Medications for Opioid Use Disorder (MOUD) in the Emergency Department

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How did we get here?

- “Pain is the 5th vital sign” (American Pain Society - 1996)
- Campaign of marketing and deceit pushed by the pharmaceutical industry to sell product:
  - pharmaceutical industry paid/influenced speakers, conferences, regulatory bodies
  - patient satisfaction scores
  - Joint Commission pain assessment and treatment standards (2001)
- generation of docs trained and encouraged to liberalize the use of opioids

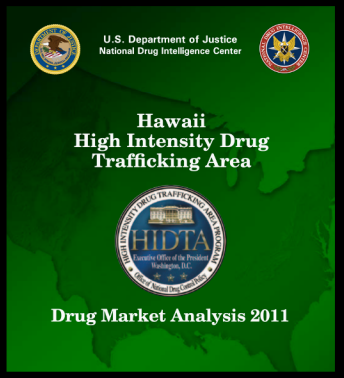
How did we get here? - 2

- we were insufficiently skeptical and critical of the information we were told
- initially we overprescribed opioids, resulting in many cases of addiction
- ~~"addiction doesn't develop when you prescribe opioids appropriately to treat pain"~~
- then, when the narrative changed, we reversed course, and told these opioid-dependent patients that "opioids are bad for you, and I'm not going to add to the problem"

    - …..even though we had a big role in creating this problem…..

“opioid withdrawal won’t kill you - you just wish you were dead”

- if you’re opioid-dependent, opioid withdrawal is an emergency - similar to running out of water
  - except you’d rather go thirsty than go into withdrawal
- 80% of heroin users started with prescription drugs
  - when we stopped prescribing, heroin was cheaper and easier to get (see below)
- Street Drug Economics 101- it’s about the $
  - Marijuana is still home-grown
  - in 2021 most of our other drugs comes from….
  - Ice is still #1
  - heroin: needs outdoor space - time, effort, cost = discoverable
  - fentanyl: indoor labs - quick, cheap, discreet
  - Drug Trafficking Organizations are switching from heroin to fentanyl as fast as they can = increased risk of death for users



Why focus on the ED?

- Willie Sutton: “That’s where the money is”
- Patients present for:
  - overdose
  - withdrawal
  - trauma
  - infection
  - COVID
  - other crises
  - or even just asking for help….
- Despite our reluctance we must be more involved
- **1-year all-cause mortality: ~5-10%**
  - after an ED visit for overdose

MOUD in the ED

- Prevent
- Protect
- Treat

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Consensus Recommendations on the Treatment of Opioid Use Disorder in the Emergency Department

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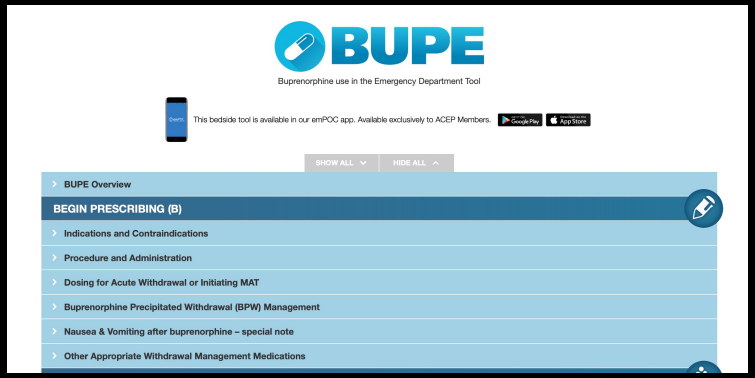
Management of Opioid Use Disorder in the Emergency Department: A White Paper Prepared for the American Academy of Emergency Medicine



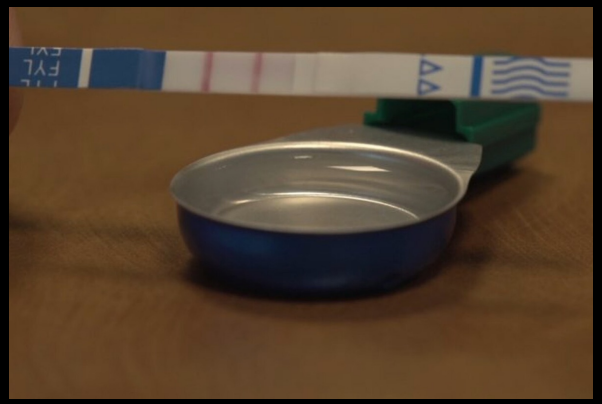
Prevent

"If you don't start none, there won't be none"

- don't prescribe opioids if they're not needed
  - shared decision making - managing acute pain vs. risk of long-term harm
  - like all drugs - most will do fine, but some (1:15-1:50) will do <u>really</u> poorly. (OUD)
- if prescribing opioids - limited course (3 days)
- DON'T WITHHOLD OPIOIDS FROM PATIENTS WITH SEVERE ACUTE PAIN
  - risk of harm is from the prescription - not the acute treatment
  - don't have hospice or other critically ill patients suffer unnecessarily

Protect
(Harm Reduction)

- "meet" patients where they are
  - i.e. obesity and DM; smoking and CAD/HTN
- Naloxone Rx or take-home for patients:
  - brought in for acute opioid OD
  - using street opioids
  - prescribed high doses of opioids by others
  - taking prescribed opioids and sedatives
- Injection safe use practices
  - needle exchanges
  - fentanyl test strips
  - tester shots with new batches, etc.
- Address other issues as possible



Treat

"opioid withdrawal syndrome = buprenorphine deficiency"

- ~~naltrexone~~
- ~~methadone~~ - not for ED use, but can work
- **Buprenorphine**
  - default treatment for opioid withdrawal in the ED
  - "converts addiction to dependence"
  - higher affinity for mu receptor than heroin, methadone, prescription opioids BUT
  - if given in a patient not in opioid withdrawal, may precipitate acute withdrawal symptoms
  - buprenorphine-naloxone - naloxone inert unless patient tries to use in abuse

Buprenorphine use in the ED

- Can be ordered and given in the ED by ANY provider
  - X-waiver only required for prescriptions
- Should be used to manage acute withdrawal in the ED
  - EVEN IF the patient states that they won't/can't follow up
  - Every minute that the patient is stable on buprenorphine is another minute that they're:
    - safe from withdrawal
    - safe from overdose
    - safe from craving
    - and proves that buprenorphine can work for them

What's the role of counseling/SBIRT in the ED?

- 2011 Cochrane review:
  - "present evidence suggests that adding psychosocial support does not change the effectiveness of retention in treatment and opioid use during treatment."
- D'Onofrio G (JAMA 2015)
  - compared referral only, SBIRT, and SBIRT+buprenorphine
  - Buprenorphine group twice as effective as other groups
  - 80% still in treatment at 30 days
- so…might help? (maybe not)

- GIVE BUPRENORPHINE
  - "diabetes" model? At a certain point, you can't counsel and "lifestyle change" your way out of needing insulin….
  - once you're controlled on meds, then counseling/support may help

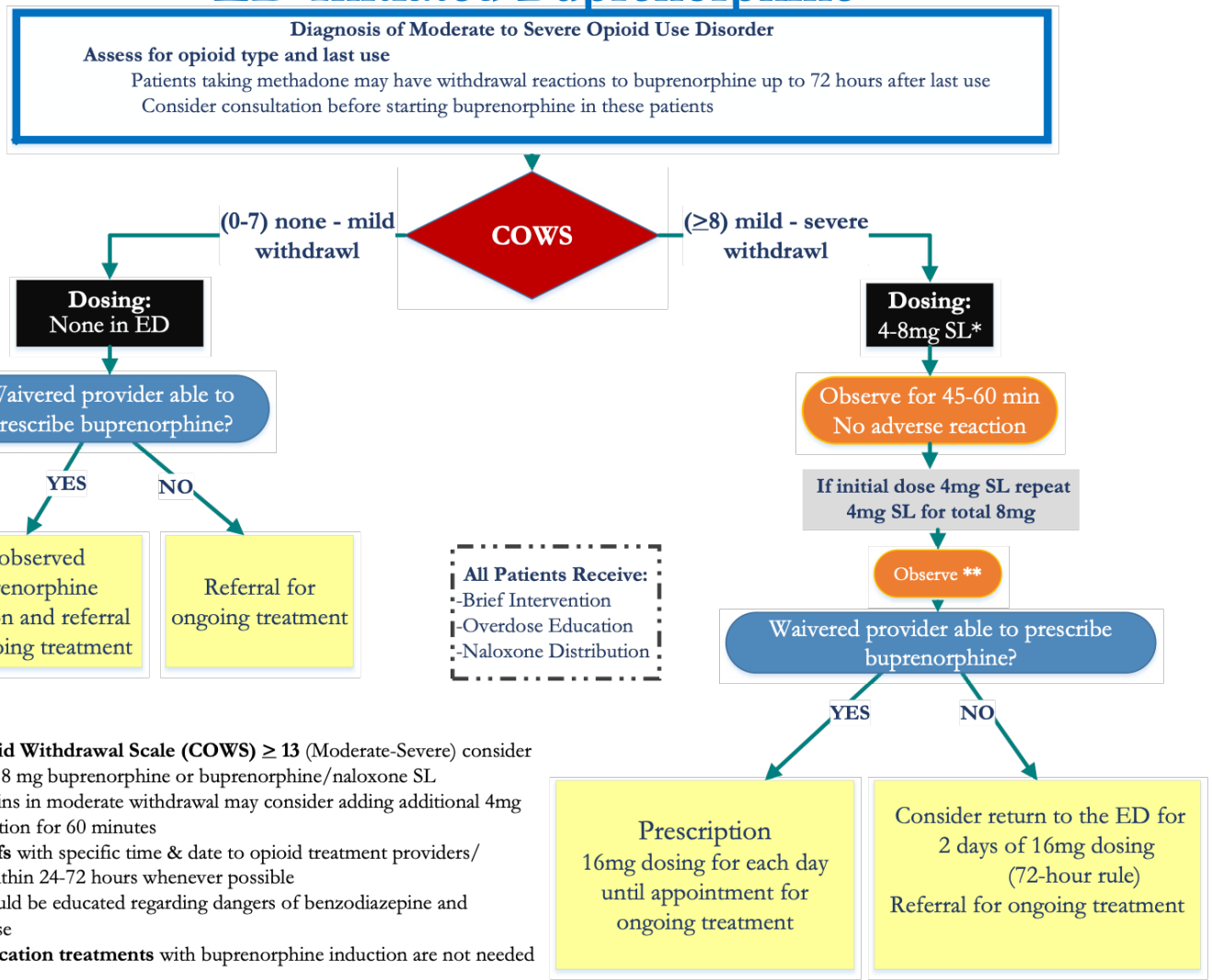
Cost effectiveness of ED-Initiated Treatment for Opioid Dependence

- Busch SH (Addiction 2017)
  - “In the US, ED-initiated buprenorphine intervention for patients with opioid dependence provides high value compared with referral to community-based treatment or combined brief intervention and referral”
  - ED-initiated buprenorphine outperformed the other treatments at ALL willingness-to-pay values
- high-value treatment for insurers

ED-initiated buprenorphine

- induction occurs over days
  - "we're not inducing, we're just starting the process in the ED"
- Opiate Use Disorder assessment
- COWS scoring (>8)
  - is there a concurrent infection?
  - don't forget to check for pregnancy
- buprenorphine 4mg SL/PO x1
  - (wait 45min-1hr)
  - repeat buprenorphine 4mg SL/PO prn
  - typical day 1 dosage: 8mg-16mg

ED-Initiated Buprenorphine



Notes:

***Clinical Opioid Withdrawal Scale (COWS) ≥ 13** (Moderate-Severe) consider starting with 8 mg buprenorphine or buprenorphine/naloxone SL

** Patient remains in moderate withdrawal may consider adding additional 4mg and observation for 60 minutes

Warm hand-offs with specific time & date to opioid treatment providers/ programs within 24-72 hours whenever possible

All patients should be educated regarding dangers of benzodiazepine and alcohol co-use

Ancillary medication treatments with buprenorphine induction are not needed

ED-initiated buprenorphine - 2

- Discharge Rx:
  - Buprenorphine-naloxone 8mg/2mg SL BID x 3 days
  - cover holidays/long weekends
  - induction takes time, life happens
- “warm handoff”
  - directly link patient to followup addiction care and services
  - fax/phone/e-refer information TO followup site
  - time/date/location specific followup is best
  - give patient realistic expectations
  - for referral sites - giving feedback BACK to the ED is key for success

SUBSTANCE USE DISORDER REFERRAL FORM

PLEASE COMPLETE ALL FIELDS
or attach face sheet, H & P Labs, and D/C Summary
Form available on www.hhhrc.org

HAWAI'I HEALTH & HARM REDUCTION CENTER
The New Chapter for Life Foundation and The CHOW Project

Fax Referral Form to (808) 521-1552 (Attn: Dr. Christina Wang)		**Phone: (808) 521-2437**
Patient's name:		**Date of Birth:**
Address or other location where patient can generally be found:		
Primary phone #:	Other means of contact:	
Referring Information		
Referral source: ☐ Castle ☐ Kahuku ☐ Kapiolani ☐ Kuakini ☐ Pali Momi ☐ Straub ☐ Queens ☐ Wahiawa ☐ Waianae Comprehensive ☐ Other: _____		
Name of referrer:	Phone #:	Fax # or email:
PCP (if any):	Phone #:	Fax # or email:
Health Insurance Information ***[Please note some insurance companies require Prior Authorizations for Buprenorphine]***		
Primary insurance:	Subscriber:	Sub ID:
Secondary insurance:	Subscriber:	Sub ID:
Diagnosis and Pertinent Medical History		
ICD-10 diagnoses codes:		A & O Status:
Is the patient able to ambulate independently? Y / N If no, what assistive devices are used? _____		

Recommended ED screening order Set: *or attach labs

- UDS results:
- Patient currently on Methadone? Y / N
- Pregnancy screening (if needed): Y /N
- HIV, Hep A, B, C panels
- LFTs

Medication Reconciliation Allergies?
Results:

-COWS (Clinical Opiate Withdrawal Scale) Assessment Tool
-Vital Signs

Please circle one:
1) Inducted in ED 2) Advised for home induction then follow up 3) Outpatient assessment & /or induction

Additional Information About the Hawai'i Health & Harm Reduction Center

We are a non-profit clinic focusing patient care on evidence-informed harm reduction principles. We offer a variety of services and welcome all people for care without regard to insurance status or ability to pay.

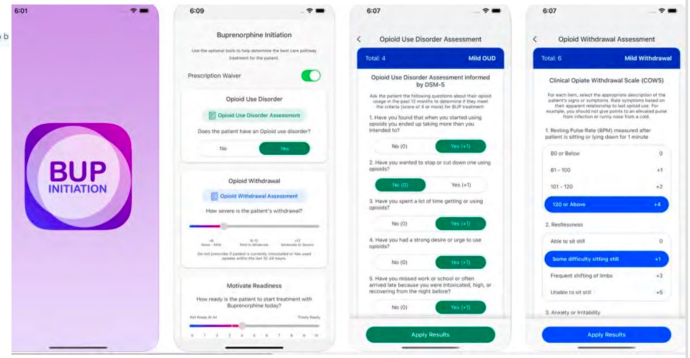
** The Hawai'i Health & Harm Reduction Center's wound care program does not have the capacity to care for long-term bedridden patients.*

1. Community based wound care (referral form at www.hhhrc.org)
2. Addiction Medicine Services
3. Psychiatric Services
4. Rapid HIV/ HCV testing
5. HIV Case Management
6. HCV treatment
7. PrEP/ PEP / STI testing
8. Smoking Cessation Counseling

HHHRC Clinic: 677 Ala Moana Blvd Suite 226 Honolulu, HI 96813 **Phone:** (808) 521-2437 **Website:** www.hhhrc.org
Clinic Hours: Monday, Wednesday, Thursday 9:00am–4:30pm, Tuesday and Friday 1:00pm–4:30pm (Walk-ins Welcome)
HHHRC Chinatown Outreach (on River St. & Kukui St.): Tuesday and Friday 9:00am–12:00pm

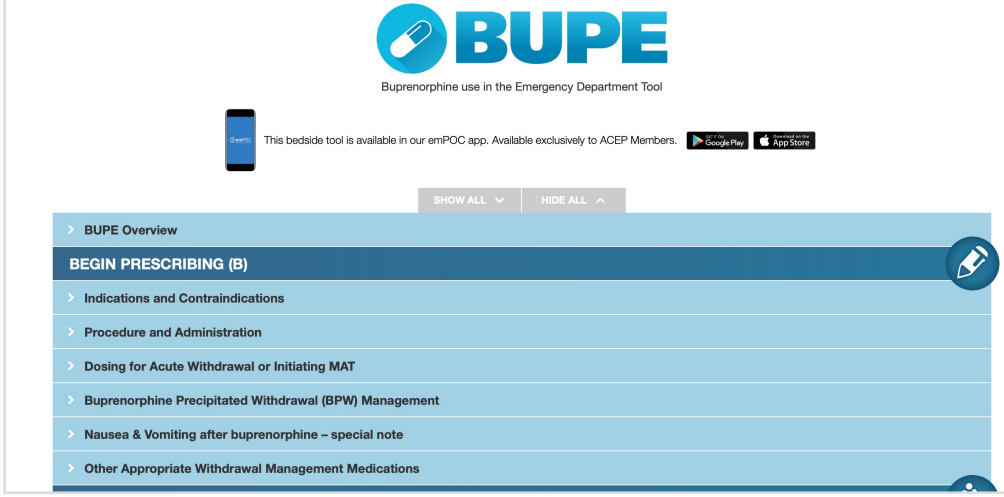
BUP Initiation App (available in apple store and google)

Funded by NIDA



APPLE: https://apps.apple.com/us/app/bup-initiation/id1574350314

GOOGLE: https://play.google.com/store/apps/details?id=com.amstonstudio.yaleembed



Specific populations

- Polysubstance abuse
  - OK to use; risk-benefit in favor of initiating buprenorphine
- Admissions from ED for other medical conditions
  - buprenorphine can control their withdrawal symptoms; making them more likely to accept admission and treatment
- Pregnancy
  - safe for both mom and baby; controls risk of OD/complications from OUD (street fentanyl!)
  - Neonatal Opioid Withdrawal Syndrome (NOWS) in infants with buprenorphine less severe than with methadone
  - buprenorphine-naloxone safe
- Adolescents
  - “If you’re old enough to have an OUD, you’re old enough to be given buprenorphine”

Advanced topics:
patient not in withdrawal

- not in withdrawal or still intoxicated?
  - "warm handoff" and refer for outpatient induction
    - last use before initiation:
      - oxycodone, hydrocodone, heroin (short-acting opioids): 8-12 hrs (the night before)
      - OxyContin, MS-Contin (extended-release opioids): 24hrs
      - methadone: get further support! (>48-72hrs)
  - consider patient-initiated home induction and discharge Rx

A Guide for Patients Beginning Buprenorphine Treatment at Home

Before you begin you want to feel very sick from your withdrawal symptoms

It should be at least . . .

- **12 hours** since you used heroin/fentanyl
- **12 hours** since snorted pain pills (Oxycontin)
- **16 hours** since you swallowed pain pills
- **48-72 hours** since you used methadone

You should feel at least three of these symptoms . . .

- Restlessness
- Heavy yawning
- Enlarged pupils
- Runny nose
- Body aches
- Tremors/twitching
- Chills or sweating
- Anxious or irritable
- Goose pimples
- Stomach cramps, nausea, vomiting or diarrhea

Once you are ready, follow these instructions to start the medication

DAY 1:
8-12mg of buprenorphine

Most people feel better the first day after 8-12mg. (Dosing depends on how early on the first day you started)

Step 1.

Take the first dose	Wait 45 minutes
	

- Put the tablet or strip under your tongue
- Keep it there until fully dissolved (about 15 min.)
- Do NOT eat or drink at this time
- Do NOT swallow the medicine

Step 2.

Still feel sick? Take next dose	Wait 6 hours
	

Most people feel better after two doses = 8mg

Step 3.

Still uncomfortable? Take last dose	Stop
	

- Stop after this dose
- Do not exceed 12mg on Day 1

DAY 2:
16mg of buprenorphine

Take one 16mg dose

Most people feel better with a 16mg dose

Repeat this dose until your next follow-up appointment

If you develop worsening symptoms while starting buprenorphine before your scheduled outpatient appointment return to the emergency department

Advanced topics - acute pain

- Acute painful conditions (i.e. trauma/fractures, burns)
  - early pain management consultation if available
  - non-opioid options
    - Ofirmev (IV acetaminophen)
    - ketorolac, other NSAIDs
    - ketamine
    - regional anesthesia/nerve blocks
    - lidoderm
    - other
  - opioid options (in order)
    - more frequent buprenorphine dosing (BID -> TID or QID)
    - increased buprenorphine dosing
    - overcoming blockade with fentanyl, etc.

What about “microdosing”?

- Should NOT be considered as an ED management strategy
- in general, NOT the right way to go
  - in the street fentanyl era - street doses are NOT consistent - every additional use is risking their life
  - risk of accidental OD with continued drug use, or unexpected buprenorphine-precipitated withdrawal
- Possible appropriate settings
  - specific, rare cases as determined by experienced outpatient clinicians (but see: street fentanyl risk, above)
  - inpatient buprenorphine induction for admitted patients with concurrent opioid intoxication (managed by inpatient pain management service) (controlled environment)

What if the patient declines/refuses buprenorphine?

- Non-agonist treatments
  - clonidine
  - anti-emetics (odansetron/promethazine)
  - loperamide
  - ibuprofen/acetaminophen (screen for liver, GI, renal issues)
  - consider gabapentin
  - consider benzodiazepines (lorazepam, diazepam)
- Discharging a patient in active opioid withdrawal is a risk
  - may consider:
    - agonist therapy for harm reduction, i.e. morphine IM/PO, etc.
    - for methadone withdrawal: suppression dose (for jail, long weekend, etc.): 20mg PO or 10mg IM

What's next?

- Prehospital/ED buprenorphine induction in conjunction with naloxone-precipitated withdrawal
  - buprenorphine has a higher mu-receptor affinity than heroin, oxycodone, or naloxone
  - not ready for prime time, but one EMS protocol has had successful initiations using protocol doses of 16-24mg
- buprenorphine in acute opioid overdose?
  - maybe someday used medically instead of naloxone!
- ED-initiation using injectable, long-acting buprenorphine
  - currently being studied
  - potentially in the future, a single ED-initiated injection may give 7-day buprenorphine "protection"
  - 30-day injectable version (Sublocade) currently available
- ED involvement in "bridge clinics"

Words Matter

Words are powerful... They can contribute to stigma and create barriers to accessing effective treatment

Use person-first language; focus on the person, not the disorder

When Discussing Opioid or Other Substance Use Disorders...

Avoid These Terms:	Use These Instead:
Addict, user, drug abuser, junkie	Person with opioid use disorder or person with opioid addiction, patient
Addicted baby	Baby born with neonatal abstinence syndrome
Opioid abuse or opioid dependence	Opioid use disorder
Problem	Disease
Habit	Drug addiction
Clean or dirty urine test	Negative or positive urine drug test
Opioid substitution or replacement therapy	Opioid agonist treatment
Relapse	Return to use
Treatment failure	Treatment attempt
Being clean	Being in remission or recovery