OPIOID USE DISORDER

MAT ECHC

4/9/18



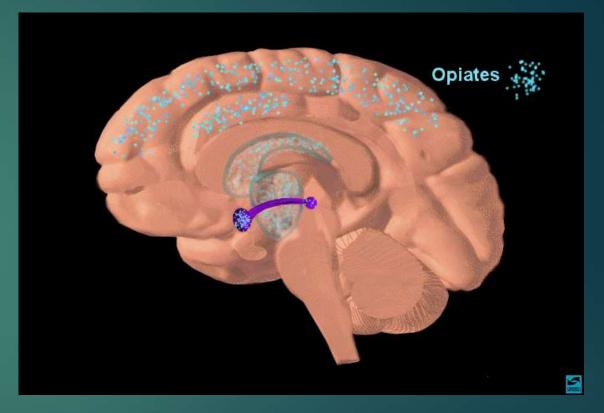
OPIOID USE DISORDER

A problematic pattern of opioid use leading to clinically significant impairment or distress, as manifested by at least two of the following, occurring within a 12month period:

| Diagnostic Criteria | Abuse | Dependence | Substance Use D/O |
|--------------------------------|-------------|-------------|--|
| Failure to fulfill major roles | X | | X |
| Hazardous use | | | Х |
| Legal Problems | X | | |
| Social/Interpersonal | | | X |
| Tolerance | | X | X |
| Withdrawal | | X | Х |
| Efforts to cut down | | X | Х |
| Using more or longer | | X | X |
| Neglect important activity | | X | X |
| Great deal of time | | X | Х |
| Psych/Physical problems | | X | X |
| Craving | | | X |
| Diagnostic Threshold | 1+ Criteria | 3+ Criteria | Mild: 2-3 Moderate: 4-5 Severe: 6+ |

Opiate effects on the body

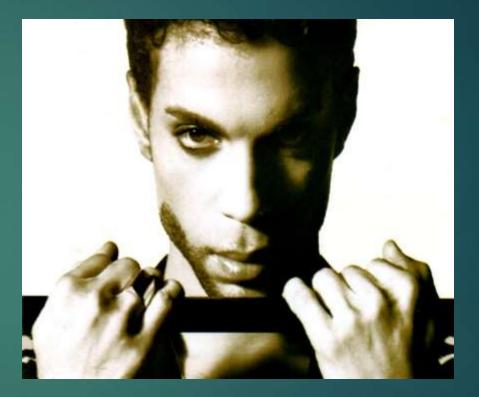
- Near instantaneous euphoria/rush
- morphine hits opiate receptors in the brain, a massive release of DA occurs in Ventral Tegmental Area (VTA) to Nucleus Accumbens
- feels relaxed, sedated, drowsy
 - (-) LC noradrenergic
- Brain stem effects: respiratory depression, vomiting



Opioid Toxicity

Influenced by purity, loss of tolerance, alcohol/sedative mix

- clouded consciousness to coma
- Severe respiratory depression
- Constricted pupils
- Pulmonary edema
- Severe hypotension, cardiovascular collapse (hypoxia may lead to dilated pupils)
- Reversed by naloxone (narcan)



WITHDRAWAL

- Effects begin within 4-24 hrs
- Typical sx's (flu-like and leaky):
 - nausea/vomiting,
 - cramps (abd & muscular),
 - sweating,
 - goose bumps/piloerection,
 - rhinorrhea, diarrhea, mydriasis
 - Insomnia
 - ▶ fever



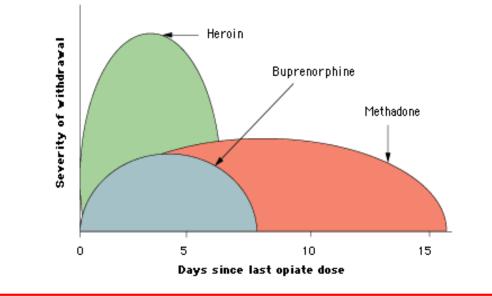
OPIATE WITHDRAWAL

Heroin

-short ½ life -4-6h after last use

Methadone

-long ½ life -24-36h after last use



Severity of opioid-withdrawal symptoms after abrupt discontinuation of equivalent doses of heroin, buprenorphine, and methadone Peak withdrawal symptoms are most severe after discontinuation of heroin. Such symptoms last longest with methadone, which has a somewhat later peak of severity. Buprenorphine has milder peak withdrawal symptoms than does methadone; the duration of symptoms is intermediate between those for methadone and those for heroin. Reproduced with permission from: Kosten, TR, O'Connor, PG. Management of drug and alcohol withdrawal. N. Engl J Med 2003; 348:1786. Copyright © 2003 Massachusetts Medical Society.

Opiate WD: Measurement

Clinical Opiate Withdrawal Scale (COWS)

- ► 11 item
- ▶ Mild: 5-12
- Moderate: 13-24
- Moderately Severe: 25-36
- ► Severe: >36

Opiate Withdrawal: Supportive

Bentyl 10mg qid for diarrhea Immodium 4mg; 1-2 q hr prn NTE 8qd Motrin 600mg one q 6 prn bone pain Compazine 10mg TID prn nausea Benadryl 25mg two q 6 prn nasal cong. Clonidine 0.1 to 0.2mg q hour prn; up to 1.2mg

OUD Treatment

Detoxification

- or
- Maintenance
 - Methadone
 - Methadone Clinic (OTP)
 - ▶ Buprenorphine
 - Office based (OBMAT)

"Detoxification from heroin is good for many things – but staying off heroin is not one of them." - Walter Ling

Medication Assisted Treatment

Methadone (Full Agonist)

Pros: Long lasting Decades of evidence Helps with pain Cons: Diverted Inconvenient Lethal in overdose Withdrawal Stigma

Buprenorphine (Partial Agonist) Pros: Doctor's office Less risk of overdose Less risk of IV use Helps with pain Cons: Diverted Withdrawal

Naltrexone (Antagonist) Pros Not diverted No risk of overdose Cons: Compliance Pain