Cambridge Climate Resiliency Tabletop Exercise
Business Continuity Coordination

Situation Manual
January 17, 2018
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# Exercise Overview

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<tr>
<th>Exercise Name</th>
<th>Cambridge Climate Resiliency Tabletop Exercise</th>
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<tr>
<td>Exercise Date</td>
<td>January 17, 2018</td>
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</table>

**Scope**

The tabletop exercise will cover business continuity and coordination procedures following a climate-based incident that adversely affects the Cambridge area and causes business interruptions to stakeholders in the City.

**Mission Area(s)**

- Protection
- Response
- Recovery

**Core Capabilities**

- Operational Coordination
- Supply Chain Integrity and Security
- Critical Transportation
- Infrastructure Systems
- Economic Recovery

**Objectives**

1. Discuss interdependencies on systems among Cambridge stakeholders including transportation, vendors, and utilities for Cambridge businesses and organizations of all sizes.
2. Determine resource sharing needs and obstacles in the aftermath of the disaster.
3. Practice coordination and communication between Cambridge businesses/organizations as well as with the city and state during a supply chain disruption due to a major disaster affecting the Cambridge area.
4. Discuss lack of staffing due to transportation infrastructure disruption and care for staff that has stayed in Cambridge to continue operations.
5. Determine common gaps in resolving the above issues and move forward on planning next steps to resolve these gaps.

**Threat or Hazard**

Hurricane

**Scenario**

See scenario summary.

**Sponsor**

This exercise is sponsored by the Cambridge Compact for a Sustainable Future.
<table>
<thead>
<tr>
<th>Exercise Planning Team</th>
<th>MIT, Novartis, Harvard, City of Cambridge, Cambridge Fire Department</th>
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</thead>
<tbody>
<tr>
<td>Participating Individuals</td>
<td>Cambridge Compact Members</td>
</tr>
<tr>
<td><strong>Suzanne Blake</strong></td>
<td><strong>Manager, MIT Emergency Management</strong></td>
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<tr>
<td></td>
<td><strong>Email: <a href="mailto:smblake@mit.edu">smblake@mit.edu</a></strong></td>
</tr>
</tbody>
</table>
Exercise Objectives and Core Capabilities

The objectives in Table 1 describe the expected outcomes for the exercise. The objectives are linked to core capabilities, which are distinct critical elements necessary to achieve the specific mission area(s). The objectives and aligned core capabilities have been selected by the Exercise Planning Team.

<table>
<thead>
<tr>
<th>Exercise Objective</th>
<th>Core Capability</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Discuss interdependencies on systems among Cambridge stakeholders including</td>
<td>Operational Coordination</td>
</tr>
<tr>
<td>transportation, vendors, and utilities for Cambridge businesses and organizations of all sizes.</td>
<td>Supply Chain Integrity and Security</td>
</tr>
<tr>
<td></td>
<td>Critical Transportation Infrastructure Systems</td>
</tr>
<tr>
<td>2. Determine common gaps in resolving the above issues and move forward on planning</td>
<td>Operational Coordination</td>
</tr>
<tr>
<td>next steps to resolve these gaps.</td>
<td></td>
</tr>
<tr>
<td>3. Practice coordination and communication between Cambridge businesses/organizations as well as with the city and state during a supply chain disruption due to a major disaster affecting the Cambridge area.</td>
<td>Operational Coordination</td>
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<td></td>
<td>Supply Chain Integrity and Security</td>
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<tr>
<td>4. Discuss lack of staffing due to transportation infrastructure disruption and care for staff that has stayed in Cambridge to continue operations.</td>
<td>Operational Coordination</td>
</tr>
<tr>
<td></td>
<td>Critical Transportation Economic Recovery</td>
</tr>
<tr>
<td>5. Determine resource sharing needs and obstacles in the aftermath of the disaster.</td>
<td>Operational Coordination Economic Recovery</td>
</tr>
</tbody>
</table>

Table 1. Exercise objectives and associated core capabilities

Participant Roles and Responsibilities

The term *participant* encompasses many groups of people, not just those playing in the exercise. Groups of participants involved in the exercise, and their respective roles and responsibilities, are described below.

- **Players.** Players are personnel who have an active role in discussing or performing their regular roles and responsibilities during the exercise. Players discuss or initiate actions in response to the simulated emergency.
• **Observers.** Observers do not directly participate in the exercise. However, they may support the development of player responses to the situation during the discussion by asking relevant questions or providing subject matter expertise.

• **Facilitators.** Facilitators provide situation updates and moderate discussions. They also provide additional information or resolve questions as required. Key Exercise Planning Team members also may assist with facilitation as subject matter experts (SMEs) during the exercise.

**Exercise Structure**

This exercise will be a facilitated tabletop exercise. Subject matter experts in attendance at the exercise may present training information prior to exercise play. During exercise play, players will participate in the following modules:

- Module 1: Landfall + 1 Day (Immediate Recovery and Continuity Actions)
- Module 2: 1-1.5 Weeks After Landfall (Ongoing Recovery and Continuity Actions)

Each module will begin with a scenario summary. After the scenario summary, exercise participants will be asked to discuss the issues, using prompting questions, and make critical decisions as necessary. This discussion will be moderated by the exercise facilitator.

**Exercise Guidelines**

- This exercise will be held in an open, low-stress, no-fault environment. Varying viewpoints, even disagreements, are expected.
- Participants should respond to the scenario using their knowledge of current plans and capabilities (i.e., they may use only existing assets) and insights derived from training.
- Decisions are not precedent setting and may not reflect participants’ final position on a given issue. This exercise is an opportunity to discuss and present multiple options and possible solutions.
- Issue identification is not as valuable as suggestions and recommended actions that could improve preparedness and response efforts. Problem-solving efforts should be the focus.

**Exercise Assumptions and Artificialities**

In any exercise, assumptions and artificialities may be necessary to complete play in the time allotted and/or account for logistical limitations. Exercise participants should accept that assumptions and artificialities are inherent in any exercise, and should not allow these considerations to negatively impact their participation. During this exercise, the following apply:
• The exercise is conducted in a no-fault learning environment wherein capabilities, plans, systems, and processes will be evaluated.
• The exercise scenario is plausible, and events occur as they are presented.
• All players receive information at the same time.

Exercise Evaluation

Evaluation of the exercise is based on the exercise objectives and aligned capabilities. Facilitators and note takers will capture critical actions and discussion points of the exercise during exercise play and use notes from the exercise for the evaluation. Additionally, players will be asked to complete participant feedback forms. These documents will be used to evaluate the exercise and compile the After-Action Report (AAR).
APPENDIX A: EXERCISE AGENDA

Cambridge Climate Resiliency Tabletop Exercise
Agenda
January 17, 2018

Discussion Topics

➢ Exercise Introduction 1:00-1:45

  • Welcome and Introduction
    o Jaclyn Olsen, Assistant Director, Office of Sustainability, Harvard University & Co-Vice Chair, Executive Committee, Cambridge Compact for a Sustainable Future
  • Exercise Introduction and Hurricanes Overview
    o Suzanne Blake, Manager, MIT Emergency Management
  • EMAC, State, and Federal Response
    o Mike Main, MEMA Region 1
  • Interdependent Systems and Your Resiliency Scorecard
    o Jim Goudreau, Head of Climate, Novartis

➢ StartEx 1:45

➢ Module One: Landfall + 1 Day 1:45-2:30
(Immediate Recovery and Continuity Actions)

➢ Break 2:30-2:45

➢ Module Two: 1-1.5 Weeks After Landfall 2:45-3:30
(Ongoing Recovery and Continuity Actions)

➢ EndEx 3:30

➢ Hot Wash 3:30-3:50

➢ Wrap Up and Closing presentation 3:50-4:00
  o Dr. Ken Strzepek, MIT Joint Program on the Science and Policy of Global Change