State of the Art Conference
VA Emergency Medicine (SAVE)

# New Research Priorities and Policy Recommendations from the State of the Art Conference on VA Emergency Medicine (SAVE)


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*on behalf of the SAVE conference organizing committee*



U.S. Department of Veterans Affairs
Veterans Health Administration
*Health Services Research & Development Service*

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VA Emergency Medicine (SAVE)

# Rationale for a SOTA Conference

**The VA Emergency Medicine (EM) Service has transformed over the past two decades**

- EM Board Certification: 16% of 1,331 physicians (2007) to 55% of 1,707 (2022)
- Facilities with EM Service: 9% (2007) to 33% (2022)
  - **Today** 139 VHA facilities (110 EDs and 29 UCCs)

# Veterans Health Administration (VHA)
# Emergency Medicine Facilities


MAP NOTES

1) VHA Site Types on this map come from the VSSC's Emergency Medicine Management Tool (EMMT) Cube and reflect Fiscal Year 2022 activity

**VA Health Care Site Types**

- Emergency Department
- Urgent Care Clinic
- 60-Minute Drive Time from VAMC
- U.S. State Boundary


Map created by VA Office of Rural Health (ORH) | Veterans Rural Health Resource Center - Gainesville | GeoSpatial Outcomes Division (GSOD) (JKA) | Last Updated: 8/12/2022| Map information provided by U.S. Dept of Agriculture (ERS), U.S. Dept of VA (VHA ORH, VSSC, GSSC), Esri | Esri ArcGIS Pro 2.9.2 | Geographic Coordinate System North America 1983 Albers Equal Area Conic Projection | 20220714 Bravata VA and Community Emergency Department Map | Questions? Email us at ORHGSOD@va.gov

# Why did we need a SOTA conference?

**VA Emergency Care provides care for a large and growing population**

- More than 3M annual Emergency Department (ED) and Urgent Care Clinic (UCC) visits (2M within VA)
  - Emergency care is the single largest category of VA's community care spending ($6.7B in FY2021), up 46% since 2020

***Given the growth and transformation of Veteran EM care, identifying areas of needed research and policy recommendations was recognized as a priority by the Office of Emergency Medicine leadership and HSR&D.***

# Choosing the Priority Focus Groups

- Over 50% VA ED visits are for Veterans ≥65 years
- Mental health and substance use visits are 6th most common reason for VA ED visits
- VA spends ~$500 million per month on non-VA emergency care

**VA's emergency care visits are older and more mental health needs than its civilian counterparts**

# Choosing the Priority Focus Groups

The SAVE conference focused on three priority groups:

1. Geriatric Veterans
2. Mental health and substance use needs
3. Non-VA emergency care in the community

# SAVE Conference Timeline

| | |
|---|---|
| OCT 2020-<br>JAN 2021 | Conference planning committee identified and invited potential workgroup leaders, discussed workgroup topics and conference objectives, format (virtual), and timeline |
| FEB-JUN 2021 | Workgroup leaders refined research questions, readings, and discussion topics, and invited individuals to participate in their workgroups. |
| JUL-AUG 2021 | Workgroup met virtually several times to discuss: the evidence and gaps in literature; potential research questions and policy recommendations; and research and policy recommendations to propose in the SAVE conference |
| JAN 2022 | First half-day virtual SAVE Conference session |
| JAN-FEB 2022 | Workgroups met independently to refine research and policy recommendations |
| FEB 2022 | Closing plenary half-day virtual session to share findings with VA leadership |
| MAR-APR 2022 | Organizing committee meetings to review workgroup reports |

# SAVE Participants

**SOTA PLANNING COMMITTEE**

Michael J. Ward
Dawn M. Bravata

Steven Asch
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**Mental Health**
Jason I. Chen, PhD
Christine Timko, PhD

**Community Care**
Anita A. Vashi, MD, MPH, MHS
Kristin Mattocks, PhD, MPH

**Workgroup participants**: ~15-20 per workgroup including VA and non-VA clinicians, researchers, and operational partners with expertise in EM, nursing, informatics, implementation, HSR

# SOTA Workgroup Process

**The planning committee asked each workgroup two questions:**

What important questions do **not** have sufficient evidence to guide practice and clinical policy? → Research recommendations

Where is the evidence sufficient to move to implementation? → Policy recommendations

# SOTA Products: Research and Policy Recommendations

The following slides describe the research and policy recommendations for the three priority groups:

1. Geriatrics
2. Mental health
3. Non-VA emergency care in the community.

# Geriatric Emergency Medicine Work Group Members

**Ula Hwang**
**S. Nicole Hastings**

Lauren Abbate
Cynthia Brandt
Kenneth Boockvar
Thomas Edes
Erica Gruber
Jin Ho Han
Christian Helfrich
William Hung
Orna Intrator
Michael Malone
Colleen McQuown
J. Michelle Moccia
Luna Ragsdale
Justine Seidenfeld
Sandra Simmons
Jennifer Sullivan
Katren Tyler
E. Camille Vaughan

# Geriatric Emergency Care Visits: Context

- Over 50% of Veterans seen in VA EDs and UCCs are ≥65 years: a higher proportion of older patients than any other healthcare system
- Older Veterans have higher medical burden and often intersecting cognitive and social challenges that increase care complexity
- VA has unparalleled geriatrics and extended care support programs available for older adults and has embraced Geriatric ED (GED) initiatives

# Geriatric EM: Evidence

VA Evidence Synthesis Program (ESP) conducted two evidence inventories:

- Geriatric risk assessment tools
- Telehealth interventions for older adults

# Geriatric EM Research Priorities: 1 of 5

## Variation in care and its impact on outcomes

- How do care processes (e.g., use of geriatric assessment tools, admission rates) vary across VA EDs?
- Which care processes and other sources of variation (e.g., staffing) drive outcomes for older ED patients?
- How do these processes impact care partners, ED staff?

# Geriatric EM Research Priorities: 2 of 5

**Strategies to improve the quality of ED discharges**

- Evaluating discharge process and outcomes/transitions/longitudinal care from the ED to community.
- Developing and testing novel approaches to improving quality of transitions from the patient's perspective.

# Geriatric EM Research Priorities: 3 of 5

**Evaluating telehealth support of geriatric emergency care needs**

- How can telehealth be used to support acute care in nursing homes (e.g., around decision-making of whether someone needs to be transferred to the ED for care)?
- What contextual factors influence success of telehealth initiatives?
- What use cases are safe and most effective in care of older adults?

# Geriatric EM Research Priorities: 4 of 5

## Impact of Geriatric ED (GED) initiatives

- How has GED accreditation affected patient outcomes, utilization, and costs?
- What is the impact on patients, care partners, and ED staff of the implementation of new clinical processes within and across VA EDs (human centered design, usability, audit & feedback, and perceived value of change)?

# Geriatric EM Research Priorities: 5 of 5

**Improve implementation of geriatric assessment tools in the ED**

- How to best identify and target at-risk patients?
- How to leverage existing risk scores available and unique to VA?
- Which patients to assess (comprehensive vs targeted case-finding)?
- Which tools to use?
- How should the ED address social influencers of health, and how best to integrate into ED workflow versus defer to outpatient?
- What are the best practices for incorporating inclusion of care partners as part of ED assessment and care?

# Geriatric EM Policy Priorities

1. For new quality measures: prioritize integrating concepts of the *4Ms (Mentation, Mobility, Medication, and What Matters)* and patient-centered outcomes
2. Enhance data sharing and measures standardization especially during electronic health record transition from Vista/CPRS to Cerner
3. Encourage adoption of clinical processes recommended in GED guidelines
   a) Identifying/targeting complex care needs patients
   b) Medication review/safety
   c) Transitions;
   d) ED documentation of care partners
4. All VA EDs should incorporate processes to support post-ED care transitions
5. Explore use of telehealth to expand access to pharmacy and social work
6. Establish a centralized office to coordinate and support GED initiatives (education, clinical care, and research)

# EM Mental Health Work Group Members

**Jason I. Chen**
**Christine Timko**

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Pam Owens
Fernanda Rossi
Jack Rozel
John Shuster
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# EM Mental Health: Context

Risk for suicide, substance use disorder (SUD), and management of acute psychosis, were identified as highest priority because:

- They are common reasons for Veteran ED visit
  - Most common reason for interfacility transfers (41% of all transfers)
- The ED is a key clinical setting for intervention
- During the COVID-19 pandemic: increase use of virtual mental health care
- VA Office of Mental Health and Suicide Prevention (OMHSP) implemented programs to enhance EM mental health care (RISK-ID, SPED, Advanced safety plan training)

# EM Mental Health: Evidence

An evidence compendium was prepared by the VA's ESP: "Effectiveness of Mental Health Interventions in the Emergency Department" (available on VA's intranet)

- **Suicide**: most randomized controlled trials showed a positive treatment effect on suicide reattempt. Common themes of successful implementation strategies:
  - Clinicians having sufficient time and privacy
  - Screening protocol or intervention being integrated into the ED workflow
  - Provider possessing rapport with patients and collaborating with colleagues
- **SUD**: primarily focused on opioids; limited by the number of randomized controlled trials evaluating interventions
- **Psychosis**: no primary studies on acute psychosis-focused ED interventions

# EM Mental Health Research Priorities: 1 of 3

## Enhance the reach of effective suicide interventions

- Which modalities (e.g., video, telephone, in-person) are most effective to reduce suicide reattempts and how to make interventions flexible so that more Veterans may access care?
- What are the essential components of bundled interventions to reduce suicide reattempt (e.g., telephone contact by mental health, screening, safety planning, care management)?
- How do Veterans' sociodemographic characteristics, intervention features (e.g., modality, duration, family involvement), and ED setting characteristics (e.g., rural vs urban, bed capacity) impact effectiveness?
- Which models of care delivery (e.g., dedicated psychiatric ED, consultation service) and personnel (e.g., psychiatrist only versus interprofessional model including APPs and licensed clinical social workers or psychologists, peer specialists) enhance access to effective and high-quality care?

# EM Mental Health Research Priorities: 2 of 3

**Develop and rigorously evaluate interventions to manage substance use disorders**

- What are the key outcomes (e.g., clinical outcomes, relapse, adverse events) of multicomponent interventions to manage opioid and non-opioid use disorders?
- Which components should be part of these bundled interventions (e.g., screening, care management, medications)?
- Which personnel (e.g., peer specialists) should deliver these interventions?

# EM Mental Health Research Priorities: 3 of 3

**Identify and examine safe and effective practices to manage acute psychosis**

- What is the effectiveness of emergency physician training in acute psychosis management?
- Do existing psychosis guidelines enhance patient and staff/clinician safety?
- What is the adoption and use of psychosis management guidelines?

# EM Mental Health Policy Priorities

1. Implementation of multicomponent interventions should consider clinician's time, privacy, and rapport with patients along with integration of any additional work (e.g., screening protocol) into existing ED workflow.
2. All ED/UCC patients at risk for suicide and those who present with substance use concerns should receive an intervention that includes: safety planning, brief counseling, linkage to subsequent care, and follow-up to ensure care was initiated.
3. All ED/UCC patients with SUD should be offered medications for those disorders, and all patients with an opioid overdose history or opioid use disorder should receive naloxone.
4. All ED/UCC patients with mental health symptoms should be screened for suicidality, alcohol use disorder, and drug use (including prescription drug misuse).
5. Sites should implement centralized, comprehensive, and collaborative longitudinal care management for mental health patients that includes the ED as one care setting.
6. Emergency care providers should receive training in the recognition and de-escalation of psychosis-or substance-induced aggression and agitation.
7. Enhance information sharing between VA and non-VA settings before, during, and after emergency care for patients with mental health and substance use conditions.

# Community ED Care Work Group Members

**Anita Vashi**
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Matthew Augustine
Kristina Cordasco
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Amy Rosen
Megan Vanneman
Arjun Venkatesh
Todd Wagner
Gregory Woskow

# Community ED Care: Context

- Since the 1950s, the U.S. Congress has passed various legislations authorizing the VA to provide emergency care to Veterans in non-VA settings.
- VA substantially expanded its role as a purchaser of community care with CHOICE and MISSION
  - Changes in emergency care payment authorities, notification processes, and reimbursement rates have simplified the process of approving and paying for community emergency care.
- Emergency care is now the single largest contributor to VA community care spending ($500M/month) and is rising rapidly as non-VA ED visit expenditures are up 46% since 2020.

# Community ED Care Research Priorities: 1 of 3

## Examine how expansion of emergency community care impacted ED utilization, access, and costs

**Particular interest in causal inference where the methods provide insights into the mechanisms of change, particularly modifiable factors*

- Was expansion associated with change in use of VA EDs/UCCs?
- What factors influence Veterans' choice of acute care setting?
- Is the increase in non-VA based ED/UCC care related to a decrease in VA ED/UCC care?
- How has case-mix or acuity changed by setting (ED, UCC, Primary care)?
- How has expansion of non-VA ED care impacted total VA expenditures related to acute unscheduled care, particularly for comparable episodes of care in different acute care settings?
- How do VA and non-VA virtual care options impact the use and costs of non-VA ED/UCC care?

# Community ED Care Research Priorities: 2 of 3

**Understand the follow-up needs among Veterans who have received community care emergency care (or urgent care)**

- Are care coordination needs different for different Veteran populations?
- What information do VA/non-VA providers, and Veterans, need to ensure safe care transitions?
- How can that information be efficiently and effectively conveyed/transmitted/accessed?
- How does use of non-VA acute care affect subsequent frequency of VA PCP and specialty care encounters; reliance on VA; and cost to VA?
- How does availability of virtual care options impact provider and Veteran decision-making, or facilitate Veterans receiving timely follow-up care?
- What are the barriers and facilitators to Veterans receiving timely follow up care in VA?

# Community ED Care Research Priorities: 3 of 3

**Compare the quality, safety, and Veteran experience between VA and community emergency care**

- How does Veterans' experiences and satisfaction differ across VA and non-VA acute care settings for different types of care needs?
- How does VA and non-VA ED care compare on both established ED quality and safety measures at both the patient and ED levels?

# Community ED Care Policy Priorities: Context

**March 2021: VA Central Office established the Care Optimization in the Emergency Department (CO-ED) initiative to:**

1. Optimize VA processes and resources to execute more economical methods of value-based care
2. Streamline care navigation processes to simplify Veteran access to care
3. Enhance partnerships and communication between VA and community EDs and hospital systems to increase care coordination

Once Veteran eligibility to receive care from a Community Care Network provider and which types of care the Veteran can receive, the VA issues an approved referral to authorize a specific standardized episode of care (SEOC).

- SEOC is a set of clinically related healthcare services for a specific illness or medical condition provided by an authorized provider during a defined period of time.

# Community ED Care Policy Recommendations

1. All local and national policies aimed at preventing ED visits in the community should include rigorous, quasi-experimental evaluations to determine:
   - Are programs/policies having intended effects?
   - Are there unintended consequences?
   - What are the important implementation factors/strategies to consider?
2. Policy makers should explore ways to use SEOCS/contracts to improve acute care services for Veterans.
   - How can community care SEOCs/contracts be a mechanism to better define standardized episodes of acute care?

# Community ED Care: Critical Barriers

**Barriers and challenges to better understand and enhance quality, timeliness, and use of care in the community:**

1. The need for complete, robust, and timely community care data in one searchable dataset
2. The need to link VA data with all payer data to understand Veterans' use other health insurance
3. How to account for changes in trends given known changes in ED utilization due to COVID?
4. Determine the impact of changing Veteran population (e.g., demographic shifts)
5. Understanding the role of Veteran choice in ED access from multiple perspectives
6. How to account for different diagnostic coding practices in VA and the community?
7. The challenge of capturing non-VA provider perspective and experience
8. The need to improve transparency of acute care SEOCs: Where do episodes begin/end? What is included?
9. The need to consider time, resources, and political will to conduct quasi-experimental evaluation

# Cross-Cutting Themes

## Common themes emerged from across all three groups:

- Need to better understanding the barriers, facilitators, harms in the use of **telehealth**
- Recommendation to use **implementation science** to develop and refine multicomponent interventions
- Using team and system science to enhance workforce development and to enhance the adoption of **screening** strategies into clinical workflow
- Importance of **care coordination** for post-ED follow-up and community ED coordination
- Leverage **VA data** to characterize variation in emergency care (patients, staffing, processes)
  1. Enhance data sharing and data access across departments, stations, and services
  2. Ensure seamless transition of data pertinent to EM research during the EHR transition
  3. Improve quality and timeliness of community care data

# Our impressions…

- Multidisciplinary workgroups: experts who are passionate about VA EM healthcare and research; the strength of the existing social capital is noteworthy and inspiring
- Dr. Chad Kessler is recognized an operational leader who is prepared and excited about moving evidence into practice
- Data availability: identified as a barrier to providing healthcare in real-time, conducting research, and program/policy evaluations
- If operational or policy changes are made, evaluations are essential

# Call to Action!

## Critical Need to Develop VA EM Research Capacity

- **Build the pipeline of VA EM investigators**
  - Mentor junior faculty, encourage them to enter VA fellowships, CDAs
  - Collaborate with EM investigators in academic affiliates
  - Collaborate with non-VA funders (NIH, AHRQ, foundations)
  - Encourage non-EM investigators to submit VA EM proposals
  - Join the existing network of VA EM investigators-biweekly virtual meeting (contact Mike Ward)

- **Invest in data infrastructure**
  - Including but not limited to validation of performance measures, sharing best practices for data science
  - Move existing data to places clinicians can use it in real-time
  - HAIG facility-level survey advisors, focused on SOTA topics

# Next Steps

- Incorporation in HSRD Priorities
- Directed HSRD Funding Opportunities
- *Academic Emergency Medicine* Special Issue ~Spring 2023
- Society for Academic Emergency Medicine Annual Meeting – May 2023 (Austin, TX)


SAEM
Society for Academic Emergency Medicine

VA Health Services Research & Development Service
HSR&D

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- VA Office of Rural Health