## Approaches to Treatment and Recovery: Case Study with Integrated Opioid Therapy

Adam Seidner MD, MPH; Dwight Ligham MD



Occupational and Environmental Health Network
University of Connecticut Health Center, Division of Occupational &
Environmental Medicine
Evidence Considerations

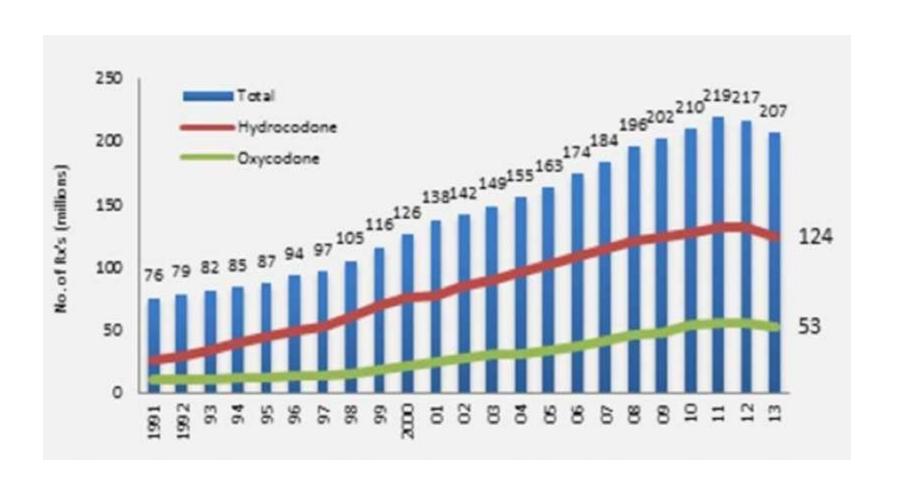
CT DPH Injured Workers and Opioid Use Symposium 03/01/17





# Opioid Prescribing Trends NIDA 05/14/14

https://www.drugabuse.gov/about-nida/legislative-activities/testimony-to-congress/2016/americas-addiction-to-opioids-heroin-prescription-drug-abuse



# Opioid Pain Reliever (OPR) Prescription Observations

- ↑ Likely to receive OPR
  - Depression & mental health disorders 3-4x↑
  - Alcohol abuse 4-5x ↑
  - Opioid abuse 5-10x↑ Sullivan Clin J Pain 2010
- ↑ Likely receive high dose OPR and sedatives
  - Substance abuse and mental health disorders
     Richardson J Adolesc Health 2012, Seal JAMA 2012
- Suboptimal care for non-surgical patients on longer term OPR wcri 2014

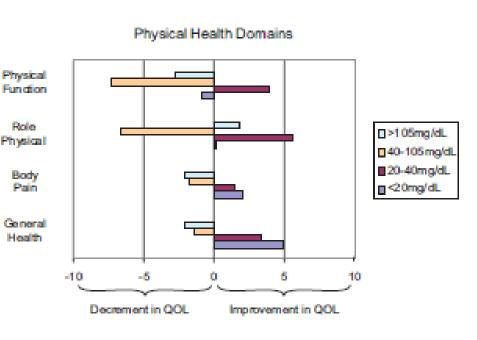
## Longer Term Use of Opioids wcri 2014

| Use of Services Non-Surgical WC Claims with Longer-Term |
|---|
| Opioids 2010-2012                                       |

|                 | 25 State      | Range         | CT  |
|-----------------|---------------|---------------|-----|
|                 | Median        |               |     |
| % UDT           |               |               |     |
|                 | 25%           | 6-42%         | 25% |
| % psych evalu   | ations        |               |     |
|                 | 5%            | 2-32%         | 3%  |
| % psych treat   | ment/reports  |               |     |
|                 | 4%            | 1-14%         | 3%  |
| % active physic | ical medicine |               |     |
|                 | 88%           | <b>75-96%</b> | 88% |

# **Opioid Efficacy**

- Evidence of short term efficacy for opioids for acute pain
- Less clear efficacy for chronic noncancer pain
  - Lower MME ↑ likely to benefit?



Dillie JAmBFM 2008

# Opioid Efficacy For LBP

- Longer term opioid prescription
  - Lack of significant benefit for the majority, but some do benefit
    - 26% significant pain reduction
    - 16% significant functional improvement
    - Franklin Clin J Pain 2009
  - Option if quantified significant benefit, lack of significant side effects / risks, compliant

## **Opioid Side Effects**

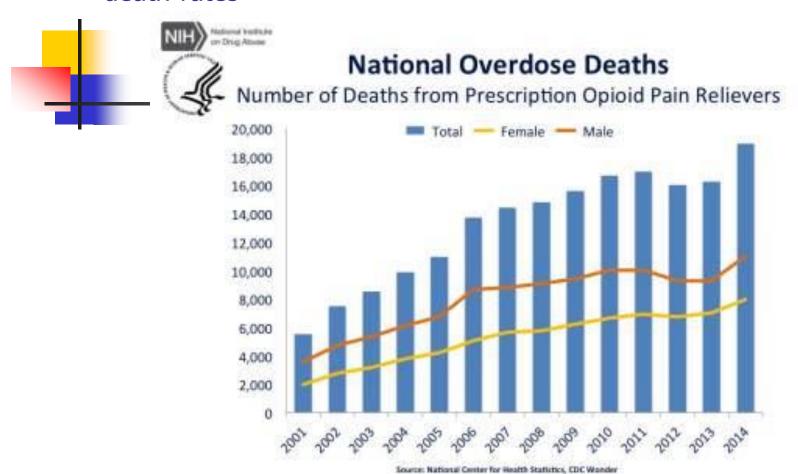
- Constipation 40-45%, Nausea 25%
- Cognitive, dizziness, falls (1-4.9x), MVA (1.6x)
- Mood alteration 38%
- Respiratory depression, sleep disordered breathing 10-75%
- Altered pain sensitivity, hyperalgesia
- Endocrine

- Tolerance (adaption, teffect), dependence (adaption, withdrawal), misuse (use not as prescribed) abuse (use for mood alteration), addiction (brain disease, craving, selfharm)
- >20% discontinue due to side effects in chronic settings
- Baldini Prim Care Companion CNS Disord. 2012

# Opioid Misuse, Aberrant, Abuse, Addiction

- Est 5 million misuse opioids
  - 76% obtain from family, friends
- Patients on chronic opioid therapy
  - Est up to 37% aberrant use MMWR 3/15/16
  - Est up to 14% substance abuse / addiction MMWR 3/15/16
- SAMSHA 2011, Michna Clin J Pain 2007, Vowles Pain 2015

http://www.drugabuse.gov/related-topics/trends-statistics/overdose-death-rates

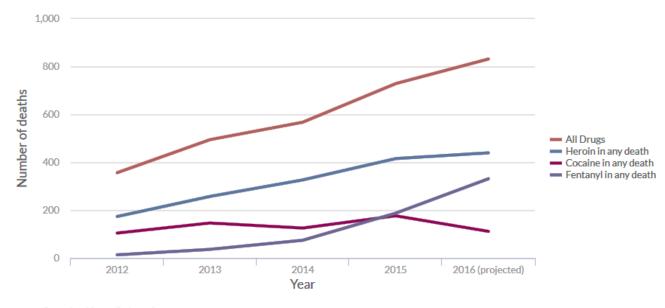


18,893 opioids overdose deaths in 2014 MMWR 12/18/15
Benzos in 31% overdose deaths in 2011 Jones AmJPrevMed 2015
Benzo + Opioid prescription 10x overdose NC 2010 study Dasgupta PainMed 2015

### Overdose Deaths Among CT Residents

#### Trendct.org

#### Connecticut Overdose Deaths by Drug, 2012-2016



Source: Office of the Chief Medical Examiner

## Opioids and Overdose

Figure 2. Death Rate (Hazard Ratio) vs. Morphine Equivalent Dosage (mg/d)\*

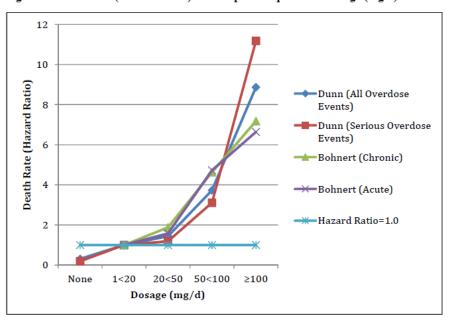
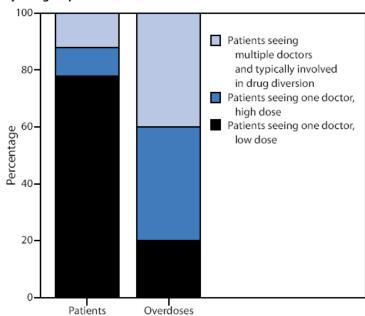


FIGURE 3. Percentage of patients and prescription drug overdoses, by risk group — United States

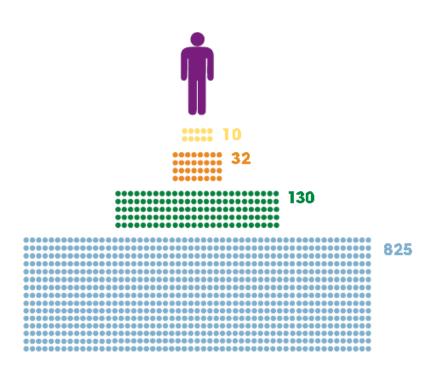


#### ACOEM Opioids Guide 2013

MMWR 01/13/12

 Other risks: PMH substance abuse, mental health disorder, multiple agents, comorbidities, after abstinence, male and age

# CDC Policy Impact Nov 2011



- For every 1 death there are
  - 10 treatment admissions for abuse
  - 32 ER visits for misuse
  - 130 people who abuse or are dependent
  - 825 non-medical users

# Safer Prescribing Considerations

- Exhaust alternative treatments
- Unresponsive moderate to severe pain
- Discussion of goals, risks vs. benefits, storage / disposal, driving and work
- PMH medical, psych
- Screen risks of misuse, abuse, addiction
- Monitor opioid agreement, PDMP, UDT
- Document pain and function with validated tools
- Lowest reasonable dose, duration
- Caution methadone for pain, benzos, hypnotics, barbs