# Drug Testing in Substance Use Disorder Treatment:

## Does It Help or Hurt?


Stephen Martin, MD, EdM, FASAM, FAAFP

*Medical Director, Office-Based Addiction Team*
*Barre Family Health Center*

*Professor, Family Medicine and Community Health*
*UMass Chan Medical School*

*<stmartin@gmail.com>*

American Society of Addiction Medicine Conference
April 5, 2024

# Drug Testing in Substance Use Disorder Treatment:


## Does It Help or Hurt?

## It Generally Doesn't Help.

## It Does Hurt.

# Disclosure Information

- Medical Director for Research, Education, and Quality, Boulder Care
- Medical Director, Greylock Recovery

My views are my own.

# Learning Objectives

1. Describe the chronology of drug testing and how it was integrated early on into standard care for substance use disorders.
2. Explore the impact of drug testing on patients through their direct accounts.
3. Compare the evidence for patient-centered harms and benefits of drug testing.
4. Evaluate principles of harm reduction and low-threshold care and their compatibility with routine drug testing as currently recommended and required.

Cowardice asks the question, ‘Is it safe?’

Expediency asks the question, ‘Is it politic?’

Vanity asks the question, ‘Is it popular?’

But Conscience asks the question, ‘Is it right?’

Martin Luther King, Jr.
*March 31, 1968*

*Remaining Awake Through a Great Revolution* , Sermon delivered on Passion Sunday, Mar. 31, 1968, in: *The Essential Writings and Speeches of Martin Luther King, Jr.* , p. 268.

ἀσκεῖν περὶ τὰ νοσήματα δύο, ὠφελεῖν ἢ μὴ βλάπτειν.

Practice two things in your dealings with disease:

either help or
do not harm the patient.

Hippocrates,
*Epidemics* 1.11

Hippocrates, & Adams, F. (1849). *The Genuine Works of Hippocrates Volume 1* .
https://www.google.com/books/edition/The_Genuine_Works_of_Hippocrates/OqAEAAAAQAAJ?hl=en&gbpv=1

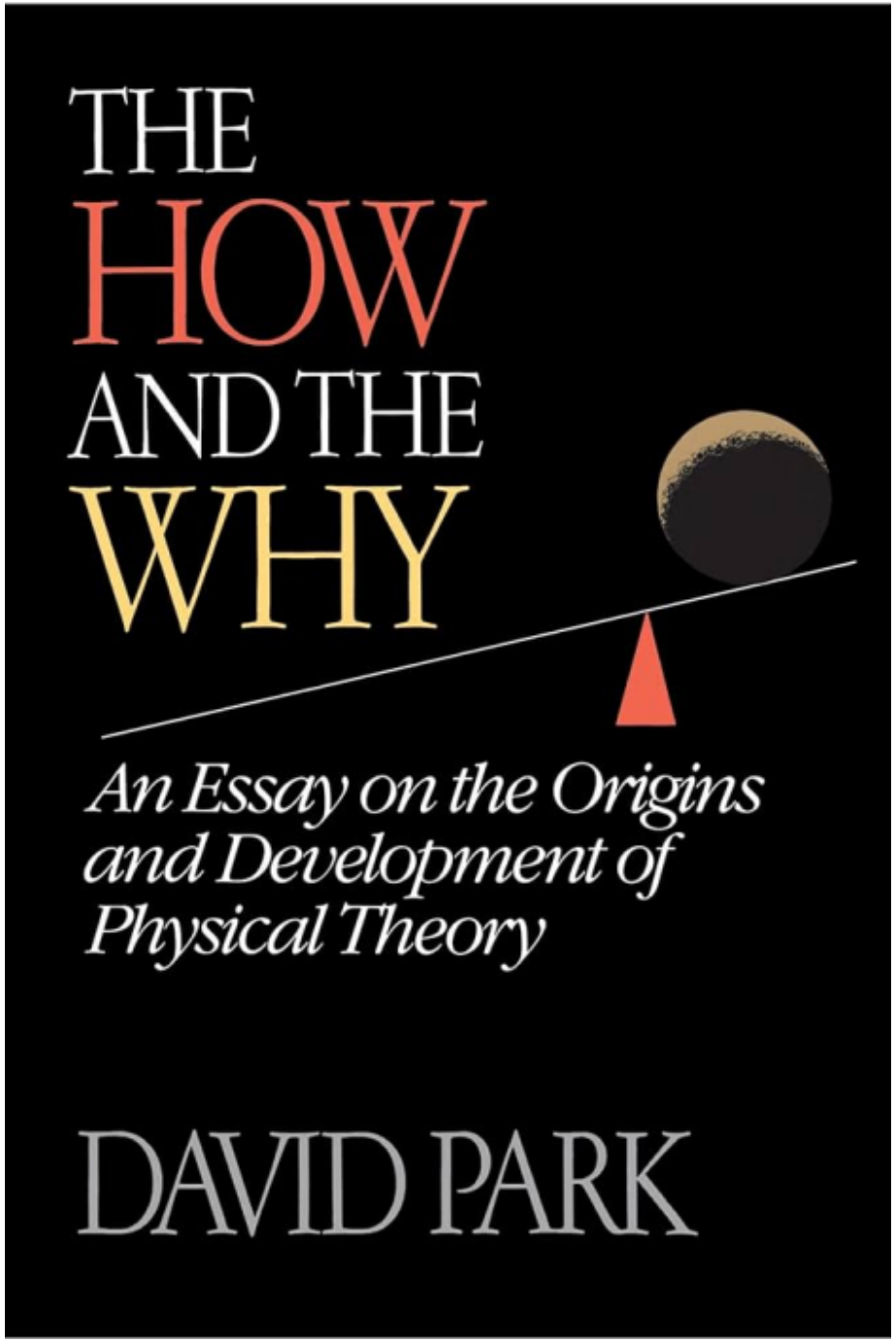
"You can't say that you're a program that provides choice to people and then take the choice away from them. You can't, and if we are truly a program that says 'other drug use is not an issue in terms of your methadone,' then we must follow that through.

Let's not just say it and be full of s---. Let's not call ourselves harm reduction and then be abstinence-based thinking. It doesn't make sense."

Staff member, Program C

Strike, C., & Rufo, C. (2010). Embarrassing, degrading, or beneficial: Patient and staff perspectives on urine drug testing in methadone maintenance treatment. *Journal of Substance Use*, *15*(5), 303–312. https://doi.org/10.3109/14659890903431603


pH
0
acidi
H
14
base
OH




Drug Testing in Substance Use Disorder Treatment:

THE
WHY
AND THE
HOW

# Thought Experiment

You have a loved one who needs care with methadone or buprenorphine.

They have the choice of two sites for either medication.

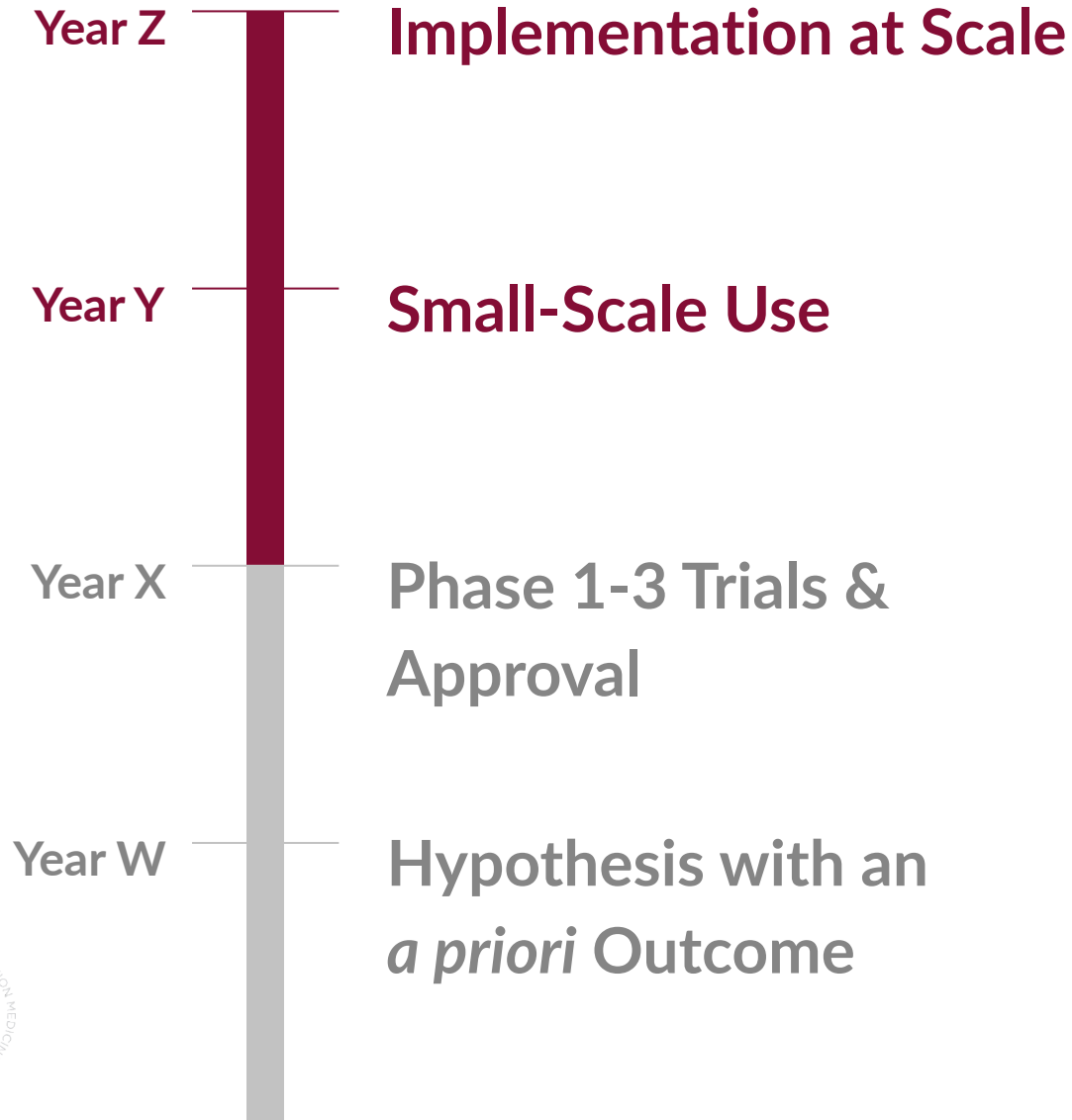
Site A has an intensive drug testing program and does this testing with each visit.

Site B deliberately does not emphasize testing and does just enough to meet regulatory requirements (8 times per year for an OTP; state requirements for buprenorphine (there is no federal testing requirement for buprenorphine)

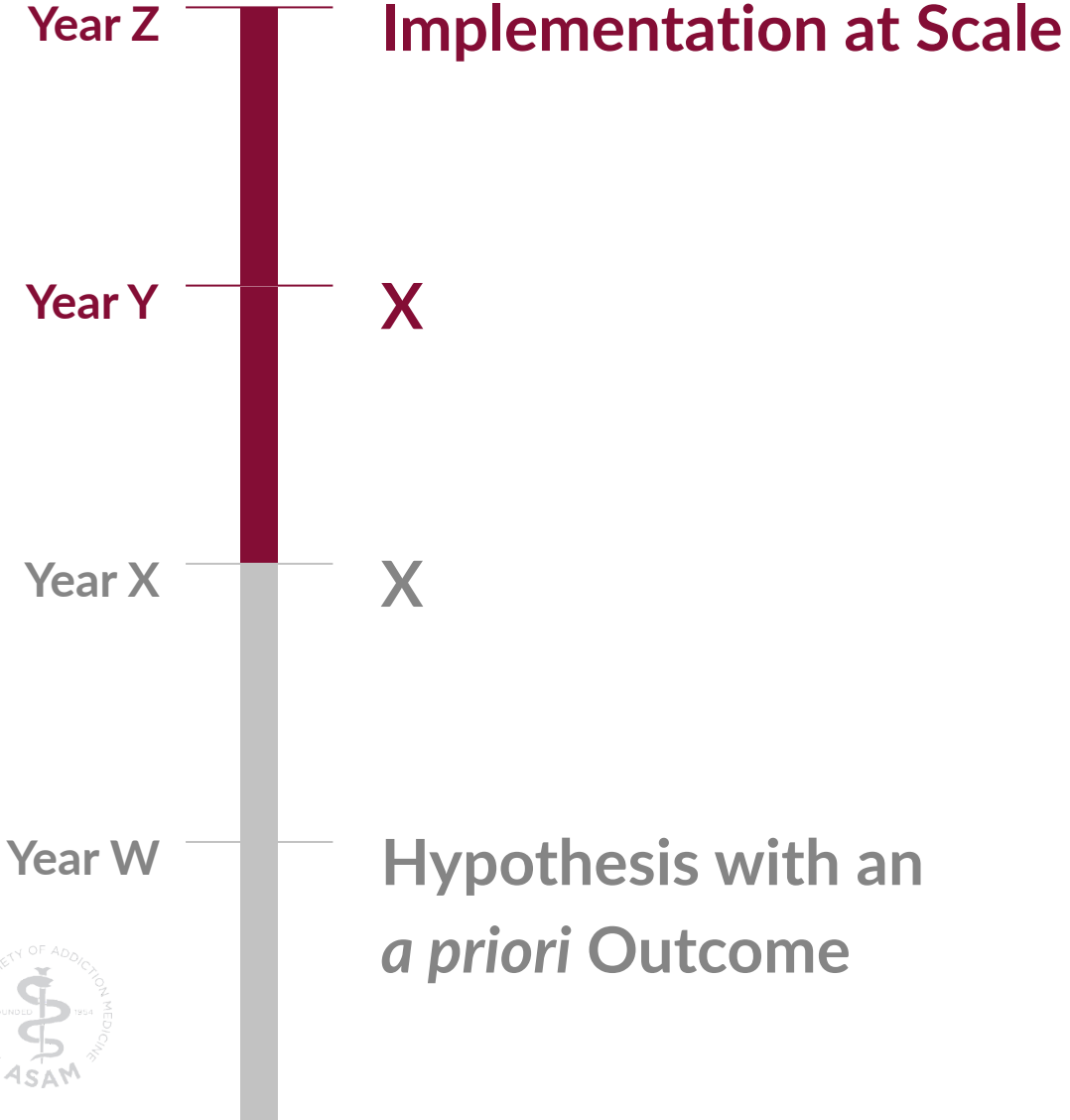
The programs are otherwise the same.

**Which one do you recommend to your loved one?**

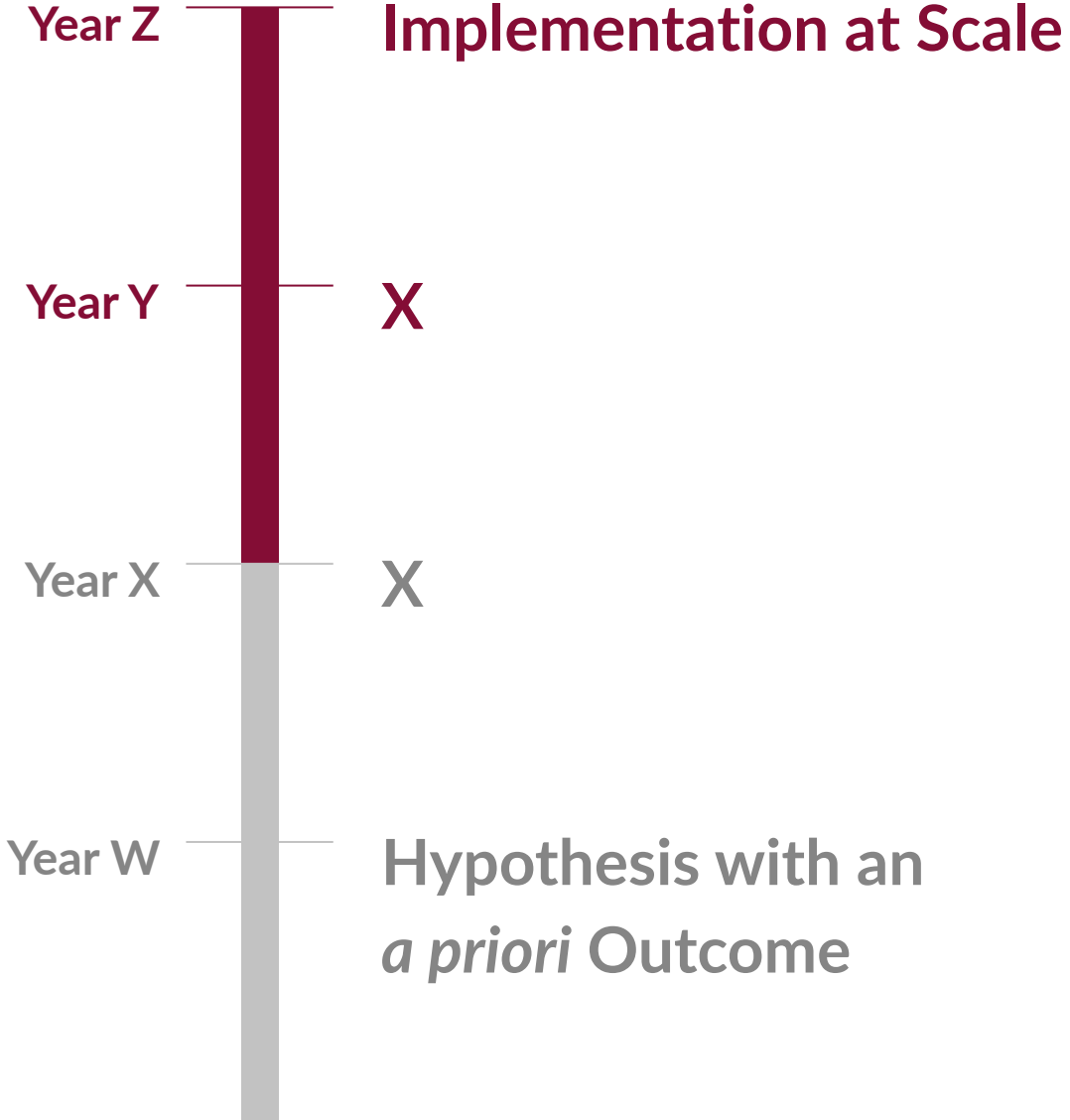
# Platonic Ideal: Diffusion of Medical Interventions



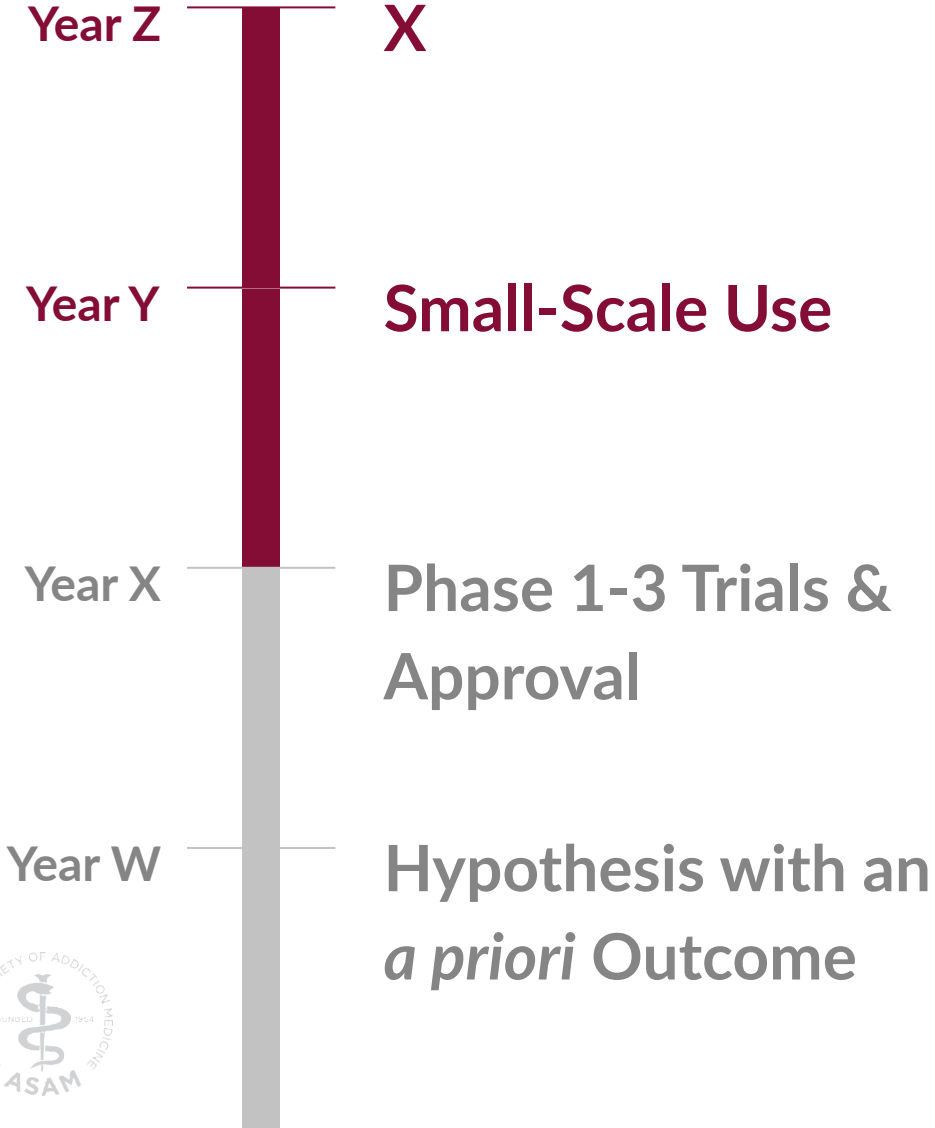
## Leeches



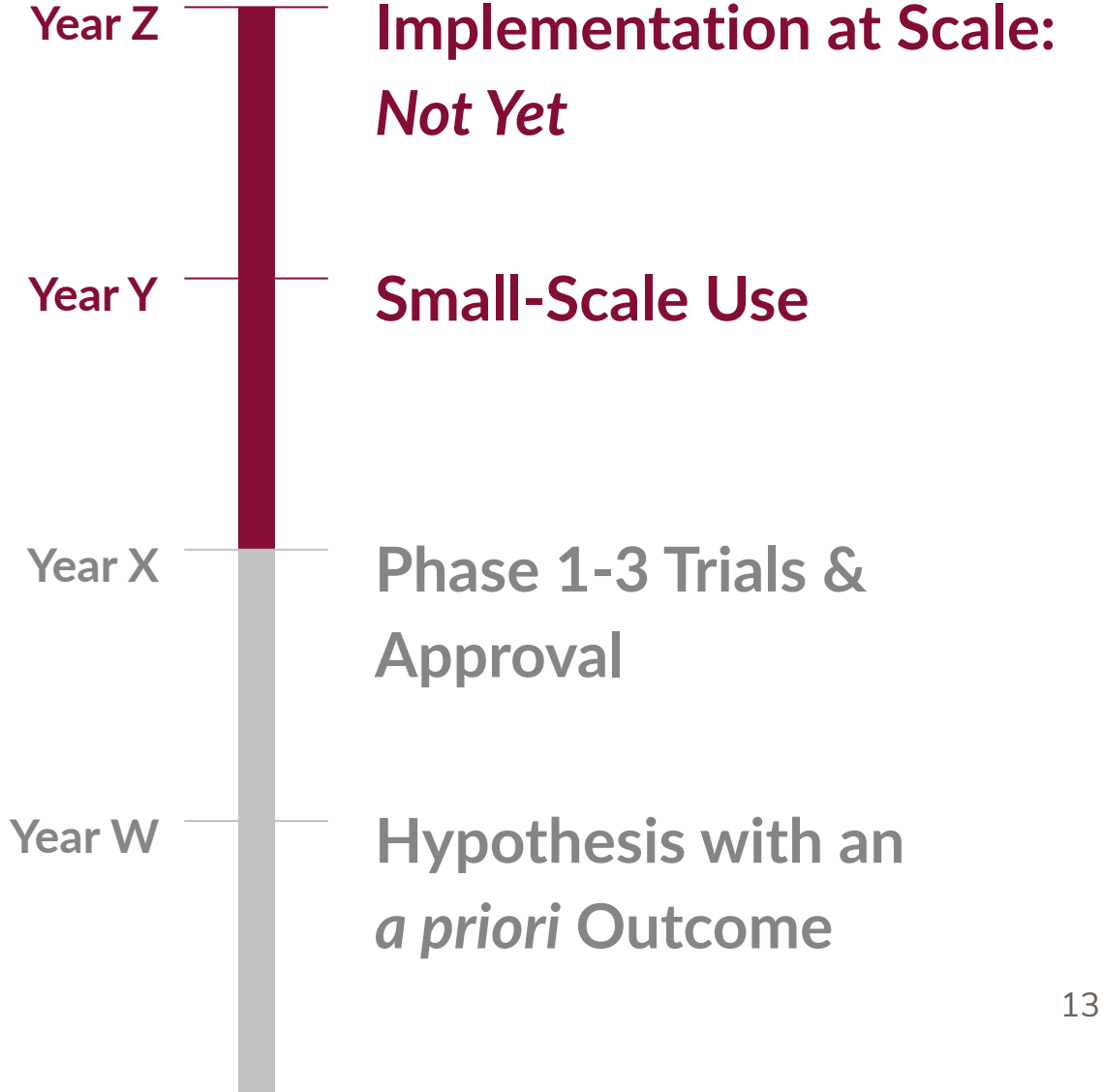

## Bed Rest for Myocardial Infarction



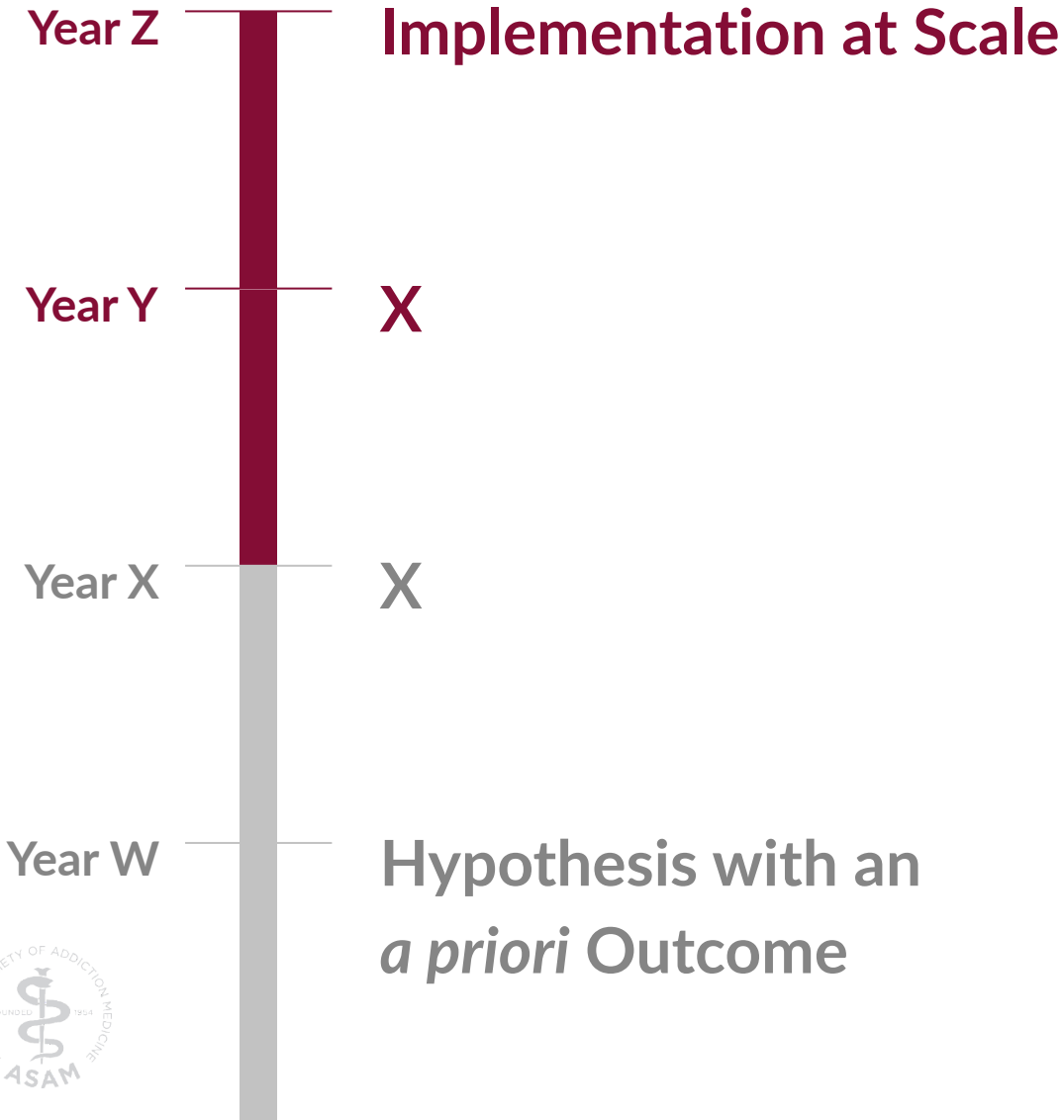
## Aducanumab



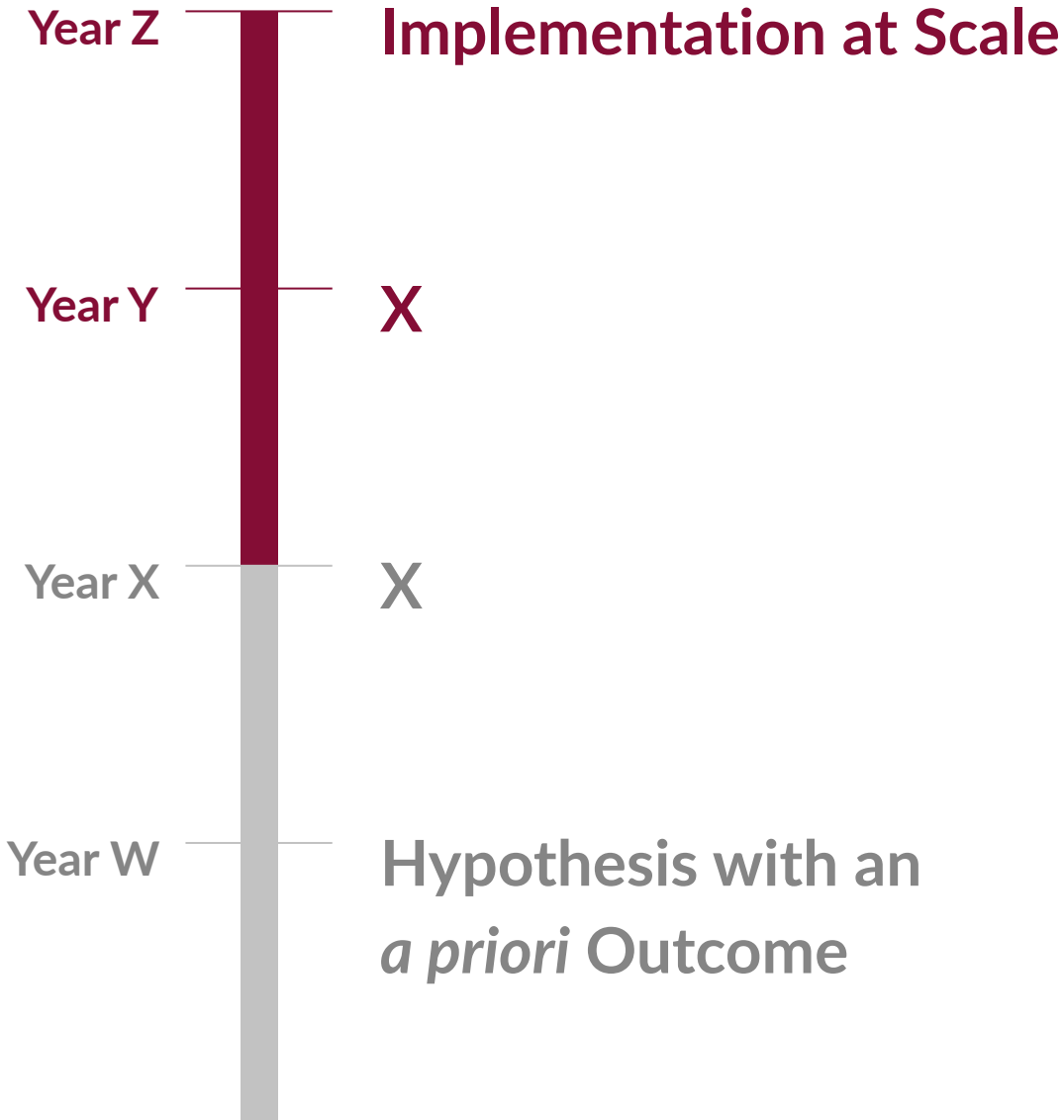

## Direct-Acting Antivirals for HCV



## Bleeding Time



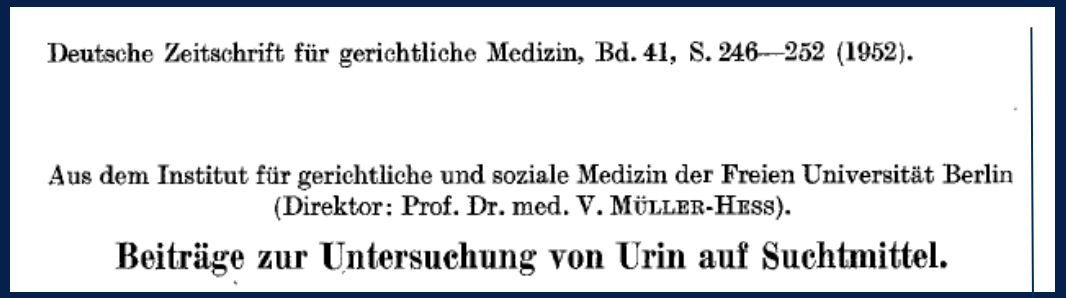

## Drug Testing in SUD Treatment



# History of and Rationale for Drug Testing

Vidic, E. (1952). Determination of narcotics in urine. *Deutsche Zeitschrift Fur Die Gesamte Gerichtliche Medizin*, *41*(3), 246–252. https://pubmed.ncbi.nlm.nih.gov/13020619/
Vidic, E. (1952). Beiträge zur Untersuchung von Urin auf Suchtmittel. *Deutsche Zeitschrift Fur Die Gesamte Gerichtliche Medizin*, *41*(3), 246–252. https://doi.org/10.1007/BF00665236

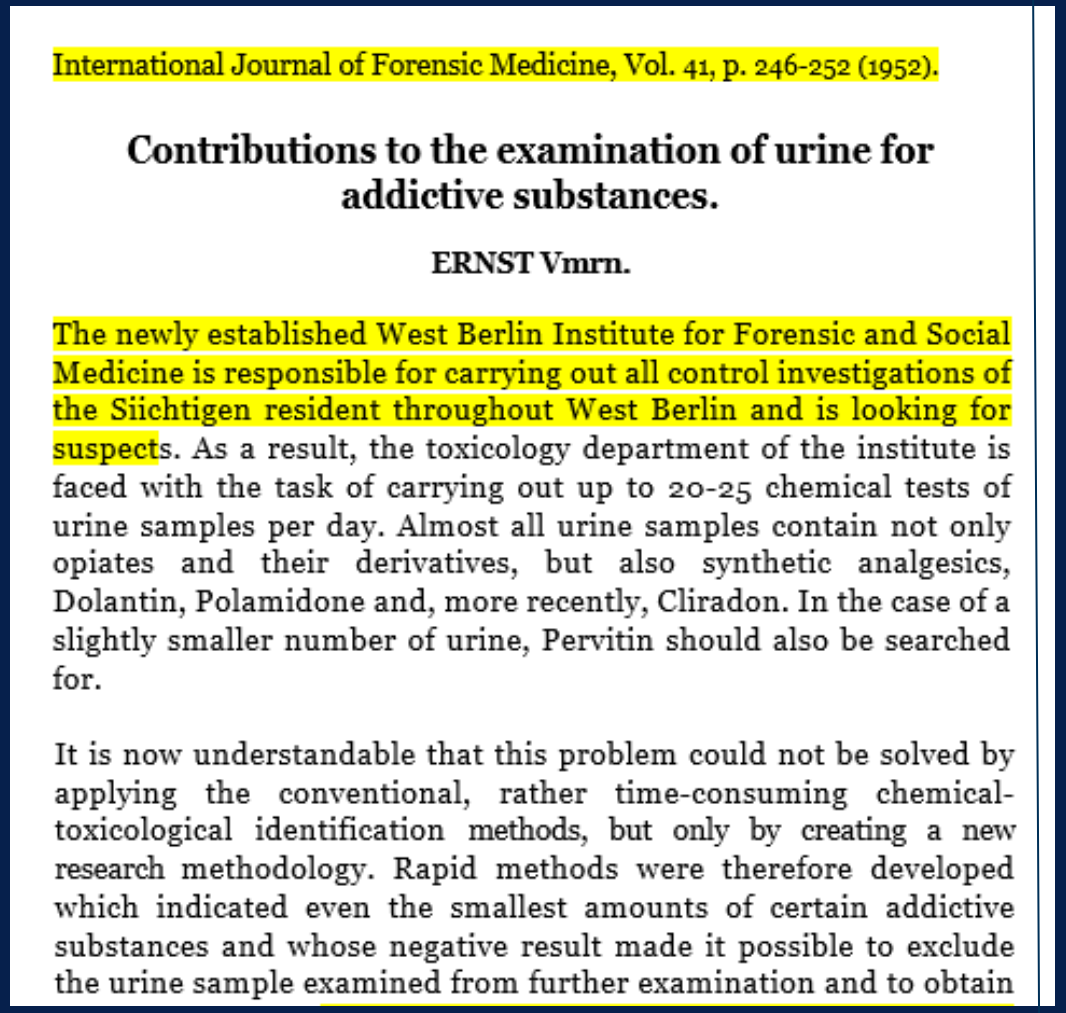
1922
1952
W H



Deutsche Zeitschrift für gerichtliche Medizin, Bd. 41, S. 246—252 (1952).

Aus dem Institut für gerichtliche und soziale Medizin der Freien Universität Berlin (Direktor: Prof. Dr. med. V. MÜLLER-HESS).

**Beiträge zur Untersuchung von Urin auf Suchtmittel.**



International Journal of Forensic Medicine, Vol. 41, p. 246-252 (1952).

## Contributions to the examination of urine for addictive substances.

ERNST Vmrn.

The newly established West Berlin Institute for Forensic and Social Medicine is responsible for carrying out all control investigations of the Siichtigen resident throughout West Berlin and is looking for suspects. As a result, the toxicology department of the institute is faced with the task of carrying out up to 20-25 chemical tests of urine samples per day. Almost all urine samples contain not only opiates and their derivatives, but also synthetic analgesics, Dolantin, Polamidone and, more recently, Cliradon. In the case of a slightly smaller number of urine, Pervitin should also be searched for.

It is now understandable that this problem could not be solved by applying the conventional, rather time-consuming chemical-toxicological identification methods, but only by creating a new research methodology. Rapid methods were therefore developed which indicated even the smallest amounts of certain addictive substances and whose negative result made it possible to exclude the urine sample examined from further examination and to obtain

The newly founded West Berlin Institute for Forensic and Social Medicine is responsible for carrying out all checks on addicts and people suspected of being addicted throughout West Berlin.

As a result, the toxicology department of the institute is faced with the task of carrying out up to 20-25 chemical tests of urine samples at a time.

**The very frequent urine tests of a large number of persons suspected of addiction made it necessary to use rapid methods for the chemical examination of urine for narcotic substances.**

Aus dem Institut für gerichtliche Medizin und Kriminalistik der Universität Leipzig
(Komm. Leiter: Dozent Dr. med. Siegfried Krefft)

# Die Überwachung von Rauschgiftsüchtigen durch den Morphinnachweis im Urin*)

Von Dr. Wolfgang ARNOLD

Die Überwachung und Entlarvung von Rauschgiftsüchtigen ist neben vielen anderen Problemen eine wichtige und schwierige Aufgabe der staatlichen

Morphin ist noch immer das am häufigsten ärztlich verordnete Betäubungsmittel und steht deshalb auch als mißbräuchlich verwendetes Suchtmittel an erster

From .dem Institute for Forensic Medicine and Criminology at the University of Leipzig
(Comm. Head: Lecturer Dr. med. Siegfried Krefft)

# The monitoring of drug addicts by the detection of morphine in the urine *)

By 1Dr. Wolfgang **ARNOLD**

The monitoring and exposure of drugs is, among many other problems, an important and difficult task of the state health authorities. The war, with its

Morphine is still the most commonly prescribed narcotic and is therefore also the most commonly used addictive substance. In addition, Dilaudid, Eukodal,

1952
W H

Arnold W. Control of drug addicts by morphine determination in urine. *Dtsch Gesundheitsw*. 1952;7(30):946-950. https://www.ncbi.nlm.nih.gov/pubmed/12988748.

# Die Überwachung von Rauschgiftsüchtigen durch den Morphinnachweis im Urin

## Überwachung

1. monitor
2. supervise
3. observe
4. closely observe
5. police
6. control
7. surveil

Google Translate: Uberwachung. https://translate.google.com/?sl=auto&tl=en&text=%C3%9Cberwachung&op=translate. Accessed February 18, 2024.
https://en.langenscheidt.com/german-english/ueberwachung


Arnold W. Control of drug addicts by morphine determination in urine. *Dtsch Gesundheitsw*. 1952;7(30):946-950. https://www.ncbi.nlm.nih.gov/pubmed/12988748.

The war, with its material and psychological stresses, paved the way for many weak-willed persons to addiction to drugs by way of the black market in drugs. The reorganization of our social life, combined with the large-scale measures taken by our government in the field of public health care, has succeeded in reducing the alarmingly high number of addicts.

The chemical, qualitative, and quantitative detection of addictive substances, especially morphine, in order to discover addictions is a problem that many chemists and physicians have already worked on and which has so far only been partially solved.

What conditions must such testing meet in order to ensure flawless clinical-chemical monitoring and transfer of drug addicts? Above all, there are three properties that such a procedure must possess:

1. **Specificity [Limited False Positives]**
2. **Time-saving analysis process [Fast]**
3. **Simplicity [Easy]**

In the course of ongoing urine testing for morphine, it was found that, despite flawless reagents and the most accurate analytical work, a positive morphine result also occurred in cases where morphine intake was certainly excluded.

Arnold W. Control of drug addicts by morphine determination in urine. *Dtsch Gesundheitsw*. 1952;7(30):946-950. https://www.ncbi.nlm.nih.gov/pubmed/12988748.

In the early 1960s, California and New York adopted a mandated treatment system using commitment by the courts to an enforced term of treatment.

In California, the Civil Addict Program was administered by a separate authority within the criminal justice system using a large facility at Corona for the inpatient phase.

Under the supervision of a specially chartered parole authority, the patient was closely supervised (through urine testing) after release. Failure to remain drug-free resulted in a return to the correctional facility for further treatment.

196X
W

Institute of Medicine (US) Committee for the Substance Abuse Coverage Study, Gerstein, D. R., & Harwood, H. J. (1992). *Federal Leadership in Building the National Drug Treatment System* . National Academies Press (US). https://www.ncbi.nlm.nih.gov/books/NBK234758/

# Detection of Narcotic Drugs, Tranquilizers, Amphetamines, and Barbiturates in Urine

*Vincent P. Dole, MD, Wan Kyun Kim, MA, and Ilze Eglitis*

1966

JJ: Yes, we built our own urine testing lab using Vince Dole's techniques. We didn't have much alternative because the commercial options that you have now didn't exist.

NC: What techniques were you using?

JJ: We had been using thin layer chromatography even when I was at Einstein. In Chicago I used the lab that they gave me for my research grant to set up the urine testing lab,



and we hired a full time lab director with a PhD in chemistry and added gas chromatography.

NC: And at the time, were there any concerns or thinking about civil rights issues with urine testing?

1968

1970

H

# Urine Testing Schedules in Methadone Maintenance Treatment of Heroin Addiction

Avram Goldstein, MD, and Byron W. Brown, Jr., PhD

*In the treatment of heroin addiction by methadone hydrochloride maintenance, it is customary to test urine specimens regularly, in order to monitor each patient's illicit use of drugs and to assess the general success of the program. Principles and graphs are presented here to aid the physician in choosing an economical testing frequency, and in interpreting the results quantitatively on a correct statistical basis. For most purposes, a random testing schedule at an average frequency of once in five days will suffice.*

maintenance program can be very high indeed. The purpose of this communication is to offer some rational and practical answers to the question: How often does urinalysis need to be done? If the purposes of urinalysis can be clearly formulated, then minimum-cost answers can be obtained, consistent with desired accuracy, on a sound statistical basis.

Experience has shown, and common sense dictates that every single urine specimen must be obtained under supervision. This means that

DuPont RL. Profile of a heroin-addiction epidemic. *N Engl J Med*. 1971;285(6):320-324. doi:10.1056/NEJM197108052850605
DuPont RL, Greene MH. The dynamics of a heroin addiction epidemic. *Science*. 1973;181(4101):716-722. doi:10.1126/science.181.4101.716

1971
1973
H



# SPECIAL ARTICLE

## PROFILE OF A HEROIN-ADDICTION EPIDEMIC

ROBERT L. DUPONT, M.D.

The District of Columbia made a

Dr. DuPont is director of the Special Action Program Office for Drug Abuse Prevention, Washington, D.C. 20500. Dr. Greene is the epidemic intelligence service officer at the Center for Disease Control, Atlanta, Georgia 30333.



in the nation's capital, using measures of the incidence and prevalence of heroin addiction, as well as measures of the availability, cost, and quality of heroin in the streets. It is our intention to describe what has happened

be remarkably reliable (*3*).

*Urine drug testing.* Urine testing for heroin has been carried out at three locations. Heroin use is indicated by the presence of morphine or quinine or both in the urine. Arrestees held in the



lockup of the Superior Court of the District of Columbia, a prearraignment holding facility, voluntarily surrender urine samples for drug testing by NTA's criminal justice division. This program was instituted in December 1971. All patients in treatment with NTA are required to submit urine samples twice a week. Summaries of the results of these urine tests on the

natural or traumatic cause of death at autopsy. Excluded from this group are deaths resulting from the various recognized medical complications of narcotism (sepsis, endocarditis, tetanus, hepatitis, massive pneumonia, and so forth), and deaths from natural and unnatural causes (homicide, suicide, accident, and so forth) among known addicts. The D.C. medical examiner's

annual basis since 1969. From this data we have abstracted those charges in which an opiate drug was involved. Police agents also seize opiate drugs from arrested persons and make undercover "buys" of heroin as part of the effort to reduce heroin availability. The number of seizures has been tabulated on a monthly basis since January 1971 and undercover buys on a monthly

**[00:25:12.450] - Jerome Jaffe**

This point are the numbers. He said he had gotten a heads up from two congressmen, Congressmen Steele and Murphy. I think that was a courtesy that no longer occurs nowadays, that congressmen would give the White House a heads up about a report coming out that they thought it was. They said something to 15% to 20% of the troops. And this was kind of frightening. At the time, the policy was to withdraw 1000 people a day. So if the numbers are as high as 30%, that's 300 heroin addicts, addicted, who are just being flown back and released that day into the population. There were a lot of things that went into what I suggested, but some of it was pure happenstance. The previous January, I had been to a scientific meeting, shared an airplane ride with Professor Avram Goldstein of Stanford, and he told me about a new technology for detecting drugs in urine that could detect the presence of opiates within a minute. And this new technology required only a few drops of urine. And this was a major technological breakthrough, because other than that, you'd have to have a thin layer chromatography or gas chromatography.

Richard Nixon Presidential Library. Jerome Jaffe Oral History Part 1. https://www.youtube.com/watch?v=kdLJutnljW0. Published August 30, 2021. Accessed February 19, 2024.

1971
WH

In order to expedite the rehabilitation process of Vietnam veterans, I have ordered the immediate establishment of testing procedures and initial rehabilitation efforts to be taken in Vietnam. This procedure is under way and testing will commence in a matter of days. The Department of Defense will provide rehabilitation programs to all servicemen being returned for discharge who want this help, and we will be requesting legislation to permit the military services to retain for treatment any individual due for discharge who is a narcotic addict. All of our servicemen must be accorded the right to rehabilitation.

Nixon R. Remarks About an Intensified Program for Drug Abuse Prevention and Control. June 1971.

1971
W H

# Operation Golden Flow: Vietnam, 1971

## OPERATION GOLDEN FLOW

Getting called from the orderly room, first sergeant, or commander's support staff to show up and sign a form. Then the joy of visiting the health and wellness center to provide a urine sample for the cause.



635th USAF DISPENSARY (PACAF) (1966-1976)
Operation Golden Flow (Random Drug Testing)




Operation Golden Flow. VET Tv. Published February 22, 2021. Accessed September 2, 2023. https://www.veterantv.com/dictionary/operation-golden-flow/

2% over the next 6 months. Actually, the drop in the positives was far more dramatic. I was in Viet Nam during the first weeks after the testing began. The technicians were having trouble with the gas chromatographic equipment used to confirm the results of the more rapid screening test based on a free radical assay technique (FRAT). The latter technique showed a greater than 10% positive rate for opiates when the testing first began, a rate which later proved to be more in keeping with self-reports obtained in follow-up studies.[14] However, the Army insisted on reporting only 'confirmed positives' which were lower at least in part because of technical problems with the confirmation procedures.† The essential point, however, is that whatever the initial rate of positives, the rate of positives

Jaffe JH. Footnotes in the evolution of the American national response: some little known aspects of the first American Strategy for Drug Abuse and Drug Traffic Prevention. The Inaugural Thomas Okey memorial lecture. *Br J Addict*. 1987;82(6):587-599. doi:10.1111/j.1360-0443.1987.tb01520.x

1971

H

Screening Test

Confirmatory Test

This paper describes the program of the U.S. Army to identify heroin users in Vietnam and how it operates. Whether methadone can be used with servicemen is discussed.

# U.S. Army Heroin Abuse Identification Program in Vietnam: Implications for a Methadone Program

Colonel Stewart L. Baker, Jr., MC

Prior to 1970, marijuana was considered to be the major non-alcohol drug abuse problem in the Army.[1] However, during 1970, information from Vietnam and Fort Bragg in particular revealed that opiate use was becoming a problem of more serious implication,[2] in terms of the inherent epidemiological characteristics of the opiates, the inevitable accompanying rise in other crimes committed to obtaining money for narcotics, the known deleterious effect on the users' health, and the growing belief that medical/behavioral science treatment for the physiologically or psychologically drug-dependent individual is a necessity, both for soldiers positively motivated for restoration to useful service, and for those being administratively separated for drug abuse.

Congressional interest in the drug abuse problem has moved from a desire to identify the magnitude of the problem in terms of law enforcement and disciplinary efforts toward a greater interest in the treatment of individuals before and after the imposition of disciplinary action, and toward identifying social aspects of the drug abuse problems.

During the late spring of 1970, there was a sudden increase in the supply of easily available heroin in Vietnam, both in quantity and in potency. This advent of 94-96% pure heroin, in 125-250 milligram vials costing only $2.00 - $4.00, heralded a drug problem which continues as the number one health problem for Army personnel in Vietnam. Numerous reports and informal surveys indicated increasing heroin abuse. In 1970 there were increased numbers of deaths caused by drug overdosage, as well as a number which were drug-related.

Considerable attention was directed toward troop education, suppression of drug traffic, and law enforcement. Despite measures of increasing efficiency in techniques of troop education against drug abuse, in drug traffic interdiction, and in apprehensions, heroin continued universally available and exceedingly cheap, ranging, currently, anywhere from $2.50 to $7.50 per thimble-sized polyethylene vial, each of which contains from 100 to 200 milligrams of 94-96% pure heroin. Such heroin can be mixed with and smoked in a regular cigarette without producing an easily detectable odor as does marijuana. It can also be "snorted" like snuff. These two methods of ingestion are the ones employed by the great majority of users in Vietnam, for they provide the "high" desired by such individuals without fear of exposure or infection through use of the needle.[3]

Prevalence is a major determinant of incidence, or new cases. And one of the major determinants of the prevalence of heroin abuse in Vietnam is the overall availability of the drug, despite escalating efforts to block the drug traffic. On the basis of our experience thus far, we must accept an assumption that the probability of cutting off the heroin supply there does not seem to be very great.

The heroin abuser in Vietnam has the following characteristic: he tends to have had previous experiences with illegal use of drugs. Many users favor the use of heroin for entertainment much in the same way that the standard culture favors the use of alcohol for entertainment. This statement is also true for many who do not use heroin, but use MJ, LSD, "speed," or "downers." Heroin users, then, are participants in the larger group of drug-users in military culture. Most users and ex-users think that they will have little or no problem avoiding heroin use "back in the world," where they believe heroin will be difficult to obtain or too expensive, where they will have a girlfriend or a family, and where the boredom and stress of Vietnam will be replaced by a non-distressing environment. In general, the heroin user has a low opinion of his ability to handle stress without drugs, and intensely defends the logic of his choice to use drugs. He holds himself in low esteem, and draws little esteem from contributing to an unpopular war effort.[4]

In response to this major health and Command problem, even prior to the development of official Army guidance, a number of in-country programs had evolved, encouraging voluntary admissions for purpose of detoxification.

These provided community-sponsored access to supportive facilities without the threat of legal jeopardy consequent to such surfacing of heroin abuse. They varied in technique and professional discipline, some being staffed entirely by medical personnel, others involving a consortium of medical and unit administrative personnel, and several other programs shunning medical personnel in sharp preference for "tell-it-like-it-is" ex-addicts, who would provide gut-level concerns and specificity of focus which, according to their thesis, was not to be expected from the disciplined, more mechanical professional. Their programs



In the *American Journal of Public Health* in 1972, Colonel Stewart L. Baker argues how the urine testing in Vietnam has direct "implications for a methadone program."

"President Nixon called, on June 17 of [1971], for a national counter-offensive on drug abuse, a problem he termed public enemy number one.

He emphasized informally to Department of Defense officials that **the military services must not discharge drug dependent servicemen into our already crime-ridden streets, still influenced by drug-hunger, without signal efforts at rehabilitation."**

As of October 15, 1971, the Army had the capability of analyzing 7,500 samples per day in Vietnam.

**Further, it is necessary to have both screening techniques (FRAT, TLC) and a verification technique (GLC) because of the statistical probabilities implicit in all large-scale screening programs.** This still requires that the diagnosis of drug-users must be made by physicians, to protect the 14 men in 1,000 who may be falsely identified under this test sequence in even optimal operations.

**We should, perhaps, repeat this point: diagnosis must be made by a physician, not a machine.** Laboratory analysis is never perfect, and there is always a chance for human or machine error. A lab test must always be interpreted in terms of the whole man; this is even more true when a positive diagnosis has such potential legal and social implications as is true in the area of drug abuse.

Baker SL Jr. U.S. Army heroin abuse identification program in Vietnam: implications for a methadone program. *Am J Public Health*. 1972;62(6):857-860. doi:10.2105/ajph.62.6.857

Mani, G. C. (1972). Urine tests for morphine. *The New England Journal of Medicine*, 286(16), 895. https://doi.org/10.1056/nejm197204202861619

**1972**
**W H**

I read with great interest the article by Dr. Lewis Thomas (N Engl J Med 286:531–533, 1972) in which he eloquently stated the practical problems of coping with heroin addiction. Dr. Lewis makes a strong plea for large-scale methadone use as a "plug in the dike" until a better drug comes along. Unfortunately, methadone is also an addictive drug, and people taking this medicine run the risk of being so maintained for the rest of their lives.

The therapy of heroin addiction must be accompanied by greater scientific standards concerning the true incidence of addiction. **At present, the best laboratory indicator of a program's results is detection of urinary morphine.** As physicians, we monitor the therapy of diabetes mellitus with the aid of blood glucose levels and the detection of urinary glucose. Why not enforce something similar for the heroin addiction treatment centers? The insistence on routine sensitive urinary morphine detection is possible technically and feasible economically.

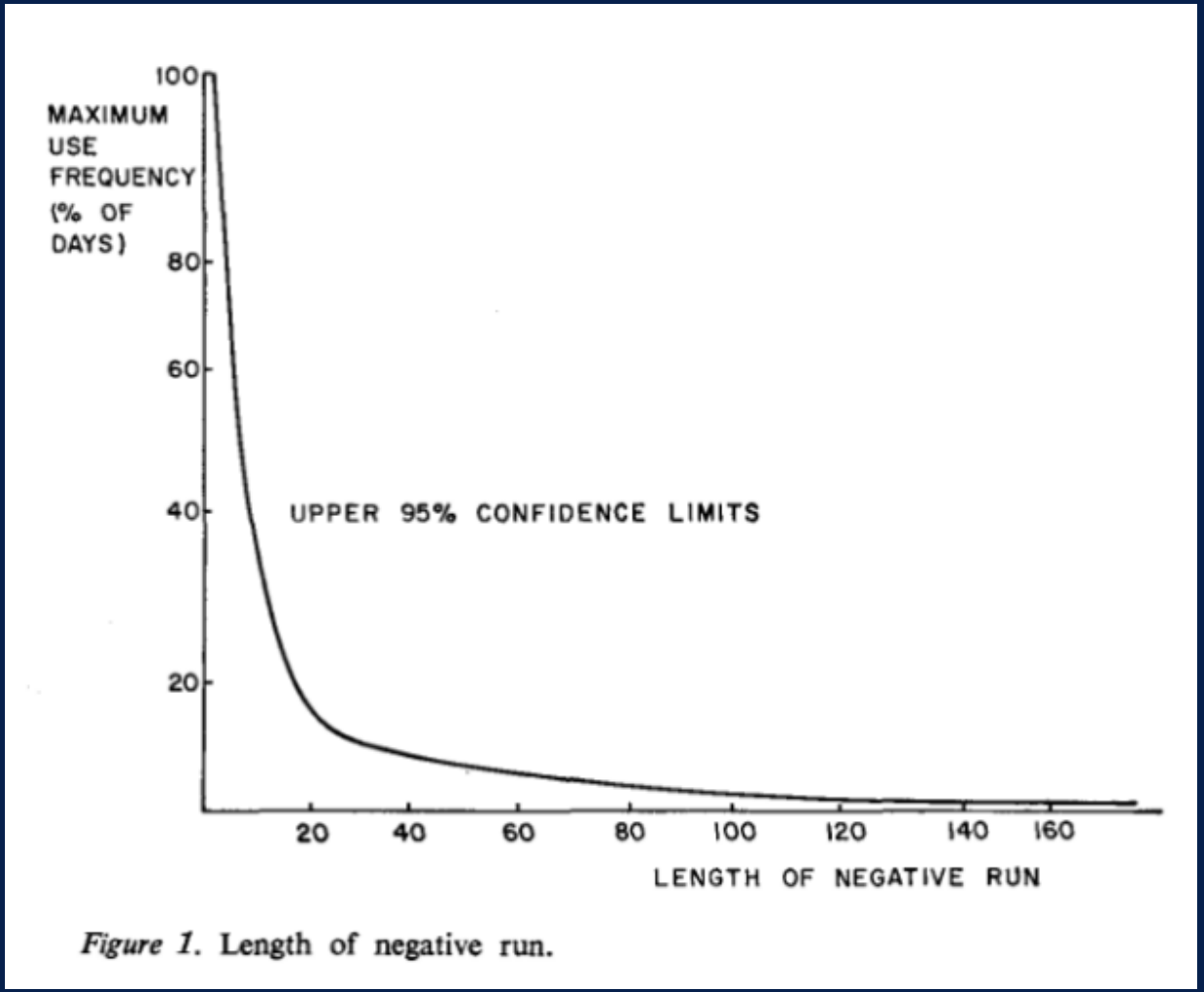



*Figure 1.* Length of negative run.

Criteria for arriving at a schedule include:

All urine samples must be collected under supervision.

Unless urine testing is to be done daily, sampling must be truly random.

Utilizing these criteria and statistical methods, it can be shown that random sampling 1 day in 5 allows the calculation of results within 95% confidence limits.

1972

W H

G. G. (1972). Testing for drug use: why, when, and what for. *International Pharmacopsychiatry*, 7, 178–198. https://doi.org/10.1159/000468034

## The advantages of testing for drugs include:

1. The ability to monitor illicit drug taking in a treatment and rehabilitation program. This allows some measurement of the success of the program.
2. Monitor whether or not patient is taking medication (e. g., methadone). Testing data is very useful from medico-legal point of view.
3. The ritual of leaving a urine sample keeps the user in touch with a particular program. Positive urines then become a source for confrontation and group or individual therapy—negative ones a chance for verbal reward. The more rapid and reliable tests are a definite aid in diagnosis as well as treatment procedures.
4. Provide basis for a bond between patient and counselors and patient and physician.

## The disadvantages of testing for drugs are:

1. Routine analyses are expensive and time consuming.
2. Results can be incorrect, thereby creating morale and/or behavioral problems.
3. Positive results tell only that the drug had been ingested or administered just prior to testing. The test tells nothing about whether or not the patient has either an acute or chronic problem.
4. Test results tell nothing about the clinical picture.

DeAngelis, G. G. (1972). Testing for drug use: why, when, and what for. *International Pharmacopsychiatry*, *7*, 178–198. https://doi.org/10.1159/000468034

# Harms from Testing


https://www.youtube.com/watch?v=aM9Apqxiiug&embeds_referring_euri=https%3A%2F%2Fwww.statnews.com%2F&source_ve_path=OTY3MTQ&feature=emb_imp_woyt

*Alex Hogan/STAT*

## Rigid rules at methadone clinics are jeopardizing patients' path to recovery from opioid addiction

A STAT investigation shows that many of the nation's methadone clinics rely on controlling and punitive strategies that make it harder, not easier, for patients like Rebecca Smith (above) to maintain their recovery. Read Part 2 of the War on Recovery series.

**By Lev Facher**

> "It's been over five years, and you're gonna do this to me? I said, y'all doing stuff like this makes people go out there and relapse. It's like you don't care."
>
> **Rebecca Smith**
>
> FORMER MEDICAL ASSISTANT WHOSE TAKE-HOME METHADONE DOSES WERE SUSPENDED

https://www.statnews.com/2024/03/12/methadone-clinics-rigid-rules-opioid-addiction-recovery/


**One woman's battle to obtain life-saving methadone**

STAT
22.5K subscribers
Subscribe

14 Share Download Clip Save

# Witnessed Urine Screens in Drug Treatment: Humiliating and Harmful

BY ELIZABETH BRICO OCTOBER 28, 2019

Brico, E. (2019, October 28). *Witnessed urine screens in drug treatment: Humiliating and harmful*. Filter. https://filtermag.org/urine-screen-drug-treatment/

I don’t like somebody looking at me, or behind me . . . it’s not a very pleasant experience for anybody. Actually, I think it’s undignified, and I feel it’s wrong . . .

It’s degrading having to take a urine sample.

It’s [being on tape] an invasion of privacy.

A few times I couldn’t go knowing that they [the cameras] were there but ran the water, stuck my hand in it . . . sat there waiting, walked out, went to the [water cooler] thing, filled it up . . . forcing down eight cups real fast and walking around . . . and you’ll go within ten minutes or so.

Strike, C., & Rufo, C. (2010). Embarrassing, degrading, or beneficial: Patient and staff perspectives on urine drug testing in methadone maintenance treatment. *Journal of Substance Use*, *15*(5), 303–312. https://doi.org/10.3109/14659890903431603

So they were doing urine samples and I didn't like it. It was a lot of pressure. Some people can't go to the washroom, and you sit here for three hours and it's ridiculous.

The camera was at the side of the toilet . . . so that they could get like a direct shot, and that was really weird . . . I found it was making it really hard to piss, so the only way I could piss was to sit down, turn off the lights and sit there for like 15 minutes relaxing.

*During interviews, several patient and staff participants expressed a belief that urine drug testing reinforced a stigmatized identity as a 'lying, untrustworthy junky':*

I haven't  used, and I've been going to meetings, I've been polite, I've been a human being instead of a no-good with no place to stay drug addict.

. . . to come and call me a liar saying that I did this and this and this, and then justify that by telling me that it's in my nature as an addict to lie, and then to deny my lie . .

## Rule and Policy Violations

Wyse, J. J., Eckhardt, A., Waller, D., Gordon, A. J., Shull, S., Lovejoy, T. I., Mackey, K., & Morasco, B. J. (2024). Patients' Perspectives on Discontinuing Buprenorphine for the Treatment of Opioid Use Disorder. *Journal of Addiction Medicine*. https://doi.org/10.1097/ADM.0000000000001292

Several patients also described situations in which they were informed that they had violated rules or policy, which led to discontinuation.

"They told me, you know you're not supposed to be drinking. They gave me a couple opportunities and it wasn't like I was drinking a lot. I was, honest to God, I was on the golf course over the course of the summer four or five times and I think I had two or three White Claws [alcoholic beverage]." This patient had previously benefited substantially from buprenorphine and described struggling mightily with cravings and withdrawal after the imposed discontinuation.

Another participant, who described a long history of alcohol use, explained that his clinician wanted him to stop drinking entirely, "their clinical policy is...you shouldn't drink when you take it [buprenorphine]." Rather than cease drinking alcohol entirely, he cut down, "I was honest with them... like please let me have a sip of alcohol. You know?" Nonetheless, the clinician stopped prescribing buprenorphine.


Liberating Methadone 2023
https://med.nyu.edu/departments-institutes/population-health/divisions-sections-centers/epidemiology/center-opioid-epidemiology-policy/events

## *Staff*

We're not collecting  urine from them because that's not what we're about.  We don't want this programme to be about peeing in a bottle; we want people to be able to tell us this is what I'm using.

The urine samples, I think it's totally dehumanizing for someone to go and pee and they're watched …  not to mention the fact that yes, let's try and build a relationship based on trust and respect when I'm watching you pee, right? It just seemed ludicrous …

You can't say that you're a program that provides choice to people and then take the choice away from them. You can't, and if we are truly a program that says "other drug use is not an issue in terms of your methadone," then we must follow that through. Let's not just say it and be full of s---. Let's not call ourselves harm reduction and then be abstinence-based thinking. It doesn't make sense.

Strike, C., & Rufo, C. (2010). Embarrassing, degrading, or beneficial: Patient and staff perspectives on urine drug testing in methadone maintenance treatment. *Journal of Substance Use*, *15*(5), 303–312. https://doi.org/10.3109/14659890903431603
Strike, C., Millson, M., Hopkins, S., & Smith, C. (2013). What is low threshold methadone maintenance treatment? *The International Journal on Drug Policy*, *24*(6), e51–e56. https://doi.org/10.1016/j.drugpo.2013.05.005

But at Arud Centre for Addiction Medicine, a leading Swiss clinic, all patients in need of addiction care are given instant access to weeks' worth of medication. They are not required to participate in counseling, or subjected to drug tests, or punished if they relapse and use illicit substances. It is a strategy that many American methadone clinics warn would result in disaster—but that European experts say is the continent's key to success.

"We have access to a very broad population because it's so easy to access our treatment center," Philip Bruggmann, a Swiss doctor and Arud's head of internal medicine, told STAT during a recent visit to the clinic's headquarters in central Zurich. "This wouldn't be possible in a system which is very restrictive, where people are getting kicked out of the program or disappearing because they can't comply with the regulations and rules. I think we would lose a lot of patients. They would die."

Facher, L. (2024, March 26). *Switzerland had a drug overdose crisis. Then it made methadone easy to get* . STAT. https://www.statnews.com/2024/03/26/opioid-addiction-methadone-treatment-switzerland-europe/
Chiu, K., Pandya, S., Sharma, M., Hooimeyer, A., de Souza, A., & Sud, A. (2024). An international comparative policy analysis of opioid use disorder treatment in primary care across nine high-income jurisdictions. *Health Policy* , *141*, 104993. https://doi.org/10.1016/j.healthpol.2024.104993
Frank, D., , Ph.D. (2021). "That's No Longer Tolerated": Policing Patients' Use of Non-opioid Substances in Methadone Maintenance Treatment. *Journal of Psychoactive Drugs*, *53*(1), 10–17. https://doi.org/10.1080/02791072.2020.1824046

# To a US Methadone Recipient, Visiting Australia Was Shocking

BY DANIELLE RUSSELL DECEMBER 20, 2022


"Afterwards, I asked my friend and a few other people about how they get drug tested. One person said that they had been on methadone for seven years, and another ten. Both had only been drug tested once, when they first started on methadone.

This experience was unrecognizable to me. I was "randomly" drug tested every single Thursday for the entire year of 2021. Even though I had years of drug tests showing methadone-only preceding that year."

"December 13 was my pickup day at the clinic. It also ended up being my last day there. Because even though methadone has been life-changing for me, I can no longer abide the cruelty with which this medication is dispensed. So I made a conscious decision to walk out, and take my chances with trying to finish tapering off opioids with drugs I buy on the illicit market. I'm done trading my dignity for safety."

Russell D. To a US methadone recipient, visiting Australia was shocking. Filter. Published December 20, 2022. Accessed September 1, 2023. https://filtermag.org/methadone-clinic-australia-pharmacy/

## The Methadone Manifesto

Many clinics institute monitored weekly drug testing, despite federal regulation calling for drug screening only eight times per year. A number of clinics own their testing labs, so they simply bill themselves for the excessive drug tests and labor. Toxicology screening and analysis represent a substantial expense associated with MAT, and its elimination would dramatically reduce overall treatment cost.

It frequently falls on the patient to contest a false positive, revealing massive oversight on the part of the clinic.

Finally, observed drug testing is humiliating, as people are often observed during urine testing by staff and other clients. Observed specimen collection may also re-traumatize patients who have experienced physical and psychological trauma.

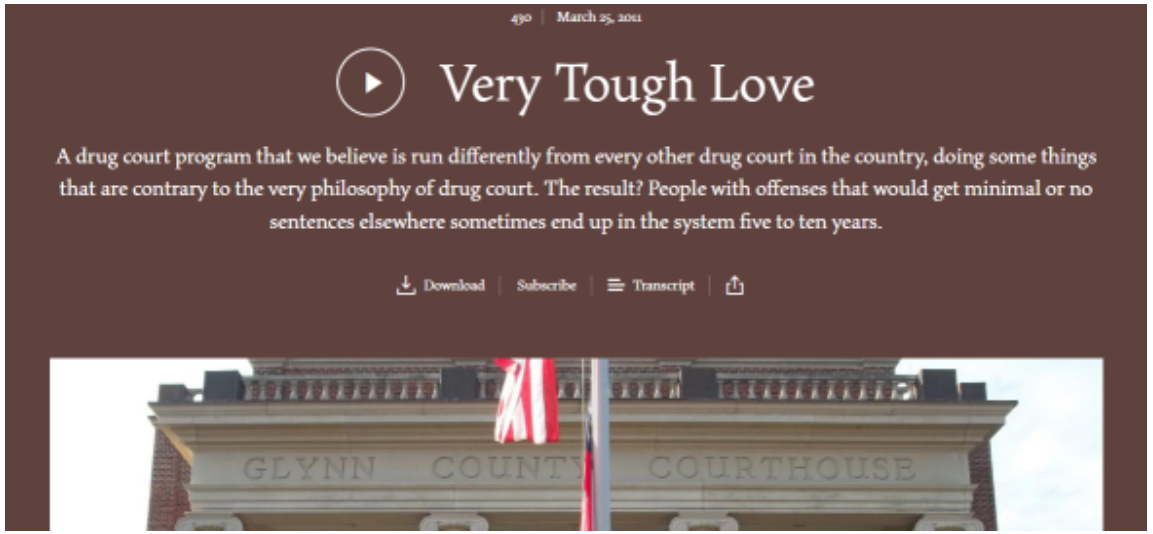

Schulte, F., & Lucas, E. (2017, November 6). Liquid Gold: Pain Doctors Soak Up Profits By Screening Urine For Drugs. *KFF Health News*. https://kffhealthnews.org/news/liquid-gold-pain-doctors-soak-up-profits-by-screening-urine-for-drugs/


http://abcnews.go.com/US/video/pennsylvania-mom-settles-poppy-seed-bagel-drug-test-19572219

# Pa. Mom Settles Over Poppy Seed Bagel Drug Test

Elizabeth Mort, 24, awarded $143,500 following a 2010 lawsuit after her newborn was taken away.

00:32 | 07/03/2013




*Jim Jenkins:* He was in the final phase of the program. He was just three months short of graduation. And he was called in for a random urine screen, which they do regularly in the program.

*Charlie McCullough:* I went in there and I took the drug test. She said that it came up positive for methamphetamine.

*Ira Glass:* She, the drug counselor, not Judge Williams.

*Charlie Mccullough:* I knew I wasn't messing around. So I told her that wasn't right. They let me take another drug test.

*Jim Jenkins:* So she took another sample and gave him another test.

*Ira Glass:* And we should say this was just like, 20 minutes after the first test.

*Jim Jenkins:* **Within 20 minutes. Exactly. And it came out negative.**

http://www.thisamericanlife.org/radio-archives/episode/430/very-tough-love

My List

FORUM

# Controlled Access to Methadone Fuels 'The War on Recovery' in California

LISTEN 48:03 / 55:07

By Mina Kim Apr 3 at Article Saved

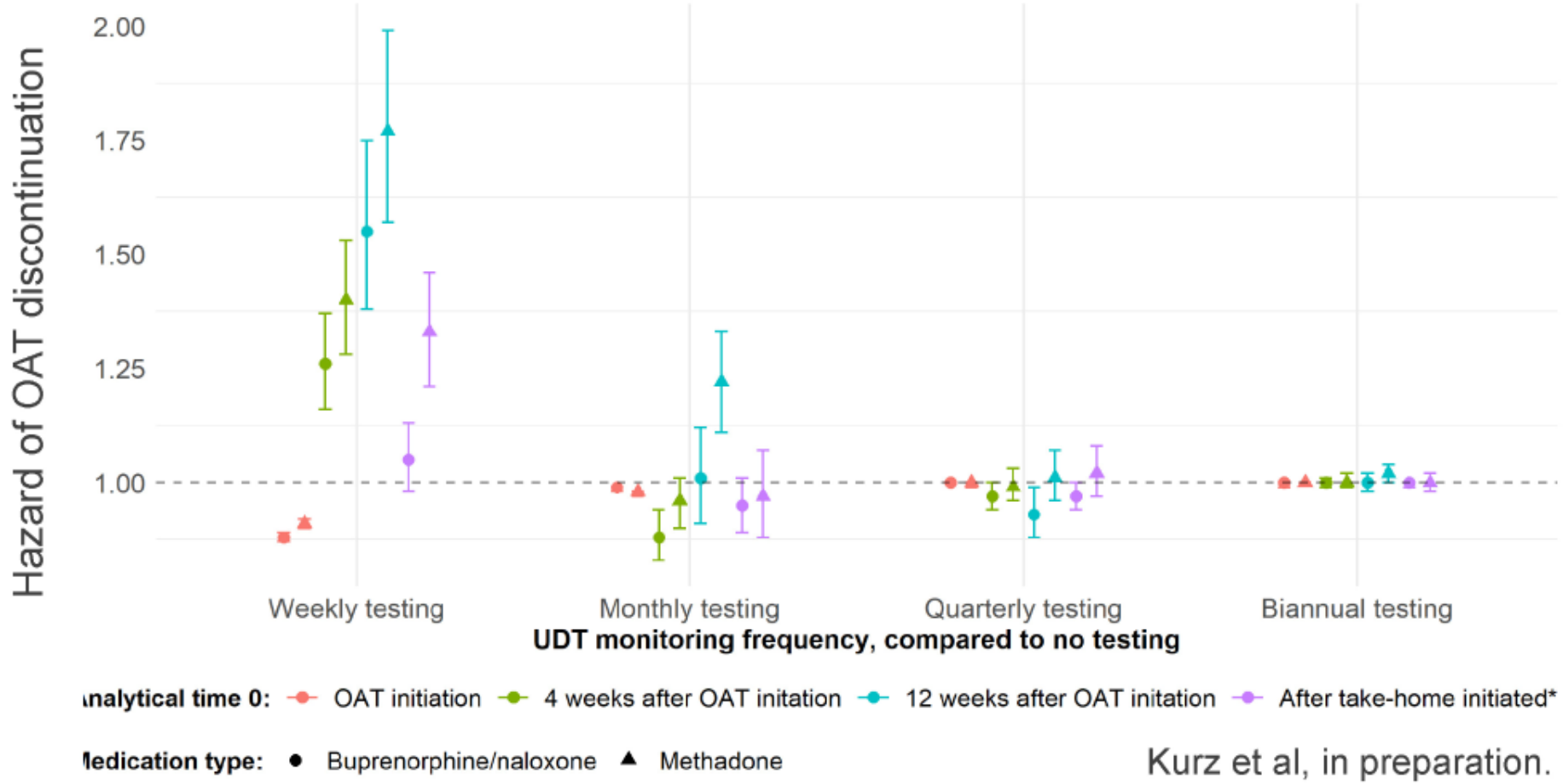
This listener writes, since buprenorphine can be federally subsidized, mine with Medicare, I'm tested regularly for a marijuana use. **I would be cut off immediately in the case of a positive result, despite the fact marijuana would be helpful for me.**

**April 3, 2024**

The specter of the opioid epidemic has shadowed life in California for nearly three decades, and opioid deaths in the state are rising precipitously. Physicians have long advocated the use of life-saving opioid medications methadone and buprenorphine to treat addiction. Despite methadone's proven effectiveness, access to the drug has been blocked across the health care system – and California is among the most restrictive states in the nation. This week, new federal regulations take effect that could expand access to methadone treatment. STAT addiction reporter Lev Facher examined access to these medications in a recent investigation titled "The War on Recovery." We'll talk about what this shift at the national level means for addiction treatment in California. And we'll hear from you: Has access to methadone had an impact on your life or recovery?

Guests:
Lev Facher, addiction reporter, STAT News
Leslie Suen, physician and researcher, University of California San Francisco
Jordan Scott, disabled drug user in recovery; organizing coordinator, Pennsylvania Harm Reduction network

# Frequent Urine Drug Testing after OAT induction is associated with treatment discontinuation




**Objectives**: To determine the safety and comparative effectiveness of alternative UDT monitoring strategies as observed in clinical practice among OAT clients in British Columbia, Canada

Kurz M, Guerra-Alejos BC, Min JE, Nosyk B. Comparative effectiveness of Urine Drug Testing schedules alongside opioid agonist treatment. Presented at the: CSAM-SMCA 2023 Scientific Conference: Caring In Crisis; 2023.

B. M. (she/her). (2023, September 21). *#BohdanNosyk provides evidence that UAs create suboptimal treatment outcomes. Stop Urine Screens in methadone treatment. @MethadoneLib #freemethadone pic.twitter.com/WcJUNbzelk*. Twitter. https://twitter.com/Beth_Meyerson/status/1704924076651814949

# Clinician Proficiency

Conclusions: Physicians who employ UDT to monitor patients receiving chronic opioid therapy are not proficient in test interpretation. This study highlights the need for improved physician education; it is imperative for physicians to work closely with certified laboratory professionals when ordering and interpreting these tests. (Reisfeld, 2007)

The greatest defect of immunoassays is their lack of specificity. Very few anti-sera exist that are specific for a single compound, although some have been prepared with very high specificity where cost was no object. Hence one should confirm all positive results by some other procedure if specificity is  important. (Sunshine, 1975)

Reisfield, G. M., Bertholf, R., Barkin, R. L., Webb, F., & Wilson, G. (2007). Urine drug test interpretation: what do physicians know? *Journal of Opioid Management*, *3*(2), 80–86. https://doi.org/10.5055/jom.2007.0044
Moeller, K. E., Kissack, J. C., Atayee, R. S., & Lee, K. C. (2017). Clinical Interpretation of Urine Drug Tests: What Clinicians Need to Know About Urine Drug Screens. *Mayo Clinic Proceedings. Mayo Clinic*, *92*(5), 774–796. https://doi.org/10.1016/j.mayocp.2016.12.007
Suzuki, J., Garayalde, S., Dodoo, M., & Rodriguez, C. (2018). Psychiatry residents' and fellows' confidence and knowledge in interpreting urine drug testing results related to opioids. *Substance Abuse: Official Publication of the Association for Medical Education and Research in Substance Abuse*, *39*(4), 518–521. https://doi.org/10.1080/08897077.2018.1469105
Sunshine, I., & Jatlow, P. I. (1975-1985). *Methodology for analytical toxicology 1*. CRC Press. https://search.worldcat.org/title/1253991
Eskridge, K. D., & Guthrie, S. K. (1997). Clinical issues associated with urine testing of substances of abuse. *Pharmacotherapy*, *17*(3), 497–510. https://www.ncbi.nlm.nih.gov/pubmed/9165553

## Clinician Proficiency

Immunoassays have many weaknesses that can result in false-positive and false-negative results. Understanding how to interpret urine immunoassays (e.g., cutoff values, detection times, and false-positive results) is vital when ordering. All positive results on immunoassays need confirmatory testing (e.g., gas chromatography/mass spectrometry). (Moeller, 2017)

Psychiatry residents and fellows infrequently receive training in UDT interpretation, score poorly on the knowledge test, and their confidence in UDT interpretation does not reflect their knowledge. (Suzuki, 2018)


Reisfield, G. M., Bertholf, R., Barkin, R. L., Webb, F., & Wilson, G. (2007). Urine drug test interpretation: what do physicians know? *Journal of Opioid Management*, *3*(2), 80–86. https://doi.org/10.5055/jom.2007.0044

Moeller, K. E., Kissack, J. C., Atayee, R. S., & Lee, K. C. (2017). Clinical Interpretation of Urine Drug Tests: What Clinicians Need to Know About Urine Drug Screens. *Mayo Clinic Proceedings. Mayo Clinic*, *92*(5), 774–796. https://doi.org/10.1016/j.mayocp.2016.12.007

Suzuki, J., Garayalde, S., Dodoo, M., & Rodriguez, C. (2018). Psychiatry residents' and fellows' confidence and knowledge in interpreting urine drug testing results related to opioids. *Substance Abuse: Official Publication of the Association for Medical Education and Research in Substance Abuse*, *39*(4), 518–521. https://doi.org/10.1080/08897077.2018.1469105

Sunshine, I., & Jatlow, P. I. (1975-1985). *Methodology for analytical toxicology 1*. CRC Press. https://search.worldcat.org/title/1253991

Eskridge, K. D., & Guthrie, S. K. (1997). Clinical issues associated with urine testing of substances of abuse. *Pharmacotherapy*, *17*(3), 497–510. https://www.ncbi.nlm.nih.gov/pubmed/9165553

## Clinician Proficiency

Urine drug screen (UDS) immunoassays are a quick and inexpensive method for determining the presence of drugs of abuse. Many cross-reactivities exist with other analytes, potentially causing a false-positive result in an initial drug screen. (Saitman, 2014)

The antibody-based enzymatic immunoassays used for qualitative analysis of urine have significant drawbacks that clinicians are often not aware of. Recent literature suggests that there is a lack of understanding of the shortcomings of these assays by clinicians who are ordering and/or interpreting them. (Nelson, 2016)


Reisfield, G. M., Bertholf, R., Barkin, R. L., Webb, F., & Wilson, G. (2007). Urine drug test interpretation: what do physicians know? *Journal of Opioid Management*, *3*(2), 80–86. https://doi.org/10.5055/jom.2007.0044

Moeller, K. E., Kissack, J. C., Atayee, R. S., & Lee, K. C. (2017). Clinical Interpretation of Urine Drug Tests: What Clinicians Need to Know About Urine Drug Screens. *Mayo Clinic Proceedings. Mayo Clinic*, *92*(5), 774–796. https://doi.org/10.1016/j.mayocp.2016.12.007

Suzuki, J., Garayalde, S., Dodoo, M., & Rodriguez, C. (2018). Psychiatry residents' and fellows' confidence and knowledge in interpreting urine drug testing results related to opioids. *Substance Abuse: Official Publication of the Association for Medical Education and Research in Substance Abuse*, *39*(4), 518–521. https://doi.org/10.1080/08897077.2018.1469105

Sunshine, I., & Jatlow, P. I. (1975-1985). *Methodology for analytical toxicology 1*. CRC Press. https://search.worldcat.org/title/1253991

Eskridge, K. D., & Guthrie, S. K. (1997). Clinical issues associated with urine testing of substances of abuse. *Pharmacotherapy*, *17*(3), 497–510. https://www.ncbi.nlm.nih.gov/pubmed/9165553

## Clinician Proficiency

The traditional opioid immunoassay, more appropriately called the opiate immunoassay, may be the most controversial and least specific and sensitive urine drug screen available today. (Nelson, 2016)

Erroneous provider interpretation of UDT results, infrequent documentation of interpretation, lack of communication of results to patients, and prescription refills despite inaccurate interpretations are common. Expert assistance with urine toxicology interpretations may be needed to improve provider accuracy when interpreting toxicology results. (Chua, 2020)

JAMA Diagnostic Test Interpretation

# Interpretation of Urine Drug Screens
## Metabolites and Impurities

Geeta Nagpal, MD; Heather Heiman, MD; Shannon Haymond, PhD

**A 50-year-old woman** with chronic pain and recurrent infections from common variable immunodeficiency presented to a new primary care physician for management of her pain medications. Her pain was related to multiple vertebral fractures due to chronic steroid use for an inflammatory polyarthritis that was not responsive to hydroxychloriquine and methotrexate. Her pain medication regimen (methadone, 20 mg [3×/d]; immediate-release morphine, 30 mg [5×/d]; gabapentin, 1200 mg [2×/d]; duloxetine, 60 mg/d; and celecoxib, 200 mg [2×/d]) helped her independently complete instrumental activities of daily living. She reported no adverse effects (eg, somnolence or constipation). A comprehensive urine drug screen using immunoassay and mass spectrometry was ordered (**Table 1**).

**Table 1. Laboratory Test Results**

| Test Performed | Method of Detection | Patient Values (Qualitative) | Patient Values, ng/mL | Assay Cutoff, ng/mL |
|---|---|---|---|---|
| Opiates | Immunoassay | Positive | >800 | 50 |
| Codeine | Mass spectrometry | Positive | 254 | 100 |
| Morphine | Mass spectrometry | Positive | >50 000 | 100 |
| Hydrocodone | Mass spectrometry | Negative | | 100 |
| Hydromorphone | Mass spectrometry | Positive | 5792 | 100 |
| Norhydrocodone | Mass spectrometry | Negative | | 100 |
| Oxycodone | Mass spectrometry | Negative | | 100 |
| Fentanyl | Mass spectrometry | Negative | | 3 |
| Methadone | Immunoassay | Positive | >500 | 130 |
| Methadone | Mass spectrometry | Positive | 2911 | 100 |

**HOW WOULD YOU INTERPRET THESE RESULTS?**

A. The patient is taking methadone and morphine.

B. The patient is taking methadone and codeine.

C. The patient is taking methadone, hydromorphone, and codeine.

D. The patient is taking methadone, morphine, hydromorphone, and codeine.

Nagpal, G., Heiman, H., & Haymond, S. (2017). Interpretation of Urine Drug Screens: Metabolites and Impurities. *JAMA: The Journal of the American Medical Association*, *318*(17), 1704–1705. https://doi.org/10.1001/jama.2017.10910

## From the Front Lines

A 40-year-old woman with a history of polysubstance use presented to a methadone clinic with opioid use disorder and housing instability. The patient, who reported injecting intermittent cocaine and 2 to 3g of what she believed to be fentanyl per day, was initiated on methadone therapy.

Results of a urine drug screen (UDS) on her presentation day were positive for fentanyls and confirmed by liquid chromatography–mass spectrometry (parent fentanyl = 20.0 ng/mL, metabolite norfentanyl = 337.0 ng/mL).

On day 23, results of her UDS and confirmatory testing were again positive for fentanyls, although no parent fentanyl was detected on confirmation, and the norfentanyl metabolite concentration (0.7 ng/mL) was barely above the detection threshold (0.5 ng/mL).

Weiss, S. T., Chinn, M., & Veach, L. (2021). Reconsidering Reliance on Confirmatory Drug Testing in a Patient With Repeated Positive Urine Drug Screen Results: A Teachable Moment. *JAMA Internal Medicine*, *181*(12), 1637–1638. https://doi.org/10.1001/jamainternmed.2021.6215

This result was misinterpreted as the patient having relapsed, and she was discharged from clinic-associated housing despite her disavowal of new fentanyl use. Results of UDS on days 30 and 45 were negative for fentanyls. The patient struggled to maintain sobriety owing to her housing instability and subsequently relapsed, testing positive for fentanyls by UDS on day 51.

**Severe psychosocial repercussions to patients due to clinicians misinterpreting drug testing results can include loss of employment or housing, revocation of parole or probation, loss of child custody, and dismissal from a medical practice.**

Weiss, S. T., Chinn, M., & Veach, L. (2021). Reconsidering Reliance on Confirmatory Drug Testing in a Patient With Repeated Positive Urine Drug Screen Results: A Teachable Moment. *JAMA Internal Medicine*, *181*(12), 1637–1638. https://doi.org/10.1001/jamainternmed.2021.6215

Michener, P. S., Knee, A., Wilson, D., Boama-Nyarko, E., & Friedmann, P. D. (2024). Association of random and observed urine drug screening with long-term retention in opioid treatment programs. *Drug and Alcohol Dependence*, *255*(111067), 111067. https://doi.org/10.1016/j.drugalcdep.2023.111067

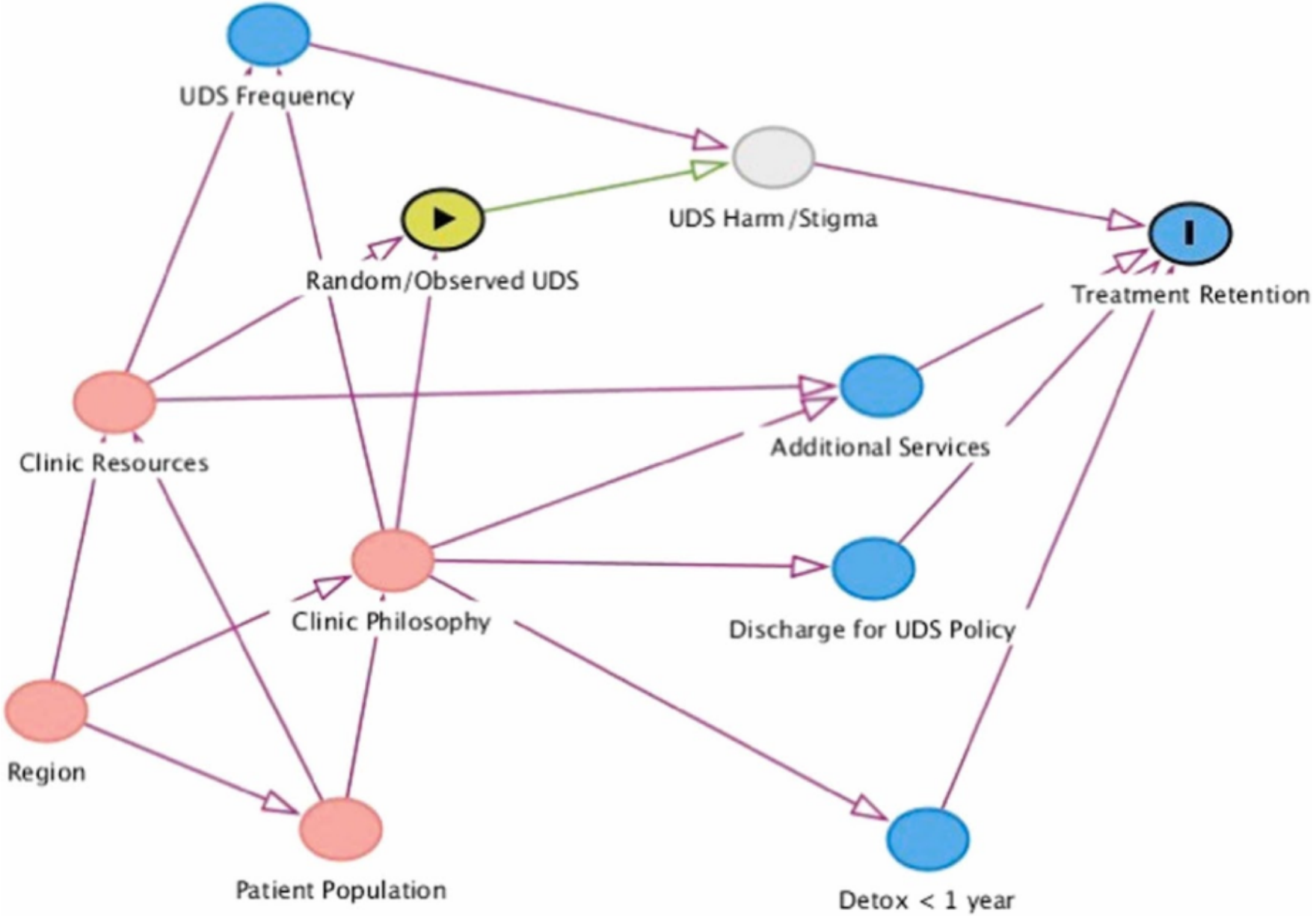



Fig. 1. Directed acyclic graph (DAG) for the hypothesized relationship between urine drug screening (UDS) modality and long-term retention in treatment. Minimum sufficient adjustment sets tested were a) clinic philosophy and clinic resources* or b) additional services, clinic philosophy, and UDS frequency. Figure created using DAGitty (Textor et al., 2016) * indicates primary model used in fractional logit regression modeling. (Michener, 2024)

Although there are mandates for UDT testing among methadone enrollees, there are no national mandates for UDT testing in buprenorphine enrollees.

[S]ome providers may deemphasize UDT during MOUD treatment because UDT results are unlikely to yield new information for stable patients and because UDT results can have poor sensitivity and specificity. While false negatives may lead providers to believe that patients are not adhering to treatment, false positives could halt treatment or impact parole or child welfare cases.

Hammerslag, L., Talbert, J., Donohue, J. M., Sharbaugh, M., Ahrens, K., Allen, L., Austin, A. E., Gordon, A. J., Jarlenski, M., Kim, J. Y., Mohamoud, S., Tang, L., Burns, M., & Writing committee for MODRN. (2023). Urine drug testing among Medicaid enrollees initiating buprenorphine treatment for opioid use disorder within 9 MODRN states. *Drug and Alcohol Dependence*, *250*, 110875. https://doi.org/10.1016/j.drugalcdep.2023.110875

# San Francisco ties welfare to drug-screening, boosts police powers in stunning tough-on-crime shift

San Francisco Mayor London Breed delivers her State of the City address at Pier 27 in San Francisco. (Eric Risberg / Associated Press)

BY HANNAH WILEY | STAFF WRITER

MARCH 9, 2024 3 AM PT


**SUBSCRIBERS ARE READING** ›

UCLA SPORTS

Commentary: UCLA-LSU is America's sweethearts vs. its basketball villains

CLIMATE & ENVIRONMENT

Rattlesnakes on Santa Catalina Island have learned that it pays to be unusually aggressive

BUSINESS

The IRS wants to give California taxpayers $94 million in refunds — if they file returns

BUSINESS

FOR SUBSCRIBERS

Fisker had big dreams to compete with Tesla. What went wrong with this Manhattan Beach company?

CALIFORNIA

Metro's top security officer ousted days after filing complaint with inspector general





Wiley, H. (2024, March 9). San Francisco ties welfare to drug-screening, boosts police powers in stunning tough-on-crime shift. *Los Angeles Times*. https://www.latimes.com/california/story/2024-03-09/san-francisco-welfare-drug-screening-police-crime-vote

Table 1. SAMHSA Patient Care Regulations (42 C.F.R. § 8.12)

| Requirements | Access Issues | Options |
|---|---|---|
| Admission Criteria | Constrains who may be admitted to opioid treatment program | SAMHSA removes or amends patient care regulations through regulation or guidance |
| Ancillary Services | Unclear – provider costs; negative patient experience | |
| Toxicological Testing | Provider costs; negative patient experience | |
| Mode of Administration | Limits to take-home supplies | |
| Interim Maintenance Treatment | Unclear – may discourage treatment | |

"Together, the requirements discussed in this Article form a thicket of particularized regulatory requirements that healthcare practitioners and patients must endure to provide or receive treatment."

# Review of Evidence

Robert L. DuPont, MD, president of the Institute for Behavior and Health and the first director of the National Institute on Drug Abuse (NIDA) in the 1970s, eschews subtlety when discussing his views on the importance of drug testing to addiction treatment services.

"Drug testing is the technology of addiction medicine," says DuPont. He adds, "It is vastly underutilized, both in terms of prevention and treatment."

*Testing is `the technology of addiction`* . (2014, March 7). https://www.hmpgloballearningnetwork.com/site/behavioral/article/testing-technology-addiction

Gottheil, E., Caddy, G. R., & Austin, D. L. (1976). Fallibility of urine drug screens in monitoring methadone programs. *JAMA: The Journal of the American Medical Association*, *236*(9), 1035–1038. https://www.ncbi.nlm.nih.gov/pubmed/989579
Lundberg, G. D. (1972). Urine drug screening: chemical McCarthyism. *The New England Journal of Medicine*, *287*(14), 723–724. https://doi.org/10.1056/NEJM197210052871419
Goldstein, A., Horns, W. H., & Hansteen, R. W. (1977). Is on-site urine testing of therapeutic value in a methadone treatment program? *The International Journal of the Addictions*, *12*(6), 717–728. https://doi.org/10.3109/10826087709024121

1976

H

# Fallibility of Urine Drug Screens in Monitoring Methadone Programs

Edward Gottheil, MD, PhD; Glenn R. Caddy, PhD; Deborah L. Austin

**• Urine specimens containing five different drugs, each at three levels of concentration with zero to five drugs in a specimen, were sent to two "approved" laboratories. In only 46.9% and 13.8%, respectively, were all drugs present correctly identified and no false-positive results reported. With some allowances, the results improved to 53.8% and 49.4%.**

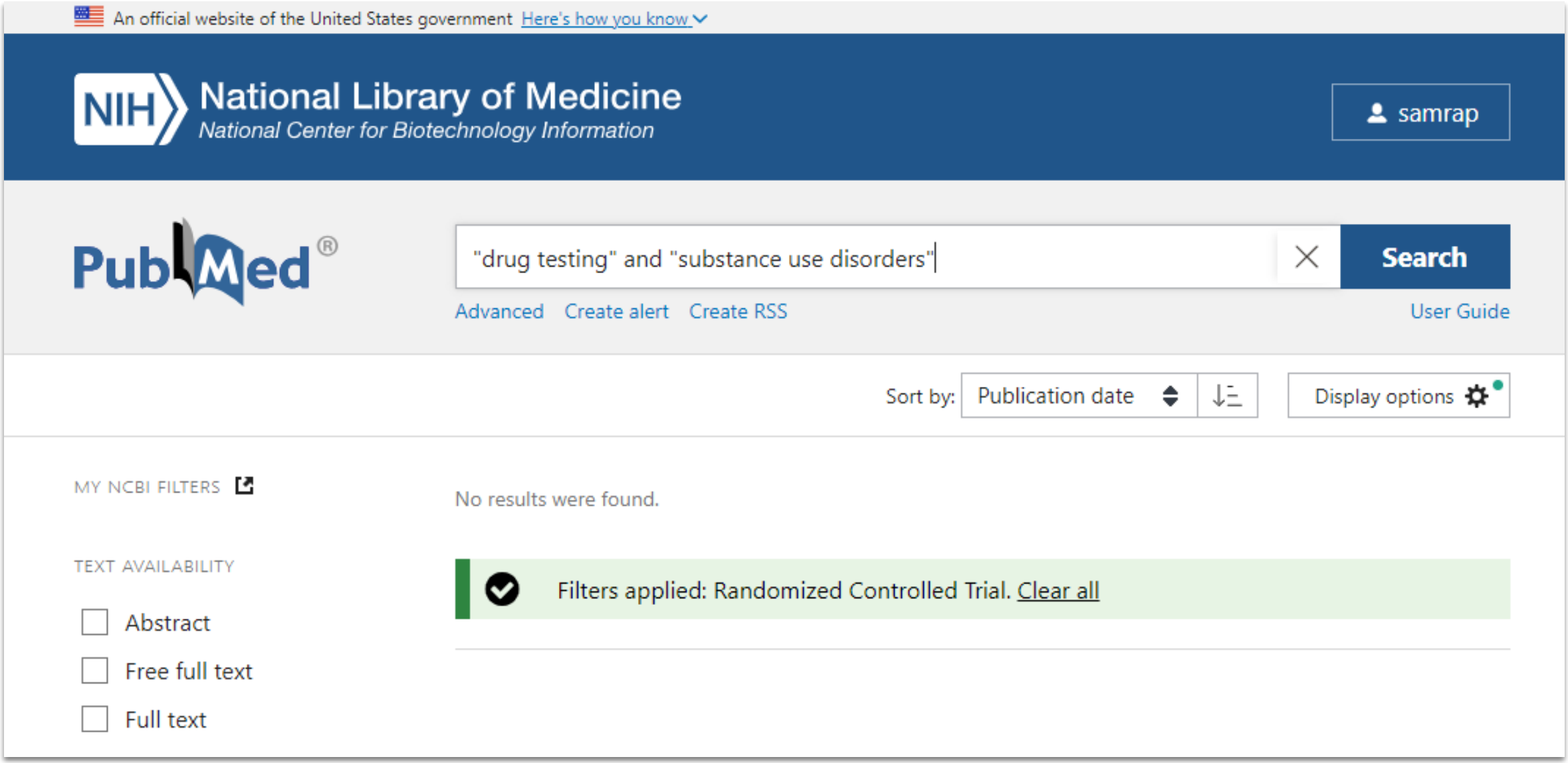
**If these tests are to be continued then (1) the fallibility of these tests should be known by all treatment personnel, (2) laboratories should be licensed rather than merely approved, and (3) maintenance of the license should be made contingent on passing "blind" proficiency tests.**

**(*JAMA* 236:1035-1038, 1976)**

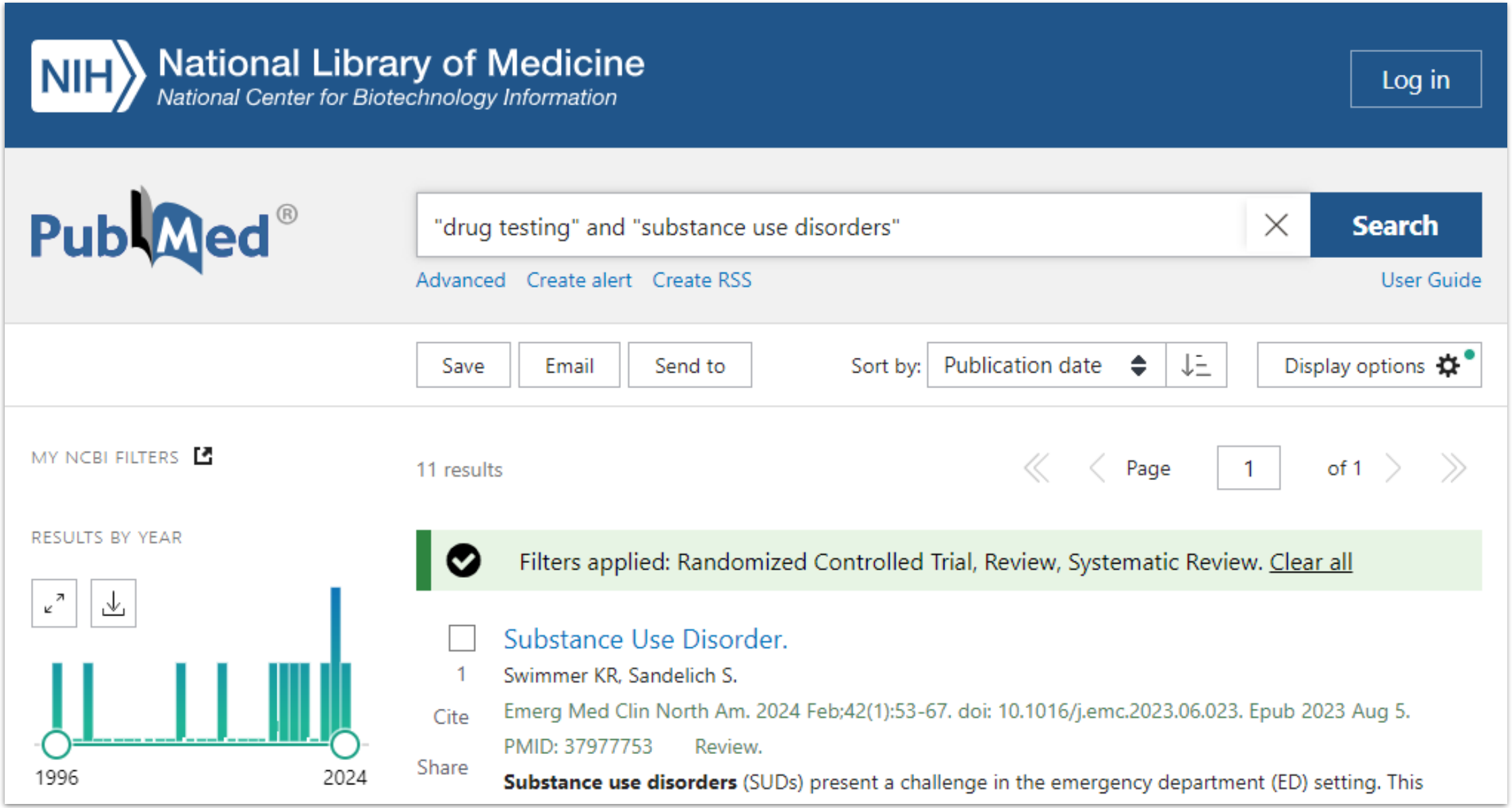
CURRENT federal regulations stipulate that urine specimens from all patients in methadone programs must be tested at least weekly for opiates and monthly for amphetamines, meth

few reports on the reliability and validity of these tests. Riordan et al[2] did an extensive reliability study in which 2,395 urine specimens were obtained from methadone maintained

to the laboratories for analysis in clearly recognized containers. Even under these known test conditions, one CDC survey of 208 laboratories found that only 59% received satisfactory scores of 80 to 100.[1] In view of these results, what level of proficiency should we expect of these laboratories in their routine, day-to-day operations? To be approved, the federal regulations only require that the laboratories participate in the proficiency testing program: they do not set a standard, required level of proficiency. There are no provisions for a licensing procedure or penalties for poor proficiency test results




*"drug testing" and "substance use disorders" and "randomized controlled trials" = 0*




*"drug testing" and "substance use disorders" and "randomized controlled trials" or "review" or "systematic review" = 11 [none relevant]*

## Results [2014]:

Eight studies met the inclusion criteria: one randomized clinical trial, two quasi-randomized studies, one cohort, and four cross-sectional studies. The methodological quality was judged to be poor, with the exception of the randomized clinical trial (fair quality). **The value of UDS in managing patients was not clearly indicated in these studies.**

## Conclusions:

**Few studies, with poor quality, have assessed the value of UDS in managing patients using psychoactive substances**; though with insufficiency to demonstrate the interest of carrying out UDS. Therefore, pragmatic intervention studies are necessary.

Dupouy, J. (2015). *Comment améliorer la prise en charge ambulatoire des patients dépendants aux opiacés ? : approche pharmacoépidémiologique de l'intérêt des tests urinaires de dépistage des substances psychoactives* [Toulouse 3]. http://www.theses.fr/2015TOU30001
Dupouy, J., Mémier, V., Catala, H., Lavit, M., Oustric, S., & Lapeyre-Mestre, M. (2014). Does urine drug abuse screening help for managing patients? A systematic review. *Drug and Alcohol Dependence*, *136*, 11–20. https://doi.org/10.1016/j.drugalcdep.2013.12.009

## Results [2019]:

Of the 60 potentially eligible articles reviewed, only one three-arm randomized open-label trial, comparing weekly and monthly UDS testing with take-home OAT doses, met our inclusion criteria.

McEachern, J., Adye-White, L., Priest, K. C., Moss, E., Gorfinkel, L., Wood, E., Cullen, W., & Klimas, J. (2019). Lacking evidence for the association between frequent urine drug screening and health outcomes of persons on opioid agonist therapy. *The International Journal on Drug Policy*, *64*, 30–33. https://doi.org/10.1016/j.drugpo.2018.08.006
Kolla, B. P., Callizo, G. L., & Schneekloth, T. D. (2019). Utility of Urine Drug Testing in Outpatient Addiction Evaluations. *Journal of Addiction Medicine*, *13*(3), 188–192. https://doi.org/10.1097/ADM.0000000000000477
Hammerslag L, Talbert J, Donohue JM, et al. Urine drug testing among Medicaid enrollees initiating buprenorphine treatment for opioid use disorder within 9 MODRN states. Drug Alcohol Depend. 2023;250:110875.
Delaney SR, Tacker DH, Snozek CLH. The North American opioid epidemic: opportunities and challenges for clinical laboratories. Crit Rev Clin Lab Sci. 2022;59(5):309-331.

Urine testing for drugs of abuse is a two-step process. In the first step, screening assays  are used to identify presumably positive specimens. Common screening tests are radioimmunoassays, enzyme immunoassays, fluorescence polarization immunoassay, and thin layer chromatography. Since they may be subject to cross-reactivity, once a possible positive sample has been identified by a preliminary test, a second more specific methodology, gas chromatography with mass spectrometry, is done to confirm the results.

Knowledge of the pharmacology and pharmacokinetics of abused drugs affects selection and interpretation of test results.

Eskridge, K. D., & Guthrie, S. K. (1997). Clinical issues associated with urine testing of substances of abuse. *Pharmacotherapy*, *17*(3), 497–510. https://www.ncbi.nlm.nih.gov/pubmed/9165553

Treatment recommendations and diagnoses were altered after review of drug testing results in 1 patient (0.5%). However, in the remainder, all patients were already diagnosed with a severe substance use disorder and had received recommendations to initiate residential/outpatient substance use treatment.

Conclusions: Among patients completing urine drug testing during outpatient substance use disorder evaluation positive screens alerted providers to undisclosed persistent substance use and potential withdrawal in 8% of the cohort and resulted in a change in diagnoses and/or treatment in 1 patient.

Kolla, B. P., Callizo, G. L., & Schneekloth, T. D. (2019). Utility of Urine Drug Testing in Outpatient Addiction Evaluations. *Journal of Addiction Medicine*, *13*(3), 188–192. https://doi.org/10.1097/ADM.0000000000000477

- Urine drug screening (UDS) practices are variable in US opioid treatment providers.
- Random and observed UDS practices may be stigmatizing for methadone clients.
- High use of random and observed UDS is associated with lower treatment retention.

Michener, P. S., Knee, A., Wilson, D., Boama-Nyarko, E., & Friedmann, P. D. (2024). Association of random and observed urine drug screening with long-term retention in opioid treatment programs. *Drug and Alcohol Dependence*, *255*(111067), 111067. https://doi.org/10.1016/j.drugalcdep.2023.111067

## Results

All five manufacturing lots cross-reacted with fentanyl and eleven fentanyl analogs. Diphenhydramine, lidocaine, MDMA, and methamphetamine were found to cause false positives with the strips. There was notable lot-to-lot variability in the sensitivity of the strips for fentanyl, fentanyl analogs, and known interferences.

Halifax, J. C., Lim, L., Ciccarone, D., & Lynch, K. L. (2024). Testing the test strips: laboratory performance of fentanyl test strips. *Harm Reduction Journal*, *21*(1), 14. https://doi.org/10.1186/s12954-023-00921-8

# Review of Evidence & Increasing Confusion

With no clear guidance regarding the specific number of drug tests to be performed per year in the outpatient setting, testing rates are likely to be determined by local practice patterns, provider discretion, and a variety of patient-specific factors. Tennessee, for example, recommends a minimum number of drug tests per year depending on a patient's treatment duration, requiring at least twelve random tests during the first year of OUD treatment. (TDH, 2020; TDH, 2021).

Our Canadian guideline and policy scan found that UDS frequency recommendations vary greatly among Provinces for persons receiving opioid agonist therapy for opioid use disorder.

Barenie, R. E., Bateman, B. T., Connery, H. S., Tsacogianis, T., & Kesselheim, A. S. (2024). Rates and costs of drug testing practices for private payors in the outpatient setting in the United States, 2015-2019. *Journal of Substance Use and Addiction Treatment* , *159*, 209243. https://doi.org/10.1016/j.josat.2023.209243
Moss, E., McEachern, J., Adye-White, L., Priest, K. C., Gorfinkel, L., Wood, E., Cullen, W., & Klimas, J. (2018). Large Variation in Provincial Guidelines for Urine Drug Screening during Opioid Agonist Treatment in Canada. *The Canadian Journal of Addiction* , *9*(2), 6–9. https://doi.org/10.1097/CXA.0000000000000015

# Monitoring buprenorphine in patients on medication-assisted treatment

## 2024

ARTICLE INFO

*Keywords:*
buprenorphine
norbuprenorphine
naloxone
urine drug testing
oral fluid drug testing

DOI:10.5055/jom.0844


ABSTRACT

***Background:*** *Buprenorphine is used for medication-assisted treatment of opioid dependence.*

***Purpose:*** *Monitoring of medication adherence involves testing of urine or oral fluid for the drug or its metabolite.*

***Methods:*** *Quantitative results using liquid chromatography tandem mass spectrometer testing defined the excretion pattern of the drug and its metabolites.*

***Results:*** *Frequency distribution curves of buprenorphine and norbuprenorphine describe the expected drug concentrations of patients on this medication.*

***Conclusion:*** *Urine and oral fluid drug testing can be used to monitor adherence in this population.*

Pesce, A., Bollman, K., Krock, K., Cua, A., Tran, K., & Thomas, R. (2024). Monitoring buprenorphine in patients on medication-assisted treatment. *Journal of Opioid Management*, *20*(1), 15–20. https://doi.org/10.5055/jom.0844

A quality-of-life outcome attained consensus at the concept stage. However, in rounds 2 and 3 the consensus shifted downwards to 48 and 50%, respectively. After discussion with the research group, it was decided to remove it.

A urine toxicology measure had a similar rating profile, scoring 84% in round 1, but falling to 50 and 41% in rounds 3 and 4, respectively, so the group determined that the initial high rankings merited inclusion of an ObsRO (observer-reported) measure in the COS (core outcome set).

***Proposed Metric***

After a specified start date to end-point or specified period of enrollment in MOUD or MOUD-PSI: the patient is defined as a 'treatment responder' if, in the past 21 days, they provide at least two urine drug screening tests in different weeks that are negative for opioids [2022]

Karnik, N. S., Marsden, J., McCluskey, C., Boley, R. A., Bradley, K. A., Campbell, C. I., Curtis, M. E., Fiellin, D., Ghitza, U., Hefner, K., Hser, Y.-I., McHugh, R. K., McPherson, S. M., Mooney, L. J., Moran, L. M., Murphy, S. M., Schwartz, R. P., Shmueli-Blumberg, D., Shulman, M., … Wu, L.-T. (2022). The opioid use disorder core outcomes set (OUD-COS) for treatment research: findings from a Delphi consensus study. *Addiction* , *117*(9), 2438–2447. https://doi.org/10.1111/add.15875

# Harm Reduction Services for People Who Use Drugs: Exploring Data Collection, Evidence Gaps, and Research

## Proceedings of a Workshop—in Brief

Given the public health emergency posed by drug overdoses, there have been calls for a comprehensive approach to drug policy that would include focusing on reducing harm for people who use drugs (PWUD). To explore data collection efforts, evidence gaps, and research needs for harm reduction for PWUD, the National Academies of Sciences, Engineering, and Medicine hosted a virtual workshop on January 30–31, 2024, sponsored by the Office of National Drug Control Policy (ONDCP), Executive Office of the President.[1] The workshop focused on harm reduction strategies and services that aim to prevent overdose and infectious disease transmission; enhance the health, safety, and well-being of PWUD; and offer low-threshold options[2] for accessing substance use disorder (SUD) treatment. This Proceedings of a Workshop—in Brief summarizes the presentations and discussions that occurred at the workshop.[3] Box 1 provides key messages identified by individual speakers about research needs, evidence gaps, and data collection. Alan Leshner, former director of the National Institute on Drug Abuse (NIDA) at the National Institutes of Health (NIH), said ONDCP's request for this workshop indicates that the federal government understands the importance of taking a public health approach to substance use and addiction. Harm reduction, he explained, describes a range of interventions—medications for opioid use disorder (MOUD), overdose reversal medications (e.g., naloxone), syringe services programs (SSPs), supervised consumption sites, decriminalization, and others—that save lives and help restore individuals to full participation in their families and society.

### GOALS AND PRIORITIES OF THE BIDEN ADMINISTRATION

Rahul Gupta, ONDCP director, said that an American dies every 5 minutes from substance use, illustrating the need to revise how the United States responds to the overdose crisis. This is why in 2022 President Biden shifted the national drug control strategy[4] to focus on people, their health, and two drivers of the overdose crisis: untreated addiction and drug trafficking profits.

[1] The workshop agenda and presentations are available at https://www.nationalacademies.org/event/41627_01-2024_harm-reduction-services-for-people-who-use-drugs-exploring-data-collection-evidence-gaps-and-research-needs-a-workshop (accessed February 13, 2024).
[2] Low-threshold treatment options emphasize removing the barriers common to accessing treatment and ensuring equitable access to care and treatment. See https://integrationacademy.ahrq.gov/products/topic-briefs/oud-low-threshold-treatment (accessed March 7, 2024).
[3] This Proceedings of a Workshop—in Brief is not intended to provide a comprehensive summary of information shared during the workshop. The information summarized here reflects the knowledge and opinions of individual workshop participants and should not be seen as a consensus of the workshop participants, the planning committee, or the National Academies of Sciences, Engineering, and Medicine.
[4] Additional information is available at https://www.whitehouse.gov/ondcp/the-administrations-strategy/national-drug-control-strategy (accessed March 4, 2024).



### INTERNATIONAL HARM-REDUCTION PROGRAMS

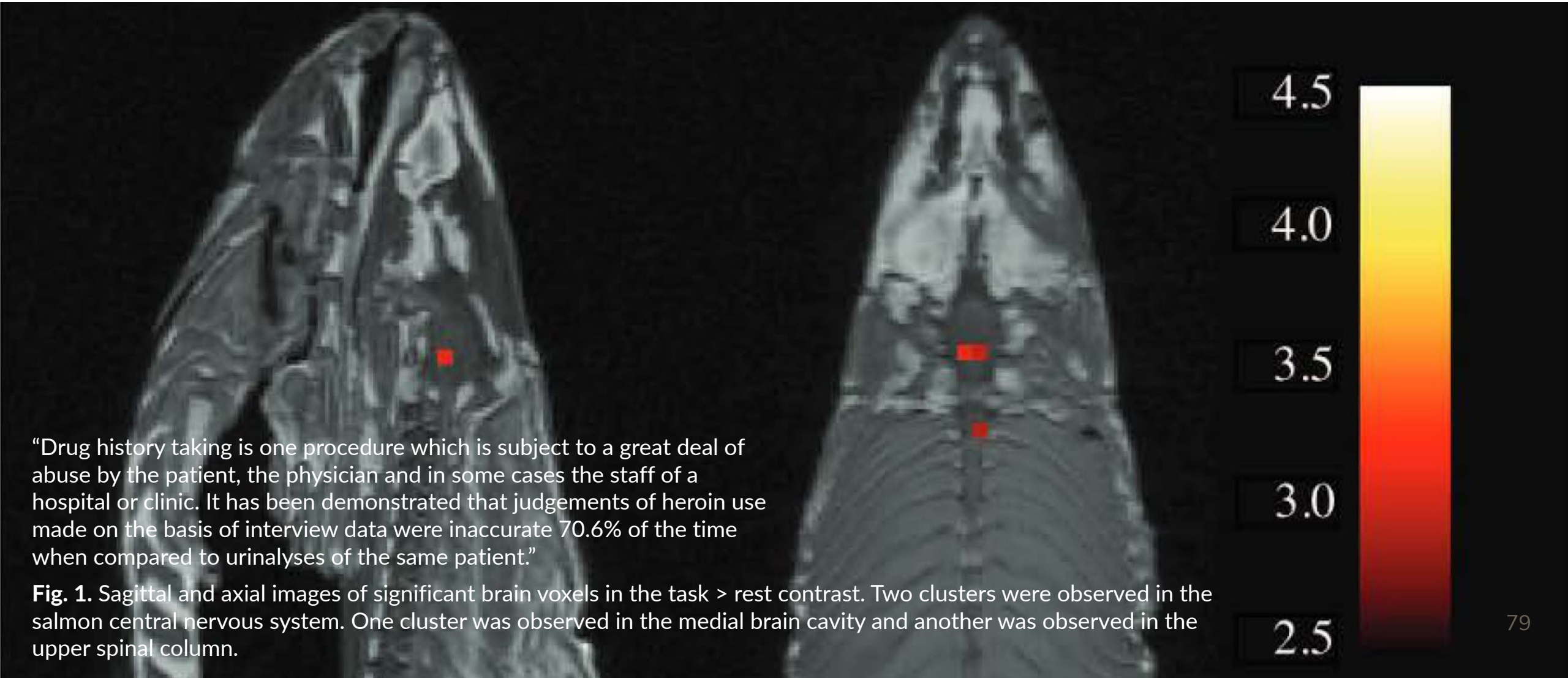
Marie Jauffret-Roustide (France's National Institute for Health and Medical Research) said that France's model focuses on providing widespread access to MOUD: 87 percent of people in France with opioid dependence receive MOUD versus less than 25 percent in the United States. France has one of Europe's lowest overdose rates, due in part to widespread access to harm reduction services and MOUD, although the absence of fentanyl in France is also a major difference. There are several contributors to the model's success, she said. The HIV crisis shocked the nation in the 1980–1990s, leading to collaborations among activists, PWUD's collectives, care providers, researchers politicians, and others to implement harm reduction policies. In addition, France's welfare system strongly supports harm reduction, making services and MOUD free for people, including those living in precarious conditions, due to sustainable funding. There is far less urine testing in France for people on MOUD, which helps build trust between physicians and PWUD. However, France's enforcement approach limits the spread of some services such as drug consumption rooms, despite research showing their effectiveness as harm reduction strategies.

National Academies of Sciences, Engineering, & Medicine. (2024). *Harm Reduction Services for People Who Use Drugs: Exploring Data Collection, Evidence Gaps, and Research: Proceedings of a Workshop–in Brief*. https://doi.org/10.17226/27650

# Neural correlates of interspecies perspective taking in the post-mortem Atlantic Salmon: An argument for multiple comparisons correction

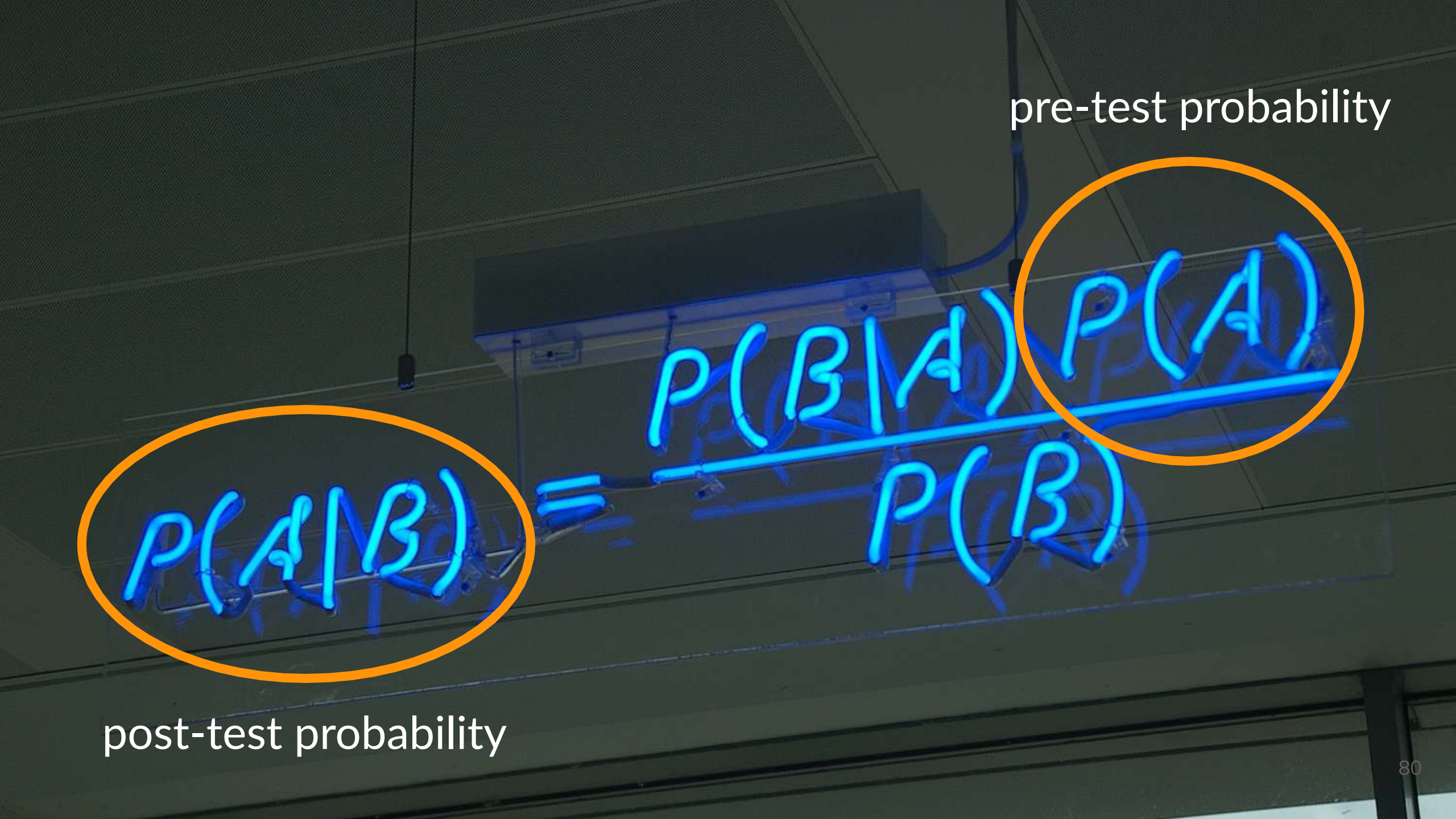
Craig M. Bennett[1], Abigail A. Baird[2], Michael B. Miller[1], and George L. Wolford[3]

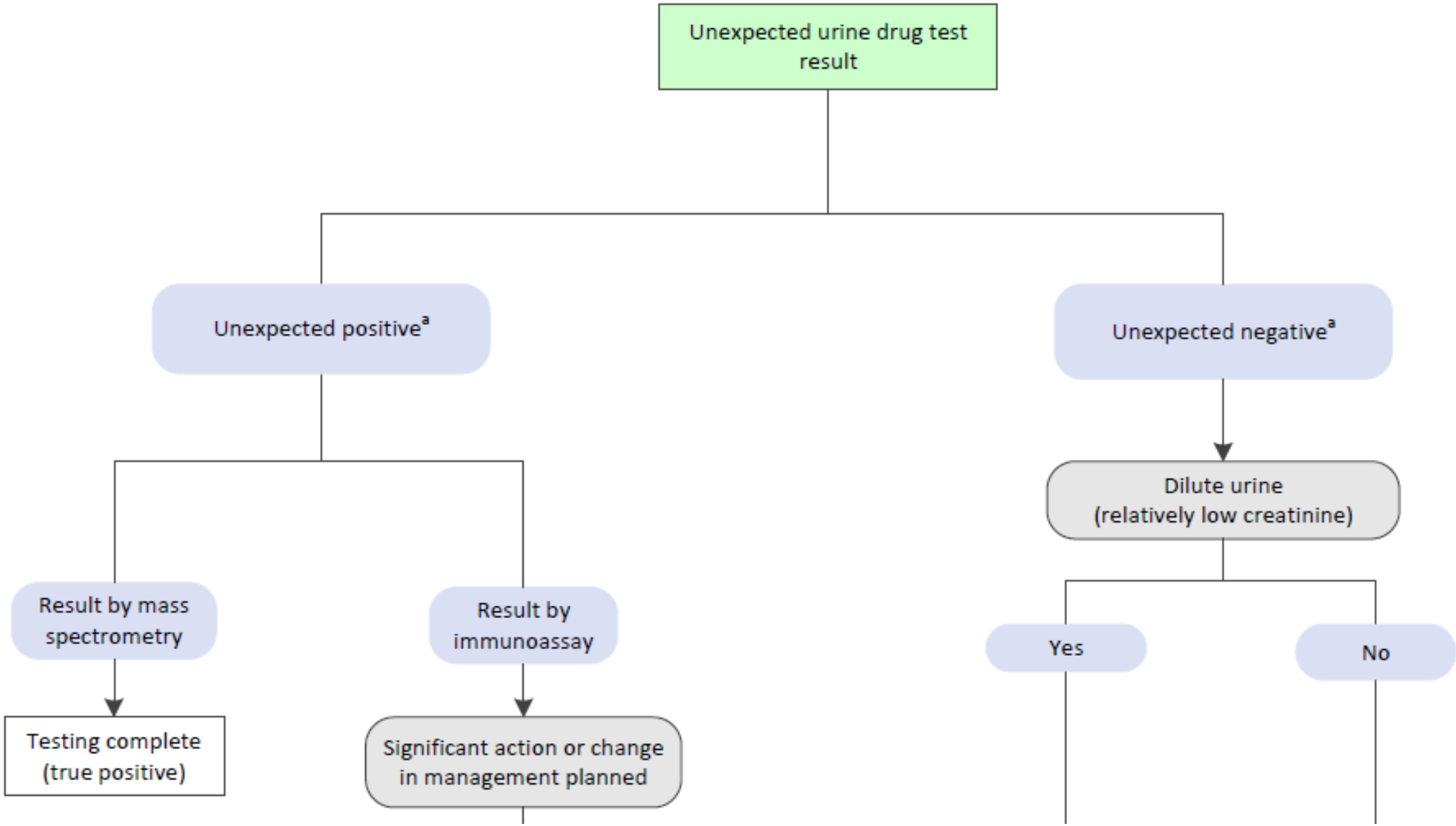
[1] Psychology Department, University of California Santa Barbara, Santa Barbara, CA; [2] Department of Psychology, Vassar College, Poughkeepsie, NY;
[3] Department of Psychological & Brain Sciences, Dartmouth College, Hanover, NH




"Drug history taking is one procedure which is subject to a great deal of abuse by the patient, the physician and in some cases the staff of a hospital or clinic. It has been demonstrated that judgements of heroin use made on the basis of interview data were inaccurate 70.6% of the time when compared to urinalyses of the same patient."

**Fig. 1.** Sagittal and axial images of significant brain voxels in the task > rest contrast. Two clusters were observed in the salmon central nervous system. One cluster was observed in the medial brain cavity and another was observed in the upper spinal column.


pre-test probability
$P(A|B) = \frac{P(B|A)\,P(A)}{P(B)}$
post-test probability




*Urine Drug Testing (Unexpected Results) Algorithm* . (2023, May). https://arupconsult.com/algorithm/urine-drug-testing-unexpected-results

Laine, C. (2012). High-value testing begins with a few simple questions. *Annals of Internal Medicine*, *156*(2), 162–163. https://doi.org/10.7326/0003-4819-156-2-201201170-00016

*Table.* **Questions Physicians Should Ask Themselves Before Ordering Tests**

Did the patient have this test previously?
- If so, what is the indication for repeating it? Is the result of a repeated test likely to be substantively different from the last result?
- If it was done recently elsewhere, can I get the result instead of repeating the test?

Will the test result change my care of the patient?

What are the probability and potential adverse consequences of a false-positive result?

Is the patient in potential danger over the short term if I do not perform this test?

Am I ordering the test primarily because the patient wants it or to reassure the patient?
- If so, have I discussed the above issues with the patient?
- Are there other strategies to reassure the patient?

## People stay in treatment that meets them where they are …

The more effective clinics were characterised by prescribing higher doses of methadone, having a treatment goal of successful ongoing maintenance rather than abstinence, and having better quality counselling, more medical services, better staff-patient relationships, low staff turnover rates, and better management.

Conclusions: A substantial proportion of OAT patients in our sample reported dissatisfaction with their OAT, and more than half were exposed to fentanyl. We also found that those who were dissatisfied with their OAT were more likely to be exposed to fentanyl. These findings demonstrate the importance of optimizing OAT satisfaction in the context of the ongoing opioid overdose crisis.

Principle 1. Treatment should be available, accessible, **attractive**, and appropriate.

Farrell, M., Ward, J., Mattick, R., Hall, W., Stimson, G. V., des Jarlais, D., Gossop, M., & Strang, J. (1994). Methadone maintenance treatment in opiate dependence: a review. *BMJ* , *309*(6960), 997–1001. https://doi.org/10.1136/bmj.309.6960.997
Mackay, L., Kerr, T., Fairbairn, N., Grant, ., Milloy, M.-J., & Hayashi, K. (2021). The relationship between opioid agonist therapy satisfaction and fentanyl exposure in a Canadian setting. *Addiction Science & Clinical Practice*, *16*(1), 26. https://doi.org/10.1186/s13722-021-00234-w
*International Standards for the Treatment of Drug Use Disorders* . (2020, March 31). World Health Organization. https://www.who.int/publications/i/item/international-standards-for-the-treatment-of-drug-use-disorders

## … And are harmed when they are not in treatment.

In 1976, an OTP in Bakersfield, CA closed. Only 11 of 99 patients were able to transfer to another OTP due to travel distance. Fifty-four percent of the terminated clients became re-addicted to heroin, and the arrest and incarceration rates were approximately double that for the comparison sample.

Continued fentanyl use and relapse are common in this cohort of methadone patients; however, many patients succeeded in achieving prolonged sustained remission. Further, no deaths occurred in this cohort while patients were retained on MMT. This study is further evidence that MMT is protective against mortality despite a potentially higher relapse rate in this cohort. Even if MMT is able to increase tolerance and prevent overdose deaths, our findings do not rule out the possibility that MMT may be insufficient to completely extinguish illicit opioid use in a fentanyl-endemic area.

McGlothlin, W. H., & Anglin, M. D. (1981). Shutting off methadone. Costs and benefits. *Archives of General Psychiatry*, *38*(8), 885–892. https://doi.org/10.1001/archpsyc.1981.01780330043004
Stone, A. C., Carroll, J. J., Rich, J. D., & Green, T. C. (2020). One year of methadone maintenance treatment in a fentanyl endemic area: Safety, repeated exposure, retention, and remission. *Journal of Substance Abuse Treatment*, *115*(108031), 108031. https://doi.org/10.1016/j.jsat.2020.108031

[2010]

Today, in the light of revised treatment objectives—**improving the health and social status of patients ranging above reaching abstinence**—harm reduction is considered an ally rather than an opponent of treatment. Accordingly, the treatment system must be an integrated system that enables abstinence and harm reduction services to work together, in order to provide a continuum of care, including:

- Easily accessible low-threshold services that meet the immediate needs of continuing drug users
- Clear processes for motivating users to move away from drug-dependent lifestyles
- Clear processes for referring users into structured treatment programmes **that promote stabilization or abstinence**

Uchtenhagen, A. A. (2010). Ethical perspectives in caring for people living with addictions: The European experience. *International Review of Psychiatry* , *22*(3), 274–280. https://doi.org/10.3109/09540261.2010.482097

# Reflections on Testing during COVID-19

Pytell, J. D., & Rastegar, D. A. (2021). Down the drain: Reconsidering routine urine drug testing during the COVID-19 pandemic. *Journal of Substance Abuse Treatment*, *120*, 108155. https://doi.org/10.1016/j.jsat.2020.108155

Khatri, U. G., & Aronowitz, S. V. (2021). Considering the harms of our habits: The reflexive urine drug screen in opioid use disorder treatment. *Journal of Substance Abuse Treatment*, *123*(108258), 108258. https://doi.org/10.1016/j.jsat.2020.108258

Incze, M. A. (2021). Reassessing the Role of Routine Urine Drug Screening in Opioid Use Disorder Treatment. *JAMA Internal Medicine*, *181*(10), 1282–1283. https://doi.org/10.1001/jamainternmed.2021.4109

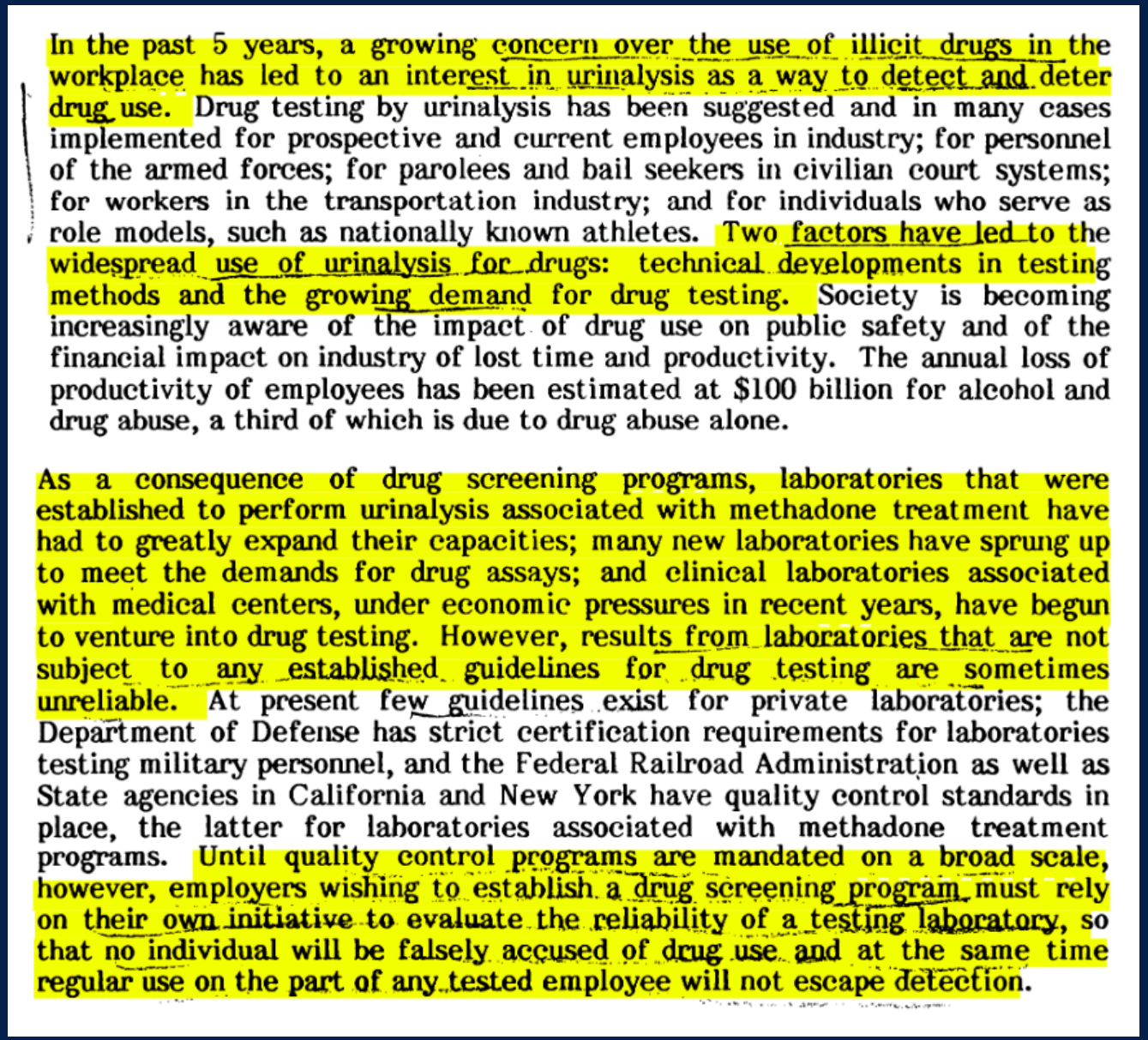
# Guidelines

# U.S. Guidelines


1. *TIP 1: State Methadone Treatment Guidelines*. (1993). CSAT.
2. Institute of Medicine (US) Committee on Federal Regulation of Methadone Treatment, Rettig, R. A., & Yarmolinsky, A. (1995). *Treatment Standards and Optimal Treatment*. National Academies Press (US). https://www.ncbi.nlm.nih.gov/books/NBK232109/
3. Public policy statement on drug testing as a component of addiction treatment and monitoring programs and in other clinical settings. (2003). *Journal of Addictive Diseases*, *22*(3), 114–119. https://www.ncbi.nlm.nih.gov/pubmed/14621351
4. Center for Substance Abuse Treatment. (2004). *Clinical Guidelines for the Use of Buprenorphine in the Treatment of Opioid Addiction*. Substance Abuse and Mental Health Services Administration (US). https://www.ncbi.nlm.nih.gov/pubmed/22514846
5. Center for Substance Abuse Treatment. (2005). *TIP 43: Medication-Assisted Treatment for Opioid Addiction in Opioid Treatment Programs*. Substance Abuse and Mental Health Services Administration (US). https://www.ncbi.nlm.nih.gov/books/NBK64164/
6. *TAP 32: Clinical Drug Testing in Primary Care*. (2012). https://store.samhsa.gov/product/tap-32-clinical-drug-testing-primary-care/sma12-4668

# U.S. Guidelines


7. *Drug Testing: A White Paper of the American Society of Addiction Medicine (ASAM)*. (2013). American Society of Addiction Medicine.
8. *Federal Guidelines for Opioid Treatment Programs*. (2015). SAMHSA. https://store.samhsa.gov/product/federal-guidelines-opioid-treatment-programs/pep15-fedguideotp
9. *The ASAM appropriate use of drug testing consensus document*. (2017). American Society of Addiction Medicine. https://www.asam.org/quality-care/clinical-guidelines/drug-testing
10. *Ethical Use of Drug Testing in the Practice of Addiction Medicine*. (2019). American Society of Addiction Medicine.
11. Substance Abuse and Mental Health Services Administration. (2021, July). *TIP 63: Medications for Opioid Use Disorders – Full Document*. https://store.samhsa.gov/product/TIP-63-Medications-for-Opioid-Use-Disorder-Full-Document/PEP21-02-01-002
12. Stolbach, A., Connors, N., Nelson, L., & Kulig, K. (2022). ACMT Position Statement: Interpretation of Urine Opiate and Opioid Tests. *Journal of Medical Toxicology: Official Journal of the American College of Medical Toxicology*, *18*(2), 176–179. https://doi.org/10.1007/s13181-021-00864-1



In the past 5 years, a growing concern over the use of illicit drugs in the workplace has led to an interest in urinalysis as a way to detect and deter drug use. Drug testing by urinalysis has been suggested and in many cases implemented for prospective and current employees in industry; for personnel of the armed forces; for parolees and bail seekers in civilian court systems; for workers in the transportation industry; and for individuals who serve as role models, such as nationally known athletes. Two factors have led to the widespread use of urinalysis for drugs: technical developments in testing methods and the growing demand for drug testing. Society is becoming increasingly aware of the impact of drug use on public safety and of the financial impact on industry of lost time and productivity. The annual loss of productivity of employees has been estimated at $100 billion for alcohol and drug abuse, a third of which is due to drug abuse alone.

As a consequence of drug screening programs, laboratories that were established to perform urinalysis associated with methadone treatment have had to greatly expand their capacities; many new laboratories have sprung up to meet the demands for drug assays; and clinical laboratories associated with medical centers, under economic pressures in recent years, have begun to venture into drug testing. However, results from laboratories that are not subject to any established guidelines for drug testing are sometimes unreliable. At present few guidelines exist for private laboratories; the Department of Defense has strict certification requirements for laboratories testing military personnel, and the Federal Railroad Administration as well as State agencies in California and New York have quality control standards in place, the latter for laboratories associated with methadone treatment programs. Until quality control programs are mandated on a broad scale, however, employers wishing to establish a drug screening program must rely on their own initiative to evaluate the reliability of a testing laboratory, so that no individual will be falsely accused of drug use and at the same time regular use on the part of any tested employee will not escape detection.

"Two factors have led to the widespread use of urinalysis for drugs: technical developments in testing methods and the growing demand for drug testing."

**Missing:**

Improved outcomes for patients as a reason for testing.

[NIDA, 1986]

*Urine Testing for Drugs of Abuse*. NIDA Monograph; 1986.

The consensus panel recommends that initial and ongoing drug screening should be used to detect or confirm the recent use of drugs (e.g., alcohol,  benzodiazepines, barbiturates), which could complicate patient management. Urine screening is the most commonly used and generally most cost-effective testing method.

Center for Substance Abuse Treatment. (2004). *Clinical Guidelines for the Use of Buprenorphine in the Treatment of Opioid Addiction*. Substance Abuse and Mental Health Services Administration (US). https://www.ncbi.nlm.nih.gov/pubmed/22514846

42 CFR § 8.12(f) (6). Drug abuse testing services. OTPs must provide adequate testing or analysis for drugs of abuse, including at least eight random drug abuse tests per year, per patient, in maintenance treatment, in accordance with generally accepted clinical practice. For patients in short-term detoxification treatment, the OTP shall perform at least one initial drug abuse test. For patients receiving long-term detoxification treatment, the program shall perform initial and monthly random tests on each patient.

Clinical drug testing is used for the purposes of diagnosis, monitoring, and evaluating progress in treatment and the promotion of long-term recovery. Through drug testing, patients' use of specific drugs as well as the absence of prescribed medications, which may be an indication of diversion, can be identified. After the patient's initial drug test at admission, clinicians should determine the frequency of toxicological testing by evaluating the clinical appropriateness in relation to the patient's stage of treatment. All maintenance patients must receive a minimum of eight toxicology tests per year.

*Federal Guidelines for Opioid Treatment Programs* . (2015). SAMHSA. https://store.samhsa.gov/product/federal-guidelines-opioid-treatment-programs/pep15-fedguideotp

OTPs often perform onsite point of collection (POC) tests using sensitive and automated immunoassay (IA) technologies that screen urine or oral fluid samples for a relatively narrow range of drug classes (e.g. amphetamines, barbiturates, benzodiazepines, opioids) and a limited number of specific drugs. POC tests such as IAs have a place in clinical decision making, but are not by themselves adequate to satisfy the regulatory requirements for drug use testing services.

Laboratory testing affords the opportunity to obtain confirmation testing such as gas chromatography-mass spectrometry (GC-MS) or liquid chromatography-mass spectrometry (LC-MS) or tandem mass-spectrometry (LC-MS/MS.) This should form part of the OTP's established procedures for addressing potentially false positive and false negative urine or other toxicology test results as described in Chapter 9 in TIP 43.

Urine or other toxicological specimens are collected in a therapeutic context that suggests trust and respect and minimizes falsification. Reliance on direct observation is neither necessary nor appropriate for all patients.

All maintenance patients must receive a minimum of eight toxicology tests per year. The results of toxicological tests are an essential component in making decisions regarding take-home medication privileges; however, treatment decisions should not be based solely on toxicology screening results. Although testing panels typically include opioids (including prescription opioid analgesic compounds), benzodiazepines, barbiturates, cocaine, marijuana, methadone (and its metabolites), buprenorphine, amphetamines, and alcohol, they are not limited to these substances. Clinicians should determine the drug-testing regimen by analyzing community drug-use patterns and individual medical indications. It is strongly recommended that benzodiazepines, barbiturates, and alcohol (using the ethyl glucuronide test) be included in drug screening and testing panels. Alcohol is the most widely used mood-altering substance in the United States, and benzodiazepines and barbiturates are often prescribed for detoxification and chronic seizure disorders. Detection of benzodiazepines, barbiturates, or alcohol is important in ongoing assessment, treatment planning, and medication management.

## Goals of the Treatment Engagement Stage:

Establish a treatment contract with the counselor that specifies treatment goals, client responsibilities (e.g., attend group sessions, remain abstinent, submit urine samples), and the counselor's efforts to help clients meet treatment goals and responsibilities.

Testing in the IOT program is designed to deter clients from using substances, not to punish or induce shame and guilt.

## Case Presentation

When told that his initial urine came back positive for marijuana, Tom acknowledges that he smoked a joint with friends last weekend. To deter further use of illicit substances, he must now submit observed urine samples frequently and randomly.

The reasons and circumstances for Tom's use of marijuana—as well as alcohol—will be explored in the group. The program has a policy of total abstinence from all mood-altering drugs, and clients are expected to report any use of prescription or other substances before they are discovered by urine toxicology studies.

Under ideal conditions, the consensus panel believes that collection should occur not less than once a week or more frequently than every 3 days in the first weeks of treatment. (TIP 47)

Center for Substance Abuse Treatment. (2006). *TIP 47: Substance Abuse: Clinical Issues in Intensive Outpatient Treatment* . Substance Abuse and Mental Health Services Administration (US). https://www.ncbi.nlm.nih.gov/books/NBK64092/

## EXHIBIT 2.11. Patient–Provider Dialog: Talking About Drug Testing

Frame drug testing in a clinical, nonpunitive way. For example, before obtaining a drug test, ask the patient, "What do you think we'll find on this test?" The patient's response is often quite informative and may make the patient less defensive than confrontation with a positive test result.

**SCENARIO:** A provider discusses urine drug testing with a patient being assessed for OUD treatment with medication.

**Provider:** When we assess patients for medication for opioid addiction, we always check urine samples for drugs.

**Patient:** I'll tell you if I used. You don't need to test me.

**Provider:** Thank you, I really appreciate that. The more we can talk about what's going on with you, the more I can help. I'm not checking the urine to catch you or because I don't trust you. I trust you. I can see how motivated you are. But I don't trust the addiction because I know how powerful addiction can be, too. To monitor your safety on medication and help determine what other services you may need, it's important for us to test you periodically and discuss the results. Does that sound okay?

**Patient:** Yeah, that makes sense.

# Testing at the Crossroads

## ACOG, 2017

Routine urine drug screening is controversial. ACOG recommends testing be performed only with the patient's consent and a positive test not be a deterrent to care, a disqualifier for coverage under publicly-funded programs, or the sole factor in determining family separation.

Urine drug testing has also been used to detect or confirm suspected substance use, but should be performed only with the patient's consent and in compliance with state laws. Pregnant women should be informed of the potential ramifications of a positive test result, including any mandatory reporting requirements. Routine urine drug screening is controversial for several reasons. A positive drug test result is not in itself diagnostic of opioid use disorder or its severity. Urine drug testing only assesses for current or recent substance use; therefore, a negative test does not rule out sporadic substance use. Also, urine toxicology testing may not detect many substances, including synthetic opioids, some benzodiazepines, and designer drugs.

False-positive test results can occur with immunoassay testing and legal consequences can be devastating to the patient and her family. Health care providers should be aware of their laboratory's test characteristics and request that confirmatory testing with mass spectrometry and liquid or gas chromatography be performed as appropriate.

*Substance Use Disorder in Pregnancy* . (n.d.). Retrieved March 21, 2024, from https://www.acog.org/advocacy/policy-priorities/substance-use-disorder-in-pregnancy
Committee on Obstetric Practice. (2017). Committee opinion no. 711: Opioid use and opioid use disorder in pregnancy. *Obstetrics and Gynecology*, *130*(2), e81–e94. https://doi.org/10.1097/AOG.0000000000002235

NEW: GAMES | METRO | WEATHER | SPORTS | POLITICS | BUSINESS | WATCH: GLOBE TODAY | RHODE ISLAND | GLOBE MAGAZINE | OPINION | HEALTH

# Mass General Brigham to stop filing neglect reports solely because a baby is born with drugs in its system

By Matt Stout Globe Staff, Updated April 2, 2024, 6:14 p.m.

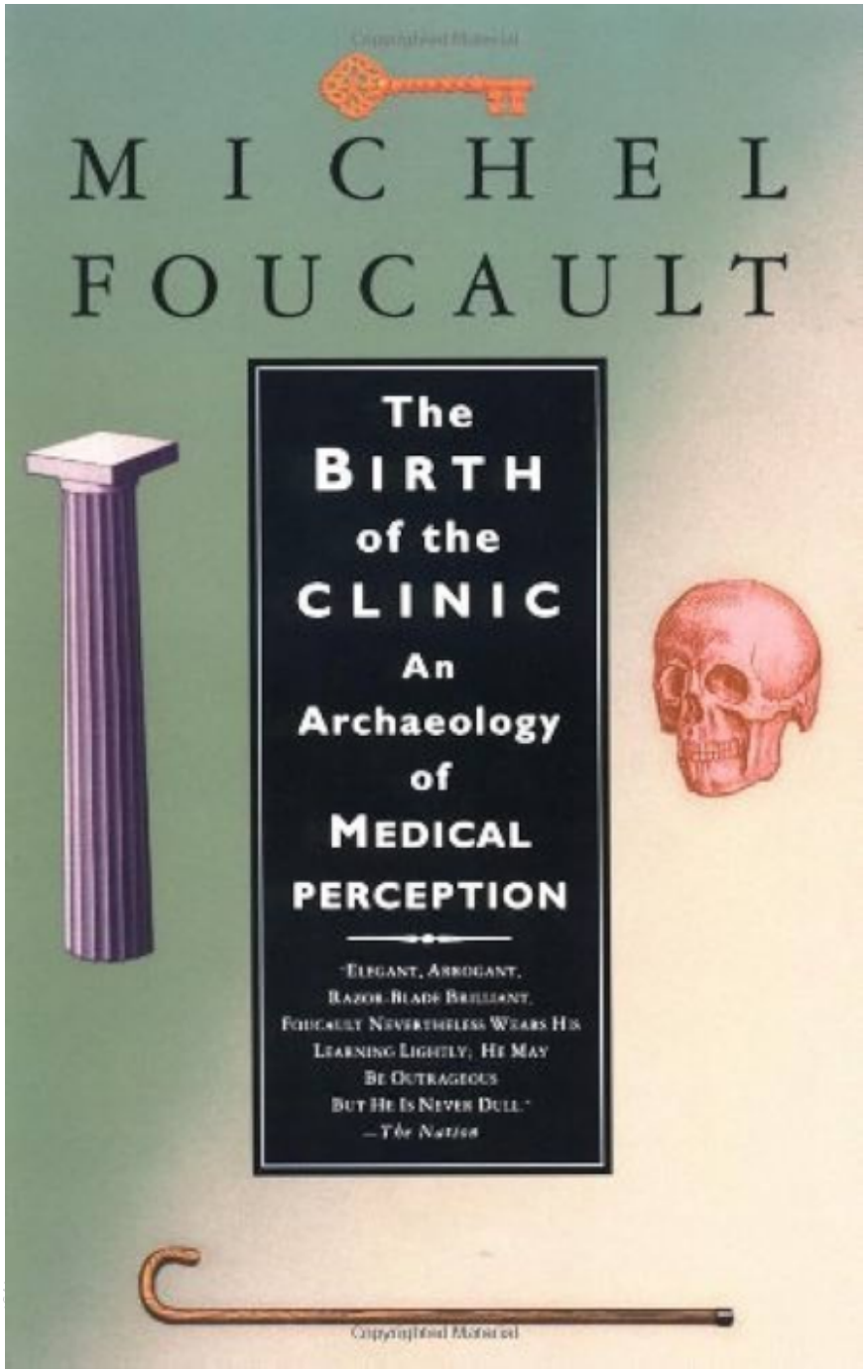

The corporate offices of Massachusetts General Brigham hospitals in Assembly Square in Somerville. LANE TURNER/GLOBE STAFF

April 2, 2024

Hospitals within the Mass General Brigham system will no longer report suspected abuse or neglect to state child welfare officials solely because a baby is born exposed to drugs, targeting a practice hospital leaders say has long stoked fear in women in recovery from addiction.

The new policy, which Mass General Brigham is unveiling this week, is one in a series of changes coming to Massachusetts' largest health care system, including at Brigham and Women's Hospital, Massachusetts General Hospital, and six other hospitals that have labor and delivery units in Massachusetts and New Hampshire.

The hospitals will now require written consent for toxicology testing of any expecting mother or infant in most cases. Going forward, the hospitals will also limit such testing to cases where the results "will change the medical management" of the pregnant mother or her baby.




# Methadone as Social Control: Institutionalized Stigma and the Prospect of Recovery

Qualitative Health Research
22(6) 810–824

DOI: 10.1177/1049732311432718
http://qhr.sagepub.com
SAGE

**Julie Harris[1] and Karen McElrath[1]**

**Abstract**

Methadone maintenance treatment (MMT) is an intervention used to treat opioid (heroin) dependence. Several investigators have found that MMT is effective in reducing heroin use and other behaviors; however, a disproportionate number of MMT clients leave treatment prematurely. Moreover, MMT outcome variables are often limited in terms of their measurement. Utilizing an integrated theoretical framework of social control and stigma, we focused on the experiences of methadone maintenance from the perspective of clients. We pooled interview data from four qualitative studies in two jurisdictions and found linkages between social control and institutional stigma that serve to reinforce "addict" identities, expose undeserving customers to the public gaze, and encourage clients to be passive recipients of treatment. We discuss the implications for recovery and suggest recommendations for change.

# Urine testing in methadone maintenance treatment: applications and limitations

Avram Goldstein M.D.[a,*], Byron W. Brown, Ph.D.[b]

[a]*Department of Molecular Pharmacology, Stanford University, Stanford, CA 94305, USA*
[b]*Department of Health Research and Policy, Stanford University, Stanford, CA 94305, USA*

Received 25 March 2003; received in revised form 1 April 2003; accepted 10 April 2003

For patients with take-home privileges no testing schedule can effectively detect either skipped doses or use of illicit drugs. Consequently, whether for patients attending clinic daily or for patients with take-home privileges, some programs, as measured by urine test results, may actually be less successful than they appear to be. (Goldstein, 2003)

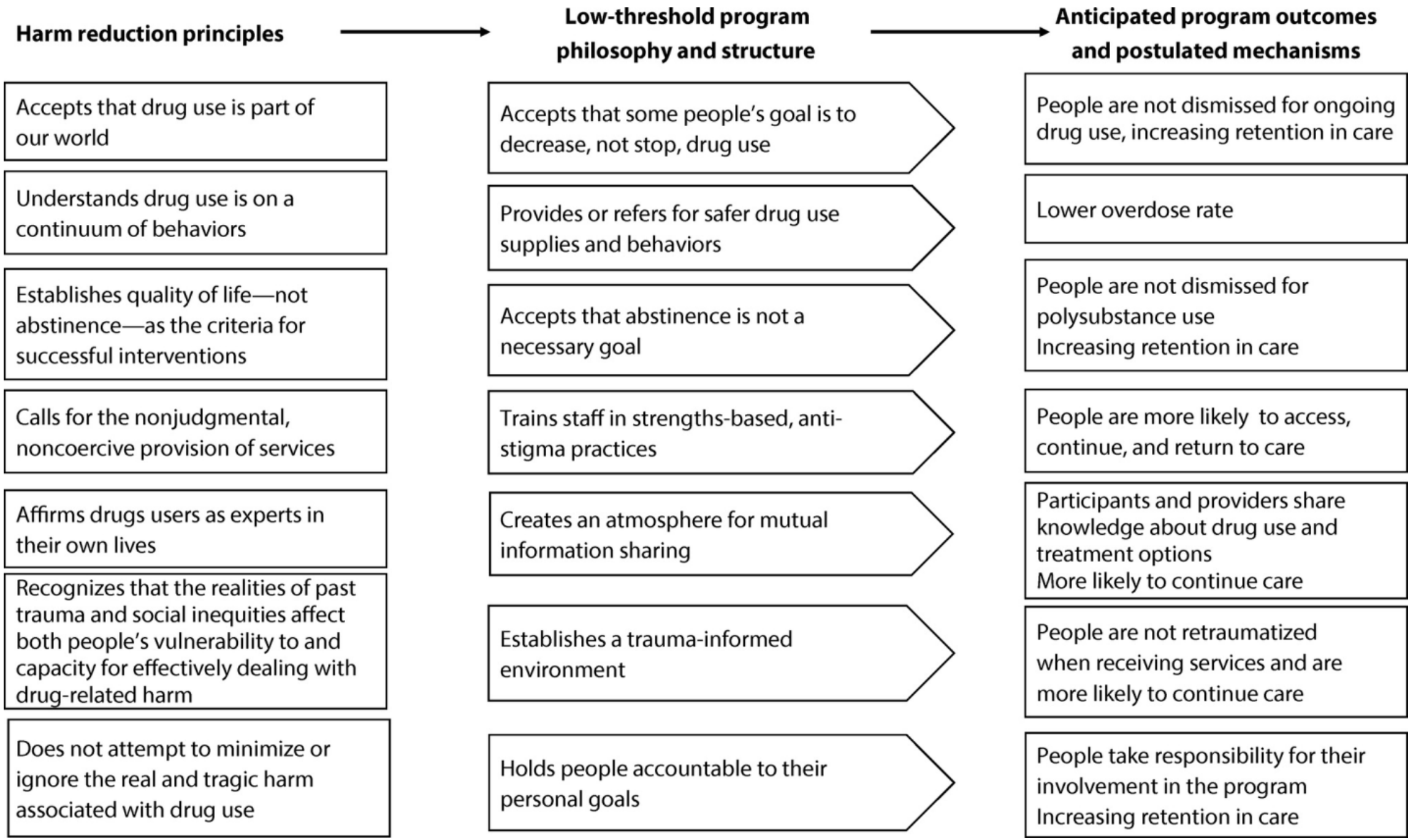
2003
W H

The bottom line conclusion is that the Goldstein/Brown article points out a flaw in the concept of randomization in eight drug tests per year and OTPs need to understand that eight tests are the floor, not the ceiling. (Perrino, 2003)

**Table 1.** MAT in the US: high threshold, low tolerance model.

| High Threshold | Low Tolerance |
|---|---|
| Multiple regulatory bodies that oversee and monitor OTPs | Urinalysis results that lead to punishment, including termination from the program |
| Travel distance and travel costs to/from MAT programs | Urine specimens that are required under the watchful eye of treatment staff |
| High financial costs to patients (limitations relating to insurance and Medicaid coverage) | Punishments imposed for patients who miss appointments or arrive late for appointments |
| Waiting lists/lengthy wait times for treatment | One-sided contracts that focus only on behaviors of the patient or mention negative behaviors only |
| Limited number of buprenorphine-waivered physicians, including the unwillingness of physicians to prescribe | Dosage levels that are too low; forced or arbitrary tapering |
| Daily medicine collections (methadone in particular) that intervene with recovery goals, e.g., employment, training, education | Power imbalances that reinforce "addict" identities in MAT settings |
| NIMBY-like stigma | Other hyper-supervisory controls over daily lives |

McElrath, K. (2018). Medication-Assisted Treatment for Opioid Addiction in the United States: Critique and Commentary. *Substance Use & Misuse*, *53*(2), 334–343. https://doi.org/10.1080/10826084.2017.1342662



# Are urine tests within opioid agonist treatment a justified practice?

Carole-Anne Baud [1], Caroline Schmitt-Koopmann [2], Valérie Junod [1,3], Cheryl Dickson [4], Lukas Brülisauer [4], Barbara Broers [5], and Olivier Simon [4,5]

1. *Faculty of Business and Economics, University of Lausanne, Switzerland*
2. *Faculty of Biology and Medicine, University of Lausanne, Switzerland*
3. *Faculty of Law, University of Geneva, Switzerland*
4. *Addiction Medicine, Lausanne University Hospital, Switzerland*
5. *Addiction Medicine, Geneva University Hospitals, Switzerland*

*Summary*

In most countries, urine tests are required for opioid agonist treatment (OAT). Whilst Swiss federal law does not require urine tests as part of OAT follow-up, several Swiss cantons either request or recommend them. This article presents a viewpoint previously published in a French and a French/German paper supported by Swiss associations of addiction professionals. The article questions the legal and medical justification for such tests in connection with OAT. The flaws of urine testing as a clinical assessment tool are discussed, as well as the potentially negative impact on the therapeutic process for opioid dependence. In line with a person-centred approach, recommendations include removing the obligation from any remaining legislation and limiting tests to situations where the person in treatment has requested them.

Baud, C.-A., Schmitt-Koopmann, C., Junod, V., Dickson, C., Brulisauer, L., Broers, B., & Simon, O. (2023). Are urine tests within opioid agonist treatment a justified practice? *Heroin Addiction and Related Clinical Problems* , *25*(6), 25–28. https://www.heroinaddictionrelatedclinicalproblems.org/harcp-archives-doi-articles.php

The European Court of Human Rights (ECHR) has considered, concerning Article 8 European Convention on Human Rights, that a forced medical intervention, even if minor, such as urine testing on a detainee, is an interference in the right to respect of private life.

They cannot be justified on the patient's consent because the latter is not given free[ly], the patient being given no alternative but to consent to OAT as a package.

Testing during treatment is usually performed to check whether the person in therapy is consuming non-prescribed opioids alongside their OAT. The underlying reason rests on the idea that OAT aims to replace or 'substitute' a street drug (notably heroin) by using a similar substance (methadone or buprenorphine). This fact is an outdated and erroneous understanding of OAT. Since abstinence should no longer be the ultimate goal of OAT, urine tests to ascertain abstinence become irrelevant and even counterproductive.

However, no evidence suggests any benefit of urine testing in this context. In short, no proof exists that those regularly tested stay longer in treatment, become abstinent faster or have better health outcomes.

In this regard,  an imposed urine test can be understood as an implicit threat that, should the result  be positive, the person in treatment may incur negative consequences such as excluding or interrupting OAT.  Such an approach is not in the interest of the person, that of their family or wider society.  Therefore, it appears unethical to impose urine tests on a vulnerable population that is particularly likely to disengage from healthcare.

Martinez NG, Truong AQ, Nordeck CD, Agus D, Genberg BL, Buresh ME. "I want to stay here": Patient and staff perspectives on transitioning from a low-threshold buprenorphine program to clinic-based care. *Drug Alcohol Depend*. 2024;257:111130. doi:10.1016/j.drugalcdep.2024.111130

# "I want to stay here": Patient and staff perspectives on transitioning from a low-threshold buprenorphine program to clinic-based care

Noelle G. Martinez [a,1,*], Ashley Q. Truong [b], Courtney D. Nordeck [c], Deborah Agus [b,d], Becky L. Genberg [e], Megan E. Buresh [a]

[a] *Division of Addiction Medicine, Johns Hopkins University School of Medicine, Mason F. Lord Building East Tower 2nd Floor, 5200 Eastern Avenue, Baltimore, MD 21224, USA*
[b] *Department of Mental Health, Johns Hopkins Bloomberg School of Public Health, 615 N. Wolfe Street, Baltimore, MD 21205, USA*
[c] *Friends Research Institute, 1040 Park Avenue, Suite 103, Baltimore, MD 21201, USA*
[d] *Behavioral Health Leadership Institute, 2601N. Howard Street, Baltimore, MD 21218, USA*
[e] *Department of Epidemiology, Johns Hopkins Bloomberg School of Public Health, 615 N. Wolfe Street, Baltimore, MD 21205, USA*

ARTICLE INFO

*Keywords:*
Care transition
Harm reduction
Low-threshold buprenorphine
Mobile outreach
Opioid use disorder
Stigma

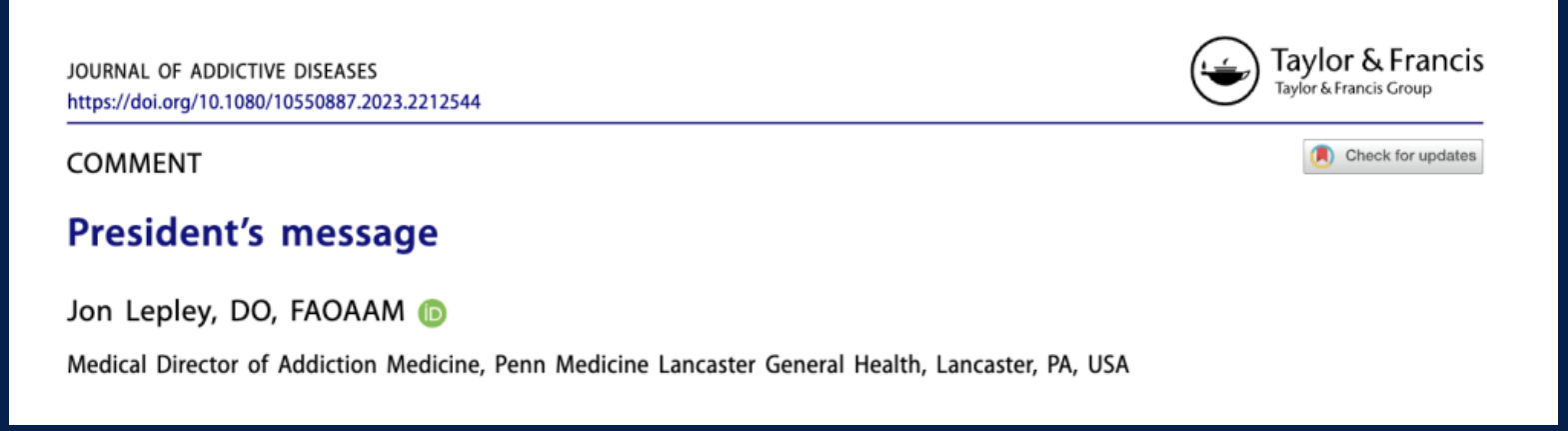
ABSTRACT

*Background:* The Project Connections At Re-Entry (PCARE) Van is a low-threshold buprenorphine program operating outside the Baltimore City Detention Center. Like other low-threshold programs, PCARE seeks to engage a vulnerable population in care, stabilize patients, then transition patients to longer-term care; however, <10% of patients transition to clinic-based buprenorphine treatment. Our goal was to better understand these low transition rates and center patient perspectives in discussion of broader low-threshold program design.

*Methods:* From December 2022 to June 2023, semi-structured interviews were conducted with 20 former and current PCARE patients and 6 staff members. We used deductive and inductive coding followed by thematic content analysis to identify themes around treatment experiences and care preferences.

*Results:* There were strong preferences among current and former patients for continuing buprenorphine treatment at the PCARE Van. Several themes emerged from the data that explained patient preferences, including both advantages to continuing care at the van (preference for continuity, feeling respected by the program's structure and philosophy) and disadvantages to transitioning to a clinic (perceived harms associated with rigid or punitive care models). Staff noted limited program capacity, and patients expressed that if needed, they would transition to a clinic for altruistic reasons. Staff expressed varied perspectives on low-threshold care, emphasizing both larger systems factors, as well as beliefs about individual patient responsibility.

*Conclusions:* While many low-threshold care settings are designed as transitional bridge models, this research highlights patient preference for long-term care at low-threshold programs and supports efforts to adapt low-threshold models to be sustainable as longitudinal care.



JOURNAL OF ADDICTIVE DISEASES
https://doi.org/10.1080/10550887.2023.2212544

Taylor & Francis
Taylor & Francis Group

Check for updates

COMMENT

## President's message

Jon Lepley, DO, FAOAAM

Medical Director of Addiction Medicine, Penn Medicine Lancaster General Health, Lancaster, PA, USA

Observed urine collection is traumatizing for some patients, and coercing them to endure the process as a condition to receive medication is a form of abuse. I am further alarmed by the *laissez-faire* acceptance among many colleagues that these mechanisms have a place in treating addiction.

Throughout my career, I have witnessed innumerable instances of patients expelled from buprenorphine treatment based solely on urine drug testing results. Multiple publications have since validated that frequent reflexive urine drug testing does not improve patient outcomes and rarely influences medication management decisions. Yet, the multi-panel urine drug test remains a sacred cow in our profession.

**Consider eliminating reflexive urine testing as the centerpiece of office-based buprenorphine treatment. Recognize that observed urine collection is potentially traumatizing and unlikely to improve outcomes or influence medication management decisions.**

Lepley, J. (2023). President's message. *Journal of Addictive Diseases*, *41*(4), 263–265. https://doi.org/10.1080/10550887.2023.2237394'
Lepley, J. (2023). The X-Waiver and the Culture of Addiction Medicine. *Journal of Lancaster General Hospital*, *18*(3). https://www.jlgh.org/Past-Issues/Volume-18-Issue-3/Lepley_XWaiver.aspx

# International Testing Guidelines

## Against Testing (or Not a Consideration)

1. Switzerland
2. France
3. Portugal
4. Australia
5. Canada

   *Clinicians could consider urine drug testing as part of the management of patients with OUD (weak recommendation, no RCT evidence)*

1. WHO
2. ACOG
3. Jon Lepley, *AOAAM President*

Historically, the politics around addiction have devalued its medical treatment, resulting in common paternalistic and moralistic treatment methods that would be unconventional anywhere else in medical care.

The ethics of medicine and public health, however, call for upholding the individual patient-clinician relationship, informed consent, and addressing social determinants of health.

Addiction affects behaviors and decision-making, but does not make individuals with addiction wholly incapable of making decisions about their treatment. Nevertheless, coercive strategies that consist of legal, formal, and informal "social controls" aimed at causing a person to take a prescribed action through the use of force or threats, rely on an assumption that addiction undermines individuals' autonomy and capability to make well-reasoned decisions.

Research is often based on how individuals are referred to or monitored in treatment, and rarely includes how these coercive strategies are perceived or experienced, whether they affect individuals' motivation, interest, and intent to pursue and engage in treatment, and the impact on long-term outcomes in addiction treatment and population health.

Renewed efforts will  be required to identify effective performance measures in addiction treatment, to ensure measures are patient-centered, accurately reflect positive patient outcomes and cost-effective care, and anticipate and mitigate potential adverse and unintended consequences.

## Recommendations

Governments at all levels implement multifaceted strategies to foster high-quality, evidence-based, ethical addiction treatment that is accessible to all who need it.

Governments ensure any such national or state-level quality or performance measures for addiction treatment outcomes are patient-centered and align with addiction as a chronic disease, remission as a treatment goal, and recovery as an ongoing process, and refrain from using as the desired or measured outcome, "completion of treatment" or cessation of professional services.

*Government strategies to foster ethical addiction treatment*. (2024). American Society of Addiction Medicine.

Clinicians (including myself) may be tempted to believe: “I’m not like those other places. I use testing in non-punitive way that helps my patients.”

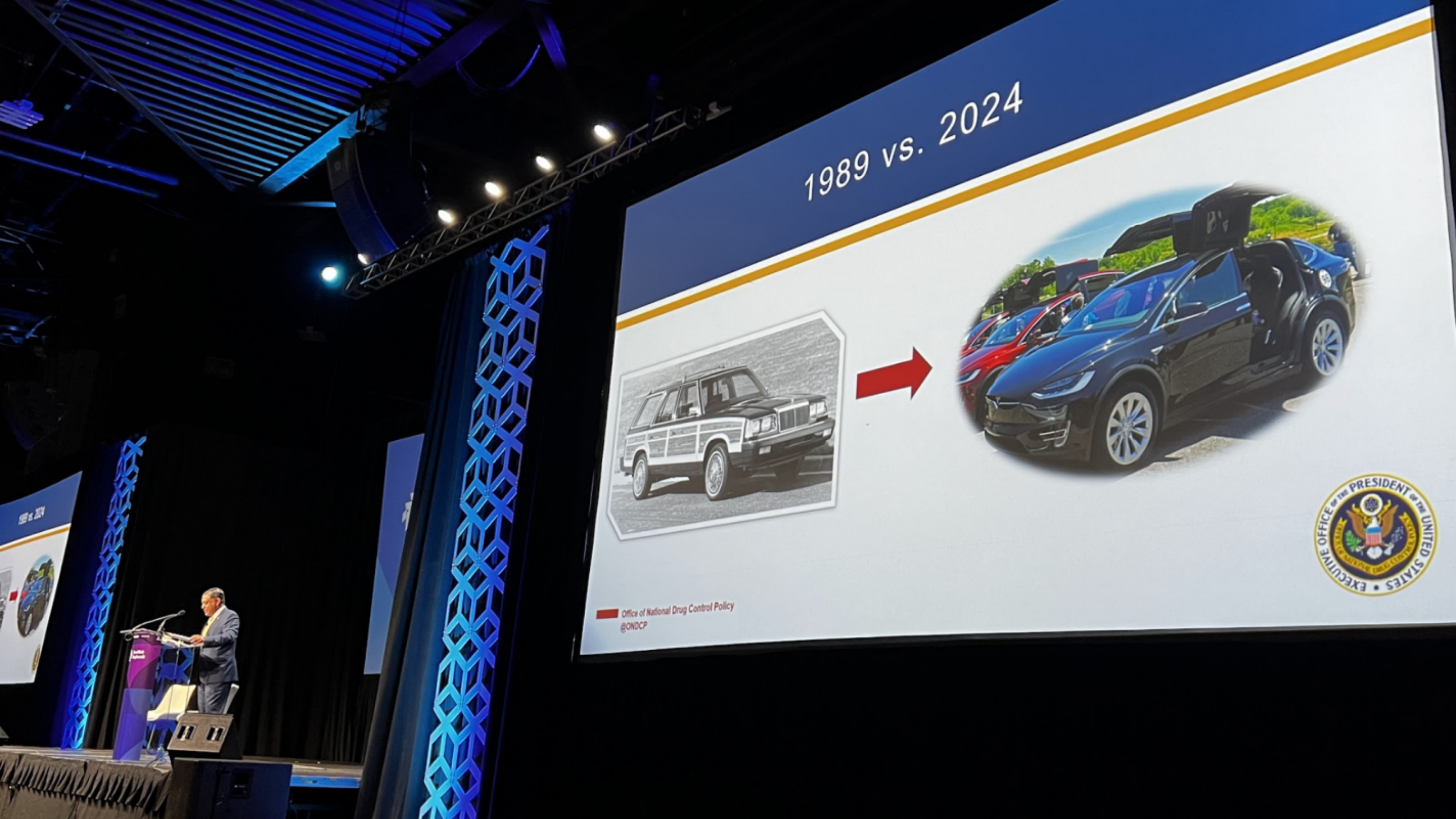
- This may be the case
- But we do not have evidence it is true
- Policy cannot be based on each clinician thinking they are not doing harm (cf. Fundamental Attribution Error)
  - As a comparison, I may think I could be careful with a hand grenade; this may be true
  - But we still do not allow hand grenades to be owned by everyone
- There is a simple remedy: ask each patient what they would prefer regarding testing and act accordingly

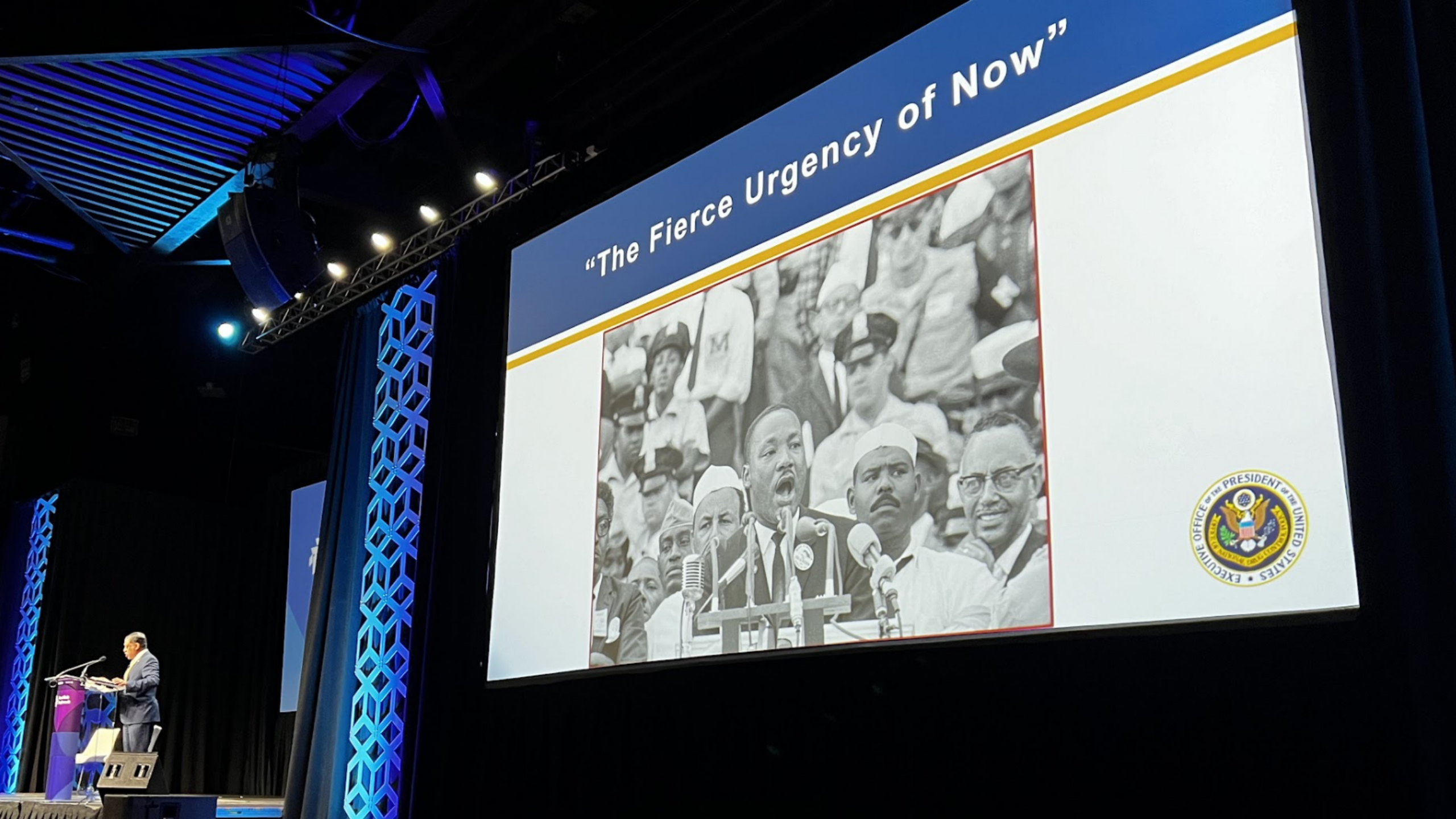
Greenwood, J. (2018, July 24). *How Would People Behave in Milgram's Experiment Today?* Behavioral Scientist. https://behavioralscientist.org/how-would-people-behave-in-milgrams-experiment-today/

# Milgram Experiment, 1961

Drug testing in substance use disorder treatment is on the wrong side of history

during an unprecedented, ongoing epidemic of non-communicable lethality


1989 vs. 2024
Office of National Drug Control Policy
@ONDCP
EXECUTIVE OFFICE OF THE PRESIDENT OF THE UNITED STATES


"The Fierce Urgency of Now"
EXECUTIVE OFFICE OF THE PRESIDENT OF THE UNITED STATES

# Final Takeaways & Summary [1]

- Testing was designed and implemented to:
  - Enforce abstinence
  - Control and monitor populations
- Testing does not derive from any empirical studies demonstrating benefit to the individual patient
- Testing is outdated and antithetical to low-threshold care, generating unresolvable internal inconsistencies
- Because it is coercive and can jeopardize life-saving treatment, testing is ethically questionable

# Final Takeaways & Summary [2]

— If diversion was testing's primary concern, we would all be:

- Default testing with oral fluid (not urine)
- Testing with GC/MS
- Testing only for methadone or buprenorphine

— An ethical way to proceed would be to ask patients if they would like to be tested.

- If so, use oral fluid GC/MS to limit false positives.
- If not, do not test.

# References

Please find references here:

ASAM References 2024

# Drug Testing in Substance Use Disorder Treatment:

## Does It Help or Hurt?


Stephen Martin, MD, EdM, FASAM, FAAFP

*Medical Director, Office-Based Addiction Team*
*Barre Family Health Center*

*Professor, Family Medicine and Community Health*
*UMass Chan Medical School*

*<stmartin@gmail.com>*

American Society of Addiction Medicine Conference
April 5, 2024