Protecting the Healthcare Workforce During COVID 19:

A rapid qualitative needs assessment of Employee Occupational Health in a national healthcare system

Karleen Giannitrapani, PhD, MPH, MA

Core Investigator, VA HSR&D Center for Innovation to Implementation (Ci2i)
Instructor, Stanford University School of Medicine, Primary Care and Population Health (PCPH)
Associate Director, Quality Improvement Resource Center (QuIRC) for VA Palliative care

March 9, 2021

NO CONFLICTS OF INTEREST

- FUNDING: VA Grants (C19 20-207)
- FOLLOW: @Kgiannitrapani 
- CONTACT: Karleen@stanford.edu

Team Members

Cati Brown-Johnson, PhD

Matt McCaa, MSOT

Susan N. Giannitrapani, MSN, APRN, CCRN, NP

Sara Singer, PhD MBA

Karl A. Lorenz, MD, MSHS

Elizabeth Yano, PhD, MSPH

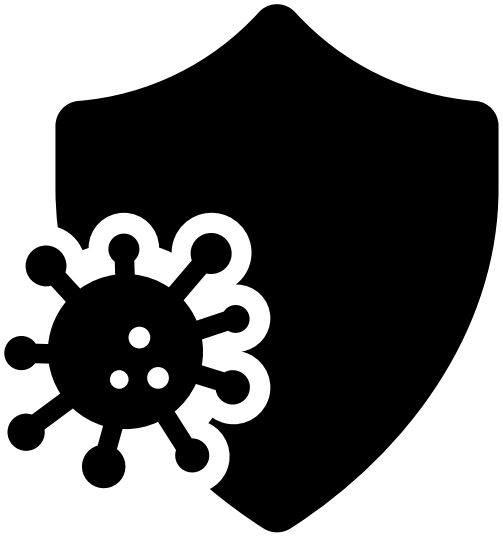
Wendy Thanassi, MD

Cheyenne DeShields, BS

Natalie Connell, BS

Abbreviations

- EOH= employee occupational health
- VHA= Veterans Health Administration
- HCW= healthcare worker



Overview

- Objective: Understand Expanding and changing role of Employee Occupational Health during COVID-19
- Methods: Rapid analysis (Stanford Lighting report)
- Results: Five themes identified around interdependent needs of VHA EOH
- Conclusions: Themes highlight local and system level barriers and facilitators of EOH role expansion
- Future research/next steps

VHA Employee Occupational Health

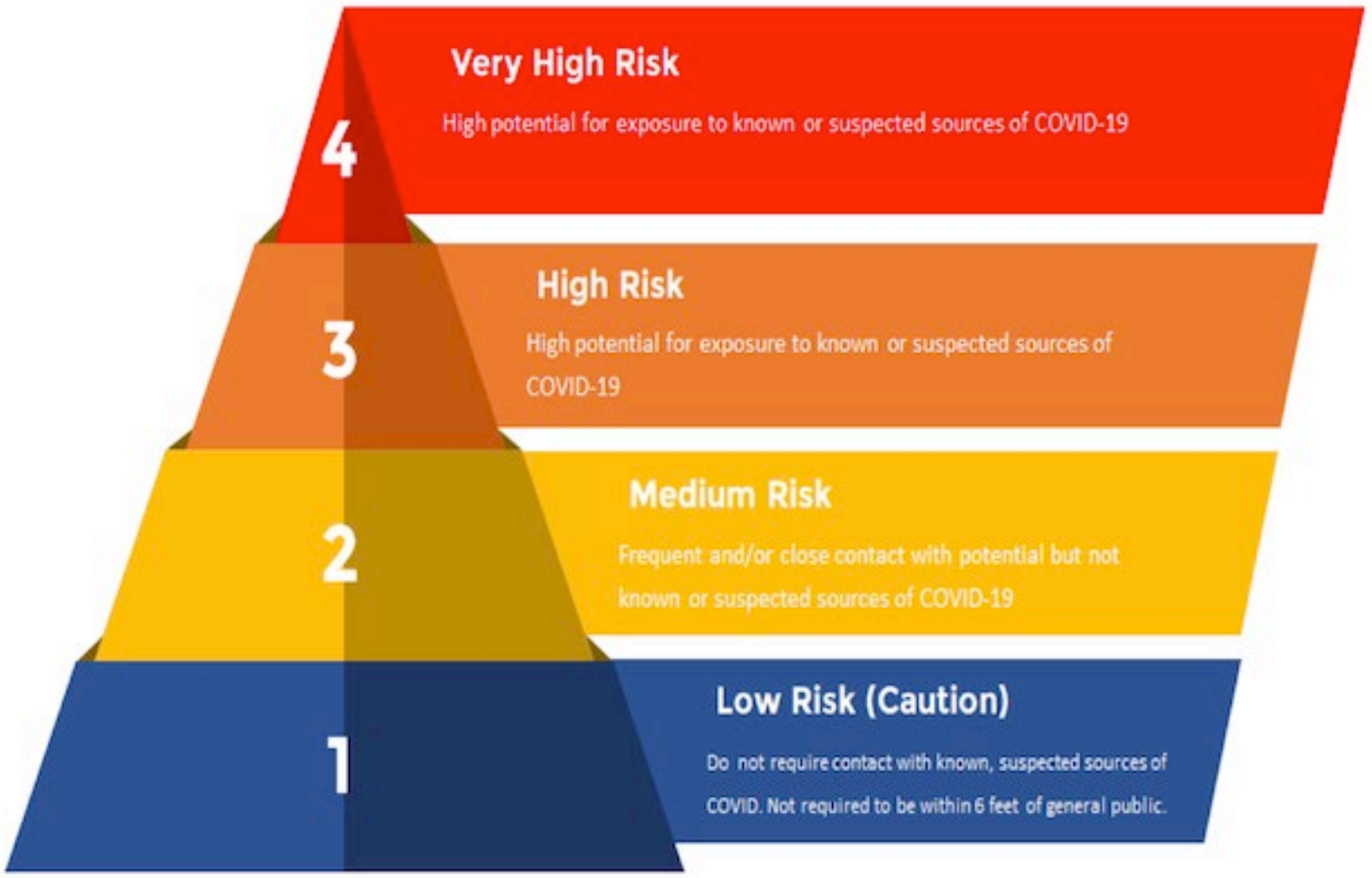
- VHA EOH assumes responsibility for the "safety and health" of over **half-million HCWs, trainees, and volunteers**
- VHA serves **over 9 million veterans,** with 10,000 in Community Living Centers, VA nursing homes vulnerable to COVID-19

Veterans Health Administration, 2018

VHA EOH during COVID-19

- On March 15, 2020, the US Deputy Under Secretary for Health for Operations and Management circulated guidance allowing asymptomatic HCWs exposed to COVID-19 to continue to work after consulting EOH and requiring HCWs to report to EOH if symptoms appeared at work, **tasking EOH with a central role in COVID management.**

Giannitrapani, 2021



OSHA, 2020

Giannitrapani, 2021

VHA EOH during COVID-19

Get Us PPE, 2020

Assuming new roles to protect HCWs from COVID-19 as an occupational hazard was further challenged by:

- Continuously changing COVID-19 guidelines
- Big role changes
- National PPE shortages

Objectives

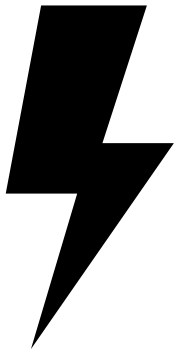
- Through this rapid needs assessment, we aimed to identify learnings from the field to support the vastly expanding role of EOH providers in the VHA, a national healthcare system
- What do EOH providers need in order to be able to keep healthcare workers (HCWs) safe during COVID-19?
- What are the facilitators and barriers of EOH role expansion?

Methods

- 21 key informant qualitative interviews with EOH providers using a purposive sampling approach seeking to maximize variation
  - Interview guide: developed with input from two EOH providers. Addressed factors that could support or undermine readiness of EOH providers for COVID-19 extended roles
  - Purposive sampling
    - snowball approach: start with subject matter experts → other EOH providers

Stanford Lightning Report

- Preliminary report (n=10) produced by September 2020
- Circulated to study advisors, VHA EOH leadership, and participants for feedback
- Incorporated feedback → finalized 5 themes



Providers (n=21)		**Site (n=15)**					
Type		**Location**		**Size**		**Rural/Urban**	
NP/PA	8	Northeast	5	Small	6	Rural	4
RN	3	Mid-Atlantic	3	Mid	3	Urban	11
MD/DO	10	Midwest	2	Large	6		
Gender		Southwest	1				
Women	14	West	3				
Men	7						

Sample demographics

Themes

We report needs in five themes organized around systems and people at the local/micro (i.e., within VHA facilities) and national/macro (i.e., across the VHA system) level.

1) Infrastructure to support population management at the local (micro) and national (macro) level

2) Mechanisms for information sharing across system (macro)

3) Sufficiently resourced staffing through detailing at local level (micro)

4) Connected and resourced local and national leaders (micro/macro)

5) Mental health needs crossed both systems and people domains

Theme 1. Infrastructure to support population management

"There's many, many things that an electronic medical record, specifically designed for employee health, would do for us… that would be a lot of the surveillance programs that we have to run [existing patient medical record] is of no use with respect to tracking flu vaccinations in employees, and so we have to set up separate databases for that. And databases are always a little messy. You know, accidents happen with databases, and data gets lost." -MD

Theme 1. Infrastructure to support population management

Across sites, respondents mentioned system **needs** at the *micro and macro* level by participants around population management

- Tools and mechanisms (i.e., employee-facing EHR or coordinated spreadsheet databases) that could prioritize employee privacy while facilitating infection control measures
- Additional clinical space that can adequately address limit cross-contamination for persons under investigation
- Support opportunities for innovation such as the use of QR code readers for testing and COVID vaccination
- Integrated backend infrastructure with workers compensation programs

Theme 1: Barriers and Facilitators

- Participants cited lack of resources and recent cutbacks in EOH as major **barriers** to better population management
  - Lack of electronic health record (EHR) tools was a major barrier

- **Facilitators** included
  - previous experience with infectious disease outbreaks,
  - training in public health management,
  - incident command system training

Giannitrapani, 2021

Theme 2. Providers reflected a strong **need** for information-sharing within and across VHAs

Barriers to information-sharing included the high volume of information and the unmoderated status of a VHA-wide listerv.

- The listserv could be perceived by more senior providers as "extremely frustrating... every two weeks someone is asking that [same] question [due to] revolving door [staffing]."(MD)
- Some providers reflected a broader sense of discohesive information-sharing due to the listserv: "Questions running rampant on the forum, there's no control."(NP)

Theme 2. **Facilitators** to information included access to external information sources and experts, as well as existing all-VHA-EOH listserv

- "...how I learned more and [tracked] the movement of the pandemic… [I] went to bed reading the CDC."(NP)
- Strong connections with academic medicine facilitated information sharing.
- Providers reported benefitting from "daily huddles with [academic infectious disease providers when the] knowledge base [was] exploding."(MD)
- A listserv accessible to all VHA EOH was a major facilitator for information sharing.

Theme 2. Mechanisms for information sharing

"And of all things the listserv has been a big advantage for that because the—they can ask a question and anybody can answer those questions, and online is very—whenever they ask a question, give the instruction that says what we're doing so that it's very clear this is what this instruction says we should be doing. And then we'd standardize it across the way and through the entire VA."-MD

Theme 3. Sufficiently resourced staffing through detailing

"We've been putting—staff has been putting in a lot of overtime because we don't have sufficient staff to take on all the tasks and keep people at their 40 hour weeks. We are tapping into, as I said, the labor pool, but that unfortunately turns out to be transient, and while they may be very competent, we train them and then they have to go back."-MD

Theme 3. EOH providers reported that people, time, and skills were **needed** to adequately resource EOH in the local site environment.

- Lack of trained and consistent staff locally was a **major barrier.**
  - Staffing needs doubled or tripled during surges, but numerous sites reported that these "temporary folks who were detailed [were] slowly being pulled back into their own units,"(NP) representing a major risk as the US met the winter COVID surge.

- Alignment of human resource capital with EOH workforce needs was reported to **facilitate** new role requirements and protect the EOH workforce
  - Furthermore, even with adequate people on hand, "the biggest thing we wanted… is cross-train[ing]" in areas vital to population health: call center management, testing, follow-up, and positive case management (RN).

Giannitrapani, 2021

Theme 4. Connected and resourced local/national leaders

"If you look at occ health being the VA, it is pretty much fractured into the local levels. If you go from one VA to another VA facility, the programs will be different. There is no central leadership guidance that maintains that control or that maintains enough standards. And especially to say, "are you following what we decided we're going to do?"-MD

Theme 4. National Level

Providers emphasized the **need** for coherent guidance from national ***(macro)*** EOH leaders and interdisciplinary facility level executives.

- EOH providers wanted national level leaders to direct with authority during Covid-19: "What you'd like is occupational health [central office leaders] coming out with rules to say 'This is what we need to do'."(MD)
- A perceived **barrier** was the lack of adequate resources for leaders at the national level: "there isn't a coherent union of all the VHA [centers across the country]" (MD).

Theme 4. Local level

- Successes at the local level *(micro)* were perceived as **facilitated by** interdisciplinary connections and inclusion in "incident command".
- These incident command structures generally included site leaders and daily meetings/huddles within EOH.
- At a micro level, local leaders who were well-networked were able to connect with crisis response "incident command" structures, facilitating better EOH support for HCWs.

Theme 5. Strategies to address HCW mental health

"Definitely the anxiety is the barrier. If people freak out, you know, it's kind of like, they're like 'well, the face shield doesn't cover the whole face.' Well, okay… You covered your mucus membranes, right? So, like what's the problem? There's no problem. But then I'm kind of telling you that; I don't tell them that because, again, like I said, it's a little bit like this thing where if we have so much exposure that we kind of get a little bit desensitized, you know, but other people might not."-MD

Giannitrapani, 2021

Theme 5. EOH providers found themselves in **need** of strategies to support HCW mental health during COVID.

- **Barriers** to accessing such tools related to the volume of HCW need and lack of local support for EOH.
- EOH providers consistently reported that they themselves were overwhelmed, and some reported nearing burnout.
- **Facilitators** included local EOH leadership incorporating chaplain assistance in addition to referring HCW to Employee Assistance Programs.

Giannitrapani, 2021

Theme 5. Strategies to address HCW mental health

"The first week in July we had 92 employees with confirmed positive. Those are confirmed positive. We had over 150 at one time I think, employees that were out with symptoms consistent with COVID or high-risk exposures at home or something. So that, that's a pretty big increase. I honestly, I got burnt out. The nurse practitioners and I got burnt out. I got pretty close to resigning because it wasn't working very well. But we did talk to people, people started understanding, particularly as the numbers went up. And we got some detailed help. So we brought in some nursing staff, administrative staff, PSAs, and some of the comp and pen docs came over."-MD

Giannitrapani, 2021

Themes Summary

1) Infrastructure to support population management at the local (micro) and national (macro) level

2) Mechanisms for information sharing across system (macro)

3) Sufficiently resourced staffing through detailing at local level (micro)

4) Connected and resourced local and national leaders (micro/macro)

5) Mental health needs crossed both systems and people domains

Summary

- In this timely systematic account of national EOH provider experiences, we found **needs** at the micro/local and macro/national level centered on both systems and people.
- Primary **barriers** to EOH assuming expanded roles were related to:
  - Funding for systems (e.g., EHR implementation)
  - People including limited staffing and leadership at both local and national levels.

Summary

- **Facilitators** of EOH assuming new challenging and dynamically changes roles during COVID included:
  - Training or access to expertise (in infectious diseases, public health management, and disaster management)
  - Existing mechanisms for information-sharing (national reports from CDC and a VHA-specific listserv)
  - Flexible and responsive staffing
  - Leveraging other institutional expertise not previously affiliated with EOH (e.g., chaplains to support mental health and bereavement).

Conclusions

- Understanding how best to rapidly expand roles and scale the dynamically changing job demands of EOH during an infectious outbreak is needed in advance of future pandemics
- Promising practices beyond COVID: critically inform future EOH preparedness
  - Immediate and long-term benefits of equipping EOH with the tools to expand their role in managing HCW safety.
- Promising practices beyond VHA
  - Thinking beyond acute disasters, a high-functioning national EOH community in an integrated system could potentially positively address long-standing health and civil wellness issues

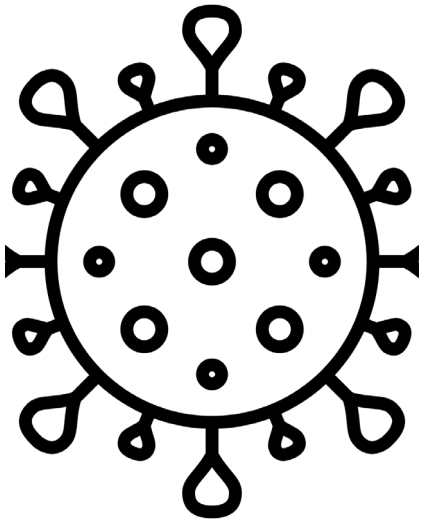
Future directions

- Some recommendations from our participants are already being enacted by VHA. What other changes can be implemented? How can we continue to adapt?

- Second round of interviews:
  - How can EOH help manage HCW mental health?
  - Needs of EOH for COVID-19 vaccine distribution

Giannitrapani, 2021

Southern Nevada Health District, 2020



Comments and questions?

Thank You!

Suggested Citation:

Giannitrapani K. Protecting the healthcare workforce during COVID 19: A rapid qualitative needs assessment of employee occupational health in a National healthcare system. VA Cyberseminar. March 9, 2021.