

Vermont Community Drug-Checking Program Data Summary: Year 1

March 2026

Community drug-checking is a process through which members of the public can have their drugs tested to determine their chemical composition or assist in determining whether the sample contains contaminants, toxic substances, or hazardous compounds. The primary goal of community drug-checking is to support Vermonters in making informed decisions about their health to prevent overdose and other adverse outcomes related to substance use. Individuals seeking drug checking services from state grantees receive legal immunity under [18 V.S.A. § 4201](#). This report contains data collected in the first year of the Vermont Drug-Checking Program from viable samples analyzed between September 2024 to August 2025.

If you need help accessing or understanding this information, contact AHS.VDHDSU@vermont.gov.

Background

Through a bidding process in 2024, four syringe services program (SSP) sites were identified to offer drug-checking services with support from the Vermont Department of Health. All sites are required to comply with the [Vermont Community Drug Checking Program Guidelines](#) which include guidance on planning, implementation, data collection and reporting. Program funding supports the purchase of test strips and the spectroscopy instrumentation (machine used for drug-checking) that meet the requirements of the Guidelines and that would work best for their organization.

Drug-Checking Grantee	On-Site Drug-Checking Spectroscopy Used
AIDS Project of Southern Vermont (Brattleboro)	Fourier-transform infrared spectroscopy (FTIR)
HIV/HCV Resource Center (White River Junction)	Fourier-transform infrared spectroscopy (FTIR)
Howard Center Safe Recovery (Burlington)	Raman spectroscopy
Vermont CARES (Burlington, Barre, St. Johnsbury & Rutland)	Raman spectroscopy

When samples are brought to an SSP for testing, they are tested on-site by spectroscopy, test strip, or both. Whenever possible, results of this testing are immediately provided to the person submitting the sample.

Vermont Drug Checking Programs report their data to the Vermont Department of Health's Division of Substance Use Programs (DSU) monthly.

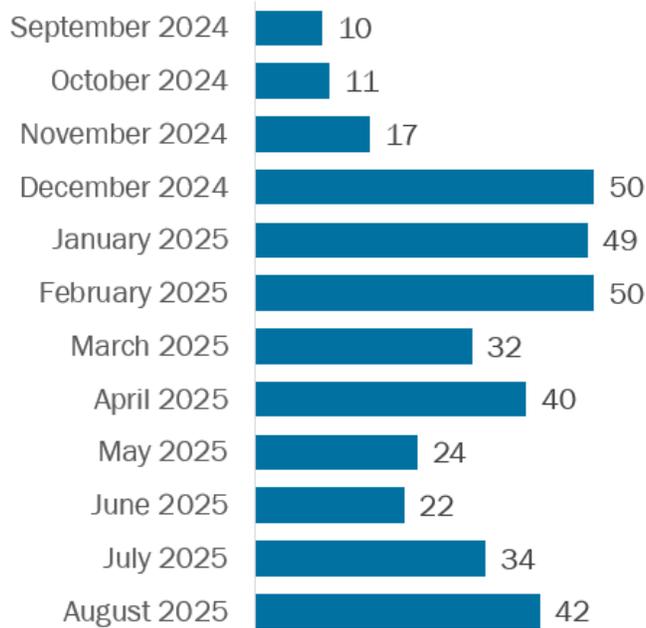


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Use of Drug Checking

Sample submissions peaked in December 2024 through February 2025.



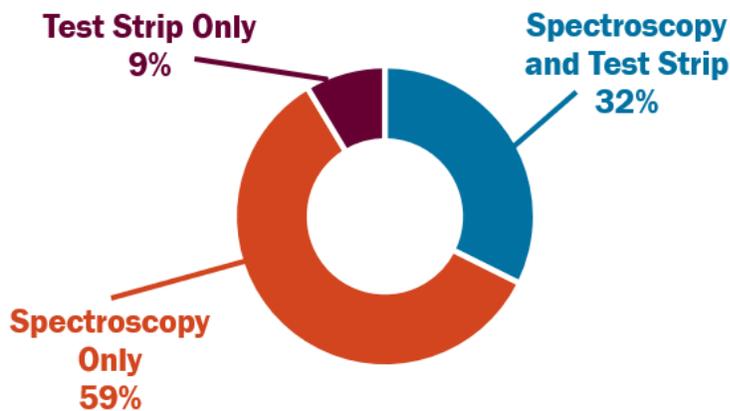
381 samples were reported from the four drug checking programs. The portion of samples from each is:

- 30% HIV/HCV Resource Center
- 29% Vermont CARES
- 26% AIDS Project of Southern VT
- 15% Howard Center Safe Recovery

The number of monthly samples received peaked in December through February. Currently, analysis is limited by small sample sizes, but further analysis should be possible as the program grows and more samples are submitted and tested.

Testing Methods

Most samples were tested using spectroscopy only.

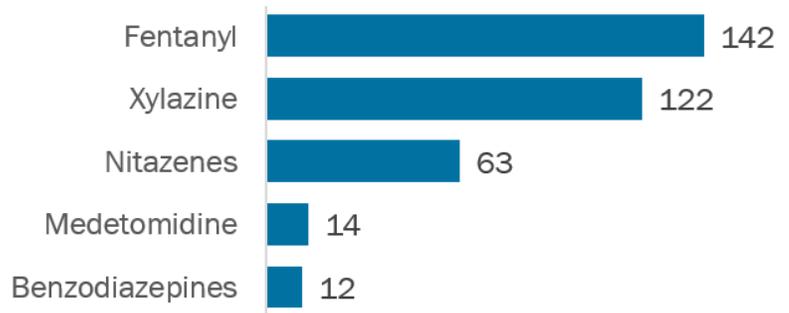


Of the samples received, 371 samples were tested on-site. Ten samples could not be tested on-site due to issues with a spectroscopy machine, poor sample quality, or insufficient sample amount. One sample not tested on-site was sent to an outside laboratory, [Center for Forensic Science Research & Education](#) (CFSRE), while the other nine were destroyed.

For more information about testing methods, see the Data Notes page.

Test strips can be used to detect fentanyl, xylazine, medetomidine, nitazenes, and/or benzodiazepines, and they provide near-immediate results to clients. A total of **353** test strips were run during the reporting period of this report. Because test strips are used for single substances, one sample can be used to run multiple test strip tests.

Fentanyl and xylazine test strips were the most commonly used.



Substances Found in the Drug Checking Programs

Drug-checking technicians document anticipated, confirmed and unexpected results of their testing. “Suspected Samples” are samples that are suspected to contain a given substance prior to testing. A sample is considered to be a “Detected Sample” when the spectra readings are completed and technicians have determined that compound is present, or when the compound was detected by a test strip. “Unexpected Detections” occur when a substance is detected but not listed as a suspected substance for a sample.

Substance	# of Suspected Samples	# of Detected Samples	# of Unexpected Detections
Benzodiazepines	6	44	41
Cocaine/Crack Cocaine	75	53	4
Fentanyl/Fentanyl Analogs	185	168	25
Methamphetamine	26	23	2
Xylazine	8	48	46

The most frequently suspected (**185**) and detected (**168**) substances are fentanyl and fentanyl analogs. Fentanyl/fentanyl analogs were found in **77%** of samples suspected to contain it and **13%** of samples where it wasn’t suspected. The next most commonly found substance is cocaine including crack cocaine (**53** detections), which had very few (**4**)

unexpected detections. Xylazine and benzodiazepines were each suspected to be in fewer than **3%** of the samples, but xylazine was detected in **48 (13%)** samples and benzodiazepines were detected in **44 (12%)** samples. Methamphetamine was found in **23** samples and had very few (**2**) unexpected detections.

Emergent Drugs

There is increasing concern about the presence of newly appearing “emergent drugs” in the local and nationwide recreational drug supply. The potential presence of these drugs in Vermont’s drug supply is concerning, both due to the direct impacts of the drugs themselves and because they indicate a changing and adulterated drug supply

[StreetCheck tracks the following Emergent Drugs:](#)

- **BTMPS (Tinuvin)** is a light stabilizer found as an opioid adulterant in the drug supply. There were no detections of BTMPS.
- **Medetomidine** is an alpha-2 agonist used as a veterinary sedative. Medetomidine was reported as detected in five samples (found in four samples via spectroscopy, one via test strip).
- **Nitazenes** are a class of potent synthetic opioids. One sample tested positive for nitazenes using a test strip.
- **Carfentanil** is a particularly powerful analog of fentanyl. Carfentanil was detected in one sample via spectroscopy during the first year of data. It is possible that there were other detections that were reported as simply fentanyl analogs.

Additional Testing and Reporting

While all four Vermont Drug-Checking Program grantees operate in compliance with the Vermont Community Drug Checking Program Guidelines, some organizations are sharing their data beyond the health department to further its impact.

The HIV/HCV Resource Center and AIDS Project of Southern Vermont send samples to the [Center for Forensic Science Research & Education](#) (CFSRE) for additional testing. CFSRE provides more detailed testing of the samples and sends the results to [StreetCheck](#), a project operated by Brandeis University in Massachusetts that combines and standardizes nationwide community drug checking results. In the first year of the program, 103 samples were sent to CFSRE for additional testing. By providing data to StreetCheck, Vermont is contributing to nationwide efforts to track emerging substances of concern.

Data Notes

Data for this program are limited by several factors, including small sample sizes and testing methods. The program is in its early stages, and grantees are promoting awareness of, and participation in, the program. In addition to limited participation during this first year of the program, many of the samples brought in by community members were not viable for testing.

On-site spectroscopy is performed via Fourier-transform infrared spectroscopy (FTIR) or Raman instrumentation; each grantee has one of the two machines. FTIR is reliant on human interpretation, and both methods involve matching observed spectra to a reference library of known substances. These libraries may not contain newer substances. On-site spectroscopy methods typically do not detect specific analogs of fentanyl. False detections of substances may be occasionally reflected in these numbers.

Glossary

Adulterants: A pharmacologically active substance added into a drug to give either synergistic or antagonistic effects (e.g., fentanyl may be adulterated with xylazine).

Analogs: A chemical compound with a similar but not identical structure or effect to another drug (e.g. carfentanil is an analog of fentanyl). These changes are often made by illicit manufacturers to create new psychoactive substances, sometimes to avoid drug regulations or to produce novel effects.

Detected Samples: When the spectra readings are completed and technicians have determined that compound is present in the sample, or the compound was detected by a test strip.

False Detections: When a substance is detected via testing that is not actually present in the sample. These instances are rare.

Spectroscopy: The study of spectra (a band of colors) produced when matter interacts with or emits electromagnetic radiation. Grantees use spectroscopy machines, either FTIR and Raman, to analyze and determine which substances are found in a sample.

Suspected Samples: What the substance is assumed to be by participant or technician before testing is done and results are determined.

Test Strip: Diagnostic tools used to detect specific substances in various samples based on the way that the substance interacts with the materials in the test strip. Test strips are specific to a given substance (e.g. fentanyl test strip).

Unexpected Detections: When a substance is detected but not listed as a suspected substance for a sample.