

# DRUG TESTING ORAL FLUID TESTING *Arrives*

**Experts say employers can cut costs and stop adulterated tests by taking advantage of the new method.**

*by Ken Kunsman*

**T**he vast majority of Fortune 500, and a growing number of small- to mid-sized businesses, have embraced substance abuse testing as a means to optimize safety, productivity, and employee health. Effective anti-drug programs can reduce lost time accidents, diminish absenteeism, curtail theft problems, minimize health care costs, and improve on-the-job performance.

While the question WHY companies should implement a drug testing program is often clear, many businesses still wrestle with another question: HOW should the drug testing be done? For every organization, the decision criteria are different. Factors such as cost, employee turnover, and chain of custody issues all matter. Urinalysis, currently the standard methodology for most programs, is accurate but has its drawbacks. The “yuck factor” of handling urine specimens, the prevalence of sample adulteration, and the cost of organizing sample collection have some drug testing program administrators searching for alternatives.

For the first time, employers have a viable option—the oral fluid option. It can be used to detect the NIDA-5 panel with more convenience than traditional testing, but without compromising accuracy and reliability. Here’s why oral fluid testing makes sense to many companies.

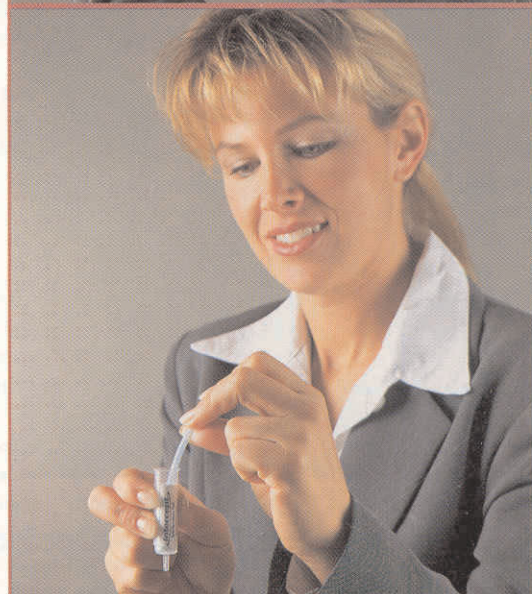
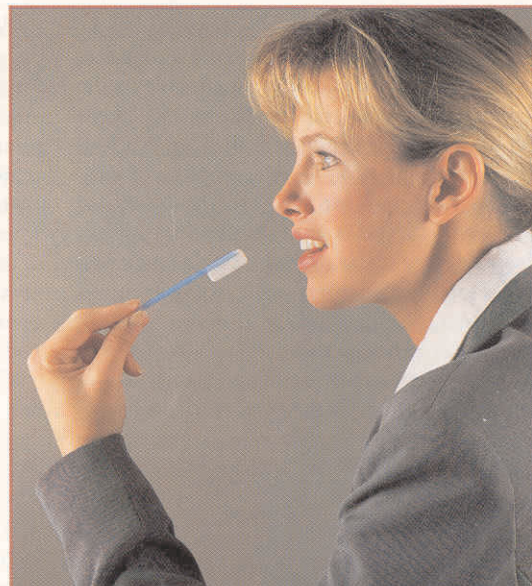
## **Dignity**

Let’s face it. Given the choice to urinate in a cup or provide an oral fluid sample, most people will choose the latter. One of the strongest criticisms of the urine testing process is that it is demeaning or invasive.

With the latest oral fluid testing system, a person simply places a swab in his or her mouth. When the collection pad is saturated, the test subject then places the swab in a collection vial, snaps off the handle, seals the container and hands it over for analysis.

With the older urine model, employees often find it awkward or embarrassing when they are asked to fill a sample cup with urine. Test administrators handling, pouring, and sealing the samples can find the process uncomfortable, as well.

Jude Deanes, Human Resources Manager for the Donnelly Corporation, oversees a progressive, random drug testing program at the company’s facility in Holland, Michigan. While she has seen the positive impact of the effort to maintain a drug-free workplace, she still has issues with the standard methods used to test employees. “I hear from employees that they disapprove of being asked to provide a urine sample for drug tests, and frankly, it’s a process I don’t enjoy myself. It can be awkward to request a sample,” said Deanes.



STC TECHNOLOGIES INC.

## Control

Ironically, not all test subjects disapprove of the urinalysis method. Adulterating test samples has become an underground science, as evidenced by the scores of Internet web sites advertising various methods and products designed specifically to help drug users beat urine tests. Unfortunately, the result of this is that the 'savvy' drug users (usually the heavy or regular users) are in tune with the effective ways to foil urine tests.

Thus, despite the good intentions of the testing program, the people most in need of intervention and rehabilitation are able to slip through the cracks and cheat their employers. It's a growing problem, one that Dr. Michael Peat, President of substance abuse testing for LabOne, Inc., is all too familiar with. "Someone adulterating a test is more likely to be a heavy drug user," said Peat. "And now this person is deliberately tampering with the specimen, which is an indication of dishonesty. Most companies consider that kind of dishonesty a reason for immediate termination, even when a positive drug test result would not have been."

With the increased use of the Internet, drug users have access to information as to how to beat a urine drug test. The focus of the adulteration business is to destroy the THC metabolite. There are companies that make materials to beat a urine test, and some of them are very effective. Even drinking lots of water is a way to dilute a drug specimen. A company performing random tests may send some tests to the lab, fully expecting them to come back positive, and they come back negative. That hurts their program.

"The reason for a program is to deter drug use in the workplace," Peat said. "If you wanted to catch everyone, you would need a random rate of 500 percent. Oral fluid is a great deterrent because it can be done immediately in the workplace. It does not give an individual a chance to adulterate or substitute a urine specimen."

Vern Jones, President of Alternative Safety Testing Solutions, Inc., who has been involved with workplace drug testing programs since 1982, agrees adulteration is an issue that affects the credibility, and ultimately the effectiveness, of a program. He notes that roughly four percent of all urine tests show signs of adulteration.

"Employees who want to be aggressive about drug testing are the ones who want to have greater control over issues like safety," said Jones. "And as part of the push to do everything they possibly can to ensure worker safety, they are looking for a means to enhance the effectiveness of drug testing programs. That includes steps like random testing, or testing with probable cause. The oral fluid methodology takes it to yet another level, because oral fluid testing allows easy collection in almost any setting, and it minimizes the risk of tampering."

## Reliability

Of course, a key concern for drug testing program administrators is test result integrity. In other words, are oral fluid tests as reliable as urine tests?

It's a viable question. On-site oral fluid tests have yet to demonstrate through published clinical data comparable sensitivity and specificity to urine tests. Laboratory-based oral fluid tests, however, have shown comparable ability to detect drug use when compared to laboratory-based urine tests.

Peat and other toxicologists familiar with oral fluid testing stress that the laboratory uses the same testing procedures currently used for urine testing. The immunoassays used in screening and gas chromatography/mass spectrometry used for confirmation of oral fluid tests are a next generation of the same technology proven in urine testing programs-and the courts-for the past 20 years. In order to be cleared by the U.S. Food & Drug Administration, the laboratory system for oral fluid testing had to demonstrate equivalence to established standards.

Another key performance variable is that oral fluid testing reflects recent drug use, while other methodologies can only indicate the drug had been present in a test subject's body at some point in the past. Traces of drugs can linger in urine samples for three or more days after use. For workplace accident investigations, that can cloud the picture of whether or not drug use was a probable cause. On the other hand, it takes nearly a week before signs of drug use are apparent in a hair sample, so hair testing is often inaccurate in terms of determining immediate, on-the-job, drug abuse.

*"Oral fluid testing allows easy collection in almost any setting, and it minimizes the risk of tampering."*

-Vern Jones, President of  
Alternative Safety Testing Solutions, Inc.

"There are points early after the use of a drug-particularly marijuana-when an oral fluid sample may be more efficient because that sample would show the drug use, while a urine sample would not," Peat explained. "By contrast, there are points late after use of a drug-maybe 36 hours-when residual drug is being excreted and the urine sample will be positive, but not the oral fluid sample. But there are no demonstrated effects of marijuana that long after use. Employers are more interested in detecting the heavy drug user, the daily user, the person who smokes before he comes to work or during lunch, those trying to beat the test. In all these situations, oral fluid testing will be effective."

## Cost

There is another practical issue that affects the drug testing scenario: cost. Many businesses have found drug testing makes bottom-line sense, however, the method used to drug test employees is ultimately a cost consideration.

Companies want to maintain a drug-free workplace, but they also want to minimize the dollars and manpower invested in their program. How drug testing is handled within a company can have a significant financial impact. And, according to Jude Deanes, that impact often transcends the actual price of the drug testing product.

"Time is an important factor in terms of overall cost-effectiveness," said Deanes. "According to government regulations, you must allow three hours for a urine sample to be collected. If an employee is unable to produce a sample, you have to wait. And that can lead to lost time on the job, and diminished productivity. With oral fluid testing, we have the ability to collect a sample almost anywhere, anytime. And that allows us to keep workers on the job more efficiently."

Another key factor in the drug testing equation for many companies is the cost



of outsourcing the collection process altogether. Some firms are able to sidestep the costs associated with contracting with third parties to schedule and conduct testing by using oral fluid testing and gathering samples in-house.

“The issues associated with a urine collection and the difficulty of obtaining good collection sites are more prominent today than ever before,” Peat said. “Oral fluid collection, by contrast, is very user-friendly, easy to do, and can be performed by the donor in the presence of an observer any time and anywhere. There does not need to be a third-party collector, which eliminates that added collection fee.”

### Weighing the Options

Considering these variables, how does a company know whether oral fluid testing is a feasible alternative? And how do managers know whether oral fluid testing is the right solution for them at this time?

Peat believes specific sectors of the business-based drug testing market can realize immediate benefits. He divides the workplace market into three categories: the segment regulated by the federal government (mainly the U.S. Department of Transportation), the unionized labor segment, and the “non-regulated, non-labor”

market, which accounts for about 40 percent of all workplace testing. It is this final group that can move most quickly toward a new testing technology.

“Because of the regulatory input and influence in the workplace market, this group is, by and large, not going to be on the leading edge when it comes to implementing new technology,” he said. “Clearly, in LabOne’s experience with oral fluid testing, we saw the insurance industry move first to adopt the new technology. With on-site testing, we saw criminal justice and medical markets move quickly. The workplace is definitely the slowest. But ultimately, a number of companies will recognize that this change to oral fluid testing will benefit their programs, particularly when they see how oral fluid testing can reduce the cost of collection and virtually eliminate the chance of adulterated, substituted, or diluted samples.”

To Vern Jones, the potential benefit of oral fluid testing is clear-cut for companies of all sizes. “I used to believe that a coordinated drug testing program would most benefit larger companies, and that is where a lot of the past focus has been,” said Jones. “But one drug user on a staff of 15 can seriously damage a business, and in some cases, destroy it. Having a more convenient but equally reliable means to safeguard against job-site drug use is an important advance

for companies of all sizes, especially as the ‘traditional’ American business changes and evolves.”

Will the change occur overnight? Likely not. Though many businesses claim innovation as their lifeblood, it is difficult to be among the first to change. The introduction of any new idea, whatever its value, is bound to be met with conservative or cautious resistance.

But the fact remains that oral fluid drug testing has recently achieved a new level—a level that allows this methodology to compete with conventional urinalysis in terms of cost, convenience, and reliability. Perhaps most important, oral fluid testing could open the door to a new era of illicit substance abuse prevention, one that safeguards the goals of maintaining healthier, safer, and more productive job site, without compromising employee dignity.

It’s a concept whose time has come...and one certainly worth investigating further.

---

*Ken Kunsman, Business Unit Manager for Oral Fluid Testing Products at STC Technologies, Inc. of Bethlehem, Pa., is a board member with the Substance Abuse Program Administrators Association and a sustaining member of the Drug and Alcohol Testing Industry Association. He is a certified instructor for DOT saliva and alcohol testing.*

**Discover the oral fluid solution to modern drug testing. The Intercept™ Oral Fluid Drug Test system provides a smart alternative to costly, inconvenient and often embarrassing drug testing. This new testing system detects the "SAMHSA" drug panel --**

**THC (marijuana)  
Cocaine  
Opiates,  
PCP (phencyclidine)  
Amphetamines and Ecstasy**

**- without the need to collect urine. Use the donor-friendly collection pad to collect the oral fluid sample and send it to the laboratory for “next-day” reporting on negative results and a 48- to 72-hour turnaround for confirmed positives.**

**Contact us at Data Dome, Inc. today!**

**Call us at 404-814-0739, visit us at <http://www.datadome.com> or email us at [intercept@datadome.com](mailto:intercept@datadome.com).**



**DATA DOME**   
Improving Communications & Performance through Behavioral Analysis