multicollinearity between these two measures, the analyses here only include the evenings per week teens spend without adult supervision. The connection between teens’ parents and teens’ friends’ parents was created by taking the names of five of the teen respondent’s friends, and the number out of those five that the teen respondent’s parents knew their friends’ parents well enough to talk to them on the phone. This ratio was coded 1 to 5 for the number out of 5 possible friends that the teen’s parents knew the parents of well enough to call on the phone.

In terms of moral directives, the NSYR offers several potential indicators of parents’ conveyed and teens’ reported moral stances. Considering the outcome in question here involves sexual behavior, the only indicators used relate to views on sexuality. Teen respondents were asked if they thought people should abstain from sex until marriage (1-Yes, 0-No). They were also asked, “How upset would your parent be if (he/she/they) found out that you were having sex?” Response categories range from one to five, with one representing “not upset at all,” to five “extremely upset.” Despite findings that religious parents often talk less with their kids about sex than non-religious parents, the fact that religious parents are more disapproving of teens having sex (Cooksey et al. 1996) is presumably perceived by teens.
Extracommunity links are links to religious activities outside of adolescents’ local religious communities. Examples of these include religious camps and retreats, music festivals, mission trips, and other socioreligious activities (Smith 2003). There are multiple items in the NSYR that are examples of teen religious extra-community links. This analysis relies on an indicator that captures the most extreme of extra-community links, teens going on mission trips. Mission trips represent the largest commitment of time, planning, and resources for teens. They also indicate a level of dedication to proselytizing teens’ religious beliefs. Teens who have gone on one or more mission trips or youth service projects are compared with teens that have not gone on a mission trip or youth service projects.

2.4 Procedure

In keeping with Smith’s (2003) notion of religious factors (or mechanisms) that help explain why religious participation is associated with positive teen outcomes, the analyses here will be carried out in two stages. The first stage uses measures of religious participation to predict the variables representing Smith’s (2003) factors. Using a variety of religious participation variables, ordered logit and logit models are estimated to predict levels of the measures of three of Smith’s (2003) factors. The second stage uses the variables representing extra-community links, network closure, and moral directives as independent variables to predict the hazard rate of sexual debut associated with each age cohort in the sample. The survival curves until first sex for each first stage dependent variable will be estimated using
Kaplan-Meier survival analysis. A multivariate Cox regression will illustrate the relevant significance of all the variables representing Smith’s (2003) factors simultaneously in a full model.

In the first stage models, the primary independent variable, religious participation, consists of multiple teen-oriented indicators of religious participation. Due to the tension between rising levels of teen autonomy and an ongoing connection to their parents, variables indicating teens attendance and teens attending with their parents are utilized. The NSYR provides a created variable displaying whether teens attend religious services with both parents, one parent, alone, or not at all. Using this variable, three categorical variables were created; one for teens attending with both parents, one for teens attending with one parent, and one for teens attending alone. The omitted reference category for the three variables is never attending. Youth group attendance, a separate form of religious involvement that significantly fewer teens participate in than traditional religious services, was included to see if it had a distinct effect. Youth that attended religious youth functions 2-3 time a month or more were coded as 1, and teens that attended between monthly and never were coded 0. This variable schema used in ordered and binary logit models to predict the

2 Smith (2003a) uses a parameterization of religious participation that used four dummy variables (a measure of teen youth group participation, parents’ service attendance, both parents attending services and teens attending youth services, and neither attending). The dummy for both parents and teens participating was found to be problematic. Instead of a standard interaction term, the both attending dummy variable actually calculated the additive effects of parents attending services plus teens attending youth services. Interaction terms are intended to show an amplified effect of two characteristics coupled together, but when I used a traditional interaction effect illustrating the categorical effects of parents attending services and teens attending youth groups, the interactions were often insignificant or even negative. Smith’s (2003a) found positive religious participation effects on some of the religious factors, but the more conventional interactions indicated opposing or insignificant results. The combined participation measure used here refers to parents and teens attending services together, where Smith’s (2003a) measure used two activities done separately (parents don’t typically attend youth services and events). This is likely a better strategy for a test of Smith’s (2003) theory, particularly as it is expanded and illustrated in Smith (2003 a & b).
presence of Smith’s (2003) factors. These models also control for family income, sex of teen, race, and family structure (1: both parents or one parent and a live-in partner, 0: widowed, divorced, or single parent household).

The religious participation measures listed above be employed when considering all but one of the first stage dependent variables. It is improbable that because a teen attends youth group that a parent will be less or more inclined to monitor their adolescent’s media consumption. Methodologically, it seems reasonable to withhold youth group attendance from this parent-oriented variable. Teens’ perceptions of parental disapproval of sexual intercourse does account for youth group participation, as it is the perceptions of disapproval, whether real or imaged, that seem to delay sexual debuts in teens (Dittus & Jaccard 2000). More religiously involved teens are likely to be sensitized to disapproval of adolescent sexual activity, making youth group attendance a variable worthy of consideration when studying perceptions of disapproval of sexual activity.

The second stage of models use the first stage models’ dependent variables (representing Smith’s factors) as independent variables estimating the hazard and survival rates of age at first sex using Kaplan-Meier estimation. The expectation is that Smith’s factors will retard the onset of sexual activity among adolescents. Kaplan-Meier estimation techniques can only estimate the effect of one covariate at a time, allowing for tests between categories of a predictor but not for controlling the effects of other covariates. The NSYR only offers the year of age that teens began having sex, which is not a small enough unit of time to confidently produce estimators in a Cox regression, which is predicated on a continuous timing dependent
variable. However, Cox regression can still be used to evaluate the significance of individual covariates in a full model net of other predictor variables. Kaplan-Meier results will be presented for variables representing Smith’s (2003) factors in conjunction with the reported significance of the variable from a full Cox model. In this way, the analyses offer good tests of significance between categories of predictor variables and between the various predictor variables. Full models with and without the measures representing Smith’s factors will be estimated to note the change in impact of the religious participation variables. The direct impact of religious participation on coital debut timing is expected to diminish upon inclusion of Smith’s factors. Additionally, measures of religious tradition will be included: dichotomous variables representing Conservative Protestant, Mainline Protestant, Black Protestant, and Roman Catholic affiliation will be compared to the category of being in any religion other than the four mentioned. There are simply too few cases of other notable religions practiced in America in the NSYR to expect significant results. The second stage Cox regression models include control variables for race, gender of teenager, age of teenager, and parental income.

Kaplan-Meier curves are a form of what is known as survival or event history analysis. Event history techniques consider the time that elapses until occurrence of a specified event (in this case, teen’s first sex). To perform an event history analysis, there are two mandatory variables. First a status variable is required. The status variable is dichotomous and indicates whether an individual has experienced the event in question or not. Secondly, a variable measuring the duration of time until either the event occurred or the observation period of a study ends without the event
happening is needed (known as a *duration variable*). Those cases that survive the observation period of the study without experiencing the event are known as censored cases (Allison 1984). The advantage of Kaplan-Meier and other event history techniques versus standard linear regression is that event history methods utilize not only those cases that experienced an event but also those that have not (Allison 1984). This study is concerned as much with teens who have not yet had sex as with those teens that have, making event history methods the appropriate choice for these analyses.

The NSYR data made construction of the status and duration variables very straightforward. The status variable was created from adolescents’ responses to a question that asked if they had ever had sexual intercourse. The duration variable used two survey questions in its creation. For those teens that indicated they had had sex, their reported age at first intercourse was used. For the censored cases – those teens that were virgins when interviewed – their age at the time of completing the survey was used. Once these ages were ascertained, the number ten was subtracted from these ages to avoid tables cluttered with a flat line from ages zero to eleven. The final duration variables then yielded a range of values from one to seven.
CHAPTER 3
RESULTS

3.1 First Stage Models

The first stage models, as you will recall from above, were ordered logit and standard logit models regressing the primary variables of interest, religious participation variables, on variables representing three of Smith’s (2003) factors. Their intent was to show the association between higher religious participation and increases in potential mechanisms delaying the onset of adolescent sexual activity. Ordered logit models were used to generate coefficients for all outcome variables that were not measured as a dichotomy. Those models with binary dependent variables used standard logistic regression.

It appears that higher religious participation is associated with the variables indicating Smith’s (2003) factors, particularly parent and teens that participate together. The first hypothesis is satisfied by the results of Table 5. The majority of the models show religious participation to be significant, particularly with attitudes about sex. This finding underscores the fact that religious parents matter not only in preventing certain activities, but also in shaping teen attitudes.

The results for the categorical variables representing whether teens attend alone or with one or both parents follow a step pattern throughout the data. Teens attending alone possess the smallest coefficients, which often became insignificant in
the presence of the youth group attendance measure. This makes sense because they are both measures of religious participation carried out alone by youth. Attending with one parent yields a higher and typically significant effect associated with the increased presence of a variable associated with later debuts. Attending with both parents produces a still greater coefficient that is highly significant in all models. At first glance, it might seem that this result is the effect of being in a two-parent versus a single-parent family. However, the variable representing family structure was frequently insignificant here, and the significance for teens participating in religious services and meeting with their parents did not waver in the presence of the family structure measure. The only exception was regarding the number of nights per week teens reported being without adult supervision.

Religious participation produces interesting effects on how many evenings per week teens are without adult supervision. When the family structure measure is included, the coefficient for attending services with both parents becomes insignificant. When family structure is excluded, attending with both parents becomes significant in the expected direction (toward fewer unsupervised evenings). Boys were likely to be less supervised by adults than girls, and older teens were less likely to be supervised than younger teens. Adolescents are in a position where it is generally unlikely that any will be supervised seven nights a week. Parenting styles are affiliated with certain religious groups, and adult supervision may be more a function of religious tradition and subsequent parenting styles than strict religious participation.
### TABLE 5

RESULTS OF PARTICIPATION MEASURES IN FIRST STAGE MODELS

<table>
<thead>
<tr>
<th>MORAL DIRECTIVES</th>
<th>Attd. Measure</th>
<th>Coefficient</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>How upset would your parent be if they found out that you were having sex? (1- Not upset at all to 5- Extremely Upset)</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Attends With Both Parents</td>
<td>.934***</td>
</tr>
<tr>
<td></td>
<td>Attends With One Parent</td>
<td>.425***</td>
</tr>
<tr>
<td></td>
<td>Attends Alone</td>
<td>.193</td>
</tr>
<tr>
<td></td>
<td>Attends Youth Group</td>
<td>.513***</td>
</tr>
<tr>
<td></td>
<td>Do you think that people should wait to have sex until they are married, or not necessarily? (1- Yes, 0- No)</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Attends With Both Parents</td>
<td>1.13***</td>
</tr>
<tr>
<td></td>
<td>Attends With One Parent</td>
<td>.676***</td>
</tr>
<tr>
<td></td>
<td>Attends Alone</td>
<td>.374***</td>
</tr>
<tr>
<td></td>
<td>Attends Youth Group</td>
<td>.993***</td>
</tr>
</tbody>
</table>

*** p < .001   **p < .01   *p < .05

All models control for family income and age, sex, and race of teen

<table>
<thead>
<tr>
<th>NETWORK CLOSURE/SUPERVISION</th>
<th>Attd. Measure</th>
<th>Coefficient</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>How much do/does your parent/parents monitor your music, television, and movie watching? (1- Never to 5- Always)</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Attends With Both Parents</td>
<td>.735***</td>
</tr>
<tr>
<td></td>
<td>Attends With One Parent</td>
<td>.298**</td>
</tr>
<tr>
<td></td>
<td>Attends Alone</td>
<td>.098</td>
</tr>
<tr>
<td></td>
<td>Attends Youth Group</td>
<td>.373***</td>
</tr>
<tr>
<td></td>
<td>How much do/does your parent/parents monitor who you hang out with? (1- Never to 5- Always)</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Attends With Both Parents</td>
<td>.424***</td>
</tr>
<tr>
<td></td>
<td>Attends With One Parent</td>
<td>.254*</td>
</tr>
<tr>
<td></td>
<td>Attends Alone</td>
<td>.149</td>
</tr>
<tr>
<td></td>
<td>Attends Youth Group</td>
<td>.231**</td>
</tr>
</tbody>
</table>
The results in Table 5 also indicate that the combined attendance of parents and teens increases network closure. Teens that attend with one or both parents are more likely to have parent(s) that know their friends’ parents well enough to talk to them on the phone. Youth group attendance also has a modest effect in increasing the number of their friends whose parents know their parents. The control variables for family structure and age of the adolescent respondent were insignificant in this model; it is rare that age is not significant in models studying teenagers.
When it comes to supervision and monitoring, teens that attend services or meetings with their parents tend to be more likely to report higher levels. Table 5 shows that when teens attends with one or both parents they are more likely to say that their parents exercise stricter surveillance of their media choices. The effects are significant, albeit fairly weak, for whether parents know what teens are actually doing away from home and whether parents know who their teens are hanging out with. It appears that the social structure of adolescents’ lives is similar whether it involves religion or not; as Hersch (1999) has pointed out, teens are greatly isolated due to the structure of the teenage experience. Females report higher levels of supervision and monitoring than do males. Higher incomes are also associated with lower amount of parental attunement to the people and activities in their teens’ lives. Not surprisingly, older teens report less parental oversight than younger teens.

Unsurprisingly, all forms of religious participation are highly significant (p < .001) when it comes to the likelihood that a teen has gone on a mission trip or service project. Youth group participation seems especially important in regards to this outcome. These variables’ association is highly intuitive, yet is necessary to point out in examining Smith’s (2003) theory. They also have not been tested in any fashion that links them up with adolescent outcomes, so despite sounding trite these findings are relatively novel. The results also indicate that older teens are more likely to have taken a mission trip. Boys are less likely than girls to have been involved in mission or service work.
3.2 Second Stage Models

The second stage models rely on Kaplan-Meier survival curve estimation, which permits consideration of only one predictor variable at a time. The NSYR asked only for teens’ age at first sexual activity. Methods of obtaining hazard rate information such as Cox regression are based on continuous time data (Allison 1984), which is why these analyses use Kaplan-Meier for hazard and survival rate computation. However, the estimators are asymptotically unbiased and normally distributed, and the efficiency of the estimators from Cox regression is not significantly marred by the large interval data used here, as Cox models are more concerned with the effect of predictor variables and not time dependency (Allison 1984; Efron 1977). A fully specified Cox model is used here to assess the significance of each predictor used in the presence of the other predictors and control variables. It is most important to illustrate the change in significance of religious attendance variables when Smith’s (2003) factors are present and absent. As indicated in Table 6 below, the effect of the religious attendance variables is completely washed out in the presence of Smith’s (2003) factors, but becomes highly significant in their absence. One variable, representing youth that attend religious youth meeting without their parents attending religious services, actually goes from being a protective factor against earlier debuts to increasing likelihood of earlier debuts in the presence of Smith’s factors. Also, all of the variables representing Smith’s (2003) factors, with the exception of the measure representing how many of a teens’ friends’ are known to their parents, are significant above the .01 level in the full model. These two findings allow us to proceed to the Kaplan-Meier estimations.
knowing that the variables representing Smith’s (2003) factors are all significant in contributing to the timing of sexual debuts, and that these effects make the effects of religious attendance insignificant in a full model.

The results of the Kaplan-Meier survival curves shown below illustrate one of the practically inevitable weaknesses of the method. As the number of censored cases grows across the interval span, the “risers” (those remaining at risk) in the “step” formation of the survival curve get larger as the denominator in the survival ratio gets smaller. This can be problematic at the longest observation points when there are too few left at risk to get a reliable assessment of the survival rate at the tail end of the curve. While a small portion of the sample remains at the tail end, the censoring pattern is similar across the time intervals. This coupled with the fact that the survival functions all have highly significant logrank test results for between group comparisons (with the exception of “Do your parents monitor who you hang out with”, which has a logrank significance of .09, and the number of friends’ parents teens’ parent knew well enough to call on the phone) indicates that the groups of teens cited in the survival curves have different survival experiences that are based on relatively robust survival rates (Walters 2001).

For most of the survival functions below, the relationships indicate significantly different survival experiences between the different groups of variables. The two variables representing network closure (parents who knew friends’ parents, parents monitor who their teens hang out with) did not produce significantly different survival curves for each subgroup of the variable. Parents that monitored who their teens hang out with were shown in the full Cox model to increase the hazard of their
teens having sex earlier. The remainder of the variables produced hazard curves that corresponded with their hypothesized relationships.

The moral directives elements generated particularly high disparities between opposing subgroups within a variable. Adolescents who perceived their parents to be most disapproving of them having sex showed the greatest differential in survival rate compared to teens who perceived their parents to be most permissive of sex (see Figure 4). Also, teens that thought they should wait until marriage for sex illustrated a much higher rate of survival when compared to teens that thought it was okay for teens to have sex (see Figure 5). Both moral directives variables yielded highly significant test results indicating that the subgroups possessed different survival experiences.

**TABLE 6**

**SIGNIFICANCE OF RELIGIOUS ATTENDANCE IN THE FULL MODEL**

<table>
<thead>
<tr>
<th></th>
<th>Exp(B)</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Model One: Smith's Factors Excluded</strong></td>
<td></td>
</tr>
<tr>
<td>Both Parents and Teens Attend(^1)</td>
<td>0.51***</td>
</tr>
<tr>
<td>Parents Only Attend(^1)</td>
<td>0.82*</td>
</tr>
<tr>
<td>Teens Only Attend(^1)</td>
<td>0.84</td>
</tr>
<tr>
<td><strong>Model Two: Smith's Factors Included</strong></td>
<td></td>
</tr>
<tr>
<td>Both Parents and Teens Attend(^1)</td>
<td>0.89</td>
</tr>
<tr>
<td>Parents Only Attend(^1)</td>
<td>0.97</td>
</tr>
<tr>
<td>Teens Only Attend(^1)</td>
<td>1.08</td>
</tr>
<tr>
<td>Parents Would Be Upset About Teen Having Sex</td>
<td>0.69***</td>
</tr>
<tr>
<td>Parents Monitor Who Teens Hang Out With</td>
<td>1.13**</td>
</tr>
<tr>
<td>Parents Monitor Movies/Music/Television</td>
<td>0.88***</td>
</tr>
<tr>
<td>Nights Per Week with Adult Supervision</td>
<td>1.06**</td>
</tr>
<tr>
<td>Teens Think People Should Wait Til Marriage</td>
<td>0.40***</td>
</tr>
<tr>
<td>Teen Has Been on a Mission Trip</td>
<td>0.88</td>
</tr>
</tbody>
</table>

\(^1\) Reference Category: Neither Attends

\(^* p < .05\)  \(^* * p < .01\)  \(^* * * p < .001\)
Teen participation in mission trips or religious service projects is the measure of extra-community links used in the present analysis. The survival curves are distinct for those teens who have and have not gone on missions trips (see Figure 6 below). Going on mission trips is associated with delays in sexual debut for teens according to survival graph below. Although Smith (2003) characterizes attending religious retreats and camps as “extra-community links” as well, it is unclear that religious camps, retreats, and mission trips truly occur outside the community of their youth leaders and fellow youth group mates. Missions are used here due to their intuitive higher likelihood of involving people outside of the proximate religious community, thus indicating links that are truly “extra-community.”
Figure 3: Do parents monitor who their teens hang out with?

Figure 4: How upset would your parents be if they knew you were having sex?
Figure 5: Should people wait until they are married to have sex?

Figure 6: Has teen ever gone on a missions trip?
Figure 7: Do parents know what teens do away from home?

Figure 8: Do parents monitor teen’s music, TV, and music viewing?
CHAPTER 4

DISCUSSION

Religious participation is frequently used as a measure of overall religiosity in studies on teen outcomes. It offers many advantages to the sociologist. Its easily quantified, its observable, and most importantly, its social. It is understandable that religious participation is often utilized; what is not understandable is why so little is known about how it produces effects associated with it. There are many theories on how peers, schools, and families impact teens; there are few things that are so prevalent in teens’ lives as religion that remain such a mystery.

Looking at the results of this study, it seems like Smith’s (2003) theory has much to commend it. However, it is a broad framework: researchers must be sensitive to the outcomes in question when applying it. The factors from Smith’s (2003) theory I have applied to the question of the timing of sexual debuts are informed by prior literature on sexual debuts. The advance here is the evidence that religious participation’s effects on teens cannot always be measured directly, but it works through mechanisms often conceived as unrelated to religion to forestall sexual debuts.

Do the mechanisms work as predicted by the hypotheses above? The first hypothesis is substantiated in regards to the presence of extra-community links and moral directives. Parent and teen religious participation increase the presence of variables representing both factors. Religious participation increases how much
parents monitor who their teens hang out with and what their teens are doing away from home. The relationship with adult supervision is not as clear cut.

The story with religious participation and supervision is likely a tale of parenting styles. Religious traditions have been linked to different parenting styles (Snider, Clements, & Vazsonyi 2004), and parenting styles tend to dictate levels of child supervision. Supervision, then, is not likely so much a story of how often parents participate in religion but where they go when they do participate. Religious participation measures here contained people from all religious traditions and makes for a different story than if the sample contained only conservative Protestants. Conservative Protestants (evangelicals, charismatics, & Pentecostals) tend to have parenting styles associated with more supervision (Snider et al. 2004). However, it is clear that religious participation, regardless of tradition, tends to increase chances that teens have some level of adult supervision.

The second hypothesis was confirmed through the results above as well. Where it was methodologically appropriate to use a combined variable for parent and teen attendance it proved much stronger than either parents or youth attending church alone. This speaks to the unique social position of adolescents. Adolescents are those trying out autonomy within certain parameters and under certain influences, regardless of whether teens acknowledge being influenced or not (Smith and Denton 2005). It is not solely a story of parents or teens when it comes to understanding the religious lives of adolescents- its both. This relationship is renegotiated across the span of adolescence. More research needs to be done on the how age and grade level within adolescence interact with religiosity to affect teen outcomes.
Religious participation is undeniably associated with delays in sexual debuts based on the responses to the first wave of the NSYR examined here, lending support to the third hypothesis. All three hypotheses are fortified by the effect of religious participation in the partial versus full Cox regression model above. The presence of variables representing Smith’s (2003) factors in a full model render religious participation extremely insignificant, but religious participation is significant in the absence of Smith’s (2003) factors. This points to the fact that there is statistical competition built into most models assessing “direct effects” of religious participation. It seems plausible, given that the presence of three of Smith’s (2003) factors cleared out the significance of religious participation’s direct effects, that most of religion’s effects are mediated by religious mechanisms not necessarily viewed as religious.

Future research on teen outcomes (that are not based on the timing of an event) should employ Smith’s theory in path models, and perhaps pursue more concrete religious mechanisms that impact teens’ lives.

Teen sex has become a matter of increasing cultural ambivalence. It is either devalued or cherished, seen as deviant or a romantic expression of young love, something that disadvantages women and favors men. Religion plays a part in the beliefs about, the decision to have, and the social opportunities that lead to sex. The survival curves above indicate that there are real things in the world that religious participation is associated with that have the tendency to delay sexual initiation. Outcomes as complicated as the timing of teens are likely to have complex inputs. Religion has been shown over the years to have effects on teens having sex, but its serious study can only be fostered by considering religion as something real –
something that is not too sacred for analysis, but also that is not characterized as being essentially something other than it portends itself to be.
CHAPTER 5

CONCLUSION

Religious theories in sociology have by and large ignored the differential impact religion may exert due to a person’s place in the life course. Researchers studying adolescents have found religious participation to be linked with positive teen outcomes, but have done little to advance the academy’s understanding of how religion accomplishes this. Theories offered frequently reduce religion’s generative power to the product of mechanisms that are tailored for the study of other institutions, overlooking the unique social features of religion. The historical relationship between sociology and religion is a dialectic one – a resolution between them is necessary for the social sciences to progress in its understanding of religion’s effects.

The results above indicate that religion is associated with delays in sexual initiation for teens. What is hopefully clear from this paper is that religion is neither irrelevant nor unable to be studied in ways consistent with other substantive areas in teens lives such as sociology of education. Religious research should command a serious space for those considering adolescents. It should not be assumed as universally pro-social in its effects; if religion is to be taken seriously, mechanisms by which religion generates positive and negative outcomes must be understood. A serious research program on religion and adolescents must insist on non-reductionistic characterizations to facilitate thorough elucidation of religious
phenomena. In short, religion must be studied in a means suited to any other substantive area, but in a way that does not reduce religion to another substantive area or series of areas.
REFERENCES


