

Medication First: Medications for Opioid Use Disorder in Correctional Settings

CSAM State of the Art: Addiction Medicine
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CONFLICT OF INTEREST DISCLOSURE

I, Brian Hurley, have nothing to disclose, and I will not be discussing “off label” use of drugs or devices in this presentation.

EDUCATIONAL OBJECTIVES

After attending this presentation, participants will be able to:

1. Discuss the pharmacology and safety profile for medications for addiction treatment.
2. Describe the medication first model for the treatment of opioid use disorder
3. Explain how the provision of medications for opioid use disorder reduces post-release overdose risk

Treatment Goals

- Range of treatment goals

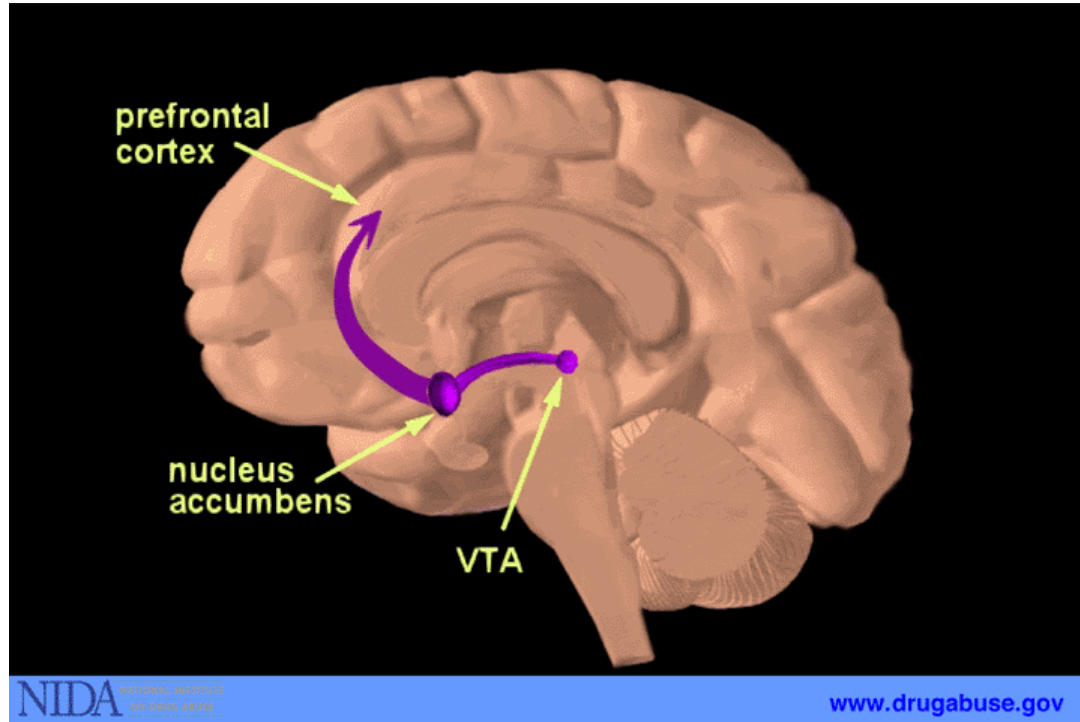
Minimization of harms from ongoing use



Sustained recovery with abstinence from all substances

- Treatment Options; Federations of State Medical Boards 2013

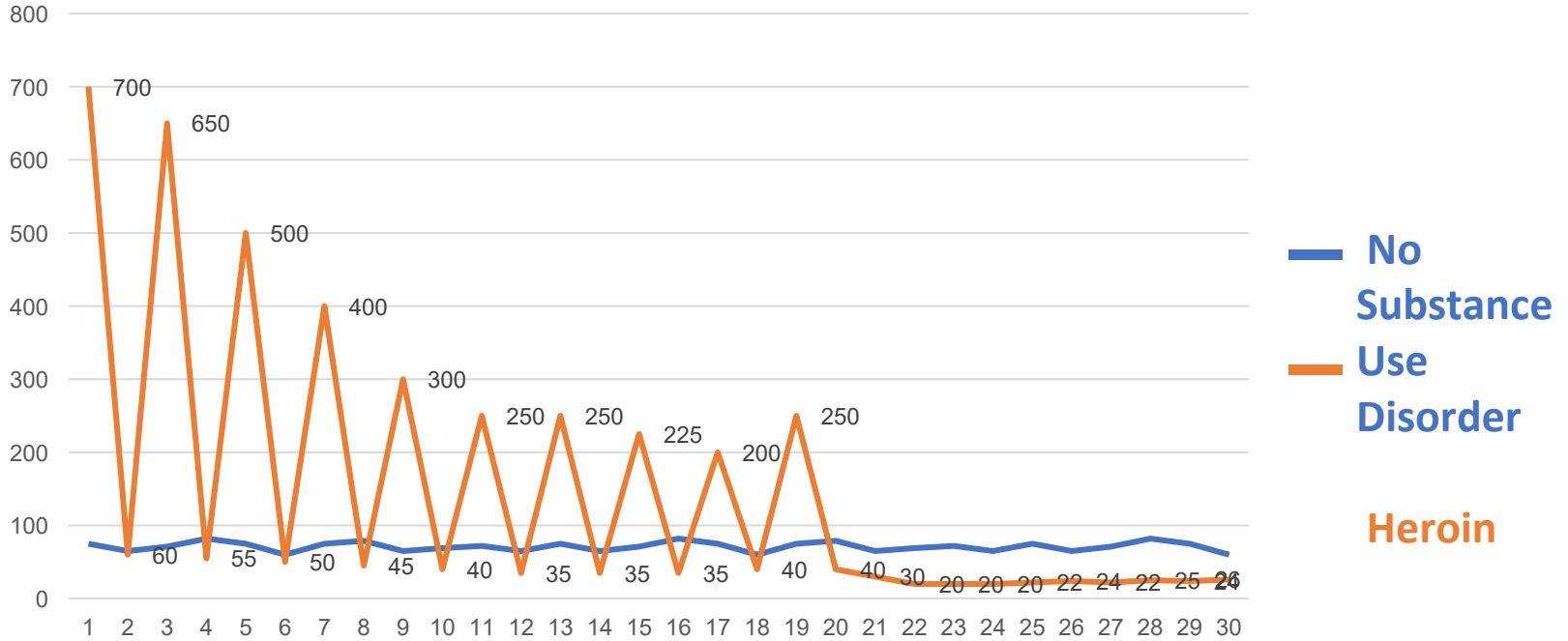
- *Partial Agonist (Buprenorphine) at the mu-receptor – OBOT/OTP*
- *Agonist (Methadone) at the mu-receptor - OTP*
- *Antagonists (Naltrexone) at the mu-receptor*
- *Simple detoxification and no other treatment*
- *Counseling and/or peer support without MAT*
- *Referral to short or long term residential treatment*



Source: National Institute on Drug Abuse

Neurobiology of Addiction

<http://www.youtube.com/watch?v=bwZcPwIRRcc>



Dopamine levels vs. Episodes of heroin use

Please note this an HMA proprietary slide.

Source: Volkow (2015) Cell, 162 (4), 712-25.

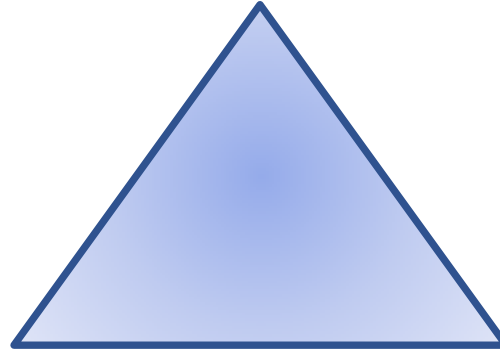
Dopamine D2 Receptors Are Lower in Addiction



Source: National Institute on Drug Abuse

Core Components of Addiction Treatment

*Medications



*Counseling

*Support

*When appropriate

Source: <http://www.samhsa.gov/treatment>

Medications for Addiction Treatment (MAT)



■ Opioids

- *Methadone*
- *Buprenorphine*
- *Naltrexone*

■ Alcohol

- *Disulfiram*
- *Naltrexone*
- *Acamprosate*

■ Tobacco

- *Nicotine*
- *Bupropion*
- *Varenicline*

■ Others

- *No FDA-approved medications (yet)*

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Real World: Rhode Island


12.3% The decrease in Rhode Island's overall death rate from January 1, 2017 to June 30, 2017 compared to the previous year.




60.5% The decrease in the overdose death rate among those recently incarcerated during the same timeframe.



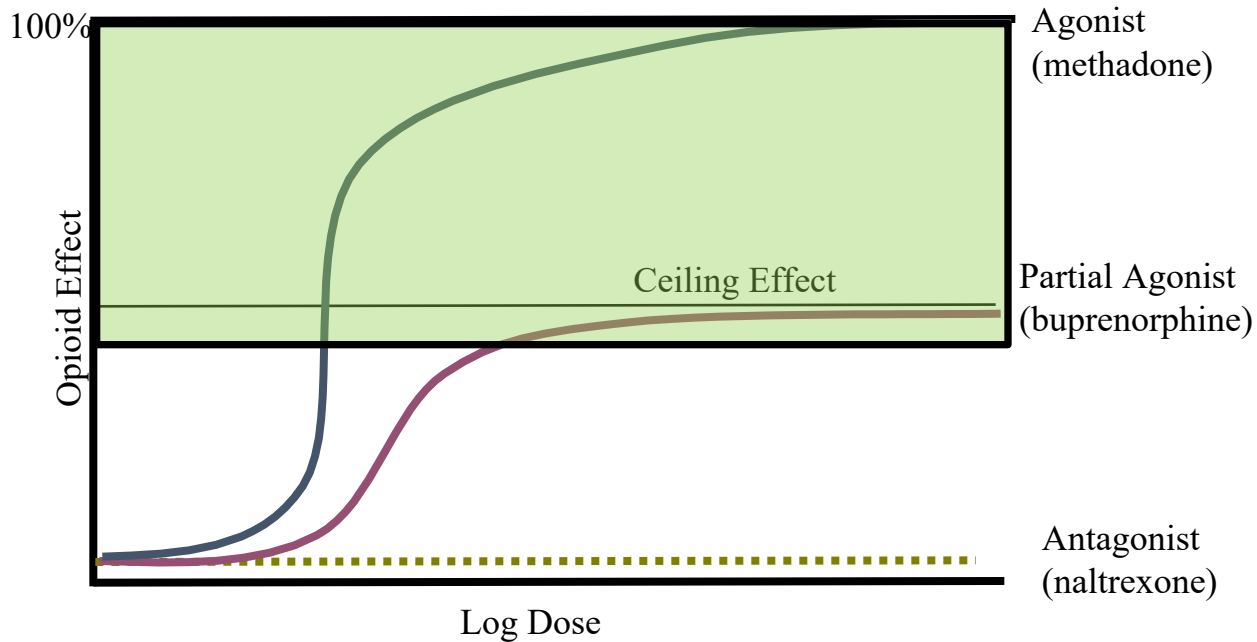
50% The overall number of deaths attributed to fentanyl was cut in half.



72

35

The number of naloxone kits dispensed at release from incarceration decreased between the 2016 and 2017 cohorts, while the receipt of MAT (buprenorphine, methadone, and naltrexone) after release increased.

Buprenorphine & Methadone Pharmacokinetics

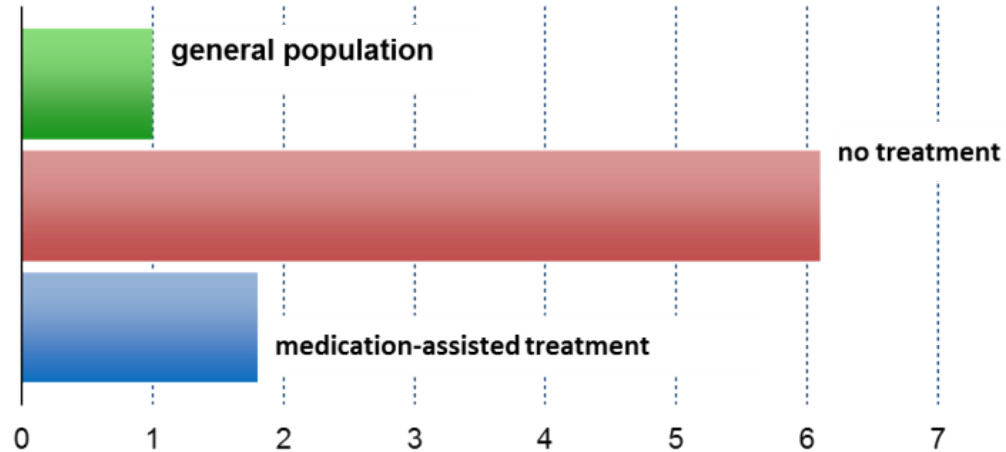


SHOUT - Support for Hospital Opioid Use Treatment

Slide Credit: Curtis Geier and Ben Smith

Benefits of MAT: Decreased Mortality

Death rates:

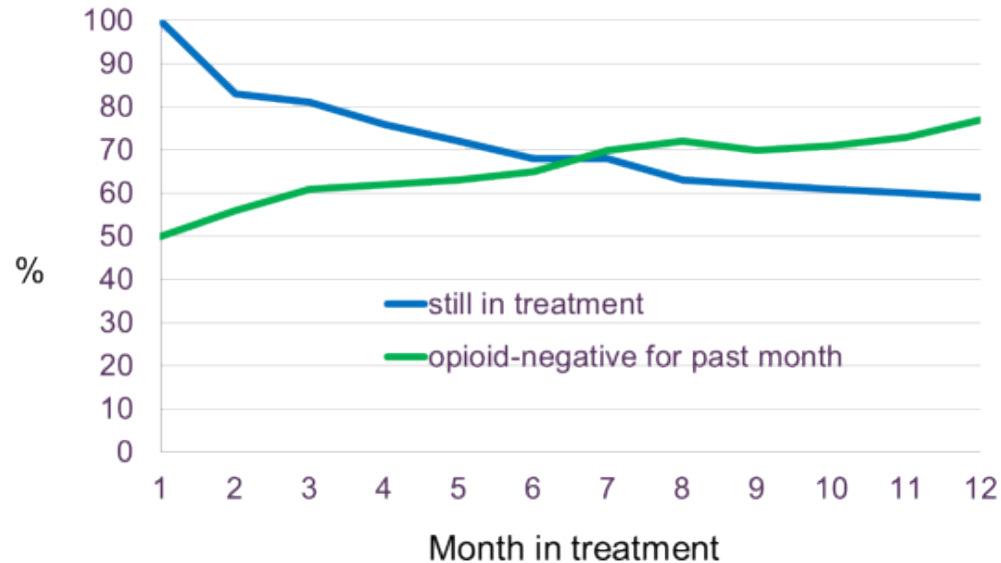


Dupouy et al., 2017
Evans et al., 2015
Sordo et al., 2017

Standardized Mortality Ratio

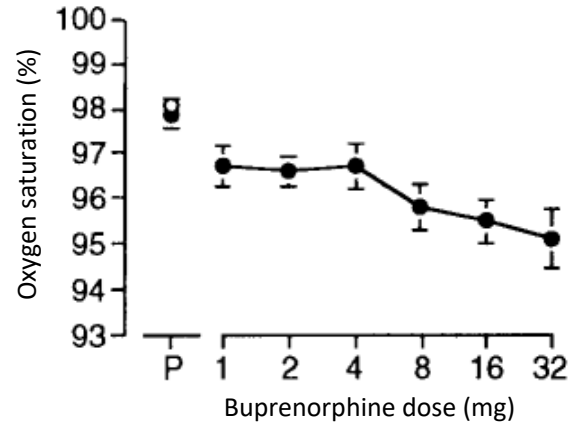
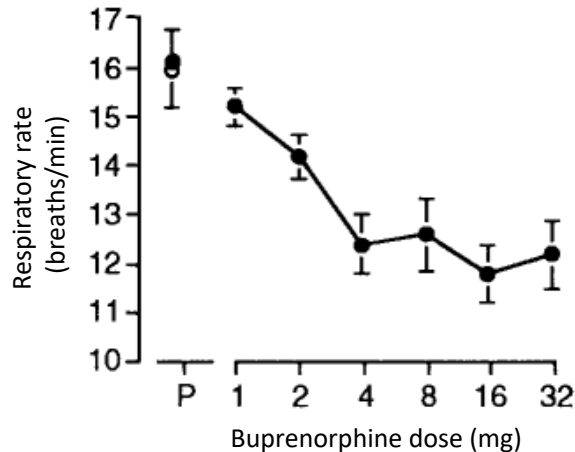
Treatment Retention and Decreased Illicit Opioid Use on MAT

- Buprenorphine promotes retention, and those who remain in treatment become more likely over time to abstain from other opioids



Buprenorphine Dosing: Safety

- Cognitive and psychomotor effects appear to be negligible.
- Respiratory rate slowed but has as a plateau effect in adults.



- Nearly all fatal poisonings involve multiple substances

Changes in FDA Recommendations

08/2016	09/2017
<ul style="list-style-type: none">▪ Boxed Warning for combined use of opioid medicines with benzodiazepines or other CNS Depressants (e.g. Alcohol)▪ Risks of slowed or difficult breathing; Sedation; Death	<ul style="list-style-type: none">▪ Buprenorphine and methadone should not be withheld from patients taking benzodiazepines or other drugs that depress the central nervous system (CNS).▪ The combined use of these drugs increases the risk of serious side effects; however, the harm caused by untreated opioid addiction can outweigh these risks.▪ Careful medication management by health care professionals can reduce these risks.

Medication FIRST Model

- People with OUD receive pharmacotherapy treatment as quickly as possible, prior to lengthy assessments or treatments planning sessions;
- Maintenance pharmacotherapy is delivered without arbitrary tapering or time limits;
- Individualized psychosocial services are continually offered but not required as a condition of pharmacotherapy;
- Pharmacotherapy is discontinued only if it is worsening the person's condition.

<http://www.nomodeaths.org/medication-first-implementation>

Medication FIRST Model

- Medication *first **does not mean** Medication only*
- Medication is contingent upon the pt's benefit, not based upon a timeframe, patient's participation in counseling, an unexpectedly positive test result, etc

<http://www.nomodeaths.org/medication-first-implementation>

In Opioid Use Disorder:
Adding psychosocial support to agonist
pharmacotherapy does not change the
effectiveness of retention in treatment
and opiate use during treatment.

Source: Amato (2011)

INCARCERATED INDIVIDUALS

- 77 percent of incarcerated individuals with an OUD relapse to opioid use within three months of release (even after participating in a counseling program) without MAT

Source: Substance Abuse and Mental Health Services Administration (2019)

PREGNANCY AND INCARCERATION

5% of women in jail, 4% in state prison, and 3% in federal prison are pregnant upon arrival

Most incarcerated women are imprisoned for nonviolent crimes

Drug offenses make up 25% of state offenses and 60% of federal offenses for ♀

Black women are incarcerated at a rate 2.3 times that of White women, and Hispanic women are incarcerated at a rate 1.5 times that of White women

Carson, E. A., & Anderson, E. (2016)

Maruschak, L. M. (2019)

Maruschak, L. M., Berzofsky, M., & Unangst, J. (2015)

Opioid Use Disorder Treatment During Pregnancy

No MAT

- Reduced prenatal care
- Fetus & mother exposed to unstable opioids, IVDU, and behavioral risks
 - HIV, HCV
 - Endocarditis, cellulitis
 - Trauma
- Adverse Outcomes
 - Miscarriage
 - Preterm delivery
 - Fetal growth restriction
 - Fetal death



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MAT: Benefits

- Improves adherence to prenatal & addiction care
- Improves maternal & fetal outcomes
- Reduces cravings & use
- Reduces overdose (OD)
- Reduces complication of Intravenous Drug Use (IVDU)
- Reduces criminal behavior
- Neurological, cognitive and behavioral outcomes similar to non opioid exposed infants (up to 8 y)

Please note this an HMA proprietary slide.

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SUMMARY/TAKEAWAYS

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Interested in more?

ASAM <http://www.asam.org/advocacy/toolkits/treatment-in-correctional-settings>

NCCHC <http://www.ncchc.org>