Religiosity May Stem Risky Sexual Behavior in Girls

Those who scored high on a study's religiosity index were less likely to have had sex than were their peers.

BY DIANA MAHONEY
New England Bureau

ATLANTA — Religious practices and beliefs play an important role in the sexual behavior of adolescent girls, Melanie Gold, D.O., said at the annual meeting of the North American Society for Pediatric and Adolescent Gynecology.

In a study of 572 adolescent girls and young adults aged 13-21 years, those who scored high on a religiosity index were less likely to have ever had sex than were their peers who scored low on the index, said Dr. Gold of the Children's Hospital of Pittsburgh. Additionally, "sexually active participants with low religiosity had sex more frequently in the past month and had more lifetime partners" than did those with medium or high religiosity scores, she said.

"Previous studies have found that high religiosity in adolescent girls is associated with delaying initial sexual activity and fewer sexual partners. Yet other studies have also linked high religiosity with decreased use of condoms and hormonal contraception in this population, leading to conflicting opinions about whether religiosity is a protective or a risk factor for unintended pregnancy, sexually transmitted diseases [STDs], and sexual risk-taking behavior," Dr. Gold said. Because of this, the current study was designed to examine religiosity as both a protective and a risk factor for these outcomes.

Toward this end, the investigators developed a religiosity index based on four items: religious affiliation, frequency of attendance at religious services, the impact of religion on beliefs about sex, and the impact of religion on beliefs about contraception. They used multiple regression analysis to examine the relationship between the index scores and sexual, reproductive, contraceptive, and STD history in a cohort of predominantly minority adolescent girls recruited from an urban, hospital-based adolescent care clinic, Dr. Gold said. Scores on the religiosity index ranged from 4 to 17, with scores of 4-7 considered low religiosity; 8-11, medium religiosity; and 12-17, high religiosity. With respect to participant characteristics, 59% of the population was black and 32% was white and the mean age was 17.4 years, Dr. Gold said. Additionally, 68% of the young women reported being sexually active with a mean age at first intercourse of 15 years, and among the sexually active cohort, 17% had ever been pregnant and 25% had ever had an STD, she said.

In terms of religion, 74% of the study population had a religious affiliation, 33% attended religious services weekly or more, 22% never attended services, and 19% went once or twice a year, said Dr. Gold. Most (32%) of those reporting a religious affiliation identified themselves as Baptists, followed by Roman Catholics (16%), and other Christian denominations, she said. Of the full study population, 19% said that their religious beliefs had a high impact on decisions about sex and 25% said their beliefs substantially affected their decisions about contraceptive use.

Based on the religiosity index scores, 20% of the participants met the criteria for high religiosity, while 40% each met the criteria for medium and low religiosity, Dr. Gold noted.

According to the logistic regression model, participants with high religiosity had a significantly lower odds ratio for ever having had sex. "The adjusted model demonstrated that individuals in the high-religiosity group were 78% less likely to have ever had sex compared with those in the low religiosity group," said Dr. Gold. Among those who had ever had sex, she noted, "those with high religiosity had a significantly lower odds ratio of having had frequent sex [more than six times in the past month], and those with medium religiosity showed a nonsignificant trend in the same direction."

In addition, those with high religiosity also had a significantly lower odds ratio for having had at least four lifetime partners, and those with medium religiosity again showed a nonsignificant trend in the same direction, she said.

Regarding history of pregnancy or sexually transmitted disease, "among the participants who had ever had sex, those with medium religiosity had significantly lower odds ratios for ever being pregnant and for ever having a sexually transmitted disease," said Dr. Gold.

Nonsignificant trends in the same direction were observed among those with high religiosity, she said.

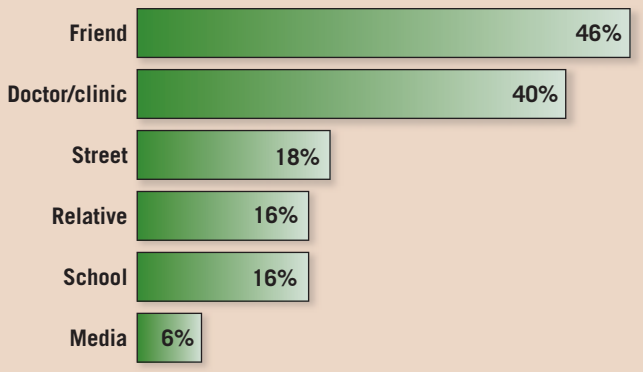
No associations were seen between level of religiosity and age at first coitus, history of pregnancy or sexually transmitted diseases, contraceptive method used at last sex, or future sexual and contraceptive plans, Dr. Gold noted.

"Based on our findings, religiosity appears to be a protective factor, both in terms of delaying first sex in adolescent girls, as has been shown in other studies, but also with respect to sexual risk-taking behaviors among girls who are already sexually active," Dr. Gold said. "It's important to point out, however, that not all of the relationships were statistically significant," she said. "Also, the findings are limited by a number of factors, including the overrepresentation of Baptists relative to the general population and the fact that the participants knew they were enrolling in a study looking at the relationship between religious beliefs and practices and sexual behaviors, which could have led to selection bias."

Despite these limitations, the findings do suggest that clinicians who provide reproductive health care to adolescents "should routinely ask their patients about religiosity—particularly the frequency of attendance at religious services and whether and to what degree religious beliefs affect decisions about sex and contraception—since it does play into sexual risk behaviors," Dr. Gold said. ■

DATA WATCH

Where Teenage Girls Are Getting Medical Abortion Information



Note: Based on a 2005-2006 survey of 50 girls aged 13-19 years.
Source: Dr. Mandy S. Coles

Elsevier Global Medical News

Breast MRI Spurs Surgical Management Change in 10%

BY MARY ANN MOON
Contributing Writer

Breast MRI prompts beneficial changes in the surgical management of approximately 10% of women with newly diagnosed breast cancer, Dr. Karl Y. Bilimoria and his associates reported.

Preoperative breast MRI detected additional, otherwise undetectable malignancies in either the ipsilateral or the contralateral breast in 1 of 10 subjects in a study of 155 women with newly diagnosed breast cancer.

Still, the imaging procedure also carried a "considerable" 80% false-positive rate, heightening patient anxiety and leading to further diagnostic work-ups that ultimately proved to be unnecessary, wrote Dr. Bilimoria and his associates at Northwestern University, Chicago.

Of even more concern was the fact that the MRI results prompted more extensive surgery than originally planned in several cases in which it was later found that the less extensive surgery would have sufficed. These included two ipsilateral mastectomies and three contralateral prophylactic mastectomies that later proved to have been unnecessary.

To determine how routine breast MRI would affect surgical management of newly diagnosed breast cancer, the researchers reviewed data from 155 women aged 34-75 years who were diagnosed and treated by a single surgeon in 2005-2006. All had undergone "exhaustive" evaluation by mammography and ultrasonography, then biopsy of the suspicious lesion, after which a surgical plan had been developed (Arch. Surg. 2007;142:441-7).

At that juncture, bilateral breast MRI was performed. If any additional lesions were detected, the patient had second-look ultrasonography or mammography, followed in some cases by biopsy of the MRI-detected lesion. The original surgical plan could then be altered according to the results of these exams.

Overall, breast MRI changed the surgical plan in 36 (23%) of the study subjects. Ten women who initially were scheduled for breast-conserving therapy were "upgraded" to mastectomy, and 21 required a wider excision but still were able to have a lumpectomy. The remaining five had an MRI-detected lesion in the contralateral breast and underwent prophylactic mastectomy.

Pathologic findings showed that switching to more extensive surgery was appropriate because suspicious lesions proved to be malignant in 8 of the 10 who upgraded to mastectomy, 5 of the 21 who upgraded to wider excision, and 2 of the 5 who had prophylactic mastectomy of the contralateral breast. Thus, the change in surgical plan was deemed "beneficial" in 42% of the women who had such a change, which was approximately 10% of the entire study population, Dr. Bilimoria and his associates said.

"Therefore, 10 women must undergo a breast MRI for 1 to have a beneficial change in management," they said.

The overall false-positive rate in this study was 80%, because 58 of the 73 MRI-detected suspicious lesions proved to be benign.

The researchers acknowledged that some experts would consider many of the malignant MRI-detected lesions to be clinically irrelevant. "However, if we believe that it is important to clear lumpectomy margins of microscopic disease to minimize the risk of local recurrence, it would follow that small foci detected on MRI also warrant identification and excision," they said.

In a written discussion accompanying this report, Dr. Baiba J. Grube of Yale University, New Haven, Conn., said that although the authors deemed changes in the surgery plan to be "beneficial" if suspicious lesions proved to be malignant, clinicians should do so only if the surgical "upgrades" improved patient survival or quality of life—two factors that were not addressed in this study (Arch. Surg. 2007;142:445-6). ■