

Anesthesiology Performance Improvement and Reporting Exchange (ASPIRE)

Brain Health/Geriatric Workgroup Meeting Minutes – August 21, 2023

Attendance

| х | Abess, Xan (Dartmouth-Hitchcock) | | Mathis, Mike (MPOG) |
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| х | Berger, Miles (Duke University) | | Neuman, Mark (University of Pennsylvania) |
| х | Buehler, Kate (MPOG) | х | Pantis, Rebecca (MPOG) |
| х | Chen, Lee-Lynn (UCSF) | х | Schonberger, Rob (Yale/MPOG) |
| | Cuff, Germaine (NYU Langone Health) | х | Shah, Nirav (MPOG) |
| | Deiner, Stacie (Dartmouth-Hitchcock) (OOO) | | Vlisides, Phil (MPOG) |
| х | Donovan, Anne (UCSF) | х | Wade, Meridith (MPOG) |
| х | Edelman, Tony (MPOG) | | Whitlock, Liz (UCSF) |
| | Everett, Lucy (Massachusetts General Hospital) | x | Addo, Henrietta (MPOG) |
| х | Jacobs, Jeff (Cleveland Clinic Florida) | | |
| | Kheterpal, Sachin (MPOG) | | |
| х | Lacca, Tory (MPOG) | | |
| | Liu, Linda (UCSF) | | |
| | Loyd, Gary (Henry Ford Health System) | | |

1. Goals of Meeting

a. Ensure all attendees are caught up on conversations and progress over the last couple of years

- b. Obtain feedback on developing a new measure that demonstrates variation in care with administration of midazolam in the geriatric population
- c. Determine next steps for this group
 - i. Continue ad hoc meetings with correspondence over email
 - ii. Create a Basecamp forum to host conversations between meetings?

2. Recap of Progress thus far

- a. Email conversation initiated in August 2020 with interest in studying periop delirium
- b. Identified variables present in EHR across MPOG sites -> developed MPOG Concepts to capture preop cognitive assessments & postop delirium screening
- c. Met several times from Fall 2020 Winter 2021
- d. Presented update at July 2021 Quality Committee
- e. PCRC 0170 approved in 07/2022, study team lead by Xan Abess (Dartmouth) in *Pragmatic perioperative brain health screening in older surgical patients*
 - i. Two-part study: descriptive analysis of current MPOG data available around preop cognitive assessment or postop delirium screening; survey component to capture qualitative data around assessment & workflow at each site

3. MPOG Data

- a. Between 01/01/2018 07/31/2023
 - i. 22,545,381 total cases from 71 institutions
 - ii. 6,813,186 cases with patients > 65 across 70 institutions
- b. More than 60 brain health MPOG concepts now available
- c. Discussion:
 - i. *Xan Abess (Dartmouth)*: Many of the values coming over under the CAM totals are single elements of a sedation assessment and are 'artifact' in terms of being an actual delirium assessment.

4. Recommendation for Variable Mapping

- a. Preop
 - i. Cog screening: AD8, MME, MOCA, MiniCog
 - ii. Frailty Screening: Clinical Frailty Scale, Frail Scale, CSHA Frailty Index
- b. Postop
 - i. Delirium screening: 4AT, CAM, CAM-ICU
- c. *MPOG only captures data 4 hours before anes start through PACU or 6 hours after anes end

5. Measures of Interest

- a. % of patients age > X undergoing non-cardiac GA who received a midazolam intraoperatively
- % of patients age > 65 without preop hypotension undergoing GA for non-cardiac surgery who had episode of MAP <55 mmHg within 15 minutes of induction (adaptation of BP-05)
- c. % of patients screened preoperatively for cog impairment
- d. % of patients screened preoperatively for frailty
- e. % of patients screened postoperatively for delirium
- f. % of patients age > X undergoing GA with ETT who received more than 1.5mg/kg of single propofol dose for induction

- g. % of patients requiring sugammadex for rescue following full reversal by neostigmine/glycopyrrolate
- h. Discussion:
 - i. *Xan Abess (Dartmouth):* Given the variation in clinical practice even in the email chain and on this call, I would argue this is yet another reason or call to action for this group to do research using MPOG data to answer this question.
 - ii. *Miles Berger (Duke)*: I think the issue is lumping all benzos together...for longacting benzodiazepines, I think it's appropriate to avoid use in older adults to avoid the risk of falls. For midazolam, which is shorter-acting, in an anxious older adult patient, seems reasonable to use.
 - iii. Anne Donovan (UCSF): A few years ago, our practice shifted to stop giving midazolam to every patient but to transition to giving more judiciously to patients as it clinically made sense, weighing out the risks vs. benefits.

6. MPOG Data Presented - see slides:

- a. Use of Preoperative Midazolam across MPOG (age 70-79) graph
- b. Use of preoperative Midazolam across MPOG (age 80-89) graph

7. Proposed Midazolam Measure (MED-03)

- a. Midazolam use in patients in geriatric population
- b. Informational only (no threshold)
- c. Description
 - i. Percentage of geriatric patients who (do not) receive a benzodiazepine
- d. Threshold
 - i. Not Applicable Informational Only
- e. Measure time period
 - i. Pre-op start time Anesthesia end
- f. Inclusion
 - i. Geriatric patients who undergo procedures requiring general anesthesia
- g. Exclusion
 - i. ASA 5&6 cases
 - ii. Patients < 65 y/o?
 - iii. Others?
- h. Success criteria
 - i. No midazolam/benzodiazepine administered
- i. Provider Attribution
 - i. All anesthesia providers signed in at Anesthesia start?
 - ii. All anesthesia providers signed in at Anesthesia end?
 - iii. Providers signed in when midazolam administered?
- j. Discussion:
 - i. *Lee-lynn Chen (UCSF)*: CPOM is working on a similar measure and would be a good idea to collaborate with them
 - ii. Nirav Shah (MPOG Quality Director): Would agree- will reach out to Vilma Joseph, the chair of CPOM to align with that group on this measure build

<mark>8. Vote</mark>

Brain Health/Geriatric Workgroup

Poll | 2 questions | 9 of 10 (90%) participated

1. Should MPOG build a measure for midazolam administration in the geriatric population? (Single Choice) *

9/9 (100%) answered

| Yes | | (8/9) 89% |
|-----|--|-----------|
| No | | (1/9) 11% |

2. Which age range among the geriatric population should be included? (Single Choice) *

9/9 (100%) answered

| > 70 (| (3/9) 33% |
|--------|-----------|

9. Next Questions and Steps

- a. Workgroup agrees to continue to address measure spec questions via email as opposed to a Basecamp forum
- b. Should we recommend specific assessments for preoperative frailty/cognitive or postoperative delirium in the PACU?
 - i. *Miles Berger (Duke)*: Whatever tool we decide on, we should provide training to ensure the data documented is captured as intended
- c. Should we build a measure that tracks raters of PACU delirium screening in the PACU, knowing that it's going to be low?
- d. Are there experts in addition to this group that we want to hear more from at MPOG meetings? Contact Nirav Shah with your recommendations: nirshah@med.umich.edu
- e. Continue progress on PCRC 0170
 - i. *Xan Abess (Dartmouth)*: Will share survey results with this group via email after the meeting
- f. Consider additional research projects
- g. Continue to recommend sites to map Brain Health concepts