# ESTABLISHING AN EFFECTIVE EMERGENCY MANAGEMENT PROGRAM

**LEARNING COLLABORATIVE FOR CBOS:** 

EMERGENCY MANAGEMENT AND PREPAREDNESS, SESSION 2: PROGRAM MANAGEMENT

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### INTRODUCTIONS

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### WHERE WE ARE IN THE SERIES:

- Section I: EM Program Development
  - Regulatory Concerns (CMS EM Final Rule)
  - Comprehensive EM Program & Team

- Section 3: EM Program Evaluation
  - Exercise Development
    - Objectives
  - Exercise Evaluation Guides (EEGs)
- Section 4: EM Program Improvement
  - After Action Report (AAR)
  - Program Corrective Action Plan (CAP)

### **REVIEW OF SESSION TOPICS:**

- Section 2: EM Program Management
  - Risk Assessment/Hazard Vulnerability Analysis (HVA)
  - Plan Development
    - Healthcare Incident Command System (HICS)

# RISK ASSESSMENT & HAZARD VULNERABILITY ANALYSIS

EM Program Management

### HAZARD VULNERABILITY ASSESSMENT

### Four Step Approach



I - HAZARD SURVEY



2 - VULNERABILITY ASSESSMENT



3 - OPERATIONAL IMPACT ANALYSIS



4 - PLANNING PRIORITIZATION

### **HVA-HAZARD SURVEY**

### Resources:



Coalition Partners



DOH/Drexel Public Health Risk Assessment



County EMA



Local Emergency
Planning
Commission (LEPC)

## RISK AND VULNERABILITY

- The Hazard Vulnerability Analysis (HVA)
   determines the overall risk to the institution.
  - Probability of occurrence x severity potential
- HVA drives planning, training and exercises for managers
- Enhances safety initiatives

### HAZARD AND VULNERABILITY ASSESSMENT TOOL HUMAN RELATED EVENTS

KAISER

PE							PERMANENTE:	
EVENT	PROBABILITY	SEVERITY = (MAGNITUDE - MITIGATION)						
		HUMAN IMPACT	PROPERTY IMPACT	BUSINESS IMPACT	PREPARED- NESS	INTERNAL RESPONSE	EXTERNAL RESPONSE	RISK
	Likelihood this will occur	Possibility of death or injury	Physical losses and damages	Interuption of services	Preplanning	Time, effectivness, resouces	Community/ Mutual Aid staff and supplies	Relative threat*
SCORE	0 = N/A 1 = Low 2 = Moderate 3 = High	0 = N/A 1 = Low 2 = Moderate 3 = High	0 = N/A 1 = Low 2 = Moderate 3 = High	0 = N/A 1 = Low 2 = Moderate 3 = High	0 = N/A 1 = High 2 = Moderate 3 = Low or none	0 = N/A 1 = High 2 = Moderate 3 = Low or none	0 = N/A 1 = High 2 = Moderate 3 = Low or none	0 - 100%
Mass Casualty Incident (trauma)								0%
Mass Casualty Incident (medical/infectious)								0%
Terrorism, Biological								0%
VIP Situation								0%
Infant Abduction								0%
Hostage Situation								0%
Civil Disturbance								0%
Labor Action								0%
Forensic Admission								0%
Bomb Threat								0%
AVERAGE	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0%

<sup>\*</sup>Threat increases with percentage.

RISK = PROBABILITY \* SEVERITY 0.00 0.00 0.00

## HVA-HAZARD SURVEY

### "All Hazards"

- Natural Hazards
- Technological Hazards
- Human Hazards
- Hazardous Materials

#### **EVENT**

#### **SCORE**

Electrical Failure Generator Failure Transportation Failure Fuel Shortage Natural Gas Failure Water Failure Sewer Failure Steam Failure Fire Alarm Failure Communications Failure Medical Gas Failure Medical Vacuum Failure HVAC Failure Information Systems Failure Fire, Internal Flood, Internal Hazmat Exposure, Internal Supply Shortage Structural Damage

**AVERAGE SCORE** 

### **HVA-VULNERABILITY ASSESSMENT**

What is likely?

What Risk are known?

What historical data is available?

EVENT	PROBABILITY			
	Likelihood this will occur			
SCORE	0 = N/.4 f = Low 2 = Moderate 3 = High			
Hurricane	3			
Tornado	2			
Severe Thunderstorm	3			
Snow Fall	3			
Blizzard	3			
Ice Storm	3			
Earthquake	2			
Tidal Wave	0			
Temperature Extremes	3			
Drought	3			
Flood, External	3			
Wild Fire	2			
Landslide	1			
Dam Inundation	1			
Volcano	0			
Epidemic	3			
AVERAGE SCORE	2.19			

### HVA – OPERATIONAL IMPACT

Magnitude vs. Mitigation

What is the Impact?

Level of Preparedness?

What is the Response?

		SEVERITY = (MAGNITUDE - MITIGATION)						
EVENT	PROBABILITY	HUMAN IMPACT	PROPERTY IMPACT	BUSINESS	PREPARED- NESS	INTERNAL RESPONSE	EXTERNAL RESPONSE	
	Likelihood this will occur	Possibility of death or injury	Physical losses and damages	Interuption of services	Preplanning	Time, effectivness, resouces	Community/ Mutual Aid staff and	
SCORE	0 = AMA 1 = Low 2 = Moderate 3 = High	0 = AMA 1 = Low 2 = Moderate 3 = High	0 = N/A 1 = Low 2 = Nloderate 3 = High	0 = AMA 1 = Low 2 = Moderate 3 = High	0 = N/A 1 = High 2 = Moderate 3 = Low or none	0 = N/A 1 = High 2 = Moderate 3 = Low or none	0 = N/A 1 = High 2 = Moderate 3 = Low or none	
Hurricane	3	3	3	2	2	3	2	
Tornado	2	3	3	2	2	3	2	
Severe Thunderstorm	3	1	1	2	1	1	1	
Snow Fall	3	1	1	2	1	2	1	
Blizzard	3	1	2	3	2	2	1	
Ice Storm	3	1	1	2	2	2	1	
Earthquake	2	2	2	3	3	3	1	
Tidal Wave	0	0	0	0	0	0	0	
Temperature Extremes	3	1	0	1	2	2	1	
Drought	3	1	0	1	3	3	1	
Flood, External	3	1	0	2	3	3	2	
Wild Fire	2	1	0	1	3	3	3	
Landslide	1	1	0	1	3	3	1	
Dam Inundation	1	1	0	0	0	0	0	
Volcano	0	0	0	0	0	0	0	
Epidemic	3	3	0	3	3	3		
AVERAGE SCORE	2.19	1.31	0.81	1.56	1.88	2.06	1.06	

### HVA- PLANNING PRIORITIZATION

Highest Risk Score sets planning priority.

Review Annually

	SEVERITY = (MAGNITUDE - MITIGATION)							
EVENT	PROBABILITY	HUMAN IMPACT	PROPERTY IMPACT	BUSINESS	PREPARED- NESS	INTERNAL RESPONSE	EXTERNAL RESPONSE	RISK
	Likelihood this will occur	Possibility of death or injury	Physical losses and damages	Interuption of services	Preplanning	Time, effectivness, resouces	Community/ Nutual Aid stalf and	Relative threat*
SCORE	0 = AVA 1 = Low 2 = Moderate 3 = High	0 = N/A 1 = Low 2 = Nloderate 3 = High	0 = N/A 1 = Low 2 = Moderate 3 = High	0 = N/A 1 = Low 2 = Moderate 3 = High	0 = N/A 1 = High 2 = Moderate 3 = Low or none	0 = N/A 1 = High 2 = Moderate 3 = Low or none	0 = N/A 1 = High 2 = Moderate 3 = Low or none	0 - 100%
Hurricane	3	3	3	2	2	3	2	83%
Tornado	2	3	3	2	2	3	2	56%
Severe Thunderstorm	3	1	1	2	1	1	1	39%
Snow Fall	3	1	1	2	1	2	1	44%
Blizzard	3	1	2	3	2	2	1	61%
Ice Storm	3	1	1	2	2	2	1	50%
Earthquake	2	2	2	3	3	3	1	52%
Tidal Wave	0	0	0	0	0	0	0	0%
Temperature Extremes	3	1	0	1	2	2	1	39%
Drought	3	1	0	1	3	3	1	50%
Flood, External	3	1	0	2	3	3	2	61%
Wild Fire	2	1	0	1	3	3	3	41%
Landslide	1	1	0	1	3	3	1	17%
Dam Inundation	1	1	0	0	0	0	0	2%
Volcano	0	0	0	0	0	0	0	0%
Epidemic	3	3	0	3	3	3		67%
AVERAGE SCORE	2.19	1.31	0.81	1.56	1.88	2.06	1.06	35%

# PLAN DEVELOPMENT

**EM PROGRAM MANAGEMENT** 

### POLICIES AND PROCEDURES

How do you write policies and procedures for a disaster?

- Base on: Risk Assessment/Hazard Vulnerability Assessment
- Plans for: All-hazards plan, Evacuate vs. Shelter in Place, Communication
- Updating: At least annually
  - Or...?
  - Who updates?

### **ALL-HAZARDS EMERGENCY PLAN**

- What does this plan consist of?
  - Base plan
    - Critical Functions (Delegation of Authority/Business Continuity)
  - Risk Assessment
  - Communication Plan
  - Other Annexes...?
    - Incident Response Guides/Checklists
- When should it be reviewed?
- How do you include partner agencies?

### EVACUATION VS. SHELTER IN PLACE

### **Evacuation**

- When is this the most appropriate response?
- What do you do to communicate evacuation?

### Shelter in Place

- When is this the most appropriate response?
- What do you do to communicate evacuation?

Do any local regulations govern the testing of each of these plans?

### COMMUNICATIONS PLAN

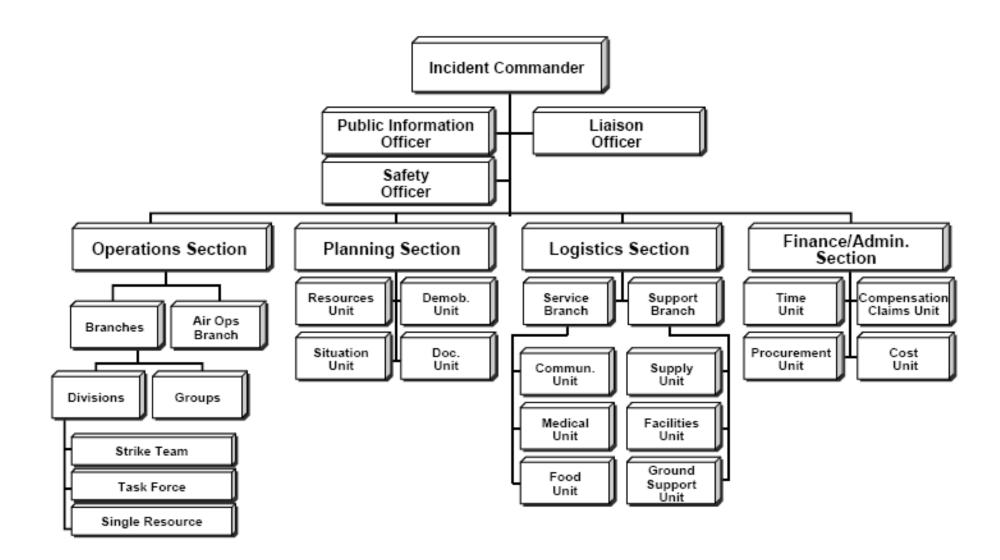
- Why is this key?
  - When will you need the communication plan?
- What should the plan include?
  - Internal/External
- What other information should this include?
  - Think plans for medical records and business continuity

# HEALTHCARE INCIDENT COMMAND SYSTEM

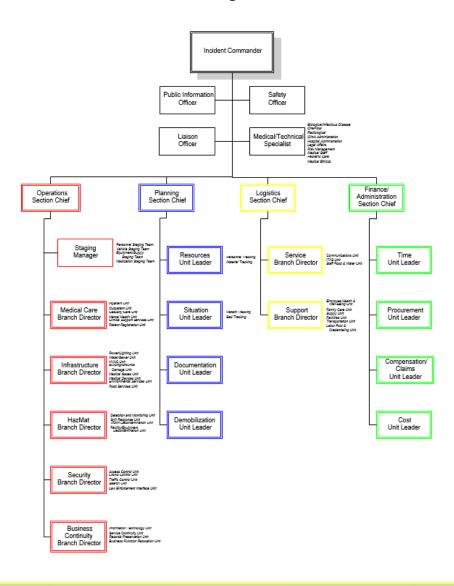
**EM PROGRAM MANAGEMENT** 

### ICS KEY CONCEPTS – WHY THE SYSTEM EXISTS

- **Unity of command** Each individual participating in the operation reports to only one supervisor. This eliminates the potential for individuals to receive conflicting orders from a variety of supervisors, thus increasing accountability, preventing freelancing, improving the flow of information, helping with the coordination of operational efforts, and enhancing operational safety. This concept is fundamental to the ICS chain of command structure.
- Common Terminology incident command system promotes the use of a common terminology and has an
  associated glossary of terms that help bring consistency to position titles, the description of resources and how they
  can be organized, the type and names of incident facilities, and a host of other subjects. The use of common
  terminology is most evident in the titles of command roles, such as Incident Commander, Safety Officer or Operations
  Section Chief
- **Span of Control** To limit the number of responsibilities and resources being managed by any individual, the ICS requires that any single person's span of control should be between three and seven individuals, with five being ideal.
- **Incident Action Plan** (IAPs) ensure cohesion amongst anyone involved toward strictly set goals. They provide supervisors with direct action plans to communicate incident objectives to both operational and support personnel. They include measurable, strategic objectives set for achievement within a time frame



#### **HICS Incident Management Team Chart**

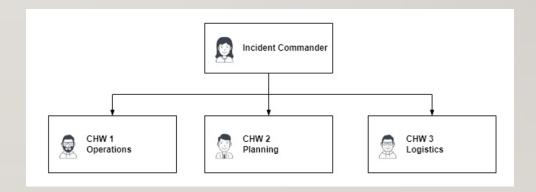


### ICS IN A COMMUNITY BASED ORGANIZATION

### FLEXIBLE: SINGLE PERSON ICS



# PLANNED EVENT: MULTIPLE PERSON ICS



# INCIDENT COMMAND SYSTEM (ICS) BASICS

- ICS consists of a standard management hierarchy and procedures for managing temporary incident(s) of any size
- ICS procedures should be pre-established and sanctioned by participating authorities, and personnel should be well-trained prior to an incident.
- ICS is interdisciplinary and organizationally flexible
  - Meets the needs of a jurisdiction to cope with incidents of any kind or complexity
  - Allows personnel from a wide variety of agencies to meld rapidly into a common management structure with common terminology.
  - Provide logistical and administrative support to operational staff.
  - Be cost effective by avoiding duplication of efforts, and continuing overhead

### **NEXT IN THE SERIES...**

- Session III: EM Program Evaluation
  - Exercise Development
     (Objectives & Exercise Evaluation Guides, EEGs)
- Session IV: EM Program Improvement
  - After-Action Report (AAR)
  - Program Corrective Action Plan (CAP)

### **RESOURCES & CONCLUSIONS**

- FEMA's Developing and Mantaining Emergency Operations Plans (CPG 101)
- FEMA Independent Study Courses (for Planning, ICS, and more)
- <u>Learning Collaborative for CBOs:</u>
   <u>Emergency Management and Preparedness</u>
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Thank you!