

# UVM ECHO Chronic Pain: Management of Opioid Prescribing in Primary Care

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The University of Vermont  
LARNER COLLEGE OF MEDICINE  
OFFICE OF PRIMARY CARE & AHEC PROGRAM

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# No relevant disclosures

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# Objectives

- Understand current recommendations for best practices for opiate prescribing (review)
- Understand role of population approaches to management of chronic pain in primary care
- Decide on a strategy for opioid population reporting for your practice



# Review & Context




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# CDC Guidelines 2016 (condensed)

- Use alternatives to opioids whenever possible
- Explain the risks and benefits
  - Informed consent
- Focus on function
- Start low and go slowly
- Track progress carefully
  - Surveillance for misuse
- Avoid benzodiazepines

Checklist for prescribing opioids for chronic pain	
For primary care providers treating adults (18+) with chronic pain ≥ 3 months, excluding cancer, palliative, and end-of-life care	
<p><b>CHECKLIST</b></p> <p><b>When CONSIDERING long-term opioid therapy</b></p> <ul style="list-style-type: none"> <li>□ Set realistic goals for pain and function based on diagnosis (eg, walk around the block).</li> <li>□ Check that non-opioid therapies tried and optimized.</li> <li>□ Discuss benefits and risks (eg, addiction, overdose) with patient.</li> <li>□ Evaluate risk of harm or misuse.           <ul style="list-style-type: none"> <li>• Discuss risk factors with patient.</li> <li>• Check prescription drug monitoring program (PDMP) data.</li> <li>• Check urine drug screen.</li> </ul> </li> <li>□ Set criteria for stopping or continuing opioids.</li> <li>□ Assess baseline pain and function (eg, PLG scale).</li> <li>□ Schedule initial reassessment within 1–4 weeks.</li> <li>□ Prescribe short-acting opioids using lowest dosage on product labeling; match duration to scheduled reassessment.</li> </ul> <p><b>If RENEWING without patient visit</b></p> <ul style="list-style-type: none"> <li>□ Check that return visit is scheduled ≤ 3 months from last visit.</li> </ul> <p><b>When REASSESSING at return visit</b></p> <p><i>Continue opioids only after confirming clinically meaningful improvements in pain and function without significant risks or harm.</i></p> <ul style="list-style-type: none"> <li>□ Assess pain and function (eg, PLG); compare results to baseline.</li> <li>□ Evaluate risk of harm or misuse:           <ul style="list-style-type: none"> <li>• Observe patient for signs of over-sedation or overdose risk.               <ul style="list-style-type: none"> <li>– If yes: Taper dose.</li> </ul> </li> <li>• Check PDMP.</li> <li>• Check for opioid use disorder if indicated (eg, difficulty controlling use).               <ul style="list-style-type: none"> <li>– If yes: Refer for treatment.</li> </ul> </li> </ul> </li> <li>□ Check that non-opioid therapies optimized.</li> <li>□ Determine whether to continue, adjust, taper, or stop opioids.</li> <li>□ Calculate opioid dosage morphine milligram equivalent (MME).           <ul style="list-style-type: none"> <li>• If ≥ 50 MME/day total (≥ 50 mg hydrocodone; ≥ 33 mg oxycodone), increase frequency of follow-up; consider offering naloxone.</li> <li>• Avoid ≥ 90 MME/day total (≥ 90 mg hydrocodone; ≥ 60 mg oxycodone), or carefully justify; consider specialist referral.</li> </ul> </li> <li>□ Schedule reassessment at regular intervals (≤ 3 months).</li> </ul>	<p><b>REFERENCE</b></p> <p><b>EVIDENCE ABOUT OPIOID THERAPY</b></p> <ul style="list-style-type: none"> <li>• Benefits of long-term opioid therapy for chronic pain not well supported by evidence.</li> <li>• Short-term benefits small to moderate for pain; inconsistent for function.</li> <li>• Insufficient evidence for long-term benefits in low-back pain, headache, and rheumatoid arthritis.</li> </ul> <p><b>NON-OPIOID THERAPIES</b></p> <p>Use alone or combined with opioids, as indicated:</p> <ul style="list-style-type: none"> <li>• Non-opioid medications (eg, NSAIDs, TCAs, SNRIs, and cannabinoids).</li> <li>• Physical treatments (eg, exercise therapy, weight loss).</li> <li>• Behavioral treatment (eg, CBT).</li> <li>• Procedures (eg, intra-articular corticosteroids).</li> </ul> <p><b>EVALUATING RISK OF HARM OR MISUSE</b></p> <p><b>Known risk factors</b> include:</p> <ul style="list-style-type: none"> <li>• Illegal drug use; prescription drug use for nonmedical reasons.</li> <li>• History of substance use disorder or overdose.</li> <li>• Mental health conditions (eg, depression, anxiety).</li> <li>• Sleep-disordered breathing.</li> <li>• Concurrent benzodiazepine use.</li> </ul> <p><b>Urine drug testing.</b> Check to confirm presence of prescribed substances and for undiagnosed prescription drug or illicit substance use.</p> <p><b>Prescription drug monitoring program (PDMP).</b> Check for opioids or benzodiazepines from other sources.</p> <p><b>ASSESSING PAIN &amp; FUNCTION USING PLG SCALE</b></p> <p><b>PLG score</b> = average of individual question scores (50% improvement from baseline is clinically meaningful)</p> <p><b>Q1: What number from 0–10 best describes your pain in the past week?</b> 0 = “no pain”; 10 = “worst you can imagine”</p> <p><b>Q2: What number from 0–10 describes how, during the past week, pain has interfered with your enjoyment of life?</b> 0 = “not at all”; 10 = “complete interference”</p> <p><b>Q3: What number from 0–10 describes how, during the past week, pain has interfered with your general activity?</b> 0 = “not at all”; 10 = “complete interference”</p>



U.S. Department of Health and Human Services  
Centers for Disease Control and Prevention

TO LEARN MORE:  
[www.cdc.gov/ondp/prescribing-guideline](http://www.cdc.gov/ondp/prescribing-guideline)

MMH-2016



# VT Prescribing Rules, Chronic Opioid Therapy

- Patient written consent and agreement, updated annually
- Use of PDMP
- Office assessment
  - Function
  - Risk for aberrant behavior
  - Revisit interval 90 days
- Co-prescribing of naloxone for high dose or concomitant benzodiazepine





# Managing Opioids Safely and within Vermont Rules

## SUMMARY FOR PRIMARY CARE PROVIDERS

### Recommend Non-Opioid and Non-Pharmacological Treatment

- Nonsteroidal anti-inflammatory drugs (NSAIDs) and/or acetaminophen
- Acupuncture
- Chiropractic
- Physical therapy
- Yoga

Only prescribe opioids if expected benefits for both pain and function are anticipated to outweigh risks to the patient. If opioids are used, combine with non-opioid alternatives.

### Query the Vermont Prescription Monitoring System (VPMS)\*

#### First-time Prescriptions:

- Prior to writing a first opioid prescription for greater than 10 pills (e.g. opioids, tramadol)
- Prior to writing a first prescription for a benzodiazepine, buprenorphine, or methadone
- Prior to starting a patient on a chronic opioid (90+ days) for non-palliative therapy

#### Re-evaluation: At least annually (at least twice annually for buprenorphine)

- Centers for Disease Control (CDC) recommendation: every prescription, or at least every 90 days

#### Replacement: Prior to writing a replacement (e.g. lost, stolen) of any scheduled II-IV controlled substance

### Provide Patient Education and Obtain Informed Consent

- Discussion of risks, including side effects, risks of dependence and overdose, alternative treatments, appropriate tapering and safe storage and disposal
- Provide patient with the Vermont Department of Health (VDH) Patient Education handout
- Obtain signed informed consent, even for acute prescriptions
- VDH education resources:  
[www.healthvermont.gov/alcohol-drugs/professionals/resources-patients-and-providers](http://www.healthvermont.gov/alcohol-drugs/professionals/resources-patients-and-providers)
- CDC education resources: [www.cdc.gov/drugoverdose](http://www.cdc.gov/drugoverdose)
- CDC: Establish realistic treatment goals for pain and function and establish patient and clinician responsibilities for managing therapy, including when to discontinue therapy

### Prescribe Nasal Naloxone when Indicated

- High Dose: 90+ Morphine Milligram Equivalent (MME) per day
- Concomitant benzodiazepine: Patients prescribed both an opioid and a benzodiazepine
  - CDC recommends avoiding co-prescribing of opioids and benzodiazepines
- CDC: History of overdose, history of substance use disorder, 50+ MME per day prescriptions

### Arrange for Evidence-based Treatment for Patients with Opioid Use Disorder

- CDC: Offer evidence-based treatment (usually medication-assisted treatment with buprenorphine or methadone in combination with behavioral therapies) for patients with opioid use disorder

### Complete Continuing Education Requirements

- Complete at least two hours of continuing education for each licensing period on the topic of Controlled Substances. Visit [vtad.org](http://vtad.org), [vtmd.org/cme-courses](http://vtmd.org/cme-courses), or check with your professional society for available courses.



# Panel Management

- Is an effective strategy for management of chronic disease
  - Integral aspect of the Patient-Centered Medical Home
- Features
  - Patient registry
  - Performance review with peer comparison and benchmarking
  - Iterative approach to improving performance



# Limitations of Current Population Reporting

- Reports from Prescription Drug Monitoring Programs
  - are not widely implemented
  - are not adequately adjusted for specialty or other practice characteristics
- Standardized reporting from electronic medical records is not widely available

# Question 1

- Do you currently have population reporting or registry reporting for chronic diseases such as diabetes, CHF, or HTN?



## Question 2

- Do you have population reporting for your panel of opioid patients?
  - Pain not MAT

# Study Objectives

- Develop a panel management approach to patients receiving opioid therapy for chronic pain, using data from the EMR
- Describe
  - Characteristics of a typical primary care panel
  - Red flag indicators

# Methods

- Setting
  - Suburban and rural Burlington, VT
  - 9 primary care sites affiliated with the academic center
- Subjects
  - Pts with PCP in a UVMMC primary care practice
    - Excluded PCPs with panel of fewer than 100 patients
- Measures (extracted from clinical data warehouse)
  - Demographic characteristics
  - Medication orders
  - Problem list



# Analytic Plan

- MME calculations per CDC
- Summarization at the patient and prescriber levels
  - Standardized for PCP panel of 1000 patients
- Definitions
  - Chronic opioid use
    - > 1000 MME/yr or > 5 Rx/yr
  - High dose opioid
    - > 90 MME/day
  - GABA use
    - Any GABA agonist during the year
    - Weekly GABA use > 52 pills/yr
    - Daily GABA use > 365 pills/yr



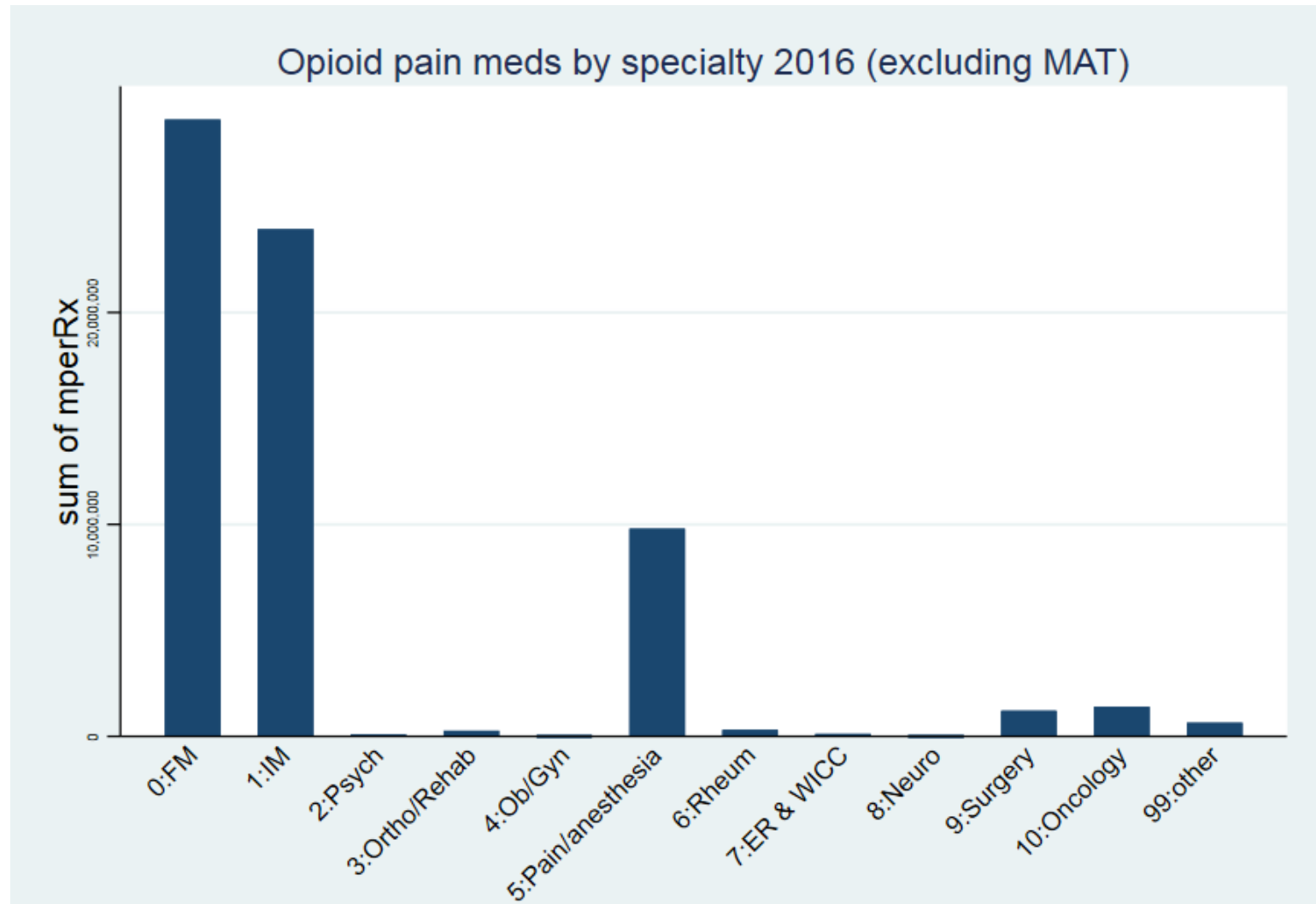


# Results

- Patients: 62,606 adults
  - Median age 53 (range 18-90+)
  - 55% women
- Prescribers: 81 PCPs in 9 practice locations
  - Median panel size 812 (IQR 548-1209)



# Who is Prescribing in 2016?



# Population Summary of Opioid Prescribing

- 10.6% of 62,606 subjects received an opioid in 2016
- Of those on an opioid
  - Chronic – 31%
  - High dose – 6.3%
- GABA agonist co-prescription
  - Any GABA use – 32%
  - Weekly use – 20%
  - Daily use – 9%

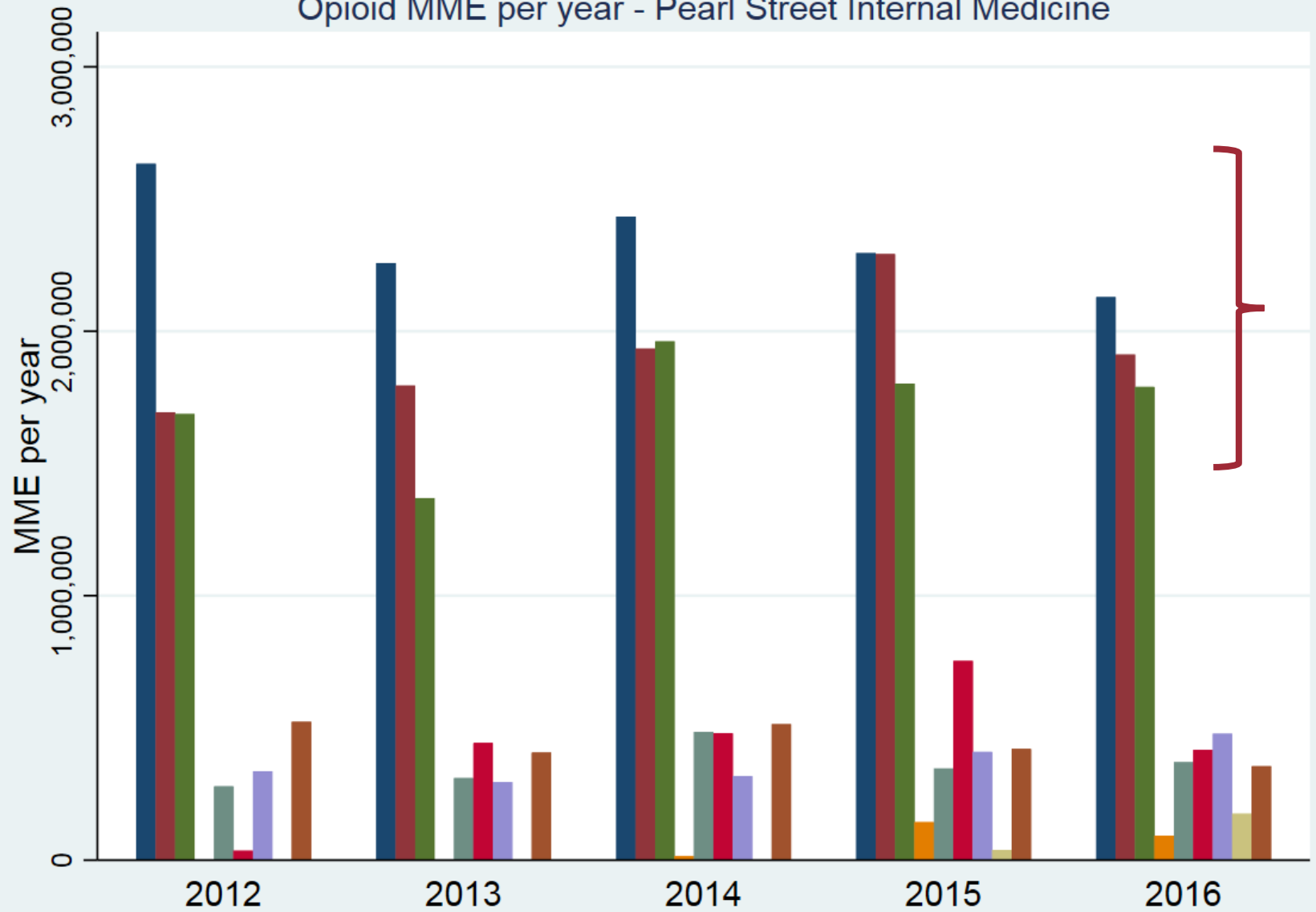


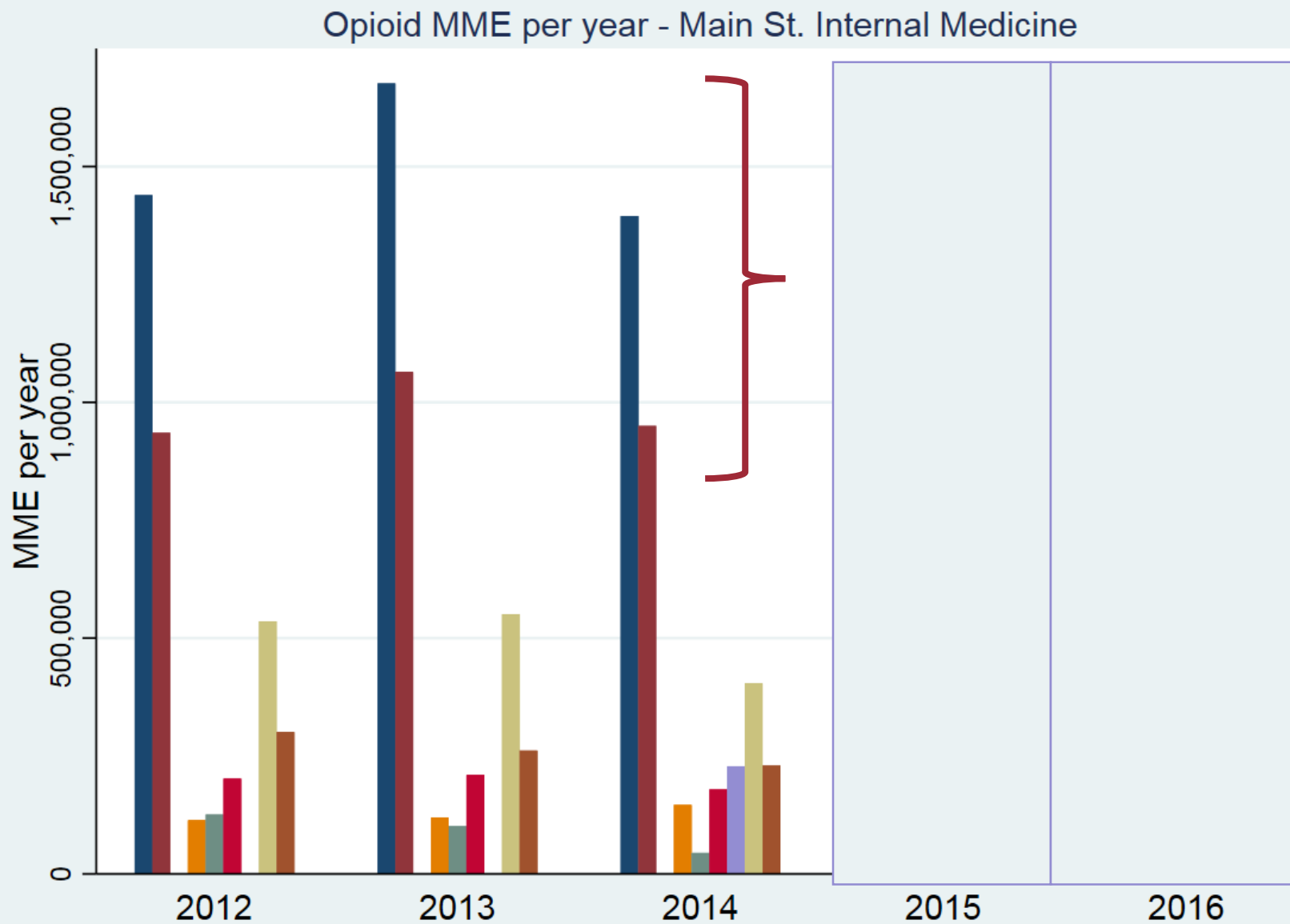
# PCP Panel Size of 1000

- Patient counts, medians
  - Any opioid=125 patients (IQR 103-158)
  - Chronic Rx=23 (IQR 9-64)
  - High dose=4 (IQR 1-18)
- Annual opioid volume per PCP
  - 598K MME (IQR 241K – 1.6M)
- At each practice it was common to see 2-3 higher volume prescribers



Opioid MME per year - Pearl Street Internal Medicine





# Development of Panel Reports



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## Chronic Opioid Protocol - PCP - Excluding Tramadol

This report displays all patients who have the chronic opioid protocol health maintenance modifier for whom MACLEAN, CHARLES is the general current PCP, in any clinic. The Current Med? fields are filtered to active prescriptions only, where the Total Rx, Auth Dept, and Auth Prov fields count prescriptions within the last year. This report is grouped by PCP Primary Department, then PCP and patient. This report excludes tramadol when calculating Current Med and Total Rxs.

ESSEX ADULT PRIM CARE	DOB	In the Last Year			Currently			Screenings, etc. Dates							COMM	Consent	Agrmt
		RXs my Dept Authorized	Unique Auth Provs	Total RXs	Med	Benzodi- azepine	Meth Sub Bup	Last PCP Visit	Urine Drug Screen	VPMS Query	Functional Assess	Pill Count					
		PCP															
		0	0	0	N	Y	N	02/05/18		07/05/17					02/05/18	02/05/18	
		26	2	26	Y	N	N	10/06/17		05/30/17	10/06/17		12/23/14	10/06/17	10/06/17		
		14	1	14	Y	Y	N	01/15/18		07/17/17	01/15/18		03/24/16	07/17/17	07/17/17		
		13	2	13	Y	N	N	11/27/17	06/09/09	08/07/17	01/25/16		08/07/17	08/07/17	08/07/17		
		13	3	16	Y	N	N	12/07/17		01/24/18	01/23/17		12/07/17	01/24/18	12/07/17		
		2	1	2	N	N	N	10/05/17		10/03/17					10/03/17		
		27	3	29	Y	N	Y	02/27/18		05/30/17	01/03/17		10/10/17	10/10/17	10/10/17		
		14	2	14	Y	N	N	02/13/18		01/18/18	04/06/17		02/13/18	08/02/12	08/02/12		
		10	3	10	N	N	N	02/19/18	10/19/17	01/22/18	06/23/17		11/22/16	06/23/17	06/23/17		
		0	0	0	N	Y	N	10/05/17		01/23/18							
		4	3	9	Y	N	N	02/26/18		01/23/18	02/26/18			02/26/18	02/26/18		
		12	1	12	Y	N	N	06/29/17		03/06/17	06/29/17		06/29/17	09/21/17	06/29/17		
		17	1	17	Y	N	N	02/27/18		05/30/17			01/02/18	06/23/17	06/23/17		
		7	3	7	N	Y	N	03/01/18		08/31/17	11/27/17		09/01/17	11/27/17	08/31/17		
		1	1	1	Y	N	N	09/25/17		03/05/17	03/27/17		03/27/17	09/25/17	09/25/17		
		9	4	11	Y	N	N	10/17/17		07/05/17	03/21/17		09/20/16	10/17/17	10/17/17		
		2	1	2	Y	N	N	01/22/18		03/05/17	03/13/17		03/13/17	03/13/17	03/13/17		
		13	5	17	Y	Y	N	02/08/18		07/05/17			09/12/17	09/18/17	09/18/17		
		29	4	30	Y	N	N	01/09/18	09/21/17	05/30/17	01/05/17		06/09/16	09/07/17	09/07/17		
		11	2	13	Y	N	N	10/10/17		03/06/17	10/21/14		10/10/17	10/10/17	10/10/17		
		6	4	10	Y	N	N	11/02/17		01/22/18				07/13/17	04/25/17		



# Panel Report

- 1 year lookback
  - # Rx/year, total and in home department
  - Unique prescribers/year
  - Current medication—yes/no
  - Concomitant GABA—yes/no
  - Red flag medications
    - Methadone—yes/no
    - Medication-assisted therapy—yes/no



# Adherence to Rules

- Dates of:
  - Last visit with PCP
  - PDMP lookup
  - Consent & agreement
  - Assessments
    - Functional assessment, Current Opioid Misuse Measure
  - Urine drug screen
  - Pill count

# VT Opioid Rule Adherence, UVMMC

Health Care Service	N	Opioid N	VPMS lookup	Agreement	Consent	Functional assessment
FM	35,116	1,568	76%	72%	78%	61%
PCIM	28,881	940	76%	62%	69%	41%

## Accuracy limitations

- Documentation may not be complete
- Rosters may not be up to date

Updated 12/12/2017



# Limitations

- Prescriptions orders, not filled medications
- Generalizability

# Conclusions

- Most opioids are prescribed in primary care
- Considerable variability in prescribing across prescribers
  - Benchmarking and peer comparison across prescribers will likely be useful for exploration of variability

## Question 3

- Are you interested in creating population reports for your opioid population?



# Instructions Regarding VPMS Pop Reports

- Would anyone be interested in video instructions on how to calculate your annual MME from VPMS?
- If yes...would there be interest in sharing your annual MME number for inclusion in a 2017 ECHO cohort report?



Questions





# ECHO Reminders

- Volunteers to present cases
  - Use the case presentation form template
- Please complete evaluation forms for each session
  - CME will be processed once session evaluation form is received at UVM
- UVM Project ECHO materials available at [www.vtahec.org](http://www.vtahec.org)
- Please contact us with any questions/suggestions
  - [Mark.Pasanen@uvmhealth.org](mailto:Mark.Pasanen@uvmhealth.org)
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