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Opioid Stewardship and Managing the Opioid Crisis: A Health-Care Perspective

Acute Pain Management

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Dr. Stulberg has disclosed that there is no actual or potential conflict of interest in regards to this presentation

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I do not speak on behalf of any of the above funding agencies. The ideas presented herein are my own. The content of this presentation promotes quality improvements in healthcare and does not promote a specific business or commercial interest.

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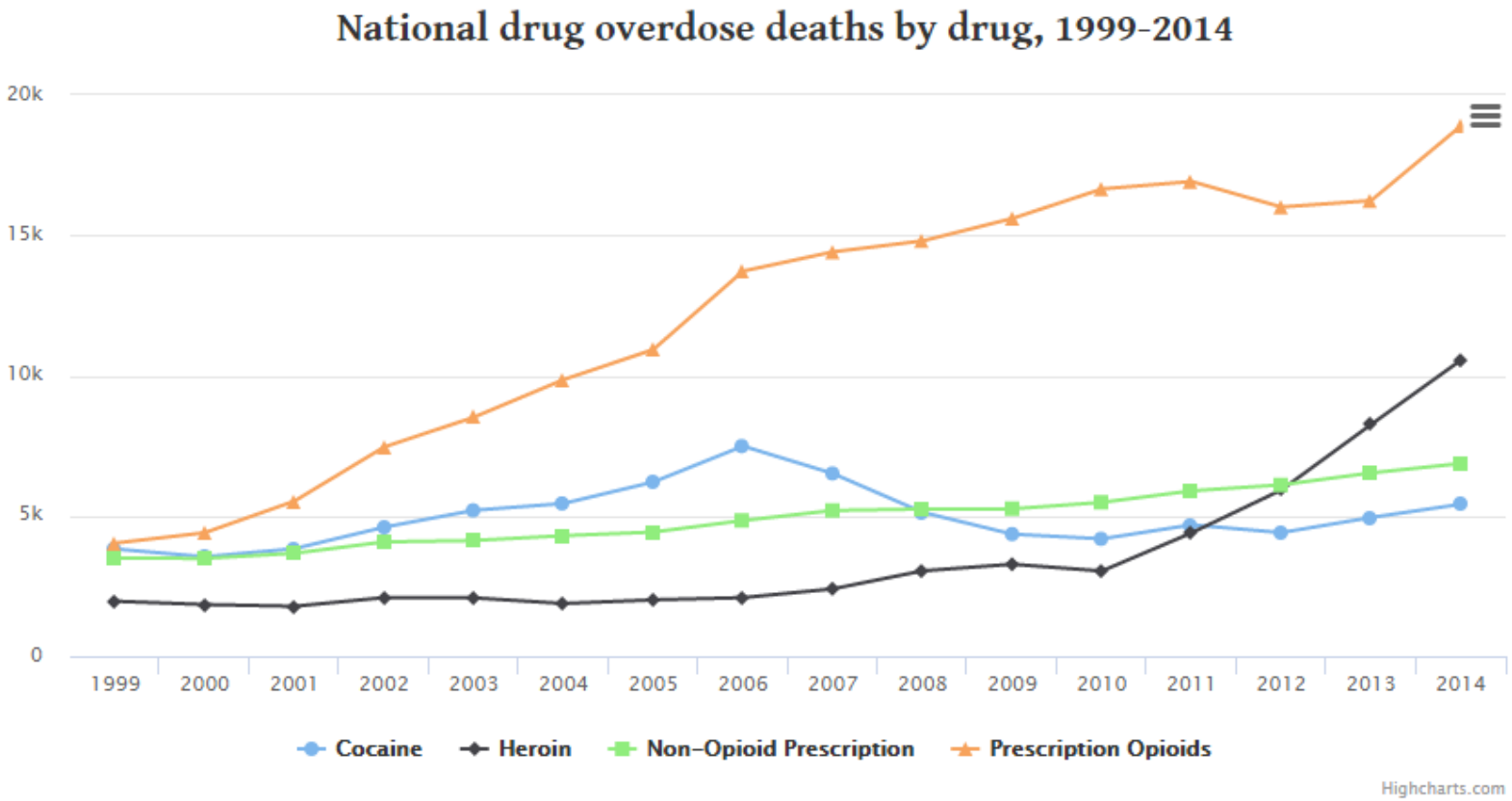
Prescription Opioid Deaths on the Rise



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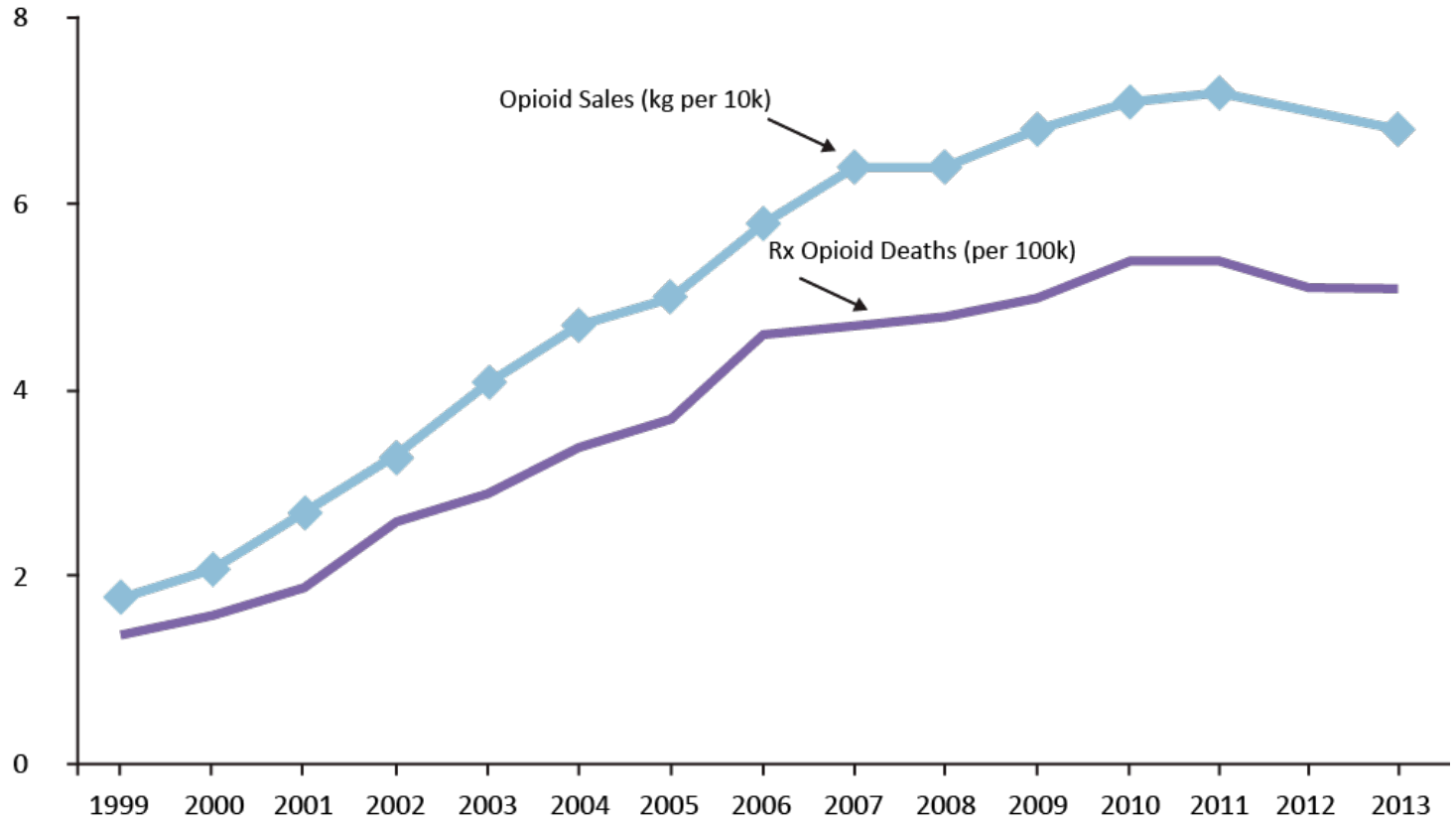
Rise in Prescription Opioids Mimics the Increase in Opioid Related Deaths



National Vital Statistics System, DEA's Automation of Reports and Consolidated Orders System

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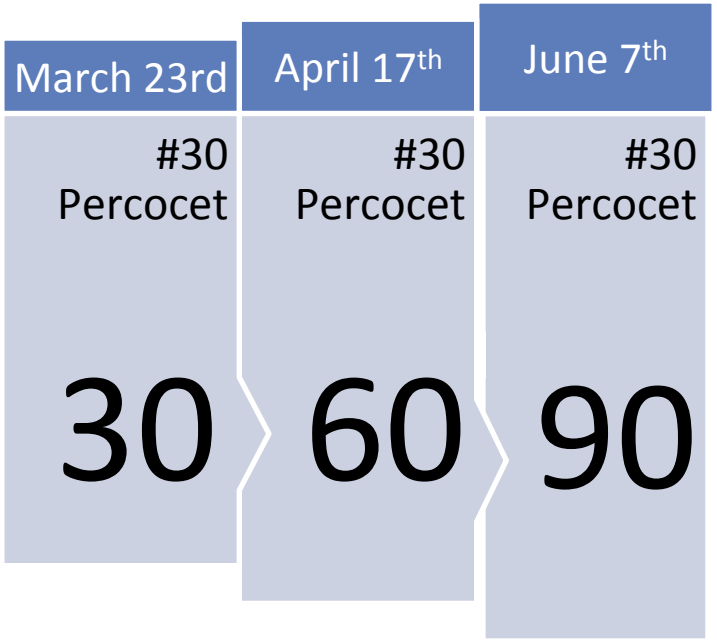
CDC Division of Unintentional Injury Prevention

One Patient Experience

- Thumb surgery
- Dental Procedure
- Toe Procedure

- 10%
- Diversion



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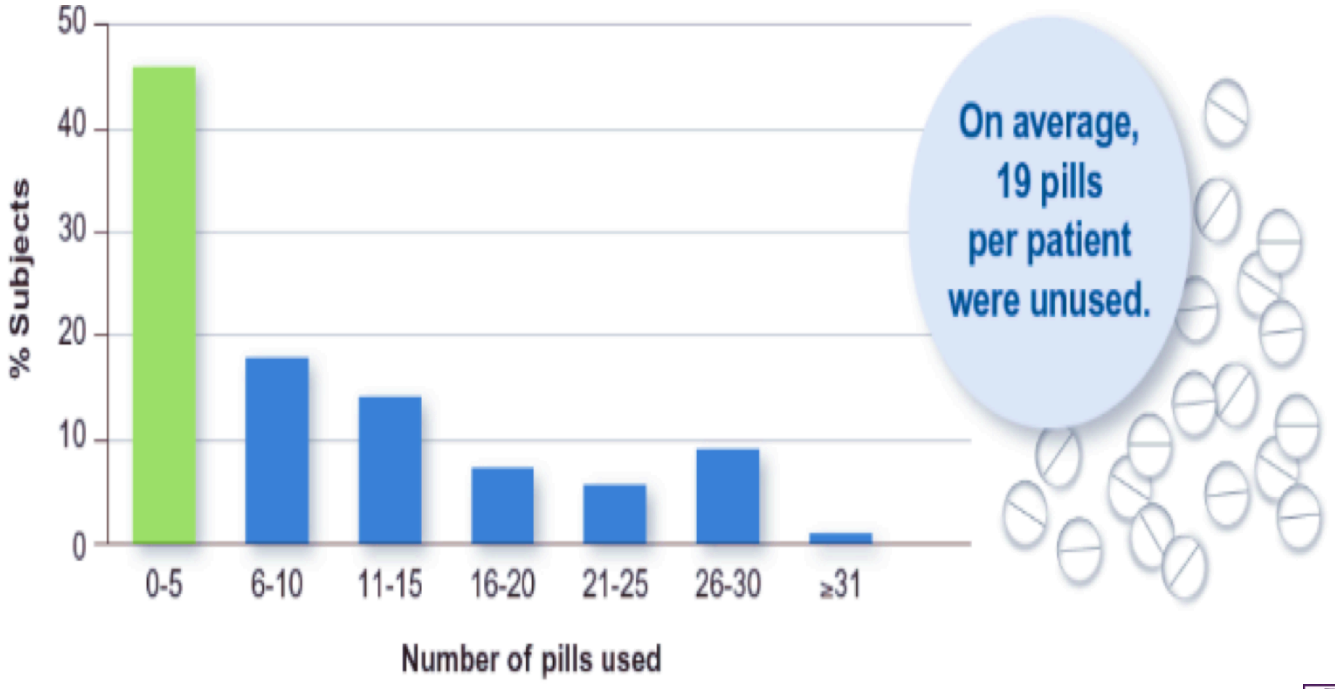
Over Prescribing

Patients prescribed opioids after outpatient orthopedic surgery. Almost half of patients used less than 5 pills from the average of 30 dispensed[1].



Rogers. J Hand Surg Am. 2012

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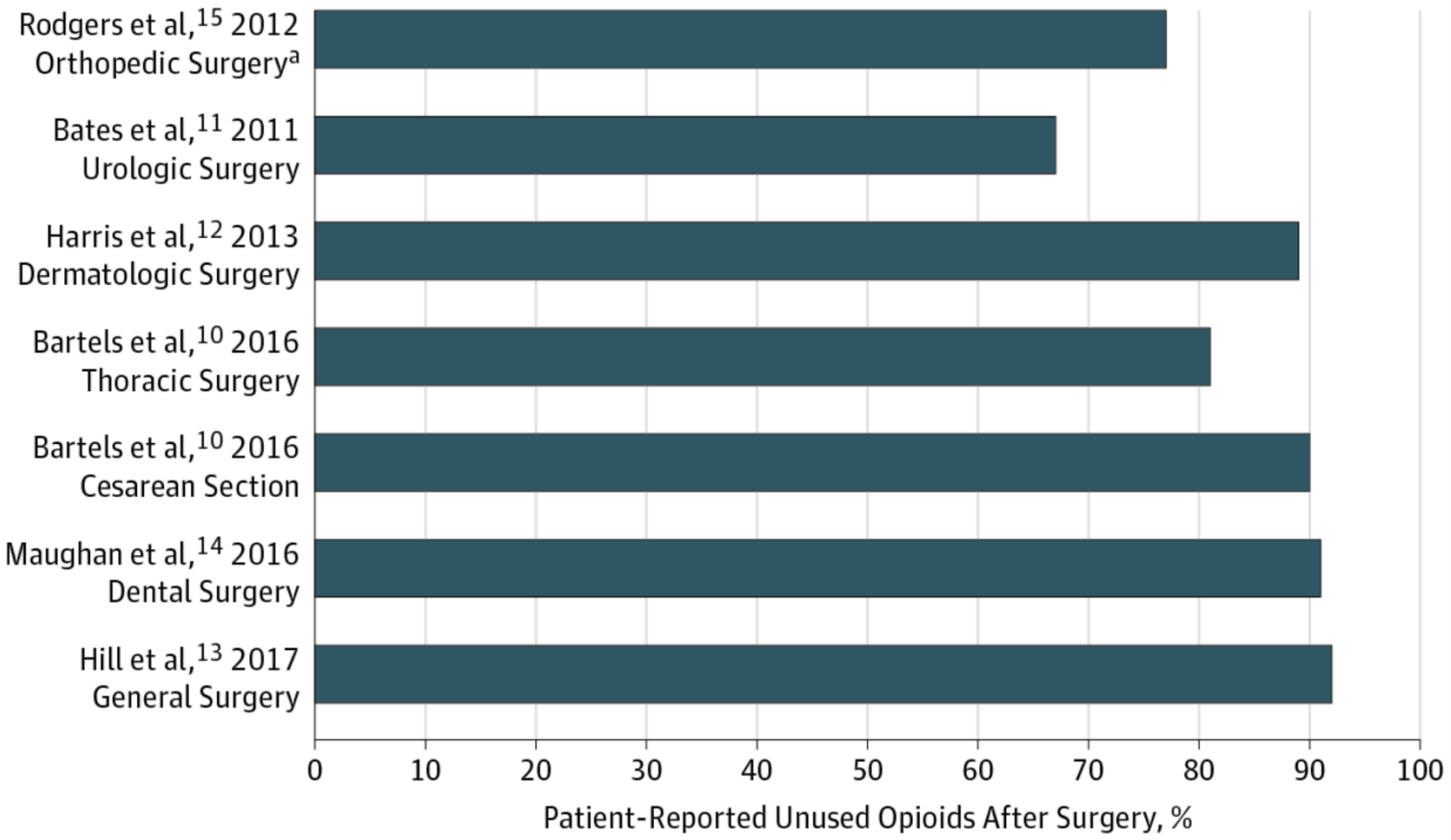
Prevalence of Unused Opioids Prescribed After Surgery



Bicket, *et al.* JAMA Surg. 2017

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Appropriate Disposal

Very Few Patients Appropriately Dispose of Unused Opioids

Table 3. Storage and Disposal Characteristics for Unused Opioids After Surgery

Study	Patients Reporting, No. (%)					
	Storage			Disposal		
	Locked or Unlocked Location		Unlocked Storage	Performed or Planned	FDA-Recommended Method Used	No Disposal Instructions
Bartels et al,[10] 2016[a]	6/23 (26)	Cupboard/wardrobe	17/22 (77)	1/23 (4)	1/23 (4)	NR
	16/23 (70)	Medicine cabinet/other box				
Bartels et al,[10] 2016[a]	5/24 (21)	Cupboard/wardrobe	16/22 (73)	2/24 (8)	1/24 (4)	NR
	13/24 (54)	Medicine cabinet/other box				
Bates et al,[11] 2011	NR	NR	NR	15/164 (9)	5/164 (3)	213/231 (92)
Harris et al,[12] 2013	NR	NR	NR	9/49 (18)	2/49 (4)	NR
Hill et al,[13] 2017	NR	NR	NR	NR (26)	NR (9)	NR
Maughan et al,[14] 2016	NR	NR	NR	8/27 (30)[b]	NR	NR

Abbreviation: FDA, Food and Drug Administration; NR, data or descriptive text not reported.

[a] Bartels et al report on 2 distinct surgical populations—cesarean delivery and thoracic surgery.

[b] Based on control group.

Bicket, *et al.* JAMA Surg. 2017

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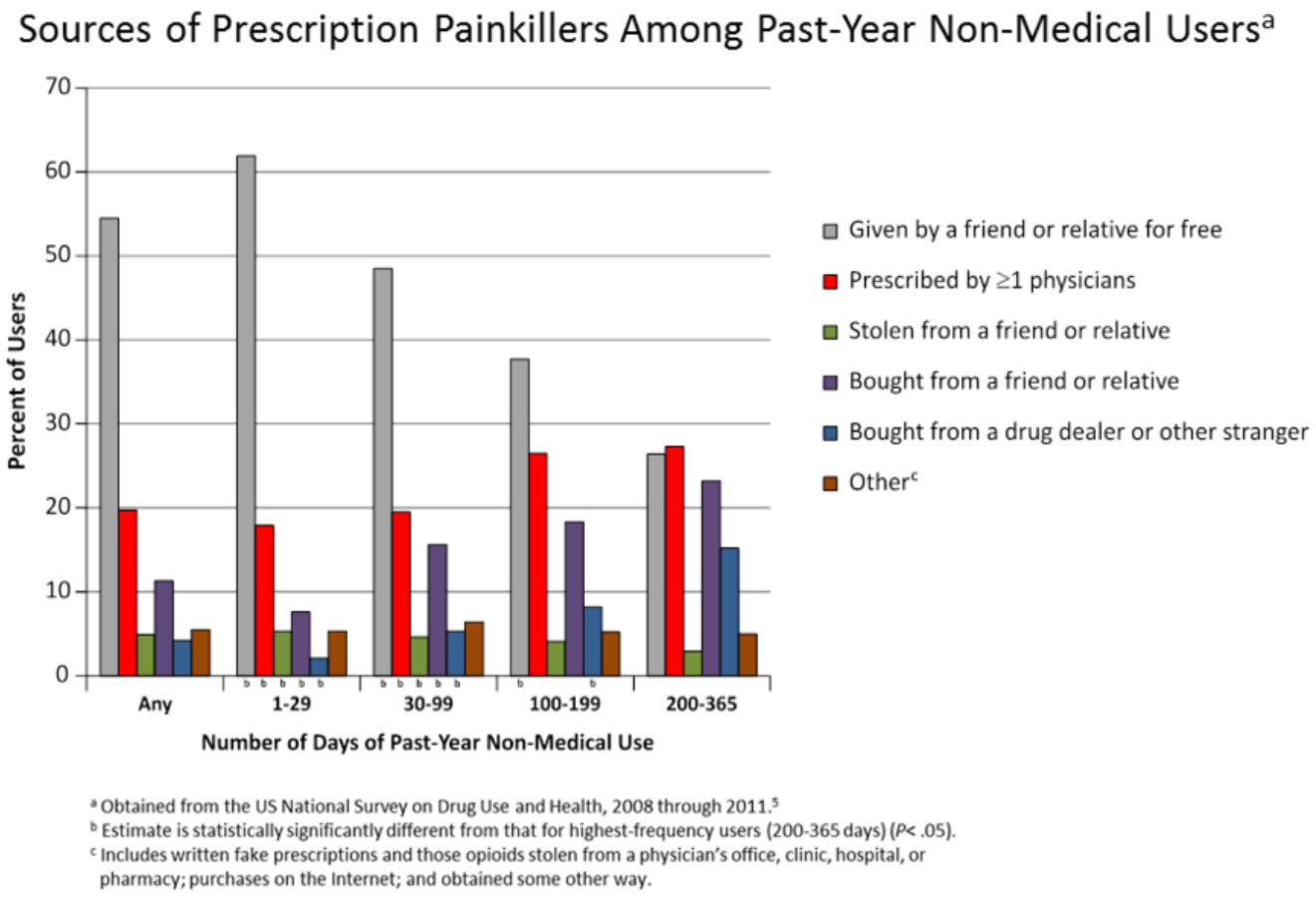
Diversion



Jones, Paulozzi, et al. JAMA Int Med 2014

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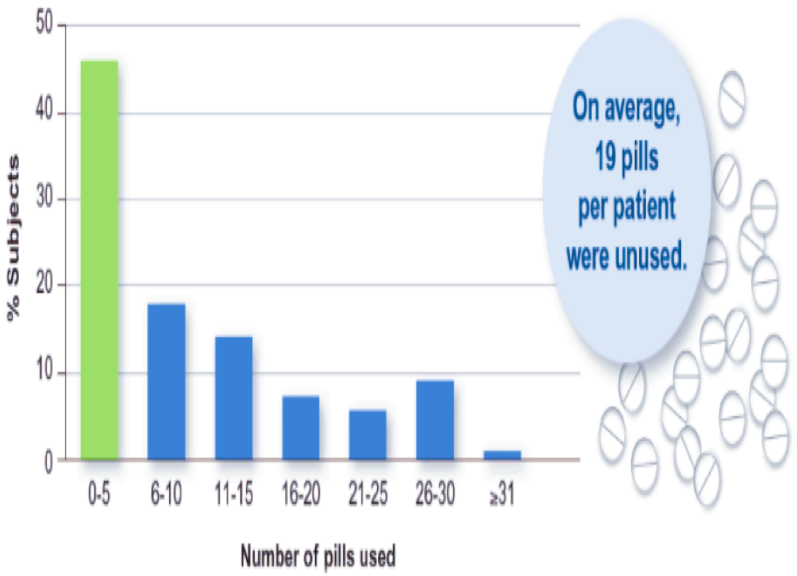
Over Prescribing Can Lead to Diversion

Excess pills are a readily available source for non-medical use

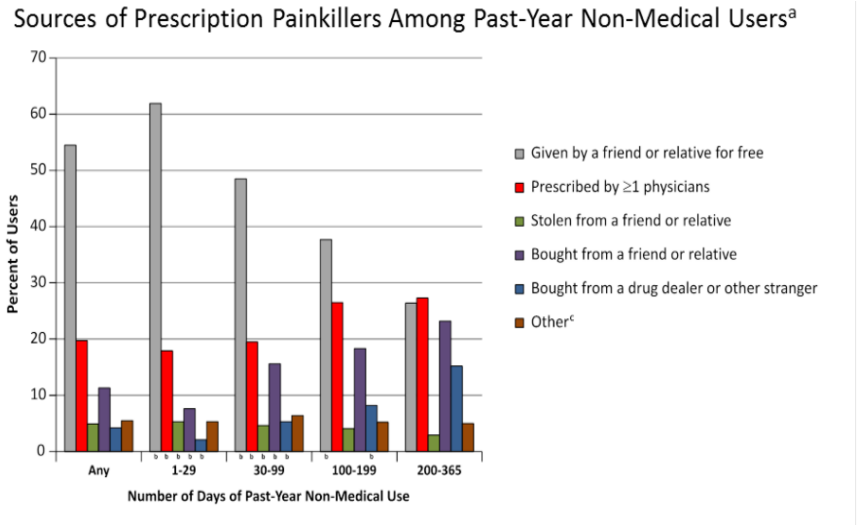
Surgeons Tend to Overprescribe

- >50% of pts use ≤5 pills
- Average Prescription = 30 pills



Diversion is Common

- Diversion = >70% of Non-Medical Use
- Diversion is non-medical use of legally prescribed prescription medication



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40%

Of all opioid overdose deaths in the U.S. in 2016 involved a prescription opioid

Source: Centers for Disease Control and Prevention

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Heroin Addiction Starts with Prescription Addiction

We need more responsible prescribing practices

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Minimizing Opioid Prescribing in Surgery

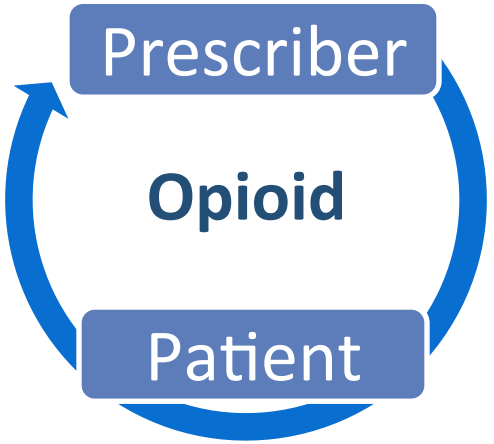
(MOPiS)

Expectation Setting

Risk Screen

Optimize Function

Monitor and Improve



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A Comprehensive Solution

Preoperative

Screen and Prepare

1 – Abuse Risk Analysis

2 – Opioid Education

- Risks/Benefits
- Storage
- Disposal

3 – Pain Expectation setting

Perioperative

While Inpatient (ERAS¥)

Upon Discharge (MOPiS£)

1 – Prescribing Opioid Alternatives

2 – PMP Look-up

3 – Safe Handling

4 – Prescribing Minimization

Postoperative

Provide Safe Retrieval Option

1. Retrieve
2. Educate

¥ - ERAS (Enhanced Recovery After Surgery)
£ - MOPiS (Minimizing Opioid Prescribing in Surgery)

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Opioid Stewardship Toolkit

- Targeted to Surgical Departments
- Overview of current statistics
- Strategies for improvement
- Materials to support implementation
- PowerPoint templates to generate support
- Patient handouts

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Minimizing Opioid Prescribing in Surgery

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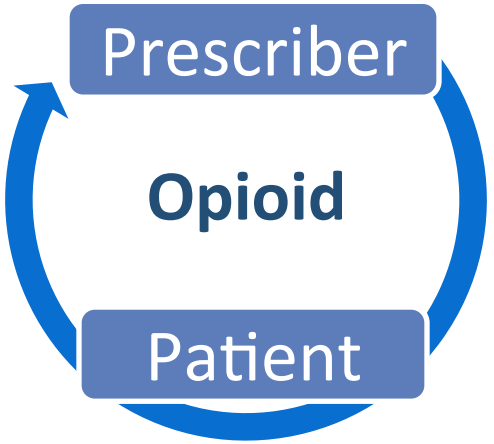

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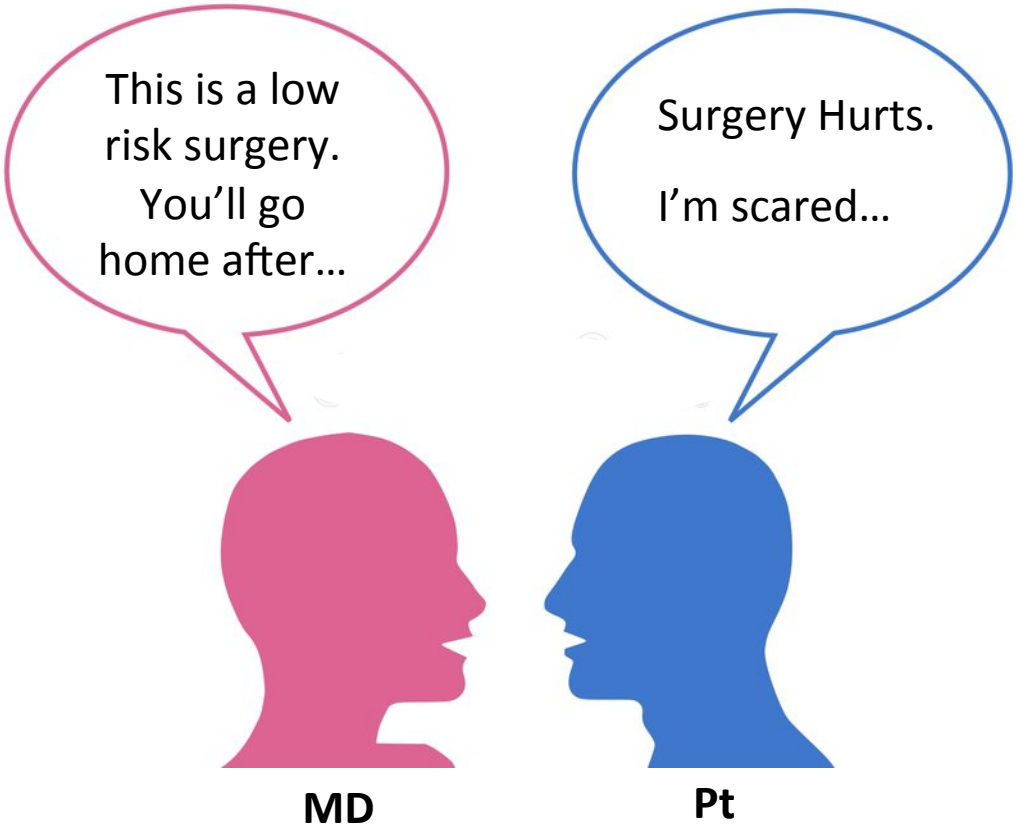
Expectation Setting



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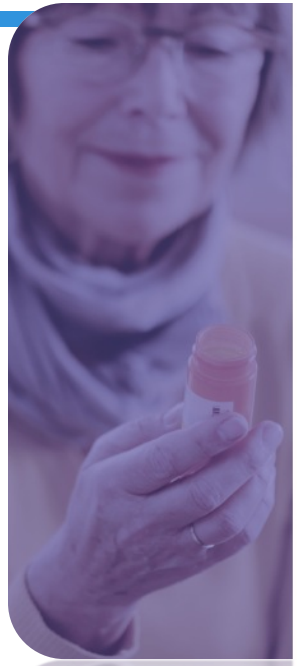
Setting Appropriate Expectations for Postoperative Pain: Best Practices

1. Surgery is painful, but current pain management techniques are very good and the pain is temporary. It is normal for patients to be very worried about pain after surgery. It is important to focus on the knowledge that the pain will improve in a few days and that we can usually manage post-operative pain very well.
2. The goal of controlling pain is to restore function. It is important for patients not to focus on getting their pain score down to zero. Instead, the goal of pain control is to allow for restoration of function. Providers must work with patients to achieve safe pain relief that allows patients to actively participate in their recovery (e.g., physical therapy).
3. Two way communication between patients in providers is essential. Pain control expectations, patient participation, and surgical outcome are linked together. Poor communication and treatment of pain can impair physiologic function, psychological well-being, and quality of life. It is important to stress that patients take an active role in their recovery and work through expected pain to achieve the best possible outcome.
4. Patients should be open to opioid adjuncts. The perioperative team may suggest medications (e.g., gabapentin) or procedures (e.g., nerve blocks) the patient may not be familiar with. The surgical team can reinforce that keeping an open mind about adjunct treatments could improve pain.
5. Pain management expectations do not end at hospital discharge. Recovery can take weeks or even months, and the patient's baseline pain may be altered during that time period. Surgery is not a quick fix; it takes dedication and work on the patient and provider sides.
6. Limiting preoperative opioids is in the best interest of the patient. By limiting opioids preoperatively, there is greater ability to safely increase dosage to address acute postoperative pain. If your patient is on chronic opioids, consider working with their primary care doctor or pain management doctor to limit their current regimen prior to surgery.

Adapted from:
University of Michigan Health System. Perioperative Pain Management: Setting Appropriate Expectations. https://anes-conf.med.umich.edu/opioidtaper/docs/setting_expectations.pdf.

Patient Education Tools and Handout



Know your options and BE SAFE!

1. Follow instructions carefully.
2. Talk to your prescriber about non-opioid treatment options.
3. Keep track of when you take your medication.
4. Ask your physician before adjusting your doses.

If you have further questions, do not hesitate to ask your physician. Opioids can be a beneficial and effective treatment for pain when they are taken correctly and safely.

Resources

Massachusetts Hospital Association Substance Use Disorder Prevention and Treatment Task Force
mhalink.org/Content/NavigationMenu/Newsroom/SubstanceAbuse/default.htm

The Resource Center of The Alliance of State Pain Initiatives
trcwisc.edu/videoguide/Fears_Inserts/fear_Insert.pdf

Trust for America's Health and the RobertWood Johnson Foundation. "The Facts Hurt: A State-By-State Injury Prevention Policy Report." June 2015.
healthyamericans.org/reports/injuryprevention15

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Prescription Opioids

Learning About the Risks and Benefits

Northwestern Medicine Digestive Health Center

What is an opioid?
Opioids act on the nervous system to relieve pain. They come in tablets, capsules, liquid, or patches. The most common opioids are:

Oxycodone Hydrocodone Morphine

Other types of opioids include:

Methadone Buprenorphine Heroin

Narcotic pain relievers now cause or contribute to nearly

3 OUT OF 4

prescription drug overdoses and about

15,500 DEATHS A YEAR

-Centers for Disease Control and Prevention

The problem
Opioids are powerful pain killers that are also highly addictive. Half of deaths due to drug overdose are related to prescription drugs, but death is rare when taken as prescribed by your physician. Most opioids used for non-medical purposes were originally prescribed by a physician.

Comfort and side effects
Comfort is very important, both for your well-being and to optimize your healing. After surgery, opioids may be necessary to help control your pain. It is important to carefully follow your physician's instructions about your opioid treatment.

Side effects are common but typically mild. Common side effects of opioids include:

Constipation– You may talk with your physician about taking stool softeners.

Nausea– This is a common side effect at the beginning of opioid therapy. It will usually resolve within a few days, but in the meantime, it can be treated with an over-the-counter anti-nausea medication.

Sleepiness/drowsiness– This may last for 3 to 5 days after starting opioid therapy.

Breathing problems– This resolves within hours of stopping opioids.

The risk of serious side effects increases if you are taking opioids and:

Consume alcohol.

You or a family member has a history of substance use disorder or overdoses.

You have a mental health condition, such as depression or anxiety.

You have sleep apnea.

You take more than the recommended prescribed amount.

What is the difference between dependence, tolerance and addiction?

Dependence
Opioid dependence is a change within the body that causes withdrawal symptoms, which makes it difficult to stop taking them. This typically only occurs after prolonged use.

Occurs after taking an opioid for several weeks

If you have been taking opioid medication regularly for several months or years, then the opioid medication should be tapered gradually when it is no longer needed, so that you do not experience withdrawal. Ask your prescriber about tapering plans.

Tolerance

Signaled by the need to take more drug to achieve the same pain-management effect.

To treat, your prescriber may subtly increase the dose or switch to a different opioid.

Addiction
Addiction occurs when dependence interferes with daily life.

Unlikely to develop in patients who take opioids for acute pain relief and follow their prescriber's instructions.

Signaled by continued use of an opioid despite harm (negative personal, legal or medical consequences), frequent intoxication, preoccupation with obtaining the drug, and poor function and quality of life while on the drug.

Protecting Your Family and Friends

Storage

To avoid misuse of opioids by others, store medication out-of-reach and in a locked cabinet or box (which can be purchased at your local pharmacy).

Keep prescription medications in the original bottle with the label attached and the child-resistant cap secured.

Always be aware of the location of your prescription medications.

Keep track of how many pills are in your bottle, so you are aware if any are missing.

Disposal

We now offer a safe drug take-back site within the Digestive Health Center. Please bring your unused medications with you to your postoperative appointment. For the safety of others and the environment, patients are encouraged to take advantage of safe drug take-back programs and safe-drop sites.

When these programs are not accessible, other secondary methods, including flushing the medication down the toilet, can be considered.

Check with your prescriber about safe disposal methods for your medication.

To find your nearest controlled substance public disposal location, visit the U.S. Department of Justice Drug Enforcement Administration's Diversion Control Division website at: https://apps.deadiversion.usdoj.gov/pubdispsearch/spring/main?execution=e1s1

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Minimizing Opioid Prescribing in Surgery

(MOPiS)

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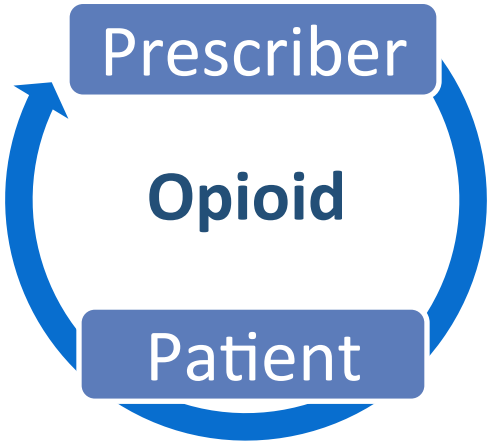

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Screening for High Risk

Brief intervention prior to OR Scheduling

- Provider Script for Risk Screening

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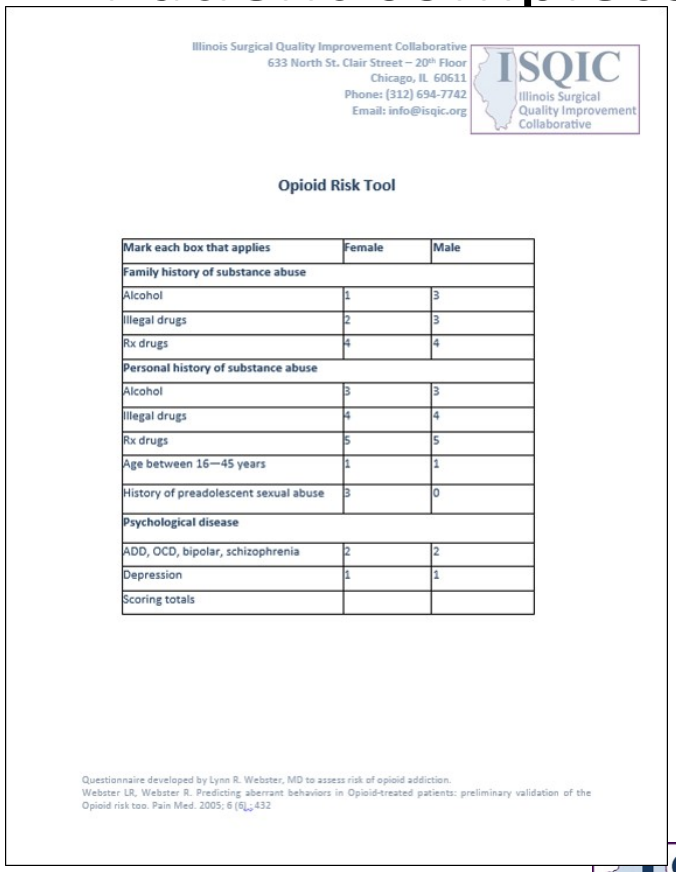
ISQIC Shortscreen

Providers should ask patients the following question:

"How many times in the past year have you used an illegal drug or used a prescription medication for non-medical reasons?"

If the patient responds with 1 or more times, they should be referred for formal screening using the 10-item Drug Abuse Screening Test (DAST). Formal screening may be conducted by providers such as social workers, psychologists, addiction counselors, and other providers identified by your institution.

- Patient completed



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Opioid Risk Tool

Mark each box that applies	Female	Male
Family history of substance abuse		
Alcohol	1	3
Illegal drugs	2	3
Rx drugs	4	4
Personal history of substance abuse		
Alcohol	3	3
Illegal drugs	4	4
Rx drugs	5	5
Age between 16—45 years	1	1
History of preadolescent sexual abuse	3	0
Psychological disease		
ADD, OCD, bipolar, schizophrenia	2	2
Depression	1	1
Scoring totals		

Questionnaire developed by Lynn R. Webster, MD to assess risk of opioid addiction.
Webster LR, Webster R. Predicting aberrant behaviors in Opioid-treated patients: preliminary validation of the Opioid risk too. Pain Med. 2005; 6 (6):432

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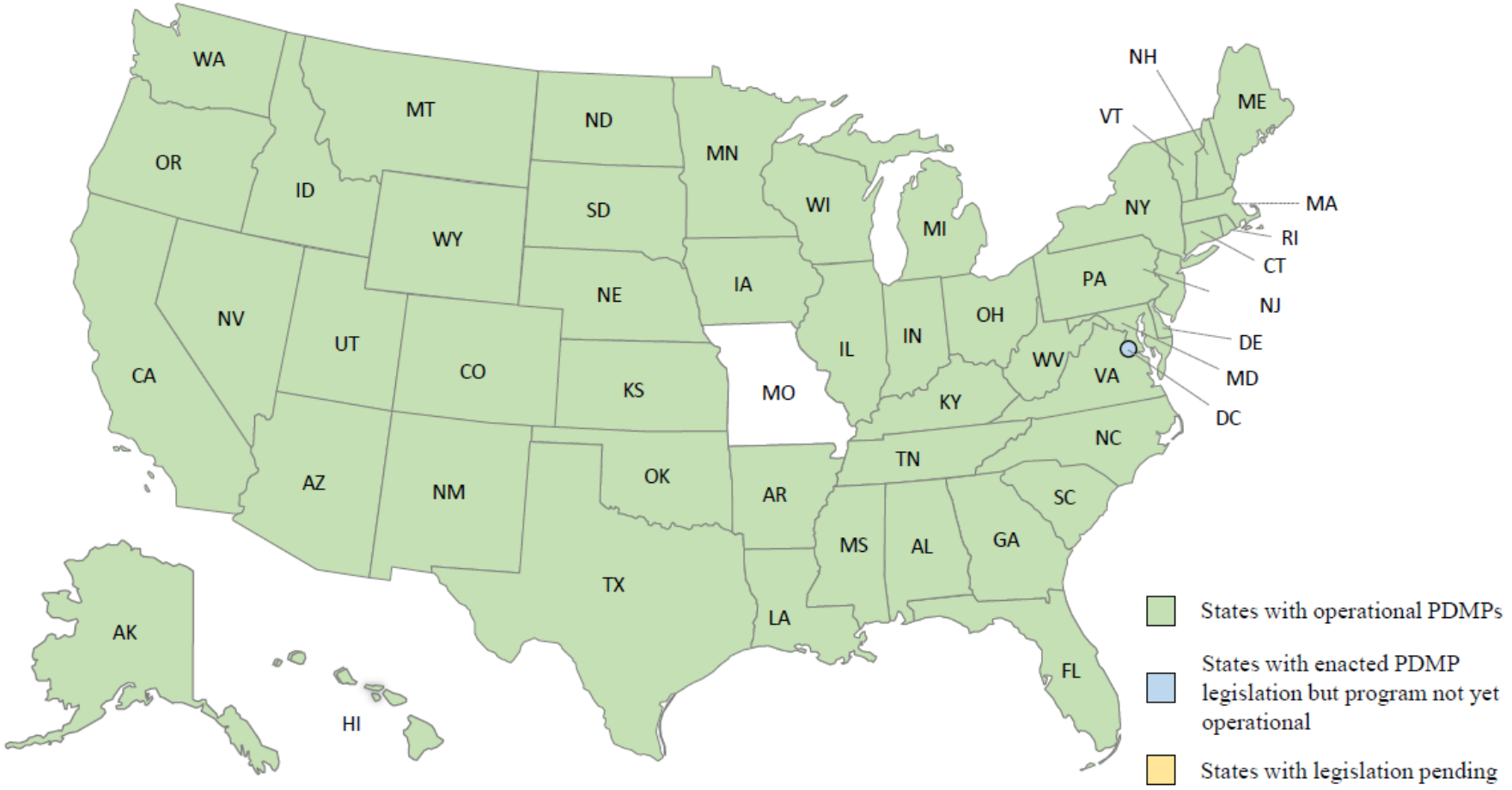
Status of Prescription Monitoring Programs



National Alliance for Model Drug State Drug Laws, 2016

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IL-PMP

- Government Program that collects information on controlled substance prescriptions
  - (schedule II, III, IV and V)

- This data is reported on a daily basis by retail pharmacies throughout Illinois
  - (1 million prescriptions/month)

- Gives prescribers access to patients' histories (opioid orders and re-fill activities), allowing for the supervision and monitoring

Data from www.ilpmp.org

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Screening using IL-PMP

Illinois law (720 ILCS 570/314.5)
Senate Bill 772

Statute Effective January 1, 2018

1) Prescribers must register with IL-PMP

(https://www.ilpmp.org/)

2) All new Schedule II prescriptions
   - PMP must be checked
   - Must document

3) PMP must be linked to EMR by 2021

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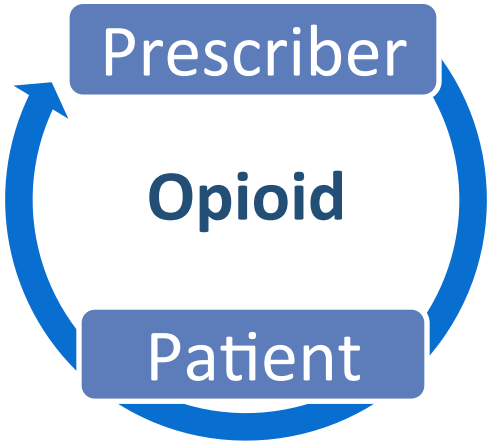

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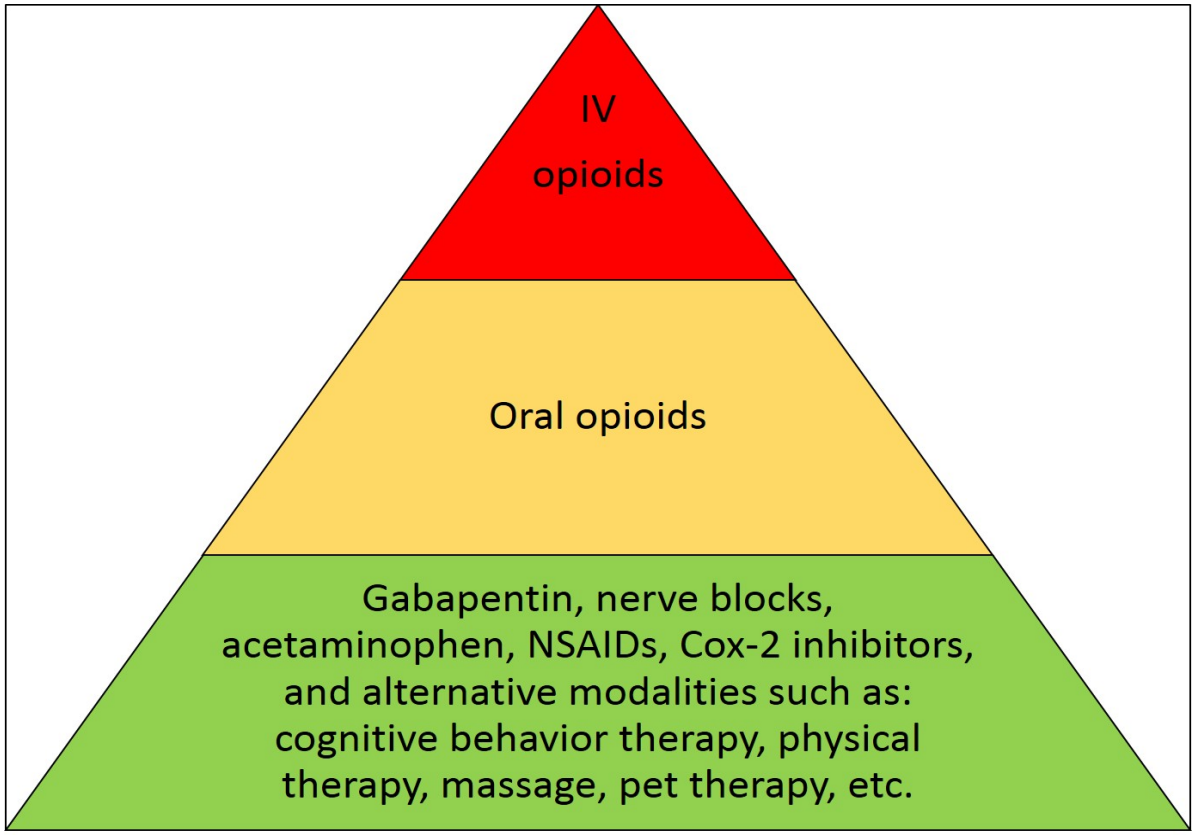
Rethink Pain Control



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Standardized Protocols

Optimizing Perioperative Practices: Non-Opioid Alternatives

Preoperative (3 hours before surgery)	•Acetaminophen (Tylenol) 1,000mg •Ibuprofen (Motrin) 600 mg •Gabapentin 300mg (optional)
Perioperative	• Infiltration of local anesthetic recommended prior to incision • Coordination with anesthesia recommended to minimize intra-operative opioid use
Post-operative (Days 1-3)	•Use cold pack on surgical site 20 minutes on, 20 minutes off •Acetaminophen (Tylenol) 1,000mg every 6 hours •Ibuprofen (Motrin) 600 mg every 6 hours •Gabapentin 300mg every 8 hours •Tramadol 50 mg every 6 hours, as needed •Oxycodone 5mg every 4 hours, as needed for breakthrough pain
Post-operative (Days 4-7)	• Use cold pack on surgical site 20 minutes on, 20 minutes off, as needed • Acetaminophen (Tylenol) 1,000mg every 6 hours, as needed • Ibuprofen (Motrin) 600 mg every 6 hours, as needed • Gabapentin 300mg every 8 hours • Tramadol 50 mg every 6 hours, as needed
Post-operative (Days 8-14)	• Gabapentin 300mg every 8 hours • Acetaminophen (Tylenol) 1,000mg every 6 hours, as needed • Ibuprofen (Motrin) 600 mg every 6 hours, as needed

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Lowering Default Quantities

Realign pill quantities with patient need

PROCEDURE	Recommended quantity of opioid pills to prescribe
Laparoscopic cholecystectomy	15
Laparoscopic appendectomy	15
Laparoscopic inguinal hernia repair	15
Open inguinal hernia repair	20
Colectomy	25
Umbilical hernia repair	15
Laparoscopic ventral hernia repair	15
Laparoscopic hiatal hernia repair	15
Open whipple	30
Open liver resection	30
Melanoma and skin excision procedures	15
Laparascopic hysterectomy	15
Open hysterectomy	25
Breat biopsy	5
Carotid endarterectomy	15
Cesarean section	15
Cataract surgery	0
Coronary artery bypass	25
Debridement of wound	Variable
Dilation and curettage	5
Free skin graft	25
Hemorrhoidectomy	20 (use sparingly, causes constipation)
Hysteroscopy	5
Total mastectomy, simple or radical	25
Partial mastectomy (lumpectomy)	15
Open prostratectomy	25
Robotic prostratectomy	15
Tonsillectomy	5
Thyroidectomy	10
Parathyroidectomy	10
Video-assisted thorascopic surgery lobectomy	15
Open lobectomy	25
Chemical or mechanical pleurodesis	25
Total hip replacement	25
Total knee replacement	25

Intermountain Healthcare

CLINICAL GUIDELINE JANUARY 2017

Acute Pain Opioid Prescribing Guidelines

▸ACUTE PAIN MANAGEMENT GUIDELINES

The following guidelines and algorithm (on page 2) address the complexity of treating patients who are suffering from pain with opioid medication. These recommendations align with current Utah and CDC prescribing guidelines (note resources in sidebar at right).

STOP

AVOID PRESCRIBING:

- Long-acting or extended-release opioids for acute conditions.
- Opioids in doses ≥ 50 mg morphine equivalent/day (MME)

Refer to iCentra or to page 12 of Intermountain's CPM, *Prescribing Opioids for Chronic Non-Cancer Pain*.

CAUTION

For elderly patients and those at risk for OIRD (see page 3), **REDUCE** dose and frequency when opioid prescribing is unavoidable.

GO

- **PRESCRIBE:**
  - The lowest effective dose
  - Low-dose, immediate-release, short-acting opioids only
  - No more than the number needed for usual pain duration associated with the condition, usually for 3 days and rarely for more than 7 – 10 days
- **INTEGRATE** non-opioid therapies to reduce overall opioid consumption (e.g., multimodal therapies, regional analgesia, massage, etc.)
- **RE-EVALUATE** any severe acute pain that continues beyond the anticipated duration
  - Confirm or revise initial diagnosis
  - Appropriately adjust pain management plan
- **FOLLOW UP** with primary care within 3 – 5 days post-discharge
- **EDUCATE** patient and caregiver pre-therapy & post-discharge — PROVIDE patient education (*Prescription Opioids: What You Need to Know* fact sheet), and INITIATE shared-decision-making conversations about:
  - Risks and benefits of opioid therapy.
  - Proper use, storage, and disposal.
  - Use of naloxone.

NOTE: Consider prescribing naloxone for all patients at risk for opioid-induced respiratory depression (OIRD), if discharged on opioids (**see guidance on assessing ORID risk on page 3**).

INTERMOUNTAIN RESOURCES

- *Prescribing Opioids for Chronic Non-Cancer Pain Care Process Model*
- *Assessment and Management of Substance Use Disorder Care Process Model*
- STOP-BANG® Assessment

GUIDELINES AND OTHER RESOURCES

- http://www.agencymeddirectors.wa.gov/Files/2015AMDGOpioidGuideline.pdf
- http://www.aspmn.org/documents/GuidelinesonMonitoringforOpioid-InducedSedationandRespiratoryDepression.pdf
- https://www.icsi.org/_asset/dyy5wm/opioidtr.pdf
- http://health.utah.gov/prescription/pdf/guidelines/ffrpil.04.09opioidGuidlines.pdf
- http://www.cdc.gov/mmwr/volumes/65/rr/rr6501e1.htm
- https://www.utahmed.org/docs/ACS_Resources/4)Pain%20Treatment%20Recommendations.pdf
- http://www.fda.gov/downloads/drugs/drugsafety/postmarketdrugsafetyinformationforpatientsandproviders/ucm213281.pdf

These guidelines apply to common clinical circumstances, and may not be appropriate for certain patients and situations. The treating clinician must use judgment in applying guidelines to the care of individual patients.

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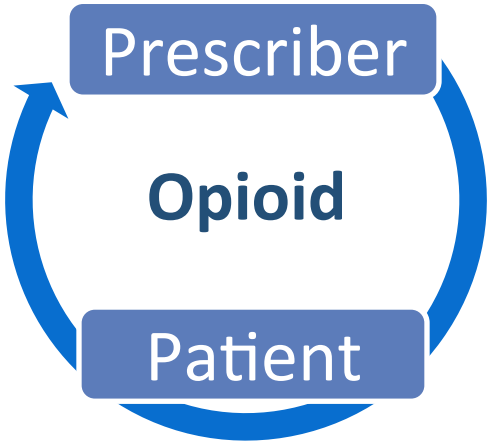
Optimize Function

Monitor and Improve



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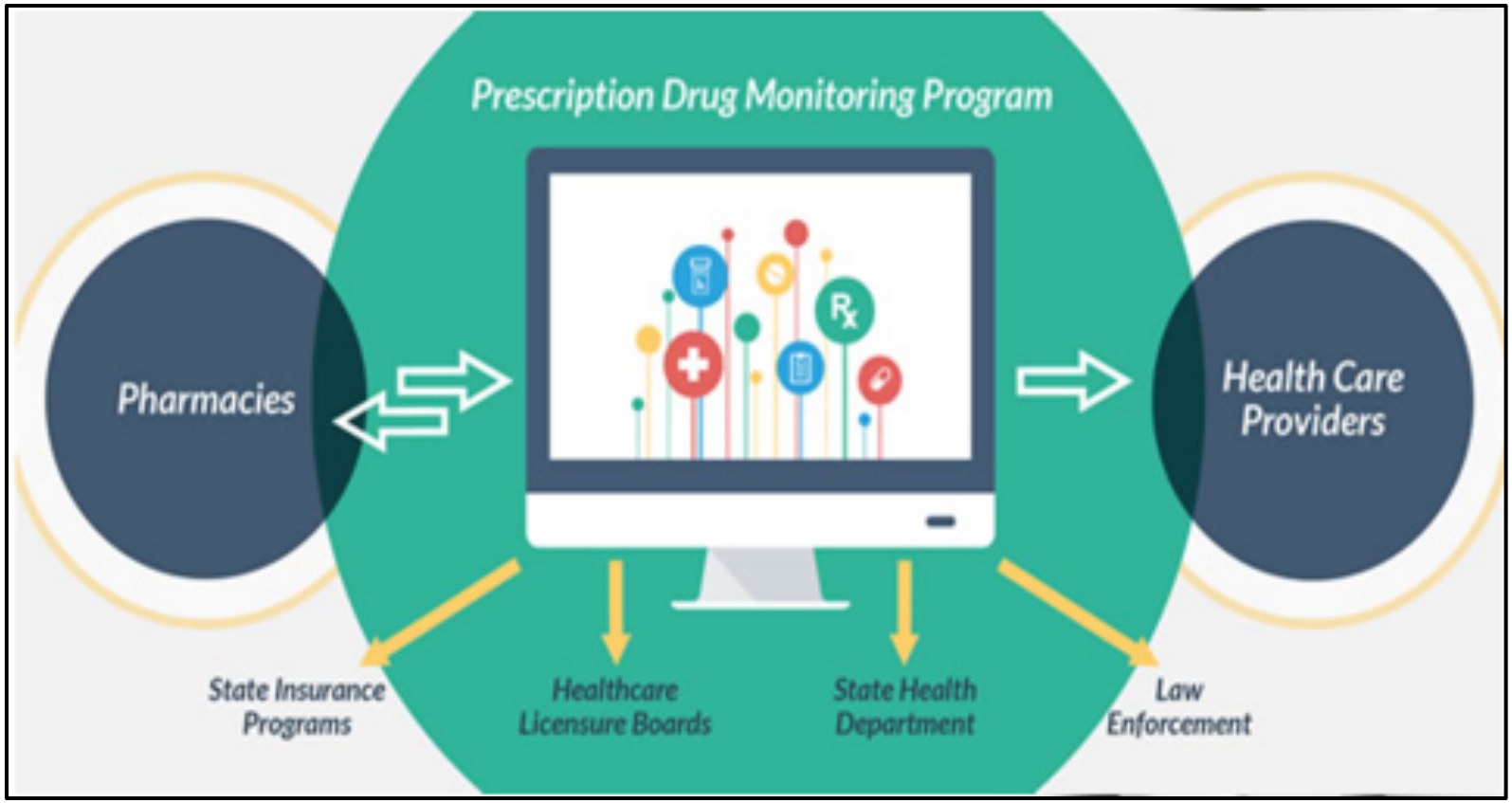
Electronic Prescribing

e-Prescribing is a CMS meaningful use core measure
Allows for refill authorization without a physical prescription



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Make Disposal Easy

kiosk without display

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Opioid Stewardship Toolkit

- Targeted to Surgical Departments
- Overview of current statistics
- Strategies for improvement
- Materials to support implementation
- PowerPoint templates to generate support
- Patient handouts

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Thank You

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