What do we know about illicit drugs in Northern BC today?

March 9, 2022

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Prepared for PAN's *Regional Education for the North*

Territorial Acknowledgment

I respectfully acknowledge that I am an uninvited guest on the traditional, unceded and stolen lands of the Lheidli T'enneh, colonially known today as Prince George, BC.



Drug Poisoning Acknowledgment

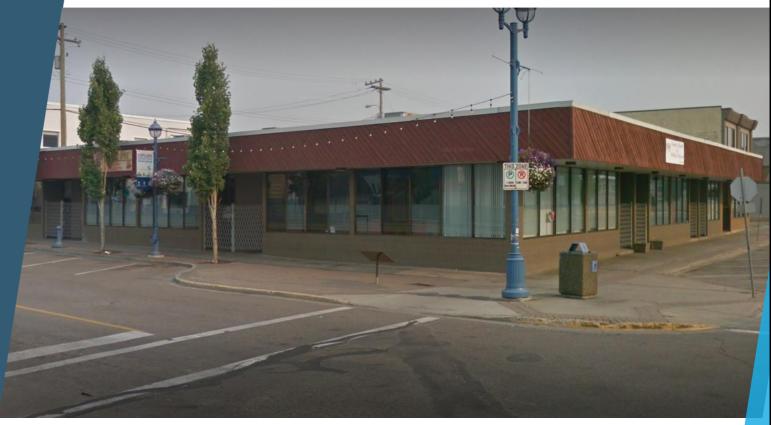
I respectfully acknowledge all of the lives lost and the families impacted by the ongoing overdose pandemic and toxic drug crisis.



(Marino, 2021)

Disclosures

- No conflicts of interest to declare
- Content warning: This presentation contains discussion of substance use, as well as images of harm reduction supplies and substance use.



(Google Maps, 2022)

Overview

- ▶ Where are we and how did we get here?
- Drug checking
- > 2 trends of concern
 - > Fentanyl & analogues
 - ▶ Benzodiazepines & analogues
- What does it all mean for people who use drugs?
- Discussion about what's next

Where are we and how did we get here?

Current state in BC

- ▶ In 2021, there were 2,224 suspected illicit drug toxicity deaths
 - ▶ This is the most ever recorded in a year
 - ► This represents a 26% increase over the number of deaths seen in 2020 (1,767)
- For BC overall, the rate of suspected illicit drug toxicity deaths was 43 per 100,000 individuals
 - The Northern Health region had the second highest rate of illicit drug toxicity deaths (48 deaths per 100,000 individuals) second only to Vancouver Coastal Health (49 deaths per 100,000 individuals).
- ▶ By Health Service Delivery Area (HSDA), in 2021, the highest rates were in Vancouver, Thompson Cariboo, Northwest, Northern Interior, and Fraser East.

(BC Coroners Service, 2022)

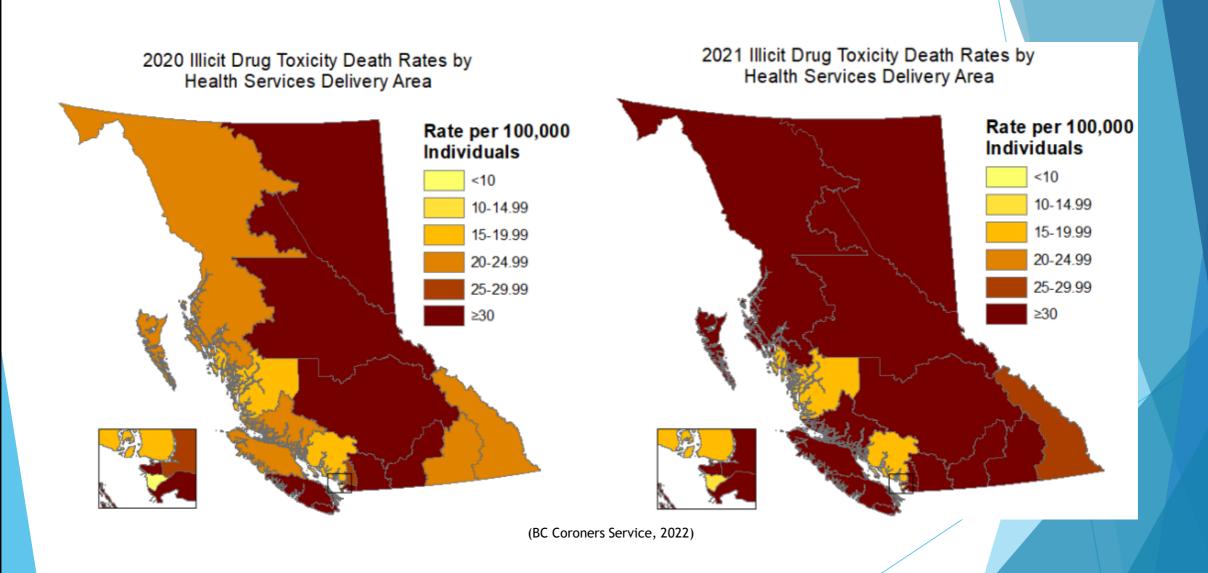


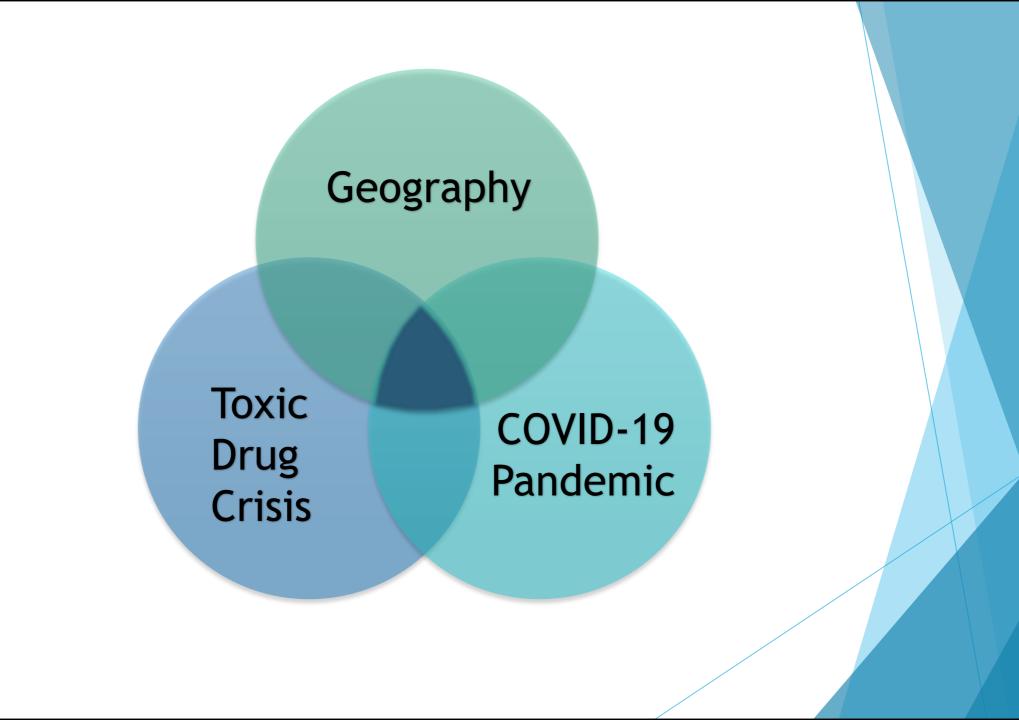
Table 16: Illicit Drug T	oxicity	Death	Rates	by Hea	alth Se	rvices	Delive	ry Area	a per 1	00,000),
2011-2021 ^[3,5,6]											
HSDA	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021
East Kootenay	1.3	2.6	5.1	5.0	2.4	15.7	8.4	7.1	1.2	20.7	25.3
Kootenay Boundary	5.1	5.1	2.5	3.8	7.4	13.5	20.7	18.1	16.7	25.0	34.5
Okanagan	8.1	4.6	9.3	7.5	11.6	20.8	40.3	33.2	21.1	36.5	42.2
Thompson Cariboo	2.3	4.1	6.8	5.8	5.8	29.3	28.9	35.9	17.1	41.9	61.1
Fraser East	10.9	6.9	6.8	5.4	13.8	21.6	33.2	29.9	25.4	37.0	51.2
Fraser North	4.0	4.8	5.5	7.9	11.1	15.7	21.8	22.2	12.2	25.5	32.7
Fraser South	8.0	7.2	6.6	7.5	11.6	19.7	28.7	31.9	17.9	31.6	39.6
Richmond	2.0	0.5	1.5	1.5	3.0	6.7	13.4	5.7	6.1	8.8	14.6
Vancouver	10.9	10.0	12.2	15.3	20.6	34.0	54.3	56.9	34.1	58.5	72.6
North Shore/Coast Garibaldi	2.9	2.1	4.2	5.2	5.5	10.4	15.0	14.2	7.9	16.4	19.3
South Vancouver Island	4.6	5.6	6.9	6.0	6.6	19.4	26.1	29.8	17.9	32.4	32.4
Central Vancouver Island	6.5	7.6	9.4	9.2	11.9	20.1	34.6	32.0	22.1	34.0	40.1
North Vancouver Island	9.2	3.3	7.4	5.6	10.3	21.2	28.7	22.8	21.8	23.7	49.3
Northwest	1.4	0.0	8.1	2.7	8.0	13.4	10.7	18.6	21.1	23.6	53.2
Northern Interior	5.6	8.4	5.5	7.5	10.3	16.3	23.7	42.0	22.5	55.9	51.6
Northeast	10.4	8.7	7.0	11.0	5.6	25.4	32.4	33.6	23.7	43.2	35.9
Total	6.6	5.9	7.2	7.8	11.1	20.4	30.3	31.1	19.3	34.3	42.8
									(BC Co	roners Ser	vice, 2022)

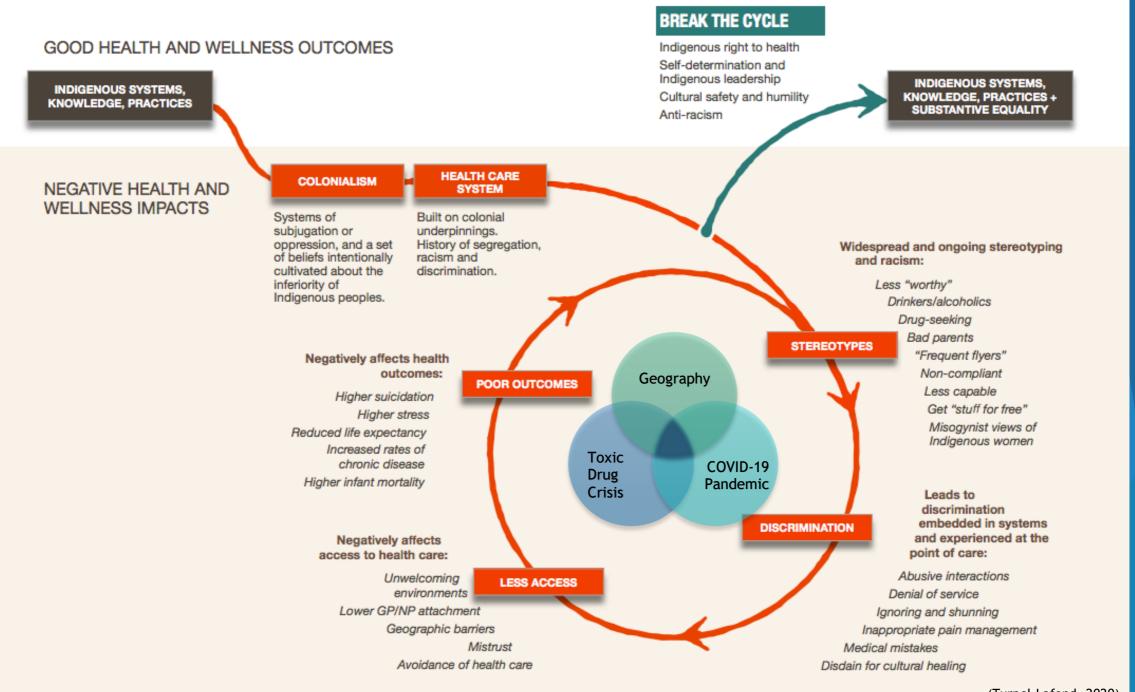
April 2016

March 2020

Toxic Drug Crisis

COVID-19 Pandemic





Regional Toxic Drug Poisoning Events and Deaths (January 2021- May 2021)

	Fraser	Interior	VCH	VIHA	NH	ВС
Number of paramedic- attended drug poisoning events	211	156	385	247	195	1194
Number of deaths	19	14	47	20	19	119
Proportion of the population that is First Nations	1.4%	4.1%	2.1%	4.2%	14.8%	3.3%
Proportion of all events that were First Nations	9.6%	15.5%	20.5%	22.7%	54.2%	18.3%
Proportion of all deaths that were First Nations	6.5%	10.8%	20.2%	14.4%	32.8%	14.0%

(FNHA, 2021)

Drug Checking

Drug Checking as a Tool for Harm Reduction



(Adam Straughn for MyKootenayNow, 2018; FilterMag, 2020)

History of Drug Checking as a Tool for HR

- ▶ 1992: drug checking in the Netherlands
- ▶ 2003: ANKORS offers drug checking at Shambhala music festival
- ▶ 2012: Harm Reduction Client Surveys via BCCDC
 - Individuals aged 19+ who access services at participating harm reduction supply distribution sites
- ➤ 2015: BCCDC started incorporating point-of-care fentanyl testing to compare what individuals reported using and what was 'actually' in their drugs
 - ▶ Nearly 29% of participants' urine samples tested positive for fentanyl, 73% of which did not report using fentanyl within the previous 3 days
- 2016: fentanyl testing introduced at InSite in Vancouver
 - ▶ 80% fentanyl positivity rate in 2016-2017

(Amlani et al., 2015b; Kerr & Tupper, 2017)

DrugCheckingBC.ca

- DrugSense Dashboard
 - Data available for past 3 years
- Monthly reports from BCCSU that summarize drug checking results collected by partners around the province.

BCCSU gratefully acknowledges the contributions of the following partners:

















































Drug Checking: FTIR





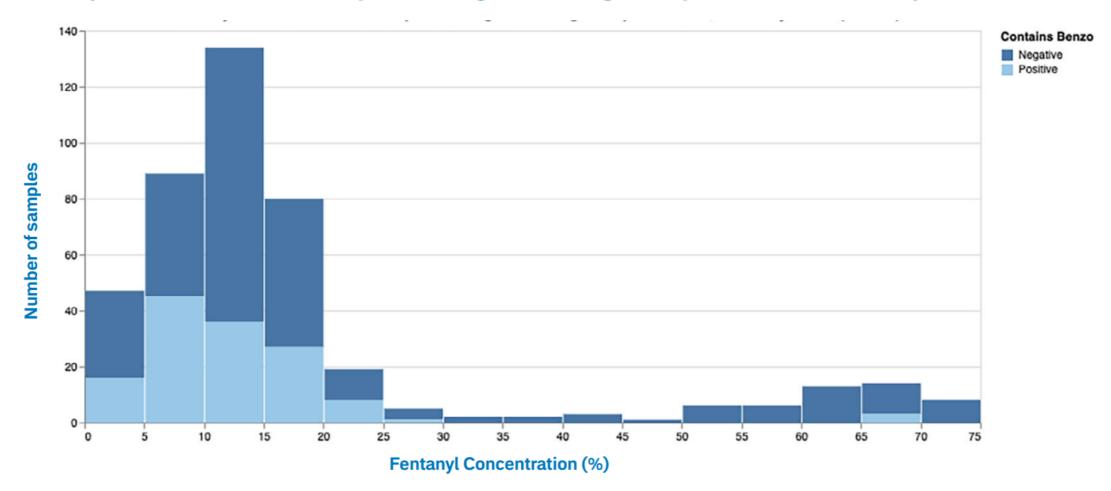
(University of Victoria, 2019)

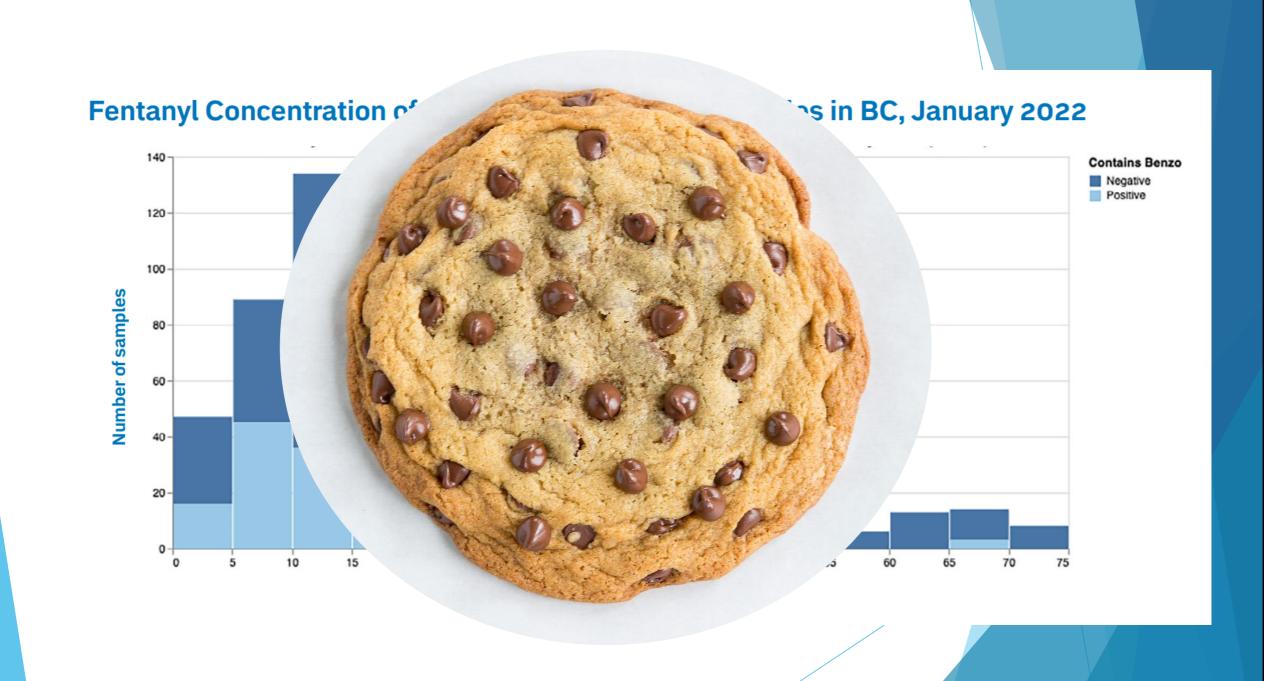
Drug Checking: FTIR



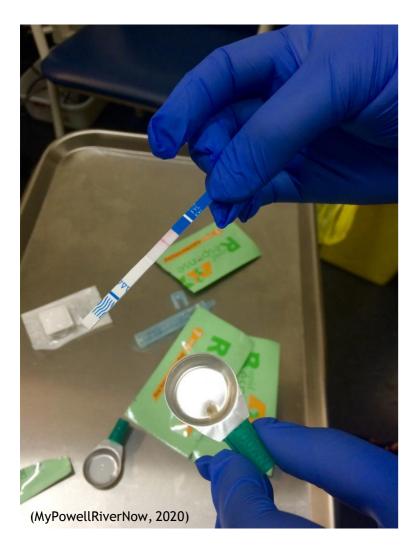
(University of Victoria, 2019)

Fentanyl Concentration of Opioid Drug Checking Samples in BC, January 2022





Drug Checking: Point-of-Care



- Fentanyl: Policy developed for Northern Health sites in August 2019
 - Amended in Sept 2021 to include option of providing supplies for at-home checking
- Benzodiazepines: not currently available in NH due to concerns about validity (i.e., high numbers of false negatives)

Drug Checking: Mailing in samples



- GetYourDrugsTested.com
 - Founded in 2019
 - Free & anonymous
 - By mail or in-person (East Van)



- BCCDC Non-Typical Overdose pilot
 - ▶ Pilot running in 6 smaller, rural and remote communities
 - Relies on BCCDC drug analysis
 - Bring drug sample (or cooker, pipe with residue)
 - Offered at POUNDS/Two Doors Down in Prince George

Prince George OPS - Number of Times a Substance was Tested Using Fentanyl Test Strips January 2020 - Current

					Rep	orted Substa	nce			
		Down	Crystal Meth	Heroin	Fentanyl	Dilaudid	Speed	Ritaline	Cocaine	Morphine
2020	January	0	1	0	1	0	0	0	0	0
	February	1	2	0	0	0	0	0	0	0
	March	4	2	3	1	0	0	0	0	0
	April	10	8	3	4	0	0	0	1	0
	May	5	5	3	0	0	0	0	0	0
	June	5	2	6	2	0	0	0	0	0
	July	5	3	2	3	0	0	0	0	0
	August	4	1	0	1	0	0	0	0	0
	September	3	2	4	1	1	0	0	0	0
	October	4	4	1	2	0	0	0	0	0
	November	7	17	4	4	0	0	0	1	0
	December	10	11	1	3	0	0	0	1	0
2021	January	10	7	0	1	0	0	0	0	0
	February	9	10	5	7	1	0	0	0	0
	March	3	9	2	5	2	0	0	0	1
	April	11	7	3	1	1	1	1	0	1
	May	10	7	4	2	0	0	0	0	0
	June	18	11	4	4	1	1	0	0	0
	July	15	10	0	4	0	0	0	0	0
	August	2	3	3	2	0	1	0	1	0
	September	13	9	3	6	0	0	0	1	0
	October	5	6	4	0	0	1	0	0	0
	November	8	6	1	1	1	0	0	0	0
	December	20	7	2	2	6	1	3	0	1
2022	January	6	7	3	1	1	0	1	0	0
	February	7	5	3	1	0	0	0	0	0
Grand T	otal	195	162	64	59	14	5	5	5	3

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	February	S	2	0	0	0	0	0	0	0
	March	4	2	3	1	0	0	0	0	0
	April	U	8	3	4	0	0	0	1	0
	May	Áì	5	3	0	0	0	0	0	0
	June	٦	2	6	2	0	0	0	0	0
	July	5	3	2	3	0	0	0	0	0
	August	4	1	0	1	0	0	0	0	0
	September	©	2	4	1	1	0	0	0	0
	October	L	4	1	2	0	0	0	0	0
	November	7	17	4	4	0	0	0	1	0
	December	10	11	1	3	0	0	0	1	0
2021	January	ests	7	0	1	0	0	0	0	0
	February	9	10	5	7	1	0	0	0	0
	March	-3	9	2	5	2	0	0	0	1
	April	7.	7	3	1	1	1	1	0	1
	May		7	4	2	0	0	0	0	0
	June	10	11	4	4	1	1	0	0	0
	July	15	10	0	4	0	0	0	0	0
	August	7	3	3	2	0	1	0	1	0
	September	5	9	3	6	0	0	0	1	0
	October	5	6	4	0	0	1	0	0	0
	November	8	6	1	1	1	0	0	0	0
	December	20	7	2	2	6	1	3	0	1
2022	January	6	7	3	1	1	0	1	0	0
	February	7	5	3	1	0	0	0	0	0
Grand Total		195	162	64	59	14	5	5	5	3

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2020	January	0	1	0	1	0	0	0	0	0
	February	S	(A)	0	0	0	0	0	0	0
	March	4	ت	3	1	0	0	0	0	0
	April	(U)	60	3	4	0	0	0	1	0
	May	انه	انه	3	0	0	0	0	0	0
	June	9	Y	6	2	0	0	0	0	0
	July	بيّ	1	2	3	0	0	0	0	0
	August		a 10	0	1	0	0	0	0	0
	September	©	$ \infty $	4	1	1	0	0	0	0
	October		L	1	2	0	0	0	0	0
	November	7	17	4	4	0	0	0	1	0
	December	10	11	1	3	0	0	0	1	0
2021	January	10	7	0	1	0	0	0	0	0
	February	ests	S	5	7	1	0	0	0	0
	March	3	49	2	5	2	0	0	0	1
	April		O	3	1	1	1	1	0	1
	May		نه	4	2	0	0	0	0	0
	June	العا	$ \Psi $	4	4	1	1	0	0	0
	July	15	1	0	4	0	0	0	0	0
	August	V	3	3	2	0	1	0	1	0
	September	5	9	3	6	0	0	0	1	0
	October	5	0	4	0	0	1	0	0	0
	November	8	6	1	1	1	0	0	0	0
	December	20	7	2	2	6	1	3	0	1
2022	January	6	7	3	1	1	0	1	0	0
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Grand Total		195	162	64	59	14	5	5	5	3

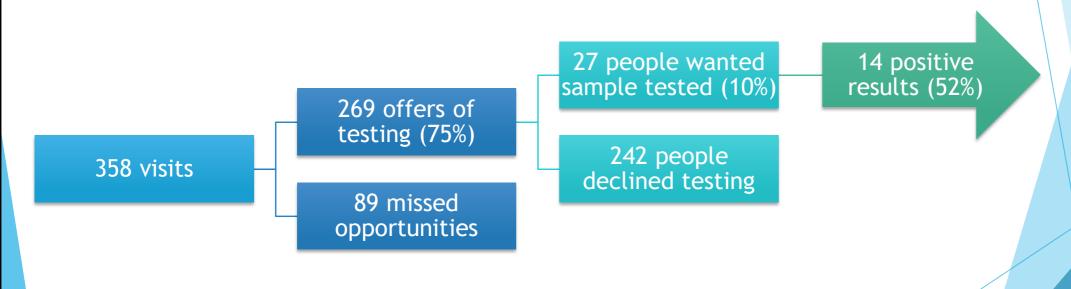
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	2020	January	0	1	0	1	0	0	0	0	0
		February	(U)	0	0	0	0	0	0	0	0
		March	44	42	3	1	0	0	0	0	0
		April	U)	(A)	3	4	0	0	0	1	0
		May	Á	(1)	3	0	0	0	0	0	0
1160	test	June			6	2	0	0	0	0	0
107	LC3L		٦	-3	2	3	0	0	0	0	0
		August	00	00	0	1	0	0	0	0	0
		September			4	1	1	0	0	0	0
		October	L		1	2	0	0	0	0	0
		November	7	17	4	4	0	0	0	1	0
		December	10	11	1	3	0	0	0	1	0
	2021	January	STS	7	0	1	0	0	0	0	0
		February	195	S	5	7	1	0	0	0	0
		March	30		2	5	2	0	0	0	1
		April		S	3	1	1	1	1	0	1
		May			4	2	0	0	0	0	0
1307	test	June	15		4	4	1	1	0	0	0
307	LC3L		15	-10	0	4	0	0	0	0	0
		August	V	3	3	2	0	1	0	1	0
		September	5	9	3	6	0	0	0	7	0
		October	18	0	4	0	0	1	0	0	0
		November		6	7	7	7	0	0	0	0
	2022	December	20	1	2	2	6	1	3	0	1
	2022	January	6 7	7 5	3	•		0	1	0	0
	February			162	64	59	0 14	5	5	5	3
	Grand Total			102	04	59	14	5	5	5	<u> </u>

Fentanyl Point-of-Care testing (F-POCT) Prince George OPS - Jan & Feb 2022

Number of days	46					
Number of visits	358 (avg. 8 visits per day)					
Number of times testing was offered	269 (75%)					
Number of tests completed	27 (1 in 10 people agreed to test their drugs)					
Positivity Rate	52%					

Fentanyl Point-of-Care testing (F-POCT) Prince George OPS - Jan & Feb 2022



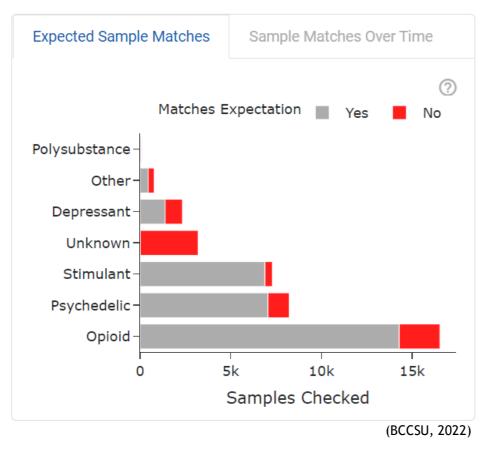
Fentanyl Point-of-Care testing (F-POCT) Prince George OPS - Jan & Feb 2022 (cont'd)

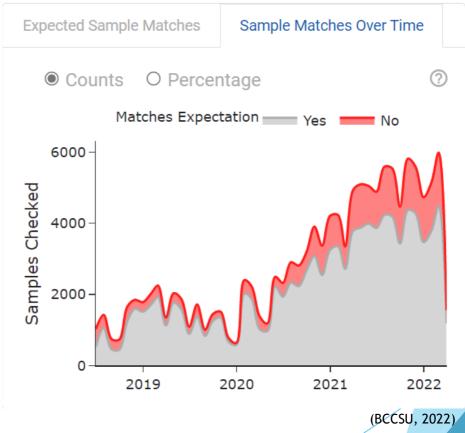
Of the 27 samples that were tested for fentanyl:

- ▶ 21 samples were <u>expected to contain fentanyl</u> (individuals believed they were fentanyl or other opioid containing fentanyl - heroin, morphine, "down" or combination thereof)
 - Of these, only 13 samples tested positive for fentanyl
- 6 samples were <u>NOT expected to contain</u> <u>fentanyl</u> (individuals believed they were speed, cocaine, methamphetamines or prescribed substances)
 - ▶ Of these, 1 sample tested positive for fentanyl

→ unpredictable illicit drug supply

Drug Checking Results



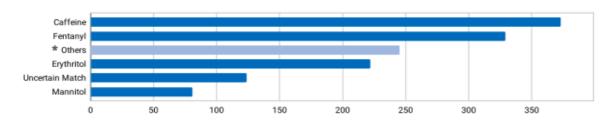


Trends of Concern

Trends of Concern

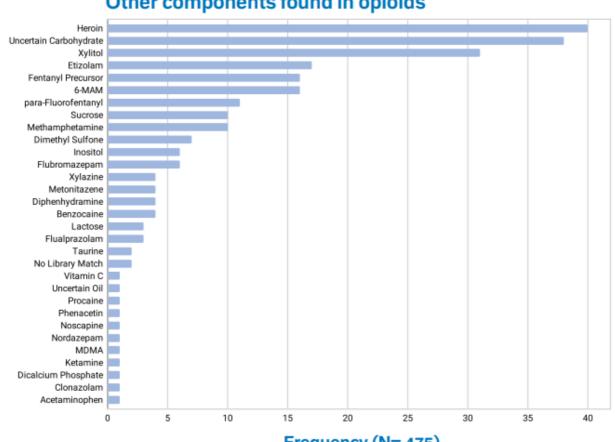
- ▶ (1) Fentanyl increasing concentration, increasing potency
- ▶ (2) Benzodiazepines and analogues
 - From July 2020 to October 2021, 44% of samples were positive for at least 1 benzodiazepine.
 - ▶ Benzodiazepine-positive samples increased from 15% in July 2020 to 53% in October 2021.
 - Etizolam was detected in 41% of samples between July 2020 and October 2021.
 - Data from drug checking services in Island Health show that 78% of expected opioid samples from
 - From May to November 2021, 78% of expected opioid samples contained benzodiazepines or etizolam, according to drug checking services in Island Health

Components in opioids



Frequency (N= 475)

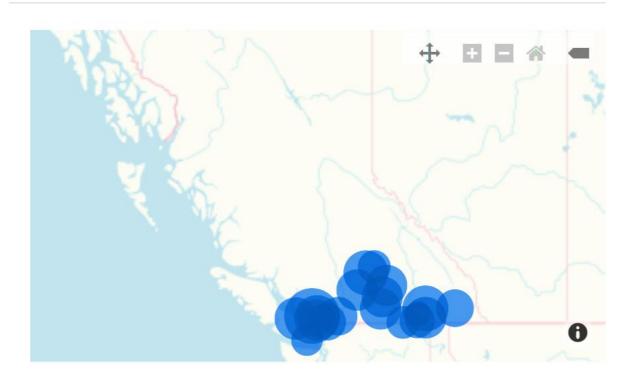
*Other components found in opioids



Frequency (N=475)

Local data?

■ Geographic Sample Distribution



- Data for the northern BC region limited to POCT and a small number of mailed samples
- Reports of increasing fentanyl
 & benzodiazepine
 concentrations in street supply

Is northern BC seeing the same patterns as elsewhere in the province?

Urine Drug Screens as proxy data?

- Data from Jan 2019 to December 2021 (3 years)
- Individuals seen for low-barrier OAT and safer alternative prescribing at APP/Needle Exchange in Prince George
 - ▶ Not a representative sample!
 - Data available were collected for clinical application (not research purposes)
- Urine drug testing at regular intervals is the standard of care in the provision of OAT
- POCT/screening vs. confirmatory testing
- Trends:
 - Decrease in heroin
 - Increase in fentanyl (and analogues)
 - Increase in benzodiazepines (and analogues)



Fentanyl analogues and metabolites

fentanyl norfentanyl acetylnorfentanyl norcarfentanil acetylfentanyl acetylmorphine acetylcodeine carfentanil furanylfentanyl acrylfentanyl methoxyacetylfentanyl methylfentanyl 6-mam (Nov 2020) morphine codeine tramadol desmethyl-u47700 di-desmethyl-u47700

Benzodiazepine analogues and metabolites

temazepam clonazepam diazepam oxazepam lorazepam alprazolam etizolam

What does it mean for people who use drugs in northern BC?

Overdose Resources

Opioids and Benzos or Etizolam



The following information outlines how benzos or benzo-like substances can complicate and delay opioid overdose response, and what to do if these substances are involved.

WHAT HAPPENS WHEN BENZOS ARE MIXED WITH OPIOIDS?

Increased likelihood of overdose from combined effects on central nervous system (e.g. respiratory depression)

After naloxone administration the person may begin breathing normally, but may not wake up There is no antidote for benzos in community and naloxone does not work on Benzos, BUT will temporarily reverse opioid effects

> When in doubt **GIVE NALOXONE**

RESPONDING TO AN OVERDOSE WITH BENZOS OR ETIZOLAM

If you witness someone having an opioid overdose and suspect benzos are involved:

- 1 Call 911 immediately and follow SAVE ME steps
- 2 More doses of naloxone should only be given if the person is not breathing normally (less than 10 breaths a minute)
- 3. If the person is breathing normally but remains unconscious, place in recovery position and stay with them until emergency services arrive
- 4. If available, use a pulse oximeter to monitor oxygen saturation in the blood



AFTERCARE

blackouts and memory loss can last for hours transfer for monitoring

GET YOUR DRUGS CHECKED AND DON'T USE ALONE

- When getting your drugs tested, ask for drugs to be checked for benzos
- Use with a buddy or at an overdose prevention or supervised consumption site
- When using with a buddy, stagger use so someone is able to respond

information:

- Using Oximeters During an Overdose Response²
- Resources for People Who Use Substances⁴
- Video: Responding to Overdose During COVID-19
 Video: Placing someone in recovery position

https://towardtheheart.com/site-finder

- https://towardtheheart.com/resource/using-an-oximeter-during-an-overdose/open
- //www.youtube.com/watch?v=sUrnfmlbwM4

BC Centre for Disease Control

Opioid overdose presentation looks different

- Prolonged sedation
- Respiratory depression is augmented
- May be more difficult to reverse
 - Naloxone will reverse opioid effects, but patients' level of consciousness may remain depressed.
- Overdose may be prolonged due to long half-life of etizolam (~7-15 hours); especially in patients with liver disease (liver metabolism).
- SUPPORTIVE CARE is paramount! Support patients' ventilation/ oxygenation, monitor (O2 saturation, end-tidal CO2 where available), treat symptoms.

(Moe, 2021)

Do I Keep Giving Naloxone?

The toxic drug supply is making opioid overdoses look different, especially when they don't respond to naloxone quickly. This can be very stressful! Here are some tips to help



Opioid overdose presentation looks different



They can guide you in responding The Good Samaritan Drug Overdose Act1 can protect you

Give Naloxone

When they're not getting enough oxygen

Breaths less than 10 per min. blue lips & fingernails

..............................

HOW OFTEN?

3-5 mins apart after initial dose

Give Breaths

The risk of brain injury or death during an opioid overdose is much higher than the risk of experiencing serious complications from COVID-19

Breaths every 5 seconds.

Use a CPR face shield and gloves in your THN Kit

be accompanied by giving breaths to prevent brain

3-5 mins = 30-40 breaths

Naloxone isn't your only tool!

Naloxone should always

injury or death

In someone with a tolerance to opioids, too much naloxone can cause withdrawal (e.g. vomiting, sweating, severe pain) and may make the situation worse



If naloxone isn't working, it's likely something else

Benzos and Etizolam mixed with opioids are keeping people sedated for longer

Focus on whether the person is getting enough oxygen, not whether they are awake If they are breathing, help them into the recovery position and stay by their side

- https://towardtheheart.com/resource/good-samaritan-act-poster/oper 2. https://towardtheheart.com/resource/why-give-breaths/open
- For more information visit: www.towardtheheart.com

Last updated: 2020-12-22



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SUPPORTIVE CARE is paramount!

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(Moe, 2021)

If you've been using opioids, it's likely you've been using benzodiazepines (benzos) and benzo-like drugs (e.g., etizolam). These substances have been showing up in the illicit drug supply, especially mixed with opioids and it's hard to know if benzos are in your drugs. When benzos are stopped suddenly you can experience withdrawal symptoms. Here is some information about withdrawal from benzos and benzo-like substances that can be serious and may need medical attention. (BCCDC, 2021b)

More information on dependence and withdrawal



Benzos are used for anxiety and sleep; they slow breathing and heart rate

Withdrawal symptoms can last 10 days or longer and be serious in their effects

Depending on the type of benzo, withdrawal symptoms can start within 24 hours or possibly earlier, of stopping use

You may not know you're taking benzos.

Withdrawal from Benzos can feel similar to opioid withdrawal, which can make it hard to know what symptoms you may be experiencing.

Withdrawal symptoms characteristic of benzos/benzo-like drugs

headaches, aching skin, feeling emotional, or inability to sleep or have intense irritability, restlessness, anxiety, panic attacks, nausea, muscle twicthing ²⁻⁵

More severe withdrawal from benzos may include ^{2,4}:

- Visual hallucinations (seeing things)
- o Confusion or having difficulty connecting to time and place
- Seizures
- o Death

What's next?

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