

Commentary

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Outcomes of a Prospective Trial of Student-Athlete Drug Testing: The Student Athlete Testing Using Random Notification (SATURN) Study

Linn Goldberg, M.D., Diane L. Elliot, M.D., David P. MacKinnon, Ph.D., Esther L. Moe, Ph.D., Kerry S. Kuehl, M.D., Dr. P.H., Myeongsun Yoon, M.A., Aaron Taylor, M.A., and Jason Williams, M.A.
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This article reports the results of an eagerly anticipated two-year prospective randomized trial of drug and alcohol testing, more commonly known as Random Student Drug Testing (RSDT), of student athletes. Results were measured by a voluntary survey of students conducted five times: once prior to testing, and subsequently at the end and beginning of two school years during which student-athletes in the intervention schools were subject to testing. In addition to substance use, the survey asked questions about related attitudes and beliefs. The study also looked at variables potentially related to drug use, including risk taking behaviors. The evaluation design was two-armed: schools using RSDT were compared to schools not using RSDT. Eleven schools were prepared to start RSDT of which five were selected randomly to begin while the other 6 control schools delayed starting RSDT for 2 years.

The results of this study were mixed. Several results were paradoxical. When past year data on drug and alcohol use were examined, at the end of the first full year of testing at the RSDT schools, both self-reported illicit drug use and a combination of illicit drug and alcohol use were reduced. At the beginning of the second school year, past year self-reported illicit drug use was not lower than the non RSDT schools, but when alcohol use was added to drug use, there was a significant reduction. However at the end of the second school year, there was no reduction of illicit drug use or the combination of illicit drug and alcohol use over that year. Finally, at the last assessment, there was a reduction of past year drug use, but when alcohol was added to the illicit drug index, the deterrent effect of RSDT was not found.

The questionnaire also asked about past month self-reported illicit drug use alone and in combination of illicit drug and alcohol use. During each of the survey periods during the two implementation years of the study, no past month reductions were found for illicit drugs, alone or when alcohol use was combined with illicit drug use for the RSDT schools compared to the control schools.

Paradoxically the athletes in the RSDT schools reported less belief that authorities in their schools were opposed to drug use. They also reported greater risk-taking behavior. The athletes in the RSDT schools believed less in the benefits of testing and less that testing was a reason not to use drugs than did the student-athletes in the control schools that did not test for drugs and alcohol.

This study leaves unanswered many questions, the answers to which can be only speculative. For example, what contributed to the climate of skepticism about drug testing in the RSDT schools? Was it possible that the values of school personnel were in conflict with the testing policies of the school? It did appear that the schools administrations were committed to RSDT, as were their school boards in all 11 study schools.

The impact of the methodology that required all of the schools to prepare to implement RSDT also invites conjecture. Once all eleven schools had reached this point, on a random basis testing in the six control schools was deferred. These schools, having gone through the long and highly public process of deciding that they were ready to implement RSDT may already have experienced significant reductions in drug and alcohol use based on the pre-study preparation and the expectation of starting testing at the end of the two-year delay. Student and family values and beliefs may have been affected in this process. The control schools continued whatever prevention programs they already had in place during the study period. At the RSDT schools there may have been an inflated expectation of the deterrent power of RSDT. It is possible that when drug testing was introduced at the RSDT schools other efforts to reduce drug use received less emphasis, with the expectation of prevention resting on the experience of drug testing alone. While there were some deterrent effects from the RSDT program, they were intermittent.

An interview with the lead author of the study subsequent to publication made it clear that this single study does not refute the preventative effectiveness of RSDT. Many more studies are needed to better understand the complex impact of RSDT on a school population. Even if this study had shown clear-cut results, one study is not sufficient to show that an intervention is or is not effective. It is the cumulative body of research over the course of many studies that support or disprove interventions. It is important that these findings be supplemented by more research from other studies. Data from a number of research and evaluation projects currently underway studying the effects of RSDT are likely become available within the next few years. No doubt they will both increase and also perhaps further cloud our understanding of this promising new prevention strategy. Ambiguous results are common results in research, and should not be a reason to abandon a promising program like RSDT.

The mixed results reported in this study have been seized upon eagerly by long-time opponents of school drug and alcohol testing who view the results as a vindication of their position that RSDT is not a deterrent to student drug and alcohol use. Advocates of RSDT, having long supported drug testing as being an effective, non-punitive preventative measure, have been disappointed by the lack of clarity in the published results as well as the lopsided media spin that has captured headlines. Undaunted by critics or by early research findings such as these, more and more schools are adopting RSDT as part of their comprehensive drug and alcohol prevention programs that also include student assistance and educational programs.

RSDT programs reinforce other messages from the school and local community as well as from the wider national community that drug and alcohol use by teenagers is unhealthy, illegal and profoundly unwise. For the few students who do test positive, these programs provide a hope for a drug-free future through family and individual counseling and referral to treatment if needed. Almost all of the schools that have implemented RSDT programs have found them to be affordable, practical and effective.

Robert L. DuPont, M.D.

President, Institute for Behavior and Health, Inc.

First Director, National Institute on Drug Abuse (NIDA) 1973 to 1978