

New York City Health Care Coalition
Hazard Vulnerability Analysis 2025 (Budget Period 2)
December 31, 2025

This report summarizes the New York City (NYC) Department of Health and Mental Hygiene's (NYC Health Department) activities surrounding the development, administration, and summary of a healthcare coalition Hazard Vulnerability Analysis (HVA) for 2025.

Background: Over the past 20 years, several man-made and natural disasters have pushed emergency preparedness to the forefront of priorities for healthcare facilities and communities. For several years now, hospitals and other facilities that play a role in healthcare delivery across the United States have been responsible for preparing an HVA to guide their planning and preparedness activities and to demonstrate their ability to mitigate, prepare, respond, and recover from an emergency event. Each year, the NYC Health Department consults with the members of the New York City Health Care Coalition (NYC HCC) to rank hazards for an HVA, as a requirement of the Hospital Preparedness Program (HPP) from the Administration for Strategic Preparedness and Response (ASPR). Results are used to identify and prioritize policy, planning, and response issues and provide strategies and resources to NYC HCC members in supporting citywide healthcare service delivery. This report contains the results of the HVA analysis for 2025.

Methods: In 2024, the NYC Health Department conducted the HVA as part of its five-year Jurisdictional Risk Assessment (JRA). As part of the JRA, participants were asked a series of in-depth questions, and their responses were aggregated to rank hazards based on risk, probability, and preparedness. Given the comprehensive nature of the 2024 assessment, the NYC Health Department adopted a more streamlined approach in 2025. NYC HCC members were asked to review the same 10 hazards (natural: infectious disease outbreak, pandemic, flooding, coastal storm, temperature extremes; and human-caused: mass casualty incident, chemical threats, utility interruptions and cyberattack) and their associated 2024 rankings. Participants were then invited to either confirm these rankings or highlight any changes from the past year that could impact the hazard assessment.

Forty-seven respondents participated in the survey, representing all sectors of the NYC HCC, including: healthcare networks, independent hospital systems, borough coalitions, long term care, hospice and palliative care, community health, government, and other subject matter experts.

Results:

Risk: Risk refers to the likelihood of a hazard occurring combined with its potential impact. It is calculated based on factors such as the probability of an event and its severity, helping prioritize which hazards require the most attention. In 2025, survey participants reaffirmed the previous risk ranking.

*FIGURE 1. Hazards by Risk, New York City Health Care Coalition, 2025;
ranked highest risk (1) to lowest risk (10)*

Rank	2024/2025
1	Infectious Disease Outbreak
2	Pandemic
3	Flooding
4	Hazardous Materials Release

5	Mass Casualty Incident
6	Coastal Storm
7	Chemical Threats
8	Temperature Extremes
9	Utility Interruption
10	Cyberattack

Probability: Probability is the likelihood that a hazard will occur within a given time frame. High-probability hazards are those that are expected to occur more frequently. In 2025, survey participants made a slight change to the previous year’s ranking, promoting coastal storms over chemical threats.

FIGURE 2. Hazards by Probability of Occurrence, New York City Health Care Coalition, 2025; ranked most probable occurrence (1) to least probable occurrence (5)

Rank	2025	2024
1	Coastal Storm	Chemical Threats
2	Chemical Threat	Coastal Storm
3	Cyberattack	Cyberattack
4	Flooding	Flooding
5	Hazardous Materials Release	Hazardous Materials Release

Preparedness: Preparedness is the ability to effectively anticipate, respond to, and recover from the impacts of a hazardous event. An organization is prepared for a hazard when it engages in a continuous cycle of planning, organizing, training, equipping, exercising, evaluating, and taking corrective action to ensure effective coordination during incident response. In 2025, survey participants reaffirmed the previous risk ranking.

FIGURE 3. Hazards by Preparedness, New York City Health Care Coalition, 2025; ranked most prepared (1) to least prepared (5)

Rank	2024/2025
1	Infectious Disease Outbreak
2	Pandemic
3	Chemical Threats
4	Hazardous Materials Release
5	Coastal Storm

Emerging Trends: Several emerging trends were noted by HCC members that should be factored into the coalition’s planning and resource allocation decisions:

- **Cyberattacks:** Cyberattacks was repeatedly cited by respondents as an increasing risk. Participants emphasized the growing reliance on internet-connected tools within healthcare operations and patient care, leaving these systems vulnerable to malicious actors. Some also pointed to the severe impact of recent cyber disruptions, including the July 2024 CrowdStrike breach and October 2025 Amazon Web Services outage, noting that even non-malicious disruptions can escalate into emergencies. HCC members underscored the need for stronger preparedness measures to address cybersecurity and extended downtime events.
- **Chemical Threats and Hazardous Materials:** In the probability ranking, many participants attributed the lower ranking of chemical threats and hazardous materials events to their

infrequent occurrence in recent years. However, others highlighted their potentially severe impact and the general public's lack of preparedness for such events.

- **Flooding and Coastal Storms:** Across all three rankings, respondents emphasized the widespread disruptions to normal operations caused by natural disasters, particularly flooding and coastal storms. Changes in weather patterns, rising sea levels, and the increasing severity and frequency of storms were noted as key factors driving heightened risks from weather-related hazards. Flooding was a major concern for many participants, who highlighted its prevalence in both coastal and inland areas—even during low-volume rainstorms. Over the past five years, New York City has experienced multiple "historic" floods and coastal storms, which have disproportionately affected vulnerable communities, amplifying existing challenges and inequities.
- Reflecting on 2025, several participants noted trends that should be closely tracked over the subsequent years:
 - **Temperature Extremes:** Heatwaves during the summer of 2025 had devastating impacts, including loss of life and power outages that disrupted operations at health facilities.
 - **Infectious Disease and Pandemic:** The ongoing decline in vaccination rates has increased the risk of infectious disease outbreaks. Additionally, while the likelihood of another pandemic is low, public fatigue following the COVID-19 pandemic could hinder an effective response to future pandemics.

Next steps:

- The NYC Health Department encourages HCC leadership and the Governance Board of the HCC to consider these ranked hazards when planning for the next budget 'period's activities. To facilitate the coalition's consideration of the ranked hazards, the NYC Health Department will disseminate this report to members of the coalition.
- The coalition should strive to investigate these ranked hazards in the context of resources needed to address them (e.g., number of ventilators, personal protective equipment (PPE), testing kits, and medications) and seek to close gaps in the availability or distribution of resources.
- In collaboration with the NYC HCC, the NYC Health Department will review the HVA data-gathering process, realizing the current method is subject to various limitations, such as a lack of definitions of various hazards and a lack in the design of the survey to control for "impact" versus "probability" in each respondent's answers.
- After undergoing review by the NYC HCC Governance Board, this document, which serves as the coalition HVA, will be archived and uploaded to the Coalition Assessment Tool by the NYC Health Department.

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