Swinging of the opioid pendulum

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Chronic Pain

- Chronic pain affects 116 million American adults
- Pain costs $635 billion/year in medical treatment and lost productivity

IOM. The National Academies Press, Washington DC 2011
“Of all the remedies it has pleased almighty God to give man to relieve his suffering, none is so universal and so efficacious as opium”

Thomas Sydenham
(1624-1689)
How it all started - 1986

- Series of 38 patients chronic non-cancer pain
- 66% < 20 MME/day
- 24 pts “acceptable” pain relief
- 14 pts “inadequate” pain relief
- No gains in employment/social functions
- No toxicity
- 2 pts- management “became a problem” (hx of addiction)

Portenoy RK, Foley KM. Pain 1986;25:171-186
“...these papers represent a phenomenon akin to ‘breaking the sound barrier’. Our attitudes to narcotics are influenced by unfounded prejudice based on street addicts...”

Ronald Melzack - Psychologist
Presidential address, 5th World Congress of the IASP (1988)
As of this week, health-care organizations will have to have a pain management system in place in order to have certification by the Joint Commission on Accreditation of Healthcare Organizations, a

"The idea that people become addicted to their painkillers is just wrong," she said. "Few people are being given that type of drug, and even if they are, it is not at those levels."

Carole Patterson, Director, Standard Interpretation Group, JCAHO

In essence, this means that pain has become the fifth vital sign -- added to temperature, blood pressure, pulse and respiration -- that will be checked regularly.
“I couldn’t get through my day without it!”
Purdue and 3 executives plead guilty to federal charges that they “misled doctors and patients”. June 2007
Purdue - $600 million
Executives - $34.5 Millions
In 1998, the Federation of State Medical Boards released a recommended policy reassuring doctors that they wouldn’t face regulatory action for prescribing even large amounts of narcotics, as long as it was in the course of medical treatment. In 2004 the group called on state medical boards to make under treatment of pain punishable for the first time.

That policy was drawn up with the help of several people with links to opioid makers, including David Haddox, a senior Purdue Pharma [manufacturer of OxyContin] executive then and now. The federation said it received nearly $2 million from opioid makers since 1997.

A federation-published book outlining the opioid policy was funded by opioid makers including Purdue Pharma, Endo Health Solutions Inc. and others, with proceeds totaling $280,000 going to the federation.

The Joint Commission published a guide sponsored by Purdue Pharma. “Some clinicians have inaccurate and exaggerated concerns” about addiction, tolerance and risk of death”, the guide said. “This attitude prevails despite the fact there is no evidence that addiction is a significant issue when persons are given opioids for pain control.”
Before the current situation

- 1990-2001 - 56% increase death rate from poisoning
- 51% Narcotics and “psychodysleptics”
  - 50% “other Narcotics (codeine, morphine, etc)
  - 8% Heroin
  - 5% Benzodiazepines
  - 5% Methadone

MMWR, March 26, 2004;53(11)233-8
Rates of prescription painkiller sales, deaths and substance abuse treatment admissions (1999-2010)

Prescription Drug Overdoses — a U.S. Epidemic


* Per 100,000 population.
FIGURE 2. Number of unintentional drug overdose deaths involving opioid analgesics, cocaine, and heroin — United States, 1999–2007

Multiple Drugs

Is the opioid/narcotic epidemic responsible for the heroin epidemic?
At first sight...

Cicero TJ et al. JAMA Psychiatry. 2015;72(5):424-429
Illicit Drug Use Disorder

- 2013 – 27 million individuals > age 12 (10%)
- 500,000 dependent/abused heroin
- Heroin abused increased (since 2002):
  - 138.9% in Non-medical users of opioids since 2002
  - 100% in Non-medical users stimulants/tranquilizers/sedatives
  - 87% in users of cocaine
  - 57% in binge drinkers
  - 45% in marijuana users

MMWR 2015;314:1468-78
Non-medical users of opioids

- 3.6% initiated heroin use within 5 years of starting opioids
  Muhuri et al CBHSQ Data Review 2013

- 4.2% initiated heroin within the prior year (2011-13)
  Jones CM. Drug Alcohol Depend 2013;132:95-100
Figure 2. Past year initiation of heroin among individuals aged 12 or older, by age group: 2002 to 2013

![Graph showing past year initiation of heroin among individuals aged 12 or older by age group: 2002 to 2013.]

*Difference between this estimate and the 2013 estimate is statistically significant at the .05 level.
Source: SAMHSA, CBHSQ, National Surveys on Drug Use and Health (NSDUHs), 2002 to 2005, 2006 to 2010 (revised March 2012), and 2011 to 2013.

Figure 4. Past year heroin use among individuals aged 12 or older, by age group: 2002 to 2013

![Graph showing past year heroin use among individuals aged 12 or older by age group: 2002 to 2013.]

*Difference between this estimate and the 2013 estimate is statistically significant at the .05 level.
Source: SAMHSA, CBHSQ, National Surveys on Drug Use and Health (NSDUHs), 2002 to 2005, 2006 to 2010 (revised March 2012), and 2011 to 2013.
Figure 2. Nonmedical Use of Prescription Opioids and Heroin during the Previous Year among Noninstitutionalized Persons 12 Years of Age or Older, 2002–2014.

Data are from the Center for Behavioral Health Statistics and Quality.²
Heroin Abuse & Deaths

FIGURE 2. Rates of past-year heroin abuse or dependence* and heroin-related overdose deaths — United States, 2002–2013

* Past-year heroin abuse or dependence is based on diagnostic criteria contained in the Diagnostic and Statistical Manual of Mental Disorders, 4th Edition.

MMWR, July 10, 2015;64(26):719-25
Decrease in non-medical use of pain relievers

Figure 6. Past Month Nonmedical Use of Pain Relievers among People Aged 12 or Older, by Age Group: Percentages, 2002-2014

+ Difference between this estimate and the 2014 estimate is statistically significant at the .05 level.

2014 National Survey on Drug Use and Health, SAMHSA
In summary

- Yes, we have an opioid/narcotic epidemic
- Yes, we have a heroin epidemic
- No clear causality between one and the other
- Increase risk of death with elevated doses of opioids
- No clear data on what strategies have worked...
  - VPMS is a good idea – decreases doctor shopping
  - Screening aberrant behavior
  - Surveillance (F/U; pill counts; urine screens)
  - Education medical community (MD, NP, PAs)
Where have we failed...

- Addiction treatment
  - Illicit Substance abuser
  - Pts who become secondary abusers

- Public education (TV, social media, radio...)
  - Dangers of opioids & heroin
  - Realistic expectations

- Sterotyping chronic pain patients
Painkillers, NFL's other big problem

Editor's note: A group of former players has filed suit against the NFL, alleging the league's clubs pushed them to use painkillers without disclosing the risks of addiction. The new book "The King of Sports: Football's Impact on America," by ESPN.com columnist Gregg Easterbrook, contains a lengthy section on painkillers and the NFL.

Anonymous Football Player Details Fear Of Health Risks In 'NFL Confidential'

Updated January 10, 2016 · 3:52 PM ET
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Thank you
Harms from opioids

- Risk of overdose (adjusted hazard ratio)
  - Any OD event: HR 5.2 (CI, 2.1 to 12.5)
  - Serious OD event: HR 8.4 (CI, 2.5 to 28)

- Risk related to doses:
  - MED 1 – 19 mg/d: 1 (reference)
  - MED 20-49 mg/d: HR 1.44 (CI, 0.57 to 3.62)
  - MED > 100 mg/d: HR 8.87 (CI, 3.99 to 19.72)