Diversion 101: Preventing, Identifying and Addressing Diversion in the Outpatient Setting

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Disclosure Information (Required)

- Julie Childers, MD
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Learning Objectives

- List the most common reasons why patients divert prescribed medications
- Describe a universal precautions approach to medication diversion that fits your patient population
- Discuss diversion directly and non-punitively with patients
- Adopt at least one new strategy to reduce diversion in your clinical practice

What is diversion?

Unlawful channeling of regulated pharmaceuticals from legal sources to the illicit marketplace (Inciardi et al)

Or…..

Patients selling or sharing all or part of their medication (Johnson and Richert)

The most common medication diverted in your clinical practice?

a) Buprenorphine
b) Methadone
c) Stimulants
d) Gabapentinoids
e) Sedative-hypnotic agents
f) Opioids
g) Antibiotics

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What is the most common way that diverted medications are used?

A. To get high
B. To self-treat a medical condition
C. To sell for profit
D. To improve performance
E. To trade for other substances

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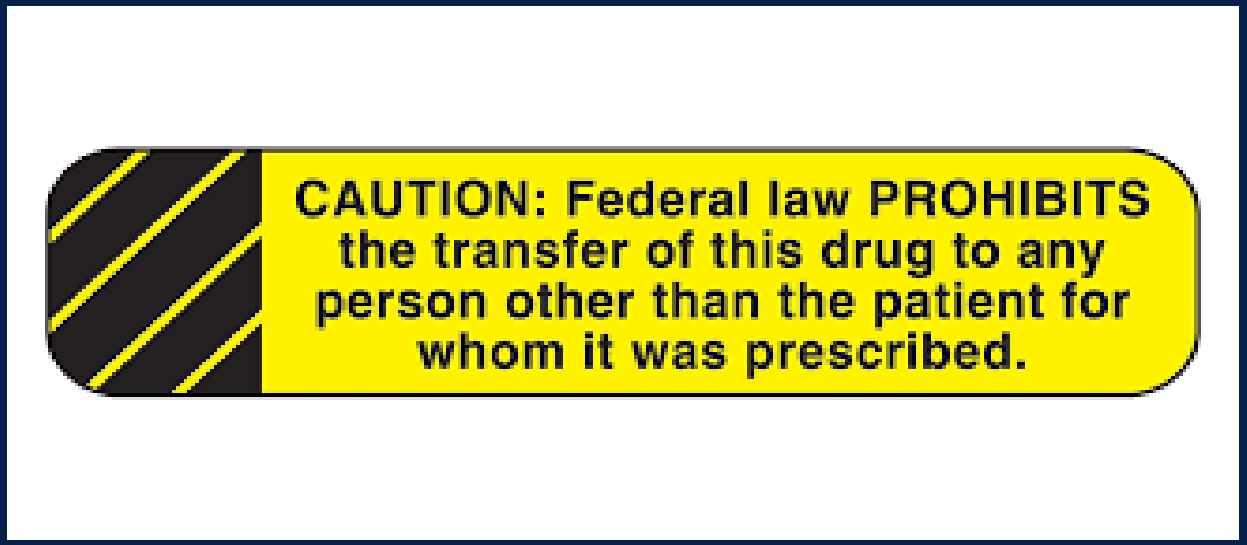
Types of Diversion



Types of Diversion

The black market in prescription drugs

Stefan Grzybowski

Doctor shopping for medications used in the treatment of attention deficit hyperactivity disorder: shoppers often pay in cash and cross state lines

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The black market

- Sponsoring
- Buying scripts from someone who has a reliable monthly prescription
  - People with active SUDs
  - Veterans
  - Older adults
  - Low SES
- Using a ‘connect’ (pharmacy technician)

Rigg et al 2012

Casual diversion is common in general population

- Family medicine patients prescribed analgesics
  - 61% “shared”
  - Majority did not tell their doctors and were not asked
- Another study: ~ 23% had shared a medication
  - Allergy meds, analgesics, antibiotics most common

Markotic, F., et al 2018.

Goldsworthy et al 2008

Buprenorphine Diversion

- Primarily diverted to self-treat withdrawal or maintain off opioids (many studies)
- McLean study found four types:
  - Ad hoc - situational
  - Concerned suppliers – helping a friend
  - Social sharers - recreational
  - Professional dealers
- Not being sold for profit in most cases
- Inability to access treatment or not liking the constraints

McLean 2022

Methadone Diversion

- Methadone MOUD clinic dosing schedule
- Increasing take home doses with treatment compliance
- Changing requirements with increasing take homes
  - Monthly Screening UDS
  - Counseling requirements
  - Bottle Recalls
- Even with this, 2/3 patients report ever diverting methadone

Johnson and Richert, 2014

Stimulant Diversion

- Stimulants prescribed for ADHD commonly diverted
- 17 – 62 % adolescents and young adults prescribed stimulants report diverting at least once
- Most commonly to improve academic performance or to get high
- Lower in adult populations

Faraone 2020

The landscape of diversion has changed

- PDMPs
- E-prescribing
- Decreased opioid prescribing overall
- Closure of pill mills
- Increased prescribing of buprenorphine

Kruse et al 2020

Potential benefits of diversion

- A way of being introduced to MOUD
- Manage drug use without heroin/fentanyl
- Reduced Hepatitis C
- When enter treatment, increased likelihood of retention
- Harm reduction: reducing exposure to fentanyl (opioids)

Harris and Rhodes 2013

Monico et al 2015

Why should we care if our patients share their medications?

- Who are we treating?
- Patient-clinician relationship
- Anticipatory guidance
- Medication safety
- Adverse events if admitted and not taking what they're prescribed
- Legal concerns: fraud

APPENDIX 1: DIVERSION RISK SCALE

Please circle one answer for each question. Choose the answer that best matches your life.

1. Many different people drop by to visit my home.

Never Sometimes Often All the time

2. I struggle with my finances (money).

Never Sometimes Often All the time

3. I feel safe in my neighborhood.

All the time Often Sometimes Never

4. Other people in my life also take pain medication.

No one One person Some people Many people

5. I take enough medication to relieve my pain.

All the time Often Sometimes No, not at all

6. Just a few people visit my home.

Very true Somewhat true Not very true Not at all true

7. Other people in my life also have pain.

No one One person Some people Many people

8. I think that at least one person who visits me might have a drug problem.

No one One person Some people Many people

9. I get out and visit friends or family.

Never Sometimes Often All the time

10. Money is short, so I have had a hard time paying all my bills.

Never Sometimes Often All the time

11. I think other people have kept me from getting what I deserve.

Never Sometimes Often All the time

12. I have been in trouble with the law before.

Never Sometimes Often All the time

13. I know at least one person who is prescribed more pain medication than they need.

No one One person Some people Many people

14. I would be doing better now if it were not for other people and what they did to me.

Not at all true Not very true Somewhat true Very true

15. I have been treated for an alcohol or drug problem one or more times.

Never One time Two times Three or more times

Jones 2023

Risk factors for diversion of MOUD

- Current illicit drug use
- Family and friends with current drug use
- Buprenorphine monoproduct >> bup/nx, methadone
- Higher dose (excess supply)

Johnson and Richert, 2015

Prevention

- Up front discussion: "Your medication is for you alone."
- Abuse-deterrent formulations
- Use of PDMP and e-prescribing
- Appropriate dose, appropriate quantity
- Controlled substance collection

- Options for a high risk population:
  - Pill/wrapper counts
  - Random call-backs
  - Observed dosing

Detection

- Urine drug screens
  - Confirm last dose and document their response
- Urine drug screen negative for prescribed substance
  - Or lacks metabolite, or low levels
- Report from the community
- Call-backs (random or not)

Goals when diversion is suspected/confirmed

- Assess degree of diversion and intent
  - Are they taking any of the prescribed medication at all?
  - Are they selling it versus sharing altruistically?
- Maintain the patient in treatment
- Preserve therapeutic relationship
- Ensure safe prescribing
- Bring others into treatment who may need it

Responding to Diversion

- Increase monitoring
  - Shorter prescribing intervals
  - UDS at every visit
- Observed drug testing
- Observed dosing
- Call-backs
- Change to a formulation which is less likely to be diverted

Discussing Diversion with the Patient

- Describe evidence
  - "These urine screen results make us concerned that you may not be taking all of your...."
- Ask directly while normalizing
  - "Sometimes patients are tempted to share their medications with others who need it. Does that ever happen to you?"
- Describe consequences without accusing
  - "Because of these results, we will have to..."
- Maintain commitment to treat

Case 1

- Crystal is a 30 year old woman who has been in treatment with you for OUD for eight months
- Consistently misses in-person visits and switches to telemedicine
- Have obtained two urine drug screens:
  - Buprenorphine screen positive
  - Buprenorphine level >2000
  - Norbuprenorphine absent
  - Naloxone level >2000
- Has brought in films for in person visits and counts are appropriate
- Patient repeatedly tells you that she is taking her buprenorphine

Case 2

- Hank is a 65 year old man with prostate cancer has been receiving opioids for cancer related pain.
- Struggles to make appointments regularly at the cancer center
- Daughter has been calling for his refills, worry of diversion in the treatment team
  - Urine drug screen and confirmation negative for benzodiazepines, benzodiazepines were discontinued after discussion with patient previously
  - Methadone screen negative
  - Methadone confirmation negative
  - EDDP level <500

Case 3

- James is 34 year old man who has been in OUD treatment with methadone for four years
- He takes 140mg of methadone daily, is not on any other medications
- He receives 27 take home doses at a time, coming to clinic once per month
  - Monthly UDS positive for Methadone, Metabolites uCr 200
    - “Bottle Recall” UDS positive for Methadone, no metabolites, uCr 15
    - Called in on day 5/27, all bottles present and have been opened

Diversion Prevention and Detection

Prevention	Detection
Verbally educate patient before prescribing	Urine drug screens (+/- metabolites)
Use less-diverted formulations (injectable, bup/nx versus monoproduct)	Bring in empty film wrappers for counts
Prescribe shorter durations	Random call backs
Observed dosing	Observed urine screens
Prescribe medications with lower street value/potential for euphoria	

Final Takeaways

- Diversion is common in all settings
- Diverted medications are most commonly used for self-treatment
- Practices to reduce diversion should be used to
  - Continue to engage patients in treatment
  - Ensure safe prescribing
  - Maintain therapeutic relationship
  - Bring in others who may need treatment

Questions

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