Developing a Game Plan for the Management of Chronic Pain:
Outlining Strategies for the Pharmacist’s Playbook

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Disclosure:

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Why has the game changed?
Why does this matter to pharmacists?

- Chronic pain affects at least 100 million American adults—more than the total affected by heart disease, cancer, and diabetes combined.
- Cost – $635 billion (in 2010 dollars) each year in medical treatment and lost productivity.
- Limited efficacy and evidence in best treatments for chronic pain
- Inconsistencies in treating chronic pain
- Epidemic increases in misuse and abuse of opioids
- Pharmacists:
  - knowledge of drug therapy
  - accessible to patients with chronic pain
  - duty to provide medications for legitimate medical purpose
  - “last line of defense”
Learning Objectives:

• Discuss the role of non-opioid and opioid therapy in the treatment of non-malignant chronic pain
• Describe how pharmacists can contribute to promoting safe and effective treatment of non-malignant chronic pain and reduction of opioid abuse and deaths based on newer guidelines and recommendations
• Explain the pharmacist’s role in providing education to patients regarding chronic pain therapies and naloxone rescue administration
Non-malignant (Non-cancer) Chronic Pain

- Challenges in prevention and management
- No agreed upon definition
  - usually > 3 months or beyond the time of normal healing
  - related to disease/condition, injury, medical treatment, inflammation or unknown cause
- Prevalence varies but is significant (~10-15%)
- Disparities in racial/ethnic minorities, women, elderly, persons with cognitive impairment
- Significant impact on quality of life
  - functional
  - psychological
  - social
Opioids

- Opioids include heroin and prescription opioids
- ~20% patients presenting to physician offices with non-malignant pain/pain-related diagnoses (acute and chronic pain) receive an opioid prescription
- In 2012 providers wrote 259 million prescriptions for opioids
  - enough for every adult in the US to have a bottle
  - Estimated ~3-4% adult US population (9.6-11.5 million) prescribed long-term opioids
- Opioid prescriptions on the rise
  - 7.3% per capita from 2007 to 2012
  - higher increases in family practice, general practice and internal medicine compared to specialties.
  - prescribing rates vary among states and appear to be unrelated to the underlying population illustrating lack of consensus on appropriate use
- Limited evidence on long-term benefits of opioids (> 3 months)
Risks of Opioids

• Opioid use disorder
  • problematic pattern of opioid use leading to clinically significant impairment or distress
    • unsuccessful efforts to cut down or control use resulting in social problems and failure to fulfill major role obligations for work, school and/or home
    • also referred to as abuse, dependence or addiction
    • not the same as tolerance or physical dependence

• Overdoses/Deaths
  • 165,000+ persons died from overdoses from 1999-2014
  • 46 people die from overdose in US every day
  • at least half of all opioid overdose deaths involve a prescription opioid
  • paralleled increasing prescription sales

CDC Guidelines for Prescribing Opioids for Chronic Pain (CP) – United States, 2016

• For Primary Care Providers
  • Apply to patients ≥18 years with CP outside of active cancer, palliative and end-of-life care
  • Address:
    • when to initiate or continue opioids for CP
    • opioid selection, dosage, duration follow-up and discontinuation
    • assessing risk and addressing harms of opioid use

• Outcomes
  • improve communication between clinicians and patients about risks and benefits
  • improve safety and effectiveness of pain treatment
  • reduce risks associated with long-term opioids therapy
  • Recommendations are “voluntary” rather than “prescriptive” standards

Why do pharmacists need to know?

- CDC recommendations refer to and promote integrated pain management and collaborative working relationships with other providers
  - behavioral health providers
  - **PHARMACISTS**
  - pain management specialists
Summary of Findings in Guideline

• Evidence on long-term opioid therapy for chronic pain outside of end-of-life care remains limited
  • insufficient evidence to determine long-term (≥ 1 year) benefit vs no opioid therapy
  • evidence suggests risk for serious harms that appear to be dose dependent
  • evidence supports short-term moderate efficacy for reducing pain and small benefits in improving function in non-cancer nociceptive and neuropathic pain in randomized clinical trials lasting primarily ≤12 weeks
CDC Recommendations

• 12 recommendation in 3 areas for consideration
  • determining when to initiate or continue opioids for chronic pain
  • opioid selection, dosage, duration, follow-up and discontinuation
  • assessing risk and addressing harms of opioids
CDC: Determining When to Initiate or Continue Opioids for Chronic Pain

1. **Nonpharmacologic therapy and nonopioid pharmacologic therapy are preferred for chronic pain.**

Clinicians should consider opioid therapy only if expected benefits for both pain and function are anticipated to outweigh risks to the patient.

If opioids are used, they should be **combined with nonpharmacologic therapy and nonopioid pharmacologic therapy, as appropriate.**
Therapy for Chronic Pain

• **Nonpharmacologic**
  • physical therapy
  • exercise therapy (aerobic, aquatic and/or resistance)
    • osteoarthritis (OA), low back pain, fibromyalgia
  • weight loss (knee OA)
  • psychological therapies (cognitive behavioral therapy)
  • intraarticular injections
  • multimodal – biopsychosocial rehabilitation (psychological therapy with exercise)
  • barriers to therapy: availability and reimbursement/cost
Therapy for Chronic Pain (nonopioids)

- **Nonopioid analgesics**
  - Acetaminophen (APAP)
  - NSAIDs
    - efficacy for arthritis and low back pain
    - use in other nociceptive pain conditions
    - not generally associated with substance use disorder
    - synergy when used in combo with opioids (potential to use lower opioid doses)

- **barriers to therapy:**
  - most effective in mild to moderate pain
  - ADRs/risks
    - APAP – liver toxicity (max total daily dose 3-4 gms/day)
    - NSAIDs – GI toxicity, renal toxicity, risk of CV events
  - Topical NSAIDs - expensive
Adjuvants (nonopioids)
antidepressants, anticonvulsants, transdermal lidocaine, etc.

- A diverse group of drugs with individual characteristics that are useful in the management of pain but aren’t typically considered analgesics
  - considered first line therapy for certain conditions
  - efficacy in neuropathic pain (anticonvulsants, TCAs/SNRI antidepressants)
  - limited evidence in efficacy comparison to other adjuvants and in combination
- less risk of misuse/abuse
- others include muscle relaxants, corticosteroids, non-NSAID topicals
- barriers to therapy:
  - long onset of action (weeks/months)
  - tapering to effective dose, sequential trials and combinations may be needed
  - ADRs – potentially sedating, risks in older patients
  - cost of some adjuvants
The Pharmacist’s Role

• Knowledge of appropriate therapy (continue to stay updated with evidence)
  • nonpharmacologic
  • nonopioid analgesics
  • adjuvants
• Recommendations to providers and patient
• Education to patients and families
CDC: Determining When to Initiate or Continue Opioids for Chronic Pain

2. Before starting opioid therapy for chronic pain, clinicians should establish treatment goals with all patients:
   - difficult to predict benefits vs. risk in individual patient
   - including realistic goals for pain and function
   - manage co-morbidities such as depression, anxiety and other mental health issues
     - often co-exist and can interfere with improvement and/or resolution of pain

Clinicians should consider how therapy will be discontinued if benefits do not outweigh risks.

Clinicians should continue opioid therapy only if there is clinically meaningful improvement in pain and function that outweighs risks to patient safety.
The Pharmacist’s Role

• Have patient and provider discussed realistic pain goals (pain and function)?
  • often not able to eliminate/relieve pain
  • realistic target is 30% reduction in pain score and function
  • target measurable ways to improve function (walking dog, attending family activities, returning to work part-time)
  • treatment plan may include written “agreement” (no clinical evidence on effectiveness of agreements)

• Help assess benefits and risk
  • improvement in pain/function
    • PEG Assessment Scale
  • adverse effects
  • behaviors of substance use disorders abuse (notify providers)
The Pharmacist’s Role

• Is there an exit strategy - plan for discontinuation if goals aren’t met?
• Recommend to providers or patients a discontinuation plan if goals aren’t met
  • opioid taper
  • consider increasing doses or adding additional nonopioid/nonpharmacologic therapy
PEG: A Three-Item Scale Assessing Pain Intensity and Interference

1. What number best describes your pain on average in the past week?

0 1 2 3 4 5 6 7 8 9 10
No pain  Pain as bad as you can imagine

2. What number best describes how, during the past week, pain has interfered with your enjoyment of life?

0 1 2 3 4 5 6 7 8 9 10
No pain  Pain as bad as you can imagine

3. What number best describes how, during the past week, pain has interfered with your general activity?

0 1 2 3 4 5 6 7 8 9 10
No pain  Pain as bad as you can imagine

PEG Scale

- 3 Question Assessment Scale
  - Pain average
  - Enjoyment of life
  - General activity

- To compute the PEG score, add the three responses to the questions, then divide by three to get a final score out of 10.

- Most useful in tracking changes over time
- Score should decrease over time after therapy has begun

From Krebs et al., 2009.
Determining When to Initiate or Continue Opioids for Chronic Pain

3. Before starting and periodically during opioid therapy, clinicians should discuss with patients known risks and realistic benefits of opioid therapy and patient and clinician responsibilities for managing therapy.

- many patients lack information about opioids (missed opportunities to educate)
- clinicians should involve patients in decisions about starting or continuing opioids
Opioid Risk Management Tools

- **Predict and monitor patient response to opioids**
- **SOAPP® -Screener and Opioid Assessment for Patients in Pain**
  - for patients currently receiving or under consideration for long-term opioids
  - 24, 14 and 5 Question form
  - primarily used to predict future behavior
- **COMM™ - Current Opioid Misuse Measure**
  - for patients currently on long-term opioid therapy
  - 17 item assessment
  - helps in monitoring aberrant medication-related behaviors over the course of treatment
- **Others**

https://www.painedu.org/index.asp
Substance use disorder

- Occur more frequently in patients with:
  - depression
  - anxiety disorders
  - schizophrenia
  - personality disorders
- May identify through care-giver, co-worker, family member, etc.

- Symptoms include:
  - strong desire for opioids
  - inability to control or reduce use
  - continued use despite interference with major obligations (work, school, family) or social functioning
  - use of larger amounts over time
  - spending a great deal of time to obtain and use opioids
  - withdrawal symptoms that occur after stopping or reducing use, such as negative mood, nausea or vomiting, muscle aches, diarrhea, fever, and insomnia.
The Pharmacist’s Role
Discussion and Education on:

• Realistic expectations of benefits and risk
  • evidence to reduce pain short-term/no good evidence long-term
  • relief of pain unlikely
• Improvement of function primary goal for many
  • function can improve even when pain still present
• Serious effects – potentially fatal respiratory depression, lifelong opioid use disorder (explain)
• Common ADRS - constipation (may need bowel regimen), confusion, drowsiness, dry mouth, nausea, vomiting
• Risks of chronic opioid use, including hypogonadism, sleep apnea, tolerance, hyperalgesia (i.e., pain sensitization caused by chronic opioid use), withdrawal, and addiction
The Pharmacist’s Role/Patient Education Continued

• Physical dependence and risk of withdrawal if stopping abruptly
• Caution driving/machinery when starting, increasing or taking other CNS depressants
• Increased risk for respiratory depression with other CNS depressants (benzodiazepines, alcohol, other opioids, including heroin)
• Increased risk for opioids use disorders, respiratory depressions, and death at high doses
• Only take the amount prescribed
• Explain what “as needed” means on medication labels
  • can take less, but not more, than the maximum amount of medication listed on the label for a 24-hour period
The Pharmacist’s Role/Patient Education
Continued

• Risks to household members (intentional/ unintentional sharing), especially children/teens
  • storage (secure, locked location preferred)
  • safe disposal of unused opioids
  • stress the importance of not sharing prescription medications with anyone
• Importance of monitoring (reassessment) and follow-up
  • opportunities for opioid discontinuation
  • consideration of additional nonpharmacologic or nonopioid treatments
  • if patients don’t feel better or if their pain gets worse, then they should call their physician
• Consider when cognitive limitations or health literacy might interfere with the management of opioid therapy (can a caregiver co-manage therapy?)

4. When starting opioid therapy for chronic pain, clinicians should **prescribe immediate-release opioids** instead of extended-release/long-acting (ER/LA) opioids.

5. When opioids are started, clinicians should prescribe the **lowest effective dosage**. Clinicians should use caution when prescribing opioids at any dosage, should **carefully reassess evidence of individual benefits and risks** when increasing dosage to ≥50 morphine milligram equivalents (MME)/day, and should avoid **increasing dosage to ≥90 MME/day** or carefully justify a decision to titrate dosage to ≥90 MME/day.
ER/LA Opioids:

methadone, transdermal fentanyl, extended release versions such as oxycodone, oxymorphone, hydrocodone and morphine

- Higher risk of overdose initiating treatment compared to immediate release
- FDA recommendations: management of pain severe enough to require daily, around-the-clock, long-term opioid treatment when alternative options are ineffective, not tolerated or would be inadequate to provide sufficient pain relief
- Should not be prescribed for intermittent use
- Considered only after patients have received immediate release opioids for at least 1 week
- Abuse deterrent formulations do not indicate no risk for abuse
  - no evidence of deterring/preventing abuse
  - don’t prevent overdoses from oral intake
ER/LA Opioids

- Conversion to ER/LA from different immediate release opioid
  - consult product labeling
  - decrease daily dosage to account for incomplete cross tolerance (usually 25-50%)
    - opioids calculators (e.g. Global RPh) and conversion charts available (but only a guide)
    - consider longer dosing interval for patients with hepatic or renal dysfunction
- Avoid use of immediate release opioids in combinations with ER/LA opioids is preferred except during transitioning from one dosage form to another
- CDC did not provide guidelines on when/how to transition patient from immediate release to long-acting
Opioids Dosing

- Prescribe lowest effective dose
- Caution at any dose
  - no dosage threshold below which an overdose risk is eliminated
- Carefully reassess increasing dosage to \( \geq 50 \) morphine mg equivalents (MME)/day
  - holding \(< 50\) MME/day would likely reduce risk among a large proportion from fatal overdose at higher prescribed dosages
  - \( > 50\) MME/day increase overdose risk without necessarily adding benefit for pain control or function
- Avoid increasing dosage to \( \geq 90\) MME/day or carefully justify a decision to titrate dosage to \( \geq 90\) MME/day
  - consider pain specialist consultation/referral
- Use additional caution for patients \( > 65\) years, renal or hepatic insufficiency
Opioids Dosing Continued

• Benefits for high-dose opioids (dose titration escalation) for chronic pain not established
• Risk for serious harms at higher dosages
  • motor vehicle injury
  • opioid use disorder
  • overdose
• Compared to doses of 1-<20 mg morphine equivalents (MME)/day
  • doses 50—<100 MME/day increased risk for opioid overdose 1.9-4.6X
  • doses > 100 MME/day increased risk for opioid overdose 2.0-8.9X
• Increase doses as smallest practical amount
• Wait at least 5 half-lives before increasing dose
The Pharmacist’s Role

- Encourage lowest dose when providing input to prescribers and patients
- When ER/LA opioids are prescribed evaluate usage
  - patient not opioid naïve /prior use of immediate opioid > 1 week
  - assist with management and education in the transition from immediate acting to ER/LA opioids
  - avoid in intermittent dosing
- Assist in assessing benefits and risks in patients on opioids > 50 MME/day
- Caution: increasing dosages to > 90 MME/day or identify a justified reason
  - benefits of high dose opioids not established
  - encourage tapering
6. Long-term opioid use often begins with treatment of acute pain. When opioids are used for acute pain, clinicians should prescribe the **lowest effective dose of immediate-release opioids** and should prescribe **no greater quantity than needed for the expected duration of pain severe enough to require opioids**. Three days or less will often be sufficient; **more than seven days will rarely be needed**.

7. Clinicians should evaluate benefits and harms with patients within **1 to 4 weeks of starting opioid therapy for chronic pain or of dose escalation**. Clinicians should evaluate benefits and harms of continued therapy with patients **every 3 months or more frequently**. If benefits do not outweigh harms of continued opioid therapy, clinicians should optimize other therapies and work with patients to **taper opioids to lower dosages or to taper and discontinue opioids**.
Established/Transferred Patient Taking High Dosages of Opioids

- Dosage reduction/tapering can be anxiety-provoking
  - physical and psychological dependence
- Offer opportunities to re-evaluate use of high dose opioids (≥90 MME/day)
  - now an established body of evidence showing overdose risk increased at higher dosages
- Empathetically review benefits and risks
- Offer to work with the patient/provider(s) to taper opioids to safer dosages
  - very slow taper
  - pauses in taper to allow gradual accommodation to lower opioid dose

- Continue to evaluate for and manage (or refer)
  - depression
  - anxiety
  - signs of opioid use disorder
- Continue to establish goals for continued opioid therapy (Recommendation 2)
- Maximize treatment plan with nonpharmacologic and nonopioid/adjuvant treatments as appropriate
Withdrawal Symptoms and Management

• **Early Symptoms of Withdrawal**
  - Agitation
  - Anxiety
  - Muscle aches
  - Increased tearing
  - Insomnia
  - Runny nose
  - Sweating
  - Yawning

• **Late Symptoms of Withdrawal**
  - Abdominal cramping
  - Diarrhea
  - Dilated pupils
  - Goose bumps
  - Nausea
  - Vomiting

• Antidepressants to manage irritability, sleep disturbance (e.g. Trazodone)
• Hydroxyzine for insomnia and anxiety
• Anti-epileptics for neuropathic pain
• Clonidine for autonomic withdrawal symptoms such as rhinorrhea, diarrhea, sweating, tachycardia, hypertension
• NSAIDs for myalgia (e.g., Ibuprofen)
• Anti-diarrheal agents for diarrhea

❖ Opioid withdrawal is not typically life-threatening in adults

[Links to source materials]
Tapering/Discontinuation of Opioid Therapy (outpatient)

- Educate patient about withdrawal symptoms
- Goal to minimize withdrawal symptoms
- Patients are considered opioid tolerant when using $\geq 60$ mg MME/day (25 mcg/hr transdermal fentanyl)
- No gold standard for tapering opioids
- Veterans’ Administration and Department of Defense
  - tapering plan made on an individual basis
  - taper by 20%-50% per week of original dose
  - patients need 20% of the previous day’s dose to prevent withdrawal symptoms
  - the longer the patient has been on opioids, the slower the tapering process should be
  - temporarily increase opioid dose if withdrawal symptoms occur

Tapering/Discontinuation of Opioids

- Other guidelines/literature suggests a 10% reduction in the dose per week
- May need slower taper (5%) at end of tapering
- Taper fast if experiencing severe adverse effects (2-3 weeks)
- Consider pauses in the taper to allow gradual accommodation to lower opioid dosages
- Methadone may take longer due to long and unpredictable half life
- Physical withdrawal symptoms generally resolve by 5-10 days following opioid dose reduction/cessation.
- Psychological withdrawal symptoms (dysphoria, insomnia) may take longer.

The Pharmacist’s Role

- Evaluate quantities and encourage 3 days or less (7 maximum) for acute pain
- Assist with/encourage appropriate follow-up when possible
  - benefits/harms after 1-4 weeks after initiation or dosage change for chronic pain
  - patient should have assessment q 3 months
- Provide recommendations for tapering/discontinuation to providers
  - assist with monitoring for withdrawal symptoms
- Check for insurance coverage limitations and work with provider, patient and insurance
8. Before starting and periodically during continuation of opioid therapy, clinicians should **evaluate risk factors for opioid-related harms**. Clinicians should incorporate into the management plan strategies to mitigate risk, including considering offering **naloxone** when factors that increase risk for opioid overdose, such as history of overdose, history of substance use disorder, higher opioid dosages (≥50 MME/day), or concurrent benzodiazepine use, are present.
Evaluating Risk Factors

• Frequency of evaluation should vary based on risk factors and patient characteristics
  • alcohol use
  • sleep disordered breathing (including sleep apnea)
  • pregnant women (risks to mother and fetus)
  • patients with renal or hepatic insufficiency
  • patients ≥ 65 years
  • patients with mental health conditions
  • patients with substance abuse disorders (SOAPP-R, DAST – Drug Abuse Screening Test or AUDIT – Alcohol Use Disorders Identification Test)
  • patients with prior nonfatal overdose
• Consider referral to pain/behavioral specialists
Naloxone Rescue

- Available naloxone formulations
  - Auto-injector: *Evzio* (U.S.)
    - contains two naloxone 0.4 mg autoinjectors and one trainer
    - cost: $3750 (Wholesale Acquisition Cost- WAC)
    - contact insurance provider to determine if covered (may require PA)
  - *Narcan* nasal spray (U.S.)
    - contains two blister-packed, single-use nasal sprays, each containing 4 mg of naloxone
    - $125 (WAC) for two nasal sprays
    - broader insurance coverage is expected for *Narcan* nasal spray.
Naloxone Autoinjector and Nasal Spray
Naloxone Rescue Continued

• Naloxone kits (U.S.):
  • For IM injection – supply in vials: Provide as 0.4 mg/mL in two 1 mL single-dose vials or one 10 mL multidose vial.
  • For each injection include, a 23 gauge, 3 cc syringe with a 1-inch needle
  • For intranasal administration using the injectable solution use two naloxone 2 mg/2 mL Luer-Lock prefilled syringes made by IMS/Amphastar (NDC# 76329-3369-1), along with two mucosal atomization devices (MAD 300), which pharmacists can order by calling 800-788-7999. This device fits into the Luer-Lock of the IMS/Amphastar naloxone.
  • Information on preparing and prescribing naloxone rescue kits is available at www.prescribetoprevent.org
  • Patient education sheets are also available at www.prescribetoprevent.org
  • Some insurance plans, including Medicaid and Medicare in some states, will cover the kits or some components
Naloxone Rescue Kits
Naloxone Rescue in Missouri

- **HB 1568 -- NALOXONE PRESCRIPTIONS**
  - Allows any licensed pharmacist to sell and dispense naloxone under physician protocol and creates immunity from criminal prosecution, disciplinary actions from a professional licensing board, and civil liability for an individual who, acting in good faith and with reasonable care, administers an opioid antagonist to an individual whom he or she believes is suffering an opioid-related drug overdose.
  - Any individual or organization may store and dispense an opioid antagonist without being subject to the licensing and permitting requirements in Chapter 338, RSMo, if he or she does not collect a fee or compensation for dispensing the opioid antagonist when the person or organization is acting under a standing order issued by a health care professional who is authorized to prescribe an opioid antagonist.
  - 06/21/2016: Signed by Governor Nixon
Naloxone Rescue Education Basics

- Indication for naloxone rescue - when opioids may be present in patients:
  - not breathing
  - fingernails or lips turning purple or blue
  - not responding
  - excessively sleepy and cannot be aroused with a loud voice or sternal rub
  - slow, shallow, or no respirations, or pinpoint pupils in a patient who is difficult to arouse

- Position patients on their side after naloxone administration, if breathing
  - they may vomit
  - if not breathing perform rescue breathing (may vomit)

- Most patients respond to naloxone with a return to spontaneous breathing

- If naloxone is given to a patient who is not opioid-dependent or is not opioid-intoxicated, it has no clinical effects
Naloxone Rescue Education Basics - Continued

- **Call 911!**
  - duration of most opioids is longer than that of naloxone
  - emergency help will be needed
  - if a patient’s symptoms return or if the patient doesn’t respond or achieve the desired response (i.e., adequate spontaneous breathing), and emergency medical help has not yet arrived, naloxone can be given every 2-5 minutes
  - when giving additional doses of Narcan nasal spray, alternate nostrils
  - patients who have overdosed on partial agonists and mixed agonist-antagonists (e.g., buprenorphine) may not respond well
  - naloxone use may precipitate withdrawal
The Pharmacist’s Role – Naloxone Rescue

- Collaborate with physician(s) to create protocol(s) and policies
- Identify patients who may benefit (high risk patients) from CDC guidelines
  - history of overdose
  - history of substance abuse disorder
  - higher dosages (> 50 MME/day)
  - concurrent benzodiazepines use
- Other potential high risk patients?
  - switching from one opioid to another
  - enrolled in buprenorphine or methadone maintenance or detoxification program
  - use of extended-release or long-acting opioid preparations
  - other co-morbidities including COPD, emphysema, asthma, sleep apnea, or other respiratory system disease
  - concurrent use of alcohol
Pharmacist’s Role – Naloxone Rescue

- Educate and train patients, family and friends/providers
- Assist with reimbursement/obtain payment
- Keep up to date with state regulations
9. Clinicians should review the patient’s history of controlled substance prescriptions using state prescription drug monitoring program (PDMP) data to determine whether the patient is receiving opioid dosages or dangerous combinations that put him or her at high risk for overdose. Clinicians should review PDMP data when starting opioid therapy for chronic pain and periodically during opioid therapy for chronic pain, ranging from every prescription to every 3 months.
Prescription Drug Monitoring Programs (PDMPs)

- State-based databases
  - collect controlled prescription drug information
  - variability of information collected and who can review
    - Who must report?
    - What must be reported?
    - Who can view the reports?
    - How law enforcement investigate cases?
  - some states require clinicians to review PDMP data prior to writing each opioid prescription

- reporting is legislated but required viewing may not be
- reporting is not in real time in many states
- limited data on success of PDMPs in reducing overdoses
  - high rate of fatal overdoses associated with multiple prescribers and/or high total daily opioid dosages
- most experts from CDC guidelines recommend PDMP data should be reviewed q 3 months during long-term opioid therapy

http://www.namsdl.org
Prescription Monitoring Programs (PMP)

- The National Association of Boards of Pharmacy created PMP Interconnect
- Facilitates the transfer of PMP data across state lines to authorized users.
- 30+ states participating
- In participating states, authorized PMP users in that state may gain access to interstate data by logging directly into the state PMP in which they are a registered user.

http://www.nabp.net/programs/pmp-interconnect/nabp-pmp-interconnect
Recommended actions from PDMP review

- If patients found to have high opioid dosages, dangerous combinations or multiple controlled substance prescriptions written by different clinicians
  - discuss PDMP information with patients (occasionally data can be incorrect)
  - discuss safety concerns and consider offering naloxone
  - communicate with others managing patients to coordinate care
  - calculate MME/day of concurrent opioids to assess patient’s overdose risk
  - consider possibility of substance use disorder
- Clinicians should not dismiss patients from their practice based on PDMP information
  - can adversely affect patient safety
    - patient abandonment
    - missed opportunity to provide potential lifesaving information and interventions
The Pharmacist’s Role

- More challenging to monitor opioid use in Missouri than any other state
- Contact prescribers when identify patients with:
  - multiple prescribers
  - high opioid dosages (combination of opioids)
- Note: St. Louis + St. Louis County and Jackson County are working to implement PDMPs
  - KC and Independence MO have own public health departments but have been urged to join Jackson County
• 10. When prescribing opioids for chronic pain, clinicians should use **urine drug testing before starting opioid therapy and consider urine drug testing at least annually** to assess for prescribed medications as well as other controlled prescription drugs and illicit drugs.
Urine Drug Screening

- Provide information about drug use not reported by patient
- Identify patients not taking opioids prescribed for them (may signal diversion or adverse effects)
  - cannot provide accurate information on much or what dose was taken
- Subject to misinterpretation and practices that might harm patient
- Routine use of urine drug screens with standardized policies might destigmatize use
- Cost (often not fully covered by insurance) and clinician time to interpret and manage can be barriers
- Urine drug screenings prior to starting opioids and periodically (at least annually)
- Clinicians should work to laboratories to understanding testing and interpretation
- Clinicians should have a plan/policy for responding to unexpected results
  - should include discussing with patients
  - use results to improve patient safety
    - tapering and/or discontinuing
    - more frequent re-evaluation
    - offering naloxone
    - referral for treatment for substance use disorder

The Pharmacist’s Role

• Inquire with patient and/or provider on monitoring plans and policies including urine drug screens
CDC: Assessing Risk and Addressing Harms of Opioid Use

• 11. Clinicians should avoid prescribing opioid pain medication and benzodiazepines concurrently whenever possible.
Risks of Benzodiazepines and Opioids

- Benzodiazepines + opioids = CNS depression and decreased respiratory drive
- Likely to put patients at greater risk of potentially fatal overdoses
  - case-cohort studies – nearly 4X risk of overdose death compared to opioid alone
- May be circumstances when appropriate to prescribe the combo, clinicians should avoid
- Clinicians should consider risks with opioids in combination with other CNS depressants (e.g. muscle relaxants, hypnotics)
- Clinicians should review PDMP for concurrent controlled medications prescribed from other physicians
- Consider involving PHARMACISTS and pain specialists as part of management team when opioids are co-prescribed with other CNS depressants
- Potentially safer to titrate opioids first (vs. benzodiazepines)
- Benzodiazepines require slow taper to avoid rebound anxiety other withdrawal symptoms and rarely, death
  - common tapering - 25% q 1-2 weeks
  - cognitive-behavior therapy may improve success
  - consider other appropriate therapy for anxiety if indicated (antidepressants or non-benzodiazepines)
The Pharmacist’s Role

- Monitor for concomitant use of opioids + benzodiazepines
- Contact the prescriber
- Educate patients on risks
- Suggest naloxone
12. Clinicians should offer or arrange **evidence-based treatment** (usually medication-assisted treatment with buprenorphine or methadone in combination with behavioral therapies) for patients with opioid use disorder.
The Pharmacist’s Role

• Awareness of treatment and community resources
• Report opioid use disorder patient concerns to provider
  • PDMP findings
  • patient behavior
• Recommend naloxone
• Referral to treatment specialists
Not addressed by guidelines

- Children/adolescents < 18 yrs
  - limited evidence
  - commonly prescribed for headache and sports injuries
  - misuse often occurs from misuse of own previous prescriptions
  - use of prescribed opioid pain medication before high school graduation is associated with a 33% increase in risk of later opioid misuse
  - misuse of opioids in adolescence strong predictor of later onset of heroin use
Limitations to the Guidelines

• Too broad since chronic pain is caused by many different underlying conditions
• Limited evidence (low quality) – mostly based on ”contextual evidence” (vs. clinical evidence) and expert opinion
  • excluded all data from studies investigating opioid efficacy from 3 months to 1 year
  • some evidence for nonpharmacologic therapy and nonopioid therapy in chronic pain but still limited
  • a number of medical professional and patient organizations have suggested guidelines are too focused/narrow and don’t fully address the under treatment of chronic pain
    • may inadvertently encourage under-treatment, marginalization, and stigmatization of the many patients with chronic pain that are using opioids appropriately
• Difficult to follow implement with limitations in access, insurance coverage and strict dose limitations

Numerous Criticisms to Guidelines

• Potential benefits to ER/LA may exist in some circumstances
  • less-frequent dosing means less clock-watching (anxiety) and longer pain relief
  • less-frequent dosing results in more consistent blood levels and therefore more constant pain relief.
  • consistent blood levels result in fewer CNS effects such as euphoria.
  • less value on the street.
  • delay may make switching difficult
    • the longer the wait to switch a patient from an IR to ER formulation, the harder it becomes to make the switch

• Dosage number limitations are arbitrary
  • decisions should be based on the patient’s function, pain relief and lack of serious harms, no matter what the dose
  • nonpharmacologic and nonopioid therapies still should be included in the plan
  • No discussion of CYP450 genetic testing, which can determine a justified reason why a patient may need higher doses of opioids.
Resources

- CDC guideline resources
  - http://www.cdc.gov/drugoverdose/prescribing/resources.html
- Health and Human Services
  - http://www.hhs.gov/opioids/health-professionals-resources/
- APhA
- Prescribe to Prevent.org
  - www.prescribetoprevent.org
Awareness

- Most nonmedical use of prescription opioids is obtained from family and friends, who usually obtain them from a single prescriber.
- Opioid prescribing seems to be plateauing or even decreasing based on data from 2011 to 2013
  - concern heroin use may be increasing
- Careful with profiling and stereotyping
  - patients suffering from pain may look disheveled
  - patients in pain may not speak or respond fluidly
  - difficult to tell abusers from patients with uncontrolled pain
The Pharmacist’s Responsibility

• "Last line of defense"

• Pharmacists have a responsibility to determine whether the treatment is being used for a legitimate medical purpose without denying a patient’s access

Pharmacist’s Checklist for Opioid Prescriptions

- Patient has tried and maximized nonpharmacologic therapies and nonopioids
- RX is valid and includes all require elements
- Dose is reasonable or able to be justified
- Appropriate use with ER/LA formulations
- Reasonable quantities for indication (acute or chronic)
- Avoid use of benzodiazepines (and other CNS depressants) when possible
- Provide patient education on opioid risks and benefits
- Recommend bowel regimen
  - polyethylene glycol
  - stimulant laxative
- Identify patients at higher risk for opioids abuse
  - younger age
  - history of psychiatric illness
  - personal or family history of substance abuse
  - be wary of patients insisting on specific products or claiming allergies to specific analgesics
  - see if patient has been evaluated with assessment tools such as ORT or SOAPP-R
  - Check PDMP if available
- Recommend and educate on naloxone rescue when appropriate
Other Red Flags

- Large quantities
- More volume from a prescriber than others in the area/for the specialty
- Multiple patients appear within a short time, with similar Rxs from the same prescriber
- People who aren’t regular patients show up with Rxs from the same prescriber
- Prescriber writes Rxs for conditions not consistent with their specialty (e.g., dentist writing ADHD Rxs)
- Prescriber writes for antagonistic combinations of drugs, such as an opioid and stimulant
- Non-local prescribers or patients
- Doctor or pharmacy “shoppers”
Other Red Flags, cont.

- Patient pays cash only for controlled substances
- Patient requests Rxs early
- Patient has unusual behavior or an assertive personality
- Patient has unusual knowledge of controlled substances or uses street slang
- Patient demands certain brands or generics of controlled substances
- Patient has signs of drug abuse such as skin tracks or scars on neck, arms, and feet or ankles
- Altered or forged prescriptions, such as:
  - Rx looks “too good” or “textbook”
  - quantities, directions, or doses that differ from usual medical use
  - directions are written in full with no abbreviations, or not using standard abbreviations
  - Rx appears photocopied, or is written in different color inks or different handwriting
Developing a Balanced Game Plan

• Striking the right balance between not contributing to prescription drug abuse and ensuring patients receive medically necessary pain management is a constant struggle

• Chronic opioids are most appropriate for patients with moderate to severe pain unresponsive to nonpharmacological therapy and nonopioids

• Opioid using patients tend to be the patients that make us uncomfortable – try to get rid of them the fastest

• Developing relationships and providing education could give us the opportunity to ensure appropriate use and/or possibly save a life
1. Which of the following best describes the role of opioids in treatment of non-malignant (non-cancer) chronic pain?

a) Most patients with chronic pain will require at least 100 mg of morphine equivalents (MME)/day

b) Extended release or long acting opioids should be combined with immediate release opioids as initial therapy

c) Opioids should be initiated only after treatment with nonpharmacologic and nonopioid therapy

d) Use of opioids are contraindicated in all types of nonmalignant chronic pain
2. A patient is taking opioids for chronic pain equal to 100 MME/day. Her physician has asked you to provide recommendations for tapering her opioid dose. Which of the following is the most appropriate recommendation?

a. decrease the opioid to 25 MME/day for 1 week, then 10 MME/day for 1 week then off

b. decrease by 10% weekly and monitor for signs of withdrawal

c. no tapering is necessary because opioid withdrawal is not life threatening, the patient can stop her opioid immediately

d. Add a benzodiazepine then taper by 5% weekly. Monitor for signs of withdrawal
Post-test

3. What education should you provide when dispensing a naloxone rescue kit
   a) Call 911 after administering the first dose and be ready to administer another dose if the person experiencing the overdose does not respond in 2-5 minutes
   b) You must determine if the person experiencing the overdose has ingested an opioid before administering. Otherwise, you can cause the patient to have seizures
   c) You can leave the person alone after administering one dose of naloxone and the person experiencing the overdose should wake up in 5-10 minutes
   d) Place the person experiencing the overdose flat on his/her back and elevate the person’s legs and head after administering the first dose
A 42 year old patient brings in a prescription for long-acting oxycodone 20 mg q 12 hrs. He states he has been on his dose for over a year. He also has the medications listed below on his medication profile.

Which of the patient’s medication is of most concern when used in combination with the long-acting oxycodone?

a) meloxicam 7.5 mg daily
b) duloxetine 60 mg daily
c) temazepam 30 mg hs
d) transdermal lidocaine patch daily (apply for 12 hrs on and 12 hrs off)
Questions?
Evaluation Password:

pain16