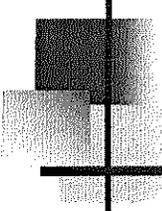


# An Evaluation of an Abstinence Only Sex Education Curriculum: An 18-Month Follow-up

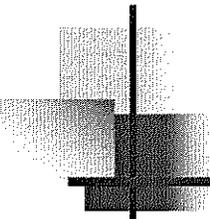


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Fayetteville, AR 72701



# Introduction

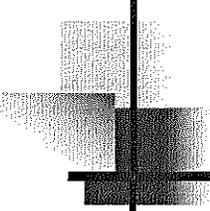
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- Federal involvement in abstinence education began under President Reagan with the Adolescent Family Life Act administered by the Office of Adolescent Pregnancy Programs (OAPP).
- In 1996 a provision was added to the Welfare Reform Act that block-granted abstinence education funds to states.
- More recently abstinence education grants have been awarded directly to community groups under the SPRANS (Special Projects of Regional and National Significance), and CBAE (Community Based Abstinence Education).

# Introduction

- Critics of abstinence education programs have indicated that such programs are ineffective in reducing sexual behavior among teens.



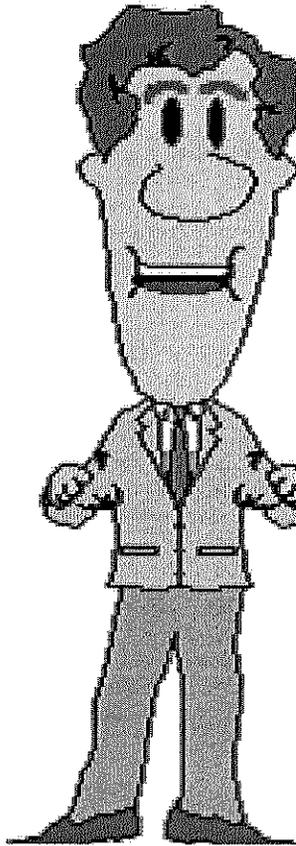


# Introduction

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- A review of published evaluations of abstinence education curricula indicates, however, that rather than research showing that abstinence programs are not effective, there are simply few studies that have examined the impact of abstinence education on student sexual behavior.
- The program with the most published evaluations is the *Sex Can Wait* curriculum series.

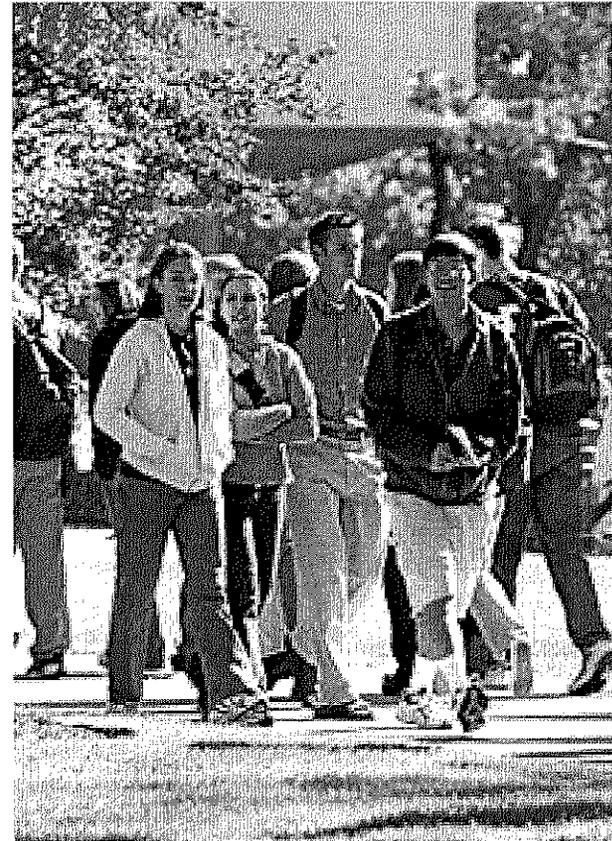
# Purpose of the Study

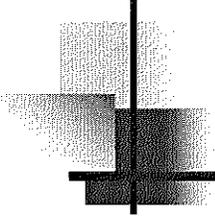


- In spite of no follow-up data, the published studies evaluating *Sex Can Wait* have shown, in a number of instances, positive behavioral effects. This study examines the results from an 18-month follow-up evaluation of the *Sex Can Wait* curriculum series.

# Method - Sample

- Participants for the study were students from 15 school districts recruited to participate in the project, including upper elementary, middle school and high school students.

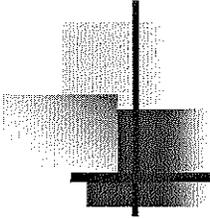




# Method - Study Design

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- Schools were divided by grade level into treatment grade levels that taught the *Sex Can Wait* curriculum and comparison grade levels that taught their regular curriculum (health education with a sex education component).
- The program was offered at three levels: upper elementary (grade 5 or 6), middle school (grade 7 or 8), and high school (grade 9 or above).



# Method – Study Design

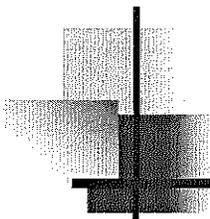
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- Schools were counterbalanced so data were collected at all grade levels from both the treatment group and the comparison group.
- Because these schools had existing sexuality education programs, the study compared the effects of the *Sex Can Wait* curriculum to “current practice” rather than true “control” conditions.

# Method - Study Design



- To be included in the analysis, individuals had to have a matching pretest and 18-month follow-up measure.
- Across the three levels of the curriculum, of the 1,421 students who took the pretest, 1,195 (84%) had a matching posttest score; 680 (57%) had a matching follow-up score.

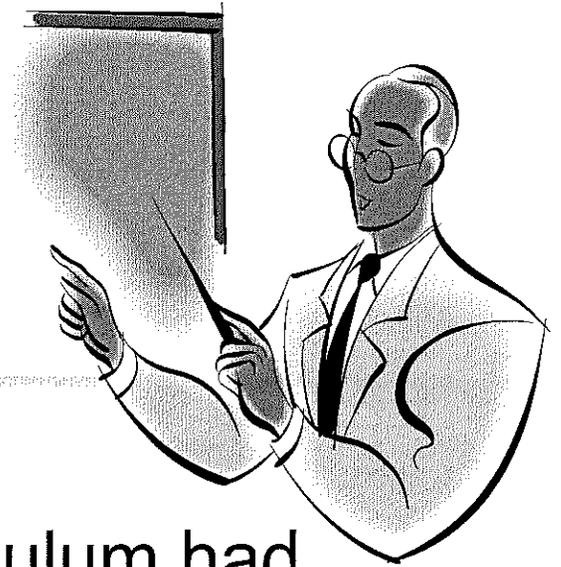


## Method - Curriculum Intervention

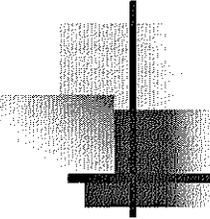
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- The abstinence only curriculum intervention was the *Sex Can Wait* curriculum series, consisting of upper elementary, middle school, and high school components.
- The program is a five-week, abstinence education curriculum, consisting of 23 lessons at the upper elementary level and 24 lessons at both the middle school and high school levels.

# Method - Curriculum Implementation



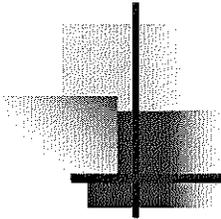
- Teachers implementing the curriculum had participated in a training workshop where they could
  - Understand the rationale for the curriculum,
  - See lessons from the curriculum modeled by skilled trainers,
  - Present a lesson themselves
  - Learn and practice a model for dealing with controversial issues and student questions.



# Method - Testing Instruments

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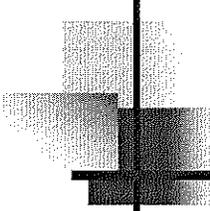
- The process evaluation involved using teacher reaction sheets and teacher checklists.
- The evaluation of the impact of the program on student outcomes involved the use of a student self-report questionnaire.



# Method - Testing Instruments

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- The questionnaire for students in grade seven and lower included two questions addressing sexual behavior.
- The questionnaire for students in grades eight and above included five additional sexual behavioral questions.



# Method - Testing Instruments

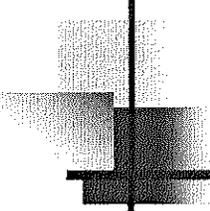
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- The questionnaire had 78 items that included
  - knowledge items
  - an attitude scale
  - the Hopelessness Scale for Children
  - a scale dealing with initiation and persistence
  - a scale on student decision-making behaviors
  - three items representing sexual behavioral intent
  - two yes/no items asking whether students had ever participated in sexual intercourse and whether they had done so in the last 30 days.

# Method - Procedure

- Students voluntarily, with written parental consent, completed the questionnaire on a pretest basis, in their regular classroom setting, prior to the implementation of the curriculum.





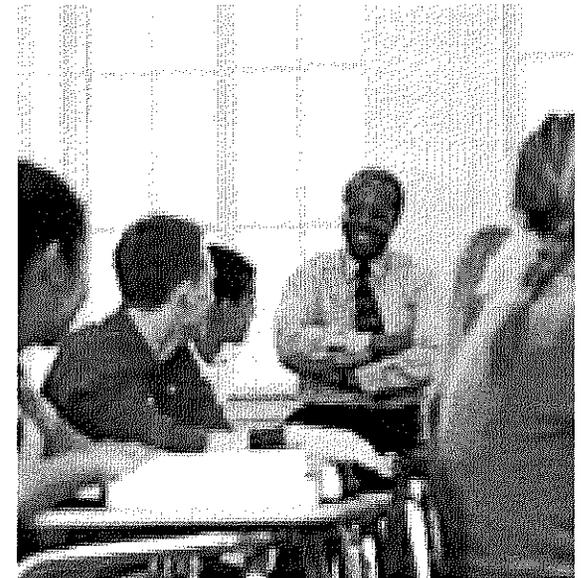
# Method - Procedure

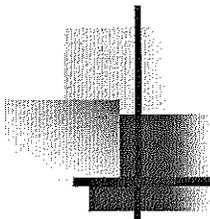
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- Students' scan sheets were coded to match an individual student's responses from different testing times.
- A member of the research team read the questionnaire to the upper elementary students. A copy of the questionnaire was also projected on a screen using an overhead projector.
- Middle school and high school students were given a questionnaire booklet. They marked answers on their scan sheets at their own pace.

# Method - Procedure

- Following the pretest, the *Sex Can Wait* curriculum series was taught in all school districts by a teacher trained in the use of the curriculum.
- After completion of the program, all students were again surveyed, using the same instrument and following the same protocol.
- They were surveyed again a third time approximately 18 months following the posttest.

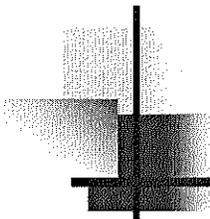




# Method - Data Analysis

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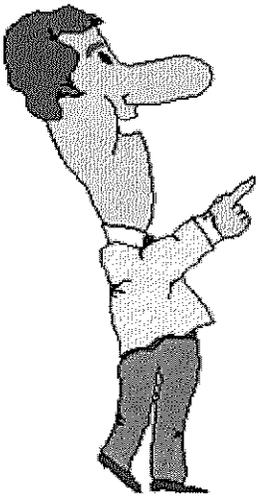
- Data were analyzed using SPSS procedures.
- The research design for the study was a quasi-experimental, pretest-posttest-followup comparison-group design.
- Analyses of covariance used the pretest as the covariate and compared adjusted means for the two groups (treatment and comparison) for all interval-level variables.
- Logistic regression was used to determine whether the treatment and comparison groups differed on sexual behavior at posttest and at follow-up, when controlling for virgin status and behavioral intent at pretest.

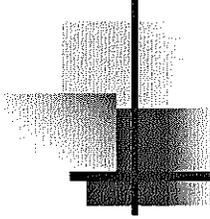


## Results - Upper Elementary

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- Matched pretest-posttest data were obtained from 301 students and matched pretest-18 month follow-up data were obtained from 196 students. The pretest-posttest students included: 189 whites (65%), 91 African-Americans (31%), Hispanics, Asian Americans, and American Indians were also represented.

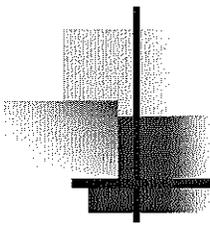




# Results - Upper Elementary

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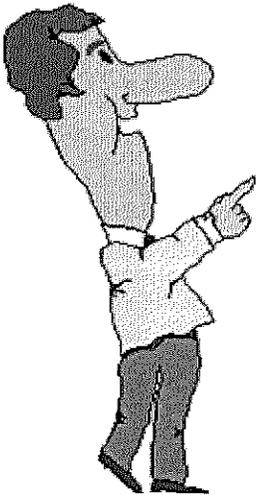
- Results of the analysis of covariance indicated the *Sex Can Wait* group had
  - a higher level of knowledge,
  - more hopefulness for the future
  - greater self-efficacythan did the comparison group.
- There were no differences at posttest between the treatment group and the comparison group relative to behavior .



# Results - Upper Elementary

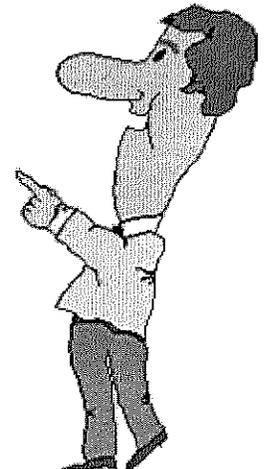
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- At 18-month follow-up the *Sex Can Wait* group
  - Had a higher level of knowledge
  - Was less likely to report participation in sexual intercourse in the last month than the comparison group.



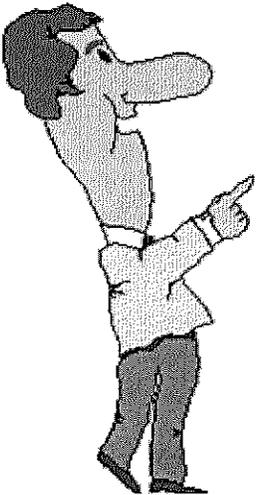
# Results - Middle School

- Matched pretest-posttest data were obtained from 605 students and matched pretest-18 month follow-up data were collected from 241 students. The pretest posttest students included: 453 whites (76%), 128 African-Americans (21%), as well as Hispanics, Asians, and American Indians.



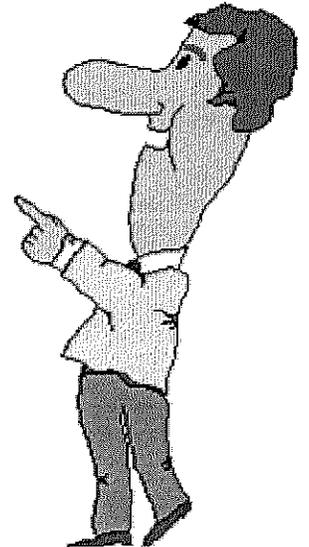
# Results - Middle School

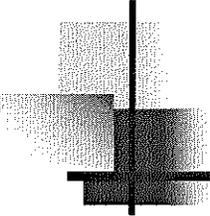
- At the Middle School level results of the analysis of covariance indicated no statistically significant posttest differences between the *Sex Can Wait* treatment group and the comparison group.
- At 18 month follow-up the *Sex Can Wait* group was significantly less likely to report participation in sexual intercourse ever, and in the last month.



# Results - High School

- Matched pretest-posttest data were obtained from 287 students and matched pretest-18 month follow-up data were obtained from 244 students. The pretest-posttest students included: 262 whites (92%), 9 African-Americans (3%), as well as Hispanics, Asians, and American Indians.

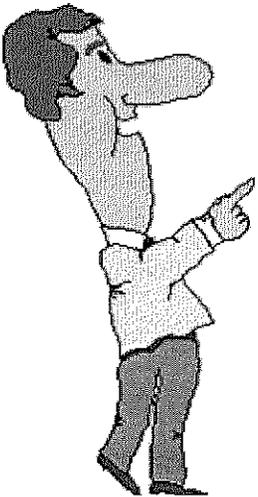


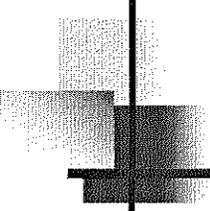


# Results - High School

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- The *Sex Can Wait* students at posttest
  - Had attitudes more supportive of abstinence
  - Had greater intentions to remain abstinent
  - Were less likely to report having sexual intercourse, ever and in the last month.
- At follow-up the *Sex Can Wait* group
  - Scored higher on knowledge
  - Indicated a greater intent to remain abstinent.

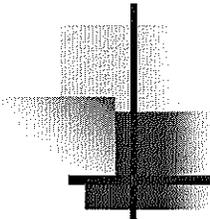




# Discussion

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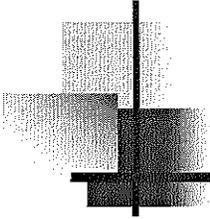
- The purpose of the study was to evaluate the effects of the *Sex Can Wait* curriculum series.
- Upper Elementary
  - short-term gains in knowledge, self-efficacy, and a more hopeful outlook,
  - long-term gains in knowledge and reduced likelihood of participation in sexual intercourse in the last month.



# Discussion

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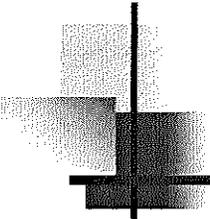
- Middle School
  - no statistically significant short term benefits
  - long-term gains in knowledge, reduced likelihood of participation in sexual intercourse ever and sexual intercourse in the last month.



# Discussion

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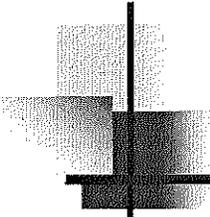
- High School
  - short-term gains in attitudes supportive of abstinence, intent to remain abstinent, reduced likelihood of sexual intercourse ever and in the last month.
  - long-term gains in knowledge, and intent to remain abstinent.



# Discussion

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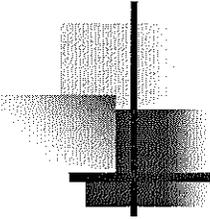
- Although the curriculum series demonstrated a statistically significant effect for several variables, including sexual behavior, in most cases the effect size was modest.
- The findings support Kirby's observation that there are many influences on adolescent sexual behavior and teen pregnancy, but none of them account for a substantial amount of the variation in behavior.



# Limitations

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- We could not randomly assign schools to treatment and control groups and instead used in-house comparison groups.
- Reliability for the various scales was determined using a measure of internal consistency, rather than a test-retest of reliability, and for some of these the alpha was low.



# Limitations

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- There are always concerns about the validity of self-report data.
- We found some logical inconsistencies in student responses - for example, some students reported having intercourse in the last 30 days, but also reported never having had intercourse.

# Limitations - Attrition

## **MISSING** HAVE YOU SEEN KRIS?



Name: KRIS SYRZYCKI

Date of Birth: August 1, 1985  
Height: 5' 11"  
Weight: 155 lbs.  
Build: Slim  
Hair: Dark Blonde  
Eye Colour: Blue

Missing Since: June 29, 2002  
Missing From: Coquitlam, BC

**Circumstances:** Kris was last seen in Coquitlam, BC. He was very distraught at the time of his disappearance.

IF YOU HAVE SEEN KRIS OR KNOW OF HIS WHEREABOUTS, PLEASE CALL THE COQUITLAM RCMP AT 604-945-1500 OR CALL THE:

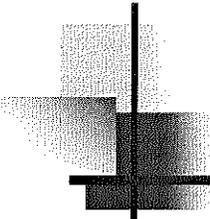


MISSING  
CHILDREN  
SOCIETY OF CANADA

1-800-661-6160

email: [info@mcsc.ca](mailto:info@mcsc.ca)  
or (403) 291-0705

- There was also a sizable group of students who were lost to follow-up. This is a potential threat to the internal validity of the study in that outcomes for the students who were lost to follow-up might have been different from those students for whom data were available.



## Limitations - Treatment Diffusion

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- Because treatment students and comparison students attended the same school, the design is susceptible to treatment diffusion.
- Any treatment diffusion, however, reduces the amount of difference between the treatment and comparison groups, making it more difficult to detect significance. Any statistically significant results are in spite of treatment diffusion, not because of it.

# Conclusions

- In spite of the limitations associated with the study, for those interested in abstinence education, these results are encouraging. They should be considered by educators and others interested in programs to help young people abstain from sexual involvement.





**Accession No.** 16589

**Title:** An Evaluation of an Abstinence Only Sex Education Curriculum: An 18-Month Follow-Up

**Author(s):** Young, M.  
Denny, G.

**Year:** unknown

**Format:** Report

**Language** English

**Organization:** University of Arkansas

**Source:** University of Arkansas

**Abstract:** In this report, the authors present results from an 18-month follow-up evaluation of the Sex Can Wait abstinence education curriculum. The program was implemented at upper elementary, junior high, and high school levels in 15 different school districts. Students in all intervention and comparison groups (n=1,421) completed a questionnaire before and after implementation of the curriculum and again approximately 18 months later. Students who received the Sex Can Wait curriculum were compared to those who received the existing sex education program. At the upper-elementary level, students who received the Sex Can Wait curriculum showed short-term gains in knowledge, self-efficacy and a more hopeful outlook for the future, and long-term gains in knowledge and reduced likelihood of participation in sexual intercourse in the last month. At the middle school level, the Sex Can Wait group showed no significant short-term effects but they had long-term gains in knowledge and reduced likelihood of participation in sexual intercourse ever and in the last month. At the high school level, students in the Sex Can Wait group had short-term gains in attitudes supportive of abstinence, intent to remain abstinent, and reduced likelihood of having sexual intercourse ever and in the last month; this group also showed long-term gains in knowledge and intent to remain abstinent.

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