

Healthcare Coalition Response:

A Performance Support Tool for On-Call Healthcare Coalition Staff

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OFFICE OF
PUBLIC HEALTH
PREPAREDNESS



Objectives

- 1) Describe the Boston Healthcare Preparedness Coalition (HPC) and Boston Public Health Commission's (BPHC) Office of Public Health Preparedness (OPHP)
- 2) Describe the BPHC Medical Intelligence Center (MIC) Duty Officer (DO) program
- 3) Discuss the development process for our MIC DO Job Aids
- Provide recommendations for building your own coalition duty officer job aids

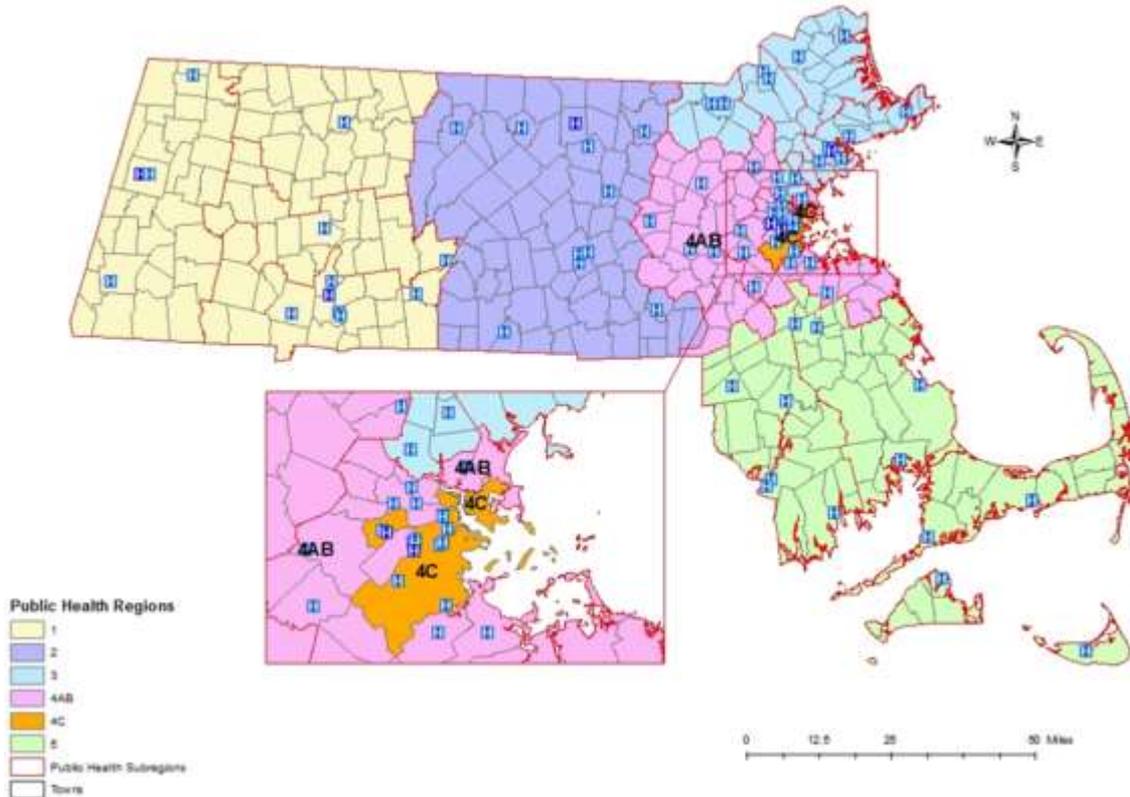
ALISON RANDALL

- OPHP: Senior Program Manager, Health Care System Preparedness
- Boston HPC: Manager

BEN MCNEIL

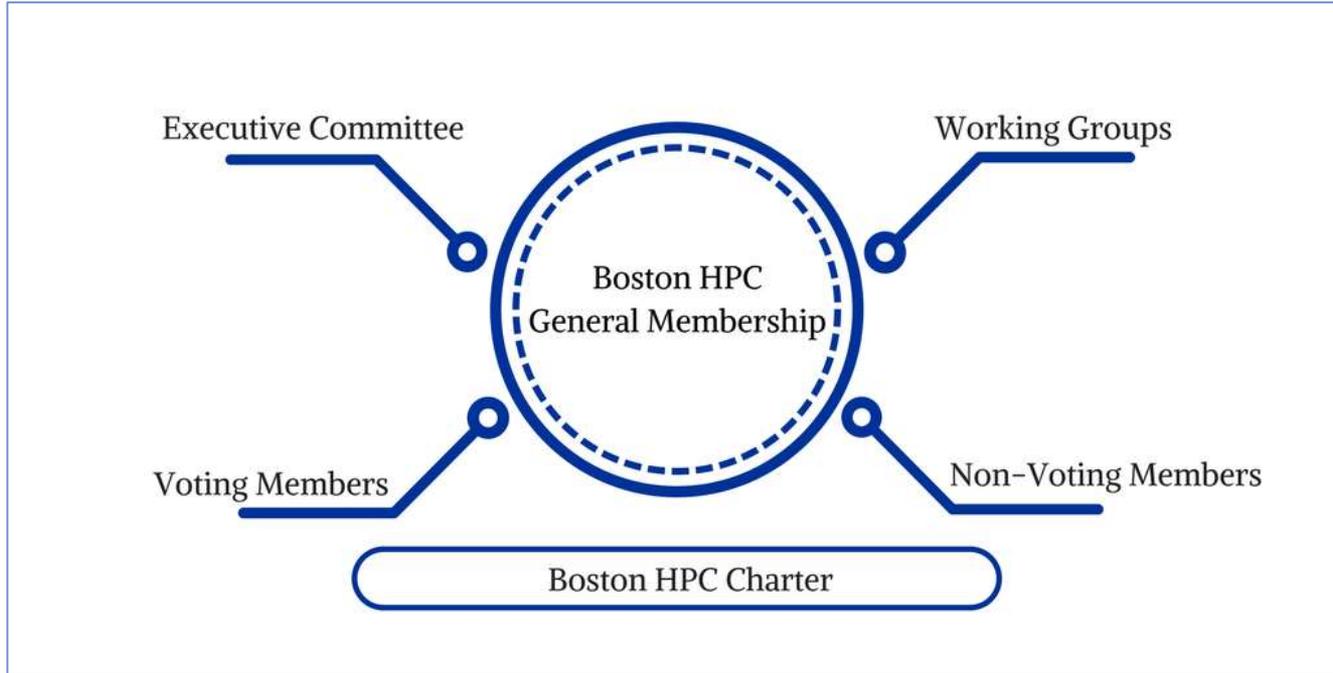
- OPHP: Associate Director, Healthcare System Preparedness, Response and Recovery
- Boston HPC: Planning & Operations

Coalition Model in MA



- 6 healthcare coalition regions in the state
- City of Boston is Region 4C = Boston Healthcare Preparedness Coalition (HPC)

Boston HPC Organization



Healthcare Landscape in Boston

Boston ESF 8

1 Public Health

- ~1,000 employees

1 Municipal Ambulance Service

- Over 350 EMTs & Paramedics
- 16 Stations

24 Community Health Centers

20 Licensed Hospitals

- 6 Level 1 Trauma Centers
- 12 Acute Care

Expansive Long Term Care, Home Health, Specialty Care, Mental Health

Vision

The Office of Public Health Preparedness envisions a **resilient Boston** through healthy, informed, and connected communities that are supported every day and during emergencies by **strong, integrated public health and healthcare systems**.

Mission

The mission of the Office of Public Health Preparedness is to **enhance community, public health, and healthcare system resilience** in order to prepare for, respond to, and recover from emergencies that impact **health and access to healthcare**.



Community Resilience

Disaster Behavioral Health



Education and Training: DelValle Institute for Emergency Preparedness

Healthcare System Preparedness



Public Health Emergency Management

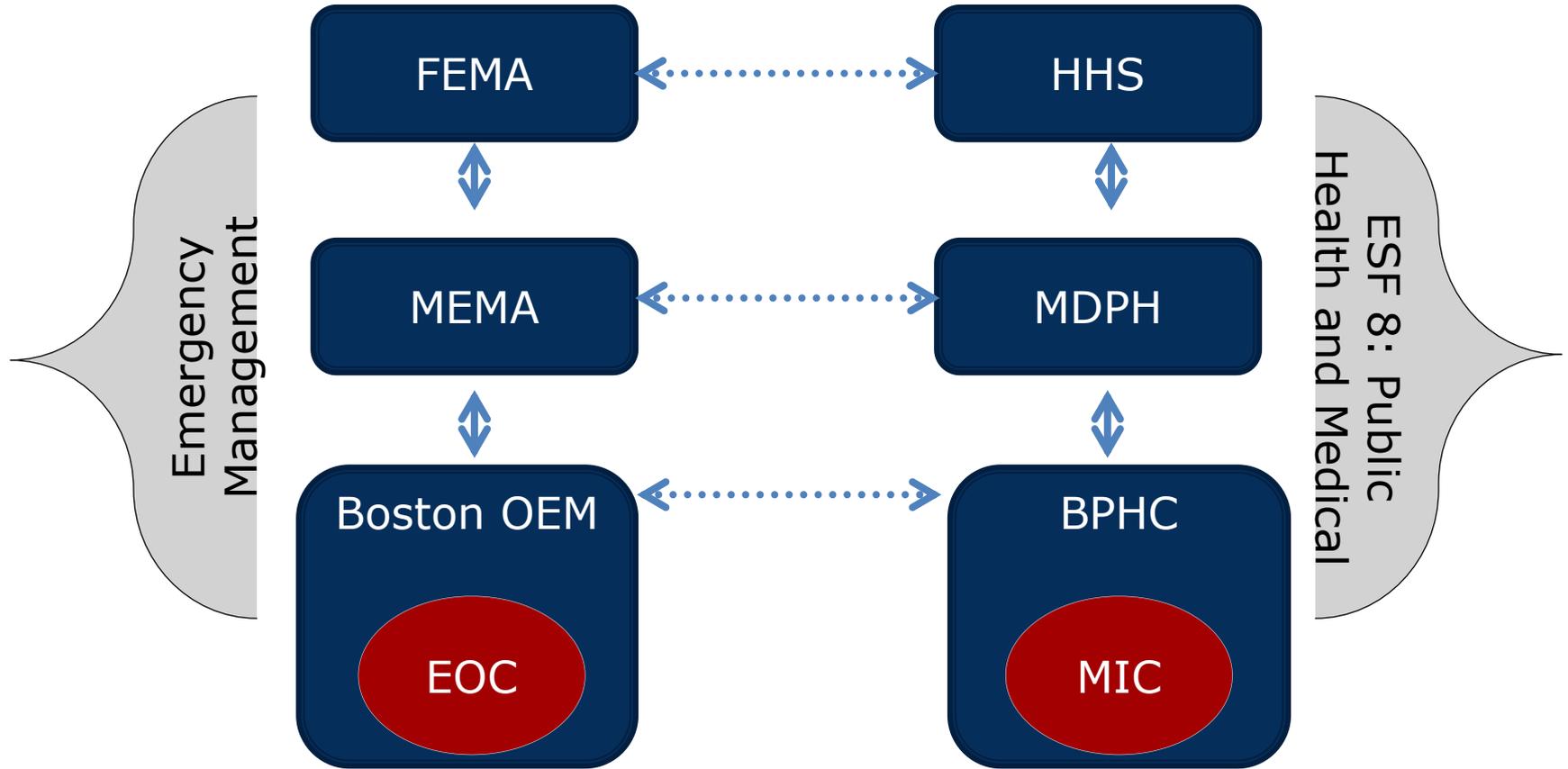
Public Health and Healthcare Response & Recovery Operations



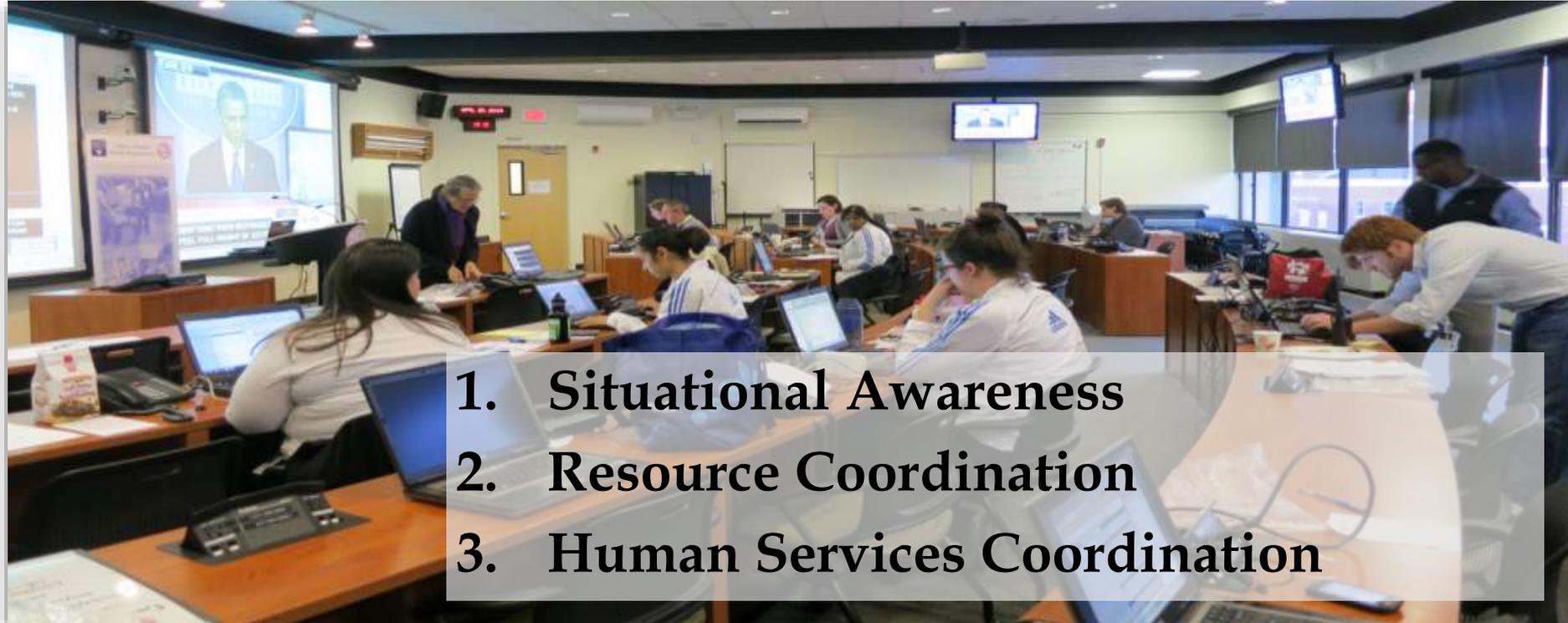
Administration &
Finance



ESF-8 in the City of Boston



Medical Intelligence Center (MIC)



- 1. Situational Awareness**
- 2. Resource Coordination**
- 3. Human Services Coordination**

MIC Duty Officer Model



Challenges

- Different than daily role for most
- Unfamiliar equipment and platforms
- Complex information gathering and decision-making
- Limited time for training & exercises

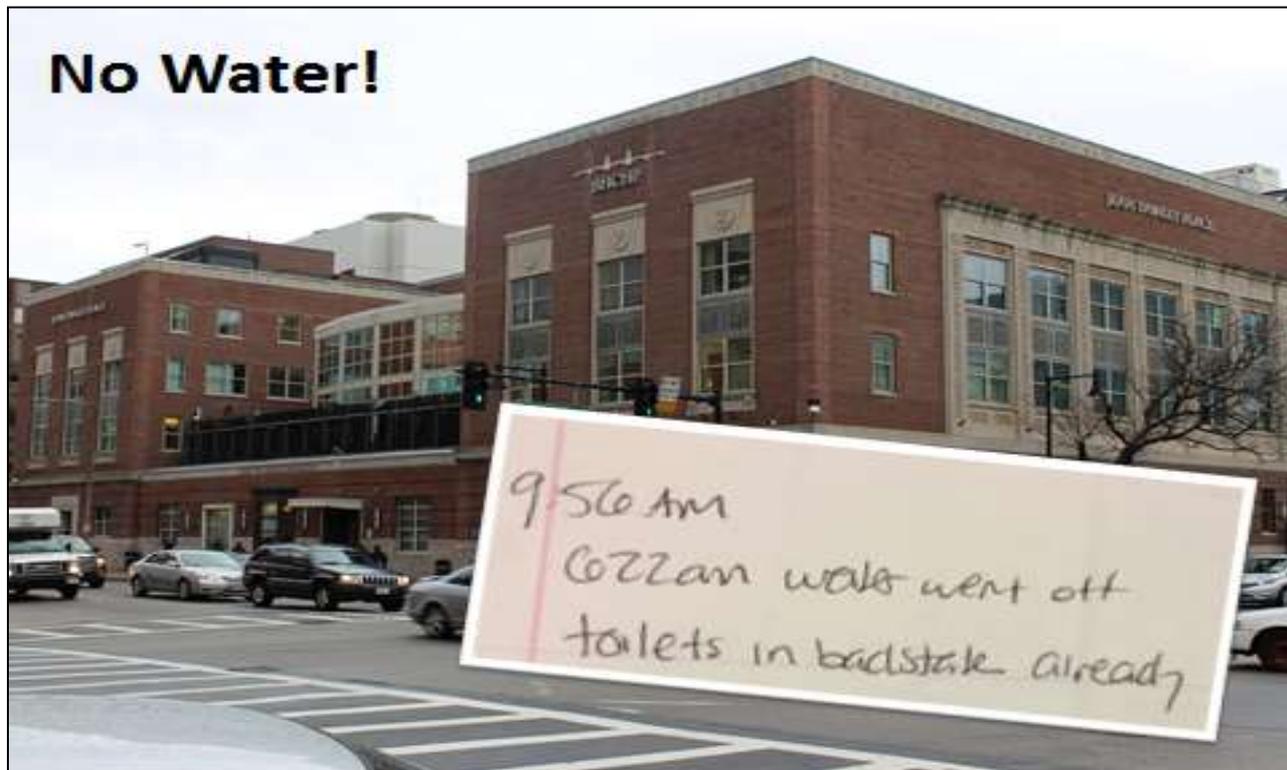


Scenario



Scenario

No Water!



Three Hours Later...

9:41am – 12:56pm



3 emails



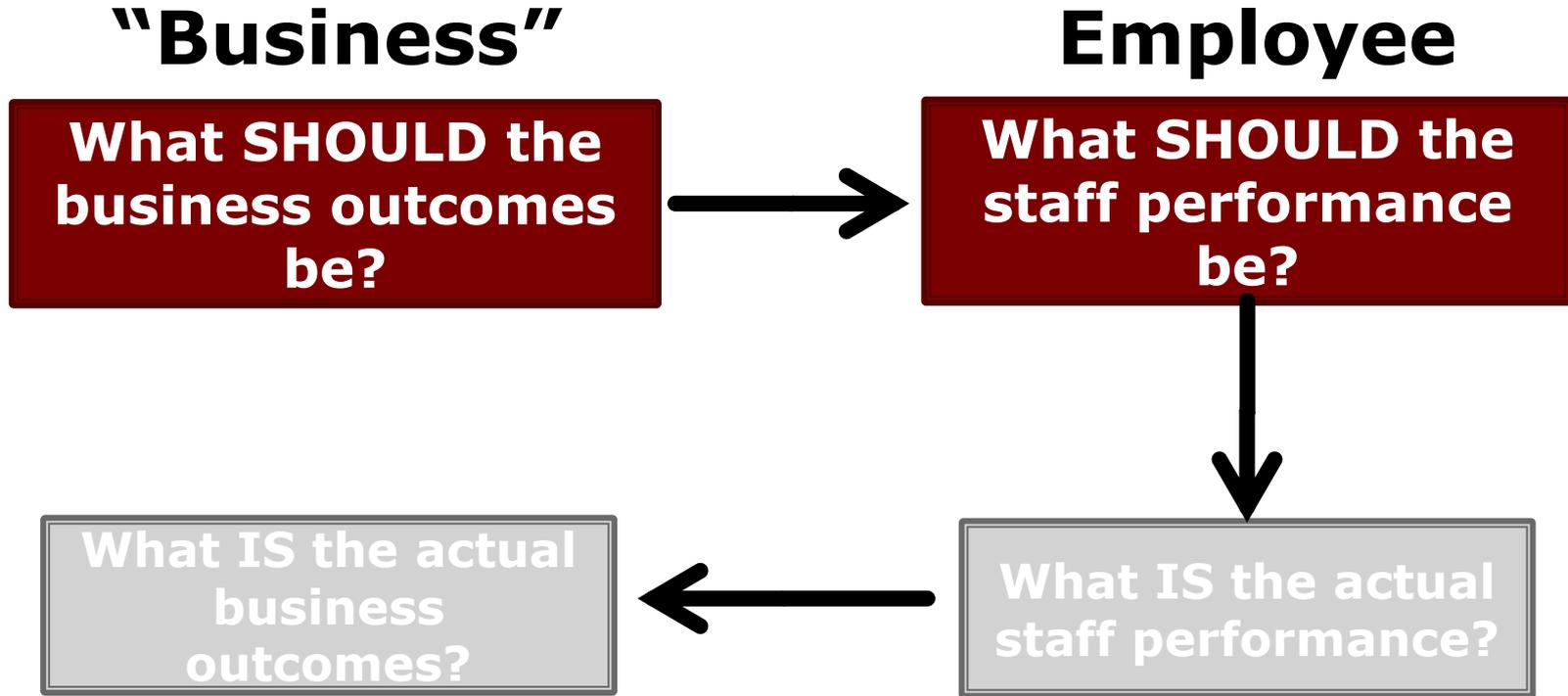
26 phone calls



64 text messages

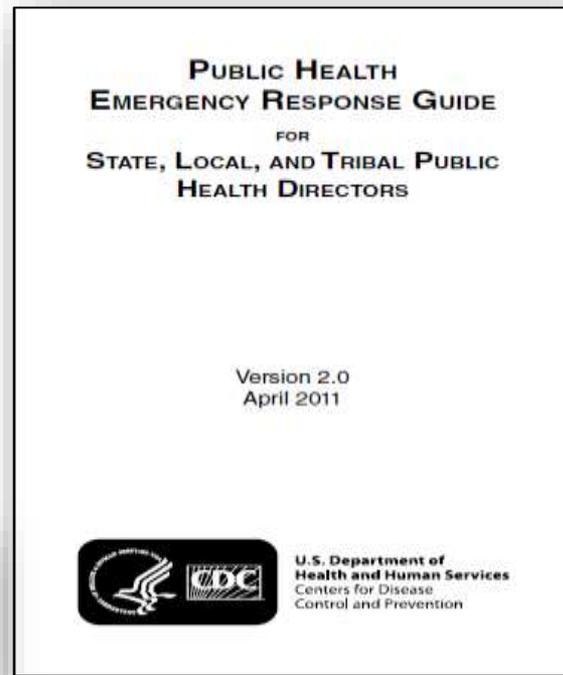
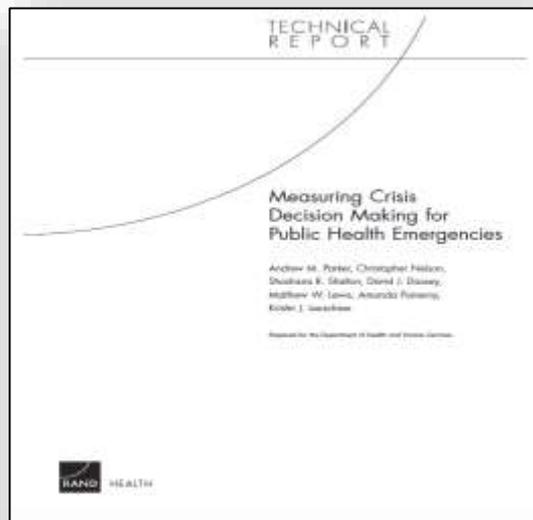


Performance Improvement



****Staff performance = accomplishments and behaviors***

Drawing from Other Models

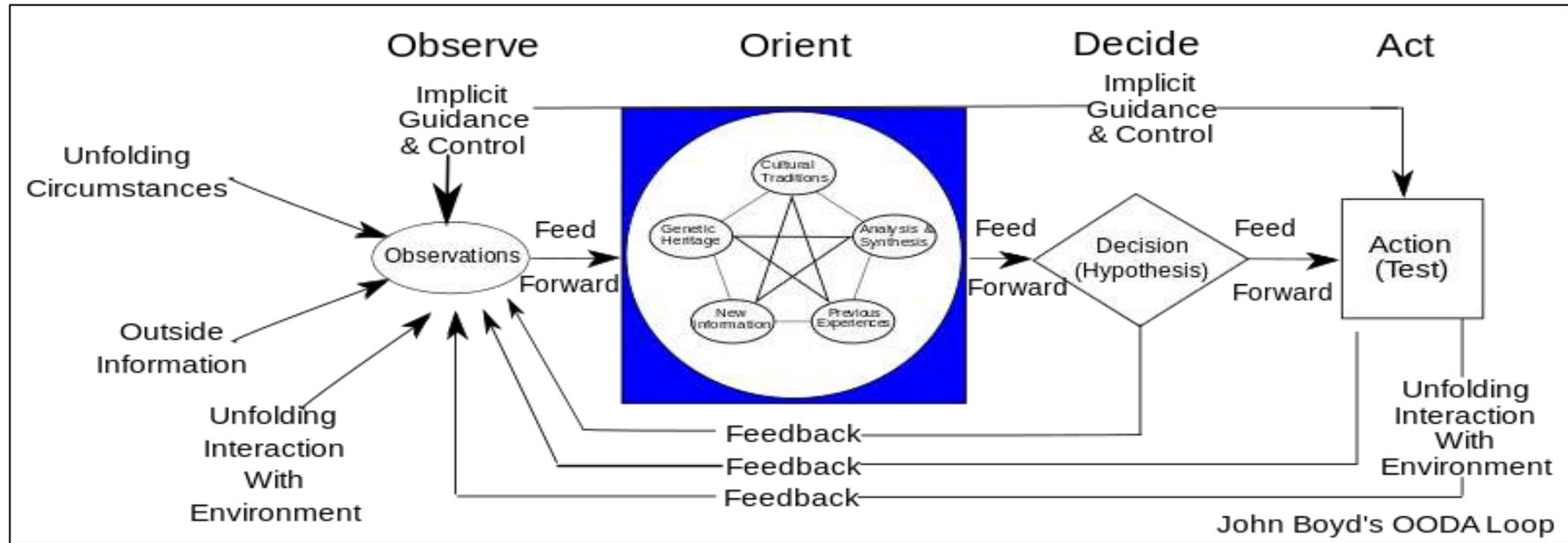


in Disaster Medicine

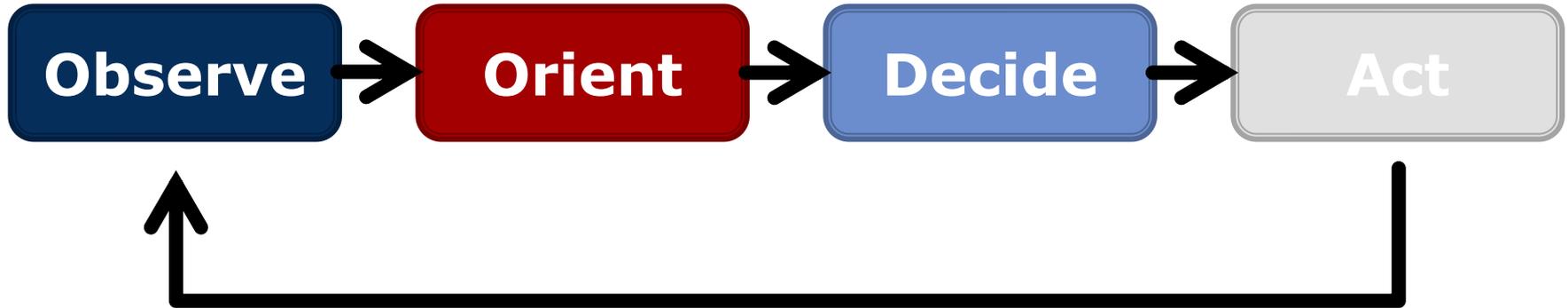
CONCEPTS
A Framework for Training Public Health Practitioners
in Crisis Decision-Making

Harvey Kayman, MD, MPH; Tea Logar, PhD

OODA Loop



OODA Loop



OBSERVE

Gather & document
complete
information

ORIENT

Determine
potential impact.
Classify incident.

Consult w/
response partner
or 2nd DO

ACT

Activate plans and systems

ACT

Send notification

ACT

Activate MIC

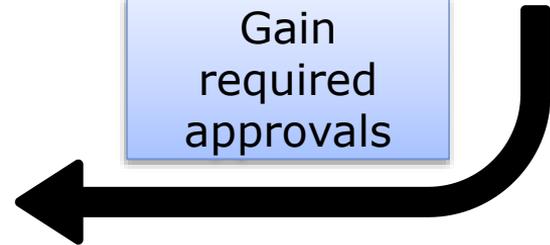
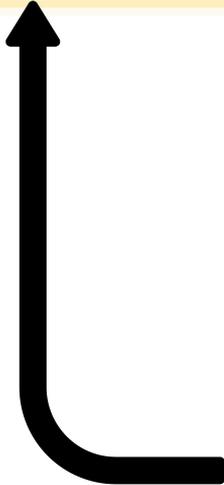
DECIDE

1. Send a notification?
2. Activate plans or systems?
3. Activate the MIC?

Gain
required
approvals

DEMOBILIZE

Close out
event



Job Aid: Observe

OBSERVE – Questions by Incident Type

Date: _____	Incident Start Time: _____	Initial Notification Time (to BPHC): _____
Incident End Time: _____		
Initial notification received by:	Initial Point of Contact	
<input type="checkbox"/> Phone	Name: _____	Position: _____
<input type="checkbox"/> Email	Phone: _____	Email: _____
<input type="checkbox"/> BFD Alert	Incident location: _____	
<input type="checkbox"/> Pager	Cause of event: _____	
<input type="checkbox"/> Other: _____		
Incident Type(s):	<input type="checkbox"/> Infrastructure (ESF 8)	<input type="checkbox"/> Mass Casualties
<input type="checkbox"/> Hazardous Materials	<input type="checkbox"/> Infrastructure (Not ESF 8)	<input type="checkbox"/> Security Threat
		<input type="checkbox"/> Disease

General REMINDER: Do not disseminate sensitive information

Question	Answer	Source	Credible / Verified?
# of patients (or potential patients)			
Severity and types of injuries? <i>(e.g., lacerations, bullet wounds, crush injuries, etc.)</i>			
Anticipated duration of the incident			
Other agencies currently responding			
Actions taken to address incident <i>(e.g., EMS on-scene, evacuation occurring, etc.)</i>			
What specific ESF 8 facilities are affected?			
What ESF 8 facilities may potentially be affected?			
What special populations are affected? <i>(e.g., language, age, medical issues, socio-economic...)</i>			
Is transportation or travel disrupted? How?			
Has this incident received media attention?			
How will current and forecasted weather conditions affect the situation?			
Have ESF 8 agencies been notified? Who, how?			

Hazardous Materials ***Notify Environmental Health immediately***

Question	Answer	Source	Credible / Verified?
Is the substance known? If yes, what is it?			
Are there any contaminated casualties? If so, has patient decontamination been performed?			
Has a HAZMAT Response Level been designated by BFD?			
What geographical area is affected?			
Is any evacuation or shelter in place ordered?			

Job Aid: Orient

ORIENT – Assess potential impact and classify

POTENTIAL IMPACTS

Red = Major impact
Purple = Potentially Major

NOTES

Healthcare System Impacts

Surge of Patients
(Boston)

Actual, # Potential,
Dead

Access to Health Care

Provision of Health
Care services

- Phase 2 (11-30 pts)
- Phase 2 (11-30 pts) w/ specialty pts
(e.g. burn patients, children, relation exposures)
- Phase 3 (31-50 pts)
- Phase 4 (51-100 pts)
- Phase 5 (> 100 pts)
- Contaminated patients
- Roadway access to HCF blocked
- Subway access blocked
- Travel restrictions
- Not accepting ED pts
- Non-critical functions disrupted
- Staffing availability
- Multiple facilities affected
- HCF partial evacuation
- HCF evacuation
- Critical functions disrupted

Public Health Impacts

Provision of Public
Health services

Health of the public

- BPHC Facility impacted
(e.g. building integrity, building safety and security,
utilities, building occupants)
- Critical functions impacted: (list)
- Large # people impacted (pts & witnesses)
- Contaminated environment
(e.g. unsafe air, water, food, property)
- Actual or potential transmission of disease
(highly pathogenic, RT Agent, etc.)

Other Impacts

Public Information

- MIC receiving many inquiries from press or
our partners
- Large amount of media coverage
- Inaccurate or unclear information, rumors

Classify Incident

Classification	# Potential Patients	Potential Disruption to ESF 8
<input type="checkbox"/> Major	Significant number (MCI Phase 2 w/ specialty, or MCI Phase 3 or above)	Major (TBD)
<input type="checkbox"/> Moderate/ Minor	Minor to moderate number (MCI Phase 2)	Moderate (TBD)
<input type="checkbox"/> Informational	Little to none (MCI Phase 1)	Little to none
<input type="checkbox"/> Developing/ Unknown	Unclear	Unclear

Job Aid: Decide

DECIDE – Based on classification incident type, determine MIC actions

Classification	Notifications	MIC Activation	Potential Plans & Systems
Major	<p>Immediate</p> <ul style="list-style-type: none"> <input type="checkbox"/> Phone Call to COBTH EM Coordinator <input type="checkbox"/> Page MOPH Duty Officer <input type="checkbox"/> Everbridge high-priority alert (email, SMS) to OPHP staff, COBTH EM Coordinator. <hr/> <p>MIC Alert/Advisory</p> <ul style="list-style-type: none"> <input type="checkbox"/> Alert or Advisory to MIC Advisory Distribution List via business email, SMS text, and business phone confirmation required. 	<p>Level 2: Partial Level 3: Full</p> <p>Physical</p> <p>*See steps below</p>	<p>Systems</p> <ul style="list-style-type: none"> <input type="checkbox"/> WebEOC Create an incident in the City of Boston WebEOC <input type="checkbox"/> EMTrack <input type="checkbox"/> MassMAP <p>Plans</p> <ul style="list-style-type: none"> <input type="checkbox"/> BPHC EOP <input type="checkbox"/> Family Reunification Plan
Moderate/Minor	<p>Initial Notification</p> <ul style="list-style-type: none"> <input type="checkbox"/> Email via Everbridge or the MIC email account to all OPHP staff, COBTH Emergency Management Coordinator <input type="checkbox"/> Hospital impacts: Phone call to the COBTH Emergency Management Coordinator <hr/> <p>MIC Advisory (if necessary)</p> <ul style="list-style-type: none"> <input type="checkbox"/> Advisory to MIC Advisory Distribution List via business email only. No confirmation of receipt is needed. 	<p>Level 1: Enhanced</p> <p>Virtual</p>	<p>Systems</p> <ul style="list-style-type: none"> <input type="checkbox"/> WebEOC Create an incident in the City of Boston WebEOC
Informational	No notification required.	Steady State	No action required.
Developing/Unknown	<p>Initial Notification (if necessary)</p> <ul style="list-style-type: none"> <input type="checkbox"/> Email via MIC email to OPHP staff, COBTH Emergency Management Coordinator <input type="checkbox"/> Hospital impacts: Phone call to the COBTH Emergency Management Coordinator 	Steady State	No action required.

Steps to Physical MIC Activation (Level 2 or Level 3)

- Convene and facilitate a conference call with all available MIC Duty Officers
- Assess OPHP availability to staff the MIC utilizing Everbridge Mass Notification
- Develop an initial MIC Operations Plan to be disseminated
- Activate and set-up the MIC
- Staff the Boston Emergency Operations Center (EOC), ESF8 Desk

Summary

Recommendations for Adapting

- 1) Understand your coalition's response expectations and responsibilities
- 2) Assess your coalition's Duty Officer's skill set and training capacity
- 3) Test and gain feedback. Again and again.

Thanks!



To download the job aids and key references:

<https://delvalle.bphc.org/dutyofficer>

For more information contact:

bmcneil@bphc.org

(617) 343-6953

References

- Centers for Disease Control and Prevention (2011). *Public health emergency response guide for state, local, and tribal public health directors*. Retrieved from <https://emergency.cdc.gov/planning/responseguide.asp>
- Kayman, H. & Logar, T. (2016). A framework for training public health practitioners in crisis decision-making. *Disaster Medicine and Public Health Preparedness*, 10, 165-173.
- Minarcine, S. (2012). Health security intelligence: Assessing the nascent public health capability (Unpublished Master's Thesis). Naval Postgraduate School, Monterey California.
- Parker, A.M., Nelson, C., Shelton, S.R., Dausey, D.J., Lewis, M.W., Pomeroy, A., & Leuschner, K.J. (2009). *Measuring crisis decision making for public health emergencies*. Santa Monica, CA: RAND Corporation.
- Pritchett, B.A. (2008). *Qualia: A prescription for developing a quality health threat assessment* (Unpublished Master's Thesis). Naval Postgraduate School, Monterey California.
- Robinson, D.G. & Robinson, J.C., Phillips, J.J., Phillips, P.P., & Handshaw, D. (2015). *Performance consulting: A strategic process to improve, measure, and sustain organizational results*. Oakland, CA: Berrett-Koehler.