



Oral fluid drug testing
Delivering a convenient alternative
for healthcare providers

When you need an alternative

Quest Diagnostics knows that your needs can change and having more choices benefits you and your patients when monitoring for the presence of drugs. For those situations when urine collection is not practical, you now have an alternative — oral fluid.

Why use oral fluid testing?

Oral fluid collection is simple to do whether you choose your office or a Quest Diagnostics Patient Service Center. Collections can be completed in minutes, enabling you to monitor the collection.

Simple collection with Oral-Eze®

- The patented oral fluid collection device has a volume adequacy indicator window designed to take the guesswork out of sample collection
- The collection pad has no salty or citric taste, providing patient comfort
- The collection time typically takes about 5 minutes, reducing time in the office and improving patient convenience

Drug detection windows

Because salivary glands are highly perfused, drug is transferred rapidly from blood to oral fluid. Thus, drugs tend to become detectable in oral fluid sooner than in urine, and become undetectable more rapidly as well. For some drugs, such as cocaine and heroin, the “detection window” for oral fluid can be as little as a few hours.

However, most drugs remain detectable for 24 to 50 hours after ingestion.¹ The exact timing of the detection window varies with the drug, duration of use, drug dose, individual metabolism, and method of administration, among other variables.

Drug concentrations

Drug concentrations in oral fluid tend to be substantially lower than in urine, necessitating lower cutoffs for defining positive results. Weakly basic drugs such as benzodiazepines tend to have especially low concentrations in oral fluid.² Detection of drugs in oral fluid thus requires highly sensitive approaches,³ such as the liquid chromatography-tandem mass spectroscopy (LC/MS/MS) method used by Quest Diagnostics.



Table 1 Advantages and Disadvantages of Oral Fluid Relative to Urine²⁻⁶

Advantages of Oral Fluid	Disadvantages of Oral Fluid
Noninvasive, easy collection	Shorter window of detection after drug use
Provides option for individuals with “shy bladder” or anuria or who are undergoing dialysis	Lower drug concentrations in specimen
Specimen adulteration or substitution less likely due to conveniently observed collection	Limited specimen volume (typically ≤3 mL) may preclude repeated tests
Preserves patient dignity when observed specimen collection is required	Potential for lack of fluid due to physiologic (eg, dry mouth syndrome) or other reasons
Parent drug can be determined in most cases	
Provides detection of recent exposure	Residual drug in mouth soon after inhalation/smoking/ingestion may contaminate specimen, leading to artificially high concentrations
May detect residual drug in the mouth soon after inhalation/smoking (eg, cocaine or marijuana)	

Ordering information

93975 Drug Tox Monitoring Panel 1 with Confirmation, Oral

The components of this panel are indicated with an asterisk in the list below and can be ordered individually.

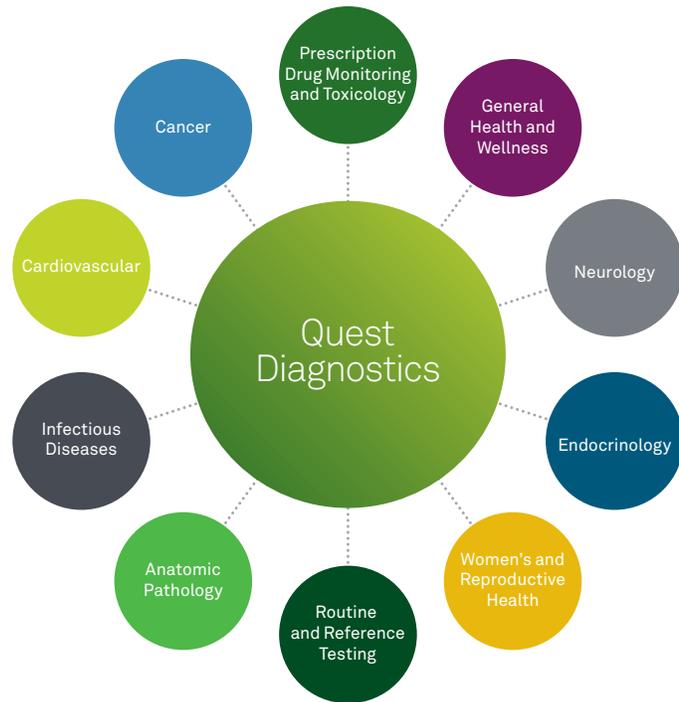
Table 2 Oral Fluid Drug Tests Offered by Quest Diagnostics

Test Code	Drug Class	Reportable Drugs and Metabolites	Cutoff (ng/mL)	Test Code	Drug Class	Reportable Drugs and Metabolites	Cutoff (ng/mL)
93976	Alcohol Metabolite	Ethyl Sulfate (EtS)	25.0	93984*	Methadone	EDDP	5
93977*	Amphetamines	Amphetamine	10			Methadone	5
		Methamphetamine	10	93974	Methylphenidate	Methylphenidate	1.0
93978*	Barbiturates	Amobarbital	10	93985	Naltrexone	Betahydroxynaltrexone	0.10
		Butalbital	10			Naltrexone	0.10
		Pentobarbital	10	93986*	Nicotine	Cotinine	5
		Phenobarbital	25	93987*	Opioids	Buprenorphine	0.025
		Secobarbital	10			Codeine	2.5
93979*	Benzodiazepines	Alprazolam	0.5			Dihydrocodeine	2.5
		Chlordiazepoxide	0.5			Fentanyl	0.1
		Clonazepam	0.5			Heroin	1
		Diazepam	0.5			Hydrocodone	2.5
		Flunitrazepam	0.5			Hydromorphone	2.5
		Flurazepam	0.5			Meperidine	5
		Lorazepam	0.5			Morphine	2.5
		Midazolam	0.5			Naloxone	0.1
		Nordiazepam	0.5			Norbuprenorphine	0.25
		Oxazepam	0.5			Noroxycodone	2.5
		Temazepam	0.5			Norhydrocodone	2.5
		Triazolam	0.5			Oxycodone	2.5
93980*	Cocaine	Benzoylcegonine	2.5			Oxymorphone	2.5
		Cocaine	2.5			Propoxyphene	5
93981*	Marijuana	THC	2.5			Tapentadol	5
93982*	MDMA	MDMA	10			Tramadol	5
93983*	Meprobamate	Carisoprodol	2.5	93988*	Phencyclidine	Phencyclidine	10
		Meprobamate	2.5	93990*	Zolpidem	Zolpidem	5

Our substance monitoring tools work hand-in-hand with your practice

In addition to oral fluid drug testing, Quest Diagnostics offers urine drug testing options to fit your clinical needs, including Prescription Drug Monitoring and Substance Monitoring.

Quest Diagnostics delivers a comprehensive test menu and professional services to cover the spectrum of medical conditions and specialty areas. We are committed to improving patient health through diagnostic insights.



Vital information you need

- Quest Diagnostics delivers healthcare insights when and where you need them in order to make informed decisions that can lead to better outcomes
- Our comprehensive menu of tests was built with the varied needs of you and your patients in mind
- Interactive Insights offers analysis and enhanced reports that simplify results interpretation and support meaningful conversations with patients

Responsiveness you expect

- Nationwide courier service includes prompt sample pickups
- Fast lab turnaround times help ensure timely screening and confirmation results
- Our Care360® platform provides a comprehensive suite of healthcare connectivity solutions, with capabilities that range from ordering and viewing results to additional features such as ePrescribing and EHR

Resources you can access

- Experienced toxicology specialists and toxicologists are available for consultation on test results. Call 877.40.RX.TOX (877.407.9869)
- Patients can visit one of over 2,200 conveniently located Patient Service Centers across the country to have their specimen collected

For more information on our prescription drug monitoring services, call 1.866.MY.QUEST (1.866.697.8378) or visit QuestDiagnostics.com/PDM

References

1. Verstraete AG. Detection times of drugs of abuse in blood, urine, and oral fluid. *Ther Drug Monit.* 2004;26:200-205.
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4. Substance Abuse Mental Health Services Administration. Clinical Drug Testing in Primary Care. Technical Assistance Publication Series (TAP) 32. HHS Publication (SMA) No. 12-48668. Rockville, MD: Substance Abuse Mental Health Services Administration; 2012.
5. Center for Substance Abuse Treatment. Drug Testing as a Tool (Chapter 9). *Medication-Assisted Treatment for Opioid Addiction in Opioid Treatment Programs.* Rockville, MD: Substance Abuse and Mental Health Services Administration (US); 2005.
6. Bosker WM, Huestis MA. Oral fluid testing for drugs of abuse. *Clin Chem.* 2009;55: 1910-1931.

Models used for illustrative purposes.

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