



## Enhancing the Resilience of Healthcare and Public Health Critical Infrastructure

### *A Workshop*

#### AGENDA

**Day 1:** December 9, 2024 | 9:00 AM – 5:30 PM ET

**Day 2:** December 10, 2024 | 9:00 AM – 3:00 PM ET

#### BACKGROUND

When disaster strikes, critical infrastructure failures—from loss of power and water to failures of IT infrastructure and systems—can follow. Strengthening the resilience of healthcare and public health (HPH) critical infrastructure requires ongoing investment, innovation, and collaboration across all levels of government, the private sector, and civil society during steady state, and response, and recovery phases. HPH infrastructure, technology, and operations are rapidly changing and are increasingly interdependent and interconnected. Threats to the nation's critical social and physical infrastructure systems are also rapidly evolving and highly complex, posing potentially new or growing risks of disruption and challenging the assumptions used to design and protect these systems.

#### WORKSHOP OBJECTIVES

The National Academies [Forum on Medical and Public Health Preparedness for Disasters and Emergencies](#) has organized this workshop **to examine strategies, policies, and innovative actions to improve the resilience of HPH critical infrastructure to impacts from disasters and other emergencies**. Speakers and attendees will:

- Explore the evolution of the HPH critical infrastructure sector from infrastructure, technology, and operational perspectives.
- Assess the evolving threat landscape, including emerging risks and vulnerabilities specific to HPH critical infrastructure including the built environment, water and wastewater, energy, IT and communications, supply chain, and workforce.
- Evaluate strategies to enhance resilience, including risk reduction and mitigation strategies needed to address the changing infrastructure and threat landscapes.
- Define the characteristics of a resilient HPH critical infrastructure sector and outline the steps necessary to achieve this resilience.

**MONDAY, DECEMBER 9, 2024**

**SESSION 1 Welcome Remarks and Fireside Chat**

*\*\*Catered breakfast provided at 8:30 a.m. ET\*\**

**9:00 AM      Welcome and Opening Remarks from the Workshop Chair (10 min)**

**Paul Biddinger, Workshop Planning Committee Chair**  
Chief Preparedness and Continuity Officer  
Mass General Brigham

**9:10 AM      Welcome and Opening Remarks from the Co-Chairs of the Forum on Medical and Public Health Preparedness for Disasters and Emergencies (5 min)**

**Asha M. George**  
Executive Director  
Bipartisan Commission on Biodefense

**W. Craig Vanderwagen**  
Co-Founder and Director  
East West Protection, LLC

**9:15 AM      Fireside Chat (60 min)**

**MODERATOR**  
**Paul Biddinger, Workshop Planning Committee Chair**  
Chief Preparedness and Continuity Officer  
Mass General Brigham

**PANELISTS**  
**Nathan Weed**  
Chief of Resiliency and Health Security  
Washington State Department of Health

**Peggy Duggan**  
Executive Vice President  
Chief Physician Executive  
Chief Medical Officer  
Tampa General Hospital

**Julie Hiromoto**  
Partner and Director of Integration  
HKS

**10:15 AM      Break (15 min)**

## SESSION 2 Exploring How an Evolving Risk Landscape Necessitates an Evolved Response

*This session will level-set the workshop by summarizing the U.S. HPH critical infrastructure landscape, reviewing past and current performances, and anticipating future threats.*

### 10:30 AM Understanding Past and Current Performances (60 min)

#### **MODERATOR**

**Andrew Pickett**, *Planning Committee Member*

Director

Bureau of Emergency Preparedness and Response

Pennsylvania Department of Health

#### **PANELISTS**

**TJ Christl**

Director

Office of Critical Infrastructure Protection

Administration for Strategic Preparedness and Response (ASPR)

**Melissa Harvey**

Assistant Vice President for Enterprise Emergency Operations

HCA Healthcare

**Theresa Cullen**, *virtual*

Director

Pima County Health Department

### 11:30 AM Assessing Future Threats (60 min)

#### **MODERATOR**

**Mahshid Abir**, *Planning Committee Member*

Senior Physician Policy Researcher

RAND

#### **PANELISTS**

**Trent Frazier**

Assistant Director for Stakeholder Engagement

Cybersecurity and Infrastructure Security Agency (CISA)

**Chas Eby**

Deputy Secretary

Maryland Department of Emergency Management

**Jeff Butler**

Regional Emergency Management Officer

Illinois & Maryland

Medxcel

### 12:30 PM Catered Lunch (45 min)

### **SESSION 3 Examining High-Priority Vulnerabilities and Strategies for Resilience: Built Environment, Water and Wastewater, Energy**

*This session will examine HPH critical infrastructure including the built environment, water and wastewater, and energy. Panelists will summarize challenges, risks, and vulnerabilities; discuss practical, high-priority actions to enhance resilience, including strategies, models, regulatory mechanisms, policies, systems, partnerships, and incentives that could be leveraged; and review the state of emergent and critical opportunities.*

**1:15 PM      Built Environment (60 min)**

#### **MODERATOR**

**Kirk R. Pawlowski, Planning Committee Member**  
Executive Director (Ret.)  
Educational Service 112's Pacific Northwest Regional Construction Services Group

#### **PANELISTS**

**William R. (Bill) Seed**  
Senior Vice President, Facilities Design and Construction  
Jackson Health Systems

**Therese P. McAllister, virtual**

Deputy Chief of the Materials and Structural Systems Division  
Community Resilience  
National Institute of Standards and Technology (NIST)

**Amber Wirth**

Vice President and Director of Sustainability  
HKS

**2:15 PM      Water and Wastewater (60 min)**

#### **MODERATOR**

**Kirk R. Pawlowski, Planning Committee Member**  
Executive Director (Ret.)  
Educational Service 112's Pacific Northwest Regional Construction Services Group

#### **PANELISTS**

**RADM (Ret.) Gary J. Hartz**  
Former Assistant Surgeon General  
U.S. Public Health Service Commissioned Corps

**Jake Marshall**

Program Manager | Continuity of Operations  
Special Operations Division  
National Transportation Safety Board (NTSB)  
\*water and transportation sector perspective\*

**Chrissy Dangel, virtual**  
Environmental Scientist  
Office of Water (OW)  
Office of Ground Water and Drinking Water (OGWDW)  
Water Infrastructure and Cyber Resilience Division (WICRD)  
U.S. Environmental Protection Agency (EPA)

**Joshua Corman, virtual**  
Executive in Residence for Public Safety & Resilience  
Institute for Security and Technology (IST)

**3:15 PM** **Break** (15 min)

**3:30 PM** **Energy** (60 min)

**MODERATOR**

**Get Moy, Planning Committee Member**  
Vice President and Senior Program Director for Federal Projects  
AECOM

**PANELISTS**

**Scott Aaronson**  
Senior Vice President, Security and Preparedness  
Edison Electric Institute

**Christopher Riccardi**

Manager  
Emergency Management & Business Continuity  
Children's Health of Orange County (CHOC)

**Patrick Murphy**

Senior Scientist  
PSE Healthy Energy

**SESSION 4 Day 1 Roundtable**

*This roundtable will explore social components that support HPH critical infrastructure. Discussants will explore workforce, leadership, community, and equity considerations with the goal of building social resilience within the HPH critical infrastructure ecosystem.*

**4:30 PM** **Social Infrastructure: Workforce, Leadership, and Culture** (45 min)

**MODERATOR**

**Herminia Palacio, Planning Committee Member**  
President  
NexusBridge Strategies, LLC

**PANELISTS**

**Kelli Nations**  
American Group Chief Nurse Executive  
HCA Healthcare

**J.P. Leider**

Associate Professor, Division of Health Policy and Management  
Director, Center for Public Health Systems  
University of Minnesota School of Public Health  
PI, Public Health Workforce Research Center  
Consortium for Workforce Research in Public Health (CWORPH)

**Henry A. Garrido, virtual**

Executive Director  
NYC District Council 37, The American Federation of State, County and Municipal Employees (AFSCME)

**SESSION 5 Day 1 Closing**

**5:15 PM Day 1 Closing Remarks (15 min)**

**Paul Biddinger, Workshop Planning Committee Chair**  
Chief Preparedness and Continuity Officer  
Mass General Brigham

**5:30 PM Adjourn Day 1**

**\*\*Networking reception to be held for those attending in person\*\***

**TUESDAY, DECEMBER 10, 2024**

**SESSION 6 DAY 2 OPENING SESSION**

**\*\*Catered breakfast provided at 8:30 a.m. ET\*\***

**9:00 AM Welcome Remarks and Day 1 Recap**

**Paul Biddinger, Workshop Planning Committee Chair**  
Chief Preparedness and Continuity Officer  
Mass General Brigham

**SESSION 7 Examining High-Priority Vulnerabilities and Strategies for Resilience: IT Systems, Communications Systems, and Supply Chain**

*This session will examine HPH critical infrastructure including information technology (IT) systems, communications systems, and supply chain. Panelists will summarize challenges, risks, and vulnerabilities; discuss practical, high-priority actions to enhance resilience, including strategies, models, regulatory mechanisms, policies, systems, partnerships, and incentives that could be leveraged; and review the state of emergent and critical opportunities.*

**9:15 AM IT Systems (60 min)**

**MODERATOR**

**William Yurcik, Planning Committee Member**  
Federal Lead for Cybersecurity Threat Intelligence  
CMS Medicare Headquarters

**PANELISTS**

**Natalie Sullivan**

MFA Site Director, DC VAMC ED  
Asst Program Director, GW Disaster and Operational Medicine Fellowship  
Assistant Professor, Emergency Medicine  
George Washington University Hospital

**Raj Ratwani**

Vice President of Scientific Affairs, MedStar Health Research Institute  
Director, MedStar Health National Center for Human Factors in Healthcare  
Professor, Georgetown University School of Medicine

**Gregory Pluta**

Director of External Partnerships  
Computer Science Department  
University of Illinois at Urbana-Champaign

**10:15 AM Break (15 min)**

**10:30 AM Communications Systems (60 min)**

**MODERATOR**

**Andrew Pickett, Planning Committee Member**  
Director  
Bureau of Emergency Preparedness and Response  
Pennsylvania Department of Health

**PANELISTS**

**Sean Kice, virtual**

Deputy Director | Emergency Services Coordinator  
Emergency Preparedness Program  
Tennessee Department of Health

**Marcie Roth**

Executive Director and Chief Executive Officer  
World Institute on Disability

**Cathy Junda**

Principal and Digital Health Lead  
Stantec

**Kathryn Condello**

Adjunct Professor, University of New Hampshire Cybersecurity Policy & Risk Management (CPRM) Program  
Vice Chair, Communications Sector Coordinating Council  
Senior Director, National Security/Emergency Preparedness, Lumen

**11:30 AM Supply Chain (60 min)**

**MODERATOR**

**Nicolette A. Louissaint, Planning Committee Member**  
Senior Vice President for Policy and Strategic Planning  
Healthcare Distribution Alliance

**PANELISTS**

**Brooke Courtney**

Senior Regulatory Counsel  
Office of Counterterrorism and Emerging Threats (OCET)  
Office of the Commissioner  
U.S. Food and Drug Administration (FDA)

**Anita Patel, virtual**

Vice President Pharmacy Services Development  
Walgreens

**Wayland Coker**

Chief Supply Chain Strategist  
Director, Office of Supply Chain Optimization (SCO)  
Center for Industrial Base Management & Supply Chain (IBMSC)  
Administration for Strategic Preparedness and Response (ASPR)

**12:30 PM Catered Lunch (60 min)**

**SESSION 8 Day 2 Roundtable**

*This roundtable will re-envision how the HPH critical infrastructure sector can be more resilient and prepared for 21st century threats. Discussants will explore how disaster resilience can become an integral element of strategic governance of our healthcare, life sciences research, and public health institutions including human resources, financial resources (capital and operating), and continuing education and training; identify key stakeholders to advance solutions and examine relevant roles and responsibilities; and explore how to ensure capabilities and resources are utilized in an equitable manner to support underserved populations.*

**1:30 PM Re-Envisioning a Resilient HPH Critical Infrastructure Sector (60 Min)**

**MODERATOR**

**Paul Biddinger, Workshop Planning Committee Chair**  
Chief Preparedness and Continuity Officer  
Mass General Brigham

**PANELISTS**

**Cole Roberts**

Principle, Energy & Sustainability  
ARUP

**O. Sami Saydjari**

Research Scientist, Analyst, and Engineer  
Department of Computer Science  
Dartmouth College

**Mark Jarrett, *virtual***

Senior Health Advisor, Northwell Health  
Professor of Medicine, Donald and Barbara Zucker School of  
Medicine at Hofstra/Northwell  
Chair, U.S. Healthcare and Public Health Sector Coordinating  
Council

**Monique K. Mansoura**

Executive Director, Global Health Security and Biotechnology  
The MITRE Corporation

**SESSION 9   Workshop Closing**

**2:30 PM      Closing Remarks from the Co-Chairs of the Forum on Medical and Public Health Preparedness for Disasters and Emergencies (15 min)**

**Asha M. George**

Executive Director  
Bipartisan Commission on Biodefense

**W. Craig Vanderwagen**

Co-Founder and Director  
East West Protection, LLC

**2:45 PM      Closing Remarks from the Workshop Chair (15 min)**

**Paul Biddinger, Workshop Planning Committee Chair**

Chief Preparedness and Continuity Officer  
Mass General Brigham

**3:00 PM      End Workshop**

**\*\*WORKSHOP ENDS\*\***